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DLC Exhibit 1
Part 1 - General Information
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# Duquesne Light Company 

Distribution Rate Case
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## 52 Pa. Code § 53.52(a)(1)

Q. The specific reasons for each change.
A. Please refer to Schedule A of DLC Exhibit 2 (Fully Projected Test Year)

## 52 Pa. Code § 53.52(a)(2)

Q. The total number of customers served by the utility.
A. Currently there are approximately 600,000 customers served by Duquesne.

## 52 Pa. Code § 53.52(a)(3)

Q. A calculation of the number of customers, by tariff subdivision, whose bills will be affected by the change.
A. See Duquesne's Exhibit 2 (Fully Projected Future Test Year), Schedule D-5 D and DFR IV-A.

## 52 Pa. Code § 53.52(a)(4)

Q. The effect of the change on the utility's customers.
A. See Duquesne's Exhibit 2 (Fully Projected Future Test Year), Schedule D-5 D and DFR IV-A.

## 52 Pa. Code § 53.52(a)(5)

Q. The direct or indirect effect of the proposed change on the utility's revenue and expenses.
A. See Duquesne's Exhibit 2 (Fully Projected Future Test Year), Schedule D.

## 52 Pa. Code § 53.52(a)(6)

Q. The effect of the change on the service rendered by the utility
A. The Company is not proposing any changes to the service rendered by the utility.

## 52 Pa. Code § 53.52(a)(7)

Q. A list of factors considered by the utility in its determination to make the change. The list shall include a comprehensive statement about why these factors were chosen and the relative importance of each. This subsection does not apply to a portion of a change seeking a general rate increase as defined in 66 Pa . C. S. \& 1308 (relating to voluntary changes in rates).
A. Not applicable.

## 52 Pa. Code § 53.52(a)(8)

Q. Studies undertaken by the utility in order to draft its proposed change. This paragraph does not apply to a portion of a tariff change seeking a general rate increase as defined in 66 Pa. C. S. \& 1308.
A. Not applicable.

## 52 Pa. Code § 53.52(a)(9)

Q. Customer polls taken and other documents which indicate customer acceptance and desire for the proposed change. If the poll or other documents reveal discernible public opposition, an explanation of why the change is in the public interest shall be provided.
A. Please refer to DLC Exhibit 5, Statement No. 9, Direct Testimony of Jennifer Neiswonger.

52 Pa. Code § 53.52(a)(10)
Q. Plans the utility has for introducing or implementing the changes with respect to its ratepayers.
A. The Company proposes to publish in newspapers in general circulation in its service territory the notice of the rate filing. Additional publications may be made based on Commission order. Bill inserts describing changes proposed and ultimately approved will be provided to customers. Additionally, news releases, and other media outlets will be utilized to communicate with customers. Additionally, after the Commission acts on this filing, the Company will notify all customers in accordance with Commission requirements. The Company also plans to inform customers about approved rate changes in customer newsletters.

## 52 Pa. Code § 53.52(a)(11)

Q. FCC. FERC or Commission orders or rulings applicable to the filing.
A. None.

## 52 Pa. Code § 53.52(b)(1)

Q. The specific reasons for each Increase or decrease.
A. See Duquesne's Statement of Reasons in DLC Exhibit 2 (Fully Projected Future Test Year), Schedule A.

52 Pa. Code § 53.52(b)2
Q. The operating income statement of the utility for a 12-month period, the end of which may not be more than 120 days prior to the filing.
A. See Duquesne's DLC Exhibit 4 (Historic Test Year), Schedule B.

52 Pa. Code § 53.52(b)3
Q. A calculation of the number of customers, by tariff subdivision, whose bills will be increased.
A. See Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), Schedule D-5 D and DFR IV-A.

## 52 Pa. Code § 53.52(b)4

Q. A calculation of the total increases, in dollars, by tariff subdivision, projected to an annual basis.
A. See Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), Schedule D and DFR IV-A.

52 Pa. Code § 53.52(b)5
Q. A calculation of the number of customers, by tariff subdivision, whose bills will be decreased.
A. See Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), Schedule D-5 D and DFR IV-A.

52 Pa. Code § 53.52(b)6
Q. A calculation of the total decreases, in dollars, by tariff subdivision, projected to an annual basis.
A. See Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), Schedule D-5 D and DFR IV-A.

## 52 Pa. Code § 53.52(c)1

Q. A statement showing the utility's calculation of the rate of return earned in the 12-month period referred to on subsection (b)(2), and the anticipated rate of return to be earned when the tariff, revision, or supplemental becomes effective. The rate base used in this calculation shall be supported by summaries of original cost for the rate of return calculation.
A. See Schedule C-1 of DLC Exhibit 2 (Fully Projected Future Test Year), DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year).

## 52 Pa. Code § 53.52(c)2

Q. A detailed balance sheet of the utility as of the close of the period referred to in subsection (b)(2).
A. See Schedule B-1 of Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year).

## 52 Pa. Code § 53.52(c)3

Q. A summary, by detailed plant accounts, of the book value of the property of the utility at the date of the balance sheet required by paragraph (2).
A. See Schedule C-2 of Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year) - DFR V-A-3.

## 52 Pa. Code § 53.52(c)4

Q. A statement showing the amount of the depreciation reserve, at the date of the balance sheet required by paragraph (2), applicable to the property, summarized as required by paragraph (3).
A. See Schedule C-2 of Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year) - DFR V-A-3.

## 52 Pa. Code § 53.52(c) 5

Q. A statement of operating income, setting forth the operating revenues and expenses by detailed accounts for the 12-month period ending on the balance sheet required by paragraph (2).
A. See Schedule B of Duquesne's DLC Exhibit 2 (Fully Projected Future Test Year), DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year).

## 52 Pa. Code § 53.52(c) 6

Q. A brief description of a major change in the operating or financial condition of the utility occurring between the date of the balance sheet required by paragraph (2) and the date of transmittal of the tariff, revision or supplement. As used in this paragraph, a major change is one which materially alters the operating or financial condition of the utility from that reflected in paragraphs (1) - (5).
A. There have been no major changes in the operating and financial conditions of Duquesne between the date of the balance sheet and the date of this filing.
Q.1. Provide a summary discussion of the rate change request, including specific reasons for each increase or decrease. Also provide a breakdown, which identifies the revenue requirement value of the major items generating the requested rate change.

## A.1. See Schedule A of DLC Exhibit 1, Part 1.

Q.2. Identify the proposed witnesses for all statements and schedules of revenues, expenses, taxes, property, valuation and the like.
A.2. Please refer to DLC Exhibit 5, Statement 1 - Direct Testimony of C. James Davis
Q.3. Provide a single page summary table showing, at present and at proposed rates, together with references to the filing information, the following as claimed for the fully adjusted test year:

Revenues
Operating Expenses
Operating Income
Rate Base
Rate of Return (produced)
A.3. Attachment I-A-3 provides the requested information.

## Total PA Jurisdiction <br> Year Ending December 31, 2022 <br> (Thousands of Dollars)

AT PRESENT RATES

|  | Amount |
| :--- | ---: |
| Revenue | $\$ 568,382$ |
| Operating Expenses | $\underline{427,697}$ |
| Operating Income | $\underline{\$ 140,685}$ |
| Rate Base | $\underline{\$ 2,276,464}$ |
| Rate of Return | $\underline{5.356 \%}$ |

DLC Exhibit 2
(Fully Projected Future)

Sch. D-1, Col. (1), line 5
Sch. D-1, Col. (1), line 9
Sch. D-1, Col. (1), line 10
Sch. C-1, Col. (2), line 1
Sch. C-1, Col. (2), line 3

AT PROPOSED RATES

| Amount |  |
| :--- | ---: |
| $\$ \quad 654,141$ |  |
| 433,931 |  |

\$ 220,210
\$2,276,464
$7.840 \%$

DLC Exhibit 2
(Fully Projected Future) Reference

Sch. D-1, Col. (3), line 5
Sch. D-1, Col. (3), line 9
Sch. D-1, Col. (3), line 10
Sch. C-1, Col. (2), line 1
Sch. C-1, Col. (2), line 5
Q.4. Whenever a major generating plant is placed in operating service or removed from operating service the utility shall separately indicate the effect of the plant addition or removal from service upon rate base, revenue, expense, tax, income and revenue requirement as it affects the test year.
A.4. This filing requirement is not applicable to Duquesne Light Company's current rate filing.
Q.1. Provide a corporate history including the dates of original incorporation, subsequent mergers and acquisitions. Indicate all counties, cities and other governmental subdivisions to which service is provided, including service areas outside this Commonwealth, and the total number of customers or billed units in the areas served.
A. 1.

## Duquesne Light Company

Incorporation History and Conversion to a Limited Liability Company
The present Duquesne Light Company was formed on November 15, 1912 by the consolidation and merger of Duquesne Light Company, Oakmont and Verona Light, Heat and Power Company and Monongahela Light Company under Section 1 of the Act of May 3, 1909, P.L. 408. By the terms of this Act all of the rights, powers, franchises and property of the constituent companies became vested in the present Duquesne Light Company. Comm. vs. Citizens Light, Heat and Power Company of Penna., 41 C.C. 222.

Of the constituent companies, Duquesne Light Company was incorporated on August 5, 1903 under the Act of April 29, 1874, P.L. 73, and its supplement, the Act of May 8, 1889, P.L. 136, for the purpose of supplying light, heat and power by means of electricity to the City of Pittsburgh (Allegheny County), and by the terms of its charter was to have perpetual existence.

Oakmont and Verona Light, Heat and Power Company was incorporated on June 18, 1890, under the Act of April 29, 1874, and its supplement, the Act of May 8, 1889, for the purpose of supplying light, heat and power by means of electricity to the Borough of Oakmont (Allegheny County), and by the terms of its charter was to have existence for 999 years.

Monongahela Light Company was incorporated on April 4, 1902, under the Act of April 29, 1874, and its supplement, the Act of May 8,1889 , for the purpose of supplying light, heat and power by means of electricity within the districts lying east and west of the Monongahela and Youghiogheny Rivers in the County of Allegheny, Pennsylvania between a point on the said Monongahela River where the boundary line of the City of Pittsburgh intersects said river to a point where the boundary line of the County of Westmoreland intersects said river, and from the mouth of the Youghiogheny River to a point where the boundary line of said County of Westmoreland intersects the said Youghiogheny River, and more partic ularly bounded and described as follows, on the east by the Tow nships of Rostraver, Sewickley, North Huntingdon, Penn, Franklin and Burrell in the County of Westmoreland, on the north by the Allegheny River, on the west by the City of Pittsburgh and the Townships of Snowden and Baldwin in Allegheny County, and on the south by the Townships of Union and Carroll, in Washington County, Pennsylvania, and by the terms of its charter was to have perpetual existence.

Duquesne Light Company restated its Articles of Amendment last on June 30, 1999. The stated purposes for which the Company is incorporated under the Business Corporation Law of the Commonwealth of Pennsylvania are to engage in, and do any lawful act concerning, any of all lawful business for which corporations may be incorporated under said Business Corporation Law, including but not limited to:
A. The supply of light, heat and power to the public by any means;
B. The production, generation, manufacture, transmission, transportation, storage, distribution or furnishing of electricity, natural or artificial gas, steam or air conditioning, or any combination thereof to or for the public; and
C. Manufacturing, processing, owning, using and dealing in personal property of every class and description, engaging in research and development, the furnishing of services, and acquiring, owning, using and disposing of real property of every nature whatsoever.

In April 2017, Duquesne Light Company submitted an "Application of Duquesne Light Company for Approval to Convert from a Business Corporation to a Limited Liability Company", (Docket No. A-2017-2599375) to the Pennsylvania Public Utility Commission (PUC). The PUC approved this application in an Order dated August 31, 2017 and effective November 2017, Duquesne Light Company completed its conversion to a Limited Liability Company.

Duquesne Light Holdings, Inc. is the sole holder of Duquesne Light Company common stock (10 shares @ $\$ 1$ par value). Duquesne Light's subsidiaries are:

## Duquesne Light Company and its Subsidiaries

Entity Type:
Registrations
Pennsylvania

## Duquesne Power Two, LLC*

Entity Type:
Registrations
Delaware Incorporation 10/21/2003
Pennsylvania

05/17/2004

Monongahela Light and Power Company (through October 2017)** 100\%
Entity Type:
Corporation
Registrations
Pennsylvania Incorporation 04/28/1899
*Formerly Duquesne Power, Inc., a Delaw are corporation, converted 12/08/2005.
**Pursuant to the PUC Order approving its Application of Duquesne Light Company for Approval to Convert from a Business Corporation to a Limited Liability Company, (Docket No. A-2017-2599375) in

November 2017, Duquesne Light Company transferred Monongahela Light and Power Company and its subsidiary, DataCom Information Systems, LLC to Duquesne Light Holdings, Inc. (parent).

The counties, cities and other government subdivisions, for which service is provided, please see the below. Total number of customer accounts is approximately 595,000.

## LIST OF COMMUNITIES SERVED

The Company renders service in portions of Allegheny and Beaver Counties, Pennsylvania. Electric service is available in all localities where the Company has distribution facilities, including all or a portion of the following cities, boroughs and townships.

## ALLEGHENY COUNTY

## Cities and Boroughs

| Aspinwall | Dormont | Jefferson |
| :--- | :--- | :--- |
| Avalon | Dravosburg | Leetsdale |
| Baldwin | Duquesne | Liberty |
| Bell Acres | East McKeesport | Lincoln |
| Bellevue | East Pittsburgh | McKeesport |
| Ben Avon | Edgewood | McKees Rocks |
| Ben Avon Heights | Edgeworth | Millvale |
| Bethel Park | Emsworth | Monroeville |
| Blawnox | Etna | Mt. Oliver |
| Braddock | Forest Hills | Munhall |
| Braddock Hills | Fox Chapel | North Braddock |
| Brentwood | Franklin Park | Oakmont |
| Carnegie | Glassport | Osborne |
| Castle Shannon | Glenfield | Pennsbury Village |
| Chalfant | Green Tree | Pittsburgh |
| Churchill | Haysville | Pleasant Hills |
| Clairton | Heidleberg | Plum |
| Coraopolis | Homestead | Port Vue |
| Crafton | Ingram | Rankin |

## Townships

| Aleppo | Kilbuck | Ohio | Shaler |
| :--- | :--- | :--- | :--- |
| Baldwin | Leet | Penn Hills | Stowe |
| Collier | McCandless | Pine | Upper St. Clair |
| Crescent | Moon | Reserve | West Deer |
| Findlay | Mt. Lebanon | Richland | Wilkins |
| Hampton | Neville | Robinson |  |
| Indiana | North Versailles | Ross |  |
| Kennedy | O'Hara | Scott |  |

# LIST OF COMMUNITIES SERVED - (Continued) 

## BEAVER COUNTY

## Cities and Boroughs

| Aliquippa | East Rochester | Glasgow | Patterson Heights |
| :--- | :--- | :--- | :--- |
| Ambridge | Eastvale | Hookstown | Rochester |
| Baden | Economy | Industry | Shippingport |
| Beaver | Fallston | Midland | South Heights |
| Beaver Falls | Frankfort Springs | Monaca | West Mayfield |
| Bridgewater | Freedom | New Brighton |  |
| Conway | Georgetown | Ohioville |  |

Townships

Brighton
Center
Daugherty
Greene

Hanover
Harmony
Hopewell
Independence

New Sewickley
Patterson
Potter
Pulaski

Raccoon
Rochester
Vanport
White
Q.2. Provide a description of the property of the utility and an explanation of the system's operation, and supply the following, using available projections if actual data is unavailable:
a. A schedule of generating capability showing for the test year, and for the two consecutive 12-month periods prior to the test year, net dependable capacity in KW by unit, plant capacity factor by unit, and total fuel consumption by type and cost for each unit, if available, or for each station, and operation and maintenance expenses by station.
b. A schedule showing for the test year and for the 12-month period immediately prior to the test year the scheduled and unscheduled outages - in excess of 48 hours-for each station, the equipment or unit involved, the date the outage occurred, duration of the outage, maintenance expenses incurred for each outage, if available, and amounts reimbursable from suppliers or insurance companies.
c. A schedule for each unit retired during the test year or subsequent to the end of the test year, which shows the unit's KW capacity, hours of operation during the test year, net output generated, cents/KWH of maintenance and fuel expenses, and date of retirement.
d. A schedule showing latest projections of capacity additions and retirementscosts and KW-and reserve capacity at the time of peak for at least 10 years beyond the test year, including the in-service dates-actual or expected-and AFDC cutoff dates-if different from in-service dates-for all new generating units coming on line during or subsequent to the test year, if claimed.
A.2. This filing requirement is not applicable to Duquesne Light Company's current rate filing.

DFR I-B-3
Page 1 of 1 Sponsor: Benjamin Morris
Q.3. Provide an overall system map, including and labeling all generating plants, transmission substations-indicate voltage, transmission system lines-indicate voltage, and all interconnection points with other electric utilities, power pools, and other like systems.
A. Attachment DFR I-B-3 is considered Highly Confidential since it contains Critical Energy Infrastructure Information and is being provided to the Commission and will be provided to parties upon the execution of a Stipulated Protective Agreement and/or Protective Order.
Q.1. Provide a schedule showing the test year rate base and rates of return at original cost less accrued depreciation under present rates and under proposed rates. Claims made on this schedule should be cross-referenced to appropriate supporting schedules.
A.1. Schedules C-1 and D-1 of DLC Exhibit 2 (Fully Projected Future Test Year) provide the requested information.
Q.2. If the schedule provided in response to item 1, is based upon a future test year, provide a similar schedule which is based upon actual data for the 12-month period immediately prior to the test year.
A.2. Please refer to Schedules C-1 and D-1 for DLC Exhibit 3 (Future Test Year) and DLC Exhibit 4 (Historic Test Year).
Q.3. When a utility files a tariff stating a new rate based in whole or in part on the cost of construction, as defined in 66 Pa.C.S. § 1308(f) (relating to voluntary changes in rates), of an electric generating unit, the utility shall identify:
a) The total cost of the generating unit.
b) The following costs:

1) The cost and quantity of each category of major equipment, such as switchgear, pumps or diesel generators and the like.
2) The cost and quantity of each category of bulk materials, such as concrete, cable and structural steel and the like.
3) Manual labor.
4) Direct and indirect costs of architect/engineering services.
5) Direct and indirect costs of subcontracts or other contracts involving major components or systems such as turbines, generators, nuclear steam supply systems, major structures and the like.
6) Distributed costs.
c) A cost increase of $\$ 5$ million or more, including AFUDC, over the original utility estimates provided under $66 \mathrm{~Pa} . \mathrm{C} . \mathrm{S}$. § $515(\mathrm{a})$ (relating to construction cost of electric generating units) and its causes.
d) Compliance with subsections (a) and (b) will be identical in format and substance as that provided under 52 Pa . Code § 57.103 (relating to estimate of construction costs) for original cost estimates submitted under 66 Pa .C.S. § 515(a).
A.3. This filing requirement is not applicable to Duquesne Light Company's current rate filing.
Q.1. If a claim is made for plant held for future use, supply the following:
a. A description of the plant or land site and its cost and any accumulated depreciation.
b. The expected date of use for each item claimed.
c. An explanation as to why it is necessary to acquire each item in advance of its date of use.
d. The data when each item was acquired.
e. The date when each item was placed in plant held for future use.
A.1. Duquesne Light Company is not making a claim in measures of value in the fully projected future test year for plant held for future use. The Company is requesting authorization to record AFUDC on land acquired to provide future service in this proceeding. Please refer to the testimony of Jaime A. Bachota in DLC Exhibit 5, Statement No. 2.
Q.2. If a claim is made for construction work in progress, provide a supporting schedule which sets forth separately, revenue-producing and nonrevenue producing amounts, and include, for each category a summary of all work orders, amounts expended at the end of the test year and anticipated in-service dates. Indicate if the construction work in progress will result in insurance recoveries, reimbursements, or retirements of existing facilities. Describe in exact detail the necessity of each project claimed if not detailed on the summary page from the work order. Include final completion dates and estimated total amounts to be spent on each project.
A.2. Duquesne Light Company is not making a claim in the fully projected future test year for construction work in process.
Q.3. If a claim is made for materials and supplies or fuel inventory provide a supporting schedule for each claim showing the latest actual 13 monthly balances and showing in the case of fuel inventory claims, the type of fuel, and location, as in station, and the quantity and price claimed.
A.3. The requested information for materials and supplies is provided in Attachment II-B-3. The claim for materials and supplies is based upon the actual 13 monthly balances in the Historic Test Year. There is no claim being made for fuel inventory.

DUQUESNE LIGHT COMPANY
Monthly Average of Plant Materials and Operating Supplies
As of December 31, 2022
(Thousands of Dollars)

| Line <br> No. | Description | Amount |
| :---: | :--- | :---: |
| 1 | Plant Materials and Operating Supplies (B-3, page 2) | $\$$ |
| 2 | Stores expense undistributed (B-3, page 3) |  |
| 2 | Total materials and operating supplies | $\xlongequal{2}$ |

## DUQUESNE LIGHT COMPANY

Plant Materials and Operating Supplies
As of December 31, 2022
(Thousands of Dollars)

| Line No. | Month | Amount |  |
| :---: | :---: | :---: | :---: |
| 1 | December 2021 | \$ | 25,811 |
| 2 | January 2022 |  | 25,747 |
| 3 | February |  | 25,686 |
| 4 | March |  | 25,622 |
| 5 | April |  | 25,559 |
| 6 | May |  | 25,495 |
| 7 | June |  | 25,432 |
| 8 | July |  | 25,369 |
| 9 | August |  | 25,305 |
| 10 | September |  | 25,242 |
| 11 | October |  | 25,178 |
| 12 | November |  | 25,115 |
| 13 | December |  | 25,050 |
| 14 | Total Plant Materials and Operating Supplies | \$ | 330,611 |
| 15 | Monthly Average | \$ | 25,432 |

## DUQUESNE LIGHT COMPANY

## Stores Expenses Undistributed

As of December 31, 2022
(Thousands of Dollars)

| Line <br> No. | Month | Amount |  |
| :---: | :---: | :---: | :---: |
| 1 | December 2021 | \$ | - |
| 2 | January 2022 |  | - |
| 3 | February |  |  |
| 4 | March |  | - |
| 5 | April |  |  |
| 6 | May |  | - |
| 7 | June |  | - |
| 8 | July |  | - |
| 9 | August |  |  |
| 10 | September |  | - |
| 11 | October |  | - |
| 12 | November |  | - |
| 13 | December |  | - |
| 14 | Total Plant Materials and Operating Supplies | \$ | - |
| 15 | Monthly Average | \$ | - |

## DUQUESNE LIGHT COMPANY

Monthly Average of Plant Materials and Operating Supplies
As of December 31, 2021
(Thousands of Dollars)

| Line No. | Description | Amount |  |
| :---: | :---: | :---: | :---: |
| 1 | Plant Materials and Operating Supplies (B-3, page 5) | \$ | 28,010 |
| 2 | Stores expense undistributed (B-3, page 6) |  | 0 |
| 3 | Total materials and operating supplies | \$ | 28,010 |

## DUQUESNE LIGHT COMPANY

Plant Materials and Operating Supplies
As of December 31, 2021
(Thousands of Dollars)

| Line <br> No. | Month | Amount |  |
| :---: | :---: | :---: | :---: |
| 1 | December 2020 | \$ | 34,246 |
| 2 | January 2021 |  | 33,451 |
| 3 | February |  | 33,242 |
| 4 | March |  | 26,827 |
| 5 | April |  | 26,714 |
| 6 | May |  | 26,601 |
| 7 | June |  | 26,488 |
| 8 | July |  | 26,375 |
| 9 | August |  | 26,262 |
| 10 | September |  | 26,149 |
| 11 | October |  | 26,037 |
| 12 | November |  | 25,924 |
| 13 | December |  | 25,811 |
| 14 | Total Plant Materials and Operating Supplies | \$ | 364,129 |
| 15 | Monthly Average | \$ | 28,010 |

## DUQUESNE LIGHT COMPANY

## Stores Expenses Undistributed

As of December 31, 2021
(Thousands of Dollars)

| Line No. | Month | Amount |  |
| :---: | :---: | :---: | :---: |
| 1 | December 2020 | \$ | - |
| 2 | January 2021 |  | 2 |
| 3 | February |  | - |
| 4 | March |  | - |
| 5 | April |  | - |
| 6 | May |  | - |
| 7 | June |  | - |
| 8 | July |  | - |
| 9 | August |  | - |
| 10 | September |  | - |
| 11 | October |  | - |
| 12 | November |  | - |
| 13 | December |  | - |
| 14 | Total Plant Materials and Operating Supplies | \$ | 2 |
| 15 | Monthly Average | \$ | 0 |

## DUQUESNE LIGHT COMPANY

Monthly Average of Plant Materials and Operating Supplies
As of December 31, 2020
(Thousands of Dollars)

| Line <br> No. | Description | Amount |
| :---: | :--- | ---: |
| 1 | Plant Materials and Operating Supplies (B-3, page 8) | $\$ 333,415$ |
| 2 | Stores expense undistributed (B-3, page 9) | 0 |
| 3 | Total materials and operating supplies | $\$$\$ |

## DUQUESNE LIGHT COMPANY

Plant Materials and Operating Supplies
As of December 31, 2020
(Thousands of Dollars)

| Line | Amount |  |
| :---: | :---: | :---: |
| No. Month |  |  |
| 1 December 2019 | \$ | 31,879 |
| 2 January 2020 |  | 31,882 |
| 3 February |  | 31,648 |
| 4 March |  | 32,053 |
| 5 April |  | 32,921 |
| 6 May |  | 33,309 |
| 7 June |  | 33,498 |
| 8 July |  | 34,222 |
| 9 August |  | 34,488 |
| 10 September |  | 34,419 |
| 11 October |  | 34,586 |
| 12 November |  | 35,238 |
| 13 December |  | 34,246 |
| 14 Total Plant Materials and Operating Supplies | \$ | 434,390 |
| 15 Monthly Average | \$ | 33,415 |

## DUQUESNE LIGHT COMPANY

## Stores Expenses Undistributed

As of December 31, 2020
(Thousands of Dollars)

| Line No. | Month | Amount |  |
| :---: | :---: | :---: | :---: |
|  | 1 December 2019 |  | 0 |
|  | 2 January 2020 |  | 0 |
|  | 3 February |  | 4 |
|  | 4 March |  |  |
|  | 5 April |  |  |
|  | 6 May |  | 2 |
|  | 7 June |  |  |
|  | 8 July |  |  |
|  | 9 August |  |  |
|  | 10 September |  |  |
|  | 11 October |  |  |
|  | 12 November |  |  |
|  | 13 December |  |  |
|  | 14 Total Plant Materials and Operating Supplies | \$ | 6 |
|  | 15 Monthly Average | \$ | 0 |

Q.4. If a claim is made for cash working capital provide a supporting schedule setting forth the method and all detailed data utilized to determine the cash working capital requirement. If not provided in the support data, provide a lead-lag study of working capital, completed no more than 6 months prior to the rate increase filing.
A.4. Schedule C-4 of Exhibits 2 (Fully Projected Future Test Year), 3 (Future Test Year) and 4 (Historic Test Year) and the testimony of Robert O'Brien in DLC Statement Number 10 sets forth the method and detailed data utilized to determine the Company's claimed cash working capital requirements.
Q.5. If a claim is made for compensating bank balances, provide the following information:
a. Name and address of each bank
b. Types of accounts with each bank - checking, savings, escrow, other services, and the like.
c. Average daily balance in each account.
d. Amount and percentage requirements for compensating bank balance at each bank.
e. Average daily compensating bank balance at each bank.
f. Documents from each bank explaining compensating bank balance requirements.
g. Interest earned on each type of account.
h. A calculation showing the average daily float for each bank.
A.5. There are no claims for compensating bank balances.

DFR II-B-6
Page 1 of 1
Q.6. Explain in detail by statement or exhibit the appropriateness of additional claims or the use of a method not previously mentioned, in the claimed rate base.
A.6. An explanation of Duquesne Light Company's claim for any additional rate base items is set forth in Section C of DLC Exhibit 2 (Fully Projected Future Test Year).
Q.1. Prepare a Statement of Income including:
a. The book, or budgeted, statement for the test year.
b. Adjustments to annualize and normalize under present rates, including an elimination of the effects on income of the energy cost rate and state tax adjustment surcharge.
c. The income statement under present rates after adjustment.
d. The adjustment for the revenue requested.
e. The income statement under requested rates after adjustment.

Each adjustment, including those relating to adjustment clauses, shall contain an explanation in sufficient clarifying detail to allow a reasonably informed person to understand the method and rationale of the adjustment.
A.1. The information requested in items a. through e. is set forth in Section D of DLC Exhibit 2 (Fully Projected Future Test Year).
Q. 2 If the schedule provided in item 1 is based upon budgeted data for a future test year, provide a similar schedule which is based upon actual data for the 12-month period immediately prior to the test year.
A.2. Please refer to Section D of DLC Exhibit 2 (Fully Projected Future Test Year) and DLC Exhibit 4 (Historic Test Year).
Q.1. Provide a schedule showing all revenues and expenses for the test year and for the 12 -month period immediately prior to the test year, together with an explanation for major variances between test year revenues and expenses and those for the previous 12 -month period. Revenues and expenses shall be summarized by the major account categories listed below. If budgeted data for a future test year is not readily available by these categories, an analysis of the data for the 12-month period immediately prior to the future test year or for the most recent available calendar year may serve as the basis for ratably allocating the budgeted data into the account categories.

## A.1. See Attachment II-D-1.

## OPERATING REVENUES

400
Electric Revenue:
Residential
Commercial
Industrial
Public Street \& Highway Lighting
Sales for Resale
Total Sales Revenue
Provision for Rate Refunds
Total Sales Revenue - Net

Other Electric Revenue:
Forfeited Discounts
Miscellaneous Service Revenue
Rent from Electric Property
Other Electric Revenue
Total Other Electric Revenue
Total Operating Revenue

## OPERATING EXPENSE

401-402
Operation and Maintenance Expense
Power Production Expenses
Transmission Expenses
Regional Market Expenses
Distribution Expenses
Customer Accounts Expense
Customer Service \& Informational Expenses
Administrative and General Expenses
Total Operation \& Maint. Expense
403-405
Depreciation Expense and Amortization
of Electric Plant
$\begin{array}{ll}407 & \text { Regulatory Debits (Credits), net } \\ 408 & \text { Taxes Other Than Income Taxes } \\ & \text { Total Operating Expenses prior to Federal and State }\end{array}$ Income Taxes

Operating Income Prior to Fed \& State Income Taxes
Operation and Maintenance Expense
Power Production Expenses
Transmission Expenses
Regional Market Expenses
Distribution Expenses
Customer Accounts Expense
Customer Service \& Informational Expenses
Administrative and General Expenses
Total Operation \& Maint. Expense

|  | Depreciation Expense and Amortization <br> of Electric Plant |
| :--- | :--- |
| 407 | Regulatory Debits (Credits), net |
| 408 | Taxes Other Than Income Taxes |
|  | Total Operating Expenses prior to Federal and State <br> Income Taxes |


| 2021 |  | 2020 |  | Difference |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| \$ | 579,916 | \$ | 592,017 | \$ | $(12,101)$ |
|  | 256,580 |  | 238,479 |  | 18,101 |
|  | 44,467 |  | 47,459 |  | $(2,992)$ |
|  | 11,671 |  | 11,613 |  | 58 |
|  | 1,560 |  | 1,575 |  | (15) |
| \$ | 894,193 | \$ | 891,143 | \$ | 3,050 |
|  | 22,784 |  | 22,678 |  | 106 |
| \$ | 871,409 | \$ | 868,465 | \$ | 2,944 |
| \$ | 3,750 | \$ | 1,051 | \$ | 2,699 |
|  | 1,816 |  | 909 |  | 907 |
|  | 11,968 |  | 11,416 |  | 552 |
|  | 86,727 |  | 78,506 |  | 8,221 |
| \$ | 104,262 | \$ | 91,882 | \$ | 12,380 |
| \$ | 975,671 | \$ | 960,347 | \$ | 15,324 |


| \$ | 206,041 | \$ | 204,370 | \$ | 1,671 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 12,546 |  | 11,738 |  | 808 |
|  | - |  | - |  | - |
|  | 56,294 |  | 56,186 |  | 108 |
|  | 20,976 |  | 24,994 |  | $(4,018)$ |
|  | 22,202 |  | 29,610 |  | $(7,408)$ |
|  | 134,259 |  | 124,521 |  | 9,738 |
| \$ | 452,318 | \$ | 451,419 | \$ | 899 |
| \$ | 205,855 | \$ | 185,201 | \$ | 20,654 |
| \$ | - | \$ | - | \$ | - |
| \$ | 61,851 | \$ | 59,083 | \$ | 2,768 |
| \$ | 720,024 | \$ | 695,703 | \$ | 24,321 |
| \$ | 255,647 | \$ | 264,644 | \$ | $(8,997)$ |

## FEDERAL AND STATE INCOME TAXES

409.1 Federal Income Taxes

State Income Taxes
409.08 \& 409.09

Deferred Federal Income Taxes - Net
Deferred State Income Taxes - Net
410.1 Provision for Deferred Income Taxes
411.1 Provision for Deferred Income Taxes -Cr.
411.4 Investment Tax Credit Adjustment

Total Federal \& State Income Taxes

Operating Income After Federal \& State Income Taxes

## OTHER INCOME AND DEDUCTIONS

Other Income
417 Revenues from Non-Utility Operations
418.1 Equity in Earnings of Subsidiary Companies

419 Interest \& Dividend Income
419.1 Allowance for Other Funds Used During Construction
421.1 Gain on Disposition of Property

421 Other Misc. Non-Operating Income
Total Other Income
Other Income Deductions
421.2 Loss on Disposition of Property

426 Miscellaneous
Total Other Income Deductions

Taxes Applicable to Other Income Deductions
409.2 Federal Income Tax
409.2 State Income Tax
410.2 Provision for Deferred Income Taxes
411.2 Provision for Deferred Income Taxes-Cr.

Total Taxes Applicable to Other Income Deduction

Income Before Interest Charges

| 2021 |  | 2020 |  | Difference |  |
| :--- | ---: | :---: | ---: | :---: | :---: |
| $\$$ | 34,523 | $\$$ | 28,064 | $\$$ | 6,459 |
|  | 12,537 |  | 10,197 |  | 2,340 |
|  |  |  |  |  |  |
|  | - | - | - |  |  |
|  | - | - | - |  |  |
|  | 108,324 | 88,057 | 20,267 |  |  |
|  | $(110,696)$ | $(89,986)$ | $(20,710)$ |  |  |
|  | - | - | - |  |  |
|  |  |  | 36,332 | $\$$ | 8,356 |
| $\$$ | 44,688 | $\$$ |  |  |  |
| $\$$ |  |  |  |  | $(17,353)$ |


| $\$$ | - | $\$$ | 415 | $\$$ |
| :--- | :---: | :---: | :---: | :---: |
|  | - | - | $(415)$ |  |
|  | - | 138 | - |  |
|  | 5,624 | 5,793 | $(138)$ |  |
|  | - | 58 | $(169)$ |  |
|  | - |  | $(250)$ | $(58)$ |
| $\$$ | 5,624 | $\$$ | 6,154 | 250 |
|  |  |  | $(630)$ |  |
| $\$$ | $(3,832)$ | $\$$ | $(5,639)$ |  |
|  | $(3,832)$ | $\$$ | $(5,700)$ | $\$$ |
| $\$$ |  |  | 1,807 |  |


| $\$$ | $(101)$ | $\$$ | $(71)$ | $\$$ |
| :---: | :---: | :---: | :---: | :---: |
|  | $(40)$ | $(28)$ | $(30)$ |  |
|  | 1,129 | 788 | $(12)$ |  |
|  | $(470)$ | $(328)$ | 341 |  |
| $\$$ | 518 | $\$$ | 361 | $\$$ |
|  |  |  |  |  |
| $\$$ | 212,233 | $\$$ | 228,405 | $\$$ |


| INTEREST CHARGES |  | 2021 |  |  | 2020 | Difference |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 427 | Interest on Long-term Debt |  | 57,987 |  | 55,795 |  | 2,192 |
| 428 | Amortization of Debt Discount and Expense |  | - |  | 446 |  | (446) |
| 428.1 | Amortization of Loss on Reacquired Debt |  | 2,399 |  | 2,034 |  | 365 |
| 430 | Interest on Debt to Associated Companies |  | 423 |  | 1,379 |  | (956) |
| 431 | Other Interest Expense |  | 893 |  | 2,380 |  | $(1,487)$ |
| 432 | Allowance for Borrowed Funds Used During Construction |  | $(1,689)$ |  | $(3,964)$ |  | 2,275 |
|  | Net Interest Charges |  | 60,012 |  | 58,070 |  | 1,942 |
|  | Net Income | \$ | 152,222 | \$ | 170,335 | \$ | $(18,113)$ |

# Duquesne Light Company <br> Operating Statements <br> For the 12 months ended Dec 31 

Attachment II - D-1a
Page 4 of 10
(Thousands of Dollars)

## For the 12 Months Ended December 31, 2020 and December 31, 2021

## Account 400

Residential Sales - $(\$ 12,101)$ - The overall decrease is primarily driven by lower throughput as residential customers begin working in the commercial office environment as social distancing guidelines begin to ease and the economy reopens post the COVID-19 pandemic. These decreases are being partially offset by increased DSIC revenues.

Commercial Sales - $\$ 18,101$ - The overall increase is primarily driven by increased throughput as social distancing guidelines begin to ease and the economy reopens post the COVID-19 pandemic and increased DSIC revenues.

Industrial Sales - $(\$ 2,993)$ - The overall decrease is primarily driven by forecasted demand reductions with the Company's larger industrial customers. These decreases are being partially offset by increased DSIC revenues.

Other Electric Revenue - $\$ 12,380$ - The overall increase is primarily driven by increased forfeited discounts associated with the Company's ability to collect late payment fees from our customers post COVID-19 pandemic as well as increased transmission revenues associated with the Company's FERC formula.

## Accounts 401-402

Power Production Expense - $\$ 1,671$ - The overall increase in the power production expense is primarily driven by higher projected capacity prices.

Customer Accounts Expense - $(\$ 4,018)$ - The overall decrease is driven by an assumed decrease in bad debt as social distancing guidelines begin to ease and the economy reopens post the COVID-19 pandemic allowing customers to pay down delinquent balances.

Customer Service \& Informational Expenses - $(\$ 7,408)$ - The overall decrease is driven by normalization of electrical model costs which were deferred through Customer Service \& Informational Expenses in the historic test year.

Administrative and General Expenses - $\$ 9,738$ - The overall increase is primarily driven by headcount additions, annual wage increases and an increase in training costs as social distancing guidelines begin to ease and the economy reopens post the COVID-19 pandemic.

# Duquesne Light Company <br> Operating Statements <br> For the 12 months ended Dec 31 <br> (Thousands of Dollars) 

## For the 12 Month Periods Ended December 31, 2020 and December 31, 2021

## Account 403-405

Depreciation Expense and Amortization of Electric Plant - \$20,654 - The overall increase is primarily driven by capital additions in the twelve months ended December 31, 2021 and a full year of depreciation for capital additions placed in service in the twelve months ended December 31, 2020.

Account 408
Taxes Other Than Income Taxes - $\$ 2,768$ - The overall increase is primarily attributable to increases in sales revenue discussed above.

Account 409-411
Total Federal \& State Income Taxes - \$8,356 - Income tax expense higher due to several factors including lower net state property deductions and cost of removal, net of the excess deferred income tax (EDIT) flow back partially offset by lower operating income.

## Account 426

Miscellaneous - \$1,807 - The overall decrease is primarily driven by increased donations in support of the community in the COVID-19 pandemic and increased costs associated with the Company's POLR program.

## Account 427-432

Interest on Long-term Debt - \$1,942 - The overall increase in interest on long term debt is primarily driven by a long-term debt issuance in the twelve months ended December 31, 2022 for which the proceeds are forecasted to be utilized for general corporate purposes.

## OPERATING EXPENSE

401-402

403-405
Depreciation Expense and Amortization of Electric Plant

407 Regulatory Debits (Credits), net
408 Taxes Other Than Income Taxes

Total Operating Expenses prior to Federal and State Income Taxes

Operating Income Prior to Fed \& State Income Taxes
Operation and Maintenance Expense
Power Production Expenses
Transmission Expenses
Regional Market Expenses
Distribution Expenses
Customer Accounts Expense
Customer Service \& Informational Expenses
Administrative and General Expenses

Total Operation \& Maint. Expense
orfeited
Miscellaneous Service Revenue
Rent from Electric Property
Other Electric Revenue
Total Other Electric Revenue

Total Operating Revenue

| 2022 |  | 2021 |  | Difference |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| \$ | 581,661 | \$ | 579,916 | \$ | 1,745 |
|  | 269,889 |  | 256,580 |  | 13,310 |
|  | 44,291 |  | 44,467 |  | (176) |
|  | 11,810 |  | 11,671 |  | 139 |
|  | 1,560 |  | 1,560 |  | - |
| \$ | 909,210 | \$ | 894,193 | \$ | 15,017 |
|  | 23,240 |  | 22,784 |  | 456 |
| \$ | 885,971 | \$ | 871,409 | \$ | 14,562 |
| \$ | 3,916 | \$ | 3,750 | \$ | 166 |
|  | 2,168 |  | 1,816 |  | 352 |
|  | 12,106 |  | 11,968 |  | 138 |
|  | 95,077 |  | 86,727 |  | 8,350 |
| \$ | 113,268 | \$ | 104,262 | \$ | 9,006 |
| \$ | 999,239 | \$ | 975,671 | \$ | 23,568 |


| \$ | 215,490 | \$ | 206,041 | \$ | 9,449 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 12,439 |  | 12,546 |  | (107) |
|  | - |  | - |  | - |
|  | 55,023 |  | 56,294 |  | $(1,270)$ |
|  | 21,277 |  | 20,976 |  | 301 |
|  | 30,509 |  | 22,202 |  | 8,307 |
|  | 138,639 |  | 134,259 |  | 4,380 |
| \$ | 473,378 | \$ | 452,318 | \$ | 21,060 |
| \$ | 215,394 | \$ | 205,855 | \$ | 9,539 |
| \$ | - | \$ | - | \$ | - |
| \$ | 64,589 | \$ | 61,851 | \$ | 2,738 |
| \$ | 753,361 | \$ | 720,024 | \$ | 33,337 |
| \$ | 245,878 | \$ | 255,647 | \$ | $(9,769)$ |

## FEDERAL AND STATE INCOME TAXES <br> 409.1 Federal Income Taxes <br> State Income Taxes <br> 409.08 \& 409.09 <br> Deferred Federal Income Taxes - Net <br> Deferred State Income Taxes - Net <br> 410.1 Provision for Deferred Income Taxes <br> 411.1 Provision for Deferred Income Taxes -Cr. <br> 411.4 Investment Tax Credit Adjustment <br> Total Federal \& State Income Taxes <br> Operating Income After Federal \& State Income Taxes

## OTHER INCOME AND DEDUCTIONS

Other Income
417 Revenues from Non-Utility Operations
418.1 Equity in Earnings of Subsidiary Companies

419 Interest \& Dividend Income
419.1 Allowance for Other Funds Used During Construction
421.1 Gain on Disposition of Property

421 Other Misc. Non-Operating Income
Total Other Income
Other Income Deductions
421.2 Loss on Disposition of Property

426 Miscellaneous
Total Other Income Deductions
Taxes Applicable to Other Income Deductions
409.2 Federal Income Tax
409.2 State Income Tax
410.2 Provision for Deferred Income Taxes
411.2 Provision for Deferred Income Taxes-Cr. Total Taxes Applicable to Other Income Deduction Income Before Interest Charges

| 2022 |  | 2021 |  | Difference |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| \$ | 34,417 | , | 34,523 | \$ | (106) |
|  | 12,498 |  | 12,537 |  | (39) |
|  | - |  | - |  | - |
|  | - |  | - |  | - |
|  | 107,991 |  | 108,324 |  | (333) |
|  | $(110,356)$ |  | $(110,696)$ |  | 340 |
|  | - |  | - |  | - |
| \$ | 44,550 | \$ | 44,688 | \$ | (137) |
| \$ | 201,327 | \$ | 210,959 | \$ | $(9,632)$ |


| $\$$ | - | $\$$ | - | $\$$ |
| :--- | :---: | :---: | :---: | :---: |
|  | - | - | - |  |
|  | - | - | - |  |
|  | 6,904 | - | - | - |
|  | - | - | 1,280 |  |
|  | 6,904 | $\$$ | 5,624 | - |
| $\$$ | - | $\$$ | - | $\$$ |
| $\$$ | $(3,919)$ |  | $(3,832)$ |  |
|  | $(3,919)$ | $\$$ | $(3,832)$ | $\$$ |
|  |  |  | $(86)$ |  |


| $\$$ | $(169)$ | $\$$ | $(101)$ | $\$$ |
| :---: | :---: | :---: | :---: | :---: |
|  | $(67)$ | $(40)$ | $(67)$ |  |
|  | 1,881 | 1,129 | $(27)$ |  |
|  | $(783)$ | $(470)$ | 752 |  |
|  | 862 | $\$$ | 518 | $\$$ |
| $\$$ |  |  | $313)$ |  |
|  | 203,450 | $\$$ | 212,233 | $\$$ |


| INTEREST CHARGES |  |  | 2022 |  | 2021 | Difference |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 427 | Interest on Long-term Debt |  | 61,790 |  | 57,987 |  | 3,803 |
| 428 | Amortization of Debt Discount and Expense |  | - |  | - |  | - |
| 429 | Amortization of Premium on Debt-Credit |  | 2,439 |  | 2,399 |  | 40 |
| 430 | Interest on Debt to Associated Companies |  | 1,128 |  | 423 |  | 705 |
| 431 | Other Interest Expense |  | 904 |  | 893 |  | 11 |
| 432 | Allowance for Borrowed Funds Used During Construction |  | $(1,689)$ |  | $(1,689)$ |  | - |
|  | Net Interest Charges |  | 64,571 |  | 60,012 |  | 4,559 |
|  | Net Income |  | 138,879 | \$ | 152,222 | \$ | $(13,342)$ |

# Duquesne Light Company <br> Operating Statements 

## For the 12 Month Periods Ended December 31, 2021 and December 31, 2022

## Account 400

Residential Sales - \$1,745 - The overall increase is primarily driven by higher generation revenues as a result of higher capacity prices and increased DSIC revenues partially offset by lower throughput.

Commercial Sales - $\$ 13,310$ - The overall increase is primarily driven by higher generation revenues as a result of higher capacity prices, increased DSIC revenues and slight throughput increases as the economy rebounds from COVID-19.

Other Electric Revenue - \$8,350 - The overall increase is primarily driven by increases associated with the Company's FERC formula.

Accounts 401-402

Power Production Expense - $\$ 9,449$ - The overall increase in the power production expense is primarily driven by higher projected capacity prices.

Distribution Expenses $(\$ 1,270)$ - The overall decrease is primarily driven a reduction in the Company's electrical model costs which have been primarily recorded in the HTY and FTY and normalized through Customer Service \& Informational Expenses. Annual wage increases are partially offsetting this

Customer Service \& Informational Expenses \$8,307- The overall increase is driven by normalization of electrical model costs which were deferred through Customer Service \& Informational Expenses in the historic test year.

Administrative and General Expenses - $\$ 4,380$ - The overall increase is primarily driven by annual wage increases, benefit cost inflation, incremental headcount to enhance the Company's cyber security program and additional costs in support of the Company's Electric Vehicle initiatives.

# Duquesne Light Company <br> Operating Statements <br> For the 12 months ended Dec 31 <br> (Thousands of Dollars) 

Attachment II - D-1a
Page 10 of 10

## For the 12 Months Ended December 31, 2021 and December 31, 2022

## Account 403-405

Depreciation Expense and Amortization of Electric Plant - \$9,539 - The overall increase is primarily due to capital additions in the twelve months ended December 31, 2022 and a full year of depreciation for capital additions placed in service in the twelve months ended December 31, 2021.

## Account 408

Taxes Other Than Income Taxes - $\$ 2,738$ - The overall increase is primarily attributable to increases in sales revenue discussed above.

## Account 418-421

Other Income - \$1,280 - The overall increase in Allowance for Other Funds Used During Construction is primarily due to increased CWIP balances.

## Account 427-432

Interest on Long-Term Debt - \$4,559 - The overall increase in interest on long term debt is primarily driven by a long-term debt issuance in the twelve months ended December 31, 2022 for which the proceeds are forecasted to be utilized for general corporate purposes.
Q. 2 Provide a summary of test year adjustments which sets forth the effect of the adjustment upon the following: operating revenues, operating expenses, taxes other than income taxes, operating income before income taxes, State income tax, Federal income tax and income available for return. In addition, test year adjustments shall be presented on the basis of the major account categories set out at II-D-1.
A.2. Schedule D-3 of DLC Exhibit 2 (Fully Projected Future Test Year) provides a summary of test year adjustments claimed by Duquesne by major account categories.
Q.3. List and explain all nonrecurring or extraordinary expenses incurred in the test year and all expenses included in the test year which do not occur yearly but are of a nature that they do occur over an extended period of years, for example, nonyearly maintenance programs, and the like.
A.3. Test year expenses that are non-recurring, extraordinary or do not occur yearly, but over an extended period of years, are explained and adjusted in Section D of DLC Exhibit 2 (Fully Projected Future Test Year).
Q.4. As a separate item, list extraordinary property losses related to property previously included in cost of service when the gain or loss on this property has occurred or is likely to occur in the future test year. The proposed ratemaking treatment of extraordinary gains and losses must also be disclosed. Sufficient supporting data must be provided.
A.4. In the fully projected future test year and the future test year, Duquesne Light Company does not anticipate incurring any extraordinary gains or losses related to property previously included in cost of service.
Q.5. Provide the amount of accumulated reserve for uncollectible accounts, method and rate of accrual, amounts accrued and amounts written off in each of the last 3 calendar years.
A.5. The provision for uncollectible accounts for any year is determined by reviewing the current reserve balance, the current receivable status, the projected annual revenue, the trends of receivables and write-offs, and the projected impact of collection initiatives on the quality of receivables.

Delinquent accounts receivable balances are separated into different categories. Each category of delinquent receivables is assigned a low and high reserve percentage. Considering the historical trends and future expectations, the accumulated reserve for uncollectible accounts is adjusted monthly to a balance that falls within the low and high reserve range.

Beginning with new distribution rates in April 2011, Duquesne Light Company began to recover customer assistance program expenses through a separate surcharge (Universal Service Surcharge). As such, the Company has bifurcated the reserve into customer and customer assistance program allowances within Attachment II-D-5 as amounts associated with these programs are not recovered through base distribution rates.

Attachment II-D-5 presents the accumulated provision for uncollectible amounts and the amounts written off for the years ended December 31, 2018, December 31, 2019 and December 31, 2020.

\begin{tabular}{|c|c|c|c|c|}
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\hline $97^{\prime} 769^{\text {c }} 6$ Z \& I0． $0^{6}$ Z \& ¢で $66 \varepsilon^{\prime} 6 Z$ \&  \& ¢ ¢ ${ }^{\prime}$＇69＇0¢ <br>
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\end{tabular}

[^0]Q.6. Supply detailed calculations to support the total claim for rate case expense, including supporting data for outside service rendered. Provide the items comprising the estimated rate case expense claim for the current rate case.
A.6. The requested information is set forth in Schedule D-8 of DLC Exhibit 2 (Fully Projected Future Test Year).
Q.7. Submit schedules for the test year and for the 12 -month period immediately prior to the test year showing by major components, if included in claimed test year expenses, the expenses incurred in each of the following expense categories.
a. Miscellaneous general expenses, including account 930
b. Outside service expenses.
c. Regulatory commission expenses.
d. Advertising expenses, including advertising engaged in by trade associations whenever the utility has claimed a contribution to the trade association as a ratemaking claim - provide explanation of types and purposes of such advertising.
e. Research and development expenses - provide a listing of major projects.
f. Charitable and civic contributions, by recipient and amount.

Explain major variances between the test year expenses and those expenses for the prior 12-month period.
A.7. See the following attachments for the requested data and an explanation of the major variances:
a. Attachment II-D-7a - Miscellaneous general expenses including account 930
b. Attachment II-D-7b Outside service expenses
c. Attachment II-D-7c Regulatory commission expenses
d. Attachment II-D-7d Advertising expenses
e. Attachment II-D-7e Research and development expenses
f. Attachment II-D-7f Charitable and civic contributions

## Miscellaneous General Expenses - Account 930.2 <br> For the Period <br> (Thousands of Dollars)

| Line No. | Expense | $\begin{array}{r} \text { 1/1/2021 - } \\ \text { 12/31/2021 } \\ \hline \end{array}$ |  | 1/1/2020-12/31/2020 Increase (Decrease) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Utilities (electricity, gas, water, etc) |  | 996 |  | 1,532 |  | (536) |
| 2 | Membership Dues |  | 805 |  | 1,239 |  | (434) |
| 3 | Other miscellaneous |  | 5,415 |  | 8,329 |  | $(2,914)$ |
| 4 | Total | \$ | 7,216 | \$ | 11,100 | \$ | $(3,884)$ |

## Note:

As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

Other Miscellaneous - Decreased costs are attributable to allocation of outside services between FERC account 930.2 and 923. See Attachment II-D7b for further discussion.

| Line No. | Expense | 1/1/2022-12/31/2022 |  | $\begin{aligned} & \text { 1/1/2021 - } \\ & \text { 12/31/2021 } \end{aligned}$ |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Utilities (electricity, gas, water, etc) |  | 1,082 |  | 996 |  | 86 |
| 2 | Membership Dues |  | 875 |  | 805 |  | 69 |
| 3 | Other miscellaneous |  | 5,881 |  | 5,415 |  | 466 |
| 4 | Total | \$ | 7,837 | \$ | 7,216 | \$ | 621 |

## Note:

As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

Other Miscellaneous - Increased costs relate to the functional and technical upgrade associated with the Company's customer care and billing system.

## Duquesne Light Company <br> Outside Service Expenses For the Period <br> (Thousands of Dollars)

| Line No. | Description/Purpose | $\begin{array}{r} 1 / 1 / 2021- \\ 12 / 31 / 2021 \\ \hline \end{array}$ |  | 1/1/2020-12/31/2020 |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Office of the CEO | \$ | 108 | \$ | 101 | \$ | 7 |
| 2 | General Counsel, Rates and Regulatory Affairs |  | 2,140 |  | 2,007 |  | 132 |
| 3 | Office of the CFO |  | 3,529 |  | 3,311 |  | 218 |
| 4 | Information Technology |  | 6,019 |  | 5,647 |  | 372 |
| 5 | Customer Service |  | 4,120 |  | 3,866 |  | 255 |
| 6 | Human Resources |  | 755 |  | 708 |  | 47 |
| 7 | Operations |  | 15,548 |  | 14,586 |  | 962 |
| 8 | Total | \$ | 32,219 | \$ | 30,226 | \$ | 1,993 |

Note:
As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

| Line No. | Description/Purpose | 1/1/2022-12/31/2022 |  | $\begin{array}{r} \text { 1/1/2021 - } \\ \text { 12/31/2021 } \\ \hline \end{array}$ |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Office of the CEO | \$ | 102 | \$ | 108 | \$ | (6) |
| 2 | General Counsel, Rates and Regulatory Affairs |  | 2,017 |  | 2,140 |  | (123) |
| 3 | Office of the CFO |  | 3,326 |  | 3,529 |  | (203) |
| 4 | Information Technology |  | 5,673 |  | 6,019 |  | (346) |
| 5 | Customer Service |  | 3,884 |  | 4,120 |  | (237) |
| 6 | Human Resources |  | 712 |  | 755 |  | (43) |
| 7 | Operations |  | 14,655 |  | 15,548 |  | (893) |
| 8 | Total | \$ | 30,369 | \$ | 32,219 | \$ | $(1,850)$ |

Note:
As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

## Duquesne Light Company

## Regulatory Commission Expenses

For the Period
(Thousands of Dollars)


|  |  | Duquesne Light Company <br> Advertising Expenses <br> For the Period <br> (Thousands of Dollars) |  |  | 1/1/2020-12/31/2020 |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line No. | Description/Purpose |  | $\begin{gathered} 1 / 1 / 2021- \\ 12 / 31 / 2021 \end{gathered}$ |  |  |  |  |  |
| 1 | Community Information advertising |  |  |  | \$ | 1,538 | \$ | $(1,538)$ |
| 2 | Total | \$ |  | - | \$ | 1,538 | \$ | $(1,538)$ |

Note:
As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

This schedule reflects only the costs of outside advertising expenses.

| Line No. | Description/Purpose | 1/1/2022-12/31/2022 |  | $\begin{array}{r} \text { 1/1/2021 - } \\ \text { 12/31/2021 } \\ \hline \end{array}$ |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Community Information advertising | \$ | - | \$ | - | \$ | - |
|  | Total | \$ | - | \$ | - | \$ | - |

## Note:

As the budget is not prepared by FERC account, the above information was determined based on an allocation to FERC account which was based on the same relationship to the total as the actual costs shown for the Historic Test Year.

This schedule reflects only the costs of outside advertising expenses.

## Duquesne Light Company <br> Research and Development Expenses <br> Years Ended December 31, 2020, 2021 and 2022

Duquesne Light Company does not include research and development in the future test year, fully projected future test year or for the 12 month period immediately prior to the test year.

Duquesne Light Company
Charitable and Civic Contributions - Account 426
For the Period
(Thousands of Dollars)

| Line No. | Description/Purpose |  | $\begin{array}{r} \text { 1/1/2021 - } \\ \text { 12/31/2021 } \end{array}$ |  | 1/2020 | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Donations |  | 1,609 |  | 2,069 |  | (460) |
| 2 | Miscellaneous |  | 287 |  | 369 |  | (81) |
| 3 | Total | \$ | 1,896 |  | 2,438 | \$ | (542) |

## Note:

Charitable and civic contributions are charged to "Other income and deductions", account 426 and not to operating expense

| Line No. | Description/Purpose | 1/1/2022-12/31/2022 |  | $\begin{array}{r} \text { 1/1/2021 - } \\ \text { 12/31/2021 } \\ \hline \end{array}$ |  | Increase (Decrease) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Donations |  | 1,645 |  | 1,609 |  | 37 |
| 2 | Miscellaneous |  | 294 |  | 287 |  | 7 |
| 3 | Total | \$ | 1,939 | \$ | 1,896 | \$ | 43 |

## Note:

Charitable and civic contributions are charged to "Other income and deductions", account 426 and not to operating expense
Q.8. Provide an analysis by function of charges by affiliates, for the test year and the 12-month period immediately prior to the test year, for services rendered included in the operating expenses of the filing company. Explain the nature of the service and the basis on which charges or allocations are made, including a copy of applicable contract. Also, explain major variances between the charges for the test year and the corresponding charges for the prior 12-month period.
A.8. Please see Attachment DFR II-D-8.

## Duquesne Light Company

## Administrative Services Charged to Affiliates <br> Operating Expense (Thousands of Dollars)

Duquesne Light Company ("DLC") provides various administrative and general services for its subsidiaries and affiliated companies. Attachment II-D-8a is a copy of this agreement.

| Function | 1/1/2020-12/31/2020 |  | 1/1/2021-12/31/2021 |  | Variance |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Accounting \& Treasury | \$ | 1,374.4 | \$ | 1,457.8 | \$ | 83.4 |
| Sr Management |  | 914.2 |  | 969.6 |  | 55.5 |
| Office of General Counsel |  | 476.5 |  | 505.4 |  | 28.9 |
| Technology |  | 125.7 |  | 133.3 |  | 7.6 |
| Human Resources |  | 91.3 |  | 96.8 |  | 5.5 |
| Operations |  | 55.0 |  | 58.4 |  | 3.3 |
| Customer Care |  | 12.7 |  | 13.5 |  | 0.8 |
|  | \$ | 3,049.8 | \$ | 3,234.8 | \$ | 185.0 |
| Allocations to DLC from parent |  | - |  | - |  | - |
| Allocations to DLC from affiliate |  | - |  | - |  | - |
| Net | \$ | 3,049.8 | \$ | 3,234.8 | \$ | 185.0 |

[1] The Office of General Counsel allocation is budgeted to decrease due to additional costs incurred in 2017 associated with affiliated Company legal proceedings.

| Function | 1/1/2021-12/31/2021 |  | 1/1/2022-12/31/2022 |  | Variance |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Accounting \& Treasury | \$ | 1,457.8 | \$ | 1,486.8 | \$ | 29.0 |
| Senior Management |  | 969.6 |  | 988.9 |  | 19.3 |
| Office of General Counsel |  | 505.4 |  | 515.5 |  | 10.1 |
| Technology |  | 133.3 |  | 136.0 |  | 2.7 |
| Human Resources |  | 96.8 |  | 98.7 |  | 1.9 |
| Operations |  | 58.4 |  | 59.5 |  | 1.2 |
| Customer Service |  | 13.5 |  | 13.7 |  | 0.3 |
|  | \$ | 3,234.8 | \$ | 3,299.2 | \$ | 64.4 |
| Allocations to DLC from parent |  | - |  | - |  | - |
| Allocations to DLC from affiliate |  | - |  | - |  | - |
| Net | \$ | 3,234.8 | \$ | 3,299.2 | \$ | 64.4 |

## Duquesne Light Company Purchased Power <br> Purchased Power Expense <br> (Thousands of Dollars)

Duquesne Light Company (DLC) no longer purchases a portion its electricity supply needs from Duquesne Power, LLC as Duquesne Power, LLC does not participate in POLR auction under its POLR VIII agreement.

## Duquesne Light Company Fiber Lease and Lit Services <br> Operating Expenses <br> (Thousands of Dollars)

The fiber optic network lease is an approved arrangement entered into between DLC and its DQE Communications affiliate. The network is used for voice and data communications between Company facilities, including supervision, protection and control of the distribution and substation systems. Attachment II-D-8b is a copy of this agreement. The fiber may be located on or within DLC poles, conduits, ducts and related property. In addition, pursuant to the terms of the Sonet Fiber Use Agreement entered into in 2006 between Duquesne Light and its DQE Communications affiliate, Duquesne Light replaced its outdated microwave network with access to a fiber optic ring that connects the operations control center with equipment at various locations throughout the service territory. Attachment II-D-8c is a copy of that agreement.

In addition, Duquesne Light maintains a Master Service Agreement with DQE Communications which provides the general terms and conditions and a framework within which Duquesne Light may from time to time purchase certain telecommunications and related infrastructure services from DQE Communications. Specifically the agreement relates to (i) Metro Ethernet \& Internet Services; (ii) Colocation Services and (iii) Managed Services. See agreement maintained at Attachment II-D-8f.


## Duquesne Light Company <br> Electronic Meter Reading <br> Operations Expense <br> (Thousands of Dollars)

Electronic meter reading services are no longer provided from Datacom Information Systems, LLC (an affiliate).
Historically, Datacom provided services related to electronic meter reading services and related services for all DLC's customers who currently, or in the future utilize electronic metering devices with Encoder Receiver Transmitters (ERT). The ERT meters number approximately 570,000 . They are principally utilized by DLC's residential and small commercial customers. The services provided include (1) the use of network facilities, including Cell Control Units and Network Control Nodes, over which the meter reading data is transmitted and obtained; (2) maintenance, replacement, construction, and alteration of the network system as needed to provide and operate said meter reading services; (3) leases and licenses required in order to physically locate and operate the network devices throughout DLC's service territory; (4) such other services that are needed or beneficial and agreed to by the parties and the Commission.

| Function | $1 / 1 / 2020-12 / 31 / 2020$ | $1 / 1 / 2021-12 / 31 / 2021$ |  | Variance |  |
| ---: | :--- | :--- | :--- | :--- | :--- |
| Metering Reading / AMR | $\$$ | - | $\$$ | - | $\$$ |
| Function | $1 / 1 / 2021-12 / 31 / 2021$ | $1 / 1 / 2022-12 / 31 / 2022$ |  | Variance |  |
| Metering Reading / AMR | $\$$ | - | $\$$ | - | $\$$ |

## Duquesne Light Company Intercorporate Tax Payment Agreement

Duquesne Light Holdings, Inc. (DLH), the parent of DLC entered into an Intercorporate Tax Payment Agreement with its affiliated companies, effective January 1, 1992. The purpose of the Agreement was to provide for payments between the parent company and its affiliated companies with respect to each company's share of the consolidated income tax liability of the entire affiliated group. See DLC Exhibit 4, and Testimony of Matthew Simpson - Statement No. 7. Refer to attachment II-D-8d for a copy of this agreement.

## Duquesne Light Company <br> Affiliated Interest Agreement (Thousands of Dollars)

On January 17, 2010, DLC entered into a short-term affiliated interest agreement with its parent, Duquesne Light Holdings, Inc (DLH). This agreement provided DLC with the ability to borrow from DLH in the form of short-term intercompany loans in an amount not to exceed $\$ 200$ million at any given point in time. In February 2021, the Pennsylvania Public Utility Commission approved DLC's application to amend the affiliated interest agreement requesting an increase of the maximum borrowing capacity of this short term intercompany borrowing facility from $\$ 200.0$ million to $\$ 300.0$ million. As of December 31, 2020, DLC had $\$ 10.0$ million of intercompany loans outstanding. The specific terms of the affiliated interest agreement are included as Attachment II-D-8e.

| Function | 1/1/2020-12/31/2020 |  | 1/1/2021-12/31/2021 |  | Variance |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Intercompany Interest | \$ | 1,379 | \$ | 1,128 | \$ | (251.1) |
| Function | 1/1/2021-12/31/2021 |  | 1/1/2022-12/31/2022 |  | Variance |  |
| Intercompany Interest | \$ | 1,128 | \$ | 423 | \$ | (705.0) |

## Duquesne Light Company Cash Pool Arrangement

Duquesne Light Holdings, Inc. (DLH), the parent company of DLC, established a Cash Pool in November 1997. The Cash Pool was established as a mechanism to concentrate excess funds and combine the cash of DLH and its subsidiaries to invest in short term investments. DLC does not participate within the Cash Pool Arrangement.

## Emily M. Farah

Counsel, Regulatory

## 411 Seventh Avenue

Mail drop 15-7
Pittsburgh, PA 15219


Tel: 412-393-6431
efarah@duqlight.com

February 21, 2020

## Via Electronic Filing

Rosemary Chiavetta, Secretary
Pennsylvania Public Utility Commission
400 North Street
Harrisburg, PA 17120

## Re: Affiliated Interest Agreement between Duquesne Light Company and Its Affiliates Docket No. G-2018-3002809

Dear Secretary Chiavetta,
Pursuant to the Secretarial Letter in the above-captioned matter dated January 22, 2020, enclosed please find the executed copy of Duquesne Light Company's Administrative Services Agreement ("ASA"). Signatures were obtained for all entities except DH Energy LP, which was dissolved on January 13, 2020. BrightR, Inc. was also dissolved in January 2020. Included with the executed ASA and labeled as "Updated Appendix B" is the most recent organizational chart, which removes DH Energy LP and BrightR, Inc. from the corporate organizational structure.

Please feel free to contact me with any questions, comments, or concerns.


Enclosures
cc: Jeff McCracken (with enclosures, via email - jmccracken@pa.gov)

## ADMINISTRATIVE SERVICES AGREEMENT

## THIS ADMINISTRATIVE SERVICES AGREEMENT (this "Agreement")

 is made as of June 18,2018 by and among DUQUESNE LIGHT HOLDINGS, INC., a Pennsylvania corporation ("Parent"), DUQUESNE LIGHT COMPANY, a Pennsylvania limited liability corporation ("Duquesne"), and the affiliates of Parent and Duquesne named on the signatures pages hereto (each, an "Affiliate" and collectively, the "Affiliates").
## WITNESSETH:

WHEREAS, Duquesne is a public utility providing electric service subject to regulation by the Pennsylvania Public Utility Commission (the "Commission" or "PUC");

WHEREAS, Parent, $\mathrm{f} / \mathrm{k} / \mathrm{a}$ DQE, Inc., pursuant to its articles of incorporation, has unlimited power to engage in any lawful act concerning any lawful business for which corporations may be incorporated under the Pennsylvania Business Corporation Law and was formed for the purpose of engaging in energy-related diversification opportunities which could arise from time to time in the marketplace;

WHEREAS, Duquesne companies desire, need and require from time to time the administrative, management and other services as described in Appendix $\mathbf{A}$.

NOW, THEREFORE, in consideration of the mutual covenants and undertakings herein contained, the parties hereto agree as follows:

## 1. DESCRIPTION OF SERVICES

Any affiliated members of the Parent may from time to time perform, on a regular or temporary basis administrative, management, and other services for one or more of the other companies. An exclusive list of services that may be provided is included within Appendix A to this Agreement. Those affiliates that receive services from, or provide services to, the Parent are listed within Appendix B to this Agreement. No service shall be performed in contravention of any applicable law, regulation, rule, order, judgment, or decision of
any governmental entity.

## 2. PERSONNEL

In order to provide the services, the Parties will employ executive officers, accountants, financial advisors, technical advisers, attorneys, and other persons with the necessary qualifications. If necessary, the Parties may also arrange for the services of nonaffiliated experts, consultants and attorneys in connection with the performance of any of the services provided under this agreement.

## 3. ALLOCATION

In consideration of services rendered, the party receiving administrative services ("Receiving Party") under this Agreement agrees to reimburse the party providing such services ("Providing Party") the fully-loaded cost of such service, including charges for interest where appropriate. The allocation methodologies for directly charging and allocating costs between affiliates are detailed in Appendix C. Generally, the following allocation methods shall be used:
a) The Providing Party will allocate to any administrative services provided the direct costs associated with performing such services.
b) Direct labor costs of any employee of the Providing Party who provides identifiable services to the Receiving Party will be charged to the Receiving Party's operation based on such employee's total compensation, including salary and fringe benefits.
c) Other identifiable direct costs, including third party service fees and supplies, will be charged to the Receiving Party's operations at the actual cost incurred by the Providing Party.
d) All costs charged are subject to periodic review and adjustment, as appropriate.

The Providing Party shall directly assign costs when practicable. National Association of Regulatory Utility Commissioners (NARUC) Guidelines for Cost Allocation and Affiliate Transactions are followed to assign costs to the Receiving Party. If it is not practicable to directly assign costs for completed services, such costs shall be allocated based on such NARUC guidelines.

## 4. PAYMENT FOR SERVICES

A Receiving Party agrees to pay the Providing Party the actual cost of providing the services. In
this regard, the Providing Party shall deliver monthly to the Receiving Party written documentation of the cost of providing services under this Agreement, which invoice shall be due and payable within 30 days after its receipt. When it is not reasonably possible or practical to determine actual costs, the Providing Party may substitute allocation factors for actual costs as set forth within Section 3 of this Agreement.

All such costs incurred by the Providing Party on behalf of the Receiving Party shall become the liability of the Receiving Party when incurred by the Providing Party, shall be determined in accordance with generally accepted accounting principles and shall be determined in accordance with the cost allocation procedures set forth within Section 3 of this Agreement; provided however that if a particular transaction is subject to regulation by the FERC or another federal regulatory agency, and the rules of these agencies require a pricing mechanism that is different than provided herein, the Parties will follow the rules required by the federal agency, as applicable.

## 5. INTEREST ON PAST DUE AMOUNTS

From and after the Effective Date (as hereinafter defined), in the event any amount payable under Section 4 of this Agreement is not paid by a Receiving Party when due, such unpaid amount shall bear interest, from the due date shown in the invoice therefor (or, if no such due date is shown, from the date that is 30 days after the Receiving Party receives such invoice), at a rate equal to the thencurrent average monthly rate of interest applicable to DQE Capital Corporation's cash pool arrangement.

## 6. AGENT STATUS OF PROVIDING PARTY

All services, materials, equipment, and supplies purchased by a Providing Party at the request of a Receiving Party shall be purchased by the Providing Party on behalf of and as agent for the Receiving Party. In that regard, the Receiving Party hereby appoints the Providing Party as its agent, and the Providing Party hereby agrees as such agent to negotiate, execute and enforce contracts (including purchase order contracts) providing for the purchase of services, materials, equipment and supplies.

Each such contract shall be made in the name of the Receiving Party and shall provide, among other things, that the Providing Party shall be the agent for the Receiving Party concerning the administration of the contract and that performance of the contract shall be for the account of, title to all property acquired thereunder shall vest in, and charges therefore shall be paid by, the Receiving Party.

## 7. JOINDER TO AGREEMENT

Any future subsidiary or other affiliate of Parent or Duquesne may elect to participate in this Agreement by executing a joinder or similar agreement indicating such entity's willingness to be bound by the terms of this Agreement. Duquesne Light Holdings will file an updated listing of subsidiaries with the PUC, as necessary and appropriate. Subject to PUC approval, new Duquesne Light subsidiaries that are added prior to the annual update will be subject to this Agreement.

## 8. SEVERAL OBLIGATIONS; NO RIGHTS TO BIND

The duties, obligations and liabilities of the parties under this Agreement are intended to be several and not joint or collective, and nothing in this Agreement shall ever be construed to create an association, joint venture, trust or partnership between the parties or to impose a trust or partnership duty, obligation or liability on or with regard to any of the parties. Each party shall be individually responsible for its own obligations as herein provided. No party shall be under the control of or shall be deemed to control the other party solely by virtue of this Agreement. No party shall have a right or power to bind another party without its express written consent, except as expressly provided in this Agreement.

## 9. WITHDRAWAL FROM AGREEMENT

Any party shall have the right at any time to withdraw from this Agreement by giving 90 days' prior written notice of withdrawal. In the event any Affiliate desires to withdraw from this Agreement, it shall send written notice of withdrawal to Parent and Duquesne. In the event Parent desires to withdraw from this Agreement, it shall send written notice of withdrawal to Duquesne. In the event Duquesne desires to withdraw from this Agreement, it shall send written notice of withdrawal. This Agreement automatically shall terminate upon the effective date of Duquesne's withdrawal from this Agreement.

## 10. NOTICES

Any notice required or permitted to be given to a party hereunder shall be in writing and shall be sent to such party at its address set forth below (or to such other address as such party may notify the other parties by notice given in accordance with the requirements of this Section 10):

## If to Parent:

Duquesne Light Holdings, Inc.
411 Seventh Avenue
Pittsburgh, PA 15219
Attn: Chief Legal Officer

## If to Duquesne:

Duquesne Light Company
411 Seventh Avenue
Pittsburgh, PA 15219
Attn: Chief Legal Officer
Ifto any Affiliate:
c/o Duquesne Light Holdings, Inc.
411 Seventh Avenue
Pittsburgh, PA 15219
Attn: Chief Legal Officer

## 11. APPROVAL BY COMMISSION

This Agreement is subject to the approval of the Commission and shall be effective on the entry date of the Commission's order approving this Agreement or on such other date that this Agreement is deemed approved by the Commission (such date, the "Effective Date').

## 12. GOVERNING LAW

This Agreement shall be governed by, and construed in accordance with, the laws of the
Commonwealth of Pennsylvania, without regard to its conflict of laws principles.

## 13. COUNTERPARTS

This Agreement may be executed in two or more counterparts, and by the different parties hereto on separate counterparts, each of which shall be deemed an original, but all of which together shall constitute one and the same document.

IN WITNESS WHEREOF, the parties hereto have caused this Administrative Services Agreement to be duly executed by their duly authorized representatives of the date first written above.

DQE HOLDINGS, LLC


DUQUESNE LIGHT HOLDINGS, INC.


DUQUESNE ENERGY SOLUTIONS, LLC


DES CORPORATE SERVICES, INC.


DQE SYNFUELS, LLC


DQE SYNFUELS, LP
By: MWaw, Gu/hor
Its: $\frac{\text { Marli E-KaplaN }}{\text { Aa ofricers }}-T r \varepsilon a s u r e r$

DH CANADA HOLDINGS, LLC


DH CANADA CORPORATION


DQE ENTERPRISES, INC.

| By: $\frac{\text { Malc C, Kyplew }}{\text { Its: }}$ Mark E. Kaplan-Presdent |
| :--- |

DQE CAPITAL CORPORATION


DQE FINANCIAL LLC


MARINER INVESTMENT STRATEGIES, LLC


DUQUESNE FIBER COMPANY


DQE SYSTEMS, LLC

By:


DUQUESNE BROADBAND, LLC

By:


DQE COMMUNICATIONS, LLC


NORTH SHORE AFFORDABLE HOUSING, LLC


MONTAUK SYNFUELS, LLC
By: Mav4. hywern
Its: Mark E. Kaplan, Manager

DUQUESNE POWER, LLC


DUQUESNE LIGHT COMPANY


MONOGAHELA LIGHT \& POWER COMPANY

By:


Its: Mark E. Kaplan - President

DATACOM INFORMATION SYSTEMS, LLC


AQUASOURCE, LLC


DUQUESNE LIGHT ENERGY, LLC


DUQUESNE GENERATION, LLC
By: $\frac{\text { Myuth. halelen }}{\text { Its: } \text { Mark E. Kaplan-President }}$

DUQUESNE CONEMAUGH, LLC


DUQUESNE KEYSTONE, LLC
By: $\frac{\text { Mark E. Kaplan President }}{\text { Its }}$

DH Energy, LP


The Efficiency Network, Inc.

## By: MMM

Its: TroyGeanonulgs - CEOTEN

TEN Connected Solutions, Inc.
By: Presidens $\frac{\text { Rownt }}{\text { Rob lampball }}$

BrightR, Inc.

By: $\frac{\text { Frestent Rob Cumphe II }}{\text { Rob Curiden }}$

## Appendix A

## Description of Services

This Appendix provides a description of services provided under the Administrative Service Agreement dated June 18, 2018. Listed below are services provided. All services listed are allocated directly when possible. If direct allocation is not possible, the indirect allocation method that is used is listed.

| Service | Description | Basis of Allocation |
| :---: | :---: | :---: |
| Alarm Monitoring Services | Provides alarm monitoring services for the Company. | The allocation for these services is based on the Average Asset allocation method. |
| Audit Services | Provide services including coordinating the examination of accounting records with the external auditors. | The allocation for these services is based on the Average Asset allocation method. |
| Compliance Services | Provide enterprise-wide compliance and consultation to the Company as well as to specific corporate projects on compliance matters. | The allocation for these services is based on the EBITDA allocation method. |
| Disbursement Services | Provides Company-wide disbursement processing functions. | The allocations for these services are allocated based on the Direct method. |
| Executive Services | Provide leadership and strategic services for the Company. | The allocation for these services is based on the EBITDA allocation method. |
| Finance / Accounting Services | Provide services including the setting accounting policies and practices, preparation and dissemination of consolidated financial results, research of new financial reporting requirements, maintenance of the general ledger system, management of the budget and forecasting process and preparation and review all external financial reporting. | The allocation for these services is based on the EBITDA allocation method. |
| Financial Planning \& Analysis Services | Provide services related to the preparation and development of budgets and budgetary controls. | The allocation for these services is based on the EBITDA allocation method. |
| Human Resources | Provide services to manage and maintain employee policy and program development and oversight of all human resource initiatives. | The allocation for these services is based the Headcount allocation method. |
| Information Services | Provide services including, but not limited to, service and IT support, maintenance and support of existing corporate business applications, system implementation costs, report coordination, consultative support, and mail and printer/copier services. | The allocation for these services is based on the Average Asset allocation method. |
| Internal Audit Services | Provide audit plans and strategies for the Company for financial, compliance, information technology and operational audits. Additionally provide services related to control risk assessments and special investigations. | The allocation for these services is based on the EBITDA allocation method. |


| Legal Services | Provide the Company with legal services, including, but not limited to, general corporate matters and internal corporate maintenance, contract drafting and negotiation, litigation, liability and risk assessment, financing, state and federal regulatory compliance, state and federal regulatory support and rule interpretation and advice, bankruptcy and collection matters, union contracting and all other matters requiring legal services. | The allocation for these services is based on the EBITDA allocation method. |
| :---: | :---: | :---: |
| Materials | Provides the Company with non-inventory related materials, which are materials relating to the Company's office supplies that do not flow through inventory accounts. | The allocation for these materials is based on total materials per employee. The listing of materials is updated annually. |
| New Hire Background Services | Provide new hire background check processes. | The allocation for these charges are based on Headcount allocation. |
| Payroll Services | Provides Company-wide payroll processing functions. | The allocation for these charges are based on Headcount allocation. |
| Pension Administration Services | Provide services for the management and administration of all pension and savings plan assets for the Company. Services provided include, but are not limited to, the implementation of investment policies, monitoring of investment performance, and coordination of actuarial valuation reviews. | The allocation for these charges are based on Headcount allocation. |
| Rent Services | Provides office space at the headquarters building. For all employee time that is charged directly to a subsidiary, the Company allocates a portion of DLC rent expense to the associated subsidiary in connection with the direct charge. The annual rent expense is updated in accordance with changes in lease terms. Additionally, the number of employees per floor is updated annually with an employee by location listing. | The allocation for these services is based on total cost per employee per floor. |
| Safety \& Workforce Development | Provides Company-wide safety and workforce development reporting and initiatives. | The allocation for these services is based on the EBITDA allocation method. |
| Tax Services | Provide services related to preparation of tax returns and other filings, consultation services, research of tax planning initiatives, coordination of audits, and various other tax related accounting functions. | The allocation for these services is based on the EBITDA allocation method. |
| Treasury Services | Provide services including, but not limited to, daily banking transactions, monitoring of cash holdings, monitoring of credit facilities, forecasting cash requirements, various reporting requirements, management of bank, investor and agency relationships, and management of insurance policies. | The allocation for these services is based on the Average Asset allocation method. |



## Appendix C

The allocation factors described below will be used by the Accounting and Reporting department for apportioning project charges to DQE Holdings LLC and subsidiaries (the Company).

Allocation 1-DIRECT COSTS

Project charges will be allocated to each benefited affiliate on the basis of the relation of its direct costs billed by the shared service to the total of all direct costs billed by the shared service. All affiliates may be included in this allocation.

## Allocation 2 - NUMBER OF REGULAR EMPLOYEES

Project charges will be allocated to each benefited affiliate on the basis of the relation of its number of regular employees to the total number of all regular employees of the benefited affiliates. All affiliates may be included in this allocation. Part time, temporary and full time employees will record their time into the timekeeping system and their time will be allocated based on the employee's charge code that is selected. All contractor and subcontractors will be billed through invoices received and would be excluded from this calculation. Contractor and subcontractor time will be billed directly to the subsidiary. In the event that the contractor's time cannot be directly charged, the charges will be manually recorded through a monthly journal entry.

## Allocation 3 - FIXED ALLOCATION

Project charges will be allocated to each benefited affiliate on the basis of fixed percentages on an individual project basis. All affiliates may be included in this allocation.

## Allocation 4 - EARNINGS BEFORE INTEREST, TAXES, DEPRECIATION AND AMORTIZATION (EBITDA)

Project charges will be allocated to each benefited affiliate on the basis of the relation of its total EBITDA to the sum of the total EBITDA of all benefited affiliates. All affiliates may be included in this allocation. On an annual basis, EBITDA balances of each company will be updated using $12 / 31$ balances. This will be updated subsequent to the finalization of year-end financial statements. The total EBITDA will be reduced by the previous year's administration fee allocation per company and then the balance will be translated to the absolute value. Then, utilizing the absolute value, a percent of total EBITDA per company will be calculated. All discontinued operations will be removed from the overall calculation. Note: The 'administration fee allocation' refers to the entry made to reallocate costs to the relevant affiliate. It is the summary of all of the outlined allocation methods. Each month, the Company calculates all costs to be reallocated and records a manual journal entry (i.e. the administration fee allocation). This ensures all appropriate costs are recorded and invoiced at the subsidiary. When determining the EBITDA percentages, the impact of the previous year allocation from EBITDA is removed in order to neutralize the calculation.

## Allocation 5 - AVERAGE ASSETS

Project charges will be allocated to each benefited affiliate on the basis of the relationship of its total average assets to the sum of the total average assets of all benefited affiliates. All affiliates may be included in this allocation. On an annual basis, the average asset calculation will be updated utilizing November balances. The current asset balances will be adjusted by removing cash, intercompany, goodwill, and investment in subsidiaries in order to calculate an adjusted asset balance per company. The previous 12 months (including November) will be used to determine an average asset balance per company. Then, utilizing the 12 month average asset balances, a percent of total average assets will be calculated per company. All discontinued operations will be removed from the overall calculation.

Project charges will be allocated to each benefited affiliate on the basis of the relationship of its total revenue to the sum of the total revenue of all benefited affiliates. All affiliates may be included in this allocation. On an annual basis, revenue balances per company will be updated utilizing November balances. A percent of total revenue per company will be calculated to determine to the percentage of allocation.

## Allocation 7 - CAPITALIZATION

Project charges will be allocated to each benefited affiliate on the basis of the relationship of its capitalization (debt and equity) to the sum of the total capitalization of all benefited affiliates. All affiliates may be included in this allocation.

## Allocation 8 - NUMBER OF TRANSACTIONS

Project charges will be allocated to each benefited affiliate on the basis of the relationship of the number of transactions to the affiliate to the sum of the total transactions of all benefited affiliates. All affiliates may be included in this allocation.

## Allocation 9 - MASSACHUSETTS METHOD

The Massachusetts Method allocates costs based on the benefiting company's revenue, total assets, and payroll or labor relative to the totals for all companies benefiting from a service. All affiliates may be included in this allocation.

## Allocation 10 - PENNSYLVANIA METHOD

The Pennsylvania Method allocates the costs of a service based on the relevant company's invested capital, operation and maintenance expenses, and number of employees relative to all other affiliates receiving the service at issue. All affiliates may be included in this allocation.

## Direct Time Allocations - e-Time Procedures

The Company has identified certain shared service employees which are employees of DLC. These employees utilize the eTime process described below in order to directly allocate time to affiliates or charge projects requiring additional allocation. A listing of shared service cost centers is maintained by the accounting department and reviewed on a quarterly basis to ensure the proper allocation of time to affiliates.
eTime - eTime is an internet scheduling tool used by employees of the Company. eTime was established in order for employees to track and assign time based on the actual hours spent performing tasks for a particular project or affiliate.

As described above, all shared service employees of the Company are considered DLC employees and are required to complete a timesheet or submit their time via eTime for each period whether they are paid hourly or receive a salary. Employees who utilize eTime must enter their time based on the activities that were performed during the pay period. A screen within eTime allows the employee to select certain projects and/or affiliates. Employees are required to select the entity or project to which their time should be charged. If an employee does not select an entity or project, eTime will not be submitted. An eTime file is then generated monthly with all allocations and a manual entry is recorded within the accounting department to transfer the labor charges to the appropriate affiliate.

Employees are encouraged to enter their time in one quarter hour increments. Employees are also encouraged to keep their timesheets updated on a regular basis, so that they do not have to enter an entire pay period of time on the last day of the pay period. It is best if they enter their time on a daily basis, when feasible, so that it is as accurate as possible. Employees may face disciplinary action for not adhering to the Company's policies regarding eTime.

Employees who fail to submit their eTime at the end of a pay-period receive an initial automated email reminding them to submit their time via eTime. If the employee does not submit their time after receiving the initial reminder, the employee is sent a second automated email communicating that they have committed a compliance violation for eTime non-submittal. This second email prompts the employee to immediately report their time. If the employee continues to delay, a notice is sent to the employees direct Supervisor for follow-up and possible disciplinary action. Multiple delays in eTime submissions are considered a performance issue and may warrant disciplinary action.
eTime allocations will be reviewed on an annual basis to ensure that shared service employees are properly allocating time to benefiting affiliates.


# PENNSYLVANIA <br> PUBLIC UTILITY COMMIBEION Harrisburg, PA. 17105-3265 

Public Meeting held February 26, 1998
Commissioners Present:
John M. Quain, Chairman
Robert K. Bloom, Vice Chairman
John Hanger
David W. Rolka
Nora Mead Brownell
$\begin{array}{ll}\text { Affiliated Interest Agreement Between } & \text { Docket No. } \\ \text { Duruesne I ight Company and DoF }\end{array}$
Duruesne I.ight Company and DQE G-00970585
Communications, Inc.

## OPINION AND ORDER

## BY THE COMMISSION:

On October 14, 1997, an Affiliated Interest Agreement ("Agreement") between Duquesne Light Company ("Duquesne") and DQE Communications, Inc. ("DQE Communications") was filed to become effective on November 13, 1997. The period for consideration of this Agreement was extended by the Commission to January 16, 1998. On January 14, 1998, the period for consideration of this Agreement was extended until further order of the commission.

This is a Master Fiber Services Agreement which provides for the lease back by Duquesne from DQE of portions of the Fiber optic Network and other fiber services for use in Duquesne's utility business.

Duquesne is a public utility subject to the Commission's jurisdiction and is a wholly-owned subsidiary of DQE, Inc. a Pennsylvania corporation. DQE Communications is a wholly-owned subsidiary of Duquesne Enterprises, a Pennsylvania corporation, which is also a wholly-owned subsidiary of DQE, Inc.

Duquesne currently owns, operates and maintains a fiber optic telecommunications network ("Fiber optic Network") used in Duquesne's utility business to carry voice and data i.aformation and to supervise, protect and control Duquesne's distribution and substation system.

Two other affiliated interest agreements have been submitted by Duquesne and are interrelated and pertain to Duquesne's proposed sale of its Fiber Optic Network to $D Q E$ Communications and the lease by Duquesne of certain fiber
services from DQE Communications for operation of its telecommunications network. These related agreements have been filed at Docket Nos. G-00970584 and G-00970586. Also related to this Agreement is an Application of Duquesne Light Company and DQE Communications, Inc. (Docket No. A-110150 F0016), for approval of the transfer by sale of a fiber optic network from Duquesne Light Company to DQE'Communications, Inc., and for the lease of fiber services by Duquesne Light Company from DQE Communications, Inc.

The subject Agreement is filed in accordance with the requirements of, Section 2102 (b) of the Public utility code, 66 Pa. C.S. 2102 (b).

We have examined the Agreement and have determined that it appears to be reasonable and consistent with the public interest; however, approval of the Agreement does not preclude us from investigating, during any formal proceeding, the reasonableness of charges incurred under the Agreement; THEREFORE,

IT IS ORDERED:

1. That the Affiliated Interest Agreement between Duquesne Light Company and DQE Communications, Inc. filed on october 14, 1997, be and hereby is, approved.
2. That acceptance does not preclude the Commission from investigating during any formal proceeding the reasonableness of charges incurred under the Agreement.
3. That a copy of this order be served on the office of Consumer Advocate, the Office of Small Business Advocate, the Office of Trial Staff and parties to the Duquesne Restructuring
*Proceeding at Docket No. R-00974104, and made available to other. interested parties.
4. That this Docket No. G-00970585 be marked ciosed.

BY THE COMMIGGION

(SEAL)
ORDER ADOPTED: February 26, 1998
ORDER ENTERED: FEB 261998

## Master Fiber Services Agreement

THIS AGREEMENT (the "Agreement") made this 26 th day of September 1997 (the "Effective Date"), by and between DUQUESNE LIGHT COMPANY, a Pennsylvania corporation ("Duquesne") and DQE COMMUNICATIONS, INC., a Pennsylvania corporation ("Company").<br>WHEREAS, Duquesne requires the use of a fiber optic telecommunications network (such network being hereinafter referred to as the "Telecommunications Network") and for this purpose desires that Company provide to Duquesne Fiber Services (as defined below); and

WHEREAS, Company currently owns and may acquire additional fiber optic cables ("Fiber") which comprise a portion of the Telecommunications Network, which Fiber may be located on or within Duquesne's poles, conduits, ducts and related property (hereinafter referred to collectively as "Facilities"); and

WHEREAS, Company is willing, to the extent it may lawfully do so and subject to the terms and conditions set forth, to provide to Duquesne Fiber Services; and

NOW, THEREFORE, in consideration of the mutual covenants, terms, conditions and obligations contained herein, and intending to be legally bound hereby, the parties agree as follows:

## Àrticle 1 <br> FIBER SERVICES; RIGHTS OF WAY

## a. Fiber Services

As used herein, the term "Fiber Services" shall mean the provision of such capacity on Fiber (whether now owned by Company or to be acquired in the future) as Duquesne shall from time to time require, and shall include, without limitation: (i) specific strands of Fiber as set forth on Exhibit C and as requested by Duquesne, (ii) maintenance, replacement and repair of all Fiber used to provide Fiber Services and (iii) the construction and/or acquisition of additional Fiber and related facilities as and when meeded to meet Duquesne's Fiber requirements.

Duquesne shall request from time to time the Fiber Services required; Company shall provide to Duquesne all the Fiber Services requested by Duquesne. Company covenants to use its best efforts to provide all Fiber Services required by Duquesne for the fulfillment of its electric service requirements. This Agreement contains the basic terms and conditions upon which Fiber Services shall be provided by Company to

Duquesne. Subject to such terms and conditions, when the parties agree on the location of additional Fiber to be used in the provision of Fiber Services, they will execute a completed Fiber Services Acknowledgment (substantially in the form of Exhibit A hereto):

## b. Periodic Plan Reports

Within 90 days of the end of its fiscal year, Duquesne shall provide Company with an annual plan setting forth in writing Duquesne's projected needs for additional Fiber Services in such year. Within 45 days of the end of the second fiscal quarter in each year, Duquesne shall provide Company with a written update of such annual plan, setting forth any changes therein and any new projected needs for additional Fiber Services. Duquesne shall also keep Company informed of any known Fiber Services needs which will arise beyond the then current fiscal year.

## c. Franchise and Other Requirements

Company covenants to Duquesne that it will obtain and maintain all of the necessary approvals, authorities, franchises, permits, consents and easements from federal, state and local authorities including, but not limited to, the Pennsylvania Public Utility Commission, relating to the construction and operation of the Telecommunications Network. Compliance with this Article shall not relieve Company of the obligation to obtain any necessary or additional rights-of-way from private property owners.

Article 2
INSTALLATION, OWNERSHIP, SERVICES AND MAINTENANCE

## a. Installation, Ownership and Maintenance of Fiber

Company shall be responsible for ensuring the proper maintenance and repair of all Fiber used in the provision of Fiber Services on a 24 hours a day, seven days a week basis (including good faith efforts to dispatch a repair crew within two hours of notice of a problem). Duquesne shall have the right to perform, or cause the performance of, the maintenance and repair of the Fiber (whether or not used in the provision of Fiber Services) and the provision of such other services, as set forth on Exhibit D-1, including all engineering, splicing, termination, patching and testing of Fiber at Company's expense. Company shall pay Duquesne a fee for such services in accordance with the terms set forth on Exhibit D-2.

Duquesne reserves to itself, its successors and assigns the exclusive right to maimain the Fiber used in the provision of Fiber Services and to operate its equipment in a manner to enable it to fulfill its electric service requirements. Company acknowledges that Duquesne's Fiber Services needs in connection with fulfilling its electric service requirements will always receive priority over the needs of Company.

The relevant strands of Fiber used in the provision of Fiber Services shall be tested by Duquesne in the manner specified in the attached Exhibit $B$ to determine compliance with the specifications set forth in the attached Exhibit $B$. Company may
have representatives present during such testing. Duquesne shall promptly deliver to Company a copy of the test results within two weeks after receipt of such test results. If the Fiber meets the specifications, it shall be deemed to be in service as of the date of the test and such in service date shall be the rent commencement date for the Fee for those strands. If the Fiber does not meet the specifications, Duquesne shall attempt to repair, or at its option replace, and retest the subject Fibers.

## b. Change in Location of Fiber

In the event that Company shall at any time be required by any entity having the legal authorization to compel such action, to transfer, rearrange or relocate any portion of the Fiber used in the provision of Fiber Services, Company may require such transfer, rearrangement or relocation at its own expense. Company shall use commercially reasonable efforts to transfer, rearrange or relocate such Fiber in such a manner as to avoid interruption in service to Duquesne or its customers. Company shall provide Duquesne with not less than one huindred eighty (180) days written notice prior to commencing any transfer, rearrangement or relocation of any portion of such Fiber, except in the event that earlier action is required by any entity having the legal authorization to compel such earlier action, in which event Company shall notify Duquesne promptly upon learning of the proposed action of such entity. Company shall advise Duquesne of the location of the relocated Fiber. Duquesne shall have the right to approve or disapprove any such new location for the relocated Fiber to the extent necessary to ensure its continued ability to fulfill its electric service requirements.

## c. Use of Fiber

Company acknowledges that Duquesne shall have unrestricted and exclusive use of all Fiber used in the provision of Fiber Services.

## Article 3

DAMAGE; COSTS
Each party shall promptly and in writing inform the other party of any damage to Fiber used in the provision of Fiber Services of which such party is aware. If any such damage is the result of negligent or intentional acts of Duquesne or its agents or contractors Duquesne shall be responsible for the cost of repairing such damage; otherwise, Company shall be responsible for the cost of repairing such damage.

As used in this Agreement, the term "costs" shall include, without limitation, all labor costs, fringe benefits, pensions, taxes, supervision, transportation, clearing costs, equipment costs, costs associated with materials and supplies, and purchasing and warehousing costs, all as described in more detail on Exhibit D-2, all of which shall be billed on a time and materials basis.

## Article 4 INTERRUPTIONS

Company shall not be liable to Duquesne or any third party for any interruption of Duquesne's service or for any interference with the operations of Duquesne arising out of any act or omission by Company or any person acting on behalf of Company (except for negligent or willful acts). Company shall use its commercially reasonable efforts to avoid any interference with Duquesne's Telecommunications Network or its operations. Company shall not be responsible for any incidental or consequential damages.

## Article 5 <br> FEES

Duquesne shall pay Company an annual fee for Fiber Services as follows:
Fees are due and payable quarterly in advance on the first day of each calendar quarter. Fees for Fiber Services for which utilization began during a quarter will be calculated on a pro-rated basis in accordance with the number of days of use and reflected in the next quarterly bill.

With respect to Fiber which exists at the date of this Agreement, the annual fee charged for strands of Fiber providing service to Duquesne (and the maintenance thereof) shall be $\$ 111$ for each mile of each fiber strand used in each cable. This fee has been negotiated on an individual basis specifically with, and shall apply specifically to, Duquesne.

With respect to Fiber which is acquired or constructed at the request of Duquesne, the annual fee charged for strands of such Fiber providing service to Duquesne (and the maintenance thereof) shall be an amount no more than the annualized cost of construction and maintenance which Duquesne would have incurred had Duquesne carried out such construction and maintenance for its own account, prorated for each strand of Fiber providing service to Duquesne. The calculation of this fee shall be based on, but not limited to, such factors as construction costs, maintenance costs and depreciation. Company shall have the right to review, but not participate in, Duquesne's calculation. If there is a dispute regarding the accuracy of such calculation which cannot be resolved by good faith negotiations between Duquesne and Company within 30 days, such dispute shall be submitted to a mutually agreeable, nationally recognized, independent accounting firm with offices in Pittsburgh, who shall be instructed to make a final determination within 30 days of being appointed. Such determination shall be binding on Duquesne and Company. Notwithstanding the foregoing, if Company has no Fiber available to provide services to Duquesne due to such Fiber's being committed to third parties and Company must therefore acquire or construct additional Fiber to meet Duquesne's electric service requirements, the annual fee charged for such strands of Fiber providing service to Duquesne (and the maintenance thereof) shall be the lesser of (i) the amount set forth in the immediately preceding paragraph and (ii) the amount calculated pursuant to the first sentence of this paragraph.

## Article 6 TERM

This Agreement shall become effective upon the later to occur of (i) approval by the Pennsylvania Public Utility Commission of this Agreement and the transactions contemplated herein and (ii) approval by the Pennsylvania Public Utility Commission of the Asset Purchase Agreement between Duquesne and Company of even date herewith and the transactions contemplated therein, and, if not earlier terminated in accordance with the provisions hereof, shall continue in effect until December 31, 2017. Notwithstanding the foregoing, this Agreement shall not be effective until approved by Duquesne's Board of Directors. In consideration for the mutual promises contained herein, this Agreement shall automatically be extended for additional ten (10) year terms unless either party has delivered written notice no later than five (5) years prior to the date of termination of the initial term or any additional term.

Notwithstanding the foregoing paragraph, Duquesne shall at all times have the right, upon 12 months' written notice, to terminate this Agreement (and/or any related Fiber Services Acknowledgment) with respect to some or all of the Fiber Services if such Fiber Services are no longer necessary for Duquesne to fulfill its electric service requirements.

## Article 7 BILLING

All amounts due Company under this Agreement shall be paid by Duquesne within 45 days of the date set forth on the invoice ("Payment Date") from Company along with a detailed accounting of such amounts.

## Article 8

 EVENTS OF DEFAULTThe following shall constitute an event of default under this Agreement:

1. The failure of a party to pay a sum of money owed to the other party on or before the date on which such payment is due, and the continuance of such failure for ten (10) days after written notice.
2. Any material breach of any term of this Agreement, other than the payment of money, and the failure of the breaching party to cure such breach within thity (30) days after written notice, provided that if the breach by its nature is not capable of being cured within thirty (30) days, then an event of default shall not occur if within such thirty (30) days the party commences curing the breach and thereafter diligently and continuously pursuès such cure to completion. Failure to pay monies owed shall never be deemed a breach not capable of being cured within thirty (30) days.
3. Any change in control of Company. A "change in control" shall be deemed to have occurred if (i) at any time Company is no longer a DQE Affiliate (defined below), (ii) Company enters into an agreement providing for the merger or consolidation of Company with or into another person other than a DQE Affiliate, (iii) Company enters into an agreement providing for the sale of all or substantially all of Company's assets to any person or entity other than a DQE Affiliate, (iv) Company enters into an agreement providing for the transfer of title in the Fiber to any person or entity other than a DQE Affiliate or (v) Company assigns its rights, duties or obligations under this Agreement to any person or entity other than a DQE Affiliate.

As used herein, the term "DQE Affiliate" shall mean any person or entity, the majority of the voting securities of which are owned by DQE, Inc. or any of its whollyowned direct or indirect subsidiaries.

Upon the occurrence of a change in control, Duquesne shall have the right, in its sole discretion, to acquire all right, title and interest in some or all of the Fiber for an amount equal to the depreciated book value of such Fiber, pursuant to documentation reasonably acceptable to Duquesne.

Upon the occurrence of any event of default (including without limitation a change in control), the non-breaching party may exercise any and all remedies available at law or equity, including but not limited to termination of the Agreement. Such remedies are not intended to be exclusive and a party may pursue multiple remedies.

## Article 9 TERMINATION

a. In the event that (i) any federal, state or local authority takes any action that preempts or otherwise invalidates any material provision of this Agreement or revokes the approvals, authorities, franchises, consents or easements necessary for Duquesne to operate the Telecommunications Network or (ii) a court of competent jurisdiction issues an order preventing Duquesne from operating the Telecommunications Network, either party shall have the option, to terminate this Agreement, provided that if the action or order affects less than all of the Fiber used in the provision of Fiber Services the Agreement shall only be terminated with respect to the affected Fiber, unless Duquesne determines in its sole discretion that the remaining Fibers could not be utilized economically in its business, in which event Duquesne may elect to terminate the entire Agreement.
b. In the event that this Agreement is terminated, (i) Duquesne shall pay to Company any and all sums then due and owing within 30 days thereof, and (ii) each party shall return all documents, work papers and other materials of the other party relating to the transactions contemplated hereby (or copies thereof), whether obtained before or after the execution hereof, to the party furnishing the same or each party shall destroy such material at the request of the furnishing party, except that each party may keep one copy of such items for its records.
c. Upon termination of this Agreement for any reason (including without limitation pursuant to Article 6), Duquesne shall have the right to purchase some or all of the Fiber (whether or not used in the provision of Fiber Services) for an amount equal to the depreciated book value thereof.

## Article 10 WAIVER OF COMPLIANCE

Any failure to exercise or delay in exercising any right, power, privilege or remedy herein contained, or any failure or delay at any time to require the other party's performance of any obligation under this Agreement, shall not affect the right to subsequently exercise that right, power, privilege or remedy or to require performance of that obligation. A waiver of any of the provisions of this Agreement shall not be deemed, nor shall constitute, a waiver of any other provision, nor shall any waiver constitute a continuing waiver. A waiver shall not be binding unless executed in writing and delivered to the other party.

## Article 11 <br> ASSIGNMENT

This Agreement shall not be sublet, assigned, transferred, pledged or otherwise encumbered by either party without the prior written consent of the other.
Notwithstanding the foregoing, Company agrees that Duquesne may sublet Fiber used in the provision of Fiber Services in accordance with the agreements listed on Schedule 11 hereto.

## Article 12 <br> QUIET ENJOYMENT

Company shall not take any action that would prohibit Duquesne from peaceably and quietly holding and using any and all Fiber used in the provision of Fiber Services for the entire term of the Agreement.

## Article 13

REPRESENTATIONS AND WARRANTIES
a. Duquesne represents and warrants to Company that Duquesne has full power and authority to execute and deliver this Agreement and to consummate the transactions contemplated hereby. This Agreement is a valid and binding agreement of Duquesne enforceable in accordance with its terms.
b. Company represents and warrants to Duquesne that Company has full power and authority to execute and deliver this Agreement and to consummate the transactions contemplated hereby. This Agreement is a valid and binding agreement of Company enforceable in accordance with its terms.

## Article 14 MEMORANDA OF AGREEMENT

If required, Company and Duquesne shall prepare a Memorandum of Agreement outlining the general terms of this Agreement. Subject to the limitations contained in Article 17 contained in this Agreement, the Memorandum shall be suitable for submission to the regulatory agencies with jurisdiction over such agreements and, if Duquesne and Company agree, for other recording purposes. Any and all costs associated with such recording shall be paid by Company.

## Article 15

THIRD-PARTY BENEFICIARIES
This Agreement shall not confer any rights or remedies upon any person other than the parties hereto and their respective successors and permitted assigns provided.

Article 16
NOTICE
Any notice from one party to the other under this Agreement shall be written notice effective upon receipt sent by the United States mail, certified mail, with return receipt requested and postage prepaid, or by facsimile transmission followed by written notice as set forth above.

Notice to Duquesne shall be addressed as follows:
Duquesne Light Company
2101 Beaver Avenue
M-GSU
Pittsburgh, PA 15233
Attn: Richard A. Nickel
Assistant General Manager
Fax: (412) 393-8869
and notice to Company shall be addressed as follows:
DQE Communications, Inc.
One NorthShore Center
12 Federal Street
Pittsburgh, PA 15212
Attn: Anthony J. Villiotti
Treasurer
Fax: (412) 231-2140
Each party may change its address for purposes of notice requirements at any time by written notice to the other party given in accordance with this Article 16.

## Article 17 <br> PAYMENTS

All payments due to Company hereunder shall be paid by check, wire transfer or by such other means and/or to such other accounts as Company may designate from time to time.

## Article 18 <br> CONFIDENTIALITY

Except as may be required by law (as provided for below), both parties agree to hold and maintain any information (in written or any tangible form) each discloses to the other ("Confidential Information") with the same degree of confidentiality with which each party treats its own confidential information and in no case less than a reasonable degree of confidentiality. Information materially relating to or arising under this Agreement, including all terms and exhibits of this Agreement, shall be deemed to be "Confidential Information" for purposes of this Agreement. If a party or any of its representatives becomes legally compelled to disclose any Confidential Information, the receiving party shall provide the disclosing party with prompt notice of such requirement and shall cooperate with the disclosing party in seeking to obtain a protective order or other arrangement pursuant to which the confidentiality of the Confidential Information is preserved. Any legally compelled disclosure shall not change the status of the disclosed information as Confidential Information. The provisions of this Article shall bind the parties throughout the term of this Agreement, including extensions, and shall survive for a period of five (5) years thereafter. The term Confidential Information shall not include information that: (a) was publicly known at the time of disclosure, (b) becomes publicly known through no fault of the recipient, (c) was in recipient's possession free of any obligation of confidence at the time of the owner's disclosure to recipient, (d) is developed by recipient independently of and without reference to any of owner's Confidential Information or other information that owner disclosed in confidence to any third party, (e) is rightfully obtained by recipient from third parties authorized to make such disclosure without restriction, or (f) is identified by owner as no longer confidential or proprietary.

## Article 19 <br> FORCE MAJEURE

Whenever a period of time is provided for in this Agreement for either party to do or perform any act or obligation, neither party shall be liable for any delays or inability to perform due to causes beyond the reasonable control of said party such as but not limited to war, riot, insurrection, rebellion, strike, lockout, unavoidable casualty, or injury or damage to personnel, material or equipment, fire, flood, storm, earthquake, tornado or any act of God provided that said time period shall be extended for only the actual amount of time said party is so delayed. For purposes of this Article, acts or omissions shall not be deemed "beyond the reasonable control of a party" if committed, omitted or caused by a party to this Agreement, or its employees, officers, agents or affiliates, or by any corporation or other business entity that holds a controlling interest in said party, whether held directly or indirectly. In addition, the inability to perform for financial
reasons shall not be deemed an act or omission "beyond the reasonable control of a party" and shall not be deemed force majeure.

## Article 20

DISCLOSURE
Each party will promptly inform the other of any fact or omission that would make any representations, warranty or disclosure made herein materially untrue or misleading or which constitutes a material breach of any covenant contained herein.

## Article 21

SEVERABILITY
In the event that any term or provision of this Agreement is declared to be illegal, invalid or unconstitutional, then that provision shall be deemed to be deleted from this Agreement and have no force or effect and this Agreement shall thereafter continue in full force and effect, as modified.

## Article 22 <br> HEADINGS

The headings contained in this Agreement are included for convenience of reference only and shall in no way affect the construction or interpretation of any of the terms or provisions of this Agreement.

## Article 23

GOVERNING LAW
This Agreement shall be governed by and interpreted in accordance with the substantive laws of the Commonwealth of Pennsylvania, without reference to its conflicts of laws principles. Any litigation shall be filed and pursued in either state or federal court in Pittsburgh, Pennsylvania.

Article 24
ENTIRE AGREEMENT AND AMENDMENT
This Agreement contains the entire agreement between the parties with respect to the subject matter and supersedes any and all prior oral or written agreements. This Agreement may not be modified or amended except in writing and signed by both parties.

## Article 25

EXECUTION IN COUNTERPARTS
This Agreement may be executed in one or more counterparts, each of which shall be deemed an original instrument, and all of which taken together shall constitute one and the same agreement.

IN WITNESS WHEREOF, the parties hereto have executed this Agreement the day and year first above written.

> DUQUESNE LIGHT COMPANY


DQE COMMUNICATIONS, INC.


## Schedule 11

## Permitted Subleases of Fiber

NONE.

## Exhibit A

## FIBER SERVICES ACKNOWLEDGMENT LEASE NUMBER

This Fiber Services Acknowledgment (this "Acknowledgment") is made to the Master Fiber Services Agreement between Duquesne Light Company ("Duquesne") and DQE Communications, Inc., ("Company") dated $\qquad$ 1997. Capitalized terms used in this Acknowledgment have the same meaning as such terms in the Master Fiber Services Agreement unless otherwise indicated.

This Acknowledgment is entered into as of $\qquad$ 1997.

1. Location (demarcation points): The Fiber used in the provision of Fiber Services to Duquesne under this Acknowledgment will be between (pole, manhole, facility), located on (street name), near (street name), in (City. Twp. Borough) and (pole, manhole, facility), located on (street name), near (street name), in (City, Twp. Borough).
2. Length: The cable sheath length distance between the above two demarcation points is: $\qquad$ miles.
3. Number of strands of Fiber: The specific number of strands of Fiber so used will be $\qquad$ (
4. Fiber miles (for billing purposes): $\qquad$ Fiber miles, (item \#2 times item \#3).
5. Work required to provide connection to Duquesne's Telecommunications Network:
$\qquad$
$\qquad$
6. The terms and conditions set forth in the Master Fiber Services Agreement shall govern.
7. Approvals:

DQE Communications, Inc.
Name:
Title: $\qquad$
Date: $\qquad$

Duquesne Light Company
Name: $\qquad$
Title: $\qquad$
Date: $\qquad$

## EXHIBIT B

## ACCEPTANCE TEST PLAN AND SPECIFICATIONS

## FIBER ACCEPTANCE TESTING PROCEDURES

Duquesne will conduct the following tests as part of its Acceptance Testing Plan:

1. Non-destructive Attenuation Tests (End-to-End)
2. Optical Time Domain Reflectometer Tests (OTDR)

Fiber acceptance testing will be performed to ensure that the Telecommunications System will operate within the parameters of the Specifications set forth below.

Nore specifically, fiber acceptance testing will include the following:

1. Continuity/Uniformity Tests:

All fibers shall be tested bi-directionally at 1310 nm or 1550 nm , as applicable, with an OTDR; the subsequent traces shall be inspected for end-to-end continuity and for uniform attenuation. These traces will be stored on diskette and will be compatible with Laser Precision PC-OTDR software.

## 2. Optical Length:

The OTDR will be used to determine the end-to-end optical length of the cable where possible.

## 3. Spice Loss:

Splice loss will be measured bi-directionally with an OTDR using the Splice Loss Average method. The average acceptance splice loss shall be the measurement for splice loss set forth below.

## 4. End-to-End Loss:

Using a light source and a power meter, the bi-directional, connector-to-connector attenuation will be measured for each fiber at 1310 nm and 1550 nm , as applicable. The acceptance average attenuation per kilometer shall be the attenuation set forth below.

## FIBER ACCEPTANCE SPECIFICATIONS

I. Design Criteria

Duquesne will endeavor to keep the number of splices in a span to a minimum.

## II. Optical Fiber Specifications

Company will meet the optical specifications as detailed below for all cable:

## A. Optical Fiber Specifications - Singlemode Fiber (if applicable)

| Parameter | Specification |  | Units |
| :--- | :--- | :--- | :--- |
|  |  |  |  |
| Maximum attenuation, 1310nm (A1) |  | 0.50 | $\mathrm{~dB} / \mathrm{km}$ |
| Maximum attenuation, 1550nm (A2) | 0.40 | $\mathrm{~dB} / \mathrm{km}$ |  |
| Cladding diameter | $125 \pm 3$ |  | um |
| Cutoff Wavelength |  | $1250 \pm 100$ | nm |
| Zero dispersion wavelength |  | 3.5 |  |
| Maximum dispersion (1285-1330nm) |  | nm |  |
|  |  |  | $\mathrm{ps} /(\mathrm{nm} \mathrm{km})$ |

III. Splice Loss

Splice loss on cables will average less than or equal to 0.3 db for all splices made under this Agreement. The 0.3 dB splice average will only apply to splices between cables of identical physical and optical properties (i.e. core and cladding dimensions, refractive index and optical loss characteristics).

## IV. End-To-End Attenuation Acceptance Criteria

The cable system will be tested at both wavelengths specified for each cable type as specified below unless otherwise stated in this Agreement: Singlemode fiber - 1310 nm . and 1550 nm .
The end-to-end attenuation acceptance criteria will be based on the following formula:
Maximum acceptable end-to-end attenuation $=$ $(A \times L)+\left(0.3 \times N_{\text {sp }}\right)+C$
where:
$A=$ Max. attenuation at each wavelength (A1 and A2) as specified in section II above.
$\mathrm{L}=$ Optical length of the cable in kilometers (km).
$N_{s p}=$ Number of fiber splices in the cable system.

C $=$ Connector/pigtail loss. The attenuation contribution of each pigtail with associated connector is considered to be 1.3 dB , comprised of 1.0 db connector loss and 0.3 dB splice loss (pigtail to OSP cable splice).

Therefore, $\mathrm{C}=1.3 \mathrm{~dB}$ if the span is connectorized on one end and 2.6 db if the span is connectorized on both ends.

The parameters above are guaranteed unless otherwise specified.
In the event that the fiber measured attenuation values change after the cable is installed, and is degraded by 2 dB or greater than specified above, Company will ensure corrective maintenance is performed to attempt to restore the fiber to its original specified attenuation values.






| Length |
| :--- |
| (Feet) |


28,416
51,931
73,153



$\stackrel{+}{\substack{~+~}}$
Drawing
Series
3176


## Project Iitle <br> Cable Name

aes-St joes/mm
ARSENAL TO BLANNOX

AESFO1
ARSFO1
ARSFOI
BKVLFOI
BVFOI
 SCC-OXFORD VIA WOODS RUN
SCC-NARROWS RUN
NRWS RN-JPIC
JPIC-TRAV RUN
TRAV RN-BV
SCC-ALLEG CTR
SCC-PREBLE MM
CLINTON FO
COLLIER TO HOOKSTOWN GR
COLLIER TO HOOKSTOWN GR DGE CORAPOLIS BRIDG DRAVOSBURG TO WILSON EDISON TO 411 7TH
 EDISON HAMPTON TWP FINDLAY TO MIDFIELD FINDLAY TO MIDFIELD
 HORN RUN TO NARR RUN
 앙若票 $N$
0
0
0
0
 $m$
0
$\dot{0}$
$N$
$\underset{\sim}{3}$
$i$





| Cable <br> Name | $\begin{aligned} & \text { Project } \\ & \text { Title } \end{aligned}$ |
| :---: | :---: |
| OXFO2 | SMFLD \& CARSON TO LANDMKS |
| OXEO2 | SMFLD \& CARSON TO WARRING |
| OXFO2 | WARRRINGTON TO COLIIER |
| OXEO2 | SMITHFIELD ST. BRIDGE |
| OXFO2 | SMITH, ST, TO OXFORD |
| OXPO3 | OXFORD 4 TO 25 |
|  | FRNDSP AVE TO 4736 PENN |
| OXFOS | OXFORD TO 2ND AVENUE |
| OXFO5 | 2ND AVE TO EE VIA OAKLAND |
| PKWAYFOI | PARKWAY XING-ATEN RD |
| PCFOI | ROUTE 8 TO PINE CREEK |
| PNXFKFOI | W MIF-PFK/MM |
| RACCFOI | RACC-ST JOE MM |
| RANFOL | RANK-DRAV/MM |
| RANFO2 | RANK-DRAV/SM-RANKIN BRID. |
| RANFO2 | RANK-DRAV/SM |
| 7 THAVFOI | 411 7TH TO OXF-SM |
| 7 THAVEO2 | 411 7TH TO OXF-MM |
| 7 THAVFO3 | 4117 TH TO OXF-SM |
| 7 THAVEO4 | 411 7TH TO OXF-MM |
| SPGRNFOI | JPIC TO R'T 51 |
| SPGRNFOI | RT 51 TO STOOPS FERRY |
| SPGRNFO2 | SPRING RUN TO RACCOON |
| SPGRNFO2 | SPRING RUN TO RACCOON |
| SPGRNEO2 | SPRING RUN TO RACCOON |
| SPGRNFO2 | MAIN \& PLEAS TO ST. JOE |
| SPGRNEO2 | ST. JOE TO ERE |
| WILM FOI. | SWISSVALE TO KEY COMM |
| WILM FOI | KEY. COMM-WILM |

## EXHIBIT D-1 SERVICES

One or more of the following services may be provided by Duquesne (or by a third party retained by Duquésne), at Duquesne's sole discretion. All costs shall be billed on a time and material basis as set forth in Exhibit D-2:
I. Outside Plant Engineering Services
A. Route Selection (if requested)
B. Field Surveys
C. Preparation of Permit (if required) and Construction Drawings
D. Preparation of Splice Prints (if required)
E. Preparation of Operating Drawings
F. Material Procurement
G. Field Support (as required)
H. Other Engineering activities as requested by Company
II. Project Management Services
A. Scheduling/Project Status Monitoring
B. Coordination of construction and engineering

C: Monitoring of Charges
D. Charge dispute resolution
E. Miscellaneous Project Management services that may be requested by Company
III. Procurement of Rights of Way
A. Procurement of construction permits required for Duquesne to perform work
B. Investigation and/or Procurement of private right of ways required
C. Procurement of licenses for attachments to non-Duquesne owned poles
D. Procurement of Licenses required to operate the system (if requested)
E. Miscellaneous rights of way activities that may be requested by Company.
IV. Overhead Fiber Installation
A. Installation of attachment hardware, messenger wire and guying as required.
B. Installation of rollers and ropes, pulling of fiber optic cable and lashing of the cable to the messenger in accordahce with construction drawings provided and in accordance with Duquesne standards.
C. Tree trimming required to perform the installation
D. Miscellaneous activities required to perform the installation
E. Installation of attachment hardware to customers building and drilling of building wall (if requested by Company).
V. Underground Fiber Installation
A. Rodding and Roping of ductline
B. Removal of dead Duquesne cable if required to provide ductline capacity for fiber optic cable.
C. Pulling of fiber optic cable in accordance with Duquesne construction drawings and in accordance with Duquesne and industry accepted standards.
D. Racking cable in manholes, installing protective inner duct over cable exposed in manholes and tagging of cable in manholes. Tag to contain label identifying cable owner/designation.
E. Installation of cable in customer owned transformer vaults and drilling of vault walls (if requested by Company).
F. Miscellaneous activities that are associated with underground cable installation or that may be requested by Company.
VI. Pole Make-ready
A. Routine

1. Adjustment of Street Light location/power feed
2. Adjustment or Replacement of Duquesne secondary conductors
3. Adjustment of guying
4. Adjustment of Third Party of BT cables (if requested by owner)
5. Miscellaneous minor make-ready work
B. Major (must be preauthorized by Company)
6. Adjustment of primary (voltage greater than 460 volts) conductors or supports
7. Pole replacement
8. Other make-ready work not stated above
VII. Fiber Splicing (Overhead and Underground)
A. Test Cable upon receipt (unless waived by Company)
B. Install splice cases and splice fibers according to construction drawings and in accordance with Duquesne splicing procedures
C. Upon completion of splicing, perform end to end tests as follows:
9. Provide OTDR traces measured from each end
10. Provide end to end loss measurements (in each direction)
D. Install splice cases and splice fibers (ring cuts) to spur cables as requested
E. Miscellaneous fiber splicing activities as requested by Company
VIII. Maintenance (including Emergency Restoration)
A. Provide emergency restoration services as required
11. Provide test and troubleshooting support (OTDR analysis)

## EXHIBIT D-2 RATES FOR SERVICES

All costs shall be billed on a time and materials basis. For employees of Duquesne, Company will be charged:

1) Company will be charged the actual hours spent performing the service. Included in these hours are time required to travel to and from the location at which the service is performed, if that location is not the location that the employee normally reports to.

In the event of an emergency "callout," Company will be charged a minimum of 4 hours, regardless of the actual number of hours worked.

In the event that an employee, because of the service provided, is entitled to "rest table" under the terms of the Duquesne Bargaining Unit Agreement, Company will be charged the rest table hours as well.
2) A prorated supervision rate based upon the number of employees required to perform the service divided by the number of employees that the supervisor is responsible to supervise.

The actual hours spent will be multiplied by the direct hourly rate which the employee(s) performing the service is(are) paid. To this hourly rate a surcharge in accordance with Duquesne general accounting practices will be added for costs that are directly linked to hourly labor (Duquesne Fringe Benefits).
3) The cost of equipment/transportation required to perform the service. These costs will be the transportation and equipment charges normally incurred by Duquesne in accordance with Duquesne's standard accounting practices.
4) A $45 \%$ surcharge to direct labor, Duquesne Fringe Benefits and transportation charges for such costs as vacation time, holidays, sick time, convenience days, inclement weather time, training time, consumable tools, payroll and administration and union activities.

## For Contractors Engaged by Duquesne, Company will be charged:

1) Company will be charged the actual hourly rate paid by Duquesne to a contractor for the performance of the service, including allocation of sales taxes if applicable. If, in the performance of a service, Duquesne negotiates a contract for a fixed fee for the performance of a portion of the service by a contractor, Duquesne will charge Company the fixed fee.
2) Company will be charged for Duquesne inspectors required to supervise the contractor as well as Duquesne's administrative charges in regards to the contractor in accordance with the actual hours spent by Duquesne employees on the contractor related task. Billing for Duquesne's actual hours will be as specified above.

COMMONWEALTH OF PENNSYLVANIA
PENNSYLVANIA PUBLIC UTILITY COMMISSION P.O. BOX 3265, HARRISBURG, PA 17105-3265

June 2, 2006
G-00061167

GARY A JACK
DUQUESNE LIGHT COMPANY
411 SEVENTH AVE
MAIL DROP 8-2
PITTSBURGH PA 15219
Re: Affiliated Interest Agreement between Duquesne Light Company and DQE Communications LLC
Dear Mr. Jack:

On April 6, 2006, Duquesne Light Company ("Duquesne") and DQE
Communications LLC ("DQEC") filed an Affiliated Interest Agreement. This agreement was filed in accordance with the requirements of Section 2102(b) of the Public Utility Code, 66 Pa. C.S. §2102(b). On April 13, 2006, the Commission extended the period for consideration of this Agreement until further order of the Commission.

The Agreement relates to the lease of a fiber optic communications system (Sonet Fiber Use Agreement) between Duquesne and DQEC.

Upon review of the company's filing, it does not appear that this filing is unreasonable or contrary to the public interest. Therefore, this filing is hereby approved. However, approval of this filing does not constitute a determination that such filing is consistent with the public interest and that the associated costs or expenses are reasonable or prudent for the purposes of determining just and reasonable rates. Furthermore, the Commission's approval is contingent upon the possibility that subsequent audits, reviews, and inquiry, in any Commission proceeding, may be conducted, pursuant to 66 Pa . C.S. §§ 2102, et seq.

In addition, this approval will apply only to the agreement(s), service(s), matters, and parties specifically and clearly defined under this instant filing, as well as under any associated and previously filed filings.

Sincerely,

James J. McNulty
Secretary

[^1]
## VIA OVERNIGHT MAIL

James J. McNulty, Secretary

Pennsylvania Public Utility Commission
Commonwealth Keystone Building, $2^{\text {nd }}$ Floor
400 North Street
Harrisburg, PA 17120

Re: Application of Duquesne Light Company for approval of Affiliated Interest Agreements between Duquesne Light Company and DQE Communications, LLC

Dear Secretary McNulty:
Enclosed for filing are one original and four copies of the Affiliated Interest Application and related documents of Duquesne Light Company requesting approval for it to enter into a Sonet Fiber Use Agreement with DQE Communications LLC. Should you have any questions, please do not hesitate to contact me.


Enclosures

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

| Application of Duquesne Light | $:$ |  |
| :--- | :---: | :--- |
| Company for approval of Affiliated | $:$ |  |
| Interest Agreement between | $:$ | Docket No. |
| Duquesne Light Company and | $:$ |  |
| DQE Communications, LLC | $:$ |  |

## Affiliated Interest Application

 (66 Pa. C. S. Section 2102)Duquesne Light Company ("Duquesne") requests approval pursuant to Section 2102 of the Public Utility Code, 66 Pa . C. S. $\$ 2102$, of the Sonet Fiber Use Agreement between Duquesne and its affiliate, DQE Communications, LLC ("DQEC"), and sets forth the following in support thereof:

1. The name and address of the Applicant is:

Duquesne Light Company
411 Seventh Avenue
Pittsburgh, PA 15219
2. The name and address of the Applicant's attorney are:

Gary Jack, Esq.
Assistant General Counsel
411 Seventh Avenue, Mail Drop 8-2
Pittsburgh, PA 15219
Phone: 412-393-3662
Fax: 412-393-5602
E-mail: gjack@duqlight.com
3. Duquesne is a duly incorporated Pennsylvania public utility engaged in the distribution of electric service to the public, primarily within Allegheny and Beaver
Counties, Pennsylvania, in an area of approximately 800 square miles. The Company's corporate headquarters is located at 411 Seventh Avenue, Pittsburgh, PA 15219.
4. DQE Communications, LLC ("DQEC") is a Pennsylvania limited liability company organized for the purpose of fiber optic telecommunications network services.
5. Applicants are affiliated with each other. Duquesne is a first tier subsidiary of Duquesne Light Holdings, Inc. DQEC is a first tier subsidiary of DQE Systems, Inc., which is a first tier unregulated subsidiary of Duquesne Light Holdings, Inc.
6. Pursuant to the terms of the Sonet Fiber Use Agreement, attached as Exhibit A, Duquesne seeks to improve its internal communications with its substations by replacing the existing microwave and copper communications plant serving its protective relay system with a fiber optic communications system ("Sonet Network") by leasing certain portions of DQEC's fiber optic network in Allegheny, Beaver and Washington counties.
7. The salient terms of the Sonet Fiber Use Agreement are as follows:
a. The Agreement facilitates improved internal communications with Duquesne substations by replacing the existing microwave and copper communications plant serving its protective relay system with a fiber optic communications system leased from DQEC. Two single mode fiber optic strands configured in a point-to-point mode will be leased;
b. The Agreement provides that the Sonet Network constructed by DQEC for Duquesne will consist of two fiber rings, diversely routed between all Sonet equipment locations;
c. The Agreement provides fair, reasonable and non-discriminatory rates, and fair and reasonable terms and conditions for the uses and services authorized thereunder; and
d. The Agreement provides for the continued safe and reliable operation of Duquesne's electric facilities and will not jeopardize the safety,
reliability or quality of electric service provided to Duquesne's customers.
e. The Agreement provides for lease payments for operation, use, maintenance and support for the needed communication facilities at the rate of $\$ 75,250$ per month. That rate is fixed for a 15 year period. The term is for 15 years, with the possibility of extension(s). Any additional construction beyond the present facilities and build-outs to be constructed this year, shall be done by request and payment for services shall be at market based pricing.
8. The Agreement is reasonable and consistent with the public interest, and in furtherance of Duquesne's obligation to provide safe, adequate and reasonable service to its customers.

## WHEREFORE, Duquesne respectfully requests the Commission to approve

 Duquesne entering into the Sonet Fiber Use Agreement with DQE Communications, LLC..
## Duquesne Light Company

Dated: April $\qquad$ 2006

By:
Jeffrey A. Coward

Gary A. Jack<br>Assistant General Counsel<br>Duquesne Light Company<br>411 Seventh Avenue<br>Pittsburgh, PA 15219<br>412-393-1541<br>gjack@duqlight.com

## AFFIDAVIT

I, Jeffrey Coward, being duly sworn (affirmed) according to law, depose and say that I am authorized to make this affidavit on behalf of Duquesne Light Company, being the holder of the office of Director_with that Company, and that the facts above set forth are true and correct to the best of my knowledge, information and belief, and the Company expects to be able to prove the same at any hearing hereof.
$\qquad$ day of $\qquad$ 2006.

## COMMONWEALTH OF PENNSYLVANIA

PENNSYLVANIA PUBLIC UTILITY COMMISSHON

```
DUQUESNE LIGHT COMPANY
8'th}\mathrm{ FLOOR MAIL DROP 8-2
411 SEVENTH AVENUE
PITTSBURGH PA }1521
ATTN MR RICHARD S HERSKOVITZ
```

Re: Affiliated Interest Agreement for an Intercorporate Tax Payment Agreement among Duquesne Light Company and its affiliated companies

Dear Mr. Herskovitz:
On December 1, 2005, Duquesne Light Company filed pursuant to Chapter 21 of the Pennsylvania Utility Code, 66 Pa. C.S. $\S 2102$, an Affiliated Interest Agreement requesting approval of an Intercorporate Income Tax Payment Agreement among the Duquesne Light Holdings, Inc. (Holding) affiliated companies covered by Holding's consolidated income tax filings.

Upon review of the filing, it does not appear that the arrangement is unreasonable and contrary to the public interest. Therefore, this filing is approved. However, approval of this filing does not constitute a determination that such a filing is consistent with public interest, and that the associated costs are reasonable or prudent for the purposes of determining just and reasonable rates. Furthermore, the Commission's approval is contingent upon the possibility that subsequent audits, reviews, and inquiry, in any Commission proceeding, may be conducted, pursuant to 66 Pa . C.S. $\S \S 2102$, et seq.

In addition, this approval will apply only to the agreement(s), services(s), matters, and parties specifically and clearly defined under this instant filing as well as any associated and previously filed filings.


[^2]
## Richard S. Herskovitz

 Assistant General Counsel411 Seventh Avenue $8^{\text {th }}$ Floor Pittsburgh, PA 15219

Tel 412-393-3662
Fax 412-393-5602
rherskovitz@duqlight.com
COPY

December 1, 2005

## OVERNIGHT MAIL

James J. McNulty, Secretary
Pennsylvania Public Utility Commission
Commonwealth Keystone Building
400 North Street, $2{ }^{\text {nd }}$ Floor
Harrisburg, PA 17120

## Re: Application of Duquesne Light Company For Approval of Affiliated Interest Agreement Docket No. $6-00051152$

Dear Secretary McNulty:
Enclosed for filing on behalf of Duquesne Light Company ("Duquesne") are the original and three (3) copies of an Application for Approval Nunc Pro Tune of an Affiliated Interest Agreement between Duquesne and its affiliated companies. Specifically, this Application, filed pursuant to 66 Pa. C.S. $\$ 2102$ of the Public Utility Code, requests Commission approval of Duquesne's inclusion as a party in an Intercorporate Tax Payment Agreement.

Also, a fourth copy of this Application is enclosed to be date-stamped and returned to me in the self-addressed stamped envelope for my file.

Thank you.

Very truly yours,


Richard S. Herskovitz
Enclosures

BEFORE THE
PENNSYLVANIA PUBLIC UTILITY COMMISSION


## Affiliated Interest Application

 (66 Pa. C. S. Section 2102)Duquesne Light Company ("Duquesne") requests approval Nunc Pro Tunc, pursuant to Section 2102 of the Public Utility Code ("Code"), 66 Pa. C. S. §2102, of its entering into a tax payment agreement with its affiliates, and sets forth the following in support thereof:

1. The name and address of the Applicant is:

Duquesne Light Company
411 Seventh Avenue
Pittsburgh, PA 15219
2. The name and address of the Applicant's attorney are:

Richard S. Herskovitz
Assistant General Counsel
411 Seventh Avenue, Mail Drop 8-2
Pittsburgh, PA 15219
Phone: 412-393-3662
Fax: 412-393-5602
E-mail: rherskovitz@duqlight.com
3. Duquesne is a duly incorporated Pennsylvania public utility engaged in the distribution of electric service to the public, primarily within Allegheny and Beaver Counties, Pennsylvania, in an area of approximately 800 square miles. Duquesne's corporate headquarters is located at 411 Seventh Avenue, Pittsburgh, PA 15219.
4. Duquesne Light Holdings, Inc. ("DLH"), formerly known as DQE, Inc. the parent company of Duquesne, entered into an Intercorporate Tax Payment Agreement ("Agreement") with its affiliated companies, effective January 1, 1992. The purpose of the Agreement was to provide for payments between the parent company and its affiliated companies with respect to each company's share of the consolidated income tax liability of the entire affiliated group. A complete and detailed description of the intent and operation of this tax sharing arrangement is set forth in the Agreement attached as Exhibit A.
5. Duquesne's inclusion in the Agreement is evidenced by the signature of Raymond H. Panza, former Duquesne Controller, on an undated counterpart signature page attached to the Agreement (page 7 of Exhibit A). This signature page has only recently been located by Duquesne.
6. In the Public Utility Commission's most recent Management Audit of Duquesne (field work commencing in August, 2004 and ending in March, 2005), the Auditors investigated whether Duquesne's inclusion in the Agreement had been approved by the Commission under the affiliated interest provisions of the Code. As stated in paragraph 5, neither Duquesne nor the Auditors were able to locate a counterpart signature page for Duquesne. Duquesne contended that its inclusion in the Agreement would have been authorized by the Company's Administrative Services Agreements ("ASA"), which was previously approved by the Commission. Although a final report of the audit has not yet been issued, the Auditors have indicated that, in their opinion, the ASA did not contain such an authorization.
7. Duquesne subsequently located the Duquesne Light Company counterpart signature page and is now filing for approval of its inclusion in the Agreement under the affiliate provisions of the Code, retroactive to January 1, 1992.
8. Inclusion by Duquesne in the tax sharing arrangement is appropriate for accounting purposes so as to allocate taxes among affiliates of a holding company according to taxable income.

WHEREFORE, Duquesne respectfully requests the Commission to approve Duquesne's inclusion as a party in the subject Intercorporate Tax Payment Agreement, retroactive to January 1, 1992.
Dated: December 2005

Duquesne Light Company<br>By:<br>

$\qquad$

## AFFIDAVIT

I, Mark E. Kaplan, being duly sworn (affirmed) according to law, depose and say that I am authorized to make this affidavit on behalf of Duquesne Light Company, being the holder of the office of Senior Vice President and Chief Financial Officer with that Company, and that the facts above set forth are true and correct to the best of my knowledge, information and belief, and the Company expects to be able to prove the same at any hearing hereof.


Sworn and subscribed before me this lIst day of Decambu(2005.


## INTERCORPORATE TAX PAYMENT AGREEMENT

THIS INTERCORPORATE TAX PAYMENT AGREEMENT ("Agreement"), dated and effective as of January 1, 1992, among DQE, Inc. ("Parent Company"), and its Affiliated companies (as defined by this agreement).

## Recitals:

A. This Agreement is entered into by the Parent Company and each other member of the "affiliated group", as defined in Section 1504 of the Internal Revenue Code of 1986 as amended (the "Code"), of which the Parent Company is a member (each such other member being called an "Affiliate Company" and all such other members being called collectively the "Affiliated Companies") and which are includible in the Parent Company's consolidated annual federal Income Tax return. The "Parent Affiliated Group" means the affiliated group of which the Parent Company is the common parent company in any taxable year of the Parent Company.
B. The Parent Company and its Affiliated Companies wish to enter into an agreement to provide for payments to Parent company by, or by Parent Company to, each of the Affiliated Companies with respect to federal Income Taxes, as that term is defined in section 2.02 below.
C. The purpose of this Agreement is to provide for payments between the Parent Company and its Affiliated Companies with respect to the members' shares of the consolidated Income Tax liability of the Parent Affiliated Group (each such payment being called an "Intercorporate Tax Payment") and is not intended to affect any separate company financial statement accounting, the elected calculation of earnings and profits as determined under code section 1552 or any other tax or accounting issues.
D. Subject to the terms hereof, the general intent of this Agreement is to provide for (i) payment to the Parent company, by each Affiliate Company which would have incurred a separate return Income Tax liability for any period (a "Tax Reporting Period") with respect to which the consolidated Income Tax liability of the Parent Affiliated Group is estimated, reported or finally determined, of the amount of Income Taxes which the respective Affiliate Company would have incurred on a separate-return basis and (ii) payment, by the Parent Company, to each Affiliate Company that generated on a separate-return basis a net operating loss or capital loss (each individually a "tax loss") or a tax credit which is not utilized by the respective Affiliate Company in such Tax Reporting Period but is determined under the terms of this Agreement to be applied against separate-return income or Income Tax liability of the Parent Company or another Affiliate Company, of an amount equal to the sum of (a) the product of each such tax
loss so applied multiplied by the effective tax rate of Income Tax paid or payable by the Parent Company for such Tax Reporting Period on the consolidated income of the Parent Affiliated Group (such effective rate being determined before the application of tax credits) plus (b) the amount of tax credits so generated and applied.

NOW THEREFORE, the parties hereto, intending to be legally bound hereby, agree as follows:

## ARTICLE I

## INTERCORPORATE TAX PAYMENT

1.01. Payments by the Parent Company to Affiliated Companies. The amount of the reduction in the separate return Income Tax liability or the amount of the refunds or credits received by the Parent or any member of the Parent Affiliated Group from the use of a tax loss or tax credit attributable to an Affiliate Company (a "Loss Company") shall be remitted by the Parent Company to the Affiliate Company in cash on the respective due date of Income Taxes to which the Parent company is subject, whether under code Section 6655 with regard to estimated payments, Code Section 6151 with regard to payments required to accompany the consolidated federal Income Tax return of the Parent Affiliated Group or any later date of any actual payment of Income taxes pursuant to administrative adjustment or unappealable final determination of a court of competent jurisdiction; provided, always, that such payment shall be conditioned on the Loss Affiliate Company continuing as a member of the Parent Affiliated Group for not less than 30 days after the respective due date and that any Loss Affiliate Company which ceases to be such a member within 30 days after the respective due date but has received an Intercorporate Tax Payment shall repay the Intercorporate Tax Payment to Parent on demand. In determining the amounts of the Loss Affiliate Company's separate return tax losses and tax credits and the amount of the Intercorporate Tax Payment, the tax losses and tax credits of the Loss Affiliate company determined on a separate-return basis and available for application to the separate-return Income Tax liability of other members of the Parent Affiliated Group shall exclude (i) all tax losses and tax credits of the Loss Affiliate Company which were applied to its or another member's separate-return Income Tax Liability for any prior Tax Reporting Period and (ii) all tax losses and tax credits of the Loss Affiliate Company which may be applied to reduce the Loss Affiliate Company's separate return Income Tax liability for the current Tax Reporting Period. If for a Tax Reporting Period the total tax losses (or tax credits) of the Parent Company and all Loss Affiliate Companies, determined on a separate-return basis, exceed the total separate-return income (or Income Tax liability)
of all members of the Parent Affiliated Group with positive, separate-return income or Income Tax liability (so that not all available tax losses or tax credits may be utilized in the Tax Reporting Period), then, subject to the SRLY rules and any other rules limiting for tax purposes the intercompany availability of tax losses or tax credits, the available tax losses and tax credits respectively of a Loss Affiliate Company shall be deemed to be applied intercompany in the amount equal to (i) the total of the tax losses and tax credits, respectively, which the members with positive net income and separate-return Income Tax liability can utilize times (ii) a fraction, the numerator of which is the tax losses (or tax credits, as the case may be) of the Loss Affiliate Company available and usable for such Tax Reporting Period and the denominator of which is the total of the available and usable tax losses (or tax credits, as the case may be) of all Loss Affiliate Companies. The Intercompany Tax Payment to a Loss Affiliate Company shall equal the sum of (a) the product of the amount of tax loss of the Loss Affiliate Company which is applied for the Tax Reporting Period to separate-return income of any other member multiplied by the effective rate of Income Taxes (determined before application of tax credits) paid or payable by the Parent Company on the consolidated federal Income Tax liability of the Parent Affiliated Group for that Tax Reporting Period plus (b) the amount of tax credits of the Loss Affiliate Company which are applied for the Tax Reporting Period to separate-return Income Tax liability of any other member. The amount of all items of tax losses and tax credits of the Parent Company and each Affiliate company shall be determined under the terms of this Agreement. To the extent that this Agreement does not cover the treatment or timing of a particular item, the determination shall be made under the code.
1.02. overpayments. The portion of any overpayment of Income Taxes resulting in a refund which is attributable to a Loss Affiliate Company shall be remitted by the Parent Company to the Loss Affiliate Company upon receipt of the overpayment by the Parent Company, provided, always, that such Loss Affiliate company is then a member of the Parent Affiliated Group and that any overpayment of Income Taxes which is treated by the Parent Company as a payment of consolidated Income Taxes for a succeeding Tax Reporting Period and which is attributable to a Loss Affiliate Company may be retained by the Parent Company, so long as such overpayment (or portion thereof) is credited as an Intercompany Tax Payment, pursuant to Section 1.03 below, of any actual separate return Income Tax liability of such Loss Affiliate Company for such succeeding Tax Reporting Period.
1.03. Payments by Affiliated Companies to Parent Company. The amount of the positive separate-return Income Tax liability of each Affiliate Company for the respective Tax Reporting Period shall be remitted by the Affiliate company to the Parent Company in cash on the due date, of any actual or required payment of

Consolidated Income Taxes of the Parent Affiliated Group, whether such payment is due or made with respect to the estimated, reported or finally determined consolidated Income Tax liability of the Parent Affiliated Group.

ARTICLE II<br>TAX LIABILITY

2.01. Determination of Separate Return Tax Liability. For purposes of determining the separate return Income Tax liability of each Affiliate Company, the tax liability of each member shall be computed as if it had filed a separate Income Tax return for the taxable period. The separate return Income Tax liability shall be computed in a manner consistent with the provisions of Treasury Regulations Section 1.1552-1(a)(2)(ii) and as provided in Section 1.01 above. Any penalty or interest with respect to any underpayment of estimated or final consolidated Income Taxes of the Parent Affiliated Group shall be attributed to the respective member to which the adjustment of income, deduction or credit resulting in the penalty or interest is attributable, but if there are no such members, then to those Affiliate companies with positive separate-return Income Tax Liability (as reported, adjusted or redetermined) for such Tax Reporting Period, ratably in proportion to their respective separate-return Income Tax liabilities. If any adjustment is made to the consolidated Income Tax liability of the Parent Affiliated Group for any year by amended return, by adjustment upon audit by the Internal Revenue Service conceded by the Parent Company, or by final nonappealable determination of a court of competent jurisdiction, the overpayment or deficiency for such year shall be allocated to those members or former members which had the items of income, deduction or credit to which the overpayment or deficiency is attributable. If due to disaffiliation of a former member or any other reason there is no Affiliate Company to which an Intercompany Tax Payment may be paid (or an overpayment paid or credited), such payment or credit shall be retained by the Parent Company.
2.02. Income Taxes. For purposes of this agreement the term "Income Taxes" shall mean federal income taxes, taxes on preference items, and any minimum tax or alternative minimum tax, imposed under the code or any successor statute, together with any interest and penalties related thereto.

ARTICLE III
COVENANTS
3.01. Continuation of this Agreement. For so long as the Parent Company is permitted it shall continue to file consolidated federal Income Tax returns pursuant to code Section 1501 for the

Parent Affiliated Group, and this Agreement shall continue in effect and be implemented and enforced in accordance with its terms. Except as otherwise expressly agreed by the Parent Company and all Affiliated Companies, any corporation which becomes an includible corporation in the Parent Affiliated Group shall be treated as a party to this Agreement, effective as of the first day the results of its operations for that day are included within the consolidated taxable income of the Parent Affiliated Group, upon (i) execution and delivery to the Parent Company of an addendum hereto agreeing to be bound and benefitted by the terms of this Agreement or (ii) the inclusion (constituting implied consent) of the results of its operations in any consolidated federal Income Tax return of the Parent Affiliated Group.
3.02. Decisions Affecting the Amount of the Intercorporate Tax Payments. In determining the amount of Intercorporate Tax payments to be made under the terms of this Agreement, the Parent Company shall make decisions concerning tax matters, refunds or credits of the Parent Affiliated Group, which would affect (for purposes of determinations of Intercorporate Tax payments) the separate Income Tax return liability, refunds or credits of the respective Affiliated Companies (including, without limitation, the making, not making, or revoking of elections, resolution of disputes in connection with audits of Income Tax returns, and defending or settling any Income Tax return or any matter related thereto) in a manner which minimizes the cumulative total consolidated Income Tax liability of the Parent Affiliated Group.


#### Abstract

ARTICLE IV MISCELLANEOUS 4.01. Amendments, Modifications and Supplements. Except as provided in Section 3.01 above regarding additional includible corporations, no amendment, modification or supplement relating hereto shall be effective unless in writing signed by or on behalf of the party to be charged therewith. This Agreement may be executed in one or more counterparts and with counterpart signature pages, all of which, taken together, shall constitute one and the same instrument. Furthermore, it is agreed that an Affiliate Company's execution of a counterpart signature page for attachment originally, or as an addendum hereto as provided in Section 3.01 above, shall be effective to bind all Affiliated Companies without reexecution by previously includible corporations. 4.02. Duration; Survival. All covenants and agreements contained herein shall continue in full force and effect from and after the hereof so long as the Parent Affiliated Group remains and so long as the Parent Affiliated Group continues in filing a federal consolidated Income Tax return.


4.03. Governing Law. This Agreement shall be governed by, and construed and enforced in accordance with, the laws of the Commonwealth of Pennsylvania.

IN WITNESS WHEREOF, the parties hereto, by their officers thereunto duly authorized, have executed and delivered this Agreement as of the date first above written.

PARENT COMPANY DQE, INC.

By:
Name:
Title:
Date of Execution:

[See attached counterpart signature pages]

AFFILIATE COMPANY
COUNTERPART SIGNATURE PAGE TO
INTERCORPORATE TAX PAYMENT AGREEMENT AMONG
DQE, INC. AND ITS AFFILIATED COMPANIES DATED JANUARY 1, 1992

AFFILIATE COMPANY
DUQUESNE LIGHT COMPANY

By:
Name:
Title:
Date of Execution:

# AFFILIATE COMPANY COUNTERPART SIGNATURE PAGE TO <br> INTERCORPORATE TAX PAYMENT AGREEMENT AMONG <br> DQE, INC. AND ITS AFFILIATED COMPANIES DATED JANUARY 1, 1992 

## AFFILIATE COMPANY

MONTAUK, INC.

By:
Name:
Title:
Date of Execution:


# AFFILIATE COMPANY <br> COUNTERPART SIGNATURE PAGE TO <br> INTERCORPORATE TAX PAYMENT AGREEMENT AMONG <br> DQE, INC. AND ITS AFFILIATED COMPANIES <br> DATED JANUARY 1, 1992 

AFFILIATE COMPANY DUQUESNE ENTERPRISES, INC.

By:
Name:
Title:
Date of Execution:


AFFILIATE COMPANY
COUNTERPART SIGNATURE PAGE TO
INTERCORPORATE TAX PAYMENT AGREEMENT
AMONG
DQE, INC. AND ITS AFFILIATED COMPANIES
DATED JANUARY 1, 1992

AFFILIATE COMPANY
MONONGAHELA LIGHT \& POWER COMPANY

```
By:
Name:
Title:
Date of Execution:
```



# AFFILIATE COMPANY COUNTERPART, SIGNATURE PAGE TO INTERCORPORATE TAX PAYMENT AGREEMENT AMONG <br> DQE, INC. AND ITS AFFILIATED COMPANIES DATED JANUARY 1, 1992 

AFFILIATE COMPANY
PROPERTY VENTURES, LTD.

By:
Name:
Title:
Date of Execution:


# AFFILIATE COMPANY COUNTERPART SIGNATURE PAGE TO <br> INTERCORPORATE TAX PAYMENT AGREEMENT AMONG <br> DQE, INC. AND ITS AFFILIATED COMPANIES <br> DATED JANUARY 1, 1992 

AFFILIATE COMPANY
KEYSTONE ENERGY COMPANY

By:
Name:
Title:
Date of Execution:
Frederick s. Potter

AFFILIATE COMPANY
COUNTERPART SIGNATURE PAGE
TO
INTERCORPORATE TAX PAYMENT AGREEMENT AMONG
DQE, INC. AND ITS AFFILIIATED COMPANIES
DATED JANUARY 1, 1992

AFFILIATE COMPANY
BUSHTON, INC.

## By:

Name:
Title:
Date of Execution:

# AFFILIATE COMPANY COUNTERPART SIGNATURE PAGE TO <br> INTERCORPORATE TAX PAYMENT AGREEMENT <br> AMONG <br> DQE, INC. AND ITS AFFILIATED COMPANIES <br> DATED JANUARY 1, 1992 

AFFILIATE COMPANY
ALLEGHENY DEVELOPMENT CORP.

By:
Name:
Title:
Date of Execution:


AFFILIATE COMPANY
COUNTERPART SIGNATURE PAGE TO
INTERCORPORATE TAX PAYMENT AGREEMENT AMONG DQE, INC. AND ITS AFFILIATED COMPANIES DATED JANUARY 1, 1992

## AFFILIATE COMPANY <br> DUQUESNE PROPERTIES, INC.

By:
Name:
Title:
Date of Execution:


# Request for Approval of An Amendment to Affiliated Interest Agreement (66 Pa. C. S. Section 2102) 

Duquesne Light Company ("DLC") requests the Pennsylvania Public Utility Commission's ("Commission") consent and approval pursuant to Section 2102 of the Public Utility Code ("Code"), 66 Pa. C. S. § 2102, to amend its existing Affiliated Interest Agreement with its parent company, Duquesne Light Holdings Inc. ("DLH"), by increasing the allowed amount of borrowings from $\$ 200$ million to $\$ 300$ million. The increased borrowing threshold will provide DLC with the capability and flexibility to finance necessary construction of facilities, greater flexibility for working capital and capital structure management, and otherwise fund and operate its business. DLC sets forth the following in support thereof:

1. DLC is a Pennsylvania limited liability company and an electric utility engaged in the supply (through its provider-of-last-resort service (POLR)), transmission and distribution of electric energy. DLC provides electric service to more than 600,000 customers in Pennsylvania's Allegheny and Beaver counties (including in the city of Pittsburgh), a territory of approximately 800 square miles. DLC's corporate headquarters is located at 411 Seventh Avenue, Pittsburgh, PA 15219.
2. DLH is the parent company of DLC, and DLC is DLH's principle subsidiary.
3. On December 16, 2009, DLC filed with this Commission a petition requesting authorization for DLH to be able to lend to its utility subsidiary, DLC, up to $\$ 200$ million at any one time on commercially reasonable terms as dictated in the petition. By Secretarial Letter dated May 3, 2010 at Docket No. G-2009-2148505, the affiliated interest agreement was approved by operation of law pursuant to 66 Pa . C.S. § 2102(b)
4. Said authorization has been utilized by DLC since Commission approval of the arrangement. The credit facility has been helpful and beneficial to both the utility and its customers in providing short term borrowings to DLC for financing needs.
5. In order to provide necessary funding for construction, as well as finance and pay other obligations of DLC in normal course of operating its utility business, DLC desires to increase its ability to borrow, on a short term basis from time to time, from up to $\$ 200$ million to up to $\$ 300$ million at any given point in time from its parent, DLH, on market terms and conditions. This borrowing would be used in addition to normal equity contributions, retained earnings, long-term borrowings of DLC, and short-term borrowings from outside credit lenders utilized by DLC to operate its business. Borrowing is necessary to support construction and general corporate needs, and provide DLC greater flexibility in timing debt issuances in the capital markets to obtain more favorable terms and an overall lower cost of capital.
6. DLC also recommends an amendment of the interest rate of the Affiliated Interest Agreement from London Interbank Offered Rate (LIBOR) $+1.25 \%$ to LIBOR + $0.875 \%$ to align with DLC's Credit Agreement executed on October 31, 2019. All other specific terms of the loan will be unchanged. The amended, specific terms of the loan arrangement are attached as Exhibit A. DLC represents that these terms are commercially reasonable and reflect today's prevailing market conditions. Increasing the threshold as requesting in this filing will provide no preference or undue advantage to DLH or any other company in the DLH family.

7．Upon Commission approval，an amended Promissory Note will be executed between DLC and DLH in the form attached as Exhibit B．

8．The approval of this amendment is necessary and in the public interest， providing necessary financing for construction and operation of DLC＇s obligation to provide reliable and cost effective electric service to its customers．

WHEREFORE，DLC respectfully requests the Commission to approve this amendment to its short term borrowing arrangement with its parent，DLH，and to authorize borrowings up to $\$ 300$ million from DLH to its utility subsidiary，DLC，and it to perform all necessary and incidental tasks thereto in carrying out said borrowing arrangement．

Duquesne Light Company
By：Ganas $1 /$ Milloy James H．Milligan


Emily M．Farah，Esq．
Pa In No．るつつร50
Duquesne Light Co．
411 Seventh Ave．，MD 15－7
Pittsburgh，PA 15219
412－393－6431
efarah＠duqlight．com

Dated：October 27,2020

# BEFORE THE <br> PENNSYLVANIA PUBLIC UTILITY COMMISSION 

| Request of Duquesne Light | $:$ |  |
| :--- | :--- | :--- |
| Company for Approval of an | $:$ |  |
| Amendment to its Affiliated Interest $:$ | Docket No. G-2009-2148505 |  |
| Arrangement with its Parent for | $:$ |  |
| Short Term Borrowing | $:$ |  |

$\qquad$

I, James H. Milligan, Treasurer of Duquesne Light Company, hereby state that the facts above set forth are true and correct (or are true and correct to the best of my knowledge, information and belief) and that I expect to be able to prove the same at a hearing held in this matter. I understand that the statements herein are made subject to the penalties of $18 \mathrm{~Pa} . \mathrm{C} . \mathrm{S} . \$ 4904$ (relating to unsworn falsification to authorities).


Dated: October 27, 2020

## PROMISSORY NOTE

Amount: Up to $\$ 300$ Million
Interest Rate: LIBOR + 0.875\%

Date:
Payment: Upon Demand

Duquesne Light Company, a Pennsylvania Limited Liability Company (herein called the "Company", which term includes any successor entity), for value received, hereby promises to pay to Duquesne Light Holdings, Inc. (the "Lender"), the principal sum of its draws or loans from the Lender, in an amount not to exceed $\$ 300$ million dollars $(\$ 300,000,000$.) at any one time or, if less, the aggregate principal amount of advances outstanding on demand, plus interest due thereon.

This Promissory Note is payable ON DEMAND, and Company shall pay interest thereon on a quarterly basis on the unpaid principal amount of each such loan at the Market Rate of interest. The Market Rate of interest shall be the London Interbank Offered Rate (LIBOR) plus $0.875 \%$ per year. Interest payments shall be due and payable on the last day of each quarter for the amount accrued on a daily basis in such quarter. Also, on said last day of each quarter, the Market Rate shall be recalculated on a forward basis for the principal to be outstanding during the succeeding quarter. Notwithstanding such payment arrangements, all outstanding and unpaid principal and interest shall be due and payable upon Demand.

Payment of the principal of this Note and interest hereon shall be made, at the request and demand of the lender, upon presentation hereof at the office of the Company in Pittsburgh, Pennsylvania or at such other office or agency as may be designated for such purpose by the Company from time to time. Payment of the principal of and interest on this Note, as aforesaid, shall be payable in lawful money of the United States of America to the Lender in Pittsburgh, Pennsylvania in same day funds and may be paid or prepaid by the Company at any time and from time to time to reduce its outstanding balance.

The registered holder of this Note may demand payment of the principal hereof, in whole or in part, plus accrued interest by delivering to the Treasurer of the Company at the office of the Company in Pittsburgh, Pennsylvania a notice specifying the portion of such principal amount to be paid and the date of payment and then presenting this Note for payment at such office on the date specified for payment.

This Note is exchangeable for a like aggregate principal amount of Notes of like tenor upon surrender of this Note to be exchanged at the office of the Company in Pittsburgh, Pennsylvania. No service charge shall be made for any such exchange, but the Company may require payment of a sum sufficient to cover any tax or other governmental charge payable in connection therewith.

The principal amount to be repaid by the Company may, at the Company's option, be offset by the amount of any obligations which are then owed by Lender to the

## Attachment B

Company. This Note shall be governed by and construed in accordance with the laws of the Commonwealth of Pennsylvania.

No recourse shall be had for the payment of the principal of or interest on this Note, or any part hereof, for any claim based thereon or otherwise in respect thereof, or of the indebtedness represented thereby against, and no personal liability whatsoever shall attach to, or be incurred by, any officer or director of such Company as such, past, present or future of the Company, whether by virtue of any constitutional provisions, statue or rule of law, or by the enforcement of any assessment or penalty or otherwise, it being expressly agreed and understood that this Note is solely a Company obligation and that any such personal liability is hereby expressly waived and released as a condition of, and as part of the consideration for, the execution and the issuance of this Note.

IN WITNESS WHEREOF, the Company has caused this instrument to be duly executed.

DUQUESNE LIGHT COMPANY

By:
James H. Milligan
Treasurer

DFR II-D-8f contains CONFIDENTIAL information and will be provided upon issuance of a Protective Order.

## COMMONWEALTH OF PENNSYLVANIA

 PENNSYLVANIA PUBLIC UTILITY COMMISSIONRICHARD S HERSKOVITZ
ASSISTANT GENERAL COUNSEL
411 SEVENTH AVENUE MAIL DROP 8-2
PITTSBURGH PA 15219

Affiliated interest agreement among Duquesne Light
Company and its non-jurisdictional affiliates for participation in a cash pool arrangement

To Whom It May Concern:
This is to advise you that the Commission in Public Meeting on November 9, 2006 adopted an Order in the above entitled proceeding.

An Order has been enclosed for your records.

encls
cert. mail
JF

# PENNSYLVANIA <br> PUBLIC UTILITY COMMISSION <br> NOV 132007 Harrisburg, PA 17105-3265 

Public Meeting held November 9, 2006
Commissioners Present:
Wendell F. Holland, Chairman
James H. Cawley, Vice Chairman
Kim Pizzingrilli
Terrance J. Fitzpatrick

| Affiliated interest agreement among Duquesne Light | Docket Number: |
| :--- | :--- |
| Company and its non-jurisdictional affiliates for <br> participation in a cash pool arrangement. | G-00051141 |

## ORDER

## BY THE COMMISSION:

On October 7, 2005, Duquesne Light Company (Duquesne Light) filed, pursuant to Chapter 21 of the Pennsylvania Public Utility Code, 66 Pa . C.S. §§2101, et seq., an affiliated interest agreement for participation in a Cash Pool (the Pool) arrangement among its affiliates. By Secretarial Letter dated October 7, 2005, the Commission extended the 30-day statutory consideration period until further order of the Commission as provided in Chapter 21 of the Public Utility Code.

## Background

Duquesne Light is a jurisdictional utility that provides electric distribution and transmission services primarily within Allegheny and Beaver counties. Duquesne

Light Holdings, Inc. (DLH) is an energy services holding company formed to serve as the holding company for Duquesne Light and to engage in other unregulated energy and energy-related businesses.

DLH, formerly DQE, Inc., originally established its Cash Pool in November of 1997 as a mechanism to concentrate and combine the excess funds of it and its affiliates for investing in short-term securities. The aggregation of these funds was designed to provide a more efficient means for managing the excess cash of the DLH subsidiaries. The applicants state that Duquesne Light became a member of the Pool in July of 2000.

In the most recent Management Audit conducted by the Commission, the Audit Staff discovered a number of arrangements or transactions that they felt were not covered by Commission approved affiliated interest agreements. One of these was the participation of Duquesne Light in the Cash Pool arrangement. Duquesne Light, however, contends that its participation in the Pool was authorized by the Commission under a previously approved Administrative Services Agreement (ASA). The Auditors in turn contend that the ASA did not contain authorization for Duquesne Light to participate in the Pool. In its Implementation Plan, which was acknowledged by the Commission at its Public Meeting of June 1, 2006, Duquesne Light accepted the recommendations in the report issued by PA Public Utility Commission Bureau of Audits including the requirement to file an affiliated interest agreement for Duquesne Light's participation in the Pool.

Even though Duquesne Light originally disputed the Auditors' conclusion regarding its participation in the Pool, the company agreed to file for approval of its membership and participation in the Pool under the affiliated provisions of the Code.

Subsequently, Duquesne Light exited the pool November 28, 2005, pending Commission approval of this affiliated interest application for participation in the Pool.

Subsequent to making its filing Duquesne Light responded to the Commission's requests for additional information.

## The Cash Pool Agreement

The Cash Pool is used by DLH as a mechanism to concentrate excess funds and combine the cash of DLH and its subsidiaries to invest in short-term investments. The applicants state that by aggregating their funds DLH and its subsidiaries are able to invest in short-term securities previously not available to individual Pool participants. Additionally, the applicants aver that the Pool is a more efficient method of managing funds by reducing the administrative costs of the Pool participants and results in higher investment returns for the Pool participants.

Participants in the Cash Pool include DLH and all of the wholly-owned direct and indirect subsidiaries of DLH. DQE Capital Corporation acts as the Agent and is the current Pool administrator. The cash position of the Pool participants is determined by the Agent on a daily basis. The sources of these funds include normal operating receipts, external borrowings or contributions made by DLH. Pool participants, with the exception of DLH, can contribute to the Pool but cannot borrow from the Pool. DLH through the Agent is permitted to borrow from the Pool but does not contribute to the Pool. The Agent is permitted to borrow from the Pool to facilitate intercompany borrowing arrangements and operating requirements. There are no individual limits on the amounts that any individual participant can deposit into the Pool and DQE Capital Corporation borrowings from the Pool are only limited by the amount deposited into the Pool. Excess cash, the net of the amount contributed less borrowings by the Agent, will
be invested by the Agent in approved investments that are consistent with the Duquesne Light Holdings Short Term Investment Policy ${ }^{1}$.

DQE Capital Corporation, acting as the Agent, is the only Pool participant that may borrow from the Pool and its borrowing are only limited by the amount that is contributed by the other Pool members. The borrowings by the Agent are then lent to DLH as a demand loan. Borrowings made by that Agent from the Pool are at an internal short-term borrowing rate, typically the London Inter-Bank Offered Rate (LIBOR). The Agent then lends to DLH at an interest rate equal to the rate charged by external lenders on DLH's current revolving credit arrangement. The interest rate charged to DLH on its revolving credit facility, and therefore on its borrowings from the Pool, is LIBOR plus a margin based on DLH's current senior unsecured credit rating. The margin between the borrowing rate from the Pool and lending rate to DLH charged by the Agent is used by the Agent to cover the administrative costs of operating the Pool.

DLH may use the money for general corporate purposes or may advance funds to its subsidiaries on an as needed basis. These advances may be in the form of a capital contribution or a loan. Advances to Duquesne Light are done only in the form of a capital contribution.

Should a participant require its cash that is deposited in the Pool and there is insufficient cash to meet its withdrawal needs, the Agent would make a demand against DLH for repayment of all or a portion of its loan. If need be, DLH would access its available credit lines to obtain the cash needed to satisfy the Agent's demand.

[^3]
## Discussion

In reviewing Duquesne Light's participation in the Pool, the Commission raised the following concerns:

1. There is no formal agreement among participants of the Pool.
2. There is no borrowing or lending limits placed on any of the Pool participants.
3. DLH's ability to borrow money from the Pool through the Agent DQE Capital.
4. Capital arbitrage between regulated and unregulated entities.
5. Duquesne Light's risk versus benefits in participating in the Pool.

The company agreed that there is no formal agreement that is signed by the Pool participants. DLH does have, as required by FERC and filed with FERC, a written document that specifies the duties of the administrator and the participants. Duquesne Light also notes that each participant in the Pool has signed the ASA and that this agreement covers the provision of services provided by one affiliate to another. The company reiterates that each participant is aware of the operating procedures provided by the Cash Pool operating document.

In reviewing the Code, 66 Pa. C.S. §2102(a) states in part that:

If such contract is oral, a complete statement of the terms and conditions thereof shall be filed with the commission and subject to its approval.

Additionally, 66 Pa. C.S. §§2102(b) states in part that:

It shall be the duty of every public utility to file with the commission a verified copy of any such contract or arrangement, or a verified summary as described in subsection (a) of any unwritten contract or arrangement.

The Commission has determined that the Pool operating document that Duquesne Light filed with their application adequately describes the operation of the Pool. Therefore, the Commission will not require that a formalized signed contract for Duquesne Light to participate in the Pool.

Unlike other cash pools that the Commission has reviewed, the DLH Pool does not allow its Pool participants to borrow from the Pool nor does it have borrowing or contribution limits for individual participants. As noted above, DQE Capital, acting as the Agent, is the only Pool participant that may borrow from the Pool and its borrowing is only limited by the amount that is contributed into the Pool. In other intra-system money pool arrangements ${ }^{2}$, pool participants may borrow from the pool and the pool administrator is prohibited from borrowing from the pool. Under this scenario, the pool administrator may contribute money to the pool whenever borrowings from the participants exceed contributions. This would be done by the pool administrator having access to externally available credit sources.

DLH's borrowing arrangement is dissimilar to what has been seen recently by the Commission in other cash pool arrangements. Our concern is that DLH borrowing through the Agent from the Pool lacks transparency in how these funds are being used and which entities, through DLH, may be borrowing money. Along with this lack of transparency, it may be that the regulated entity is helping to fund DLH's non-regulated operations. As Sharon Bonelli of Fitch Ratings notes "Cost benefits of pools reflect cost of capital arbitrage between regulated and unregulated subsidiaries; or simply put, money pools may provide an affiliate cross-subsidy."

[^4]There are a number of ring-fencing strategies suggested by Fitch that may help to insulate the public utility from the risks of its affiliates and parents when participating in a money pool arrangement. These are:

- Separate pools for regulated and unregulated subsidiaries
- Prohibit parent from borrowing from the pool, but permit the parent to lend to subsidiaries via the pool
- Restrict borrowing of unregulated subsidiary to the amount invested in the pool
- Restrict borrowings to a level commensurate with internal cash flow capability
- Require an annual 'clean down' period, where each participant has no outstanding borrowings from the pool for two consecutive weeks
- Prohibit funding of the pool with proceeds of external borrowings such as credit facilities and commercial paper

The Duquesne Pool tends not to follow these guidelines:

- The Duquesne cash pool mixes both regulated and unregulated subsidiaries. Duquesne Light would be the only regulated sub of DLH.
- DLH, the Parent Company, through DQE Capital, is the only entity borrowing from the pool. (In other money pools such as the one approved for the First Energy Utilities, the Agent could lend to the pool but could not borrow.)
- There appears not to be any limits on external borrowing funding the Pool. In fact, sources for cash to the pool includes: "external borrowings against lines of credit."

DLH counters some of these concerns by stating that Duquesne Light is the only regulated affiliate of DLH and that Duquesne Light does not borrow money to deposit in the Pool. Money borrowed by DLH from the Agent is charged interest at the same rate that the company would be charged for using its current revolving credit arrangement. Therefore, the money being borrowed by DLH is not at an interest rate lower than DLH could obtain from other external short term borrowing facilities. For these reasons, the company concludes that there is no cost of capital arbitrage taking place between regulated and unregulated DLH entities.

DLH also states that there is total transparency on how the cash is being used because borrowings can only be done by the Agent to DLH. They go on to explain that each DLH affiliates' funding requirements is established each year by the Board of Directors. If Duquesne Light requires cash in excess of its cash pool balance, it can access the capital markets, borrow under bank facilities or request equity from DLH. Since Pool participants other than Duquesne Light do not have access to the credit markets or bank facilities, they must request cash from DLH if their cash needs exceed their respective cash balances. These advances would be funded by DLH first from available cash on hand, second from available Pool funds and third from bank credit or capital markets.

DLH opines that having their subsidiaries borrow from them rather than directly from the Pool poses less default risk to Pool participants. Since Pool participants cannot borrow directly from the Pool, the other Pool participants are not at risk should the borrowing affiliate be unable to meet its financial obligations. Having DLH, who has access to lines of credit and the capital markets, assume the default risk makes contributing to the Pool less risky. In this way, Duquesne Light is not exposed to risk from the smaller unregulated companies that participate in the Pool.

In addition to having minimal risk in participating in the Pool, DLH states that Duquesne Light receives cost benefits by participating in the Pool. Administrative cost benefits are achieved by not having to maintain separate brokerage accounts, lower bank settlement costs through book entry with affiliates, reduced transaction costs and lower bank services fees. Also, the additional interest paid by DLH on money borrowed from the Agent is used to cover the administrative costs of the Pool.

Our analysis and conclusions differ somewhat from those provided by
DLH. However, the Commission agrees that the Pool provides a cost benefit, and funds
contributed to the Pool by Duquesne Light are not being used to subsidize its unregulated affiliates. The Commission also concludes that the use of borrowed funds by DLH lacks transparency, and these borrowed funds may be used to support its non-regulated affiliates.

In analyzing the Pool data from April 2005 through September 2005, the data shows that Duquesne Light was always a net contributor to the Pool and tended to be the largest contributor to the Pool. DQE Capital Corporation was always a borrower from the Pool and tended to borrow an amount that exceeded Duquesne Light's contributions. In light of this information, it is possible that capital arbitrage could be taking place. However, it is difficult to monitor the flow of these funds because what DLH does with funds borrowed from the Pool is not readily transparent by viewing Pool data.

Upon further investigation, the Commission found that money being borrowed by DLH from the Pool is being borrowed at a rate similar to its external short term credit facility. Therefore, capital arbitrage between the regulated entity, Duquesne Light, and the unregulated subsidiaries participating in the Pool, does not occur if participating affiliates have similar risk profiles. That is, DLH and its unregulated affiliates gain no short-term rate advantage by borrowing from the Pool versus borrowing externally. Having DLH borrow internally rather than externally benefits all Pool members by providing additional funds that are used by the Agent to pay the administrative costs of the Pool. Had these funds been borrowed externally, benefits would accrue to DLH's lenders rather than internally to the DLH subsidiaries.

The Commission does agree with the assessment that the Pool provides benefits to Duquesne Light. Cost sharing through a single Agent, DQE Capital Corporation, helps to reduce administrative and transaction costs which in turn benefits Duquesne Light. There appears to be no additional exposure to default risk whether a

DLH affiliate borrows directly from the Pool, or indirectly, as is currently being done. Duquesne Light exposure to an affiliates' financial non-performance would be comparable in either case.

Additionally, if a company is reliant upon its corporate parent as the sole source of short-term financing, the company is exposed to the liquidity risk of its parent. Having access to its own bank credit facilities, Duquesne Light is not dependent upon DLH as its sole source of short-term financing. This minimizes any short-term liquidity risk exposure of Duquesne Light should DLH or one of its unregulated affiliates experience liquidity problems.

DLH affiliates are involved in the purchase of electricity and are therefore subject to a great deal of financial risk due to price volatility in these markets. Since funds from the Pool may be lent to these affiliates through DLH, the Commission is obliged to monitor the financial health of these affiliates and will request quarterly financial reporting to monitor the financial health of the DLH affiliates involved in the purchase and supply of electricity.

Lastly, the Commission concludes that there is no additional exposure to default risk for Duquesne Light to participate in the Pool because, in general, Duquesne Light's overall operations and structure are not ring-fenced from DLH. Since minimal structural separation exists between Duquesne Light and DLH, Duquesne Light's participation in the Pool will not increase the risk to the utility. As noted by Standard \& Poor's in their summary of Duquesne Light: "The ratings on electric utility Duquesne Light Co. reflect the consolidated credit profile of its parent, Duquesne Light Holdings Inc., and DLH's remaining riskier competitive businesses."

In summary, the Commission finds that:

- Pool participation by Duquesne Light provides some cost benefits and operating efficiencies to the company;
- Internal controls are in place so that funds borrowed by DLH are not being used to provide capital arbitrage between regulated and unregulated subsidiaries;
- Borrowing by DLH from the Pool does not provide adequate transparency in regards to the use of Pool funds.

Therefore, the Commission will approve Duquesne Light's participation in the Pool. However, we caution the company that in continuing its participation in the Pool, Duquesne Light and DLH and its unregulated affiliates must continue to follow the current guidelines presented in the body of this order. The Commission emphasizes that: 1) Duquesne Light must not provide funding to the Pool with externally borrowed funds; 2) DLH must continue to pay its external rate of interest on monies borrowed from the pool; and, 3) Duquesne Light should abide by all the guidelines as required by the DQE Capital Corporation Cash Pool operating agreement. Should the DQE Capital Corporation Cash Pool operating agreement change, Duquesne Light should notify the Commission of any change prior to implementing that change.

Additionally, as noted above, the use of the funds being borrowed by DLH is not readily transparent. Because of this lack of transparency, the Commission requests that on a quarterly basis DLH provide a summary detailing the use of borrowed funds.

The Commission has examined the Cash Pool arrangement and has determined that it appears to be reasonable and consistent with the public interest under Section 2102(b) of the Public Utility Code; however, approval of the Cash Pool
arrangement does not preclude the Commission from investigating during any formal proceeding the reasonableness of any charges under this arrangement; THEREFORE,

## IT IS ORDERED:

1. That the Affiliated Interest Agreement among Duquesne Light Company, Duquesne Light Holdings and its affiliates be, and hereby is, approved consistent with this Opinion and Order.
2. That acceptance does not preclude the Commission from investigating during any formal proceeding the reasonableness of any charges under the Agreement.
3. That Duquesne Light Company file with the Commission and provide to the Bureau of Fixed Utility Services a quarterly report that details the use of borrowed funds by Duquesne Light Holdings from the Cash Pool. Reports will be due 60 days following the end of each quarter beginning with the quarter ended December 31, 2006.
4. That Duquesne Light Company file with the Commission and provide to the Bureau of Fixed Utility Services quarterly financial reports including income statement, balance sheet and cash flow statement of the energy supply affiliates of Duquesne Light Holdings. Reports will be due 60 days following the end of each quarter beginning with the quarter ended December 31, 2006.
5. That the case be marked closed.

## BY THE COMMISSION,



James J. McNulty
Secretary

## (SEAL)

ORDER ADOPTED: November 9, 2006 ORDER ENTERED:

NOV 092006

Our Energy...Your Power
Richard S. Herskovitz Assistant General Counsel

411 Seventh Avenue $8^{\text {th }}$ Floor
Pittsburgh, PA 15219

Tel 412-393-3662
Fax 412-393-5602
rherskovitz@dualight.com

October 7, 2005

## VIA OVERNIGHT MAIL

James J. McNulty, Secretary
Pennsylvania Public Utility Commission
Commonwealth Keystone Building, $2^{\text {nd }}$ Floor
400 North Street
Harrisburg, PA 17120

## Re: Application of Duquesne Light Company For Approval of Affiliated Interest Arrangement Docket No.

Dear Secretary McNulty:
Enclosed for filing on behalf of Duquesne Light Company ("Duquesne") are the original and three (3) copies of an Application for Approval Nuns Pro Tune of an Affiliated Interest Arrangement between Duquesne and its affiliates. Specifically, this Application, filed pursuant to 66 Pa . C.S. $\S 2102$ of the Public Utility Code, requests Commission approval of Duquesne's participation in a cash pool arrangement among its affiliates.

Please date stamp the fourth copy of this Application enclosed, and kindly return it to me in the self-addressed stamped envelope for my file.

Thank you.

Very truly yours,
Rolherskourts
Richard S. Herskovtz
Enclosures

## BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

| Application of Duquesne Light | $:$ |  |
| :--- | :---: | :--- |
| Company for approval of an | $\vdots$ |  |
| Affiliated Interest Arrangement | $\vdots$ | Docket No. |
| Between Duquesne Light Company | $:$ |  |
| And Affiliated Companies | $:$ |  |
| (Cash Pool Arrangement) | $:$ |  |

## Affiliated Interest Application

(66 Pa. C. S. Section 2102)

Duquesne Light Company ("Duquesne") requests approval Nunc Pro Tunc, pursuant to Section 2102 of the Public Utility Code ("Code"), 66 Pa. C. S. §2102, of its participation in a cash pool arrangement among its affiliates, and sets forth the following in support thereof:

1. The name and address of the Applicant is:

Duquesne Light Company
411 Seventh Avenue
Pittsburgh, PA 15219
2. The name and address of the Applicant's attorney are:

Richard S. Herskovitz
Assistant General Counsel
411 Seventh Avenue, Mail Drop 8-2
Pittsburgh, PA 15219
Phone: 412-393-3662
Fax: 412-393-5602
E-mail: rherskovitz@duqlight.com
3. Duquesne is a duly incorporated Pennsylvania public utility engaged in the distribution of electric service to the public, primarily within Allegheny and Beaver Counties, Pennsylvania, in an area of approximately 800 square miles. Duquesne's corporate headquarters is located at 411 Seventh Avenue, Pittsburgh, PA 15219.
4. Duquesne Light Holdings, Inc. ("DLH"), formerly known as DQE, Inc. the parent company of Duquesne, established a Cash Pool ("Pool") in November, 1997. The Pool was established as a mechanism to concentrate excess funds and combine the cash of DLH and its subsidiaries to invest in short-term investments not previously available to Pool participants. The Pool is a more efficient method of managing the funds of the subsidiaries and will result in higher returns for investing members. A complete description of the operation of the Pool is attached as Exhibit A.
5. Members of the Pool are DLH and its wholly owned, direct or indirect, subsidiaries. Currently, DQE Capital Corporation, another subsidiary of DLH, acts as Agent for the members and administers the Pool. Duquesne became a member of the Pool in July, 2000.
6. In the Public Utility Commission's most recent Management Audit of Duquesne (field work commencing in August, 2004 and ending in March, 2005), the Auditors investigated whether Duquesne's participation in the Pool had been approved by the Commission under the affiliated interest provisions of the Code. Duquesne contended that its participation in the Pool was authorized by the Company's Administrative Services Agreements ("ASA"), which was previously approved by the Commission. Although a final report of the audit has nót yet been issued, the Auditors have indicated that, in their opinion, the ASA did not contain such an authorization.
7. Although Duquesne disputed the Auditors' conclusion, the Company has agreed to file for approval of its membership and participation in the Pool under the affiliate provisions of the Code.'

[^5]8. Membership and participation by Duquesne in the Pool is reasonable and in the public interest because it enhances investment returns and reduces the number and costs of investment transactions.

WHEREFORE, Duquesne respectfully requests the Commission to approve Duquesne's membership and participation in the subject Cash Pool arrangement, retroactive to July, 2000.

Dated: October 7, 2005


## AFFIDAVIT

I, Mark E. Kaplan, being duly sworn (affirmed) according to law, depose and say that I am authorized to make this affidavit on behalf of Duquesne Light Company, being the holder of the office of Senior Vice President and Chief Financial Officer with that Company, and that the facts above set forth are true and correct to the best of my knowledge, information and belief, and the Company expects to be able to prove the same at any hearing hereof.


Sworn and subscribed before me this 居有 day of Ceteber, 2005.


## Duquesne Light Holdings CASH POOL

The Duquesne Light Holdings ("Holdings") Cash Pool ("Pool") is a mechanism to concentrate excess funds and combine the cash of Holdings and its subsidiaries to invest in short-term investments not previously available to Pool participants. The Pool is a more efficient method of managing the funds of the subsidiaries and will result in higher returns for participants.

Participants of the Pool include Holdings and its wholly owned, direct or indirect, subsidiaries. Holdings or one of its subsidiaries will act as Agent ("Agent") for the participants and will administer the Pool. DQE Capital Corporation is currently the Agent.

The cash position of the Pool participants will be determined by the Agent on a daily basis. The cash position of each participant will be reported on a regular basis by the Agent.

Each Pool participant will provide for the funding of its cash requirements through sources currently available. These sources include, but are not limited to, normal operating receipts, external borrowings against established lines of credit, sales of commercial paper, etc. or contributions by Holdings. However, the Agent is permitted to borrow from the Pool to facilitate intercompany borrowing arrangements and operating requirements. Due to the timing of receipt of funds and disbursement thereof, any excess cash will become part of, and will be invested through the Pool.

## (Page 2)

When cash is available, it will be invested in the approved investments shown below. The approved investments are consistent with the Duquesne Light Holdings Short Term Investment Policy as in effect at the time to provide a high degree of safety, liquidity and, to a lesser extent, yield. The interest income resulting from the investments will be accrued and allocated to the participants in the Pool on a daily basis. Interest will be paid on the fifth day of the month following the monthly earnings period.

The following investments are permissible:

1) Direct or indirect obligations of the United States of America
2) Repurchase Agreements, Loan Participations, Commercial Paper, Certificates of Deposit, and Bankers Acceptances
3) Euro Time Deposits
4) Tax Exempt Notes, Commercial Paper or Bonds
5) Auction Rate Preferred Stock
6) Money Market Funds

Specific characteristics as to credit quality, maturities and investment limits are outlined in Duquesne Light Holdings Short Term Investment Policy and should be referred to when investing the Pool's cash.

The XRT Treasury Workstation software (XRT TWS), or its successor, will be used to account for the Pool transactions and to calculate and allocate internal and external expense/income.

A copy of the activity detail report reflecting transactions, balances and expense/income is attached.

Direct input to be provided by each of the participants is:
(1) Anticipated deposits for the current day;
(2) Wire transfers (outbound and inbound) for the current day;

## (Page 3)

(3) Five (5) week cash forecast;
(4) Four (4) days notice for investments, acquisitions or other expenditures of a capital nature.

The Agent will provide the daily investment rate. The rate will be the composite external investment rate earned on such investments and will be used as the earnings rate within the Pool.

The software will calculate the daily balances for each participant as well as funds contributed and withdrawn. The interest accrual calculation for each participant's transactions is calculated as follows:

Day's balance $x$ interest rate $/ 360$ days $=$ daily accrual

## ATTACHMENTS:

(A) Participant Bank Account Flowchart
(B) Participant Inter-company Activity Detail Report
Q.9. Prepare a detailed schedule for the test year showing types of social and service organization memberships paid for, the cost thereof, the accounting treatment and whether included in claimed test year expenses.
A.9. Attachment II-D-9 presents the social and service organization memberships to be paid for in the test years. Memberships paid for an annual period are accrued as prepaid expenses and amortized over the life of the membership period. Those memberships not included in claimed test year expenses are detailed on attachment II-D-9.

## Duquesne Light Company Social and Services Memberships For the Period (in thousands)

|  | 12 Months <br> Ending 12/31/2021 |  | 12 Months <br> Ending 12/31/2022 |  |
| :---: | :---: | :---: | :---: | :---: |
| Edison Electric Institute | \$ | 286 | \$ | 295 |
| Gartner |  | 286 |  | 289 |
| Energy Association of Pennsylvania |  | 80 |  | 82 |
| Electric Power Research Institute |  | 72 |  | 74 |
| Woods Mackenzie |  | 69 |  | 73 |
| Distribution Operations and Planning |  | 65 |  | 65 |
| SNL Financial Services |  | 50 |  | 52 |
| North American Transmission Forum |  | 46 |  | 46 |
| National Cyber Forensics Training Alliance |  | 30 |  | 30 |
| Sustainability Industry Memberships |  | 30 |  | 30 |
| Western Energy Insititute |  | 29 |  | 29 |
| Bloomberg Finance |  | 26 |  | 26 |
| Electricity Industry Center |  | 25 |  | 25 |
| Conference Board Membership |  | 15 |  | 15 |
| Distributed Energy Financial Group |  | 15 |  | 15 |
| Chartwell |  | 13 |  | 13 |
| PA Business Roundtable |  | 12 |  | 12 |
| PA Chamber of Business \& Industry |  | 12 |  | 12 |
| Itron |  | 12 |  | 12 |
| Capital IQ |  | 11 |  | 11 |
| Smart Grid |  | 10 |  | 10 |
| Smart Electric Power Alliance |  | 10 |  | 10 |
| Utility Solid Waste Activities Group |  | 10 |  | 10 |
| Restore Program |  | 10 |  | 10 |
| Tristate Infrastructure Council |  | 8 |  | 8 |
| Spare Transformer Equipment Program |  | 8 |  | 8 |
| PICPA |  | 7 |  | 7 |
| Pittsburgh Technology Council |  | 5 |  | 5 |
| Riversweep Corporate Sponsorship |  | 5 |  | 5 |
| All Other |  | 76 |  | 76 |
| Total Social and Services Memberships | \$ | 1,330 | \$ | 1,354 |
| Social and Services Memberships Excluded in Claimed Test Year Expenses |  |  |  |  |
| Ballast Research |  | 125 |  | 125 |
| PA Chamber of Business \& Industry |  | 5 |  | 5 |
| PA Business Roundtable |  | 3 |  | 3 |
| Below the Line Expenses Recorded Above | \$ | 133 | \$ | 133 |
| Total Social and Services Memberships included in | \$ | 1,196 | \$ | 1,220 |

Q.10. Provide the following payroll and employee benefit data - regular and overtime separately for the test year and the 12 -month period immediately prior to the test year:
a. The average and year-end number of employees and the unadjusted annual payroll expense and employee benefit expense associated with union personnel.
b. The average and year-end number of employees and the unadjusted annual payroll expense and employee benefit expense associated with nonunion personnel.
c. The average and year-end number of employees and the unadjusted annual payroll expense and employee benefit expense associated with management employees, if different than $b$.
d. A summary of the wage rate, salary and employee benefit changes granted or to be granted during the year.
e. The claimed test year payroll expense and employee benefit expense.
f. The percentage of payroll expense and employee benefit expense applicable to operation and maintenance expenses and the basis thereof.
A.10. Attachment DFR-II-D-10 provides the Company's requested data.

|  | $\begin{gathered} 1 / 2020-12 / 2020 \\ (\$ 000 ' s) \end{gathered}$ |  | $\begin{gathered} \text { 1/2021-12/2021 } \\ (\$ 000 ' s) \end{gathered}$ |  | $\begin{gathered} 1 / 2022-12 / 2022 \\ (\$ 000 ' s) \end{gathered}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| a. Union Personnel |  |  |  |  |  |  |
| Average Number of Employees |  | 820 |  | 833 |  | 818 |
| Year-End Number of Employees |  | 821 |  | 833 |  | 817 |
| Payroll Costs |  |  |  |  |  |  |
| Normal | \$ | 75,457 | \$ | 78,766 | \$ | 84,881 |
| Overtime | \$ | 29,447 | \$ | 22,825 | \$ | 22,456 |
| Benefit Costs | \$ | 26,917 | \$ | 26,220 | \$ | 27,112 |
| b. Non-Union Personnel |  |  |  |  |  |  |
| Average Number of Employees |  | 753 |  | 805 |  | 820 |
| Year-End Number of Employees |  | 763 |  | 819 |  | 825 |
| Payroll Costs |  |  |  |  |  |  |
| Normal | \$ | 92,183 | \$ | 98,511 | \$ | 105,257 |
| Overtime | \$ | 4,400 | \$ | 3,411 | \$ | 3,356 |
| Benefit Costs | \$ | 28,949 | \$ | 28,193 | \$ | 29,118 |

Note: Benefit costs were allocated based on the normal wage costs because costs are basically the same for both union and non-union personnel.

Historical and future year benefits for union personnel include $\$ 7,241, \$ 4,909$ and $\$ 4,014$ attributable to pension expenses respectively.

Historical and future year benefits for non-union personnel include $\$ 7,788, \$ 5,279$ and $\$ 4,311$ atributable to pension expenses respectively.
c. Same as b.
d. Wage Rate Changes

Union

| Rate |  | $3.0 \%$ | $3.0 \%$ |  | $2.75 \%$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Annualized Impact | $\$$ | 2,264 | $\$$ | 2,363 | $\$$ |

Note: Union wage rate increases are effective October 1st of each year. The union contract expires 9/30/2023 and wage rate increases have been negotiated as of the date of this filing for 2021.

Non-Union

|  |  | $3.0 \%$ |  | $3.0 \%$ | $2.75 \%$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Rate | $\$$ | 2,765 | $\$$ | 2,955 | $\$$ |

## Benefit Changes

Note: Benefits remain unchanged, other than the cost of providing them to employees.
e. Claimed for Test Year (excluding any pro-forma adjustments)

| Payroll Expense | $\$$ | 97,507 | $\$$ | 103,866 | $\$$ | 105,860 |
| :--- | :--- | :--- | :--- | ---: | ---: | ---: |
| Benefit Expense | $\$$ | 22,813 | $\$$ | 28,037 | $\$$ | 32,470 |

Note: $\quad$ Historical and future years benefit expense includes $\$ 5,000, \$ 18,500$ and $\$ 5,000$ attributable to pension expense respectively.
f. Percent applicable to O\&M

| Payroll Expense | $48.4 \%$ | $51.0 \%$ | $49.0 \%$ |
| :--- | :--- | :--- | :--- |
| Benefit Expense | $40.8 \%$ | $51.5 \%$ | $57.7 \%$ |

Note: $\quad$ The charge to expense is based on activities performed or expected to be performed during the applicable years.
Q.11. Describe costs relative to leasing equipment, including computer rentals, and office space, including terms and conditions of the leases. State method for calculating monthly or annual payments.
A.11. Attachment II-D-11 provides the costs, terms and conditions of Duquesne Light's major leasing agreements as of December 31, 2020.

| Lessor | Item Leased | Term | Expense for 12 Months Ending 12/31/2020 | Method of Calculating Payment |
| :---: | :---: | :---: | :---: | :---: |
| 411 Seventh Ave. Associates, L.P. | 411 7th Ave |  |  | (a) |
| Buncher Associates | New Manchester |  |  | (b) |
| Expedient | Data Center lease |  |  | (b) |
| ComDoc | Copiers |  |  | (b) |
| Associated Pennsylvania Constructors | Harrisburg Office Space |  |  | (b) |
| City of Pittsburgh | Land for Substation (Oakland) |  |  | (b) |
| Mailfinance | Preble Avenue |  |  | (b) |

(a) Rent agreement contains planned escalation of square footage charge; however, rent expense is recognized on a levelized basis.
(b) Monthly payment set in original lease.
Q.12. Submit a statement of past and anticipated changes, since the previous rate case, in major accounting procedures, explain any differences between the basis or procedure used in allocations of revenues, expenses, depreciation and taxes in the current rate case and that used in the prior rate cases, and list all internal and independent audit reports for the most recent 2 year period.
A.12. Attachment II-D-12a provides a list of major accounting changes since Duquesne Light Company's last base rate case. Attachment II-D-12b provides a list of internal audits performed for Duquesne Light Company in 2019 and 2020. Attachment II-D-12c provides a list of third-party audits performed for Duquesne Light Company in 2019 and 2020.

# Duquesne Light Company <br> Accounting Changes Since Duquesne Light Company's Last Base Rate Case 

## 2018:

In May 2014, the FASB issued ASU No. 2014-09, "Revenue from Contracts with Customers," requiring entities to recognize revenue by applying a five-step model in accordance with the core principle to depict the transfer of promised goods or services to customers in an amount that reflects the consideration to which the entity expects to be entitled in exchange for those goods or services. The Company adopted this standard as of January 1, 2018 utilizing the full retrospective adoption method. Transition to the new revenue standard did not result in any material adjustments to historical balances and the Company expects the adoption of the new standard to have an immaterial impact to results of operations on an ongoing basis. In accordance with the new provisions of this standard, the Company has included enhanced quantitative and qualitative disclosures.

In November 2016, the FASB issued ASU No. 2016-18, "Statement of Cash Flows: Restricted Cash," which requires the inclusion of restricted cash within total cash and cash equivalents when reconciling the beginning and ending period cash balances in the consolidated statements of cash flows. Transfers between cash and cash equivalents and restricted cash are no longer presented as cash flow activity. The Company retroactively adopted this standard as of January 1, 2018. The implementation of this ASU had no retroactive impact to cash flows from operating, investing or financing activities for the year ended December 31, 2017.

In March 2017, the FASB issued ASU No. 2017-07, "Retirement Benefits: Improving the Presentation of Net Periodic Pension Cost and Net Periodic Postretirement Benefit Cost," which requires the service cost component of net periodic benefit cost to be disaggregated from other components of net periodic benefit cost and presented in the same line on the consolidated statement of operations as other employee compensation costs arising from services rendered during the period. The other components of net periodic benefit costs are required to be presented separately outside of operating income. Additionally, only the service cost component is eligible for capitalization. The Company adopted this standard as of January 1, 2018. The presentation of the components of net periodic benefit costs on the consolidated statement of operations was applied retrospectively. The guidance that limits the capitalization to the service cost component of net periodic benefit costs was applied prospectively. The adoption of this standard resulted in an increase to operating income of $\$ 9.9$ million, a decrease to investment and other income (loss) of $\$ 9.9$ million and no change to net income on the Company's consolidated statement of operations for the year ended December 31, 2017.

2019:
In February 2016, the FASB issued ASU No. 2016-02, "Leases," which requires lessees to recognize a lease liability and a right-of-use asset for all leases, including operating leases, with a term greater than twelve months on the balance sheet. The Company adopted this standard as of January 1, 2019 utilizing the modified retrospective transition method. As most of the Company's leases do not provide an implicit rate, the Company took the portfolio approach of applying its incremental borrowing rate based on the information available at the adoption date to calculate the present value of lease payments over the lease term. The Company elected the package of practical expedients permitted under the transition guidance within the new standard, which allowed the Company (i) to not reassess whether any expired or existing contracts are or contain leases, (ii) to not reassess the lease classification for any expired or existing leases and (iii) to not reassess initial direct costs for any existing leases. The Company also elected the practical expedient to not evaluate land easements that existed or expired before the entity's adoption of this standard and the practical expedient to not separate lease and non-lease components, that is, to account for lease and non-lease components in a contract as a single lease component for all classes of underlying assets. Further, the Company
made an accounting policy election to keep leases with an initial term of twelve months or less off of the balance sheets. The adoption of this standard resulted in the recognition of $\$ 34.9$ million of operating lease right-of-use assets within other non-current assets, $\$ 5.0$ million of current operating lease liabilities within other current liabilities and $\$ 29.9$ million of operating lease liabilities within noncurrent liabilities on the balance sheet as of December 31, 2018. In accordance with the new provisions of this standard, the Company has included enhanced quantitative and qualitative disclosures in its notes to the financial statements.

In February 2018, the FASB issued ASU No. 2018-02, "Reclassification of Certain Tax Effects from Accumulated Other Comprehensive Income," which allows for a reclassification from accumulated other comprehensive income to retained earnings for stranded tax effects resulting from the 2017 Tax Cuts and Jobs Act (TCJA), eliminating any stranded tax effects associated with accumulated other comprehensive income. The Company adopted this standard as of January 1, 2019 and elected to present the change in the period of adoption. As a result, the Company recognized a $\$ 0.1$ million cumulative effect adjustment for stranded tax effects from accumulated other comprehensive income to retained deficit.

## 2020:

In August 2018, the FASB issued ASU No. 2018-14, "Compensation-Retirement BenefitsDefined Benefit Plans-General (Subtopic 715-20)," to improve the effectiveness of disclosures in the notes to the financial statements by facilitating clear communication of the information required by GAAP. The amendments modify the disclosure requirements for employers that sponsor defined benefit pension or other postretirement plans. These changes will be effective for fiscal years ending after December 15, 2020. The Company adopted this standard as of January 1, 2020 utilizing the retrospective method of adoption.

# Duquesne Light Company Internal Audit Services Reports Issued 

| Date Issued | Title |
| :--- | :--- |

## Year 2019

02/21/2019
02/25/2019

02/27/2019
02/27/2019
02/27/2019
03/04/2019
03/08/2019
03/08/2019
05/06/2019
06/28/2019
07/22/2019
07/30/2019
07/30/2019
09/17/2019
11/22/2019
11/22/2019
11/25/2019
12/02/2019
12/04/2019

Debt Issuance and Compliance Review
DQE Communications - Revenue Recognition and Sales Commissions
Review
Cash Management and Reconciliation Review
Inventory Cycle Count Review
Safety, Health and Environmental Review
Information Technology Change Management Report
Customer Billing Review
Mobile Security Review
Medical Claims Payment Process Report
Payment Processing Review
Social Media Review
Business Risk and Insurance Process Review
Purchase of Receivables Review
Accounts Payable Review
Information Security Review - Penetration Testing
Wesco Vendor Review
IT Project Management Methodology Review
Ethics Hotline and Compliance Training Process
Logical Security Report

## Year 2020

02/26/2020
02/25/2020
02/26/2020
03/02/2020
04/29/2020
05/06/2020
08/14/2020
08/14/2020

Corporate Contributions Review
IT Infrastructure Asset Management Process - Strategy and Governance Physical Security Review
PJM Settlement and POLR Auction Review
Storm Plan and Mutual Assistance Review
Transportation Fuel Usage Review
Business Travel and Expense Reimbursement Review
Inventory Cycle Count Report

08/14/2020
08/14/2020
10/30/2020
12/07/2020

Smart Meter Surcharge Review
Random Drug Testing Review
Software Licensing
Data Management - Empyrean Application

# Duquesne Light Company Third-Party Audit Reports Issued 

## List of Third-Party Financial Statement Audit Reports/OnGoing Audits

## 2019

## Deloitte \& Touche LLP

- Independent Auditors' Report of the Financial Statements of the DQE Holdings LLC and subsidiaries, Duquesne Light Holdings, Inc. and subsidiaries and Duquesne Light Company and subsidiaries as of and for the year ended December 31, 2019.
- Independent Auditors' Report of the Regulatory Financial Statements, included in FERC Form 1 of Duquesne Light Company as of and for the year ended December 31, 2019.


## Baker Tilly Virchow Krause, LLP

- Independent Auditors' Report of the Financial Statements of the Duquesne Light Holdings, Inc. 401(k) Retirement Savings Plan and the Duquesne Light Company 401(k) Retirement Savings Plan for IBEW Represented Employees as of and for the year ended December 31, 2019.
- Independent Auditors' Report for the Financial Statements of the Duquesne Light Company Medical Benefits Plan for IBEW Represented Employees and Duquesne Light Holdings, Inc. Medical Benefits Plan as of and for the year ended December 31, 2019.
- Independent Auditors' Report on the Financial Statements of the Duquesne Light Company Defined Benefit Retirement Plan as of and for the year ended December 31, 2019.


## 2020

## Deloitte \& Touche LLP

- Independent Auditors' Report of the Financial Statements of the DQE Holdings LLC and subsidiaries, Duquesne Light Holdings, Inc. and subsidiaries and Duquesne Light Company and subsidiaries as of and for the year ended December 31, 2020.
- Independent Auditors' Report of the Regulatory Financial Statements, included in FERC Form 1 of Duquesne Light Company as of and for the year ended December 31, 2020.


## Duquesne Light Company

## Third-Party Audit Reports Issued

## List of Third-Party Tax Audit Reports/On-Going Audits

- None


## List of Third-Party Regulatory Audit Reports/On-Going Audits

## Pennsylvania Public Utility Commission

- Bureau of Audit's audit of Management and Operations. (Issued on July 3, 2019)
- Bureau of Audit's Report on the Transmission Service Charge for the twelve month periods ended February 28, 2016 and February 2017. (Issued on April 16, 2020)
- Bureau of Audit's Report on the Default Service Supply Charge for the twelve month periods ended January 31, 2016 and January 31, 2017. (Issued on April 16, 2020)
- Bureau of Audit's Report on the Universal Service Charge for the twelve month periods ended October 31, 2015 and October 31, 2016. (Issued on April 16, 2020)
- Bureau of Audit's Report on the Smart Meter Charge for the twelve month periods ended June 30, 2015 and June 30, 2016. (Issued on March 12, 2020)
- Bureau of Audit's Report on the Energy Efficiency and Conservation Surcharge for the twelve month period ended May 31, 2015 and the ten month period ended March 31, 2016. (Issued on March 26, 2020)
- Bureau of Audit's Report on the Transmission Service Charge for the twelve month periods ended February 28, 2018, February 28, 2019 and February 29, 2020 (Audit on-going)
- Bureau of Audit's Report on the Default Service Supply Charge for the twelve month periods ended January 31, 2018, January 31, 2019 and January 31, 2020 (Audit on-going)


## North American Electric Reliability Corporation via ReliabilityFirst Corporation

- None
Q.13. Regardless of whether a claim for negative or positive net salvage is made, attach an exhibit showing gross salvage, cost of removal, third party reimbursements, if any, and net salvage for the test year and 4 previous years.
A.13. Attachment II-D-13 provides Duquesne Light Company's claimed negative net salvage provision.


## DUQUESNE LIGHT COMPANY

Negative Net Salvage
(Thousands of Dollars)

| 12 Months Ending | Cost of Removal |  | Gross Salvage |  | Cost of Gross Negative |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| December 31, 2018 | \$ | 11,435 | \$ | $(5,676)$ | \$ | 5,759 |
| December 31, 2019 |  | 13,476 |  | $(4,011)$ |  | 9,465 |
| December 31, 2020 |  | 13,670 |  | $(3,830)$ |  | 9,840 |
| December 31, 2021 |  | 17,087 |  | $(7,430)$ |  | 9,657 |
| December 31, 2022 |  | 15,174 |  | $(9,614)$ |  | 5,560 |
| Total for 5-year period ending December 31, 2022 | \$ | 70,842 | \$ | $(30,561)$ | \$ | 40,281 |
|  | Five-year average |  |  |  | \$ | 8,056 |
| Negative Net Salvage Claim |  |  |  |  | \$ | 8,056 |

Q.14. State the amount of debt interest utilized for test year income tax calculations, including the amount so utilized which has been allocated from the debt interest of an affiliate, and provide details of debt interest and allocation computations.
A.14. Duquesne Light Company does not utilize any debt interest, which has been allocated from the debt interest of an affiliate, in the computation of taxable income. In determining the interest expense deduction to be used in the income tax calculations for the test year, Duquesne Light has used the interest synchronization method that has been adopted by the Commission. The calculation of interest utilized for the income tax calculations is set forth on Schedule D-18 in DLC Exhibits 2 (Fully Projected Future Test Year), Exhibit 3 (Future Test Year) and Exhibit 4 (Historic Test Year).
Q. 15 Provide a schedule for the test year of Federal and Pennsylvania taxes other than income taxes, per books, pro forma at present rates, and pro forma at proposed rates, including the following categories:
a) Social security
b) Unemployment
c) Capital stock
d) Public utility
e) PUC assessment
f) Other property taxes
g) Any other appropriate categories
A.15. DFR II-D-15 Attachment provides a schedule of taxes other than income.

(1) - DLC Exhibit 3 (Future Test Year) D-20, column 5
(2) - Jurisdictional Separation Study Exhibit No 6
(3) - DLC Exhibit 3 (Future Test Year) D-1

## Duquesne Light Company

Schedule of taxes other than income
Fully Projected Future Test Year Ended December 31, 2022
(\$ in Thousands)

(1) - DLC Exhibit 2 (Fully Projected Future Test Year) D-20, column 5
(2) - Jurisdictional Separation Study Exhibit No 6
(3) - DLC Exhibit 2 (Fully Projected Future Test Year) D-1
Q.16. Submit a schedule showing the adjustments from taxable net income per books to taxable net income pro forma under existing rates and pro forma under proposed rates, together with an explanation of all normalizing adjustments. Submit detailed calculations supporting taxable income before State and Federal income taxes where the income tax is subject to allocation due to operations in another state or due to operation of other taxable utility or non-utility business, or by operating divisions or areas.
A.16. Detailed calculations supporting taxable income of Duquesne Light Company are shown on Schedule D-18 in DLC Exhibits 2 (Fully Projected Future Test Year), Exhibit 3 (Future Test Year) and Exhibit 4 (Historic Test Year).
Q. 17 Submit a schedule showing for the last 5 years the income tax refunds, plus interest-net of taxes, received from the Federal government due to prior years' claims.
A. 17 The consolidated group has not received any federal income tax refunds for taxes paid during the prior 5 years. See DFR II-D-17 - Attachment for a schedule of tax refund received in 2017 associated with the tax year ending December 31, 2007.

## Attachment II-D-17

Page 1 of 1

DQE HOLDINGS LLC
IRS REFUND RECEIVED
PRIOR YEAR CLAIMS

| Tax Year <br> Ending | Year <br> Received | Tax | Interest | Total |
| :---: | :---: | :---: | :---: | :---: |
| $12 / 31 / 2007$ | 2017 | $5,787,281$ | 372,014 | $6,159,295$ |

[1] Federal income tax paid in 2007 refunded due to 2009 NOL carryback claim. No other income tax refunds received from the Federal government in the last 5 years.
Q. 18 Furnish a breakdown of major items comprising prepaid and deferred income tax charges and other deferred income tax credits, reserves and associated reversals on liberalized depreciation.
A. 18 DFR II-D-18 - Attachment provides a breakdown of the major items comprising prepaid and deferred income tax charges and other deferred income tax credits as reflected on the Company's balance sheet.

| Line \# | FERC Account 190 | $\begin{gathered} \text { HTY } \\ 12 / 31 / 2020 \\ \hline \end{gathered}$ | $\begin{gathered} \text { FTY } \\ 12 / 31 / 2021 \\ \hline \end{gathered}$ | $\begin{gathered} \text { FPFTY } \\ 12 / 31 / 2022 \\ \hline \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: |
| 1 | Accrued Misc. Reserves Total | 4,386,898 | 4,386,898 | 4,386,898 |
| 2 | Payroll Deferral Total | 2,143,558 | 2,143,558 | 2,143,558 |
| 3 | Accrued Pensions Total | 39,887,986 | 39,887,986 | 39,887,986 |
| 4 | Accrued Sales and Use Tax Total | 276,467 | 276,467 | 276,467 |
| 5 | Bad Debt Reserve Amortization Total | 8,578,719 | 8,578,719 | 8,578,719 |
| 6 | Legal Accrual Total | 293,392 | 293,392 | 293,392 |
| 7 | Other Benefit Costs Total | 8,412,445 | 8,412,445 | 8,412,445 |
| 8 | Provision for Injuries and Damages Total | 1,313,746 | 1,313,746 | 1,313,746 |
| 9 | Reserve for Compensated Abscences Total | 1,720,495 | 1,720,495 | 1,720,495 |
| 10 | Reserve for HealthCare Total | 404,489 | 404,489 | 404,489 |
| 11 | Reserve for Legacy Issues Total | 472,566 | 472,566 | 472,566 |
| 12 | Reserve for Warwick Mine Liability Total | 3,512,537 | 3,512,537 | 3,512,537 |
| 13 | Vacation Pay Total | 669,812 | 669,812 | 669,812 |
| 14 | Deferred Credits | 351,084 | 351,084 | 351,084 |
| 15 | Other | 4,373,275 | 4,373,275 | 4,373,275 |
| 16 | Operating Lease Right of Use - Liability | 7,131,904 | 7,131,904 | 7,131,904 |
| 17 | FAS 109 Gross Up Total | 25,425,390 | 20,014,908 | 15,983,550 |
| 18 | FAS 109 Increment Total | 62,575,792 | 49,259,766 | 39,337,974 |
| 19 | Total Account 190 (Sum L1-L16) | 171,930,555 | 153,204,047 | 139,250,897 |
|  | FERC Account 282 |  |  |  |
| 20 | Normalized Property Total | (679,684,837) | (675,431,641) | (671,093,350) |
|  | FERC Account 283 |  |  |  |
| 21 | Amortization of Loss on Reaquisition Total | $(4,798,044)$ | $(4,798,044)$ | $(4,798,044)$ |
| 22 | Compensated Absences Total | $(1,720,495)$ | $(1,720,495)$ | $(1,720,495)$ |
| 23 | Partnership Investments Total | $(972,519)$ | $(972,519)$ | $(972,519)$ |
| 24 | Prepaid Pension Costs Total | $(74,938,529)$ | $(74,938,529)$ | $(74,938,529)$ |
| 25 | Operating Lease Right of Use - Assets | $(7,131,904)$ | $(7,131,904)$ | $(7,131,904)$ |
| 26 | Reg Assets Total | (9,375,123) | $(9,375,123)$ | ( $9,375,123$ ) |
| 27 | Total Account 283 (Sum L19-L23) | (98,936,614) | (98,936,614) | (98,936,614) |
| 28 | Total Accumulated Deferred Income Taxes ( $\mathrm{L} 17+\mathrm{L} 18+\mathrm{L} 24$ ) | (606,690,896) | (621,164,208) | $(630,779,067)$ |

Q.19. Explain how the Federal corporate graduated tax rates have been reflected for rate case purposes. If the Pennsylvania jurisdictional utility is part of a multi-corporate system, explain how the tax savings are allocated to each member of the system.
A.19. The Tax Cut and Jobs Act of 2017 (TCJA) reduced the corporate income tax rate from 35 percent to 21 percent and eliminated the graduated corporate rate schedule.

DQE Holdings LLC, the parent of the affiliated group, has chosen for book purposes and all other purposes to allocate consolidated Federal Income Tax among all companies based on net taxable income or loss and credits of each subsidiary on a separate return basis.
Q.20. Explain the treatment given to the cost of removal in the income tax calculation and the basis for such treatment.
A.20. Duquesne Light Company adheres to the treatment provided in section 1.167(a)-11(d)(3) of the IRS regulations related to ADR property which provides: "The cost of dismantling, demolishing, or removing an asset in the process of retirement from the vintage account shall be treated as an expense deductible in the year paid or incurred, and such costs shall not be subtracted from the depreciation reserve for the account." This applies to ADR property acquired after December 31, 1970.

For consistency, Duquesne Light requested and was granted permission from the IRS to deduct as expense all removal costs applicable to property retired after December 31, 1971. This accounting change applied to all property retired after December 31, 1971, regardless of when it was acquired or the method of depreciation used to recover the expenditures. Duquesne Light has consistently followed this method of accounting on all income tax returns filed since 1972.

## Question:

Q. 21 Show income tax loss/gain carryovers from previous years. Show loss/gain carryovers by years of origin and amounts remaining by years at the beginning of the test year.
A. 21 Duquesne Light Company does not have any federal or state net operating loss carryovers.
Q.22. State whether the company eliminates tax savings by the payment of actual interest on construction work in progress not in the rate base claim. If response is affirmative:
a) Set forth amount of construction claimed in this tax savings reduction, and explain the basis for this amount.
b) Explain the manner in which the debt portion of this construction is determined for purposes of the deferral calculations.
c) State the interest rate used to determine the tax savings reduction, and state whether State taxes are increased to reflect the construction interest elimination.
d) Provide details of calculation to determine tax savings reduction, and state whether State taxes are increased to reflect the construction interest elimination.

## A.22. The Company does not.

Q. 23 Under section 1552 of the Internal Revenue Code (26 U.S.C.A. §1552) and 26 CFR 1.1552-1 (1983), if applicable, a parent company, in filing a consolidated income tax return for the group, must choose one of four options by which it must allocate total income tax liability of the group to the participating members to determine each member's tax liability to the Federal government (if this interrogatory is not applicable, so state):
a. State what option has been chosen by the group.
b. Provide, in summary form, the amount of tax liability that has been allocated to each of the participating members in the consolidated income tax return for the test year and the most recent 3 years for which data is available.
c. Provide a schedule, in summary form, of contributions, which were determined on the basis of separate tax return calculations, made by each of the participating members to the tax liability indicated in the consolidated group tax return. Provide total amounts of actual payments to the tax depository for the tax year, as computed on the basis of separate returns of members.
d. Provide the most recent annual income tax return for the group.
e. Provide details of the amount of the net operating losses of any member allocated to the income tax returns of each of the members of the consolidated group for the test year and the 3 most recent years for which data is available, together with a summary of the actual tax payments for those years.
f. Provide details of the amount of net negative income taxes, after all tax credits are accounted for, of any member allocated to the income tax return of each of the members of the consolidated group for the test year and the 3 most recent years for which data is available, together with a summary of the actual tax payments for those years.

## A. 23 Please see responses below:

a. Internal Revenue Code Section 1552 provides for an allocation of consolidated income tax for "earnings and profits" purposes only based on the Company's elected method. DQE Holdings LLC (DQE) made no election and therefore under the default method contained in the IRS Treasury Regulations, the tax liability is apportioned among the members of the group in accordance with the ratio which that portion of the consolidated taxable income attributable to each member of the group having taxable income bears to the consolidated taxable income. DQE has chosen for book purposes and all other purposes, to allocate consolidated Federal income tax among all companies based on net taxable income or loss and credits of each subsidiary on a separate return basis.
b. Attachment II-D-23 details the tax liability of each of the participating member in the consolidated federal income tax return filed for the last 3 years in 2017, 2018, and 2019.
c. DQE is the parent company of Duquesne Light Holdings, Inc. (DLH), which is a member of the consolidated group that includes Duquesne Light Company. DQE makes all necessary income tax payments to the Internal Revenue Service for the net tax liability that is due for the consolidated group. DLH collects from member companies that have a positive federal income tax allocation and pays member companies that have a negative federal income tax allocation. The amounts DLH receives from or pays each member company are the same amounts as detailed in attachment II-D-23.
d. The most recent federal income tax return filed by the consolidated group is tax year 2019. It will be made available for review electronically or at the offices of Post \& Schell P.C., subject to the execution of a separate confidentiality agreement.
e. Attachment II-D-23 details actual payments made or that will be made to members of the consolidated group with a net operating loss.
f. Attachment II-D-23 details the actual payments made or that will be made to members of the consolidated group with a net negative income tax allocation after credits.

DQE Holdings, LLC and Subsidiaries
Allocation of Federal Income Taxes
Year Ended December 12/31/2017

| EIN | COMPANY | Taxable Income | $\begin{aligned} & \text { Tax } \\ & \text { @ 35\% } \end{aligned}$ | Less Credits | Net Tax Due |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 20-5112757 | DQE HOLDINGS, LLC | $(1,540,791)$ | $(539,277)$ |  | $(539,277)$ |
| 25-1598483 | DUQUESNE LIGHT HOLDINGS, INC. | $(67,767,579)$ | $(23,718,653)$ |  | $(23,718,653)$ |
| 25-0451600 | DUQUESNE LIGHT COMPANY | 5,119,608 | 1,791,863 |  | 1,791,863 |
| 25-1111912 | MONONGAHELA LIGHT AND POWER | 800,268 | 280,094 |  | 280,094 |
| 51-0368321 | DUQUESNE FIBER COMPANY | 997,443 | 349,105 |  | 349,105 |
| 25-1876941 | DES CORPORATE SERVICES, INC. | 24,520 | 8,582 |  | 8,582 |
| 25-1541872 | DQE ENTERPRISES, INC. | 52,116 | 18,241 |  | 18,241 |
| 25-1837251 | DQE CAPITAL CORPORATION | 1,558 | 545 |  | 545 |
| 23-2869466 | DQE SYSTEMS, INC. | 10,213,947 | 3,574,881 |  | 3,574,881 |
|  | Subtotal: Consolidated Taxable Income/(Loss) | $(52,098,910)$ | $(18,234,619)$ |  | $(18,234,619)$ |
|  | Consolidating Adjustments: |  |  |  |  |
|  | Charitable Contributions | - |  |  |  |
|  | Dividends Received Deduction | (588) | (206) |  | (206) |
|  | NOL Deduction |  | - |  | - |
|  | Consolidated Taxable Income/(Loss) | $(52,099,498)$ | - |  | - |
|  | AMT Tax |  |  |  | - |
|  | Low income housing recapture tax |  |  |  | - |
|  | Consolidated Federal Tax Liability |  |  |  | - |

DQE Holdings, LLC and Subsidiaries
Allocation of Federal Income Taxes
Year Ended December 12/31/2018

| EIN | COMPANY | Taxable Income | $\begin{gathered} \text { Tax } \\ \text { @ 21\% } \end{gathered}$ | Less Credits | Net Tax Due |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 20-5112757 | DQE HOLDINGS, LLC | $(2,193,600)$ | $(460,656)$ |  | $(460,656)$ |
| 25-1598483 | DUQUESNE LIGHT HOLDINGS, INC. | $(79,716,895)$ | $(16,740,548)$ |  | $(16,740,548)$ |
| 25-0451600 | DUQUESNE LIGHT COMPANY | 93,301,906 | 19,593,400 |  | 19,593,400 |
| 25-1111912 | MONONGAHELA LIGHT AND POWER |  |  |  | - |
| 51-0368321 | DUQUESNE FIBER COMPANY | - | - |  | - |
| 25-1876941 | DES CORPORATE SERVICES, INC. | $(1,715)$ | (360) |  | (360) |
| 25-1541872 | DQE ENTERPRISES, INC. | 115,886 | 24,336 |  | 24,336 |
| 25-1837251 | DQE CAPITAL CORPORATION | 77,481 | 16,271 |  | 16,271 |
| 23-2869466 | DQE SYSTEMS, INC. | - | - |  | - |
|  | Subtotal: Consolidated Taxable Income/(Loss) | 11,583,063 | 2,432,443 |  | 2,432,443 |
|  | Consolidating Adjustments: |  |  |  |  |
|  | Charitable Contributions | - |  |  |  |
|  | Dividends Received Deduction | (210) |  |  |  |
|  | NOL Deduction | $(11,582,853)$ | $(2,432,399)$ |  | (2,432,399) |
|  | Consolidated Taxable Income/(Loss) | - | - |  | - |
|  | AMT Tax |  |  |  | - |
|  | Low income housing recapture tax |  |  |  | - |
|  | Consolidated Federal Tax Liability |  |  |  | - |

DQE Holdings, LLC and Subsidiaries
Allocation of Federal Income Taxes
Year Ended December 12/31/2019

| EIN | COMPANY | Taxable Income | Tax <br> @ 21\% | Less Credits | Net Tax Due |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 20-5112757 | DQE HOLDINGS, LLC | $(5,643,802)$ | $(1,185,198)$ |  | $(1,185,198)$ |
| 25-1598483 | DUQUESNE LIGHT HOLDINGS, INC. | $(58,444,313)$ | $(12,273,306)$ |  | $(12,273,306)$ |
| 25-0451600 | DUQUESNE LIGHT COMPANY | 153,692,805 | 32,275,489 |  | 32,275,489 |
| 25-1111912 | MONONGAHELA LIGHT AND POWER | - | - |  | - |
| 51-0368321 | DUQUESNE FIBER COMPANY | - | - |  | - |
| 25-1876941 | DES CORPORATE SERVICES, INC. | - | - |  | - |
| 25-1541872 | DQE ENTERPRISES, INC. | 142,528 | 29,931 |  | 29,931 |
| 25-1837251 | DQE CAPITAL CORPORATION | $(1,160)$ | (244) |  | (244) |
| 23-2869466 | DQE SYSTEMS, INC. | - | - |  | - |
| 81-3028722 | TEN CONNECTED SOLUTIONS, INC. | $(32,749)$ | $(6,877)$ |  | $(6,877)$ |
| 45-4618116 | THE EFFICIENCY NETWORK, INC. | $(2,018,778)$ | $(423,943)$ |  | $(423,943)$ |
|  | Subtotal: Consolidated Taxable Income/(Loss) | 87,694,531 | 18,415,852 |  | 18,415,852 |
|  | Consolidating Adjustments: <br> Charitable Contributions |  |  |  |  |
|  | Dividends Received Deduction | - |  |  |  |
|  | NOL Deduction | $(87,694,531)$ | $(18,415,852)$ |  | $(18,415,852)$ |
|  | Consolidated Taxable Income/(Loss) | - | - |  | - |
|  | AMT Tax |  |  |  | - |
|  | Low income housing recapture tax |  |  |  | - |
|  | Consolidated Federal Tax Liability |  |  |  | - |

Q. 24 Provide detailed computations by vintage year showing State and Federal deferred income taxes resulting from the use of accelerated tax depreciation associated with post-1969 public utility property, ADR rates, and accelerated tax depreciation associated with post-1980 public utility property under the Accelerated Cost Recovery System (ACRS).
a) Reconcile and explain any differences in the base used to calculate State and Federal deferred income taxes.
b) State whether tax depreciation is based on all rate base items claimed as of the end of the test year, and whether it is the annual tax depreciation at the end of the test year.
c) Reconcile differences between the deferred tax balance, as shown as a reduction to rate base, and the deferred tax balance as shown on the balance sheet.
A. 24 See Attachment DFR II-D-24 - Attachment which provides detailed computations for the fully projected future test year ended December 31, 2022 of federal deferred income taxes by vintage year resulting from the use of accelerated tax depreciation associated with post-1980 public utility property under the Accelerated Cost Recovery System (ACRS), post-1969 public utility property, and differences in tax depreciation related to using class lives under the ADR system versus tax depreciation using the guideline lives in effect prior to the ADR system of depreciation.
a) Duquesne Light Company does not provide for any state deferred income taxes associated with the use of accelerated tax depreciation on its distribution property. The Company does provide for state deferred income taxes for transmission property under the FERC full normalization method.
b) Tax depreciation is not based on all rate base items claimed as of the end of the test year. Certain assets that are included in rate base are fully depreciated for tax purposes. Additionally, there are basis differences between book cost and tax cost for which tax depreciation is not calculated. Tax depreciation claimed is the annual tax depreciation projected at the end of the fully projected future test year.
c) The reconciliation is not applicable since there are no differences between the deferred tax balance and the deferred tax balance as shown on the balance sheet.

DUQUESNE LIGHT COMPANY
Deferred Income Tax Calculation
Historical Test Period Ended Decemeber 31, 2022
PowerTax Year 2022
(\$ in Thousands)

## Deferred Type: METHOD LIFE

| Description | Accelerated Federal Tax Depreciation | S/L Using <br> Tax Basis | Excess Depreciation | Rate | Deferred Federal Income Taxes |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Vintage 1970 and Prior |  |  |  |  |  |
| Distribution | 16 | 0 | 16 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 49 | 837 | (788) | 37\% | (291) |
| ubtotal-1970 and Prior | 65 | 837 | (772) |  | (291) |
| Vintage 1971 |  |  |  |  |  |
| Distribution | 0 | 0 | 0 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 22 | (21) | 36\% | (8) |
| Subtotal-1971 Vintage | 0 | 22 | (21) |  | (8) |
| Vintage 1972 |  |  |  |  |  |
| Distribution | 0 | 0 | 0 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 6 | 411 | (406) | 37\% | (150) |
| Subtotal-1972 Vintage | 6 | 411 | (406) |  | (150) |
| Vintage 1973 |  |  |  |  |  |
| Distribution | 0 | (0) | 0 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 1 | 81 | (80) | 37\% | (29) |
| Subtotal-1973 Vintage | 1 | 80 | (80) |  | (29) |
| Vintage 1974 |  |  |  |  |  |
| Distribution | 0 | 0 | (0) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 12 | 163 | (151) | 37\% | (56) |
| Subtotal-1974 Vintage | 12 | 163 | (151) |  | (56) |
| Vintage 1975 |  |  |  |  |  |
| Distribution | 77 | 196 | (120) | 0\% | 0 |
| Smart Meters | 0 | - | , | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 24 | 50 | (25) | 36\% | (9) |
| Subtotal-1975 Vintage | 101 | 246 | (145) |  | (9) |
| Vintage 1976 |  |  |  |  |  |
| Distribution | 0 | 7 | (6) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 1 | 150 | (149) | 36\% | (54) |
| Subtotal-1976 Vintage | 1 | 157 | (155) |  | (54) |
| Vintage 1977 |  |  |  |  |  |
| Distribution | 5 | 10 | (5) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 11 | 0 | 11 | 2\% | 0 |
| Transmission | (3) | (1) | (2) | 22\% | (0) |
| Subtotal-1977 Vintage | 13 | 9 | 5 |  | (0) |
| Vintage 1978 |  |  |  |  |  |
| Distribution | 31 | 43 | (12) | 0\% | 0 |


| Smart Meters | 0 | 0 | 0 | $0 \%$ | 0 | Page 2 of 31 |
| :--- | :---: | :---: | :---: | :---: | :---: | ---: |
| General | 29 | 0 | 29 | $2 \%$ | 1 |  |
| Transmission | 13 | 16 | $(4)$ | $60 \%$ | $(2)$ |  |
| Subtotal-1978 Vintage | 72 | 59 | 13 |  | $(2)$ |  |
|  |  |  |  |  |  |  |

Vintage 1979
Distribution
Smart Meters
General
Transmission
Subtotal-1979 Vintage
Vintage 1980
Distribution
Smart Meters General Transmission
Subtotal-1980 Vintage
Vintage 1981
Distribution
Smart Meters General Transmission
Subtotal-1981 Vintage
Vintage 1982
Distribution
Smart Meters General Transmission
Subtotal-1982 Vintage
Vintage 1983
Distribution Smart Meters General Transmission
Subtotal-1983 Vintage
Vintage 1984
Distribution
Smart Meters
General
Transmission
Subtotal-1984 Vintage
Vintage 1985
Distribution
Smart Meters
General
Transmission
Subtotal-1985 Vintage
$\frac{\text { Vintage } 1986}{\text { Distribution }}$
Distribution
Smart Meters
General
Transmission
Subtotal-1986 Vintage
Vintage 1987
Distribution
Smart Meters
General
Transmission
Subtotal-1987 Vintage

| 168 | 0 | 168 | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 5 | 0 | 5 | $2 \%$ | 0 |
| 88 | 1,280 | $(1,192)$ | $36 \%$ | $(433)$ |
| 261 | 1,280 | $(1,020)$ |  | $(433)$ |


| 5 | 3,460 | $(3,455)$ | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 50 | 655 | $(605)$ | $2 \%$ | $(11)$ |
| 16 | 1,565 | $(1,549)$ | $38 \%$ | $(586)$ |
| 71 | 5,680 | $(5,609)$ |  | $(597)$ |


| Distribution | 3 | 615 | (612) | 34\% | (206) | Page 3 of 31 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | (19) | 19 | 17\% | 3 |  |
| Transmission | 0 | 82 | (82) | 36\% | (30) |  |
| Subtotal-1988 Vintage | 3 | 678 | (674) |  | (232) |  |
| Vintage 1989 |  |  |  |  |  |  |
| Distribution | 3 | 741 | (737) | 35\% | (259) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 147 | (147) | 17\% | (25) |  |
| Transmission | 0 | 34 | (34) | 36\% | (12) |  |
| Subtotal-1989 Vintage | 3 | 922 | (918) |  | (296) |  |
| Vintage 1990 |  |  |  |  |  |  |
| Distribution | 5 | 670 | (665) | 35\% | (234) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 156 | (156) | 16\% | (25) |  |
| Transmission | 2 | 57 | (55) | 36\% | (20) |  |
| Subtotal-1990 Vintage | 6 | 882 | (876) |  | (279) |  |
| Vintage 1991 |  |  |  |  |  |  |
| Distribution | 29 | 675 | (646) | 36\% | (230) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 89 | 33 | 56 | 11\% | 6 |  |
| Transmission | 68 | 90 | (21) | 36\% | (8) |  |
| Subtotal-1991 Vintage | 186 | 798 | (612) |  | (232) |  |
| Vintage 1992 |  |  |  |  |  |  |
| Distribution | 35 | 749 | (714) | 35\% | (253) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 43 | 330 | (287) | 19\% | (54) |  |
| Transmission | 22 | 337 | (315) | 36\% | (113) |  |
| Subtotal-1992 Vintage | 99 | 1,416 | $(1,317)$ |  | (420) |  |
| Vintage 1993 |  |  |  |  |  |  |
| Distribution | 27 | 528 | (501) | 36\% | (183) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | (1) | 100 | (100) | 36\% | (36) |  |
| Subtotal-1993 Vintage | 27 | 628 | (601) |  | (219) |  |
| Vintage 1994 |  |  |  |  |  |  |
| Distribution | 20 | 433 | (414) | 35\% | (146) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | 0 | (5) | 5 | 25\% | 1 |  |
| Subtotal-1994 Vintage | 20 | 428 | (409) |  | (145) |  |
| Vintage 1995 |  |  |  |  |  |  |
| Distribution | 38 | 406 | (367) | 36\% | (132) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | 2 | 41 | (40) | 36\% | (14) |  |
| Subtotal-1995 Vintage | 40 | 447 | (407) |  | (146) |  |
| Vintage 1996 |  |  |  |  |  |  |
| Distribution | 31 | 488 | (457) | 35\% | (159) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 173 | 157 | 16 | 17\% | 3 |  |
| Transmission | 23 | 212 | (189) | 35\% | (66) |  |
| Subtotal-1996 Vintage | 226 | 856 | (630) |  | (223) |  |
| Vintage 1997 |  |  |  |  |  |  |
| Distribution | 11 | 431 | (420) | 34\% | (143) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | (9) | 0 | (9) | 18\% | (2) |  |

Transmission
Subtotal-1997 Vintage
Vintage 1998
Distribution
Smart Meters
General
Transmission
Subtotal-1998 Vintage
Vintage 1999
Distribution
Smart Meters
General
Transmission
Subtotal-1999 Vintage
Vintage 2000
Distribution
Smart Meters
General
Transmission
Subtotal-2000 Vintage
Vintage 2001
Distribution
Smart Meters
General
Transmission
Subtotal-2001 Vintage
Vintage 2002
Distribution
Smart Meters
General
Transmission
Subtotal-2002 Vintage
Vintage 2003
Distribution
Smart Meters
General
Transmission
Subtotal-2003 Vintage
Vintage 2004
Distribution
Smart Meters
General
Transmission
Subtotal-2004 Vintage
Vintage 2005
Distribution
Smart Meters General Transmission
Subtotal-2005 Vintage
Vintage 2006
Distribution
Smart Meters General
Transmission
Subtotal-2006 Vintage
Vintage 2007
Distribution
Smart Meters

| 1 | 1 | $(0)$ | $36 \%$ | $(0)$ |
| ---: | ---: | ---: | ---: | ---: |
| 3 | 432 | $(429)$ | $(145)$ |  |


| 451 | 323 | 127 | $20 \%$ | 25 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 52 | 66 | $(14)$ | $18 \%$ | $(2)$ |
| $(28)$ | $(38)$ | 10 | $36 \%$ | 3 |
| 474 | 351 | 123 |  | 26 |


| 22 | 282 | $(260)$ | $34 \%$ | $(88)$ |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| $(0)$ | $(1)$ | 0 | $-33 \%$ | $(0)$ |
| $(5)$ | 74 | $(79)$ | $35 \%$ | $(27)$ |
| 17 | 356 | $(339)$ |  | $(116)$ |


| 5 | 426 | $(421)$ | $32 \%$ | $(133)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 163 | 207 | $(44)$ | $10 \%$ | $(5)$ |
| $(4)$ | 67 | $(72)$ | $34 \%$ | $(24)$ |
| 164 | 700 | $(537)$ |  | $(162)$ |


| 16 | 644 | $(628)$ | $31 \%$ | $(197)$ |
| ---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 508 | 866 | $(357)$ | $15 \%$ | $(54)$ |
| 0 | $(24)$ | 24 | $33 \%$ | 8 |
| 525 | 1,486 | $(962)$ |  | $(243)$ |


| 546 | 598 | $(52)$ | $34 \%$ | $(18)$ |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 139 | 178 | $(39)$ | $11 \%$ | $(4)$ |
| 47 | 29 | 18 | $19 \%$ | 3 |
| 732 | 805 | $(73)$ |  | $(19)$ |


| 1,162 | 691 | 471 | $21 \%$ | 98 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 185 | 247 | $(62)$ | $14 \%$ | $(9)$ |
| 128 | 66 | 62 | $21 \%$ | 13 |
| 1,475 | 1,004 | 471 |  | 103 |


| 1,345 | 940 | 404 | $21 \%$ | 85 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 62 | 79 | $(18)$ | $18 \%$ | $(3)$ |
| 173 | 20 | 154 | $35 \%$ | 54 |
| 1,580 | 1,039 | 540 |  | 135 |


| 2,555 | 1,231 | 1,324 | $21 \%$ | 278 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 188 | 356 | $(168)$ | $16 \%$ | $(27)$ |
| 393 | 238 | 155 | $35 \%$ | 54 |
| 3,136 | 1,825 | 1,311 |  | 305 |


| 11 | 2,003 | $(1,992)$ | $35 \%$ | $(697)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 1,241 | 2,017 | $(776)$ | $15 \%$ | $(113)$ |
| 4 | 698 | $(694)$ | $33 \%$ | $(226)$ |
| 1,257 | 4,719 | $(3,462)$ |  | $(1,035)$ |


| 1,027 | 544 | 483 | $21 \%$ | 101 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |


| General | 388 | 61 | 326 | 18\% | 58 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Transmission | 2,548 | 1,676 | 872 | 20\% | 171 |
| Subtotal-2007 Vintage | 3,963 | 2,281 | 1,682 |  | 330 |
| Vintage 2008 |  |  |  |  |  |
| Distribution | 1,456 | 1,167 | 289 | 22\% | 62 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 179 | 321 | (142) | 15\% | (21) |
| Transmission | 189 | 106 | 83 | 21\% | 17 |
| Subtotal-2008 Vintage | 1,824 | 1,593 | 231 |  | 58 |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 2,313 | 1,722 | 591 | 21\% | 122 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 126 | 161 | (34) | 18\% | (6) |
| Transmission | 1,979 | 1,701 | 277 | 18\% | 49 |
| Subtotal-2009 Vintage | 4,419 | 3,584 | 834 |  | 165 |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 2,884 | 3,268 | (384) | 43\% | (164) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 166 | 235 | (68) | 13\% | (9) |
| Transmission | 2,140 | 1,821 | 319 | 20\% | 64 |
| Subtotal-2010 Vintage | 5,190 | 5,323 | (133) |  | (109) |
| Vintage 2011 |  |  |  |  |  |
| Distribution | 308 | 1,432 | $(1,124)$ | 34\% | (384) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 317 | 1,660 | $(1,343)$ | 17\% | (229) |
| Transmission | 549 | 1,272 | (723) | 35\% | (256) |
| Subtotal-2011 Vintage | 1,175 | 4,364 | $(3,190)$ |  | (870) |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 1,931 | 2,119 | (188) | 39\% | (74) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 320 | 2,271 | $(1,951)$ | 17\% | (336) |
| Transmission | 920 | 1,566 | (646) | 37\% | (237) |
| Subtotal-2012 Vintage | 3,170 | 5,956 | $(2,786)$ |  | (647) |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 1,929 | 1,722 | 207 | 25\% | 52 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 357 | 3,256 | $(2,899)$ | 17\% | (501) |
| Transmission | 1,592 | 1,349 | 242 | 21\% | 51 |
| Subtotal-2013 Vintage | 3,877 | 6,327 | $(2,450)$ |  | (398) |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 819 | 896 | (77) | 10\% | (8) |
| Smart Meters | 0 | 21 | (21) | 31\% | (7) |
| General | 673 | 3,312 | $(2,639)$ | 17\% | (449) |
| Transmission | 936 | 734 | 202 | 21\% | 42 |
| Subtotal-2014 Vintage | 2,428 | 4,964 | $(2,536)$ |  | (422) |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 971 | 1,063 | (91) | -7\% | 7 |
| Smart Meters | 0 | 10,293 | $(10,293)$ | 34\% | $(3,457)$ |
| General | 221 | 2,343 | $(2,123)$ | 17\% | (370) |
| Transmission | 849 | 719 | 130 | 21\% | 27 |
| Subtotal-2015 Vintage | 2,041 | 14,417 | $(12,377)$ |  | $(3,793)$ |
| Vintage 2016 |  |  |  |  |  |
| Distribution | 1,524 | 1,358 | 166 | 14\% | 24 |
| Smart Meters | 0 | 8,255 | $(8,255)$ | 33\% | $(2,685)$ |
| General | 891 | 3,743 | $(2,852)$ | 17\% | (496) |
| Transmission | 2,855 | 2,466 | 389 | 21\% | 82 |
| Subtotal-2016 Vintage | 5,270 | 15,822 | $(10,552)$ |  | $(3,075)$ |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 3,138 | 3,112 | 25 | -128\% | (33) |


| Smart Meters | 839 | 1,376 | (537) | 33\% | (176) |
| :---: | :---: | :---: | :---: | :---: | :---: |
| General | 1,329 | 10,329 | $(9,000)$ | 17\% | $(1,537)$ |
| Transmission | 1,224 | 1,114 | 110 | 20\% | 22 |
| Subtotal-2017 Vintage | 6,530 | 15,931 | $(9,401)$ |  | $(1,723)$ |
| Vintage 2018 |  |  |  |  |  |
| Distribution | 4,890 | $(4,135)$ | 9,025 | 6\% | 544 |
| Smart Meters | 2,782 | 879 | 1,903 | 21\% | 400 |
| General | 3,198 | 25,447 | $(22,249)$ | 10\% | $(2,158)$ |
| Transmission | 1,670 | (984) | 2,654 | 21\% | 557 |
| Subtotal-2018 Vintage | 12,539 | 21,207 | $(8,668)$ |  | (658) |
| Vintage 2019 |  |  |  |  |  |
| Distribution | 4,819 | 2,013 | 2,807 | 21\% | 589 |
| Smart Meters | 898 | 206 | 693 | 21\% | 145 |
| General | 24,442 | 28,509 | $(4,067)$ | 10\% | (427) |
| Transmission | 1,260 | 488 | 771 | 21\% | 162 |
| Subtotal-2019 Vintage | 31,420 | 31,216 | 204 |  | 470 |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 5,710 | 2,156 | 3,554 | 21\% | 746 |
| Smart Meters | 1,232 | 167 | 1,064 | 21\% | 224 |
| General | 15,528 | 12,333 | 3,195 | 10\% | 335 |
| Transmission | 4,214 | 1,239 | 2,975 | 21\% | 625 |
| Subtotal-2020 Vintage | 26,684 | 15,896 | 10,788 |  | 1,930 |
| Vintage 2021 |  |  |  |  |  |
| Distribution | 9,246 | 3,260 | 5,986 | 21\% | 1,257 |
| Smart Meters | 1,598 | 130 | 1,468 | 21\% | 308 |
| General | 30,817 | 22,842 | 7,975 | 11\% | 837 |
| Transmission | 4,309 | 1,186 | 3,123 | 21\% | 656 |
| Subtotal-2021 Vintage | 45,970 | 27,419 | 18,551 |  | 3,058 |
| Vintage 2022 |  |  |  |  |  |
| Distribution | 3,664 | 1,228 | 2,436 | 21\% | 511 |
| Smart Meters | 999 | 65 | 934 | 21\% | 196 |
| General | 17,605 | 10,838 | 6,767 | 11\% | 711 |
| Transmission | 3,868 | 978 | 2,890 | 21\% | 607 |
| Subtotal-2022 Vintage | 26,135 | 13,110 | 13,026 |  | 2,025 |
| Subtotals - METHOD LIFE |  |  |  |  |  |
| Distribution | 53,259 | 43,614 | 9,644 | -10\% | (931) |
| Smart Meters | 8,347 | 21,392 | $(13,045)$ | 39\% | $(5,052)$ |
| General | 99,485 | 133,651 | $(34,166)$ | 15\% | $(5,014)$ |
| Transmission | 32,133 | 24,948 | 7,185 | 4\% | 268 |
| ubtotal - Method Life | 193,224 | 223,605 | $(30,381)$ |  | $(10,728)$ |

## Deferred Type: POST 69 DDB/SL

| Vintage 1970 and Prior |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 23 | 2,516 | $(2,493)$ | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| ubtotal-1970 and Prior | 23 | 2,516 | $(2,493)$ |  | 0 |
| Vintage 1971 |  |  |  |  |  |
| Distribution | 0 | 144 | (144) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1971 Vintage | 0 | 144 | (144) |  | 0 |
| Vintage 1972 |  |  |  |  |  |
| Distribution | 0 | 425 | (425) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1972 Vintage | 0 | 425 | (425) |  | 0 |


| Vintage 1973 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 392 | (392) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1973 Vintage | 0 | 392 | (392) |  | 0 |
| Vintage 1974 |  |  |  |  |  |
| Distribution | 0 | 513 | (513) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1974 Vintage | 0 | 513 | (513) |  | 0 |
| Vintage 1975 |  |  |  |  |  |
| Distribution | 0 | 547 | (547) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1975 Vintage | 0 | 547 | (547) |  | 0 |
| Vintage 1976 |  |  |  |  |  |
| Distribution | 59 | 399 | (341) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1976 Vintage | 59 | 399 | (341) |  | 0 |
| Vintage 1977 |  |  |  |  |  |
| Distribution | 0 | 443 | (443) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1977 Vintage | 0 | 443 | (443) |  | 0 |
| Vintage 1978 |  |  |  |  |  |
| Distribution | 0 | 557 | (557) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1978 Vintage | 0 | 557 | (557) |  | 0 |
| Vintage 1979 |  |  |  |  |  |
| Distribution | 77 | 468 | (391) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1979 Vintage | 77 | 468 | (391) |  | 0 |
| Vintage 1980 |  |  |  |  |  |
| Distribution | 23 | 543 | (520) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1980 Vintage | 23 | 543 | (520) |  | 0 |
| Subtotals - POST 69 DDB/SL |  |  |  |  |  |
| Distribution | 181 | 6,947 | $(6,767)$ | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| :al - POST 69 DDB/SL | 181 | 6,947 | $(6,767)$ |  | 0 |

## Deferred Type: LIFE VINT 1971-1977

Vintage 1971
Distribution

Smart Meters

| 9 | 0 | 9 | $35 \%$ | 3 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |

DFR II-D-24 Attachment

| General | 0 | 0 | 0 | 0\% | 0 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1971 Vintage | 9 | 0 | 9 |  | 3 |
| Vintage 1972 |  |  |  |  |  |
| Distribution | 15 | 0 | 15 | 35\% | 5 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1972 Vintage | 15 | 0 | 15 |  | 5 |
| Vintage 1973 |  |  |  |  |  |
| Distribution | 17 | 0 | 17 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1973 Vintage | 17 | 0 | 17 |  | 0 |
| Vintage 1974 |  |  |  |  |  |
| Distribution | 18 | 0 | 18 | 37\% | 7 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1974 Vintage | 18 | 0 | 18 |  | 7 |
| Vintage 1975 |  |  |  |  |  |
| Distribution | 24 | 0 | 24 | 35\% | 8 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1975 Vintage | 24 | 0 | 24 |  | 8 |
| Vintage 1976 |  |  |  |  |  |
| Distribution | 18 | 20 | (1) | 38\% | (1) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1976 Vintage | 18 | 20 | (1) |  | (1) |
| Vintage 1977 |  |  |  |  |  |
| Distribution | 13 | 0 | 13 | 35\% | 4 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-1977 Vintage | 13 | 0 | 13 |  | 4 |
| Subtotals - LIFE VINT 1971-1977 |  |  |  |  |  |
| Distribution | 115 | 20 | 95 | 29\% | 28 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| LIFE VINT 1971-1977 | 115 | 20 | 95 |  | 28 |

## Deferred Type: Life Vint 1978

Vintage 1978
Distribution
Smart Meters
General
Transmission
btotal - Life Vint 1978
Deferred Type: Life Vint 1979
Vintage 1979
Distribution
Smart Meters
25
General
Transmission

| 15 | 0 | 15 | $22 \%$ | 3 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 15 | 0 | 15 |  | 3 |


| 25 | 26 | $(0)$ | $(0)$ |
| :--- | :--- | :--- | :--- |

## Deferred Type: Life Vint 1980

Vintage 1980
Distribution
Smart Meters
General
Transmission
btotal - Life Vint 1980

| 7 | 8 | $(1)$ | $35 \%$ | $(0)$ |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 7 | 8 | $(1)$ |  | $(0)$ |

## Deferred Type: 263A 481a

Vintage 1997
Distribution
Smart Meters
General
Transmission

Subtotal-1997 Vintage

| 0 | 104 | $(104)$ | $35 \%$ | $(36)$ |
| ---: | ---: | ---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1 | $(1)$ | $35 \%$ | $(0)$ |
| 0 | 104 | $(104)$ |  | $(36)$ |

Vintage 1998
Distribution
Smart Meters
General
Transmission
Subtotal-1998 Vintage
Vintage 1999
Distribution
Smart Meters
General
Transmission
Subtotal-1999 Vintage

| 0 | 99 | $(99)$ | $35 \%$ | $(35)$ |
| ---: | ---: | :---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 99 | $(99)$ |  | $(35)$ |

Vintage 2000
Distribution
Smart Meters
General
Transmission
Subtotal-2000 Vintage

| 0 | 33 | $(33)$ | $35 \%$ | $(11)$ |
| ---: | ---: | :---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 8 | $(8)$ | $36 \%$ | $(3)$ |
| 0 | 41 | $(41)$ |  | $(14)$ |

$\frac{\text { Vintage } 2001}{\text { Distribution }}$
Smart Meters
General
Transmission
Subtotal-2001 Vintage

| 0 | 64 | $(64)$ | $35 \%$ | $(23)$ |
| ---: | ---: | :---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 9 | $(9)$ | $36 \%$ | $(3)$ |
| 0 | 74 | $(74)$ |  | $(26)$ |

intage 2001
Distribution
Smart Meters
Transmission
Subtotal-2001 Vintage

| 0 | 82 | $(82)$ | $35 \%$ | $(29)$ |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | $(2)$ | 2 | $36 \%$ | 1 |
| 0 | 80 | $(80)$ |  | $(28)$ |

$\frac{\text { Vintage } 2002}{\text { Distribution }}$
Smart Meters
General
Transmission
Subtotal-2002 Vintage

| 0 | 104 | $(104)$ | $35 \%$ | $(36)$ |
| ---: | ---: | ---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 3 | $(3)$ | $35 \%$ | $(1)$ |
| 0 | 107 | $(107)$ |  | $(38)$ |

$\frac{\text { Vintage } 2003}{\text { Distribution }}$
Smart Meters
General
Transmission
Subtotal-2003 Vintage

| 0 | 117 | $(117)$ | $35 \%$ | $(41)$ |
| ---: | ---: | ---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 14 | $(14)$ | $36 \%$ | $(5)$ |
| 0 | 130 | $(130)$ |  | $(46)$ |

Vintage 2004
Distribution
Smart Meters
General
Transmission
Subtotal-2004 Vintage

| 0 | 118 | $(118)$ | $35 \%$ | $(41)$ |
| ---: | ---: | :---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 14 | $(14)$ | $35 \%$ | $(5)$ |
| 0 | 131 | $(131)$ |  | $(46)$ |

DFR II-D-24 Attachment
$\frac{\text { Vintage } 2005}{\text { Distribution }}$
Smart Meters General
Transmission
Subtotal-2005 Vintage

| 0 | 250 | $(250)$ | $35 \%$ | $(88)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 40 | $(40)$ | $35 \%$ | $(14)$ |
| 0 | 290 | $(290)$ |  | $(102)$ |

Vintage 2006
Distribution
Smart Meters General
Transmission
Subtotal-2006 Vintage

|  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 284 | $(284)$ | $35 \%$ | $(99)$ |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 95 | $(95)$ | $36 \%$ | $(34)$ |
| 0 | 379 | $(379)$ |  | $(133)$ |

Vintage 2007
Distribution
Smart Meters
General
Transmission
Subtotal-2007 Vintage

| 0 | 91 | $(91)$ | $35 \%$ | $(32)$ |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 176 | $(176)$ | $36 \%$ | $(62)$ |
| 0 | 267 | $(267)$ |  | $(94)$ |

Vintage 2008
Distribution
Smart Meters
General
Transmission
Subtotal-2008 Vintage
Vintage 2009
Distribution
Smart Meters
General
Transmission
Subtotal-2009 Vintage
Vintage 2010
Distribution
Smart Meters
General
Transmission
Subtotal-2010 Vintage
Vintage 2011
Distribution
Smart Meters
General
Transmission
Subtotal-2011 Vintage
Vintage 2012
Distribution
Smart Meters
General
Transmission
Subtotal-2012 Vintage
Vintage 2013
Distribution
Smart Meters
General
Transmission
Subtotal-2013 Vintage
Vintage 2014
Distribution
Smart Meters
General
Transmission
Subtotal-2014 Vintage

| 0 | 251 | (251) | 35\% | (88) |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | , | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 19 | (19) | 36\% | (7) |
| 0 | 271 | (271) |  | (95) |
| 0 | 255 | (255) | 35\% | (89) |
| 0 | 0 | , | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 176 | (176) | 35\% | (62) |
| 0 | 430 | (430) |  | (152) |
| 0 | 352 | (352) | 35\% | (123) |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 169 | (169) | 35\% | (60) |
| 0 | 522 | (522) |  | (183) |
| 0 | 330 | (330) | 35\% | (115) |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 170 | (170) | 36\% | (60) |
| 0 | 499 | (499) |  | (176) |
| 0 | 251 | (251) | 35\% | (88) |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 148 | (148) | 35\% | (52) |
| 0 | 399 | (399) |  | (140) |
| 0 | 224 | (224) | 35\% | (79) |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 125 | (125) | 35\% | (44) |
| 0 | 349 | (349) |  | (123) |
| 0 | 267 | (267) | 35\% | (93) |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 0 | 0 | 0\% | 0 |
| 0 | 191 | (191) | 35\% | (68) |
| 0 | 458 | (458) |  | (161) |


| Vintage 2015 |
| :--- |
| Distribution |
| Smart Meters |
| General |
| Transmission |
| Subtotal-2015 Vintage |

Subtotals -263A 481a
Distribution
Smart Meters
General
Transmission
Subtotal - 263A 481a

| 0 | 159 | $(159)$ | $35 \%$ | $(56)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 149 | $(149)$ | $35 \%$ | $(52)$ |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 65 | $(65)$ | $35 \%$ | $(23)$ |
| 0 | 373 | $(373)$ |  | $(131)$ |
|  |  |  |  |  |
| 0 | 3,434 | $(3,434)$ | $35 \%$ | $(1,202)$ |
| 0 | 149 | $(149)$ | $35 \%$ | $(52)$ |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1,422 | $(1,422)$ | $35 \%$ | $(504)$ |
| 0 | 5,005 | $(5,005)$ |  | $(1,758)$ |

Deferred Type: 263A

Vintage 2016
Distribution
Smart Meters
General Transmission Subtotal-2016 Vintage

| 0 | 107 | $(107)$ | $35 \%$ | $(37)$ |
| ---: | ---: | ---: | ---: | :---: |
| 0 | 66 | $(66)$ | $35 \%$ | $(23)$ |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 135 | $(135)$ | $35 \%$ | $(48)$ |
| 0 | 308 | $(308)$ |  | $(108)$ |

Vintage 2017
Distribution
Smart Meters
General
Transmission
Subtotal-2017 Vintage

| 0 | 333 | $(333)$ | $35 \%$ | $(116)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 63 | $(63)$ | $35 \%$ | $(22)$ |
| 0 | 66 | $(66)$ | $18 \%$ | $(12)$ |
| 0 | 69 | $(69)$ | $35 \%$ | $(24)$ |
| 0 | 531 | $(531)$ |  | $(175)$ |


| Vintage 2018 |
| :--- |
| Distribution |
| Smart Meters |
| General |
| Transmission |
| Subtotal-2018 Vintage |


| 0 | 347 | $(347)$ | $21 \%$ | $(73)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 47 | $(47)$ | $21 \%$ | $(10)$ |
| 0 | 77 | $(77)$ | $10 \%$ | $(8)$ |
| 0 | 62 | $(62)$ | $21 \%$ | $(13)$ |
| 0 | 532 | $(532)$ |  | $(104)$ |

Vintage 2019
Distribution
Smart Meters General Transmission
Subtotal-2019 Vintage
Vintage 2020
Distribution
Smart Meters General
Transmission
Subtotal-2020 Vintage
Vintage 2021
Distribution Smart Meters General
Transmission
Subtotal-2021 Vintage
Vintage 2022
Distribution
Smart Meters
General
Transmission
Subtotal-2022 Vintage
Subtotals - 263A
Distribution
Smart Meters

| 0 | 391 | $(391)$ | $21 \%$ | $(82)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 20 | $(20)$ | $21 \%$ | $(4)$ |
| 0 | 207 | $(207)$ | $11 \%$ | $(22)$ |
| 0 | 34 | $(34)$ | $21 \%$ | $(7)$ |
| 0 | 652 | $(652)$ |  | $(115)$ |


| 0 | 324 | $(324)$ | $21 \%$ | $(68)$ |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 14 | $(14)$ | $21 \%$ | $(3)$ |
| 0 | 47 | $(47)$ | $10 \%$ | $(5)$ |
| 0 | 99 | $(99)$ | $21 \%$ | $(21)$ |
| 0 | 484 | $(484)$ |  | $(97)$ |
|  |  |  |  |  |
| 0 | 357 | $(357)$ | $21 \%$ | $(75)$ |
| 0 | 9 | $(9)$ | $21 \%$ | $(2)$ |
| 0 | 66 | $(66)$ | $10 \%$ | $(7)$ |
| 0 | 79 | $(79)$ | $21 \%$ | $(17)$ |
| 0 | 512 | $(512)$ |  | $(101)$ |
|  |  |  |  |  |
|  |  |  | $21 \%$ | 2,258 |
| 10,893 | 142 | 10,751 | $21 \%$ | 81 |
| 390 | 5 | 385 | $10 \%$ | 49 |
| 498 | 28 | 470 | $21 \%$ | 1,238 |
| 5,972 | 75 | 5,896 |  | 3,626 |
| 17,753 | 250 | 17,503 |  |  |


| General | 498 | 491 | 7 | $-58 \%$ | (4) |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Transmission | 5,972 | 554 | 5,418 | $20 \%$ | 1,108 |
|  | Subtotal - 263A | 17,753 | 3,269 | 14,484 |  |

## Deferred Type: AFUDC Debt

Vintage 1997
Distribution
Smart Meters
General
Transmission
Subtotal-1997 Vintage

| 0 | 8 | $(8)$ | $0 \%$ | 0 |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1 | $(1)$ | $36 \%$ | $(0)$ |
| 0 | 9 | $(9)$ |  | $(0)$ |

Vintage 1998
Distribution
Smart Meters
General
Transmission
Subtotal-1998 Vintage
Vintage 1999
Distribution
Smart Meters
General
Transmission
Subtotal-1999 Vintage
Vintage 2000
Distribution
Smart Meters
General
Transmission
Subtotal-2000 Vintage
Vintage 2001
Distribution
Smart Meters
General
Transmission
Subtotal-2001 Vintage
Vintage 2002
Distribution
Smart Meters
General
Transmission
Subtotal-2002 Vintage
Vintage 2003
Distribution
Smart Meters
General
Transmission
Subtotal-2003 Vintage

## Vintage 2004

Distribution
Smart Meters
General
Transmission
Subtotal-2004 Vintage
Vintage 2005
Distribution
Smart Meters
General
Transmission
Subtotal-2005 Vintage

| 0 | 9 | $(9)$ | $0 \%$ | 0 |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | $(0)$ | $36 \%$ | $(0)$ |
| 0 | 9 | $(9)$ |  | $(0)$ |


| 0 | 18 | $(18)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 2 | $(2)$ | $36 \%$ | $(1)$ |
| 0 | 20 | $(20)$ |  | $(1)$ |


| 0 | 23 | $(23)$ | $0 \%$ | 0 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 8 | $(8)$ | $36 \%$ | $(3)$ |
| 0 | 31 | $(31)$ |  | $(3)$ |


| 0 | 21 | $(21)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | $(0)$ | $36 \%$ | $(0)$ |
| 0 | 21 | $(21)$ |  | $(0)$ |


| 0 | 15 | $(15)$ | $0 \%$ | 0 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1 | $(1)$ | $36 \%$ | $(0)$ |
| 0 | 16 | $(16)$ |  | $(0)$ |


| 0 | 13 | $(13)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 2 | $(2)$ | $36 \%$ | $(1)$ |
| 0 | 16 | $(16)$ |  | $(1)$ |


| 0 | 14 | $(14)$ | $0 \%$ | 0 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1 | $(1)$ | $36 \%$ | $(0)$ |
| 0 | 15 | $(15)$ |  | $(0)$ |


| 0 | 30 | $(30)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 4 | $(4)$ | $36 \%$ | $(1)$ |
| 0 | 34 | $(34)$ |  | $(1)$ |


| Vintage 2006 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 15 | (15) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 14 | (14) | 2\% | (0) |
| Transmission | 0 | 6 | (6) | 36\% | (2) |
| Subtotal-2006 Vintage | 0 | 35 | (35) |  | (3) |
| Vintage 2007 |  |  |  |  |  |
| Distribution | 0 | 9 | (9) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | (0) | 2\% | (0) |
| Transmission | 0 | 2 | (2) | 36\% | (1) |
| Subtotal-2007 Vintage | 0 | 11 | (11) |  | (1) |
| Vintage 2008 |  |  |  |  |  |
| Distribution | 0 | 16 | (16) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (0) | 0 | 2\% | 0 |
| Transmission | 0 | 2 | (2) | 35\% | (1) |
| Subtotal-2008 Vintage | 0 | 18 | (18) |  | (1) |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 0 | 29 | (29) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | (0) | 2\% | (0) |
| Transmission | 0 | 5 | (5) | 35\% | (2) |
| Subtotal-2009 Vintage | 0 | 35 | (35) |  | (2) |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 0 | 23 | (23) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 1 | (1) | 2\% | (0) |
| Transmission | 0 | 1 | (1) | 36\% | (0) |
| Subtotal-2010 Vintage | 0 | 25 | (25) |  | (0) |
| Vintage 2011 |  |  |  |  |  |
| Distribution | 0 | 16 | (16) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 1 | (1) | 2\% | (0) |
| Transmission | 0 | 16 | (16) | 36\% | (6) |
| Subtotal-2011 Vintage | 0 | 33 | (33) |  | (6) |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | 31 | (31) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 7 | (7) | 2\% | (0) |
| Transmission | 0 | 32 | (32) | 35\% | (11) |
| Subtotal-2012 Vintage | 0 | 70 | (70) |  | (11) |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | 18 | (18) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (46) | 46 | 2\% | 1 |
| Transmission | 0 | (9) | 9 | 35\% | 3 |
| Subtotal-2013 Vintage | 0 | (36) | 36 |  | 4 |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 0 | 25 | (25) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 68 | (68) | 2\% | (1) |
| Transmission | 0 | (7) | 7 | 35\% | 3 |
| Subtotal-2014 Vintage | 0 | 86 | (86) |  | 1 |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 0 | 35 | (35) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 3 | (3) | 3\% | (0) |
| Transmission | 0 | 5 | (5) | 35\% | (2) |
| Subtotal-2015 Vintage | 0 | 43 | (43) |  | (2) |


| Vintage 2016 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 20 | (20) | 35\% | (7) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 3 | (3) | 18\% | (0) |
| Transmission | 0 | 7 | (7) | 35\% | (2) |
| Subtotal-2016 Vintage | 0 | 29 | (29) |  | (10) |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 0 | 21 | (21) | 35\% | (7) |
| Smart Meters | 0 | 7 | (7) | 35\% | (2) |
| General | 0 | 58 | (58) | 18\% | (10) |
| Transmission | 0 | 5 | (5) | 35\% | (2) |
| Subtotal-2017 Vintage | 0 | 91 | (91) |  | (22) |
| Vintage 2018 |  |  |  |  |  |
| Distribution | 0 | 16 | (16) | 21\% | (3) |
| Smart Meters | 0 | 0 | (0) | 21\% | (0) |
| General | 0 | 269 | (269) | 11\% | (28) |
| Transmission | 0 | 12 | (12) | 21\% | (3) |
| Subtotal-2018 Vintage | 0 | 298 | (298) |  | (34) |
| Vintage 2019 |  |  |  |  |  |
| Distribution | 0 | 21 | (21) | 21\% | (4) |
| Smart Meters | 0 | (0) | 0 | 21\% | 0 |
| General | 0 | 507 | (507) | 11\% | (53) |
| Transmission | 0 | 7 | (7) | 21\% | (1) |
| Subtotal-2019 Vintage | 0 | 535 | (535) |  | (59) |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 0 | 26 | (26) | 21\% | (6) |
| Smart Meters | 0 | 2 | (2) | 21\% | (0) |
| General | 0 | 78 | (78) | 10\% | (8) |
| Transmission | 0 | 14 | (14) | 21\% | (3) |
| Subtotal-2020 Vintage | 0 | 120 | (120) |  | (17) |
| Vintage 2021 |  |  |  |  |  |
| Distribution | 0 | 28 | (28) | 21\% | (6) |
| Smart Meters | 0 | 1 | (1) | 21\% | (0) |
| General | 0 | 215 | (215) | 11\% | (23) |
| Transmission | 0 | 8 | (8) | 21\% | (2) |
| Subtotal-2021 Vintage | 0 | 251 | (251) |  | (30) |
| Vintage 2022 |  |  |  |  |  |
| Distribution | 797 | 10 | 787 | 21\% | 165 |
| Smart Meters | 28 | 0 | 27 | 21\% | 6 |
| General | 866 | 102 | 765 | 11\% | 80 |
| Transmission | 506 | 6 | 499 | 21\% | 105 |
| Subtotal-2022 Vintage | 2,197 | 119 | 2,078 |  | 356 |
| Subtotals - AFUDC Debt |  |  |  |  |  |
| Distribution | 797 | 512 | 285 | 46\% | 132 |
| Smart Meters | 28 | 10 | 18 | 16\% | 3 |
| General | 866 | 1,280 | (414) | 11\% | (44) |
| Transmission | 506 | 131 | 374 | 18\% | 66 |
| ıbtotal - AFUDC Debt | 2,197 | 1,933 | 264 |  | 157 |

## Deferred Type: CAP OPEB Expense

Vintage 2008

Distribution
Smart Meters
General
Transmission
Subtotal-2008 Vintage

Vintage 2009
Distribution
Smart Meters

| 0 | 84 | $(84)$ | $0 \%$ | 0 |
| ---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 9 | $(9)$ | $36 \%$ | $(3)$ |
| 0 | 93 | $(93)$ |  | $(3)$ |

(53) 0\% 0\%

DFR II-D-24 Attachment

## General Transmission

Subtotal-2009 Vintage
Vintage 2010
Distribution
Smart Meters
General
Transmission
Subtotal-2010 Vintage
Vintage 2011
Distribution
Smart Meters
General
Transmission
Subtotal-2011 Vintage
Vintage 2012
Distribution

| 0 | 0 | 0 | $0 \%$ | 0 |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 30 | $(30)$ | $36 \%$ | $(10)$ |
| 0 | 83 | $(83)$ |  | $(10)$ |


| 0 | 59 | $(59)$ | $0 \%$ | 0 |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 25 | $(25)$ | $35 \%$ | $(9)$ |
| 0 | 84 | $(84)$ |  | $(9)$ |

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DFR II-D-24 Attachment
General
Transmission Subtotal-2012 Vintage

| 0 | 11 | $(11)$ | $2 \%$ | $(0)$ |
| :--- | :--- | :--- | :--- | :--- |
| 0 | 21 | $(21)$ | $35 \%$ | $(7)$ |
| 0 | 74 | $(74)$ |  | $(8)$ |

Vintage 2013
Distribution
Smart Meters General
Transmission
Subtotal-2013 Vintage

| 0 | 39 | $(39)$ | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 9 | $(9)$ | $2 \%$ | $(0)$ |
| 0 | 14 | $(14)$ | $35 \%$ | $(5)$ |
| 0 | 62 | $(62)$ |  | $(5)$ |

Vintage 2014
Distribution
Smart Meters
General
Transmission
Subtotal-2014 Vintage

| 0 | 53 | $(53)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 28 | $(28)$ | $2 \%$ | $(1)$ |
| 0 | 14 | $(14)$ | $35 \%$ | $(5)$ |
| 0 | 96 | $(96)$ |  | $(6)$ |

Vintage 2015
Distribution
Smart Meters
General
Transmission
Subtotal-2015 Vintage
Vintage 2016
Distribution
Smart Meters
General
Transmission
Subtotal-2016 Vintage

| 0 | 38 | $(38)$ | $0 \%$ | 0 |
| :---: | ---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 7 | $(7)$ | $3 \%$ | $(0)$ |
| 0 | 10 | $(10)$ | $35 \%$ | $(4)$ |
| 0 | 55 | $(55)$ |  | $(4)$ |

Vintage 2017
Distribution
Smart Meters
General
Transmission
Subtotal-2017 Vintage
Vintage 2018
Distribution
Smart Meters
General
Transmission
Subtotal-2018 Vintage

| 0 | 24 | $(24)$ | $35 \%$ | $(8)$ |
| ---: | ---: | :---: | ---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 12 | $(12)$ | $18 \%$ | $(2)$ |
| 0 | 15 | $(15)$ | $35 \%$ | $(5)$ |
| 0 | 51 | $(51)$ |  | $(16)$ |


| 0 | 7 | $(7)$ | $35 \%$ | $(3)$ |
| :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 1 | $(1)$ | $18 \%$ | $(0)$ |
| 0 | 1 | $(1)$ | $35 \%$ | $(1)$ |
| 0 | 10 | $(10)$ |  | $(3)$ |


| 0 | 6 | $(6)$ | $21 \%$ | $(1)$ |
| :--- | :--- | :--- | :--- | :--- |
| 0 | 1 | $(1)$ | $21 \%$ | $(0)$ |
| 0 | 1 | $(1)$ | $10 \%$ | $(0)$ |
| 0 | 1 | $(1)$ | $21 \%$ | $(0)$ |
| 0 | 8 | $(8)$ |  | $(2)$ |

DFR II-D-24 Attachment
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| Vintage 2019 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 1 | (1) | 21\% | (0) |
| Smart Meters | 0 | 0 | (0) | 21\% | (0) |
| General | 0 | 0 | (0) | 11\% | (0) |
| Transmission | 0 | 0 | (0) | 21\% | (0) |
| Subtotal-2019 Vintage | 0 | 1 | (1) |  | (0) |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 0 | 5 | (5) | 21\% | (1) |
| Smart Meters | 0 | 0 | (0) | 21\% | (0) |
| General | 0 | 1 | (1) | 11\% | (0) |
| Transmission | 0 | 1 | (1) | 21\% | (0) |
| Subtotal-2020 Vintage | 0 | 7 | (7) |  | (1) |
| Vintage 2021 |  |  |  |  |  |
| Distribution | 0 | 9 | (9) | 21\% | (2) |
| Smart Meters | 0 | 0 | (0) | 21\% | (0) |
| General | 0 | 2 | (2) | 11\% | (0) |
| Transmission | 0 | 2 | (2) | 21\% | (0) |
| Subtotal-2020 Vintage | 0 | 12 | (12) |  | (2) |
| Vintage 2022 |  |  |  |  |  |
| Distribution | 260 | 3 | 257 | 21\% | 54 |
| Smart Meters | 9 | 0 | 9 | 21\% | 2 |
| General | 12 | 1 | 11 | 10\% | 1 |
| Transmission | 143 | 2 | 141 | 21\% | 30 |
| Subtotal-2020 Vintage | 424 | 6 | 418 |  | 87 |
| Subtotals - CAP OPEB Expense |  |  |  |  |  |
| Distribution | 260 | 484 | (224) | -17\% | 39 |
| Smart Meters | 9 | 1 | 8 | 21\% | 2 |
| General | 12 | 80 | (68) | 4\% | (3) |
| Transmission | 143 | 176 | (33) | 95\% | (31) |
| . CAP OPEB Expense | 424 | 741 | (318) |  | 6 |

## Deferred Type: CAP OPEB Payment

| Vintage 2008 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (61) | 61 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (6) | 6 | 36\% | 2 |
| Subtotal-2008 Vintage | 0 | (68) | 68 |  | 2 |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 0 | (39) | 39 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (22) | 22 | 36\% | 8 |
| Subtotal-2009 Vintage | 0 | (60) | 60 |  | 8 |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 0 | (84) | 84 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (36) | 36 | 35\% | 13 |
| Subtotal-2010 Vintage | 0 | (120) | 120 |  | 13 |


| Vintage 2011 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (66) | 66 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (7) | 7 | 2\% | 0 |
| Transmission | 0 | (32) | 32 | 36\% | 11 |
| Subtotal-2011 Vintage | 0 | (104) | 104 |  | 11 |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | (42) | 42 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (11) | 11 | 2\% | 0 |
| Transmission | 0 | (20) | 20 | 35\% | 7 |
| Subtotal-2012 Vintage | 0 | (73) | 73 |  | 7 |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | (43) | 43 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (10) | 10 | 2\% | 0 |
| Transmission | 0 | (16) | 16 | 35\% | 6 |
| Subtotal-2013 Vintage | 0 | (69) | 69 |  | 6 |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 0 | (30) | 30 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (16) | 16 | 2\% | 0 |
| Transmission | 0 | (8) | 8 | 35\% | 3 |
| Subtotal-2014 Vintage | 0 | (54) | 54 |  | 3 |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 0 | (48) | 48 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (9) | 9 | 3\% | 0 |
| Transmission | 0 | (13) | 13 | 35\% | 4 |
| Subtotal-2015 Vintage | 0 | (70) | 70 |  | 5 |
| Vintage 2016 |  |  |  |  |  |
| Distribution | 0 | (25) | 25 | 35\% | 9 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (12) | 12 | 18\% | 2 |
| Transmission | 0 | (16) | 16 | 35\% | 6 |
| Subtotal-2016 Vintage | 0 | (54) | 54 |  | 17 |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 0 | (60) | 60 | 35\% | 21 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (12) | 12 | 18\% | 2 |
| Transmission | 0 | (12) | 12 | 35\% | 4 |
| Subtotal-2017 Vintage | 0 | (84) | 84 |  | 27 |
| Vintage 2018 |  |  |  |  |  |
| Distribution | 0 | (42) | 42 | 21\% | 9 |
| Smart Meters | 0 | (6) | 6 | 21\% | 1 |
| General | 0 | (9) | 9 | 10\% | 1 |
| Transmission | 0 | (8) | 8 | 21\% | 2 |
| Subtotal-2018 Vintage | 0 | (65) | 65 |  | 13 |
| Vintage 2019 |  |  |  |  |  |
| Distribution | 0 | (44) | 44 | 21\% | 9 |
| Smart Meters | 0 | (2) | 2 | 21\% | 0 |
| General | 0 | (23) | 23 | 10\% | 2 |
| Transmission | 0 | (4) | 4 | 21\% | 1 |
| Subtotal-2019 Vintage | 0 | (74) | 74 |  | 13 |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 0 | (29) | 29 | 21\% | 6 |
| Smart Meters | 0 | (1) | 1 | 21\% | 0 |
| General | 0 | (4) | 4 | 11\% | 0 |
| Transmission | 0 | (9) | 9 | 21\% | 2 |


| Subtotal-2020 Vintage |  |  |  |  |  | DFR II-D-24 Attachment Page 19 of 31 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 0 | (43) | 43 |  | 9 |  |
| Vintage 2021 |  |  |  |  |  |  |
| Distribution | 0 | (38) | 38 | 21\% | 8 |  |
| Smart Meters | 0 | (1) | 1 | 21\% | 0 |  |
| General | 0 | (7) | 7 | 10\% | 1 |  |
| Transmission | 0 | (9) | 9 | 21\% | 2 |  |
| Subtotal-2021 Vintage | 0 | (55) | 55 |  | 11 |  |
| Vintage 2022 |  |  |  |  |  |  |
| Distribution | $(1,167)$ | (15) | $(1,152)$ | 21\% | (242) |  |
| Smart Meters | (42) | (1) | (41) | 21\% | (9) |  |
| General | (53) | (3) | (50) | 10\% | (5) |  |
| Transmission | (640) | (8) | (632) | 21\% | (133) |  |
| Subtotal-2022 Vintage | $(1,902)$ | (27) | $(1,876)$ |  | (389) |  |
| Subtotals - CAP OPEB Payment |  |  |  |  |  |  |
| Distribution | $(1,167)$ | (666) | (501) | 36\% | (180) |  |
| Smart Meters | (42) | (11) | (31) | 21\% | (7) |  |
| General | (53) | (124) | 71 | 7\% | 5 |  |
| Transmission | (640) | (218) | (422) | 15\% | (62) |  |
| CAP OPEB Payment | $(1,902)$ | $(1,020)$ | (883) |  | (244) |  |

## Deferred Type: CAP Pension Expense

| Vintage 2008 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (20) | 20 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (2) | 2 | 36\% | 1 |
| Subtotal-2008 Vintage | 0 | (22) | 22 |  | 1 |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 0 | 12 | (12) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 6 | (6) | 36\% | (2) |
| Subtotal-2009 Vintage | 0 | 18 | (18) |  | (2) |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 0 | 188 | (188) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 80 | (80) | 35\% | (28) |
| Subtotal-2010 Vintage | 0 | 268 | (268) |  | (28) |
| Vintage 2011 |  |  |  |  |  |
| Distribution | 0 | 359 | (359) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 38 | (38) | 2\% | (1) |
| Transmission | 0 | 174 | (174) | 36\% | (62) |
| Subtotal-2011 Vintage | 0 | 571 | (571) |  | (63) |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | 395 | (395) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 102 | (102) | 2\% | (2) |
| Transmission | 0 | 191 | (191) | 35\% | (68) |
| Subtotal-2012 Vintage | 0 | 688 | (688) |  | (70) |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | 396 | (396) | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 95 | (95) | 2\% | (2) |
| Transmission | 0 | 148 | (148) | 35\% | (53) |
| Subtotal-2013 Vintage | 0 | 639 | (639) |  | (55) |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 0 | 262 | (262) | 0\% | 0 |

Smart Meters

Transmission Subtotal-2014 Vintage

Vintage 2015
Distribution
Smart Meters
General
Transmission
Subtotal-2015 Vintage
Vintage 2016
Distribution
Smart Meters
General
Transmission
Subtotal-2016 Vintage
Vintage 2017
Distribution
Smart Meters General
Transmission
Subtotal-2017 Vintage
Vintage 2018
Distribution
Smart Meters General Transmission
Subtotal-2018 Vintage
Vintage 2019
Distribution
Smart Meters
General
Transmission
Subtotal-2019 Vintage
Vintage 2020
Distribution
Smart Meters
General
Transmission
Subtotal-2020 Vintage
Vintage 2021
Distribution
Smart Meters
General
Transmission
Subtotal-2021 Vintage
Vintage 2022
Distribution
Smart Meters
General
Transmission
Subtotal-2022 Vintage
Subtotals - CAP Pension Expense
Distribution
Smart Meters
General
Transmission
AP Pension Expense

| 0 | 0 | 0 | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 140 | $(140)$ | $2 \%$ | $(3)$ |
| 0 | 71 | $(71)$ | $35 \%$ | $(25)$ |
| 0 | 474 | $(474)$ |  | $(28)$ |


| 0 | 288 | $(288)$ | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 54 | $(54)$ | $3 \%$ | $(1)$ |
| 0 | 76 | $(76)$ | $35 \%$ | $(27)$ |
| 0 | 418 | $(418)$ |  | $(28)$ |


| Vintage 2008 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (247) | 247 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (26) | 26 | 36\% | 9 |
| Subtotal-2008 Vintage | 0 | (272) | 272 |  | 9 |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 0 | (286) | 286 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (159) | 159 | 36\% | 57 |
| Subtotal-2009 Vintage | 0 | (445) | 445 |  | 57 |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 0 | (894) | 894 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (382) | 382 | 35\% | 135 |
| Subtotal-2010 Vintage | 0 | $(1,275)$ | 1,275 |  | 135 |
| Vintage 2011 |  |  |  |  |  |
| Distribution | 0 | (273) | 273 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (29) | 29 | 2\% | 1 |
| Transmission | 0 | (132) | 132 | 36\% | 47 |
| Subtotal-2011 Vintage | 0 | (434) | 434 |  | 48 |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | (635) | 635 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (165) | 165 | 2\% | 3 |
| Transmission | 0 | (306) | 306 | 35\% | 109 |
| Subtotal-2012 Vintage | 0 | $(1,106)$ | 1,106 |  | 112 |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | (340) | 340 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (82) | 82 | 2\% | 2 |
| Transmission | 0 | (127) | 127 | 35\% | 45 |
| Subtotal-2013 Vintage | 0 | (549) | 549 |  | 47 |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 0 | (23) | 23 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (13) | 13 | 2\% | 0 |
| Transmission | 0 | (6) | 6 | 35\% | 2 |
| Subtotal-2014 Vintage | 0 | (42) | 42 |  | 3 |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 0 | 0 | 0 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-2015 Vintage | 0 | 0 | 0 |  | 0 |
| Vintage 2016 |  |  |  |  |  |
| Distribution | 0 | (355) | 355 | 35\% | 124 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (174) | 174 | 18\% | 31 |
| Transmission | 0 | (224) | 224 | 35\% | 79 |
| Subtotal-2016 Vintage | 0 | (753) | 753 |  | 234 |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 0 | $(1,604)$ | 1,604 | 35\% | 561 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (318) | 318 | 18\% | 56 |
| Transmission | 0 | (334) | 334 | 35\% | 118 |


| Vintage 2018 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (159) | 159 | 21\% | 33 |
| Smart Meters | 0 | (21) | 21 | 21\% | 5 |
| General | 0 | (35) | 35 | 10\% | 4 |
| Transmission | 0 | (28) | 28 | 21\% | 6 |
| Subtotal-2018 Vintage | 0 | (244) | 244 |  | 48 |
| Vintage 2019 |  |  |  |  |  |
| Distribution | 0 | (103) | 103 | 21\% | 22 |
| Smart Meters | 0 | (5) | 5 | 21\% | 1 |
| General | 0 | (55) | 55 | 11\% | 6 |
| Transmission | 0 | (9) | 9 | 21\% | 2 |
| Subtotal-2019 Vintage | 0 | (173) | 173 |  | 30 |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 0 | (98) | 98 | 21\% | 20 |
| Smart Meters | 0 | (4) | 4 | 21\% | 1 |
| General | 0 | (14) | 14 | 10\% | 1 |
| Transmission | 0 | (30) | 30 | 21\% | 6 |
| Subtotal-2020 Vintage | 0 | (146) | 146 |  | 29 |
| Vintage 2021 |  |  |  |  |  |
| Distribution | 0 | (101) | 101 | 21\% | 21 |
| Smart Meters | 0 | (3) | 3 | 21\% | 1 |
| General | 0 | (19) | 19 | 10\% | 2 |
| Transmission | 0 | (22) | 22 | 21\% | 5 |
| Subtotal-2021 Vintage | 0 | (145) | 145 |  | 29 |
| Vintage 2022 |  |  |  |  |  |
| Distribution | $(3,087)$ | (40) | $(3,046)$ | 21\% | (640) |
| Smart Meters | (111) | (1) | (109) | 21\% | (23) |
| General | (141) | (8) | (133) | 10\% | (14) |
| Transmission | $(1,692)$ | (21) | $(1,671)$ | 21\% | (351) |
| Subtotal-2022 Vintage | $(5,030)$ | (71) | $(4,960)$ |  | $(1,028)$ |
| Subtotals - CAP Pension Payment |  |  |  |  |  |
| Distribution | $(3,087)$ | $(5,159)$ | 2,072 | 7\% | 143 |
| Smart Meters | (111) | (35) | (76) | 21\% | (16) |
| General | (141) | (910) | 769 | 12\% | 92 |
| Transmission | $(1,692)$ | $(1,807)$ | 115 | 234\% | 270 |
| AP Pension Payment | $(5,030)$ | $(7,911)$ | 2,881 |  | 488 |



| Vintage 2004 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (25) | 25 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (1) | 1 | 36\% | 0 |
| Subtotal-2004 Vintage | 0 | (26) | 26 |  | 0 |
| Vintage 2005 |  |  |  |  |  |
| Distribution | 0 | (50) | 50 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | (7) | 7 | 36\% | 2 |
| Subtotal-2005 Vintage | 0 | (57) | 57 |  | 2 |
| Vintage 2006 |  |  |  |  |  |
| Distribution | 0 | (32) | 32 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (28) | 28 | 2\% | 1 |
| Transmission | 0 | (15) | 15 | 36\% | 5 |
| Subtotal-2006 Vintage | 0 | (75) | 75 |  | 6 |
| Vintage 2007 |  |  |  |  |  |
| Distribution | 0 | (19) | 19 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (0) | 0 | 2\% | 0 |
| Transmission | 0 | (11) | 11 | 36\% | 4 |
| Subtotal-2007 Vintage | 0 | (30) | 30 |  | 4 |
| Vintage 2008 |  |  |  |  |  |
| Distribution | 0 | (38) | 38 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 1 | (1) | 2\% | (0) |
| Transmission | 0 | (9) | 9 | 35\% | 3 |
| Subtotal-2008 Vintage | 0 | (47) | 47 |  | 3 |
| Vintage 2009 |  |  |  |  |  |
| Distribution | 0 | (85) | 85 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (1) | 1 | 2\% | 0 |
| Transmission | 0 | (15) | 15 | 35\% | 5 |
| Subtotal-2009 Vintage | 0 | (100) | 100 |  | 5 |
| Vintage 2010 |  |  |  |  |  |
| Distribution | 0 | (76) | 76 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (3) | 3 | 2\% | 0 |
| Transmission | 0 | (3) | 3 | 36\% | 1 |
| Subtotal-2010 Vintage | 0 | (83) | 83 |  | 1 |
| Vintage 2011 |  |  |  |  |  |
| Distribution | 0 | (49) | 49 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (6) | 6 | 2\% | 0 |
| Transmission | 0 | (46) | 46 | 36\% | 16 |
| Subtotal-2011 Vintage | 0 | (101) | 101 |  | 16 |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | (83) | 83 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (20) | 20 | 2\% | 0 |
| Transmission | 0 | (86) | 86 | 35\% | 31 |
| Subtotal-2012 Vintage | 0 | (188) | 188 |  | 31 |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | (69) | 69 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (23) | 23 | 2\% | 0 |
| Transmission | 0 | (23) | 23 | 35\% | 8 |
| Subtotal-2013 Vintage | 0 | (115) | 115 |  | 9 |


| Vintage 2014 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | (42) | 42 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (31) | 31 | 2\% | 1 |
| Transmission | 0 | (32) | 32 | 35\% | 11 |
| Subtotal-2014 Vintage | 0 | (105) | 105 |  | 12 |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 0 | (77) | 77 | 0\% | 0 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (4) | 4 | 3\% | 0 |
| Transmission | 0 | (11) | 11 | 35\% | 4 |
| Subtotal-2015 Vintage | 0 | (92) | 92 |  | 4 |
| Vintage 2016 |  |  |  |  |  |
| Distribution | 0 | (43) | 43 | 35\% | 15 |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | (4) | 4 | 18\% | 1 |
| Transmission | 0 | (16) | 16 | 35\% | 6 |
| Subtotal-2016 Vintage | 0 | (62) | 62 |  | 21 |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 0 | (51) | 51 | 35\% | 18 |
| Smart Meters | 0 | (17) | 17 | 35\% | 6 |
| General | 0 | (143) | 143 | 18\% | 25 |
| Transmission | 0 | (12) | 12 | 35\% | 4 |
| Subtotal-2017 Vintage | 0 | (223) | 223 |  | 53 |
| Vintage 2018 |  |  |  |  |  |
| Distribution | 0 | (30) | 30 | 21\% | 6 |
| Smart Meters | 0 | (1) | 1 | 21\% | 0 |
| General | 0 | (511) | 511 | 10\% | 54 |
| Transmission | 0 | (23) | 23 | 21\% | 5 |
| Subtotal-2018 Vintage | 0 | (565) | 565 |  | 65 |
| Vintage 2019 |  |  |  |  |  |
| Distribution | 0 | (34) | 34 | 21\% | 7 |
| Smart Meters | 0 | 1 | (1) | 21\% | (0) |
| General | 0 | (788) | 788 | 11\% | 83 |
| Transmission | 0 | (11) | 11 | 21\% | 2 |
| Subtotal-2019 Vintage | 0 | (833) | 833 |  | 92 |
| Vintage 2020 |  |  |  |  |  |
| Distribution | 0 | (44) | 44 | 21\% | 9 |
| Smart Meters | 0 | (3) | 3 | 21\% | 1 |
| General | 0 | (143) | 143 | 11\% | 15 |
| Transmission | 0 | (22) | 22 | 21\% | 5 |
| Subtotal-2020 Vintage | 0 | (213) | 213 |  | 30 |
| Vintage 2021 |  |  |  |  |  |
| Distribution | 0 | (57) | 57 | 21\% | 12 |
| Smart Meters | 0 | (1) | 1 | 21\% | 0 |
| General | 0 | (402) | 402 | 11\% | 42 |
| Transmission | 0 | (16) | 16 | 21\% | 3 |
| Subtotal-2021 Vintage | 0 | (477) | 477 |  | 58 |
| Vintage 2022 |  |  |  |  |  |
| Distribution | $(1,639)$ | (21) | $(1,618)$ | 21\% | (340) |
| Smart Meters | (57) | (1) | (56) | 21\% | (12) |
| General | $(1,629)$ | (191) | $(1,439)$ | 10\% | (151) |
| Transmission | $(1,057)$ | (13) | $(1,044)$ | 21\% | (219) |
| Subtotal-2022 Vintage | $(4,383)$ | (226) | $(4,157)$ |  | (722) |
| Subtotals - Capitalized Interest |  |  |  |  |  |
| Distribution | $(1,639)$ | $(1,042)$ | (597) | 46\% | (272) |
| Smart Meters | (57) | (22) | (35) | 14\% | (5) |
| General | $(1,629)$ | $(2,299)$ | 670 | 11\% | 71 |
| Transmission | $(1,057)$ | (388) | (669) | 14\% | (97) |

## Deferred Type: Repair Disallowed Loss 481a

Vintage 2013
Distribution 0
Smart Meters 0
General

| $(282)$ | 282 |
| :---: | ---: |
| 0 | 0 |
| 0 | 0 |

35\%
99

0
0
0

0
0

Transmission

## Jisallowed Loss 481a

Deferred Type: South Georgia
Vintage 2011
Distribution
Smart Meters
General
Transmission
total - South Georgia

| 0 | 0 | 0 | $0 \%$ | 0 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | $0 \%$ | 0 |
| 0 | 0 | 0 | $0 \%$ | 12 |
| 0 | 0 | 0 | $0 \%$ | 1,098 |
| 0 | 0 | 0 |  | 1,110 |

Deferred Type: Tax UoP 481a

Vintage 1991
Distribution
Smart Meters
General
Transmission
Subtotal-1991 Vintage

Vintage 1992
Distribution
Smart Meters
General
Transmission
Subtotal-1992 Vintage
Vintage 1993
Distribution
Smart Meters
General
Transmission
Subtotal-1993 Vintage
Vintage 1994
Distribution
Smart Meters
General
Transmission
Subtotal-1994 Vintage

Vintage 1995
Distribution
Smart Meters
General
Transmission
Subtotal-1995 Vintage
Vintage 1996
Distribution
Smart Meters
General
Transmission
Subtotal-1996 Vintage

Vintage 1997
Distribution
Smart Meters
General
Transmission
Subtotal-1997 Vintage
Vintage 1998
Distribution
Smart Meters
General
Transmission
Subtotal-1998 Vintage

| 0 | $(22)$ | 22 | $35 \%$ | 8 |
| ---: | ---: | ---: | ---: | ---: |
| 0 | $(304)$ | 304 | 107 |  |

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| Vintage 1999 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 458 | (458) | 35\% | (160) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 28 | (28) | 36\% | (10) |
| Subtotal-1999 Vintage | 0 | 486 | (486) |  | (170) |
| Vintage 2000 |  |  |  |  |  |
| Distribution | 0 | 452 | (452) | 35\% | (158) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 32 | (32) | 36\% | (12) |
| Subtotal-2000 Vintage | 0 | 484 | (484) |  | (170) |
| Vintage 2001 |  |  |  |  |  |
| Distribution | 0 | 280 | (280) | 35\% | (98) |
| Smart Meters | 0 | 0 | ) | 0\% | ) |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 0 | 0 | 0\% | 0 |
| Subtotal-2001 Vintage | 0 | 280 | (280) |  | (98) |
| $\underline{V}$ intage 2002 |  |  |  |  |  |
| Distribution | 0 | 268 | (268) | 35\% | (94) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 9 | (9) | 35\% | (3) |
| Subtotal-2002 Vintage | 0 | 277 | (277) |  | (97) |
| Vintage 2003 |  |  |  |  |  |
| Distribution | 0 | 335 | (335) | 35\% | (117) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 49 | (49) | 36\% | (17) |
| Subtotal-2003 Vintage | 0 | 384 | (384) |  | (135) |
| Vintage 2004 |  |  |  |  |  |
| Distribution | 0 | 371 | (371) | 35\% | (130) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 22 | (22) | 35\% | (8) |
| Subtotal-2004 Vintage | 0 | 393 | (393) |  | (138) |
| Vintage 2005 |  |  |  |  |  |
| Distribution | 0 | 887 | (887) | 35\% | (310) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 78 | (78) | 35\% | (28) |
| Subtotal-2005 Vintage | 0 | 965 | (965) |  | (338) |
| Vintage 2006 |  |  |  |  |  |
| Distribution | 0 | 634 | (634) | 35\% | (222) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 101 | (101) | 36\% | (36) |
| Subtotal-2006 Vintage | 0 | 735 | (735) |  | (258) |
| Vintage 2007 |  |  |  |  |  |
| Distribution | 0 | 428 | (428) | 35\% | (150) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 22 | (22) | 36\% | (8) |
| Subtotal-2007 Vintage | 0 | 450 | (450) |  | (158) |
| Vintage 2008 |  |  |  |  |  |
| Distribution | 0 | 409 | (409) | 35\% | (143) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 100 | (100) | 36\% | (36) |


| Subtotal-2008 Vintage |  |  |  |  |  | DFR II-D-24 Attachment Page 30 of 31 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 0 | 510 | (510) |  | (179) |  |
| Vintage 2009 |  |  |  |  |  |  |
| Distribution | 0 | 605 | (605) | 35\% | (212) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | 0 | 12 | (12) | 36\% | (4) |  |
| Subtotal-2009 Vintage | 0 | 617 | (617) |  | (216) |  |
| Vintage 2010 |  |  |  |  |  |  |
| Distribution | 0 | 821 | (821) | 35\% | (287) |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | 0 | 60 | (60) | 35\% | (21) |  |
| Subtotal-2010 Vintage | 0 | 881 | (881) |  | (309) |  |
| Subtotals - Tax UoP 481a |  |  |  |  |  |  |
| Distribution | 0 | 7,507 | $(7,507)$ | 35\% | $(2,627)$ |  |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |  |
| General | 0 | 0 | 0 | 0\% | 0 |  |
| Transmission | 0 | 633 | (633) | 36\% | (225) |  |
| btotal - Tax UoP 481a | 0 | 8,140 | $(8,140)$ |  | $(2,852)$ |  |

Deferred Type: Tax UoP Repair

| Vintage 2011 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Distribution | 0 | 1,034 | $(1,034)$ | 35\% | (362) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 36 | (36) | 36\% | (13) |
| Subtotal-2011 Vintage | 0 | 1,070 | $(1,070)$ |  | (375) |
| Vintage 2012 |  |  |  |  |  |
| Distribution | 0 | 880 | (880) | 35\% | (308) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 186 | (186) | 35\% | (66) |
| Subtotal-2012 Vintage | 0 | 1,066 | $(1,066)$ |  | (374) |
| Vintage 2013 |  |  |  |  |  |
| Distribution | 0 | 1,572 | $(1,572)$ | 35\% | (550) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 87 | (87) | 35\% | (31) |
| Subtotal-2013 Vintage | 0 | 1,659 | $(1,659)$ |  | (581) |
| Vintage 2014 |  |  |  |  |  |
| Distribution | 0 | 2,181 | $(2,181)$ | 35\% | (763) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 56 | (56) | 35\% | (20) |
| Subtotal-2014 Vintage | 0 | 2,237 | $(2,237)$ |  | (783) |
| Vintage 2015 |  |  |  |  |  |
| Distribution | 0 | 1,239 | $(1,239)$ | 35\% | (434) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 101 | (101) | 18\% | (18) |
| Transmission | 0 | 2 | (2) | 35\% | (1) |
| Subtotal-2015 Vintage | 0 | 1,342 | $(1,342)$ |  | (452) |
| Vintage 2016 |  |  |  |  |  |
| Distribution | 0 | 1,461 | $(1,461)$ | 35\% | (511) |
| Smart Meters | 0 | 0 | 0 | 0\% | 0 |
| General | 0 | 0 | 0 | 0\% | 0 |
| Transmission | 0 | 129 | (129) | 35\% | (46) |
| Subtotal-2016 Vintage | 0 | 1,591 | $(1,591)$ |  | (557) |
| Vintage 2017 |  |  |  |  |  |
| Distribution | 0 | 1,546 | $(1,546)$ | 35\% | (541) |


| Smart Meters | 0 | 0 | 0 | $0 \%$ | 0 | Page 31 of 31 |
| :--- | :--- | :--- | :--- | ---: | :---: | :---: |
| General | 0 | 0 | 0 | $0 \%$ | 0 |  |
| Transmission | 0 | 7 | $(7)$ | $35 \%$ | $(3)$ |  |
| Subtotal-2017 Vintage | 0 | 1,553 | $(1,553)$ | $(544)$ |  |  |

Q.25. Submit a schedule showing a breakdown of accumulated and unamortized investment tax credits, by vintage year and percentage rate, together with calculations supporting the amortized amount claimed as a reduction to pro forma income taxes. Provide details of methods used to write-off the unamortized balances.
A.25. Duquesne Light Company has no accumulated and unamortized investment tax credits in the test year. As such, there will be no investment tax credit amortization reflected on Schedule D-18 in DLC Exhibits 2 (Fully Projected Future Test Year), Exhibit 3 (Future Test Year) and Exhibit 4 (Historic Test Year).
D.26. Explain in detail by statement or exhibit the appropriateness of claiming any additional items, not otherwise specifically explained and supported in the statement of operating income.
A.26. An explanation of Duquesne Light Company's claim for any additional operating income items is set forth in Section D of DLC Exhibit 2 (Fully Projected Future Test Year).
Q.27. If the utility's operations include non-jurisdictional activities, provide a schedule which demonstrates the manner in which rate base and operating income date have been adjusted to develop the jurisdictional test year claim.
A.27. Total system measures of value and components of operating income have been allocated between the Total Company and Pennsylvania PUC jurisdictions and the proposed revenue increase has been determined on a Pennsylvania PUC jurisdictional basis only. Please refer to Exhibit 5, Statement No. 15 - direct testimony of Howard Gorman and DLC Exhibit 6.
Q.1. Supply a copy of any budget utilized as a basis for any test year claim, and explain the utility's budgeting process.
A.1. Attachment DFR-II-E-1 is a summary of the operating budget utilized as the basis for the Duquesne Light Company's future test year claim. An explanation of the Company's budgeting process is contained in the Direct Testimony of Jaime A. Bachota.

|  | DUQUESNE LIGHT COMPANY STATEMENT OF INCOME Operating Budget |  |  |  | 3rd Qtr |  | 4th Qtr |  |  | ime A. Bachota |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 1st Qtr |  | 2nd Qtr |  |  |  |  | Total 12 Mos. 2/31/2021 |
| UTILITY OPERATING INCOME |  |  |  |  |  |  |  |  |  |  |
| Operating Revenues (400) | \$ | 230,447,275 | \$ | 228,498,991 | \$ | 278,947,920 |  |  | \$ | 237,776,693 | \$ | 975,670,880 |
| Operating Expenses |  |  |  |  |  |  |  |  |  |  |
| Operation Expenses (401) |  | 101,840,087 |  | 94,270,359 |  | 115,497,569 |  | 92,698,515 |  | 404,306,530 |
| Maintenance Expenses (402) |  | 12,093,528 |  | 11,194,621 |  | 13,715,356 |  | 11,007,965 |  | 48,011,470 |
| Depreciation Expense (403) |  | 50,348,046 |  | 50,905,500 |  | 51,780,423 |  | 52,821,031 |  | 205,855,000 |
| Amort. \& Depl. Of Utility Plant (404-405) |  | - |  | - |  | - |  | - |  | - |
| Regulatory Debits (Credits), net (407.3,407.4) |  | - |  | - |  | - |  | - |  | - |
| Taxes Other Than Income Taxes (408) |  | 15,131,591 |  | 14,406,191 |  | 17,568,881 |  | 14,744,337 |  | 61,851,000 |
| Income Taxes - Federal (409.1) |  | 7,249,837 |  | 7,467,507 |  | 11,554,742 |  | 8,251,322 |  | 34,523,408 |
| Income Taxes - Other (409.1) |  | 2,632,693 |  | 2,711,737 |  | 4,195,968 |  | 2,996,370 |  | 12,536,768 |
| Provision for Deferred Income Taxes, net (410.1,411.1) |  | $(498,215)$ |  | $(513,173)$ |  | $(794,052)$ |  | $(567,038)$ |  | $(2,372,478)$ |
| Investment Tax Credit, net (411.7) |  | - |  | - |  | - |  | - |  | - |
| Total Utility Operating Expenses |  | 188,797,567 |  | 180,442,741 |  | 213,518,888 |  | 181,952,502 |  | 764,711,698 |
| Net Utility Operating Income |  | 41,649,708 |  | 48,056,250 |  | 65,429,033 |  | 55,824,191 |  | 210,959,182 |
| OTHER INCOME AND DEDUCTIONS |  |  |  |  |  |  |  |  |  |  |
| Other Income |  |  |  |  |  |  |  |  |  |  |
| Equity in Earnings of Subsidiary Companies (418.1) |  | - |  | - |  | - |  | - |  | - |
| Interest and Dividend Income (419) |  | - |  | - |  | - |  | - |  | - |
| Allowance for Other Funds Used During Construction (419.1) |  | 867,548 |  | 1,261,799 |  | 1,661,856 |  | 1,832,969 |  | 5,624,172 |
| Miscellaneous Nonoperating Income (421) |  | - |  | - |  | - |  | - |  | - |
| Gain on Disposition of Property (421.1) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income |  | 867,548 |  | 1,261,799 |  | 1,661,856 |  | 1,832,969 |  | 5,624,172 |
| Other Income Deductions |  |  |  |  |  |  |  |  |  |  |
| Loss on Disposition of Property (421.2) |  | - |  | - |  | - |  | - |  | - |
| Donations (426.1) |  | 847,074 |  | 1,133,274 |  | 757,274 |  | 1,094,739 |  | 3,832,360 |
| Penalties (426.3) |  | - |  | - |  | - |  | - |  | - |
| Exp. for Certain Civic, Political, \& Related Activities (426.4) |  | - |  | - |  | - |  | - |  | - |
| Other Deductions (426.5) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income Deductions |  | 847,074 |  | 1,133,274 |  | 757,274 |  | 1,094,739 |  | 3,832,360 |
| Taxes Applicable to Other Income and Deductions |  |  |  |  |  |  |  |  |  |  |
| Income Taxes - Federal (409.2) |  | $(21,274)$ |  | $(21,912)$ |  | $(33,906)$ |  | $(24,212)$ |  | $(101,304)$ |
| Income Taxes - Other (409.2) |  | $(8,470)$ |  | $(8,724)$ |  | $(13,500)$ |  | $(9,640)$ |  | $(40,334)$ |
| Provision for Def. Inc. Taxes (410.2) |  | 237,113 |  | 244,232 |  | 377,909 |  | 269,868 |  | 1,129,122 |
| (Less) Provision for Def. Inc. Taxes (411.2) |  | $(98,663)$ |  | $(101,625)$ |  | $(157,249)$ |  | $(112,292)$ |  | $(469,830)$ |
| Total Taxes on Other Inc. and Ded. |  | 108,706 |  | 111,970 |  | 173,255 |  | 123,723 |  | 517,655 |
| Net Other Income and Deductions |  | $(88,232)$ |  | 16,555 |  | 731,327 |  | 614,508 |  | 1,274,158 |
| Interest Charges |  |  |  |  |  |  |  |  |  |  |
| Interest on Long-Term Debt (427) |  | 14,496,750 |  | 14,496,750 |  | 14,496,750 |  | 14,496,750 |  | 57,987,000 |
| Amortization of Debt Disc. and Expense (428) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Loss on Reaquired Debt (428.1) |  | 764,866 |  | 435,726 |  | 555,723 |  | 642,440 |  | 2,398,755 |
| Amortization of Premium on Debt - Credit (429) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Gain on Reacquired Debt - Credit (429.1) |  | - |  | - |  | - |  | - |  | - |
| Interest on Debt to Assoc. Companies (430) |  | 10,521 |  | 37,388 |  | 93,343 |  | 281,362 |  | 422,614 |
| Other Interest Expense (431) |  | 204,041 |  | 265,020 |  | 230,118 |  | 193,541 |  | 892,719 |
| Allowance for Borrowed Funds Used During Construction-Cr. (432) |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(1,689,332)$ |
| Net Interest Charges |  | 15,053,845 |  | 14,812,551 |  | 14,953,600 |  | 15,191,760 |  | 60,011,756 |
| Net Income | \$ | 26,507,631 | \$ | 33,260,254 | \$ | 51,206,759 | \$ | 41,246,939 | \$ | 152,221,584 |

DFR II-E-2
Page 1 of 1 Jaime Bachota
Q.2. Supply summaries of the utility's projected operating and capital budgets for the 2 calendar years following the end of the test year.
A.2. Attachment DFR II-E-2a provides the Company's projected operating budget for 2021 and 2022. Attachment DFR II-E-2b provides the Company's capital budget for 2021 and 2022.

## DUQUESNE LIGHT COMPANY

Projected Operating Budget (a)
For the Years Ended December 31, (Thousands of Dollars)

|  | 2021 |  | 2022 |  |
| :---: | :---: | :---: | :---: | :---: |
| Operating Revenue | \$ | 975,671 | \$ | 999,239 |
| Operating expenses: |  |  |  |  |
| Fuel and Purchased Power |  | 206,041 |  | 215,490 |
| Other Operating |  | 246,277 |  | 257,888 |
| Taxes Other than Income |  | 61,851 |  | 64,589 |
| Depreciation and Amortization |  | 205,855 |  | 215,394 |
| Income Tax Expense |  | 44,688 |  | 44,550 |
| Total Operating Expenses |  | 764,712 |  | 797,911 |
| Operating income | \$ | 210,959 | \$ | 201,327 |
| OTHER INCOME AND DEDUCTIONS |  |  |  |  |
| Other Income/(Expense) |  | 1,274 |  | 2,123 |
| Interest Expense |  | 60,012 |  | 64,571 |
| Net Income | \$ | 152,222 | \$ | 138,879 |

## DUQUESNE LIGHT COMPANY

Projected Capital Budget
For the Years Ended December 31, (\$ Thousands)

| Budget Category | 2021 |  | 2022 |  |
| :---: | :---: | :---: | :---: | :---: |
| Restoration of Service | \$ | 38,467 | \$ | 38,658 |
| Customer Commitment |  | 28,399 |  | 28,545 |
| Programmatic Spend |  | 86,116 |  | 82,244 |
| Utility Support (Facilities, Vehicles, Meters) |  | 28,444 |  | 21,781 |
| Information Technology |  | 42,597 |  | 38,304 |
| Advanced Distribution Management System (ADMS) |  | 8,882 |  | 4,167 |
| LTIIP Specific Projects |  | 25,703 |  | 40,487 |
| Transmission Resiliency and Growth Capital |  | 57,122 |  | 60,739 |
| Additional Resiliency and Growth Capital |  | 98,999 |  | 68,208 |
| Total Less AFUDC |  | 414,729 |  | 383,133 |
| AFUDC |  | 9,244 |  | 11,344 |
| Total with AFUDC | \$ | 423,972 | \$ | 394,477 |

Duquesne Light Company
Docket No. R-2021-3024750

DLC Exhibit 1, Part III
Rate of Return

## BOOK 2

# Duquesne Light Company 

Distribution Rate Case
Docket No. R-2021-3024750

## Filing Index

## Exhibit 1 - Summary of Filing

Book 1
Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation
Book 4
Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

Book 5
Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022) Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021)
Book 7
Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

Book 8
Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6 - Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 -Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13 - Paul R. Moul
Statement 14 - James H. Milligan
Statement 15 - How ard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10
Exhibit 6-Jurisdictional Separation and Allocated Cost of Service Studies
Book 11
Exhibit 7 - Depreciation Studies
Book 12
Confidential Testimony and Exhibits
Q.1. Provide a schedule showing the major components of claimed capitalization, and the derivation of the weighted costs of capital for the rate case claim. This schedule shall include a descriptive statement concerning the major elements of changes in claimed capitalization, cost rates and overall return from comparable historical data.
A.1. See Attachment III-A-1 for the major components claimed capitalization, and the derivation of the weighted cost of capital for the fully projected future test year rate case claim.

The major elements of change to Duquesne Light Company's (DLC) December 31, 2021 and December 31, 2022 capitalization were as follows:

In April 2020, DLC priced first mortgage bonds totaling $\$ 200.0$ million through a private placement offering. The issuance consisted of a 30 -year tranche that settled on May 5, 2020 with a maturity date of May 5,2050 . The bonds bear interest at an annual rate of $3.11 \%$. On May 6, 2020, a portion of the net proceeds were utilized to repay $\$ 167.0$ million of existing indebtedness with Duquesne Light Holdings, Inc. The remaining proceeds were utilized for general corporate purposes, including capital expenditures.

DLC cancelled all of its remaining pollution control revenue bonds in 2020, equaling $\$ 196.9$ million.

DLC does not plan to issue any long-term debt in 2021. In 2022, DLC plans to issue long-term debt in the form of first mortgage bonds totaling $\$ 150.0$ million, with an estimated interest rate of $3.50 \%$ and a 30 -year term.



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Attachment DFR III-A-1
Page 2 of 4
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| $\$$ | $1,379,800,003$ | $\$$ | $60,415,323$ | $4.38 \%$ |
| :--- | :--- | :--- | :--- | :--- |

Total Adjusted Long Term Debt
Projected FPFTY
31-Dec-22
Composite Interest Rate of Total Long Term Debt

## Projected FTY 31-Dec-21

##  <br> Long Term Debt <br> Total Long Term Debt

| Amount Outstanding | Annual Interest <br> Costs | Weighted Cost <br> Rate |  |  |
| :--- | ---: | ---: | ---: | ---: |
|  |  |  |  |  |
| $\$$ | $1,545,000,000$ | $\$$ | $63,696,500$ | $4.12 \%$ |
| $\$$ | $(13,185,968)$ | $\$$ | $2,014,029$ |  |
| $\$$ | $1,531,814,032$ | $\$$ | $65,710,529$ | $4.29 \%$ |

Long Term Debt
Total Long Term Debt
Amortization of Loss on Reacquired Debt (A/C 189)
Total Adjusted Long Term Debt

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## Total Debt

## Projected FPFTY <br> 31－Dec－22

1st Mortgage Bond 4．76\％due 2／3／42 st Mortgage Bond 4．97\％due 11／14／43 1st Mortgage Bond 5．02\％due 2／4／44 1st Mortgage Bond 5．12\％due 2／4／54 1st Mortgage Bond 3．78\％due 3／2／45 1st Mortgage Bond 3．93\％due 3／2／55 1st Mortgage Bond 3．93\％due 7／15／45 1st Mortgage Bond 3．82\％due 10／3／47 1st Mortgage Bond 3．89\％due 2／1／48 1st Mortgage Bond 4．04\％due 2／1／58 1st Mortgage Bond $3.11 \%$ due $5 / 5 / 50$
1st Mortgage Bond $3.50 \%$ due $3 / 31 / 52$

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Q.2. Provide a schedule in the same format as Schedule 1, except for the omission of the descriptive statement, for the most immediate comparable annual historical period prior to the test year and the two calendar years most immediately preceding the rate of return claim period. Irrespective of whether the capitalization claimed on Schedule 1 includes short-term debt, Schedule 2 should reflect capital ratios with and without short-term debt.
A.2. See the attached schedules showing capital ratios with and without short-term debt for the most immediate comparable annual historical period prior to the test year and the two calendar years most immediately preceding the rate of return claim period.

DUQUESNE LIGHT COMPANY
Regulatory Capitalization - Excluding Short-term Debt


DUQUESNE LIGHT COMPANY Attachment DFR III-A-2
Regulatory Capitalization - Including Short-term Debt Balance
Page 2 of 2

Q.1. Provide a schedule showing the calculation of embedded cost of long-term debt by issue, supporting the related rate case claim. The schedule shall contain the following information:
a. Date of issue.
b. Date of maturity.
c. Amount issued.
d. Amount outstanding.
e. Amount retired.
f. Amount reacquired.
g. Gain or loss on reacquisition.
h. Coupon rate.
i. Discount or premium at issuance.
j. Issuance expense.
k. Net proceeds.

1. Sinking fund requirements.
m. Effective cost rate.
n. Total average weighted effective cost rate.

Projected new issues, retirements and other major changes from the comparable historic data should be clearly noted.
A.1. Please refer to Schedule III-A-1, pages 3 and 4. Additionally, projected new issues, retirements and other major changes from the comparable historic data are noted below.

In April 2020, Duquesne Light Company (DLC) priced first mortgage bonds totaling $\$ 200.0$ million through a private placement offering. The issuance consisted of a 30 -year tranche that settled on May 5, 2020 with a maturity date of May 5, 2050. The bonds bear interest at an annual rate of $3.11 \%$. On May 6,2020 , a portion of the net proceeds were utilized to repay $\$ 167.0$ million of existing indebtedness with Duquesne Light Holdings, Inc. The remaining proceeds were utilized for general corporate purposes, including capital expenditures.

DLC cancelled all of its remaining pollution control revenue bonds in 2020, equaling $\$ 196.9$ million.

DLC does not plan to issue any long-term debt in 2021. In 2022, DLC plans to issue long-term debt in the form of first mortgage bonds totaling $\$ 150.0$ million, with an estimated interest rate of $3.50 \%$ and a 30 -year term.
Q.1. In the event that a claim made for a true or economic cost of debt exceeds that shown in the preceding nominal cost schedule because of convertible features, sale with warrants or for any other reason, a full statement of the basis for such a claim should be provided.
A.1. No claim is being made for a true or economic cost of debt that exceeds that shown in the preceding response DFR III-B-1.
Q.1. Provide the following information concerning bank notes payable for test year and for latest comparable annual historical period prior to the test year:
a. Line of credit at each bank.
b. Average daily balances of notes to each bank, by name of bank.
c. Interest rate charged on each bank note. (Prime rate, formula rate, or other).
d. Purpose of each bank note (for example, construction, fuel storage, working capital, debt retirement).
e. Prospective future need for this type of financing.
A.1.
a. Duquesne Light Company maintains a $\$ 250$ million Revolving Credit Agreement with a consortium of banks.
b. Attachment III-B-3 details the average daily balance and interest rate charged. From $1 / 1 / 2020$ to $12 / 31 / 2020$, the average daily balance of outstanding loans under the Revolving Credit Agreement was $\$ 70.5$ million. From 1/1/2021 to $12 / 31 / 2021$, the average daily balance is projected to be $\$ 23.4$ million. The Company does not forecast average daily balances through 2022, but projects an average 2022 monthly balance of $\$ 24.2$ million and a year-end 2022 balance of zero.
c. Attachment III-B-3 details the average daily balance and interest rate charged. From $1 / 1 / 2020$ to $12 / 31 / 2020$, the average interest rate of outstanding loans under the Revolving Credit Agreement was $0.65 \%$. From $1 / 1 / 2021$ to $12 / 31 / 2021$, the average interest rate of outstanding loans is projected to be $0.93 \%$. The Company projects the average 2022 rate to be $0.92 \%$ for 2022 .
d. The Company's purpose for the revolving credit facility is to provide working capital, short-term payment of capital expenditures and general corporate purposes.
e. The Company plans to maintain its credit facility to provide working capital, make short-term payment for capital expenditures (i.e., construction work-in-progress) and for general corporate purposes.

## Revolving Credit Facility Borrowings

 1/1/2020 to 12/31/2020| Date | Outstanding Balance |  | Rate | Date | Outstanding Balance | Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1/1/2020 | \$ | - | 0.00\% | 3/16/2020 | \$ - | 0.00\% |
| 1/2/2020 | \$ | - | 0.00\% | 3/17/2020 | \$ - | 0.00\% |
| 1/3/2020 | \$ | - | 0.00\% | 3/18/2020 | \$ - | 0.00\% |
| 1/4/2020 | \$ | - | 0.00\% | 3/19/2020 | \$ - | 0.00\% |
| 1/5/2020 | \$ | - | 0.00\% | 3/20/2020 | \$ - | 0.00\% |
| 1/6/2020 | \$ | - | 0.00\% | 3/21/2020 | \$ - | 0.00\% |
| 1/7/2020 | \$ | - | 0.00\% | 3/22/2020 | \$ - | 0.00\% |
| 1/8/2020 | \$ | - | 0.00\% | 3/23/2020 | \$ - | 0.00\% |
| 1/9/2020 | \$ | - | 0.00\% | 3/24/2020 | \$249,227,806 | 1.81\% |
| 1/10/2020 | \$ | - | 0.00\% | 3/25/2020 | \$249,227,806 | 1.81\% |
| 1/11/2020 | \$ | - | 0.00\% | 3/26/2020 | \$249,227,806 | 1.81\% |
| 1/12/2020 | \$ | - | 0.00\% | 3/27/2020 | \$249,227,806 | 1.81\% |
| 1/13/2020 | \$ | - | 0.00\% | 3/28/2020 | \$249,227,806 | 1.81\% |
| 1/14/2020 | \$ | - | 0.00\% | 3/29/2020 | \$249,227,806 | 1.81\% |
| 1/15/2020 | \$ | - | 0.00\% | 3/30/2020 | \$249,227,806 | 1.81\% |
| 1/16/2020 | \$ |  | 0.00\% | 3/31/2020 | \$249,227,806 | 1.81\% |
| 1/17/2020 | \$ | - | 0.00\% | 4/1/2020 | \$249,227,806 | 1.81\% |
| 1/18/2020 | \$ | - | 0.00\% | 4/2/2020 | \$249,227,806 | 1.81\% |
| 1/19/2020 | \$ | - | 0.00\% | 4/3/2020 | \$249,227,806 | 1.81\% |
| 1/20/2020 | \$ | - | 0.00\% | 4/4/2020 | \$249,227,806 | 1.81\% |
| 1/21/2020 | \$ | - | 0.00\% | 4/5/2020 | \$249,227,806 | 1.81\% |
| 1/22/2020 | \$ | - | 0.00\% | 4/6/2020 | \$249,227,806 | 1.81\% |
| 1/23/2020 | \$ | - | 0.00\% | 4/7/2020 | \$249,227,806 | 1.81\% |
| 1/24/2020 | \$ | - | 0.00\% | 4/8/2020 | \$249,227,806 | 1.81\% |
| 1/25/2020 | \$ | - | 0.00\% | 4/9/2020 | \$249,227,806 | 1.81\% |
| 1/26/2020 | \$ | - | 0.00\% | 4/10/2020 | \$249,227,806 | 1.81\% |
| 1/27/2020 | \$ | - | 0.00\% | 4/11/2020 | \$249,227,806 | 1.81\% |
| 1/28/2020 | \$ | - | 0.00\% | 4/12/2020 | \$249,227,806 | 1.81\% |
| 1/29/2020 | \$ | - | 0.00\% | 4/13/2020 | \$249,227,806 | 1.81\% |
| 1/30/2020 | \$ | - | 0.00\% | 4/14/2020 | \$249,227,806 | 1.81\% |
| 1/31/2020 | \$ | - | 0.00\% | 4/15/2020 | \$249,227,806 | 1.81\% |
| 2/1/2020 | \$ | - | 0.00\% | 4/16/2020 | \$249,227,806 | 1.81\% |
| 2/2/2020 | \$ | - | 0.00\% | 4/17/2020 | \$249,227,806 | 1.81\% |
| 2/3/2020 | \$ | - | 0.00\% | 4/18/2020 | \$249,227,806 | 1.81\% |
| 2/4/2020 | \$ | - | 0.00\% | 4/19/2020 | \$249,227,806 | 1.81\% |
| 2/5/2020 | \$ | - | 0.00\% | 4/20/2020 | \$249,227,806 | 1.81\% |
| 2/6/2020 | \$ | - | 0.00\% | 4/21/2020 | \$249,227,806 | 1.81\% |
| 2/7/2020 | \$ | - | 0.00\% | 4/22/2020 | \$249,227,806 | 1.81\% |
| 2/8/2020 | \$ | - | 0.00\% | 4/23/2020 | \$249,227,806 | 1.81\% |
| 2/9/2020 | \$ | - | 0.00\% | 4/24/2020 | \$249,227,806 | 1.50\% |
| 2/10/2020 | \$ | - | 0.00\% | 4/25/2020 | \$249,227,806 | 1.50\% |
| 2/11/2020 | \$ | - | 0.00\% | 4/26/2020 | \$249,227,806 | 1.50\% |
| 2/12/2020 | \$ | - | 0.00\% | 4/27/2020 | \$249,227,806 | 1.50\% |
| 2/13/2020 | \$ | - | 0.00\% | 4/28/2020 | \$249,227,806 | 1.50\% |
| 2/14/2020 | \$ | - | 0.00\% | 4/29/2020 | \$249,227,806 | 1.50\% |
| 2/15/2020 | \$ | - | 0.00\% | 4/30/2020 | \$249,227,806 | 1.50\% |
| 2/16/2020 | \$ | - | 0.00\% | 5/1/2020 | \$249,227,806 | 1.50\% |
| 2/17/2020 | \$ | - | 0.00\% | 5/2/2020 | \$249,227,806 | 1.50\% |
| 2/18/2020 | \$ | - | 0.00\% | 5/3/2020 | \$249,227,806 | 1.50\% |
| 2/19/2020 | \$ | - | 0.00\% | 5/4/2020 | \$249,227,806 | 1.50\% |
| 2/20/2020 | \$ | - | 0.00\% | 5/5/2020 | \$249,227,806 | 1.50\% |
| 2/21/2020 | \$ | - | 0.00\% | 5/6/2020 | \$249,227,806 | 1.50\% |
| 2/22/2020 | \$ | - | 0.00\% | 5/7/2020 | \$249,227,806 | 1.50\% |
| 2/23/2020 | \$ | - | 0.00\% | 5/8/2020 | \$249,227,806 | 1.50\% |
| 2/24/2020 | \$ | - | 0.00\% | 5/9/2020 | \$249,227,806 | 1.50\% |
| 2/25/2020 | \$ | - | 0.00\% | 5/10/2020 | \$249,227,806 | 1.50\% |
| 2/26/2020 | \$ | - | 0.00\% | 5/11/2020 | \$249,227,806 | 1.50\% |
| 2/27/2020 | \$ | - | 0.00\% | 5/12/2020 | \$249,227,806 | 1.50\% |
| 2/28/2020 | \$ | - | 0.00\% | 5/13/2020 | \$249,227,806 | 1.50\% |
| 2/29/2020 | \$ | - | 0.00\% | 5/14/2020 | \$249,227,806 | 1.50\% |
| 3/1/2020 | \$ | - | 0.00\% | 5/15/2020 | \$249,227,806 | 1.50\% |
| 3/2/2020 | \$ | - | 0.00\% | 5/16/2020 | \$249,227,806 | 1.50\% |
| 3/3/2020 | \$ | - | 0.00\% | 5/17/2020 | \$249,227,806 | 1.50\% |
| 3/4/2020 | \$ | - | 0.00\% | 5/18/2020 | \$249,227,806 | 1.50\% |
| 3/5/2020 | \$ | - | 0.00\% | 5/19/2020 | \$249,227,806 | 1.50\% |
| 3/6/2020 | \$ | - | 0.00\% | 5/20/2020 | \$249,227,806 | 1.50\% |
| 3/7/2020 | \$ | - | 0.00\% | 5/21/2020 | \$249,227,806 | 1.50\% |
| 3/8/2020 | \$ | - | 0.00\% | 5/22/2020 | \$249,227,806 | 1.50\% |


| Date | Outstanding Balance | Rate |
| :---: | :---: | :---: |
| 5/29/2020 | \$ 249,227,806 | 1.06\% |
| 5/30/2020 | \$ 249,227,806 | 1.06\% |
| 5/31/2020 | \$ 249,227,806 | 1.06\% |
| 6/1/2020 | \$ 249,227,806 | 1.06\% |
| 6/2/2020 | \$ 249,227,806 | 1.06\% |
| 6/3/2020 | \$ 249,227,806 | 1.06\% |
| 6/4/2020 | \$ 249,227,806 | 1.06\% |
| 6/5/2020 | \$ 249,227,806 | 1.06\% |
| 6/6/2020 | \$ 249,227,806 | 1.06\% |
| 6/7/2020 | \$ 249,227,806 | 1.06\% |
| 6/8/2020 | \$ 249,227,806 | 1.06\% |
| 6/9/2020 | \$ 249,227,806 | 1.06\% |
| 6/10/2020 | \$ 249,227,806 | 1.06\% |
| 6/11/2020 | \$ 249,227,806 | 1.06\% |
| 6/12/2020 | \$ 249,227,806 | 1.06\% |
| 6/13/2020 | \$ 249,227,806 | 1.06\% |
| 6/14/2020 | \$ 249,227,806 | 1.06\% |
| 6/15/2020 | \$ 249,227,806 | 1.06\% |
| 6/16/2020 | \$ 249,227,806 | 1.06\% |
| 6/17/2020 | \$ 249,227,806 | 1.06\% |
| 6/18/2020 | \$ 249,227,806 | 1.06\% |
| 6/19/2020 | \$ 249,227,806 | 1.06\% |
| 6/20/2020 | \$ 249,227,806 | 1.06\% |
| 6/21/2020 | \$ 249,227,806 | 1.06\% |
| 6/22/2020 | \$ 249,227,806 | 1.06\% |
| 6/23/2020 | \$ 249,227,806 | 1.06\% |
| 6/24/2020 | \$ 249,227,806 | 1.06\% |
| 6/25/2020 | \$ 249,227,806 | 1.06\% |
| 6/26/2020 | \$ 25,000,000 | 1.06\% |
| 6/27/2020 | \$ 25,000,000 | 1.06\% |
| 6/28/2020 | \$ 25,000,000 | 1.06\% |
| 6/29/2020 | \$ 25,000,000 | 1.06\% |
| 6/30/2020 | \$ 25,000,000 | 1.06\% |
| 7/1/2020 | \$ 25,000,000 | 1.06\% |
| 7/2/2020 | \$ 25,000,000 | 1.06\% |
| 7/3/2020 | \$ 25,000,000 | 1.06\% |
| 7/4/2020 | \$ 25,000,000 | 1.06\% |
| 7/5/2020 | \$ 25,000,000 | 1.06\% |
| 7/6/2020 | \$ 25,000,000 | 1.06\% |
| 7/7/2020 | \$ 25,000,000 | 1.06\% |
| 7/8/2020 | \$ 25,000,000 | 1.06\% |
| 7/9/2020 | \$ 25,000,000 | 1.06\% |
| 7/10/2020 | \$ 25,000,000 | 1.06\% |
| 7/11/2020 | \$ 25,000,000 | 1.06\% |
| 7/12/2020 | \$ 25,000,000 | 1.06\% |
| 7/13/2020 | \$ 25,000,000 | 1.06\% |
| 7/14/2020 | \$ 25,000,000 | 1.06\% |
| 7/15/2020 | \$ 25,000,000 | 1.06\% |
| 7/16/2020 | \$ 25,000,000 | 1.06\% |
| 7/17/2020 | \$ 25,000,000 | 1.06\% |
| 7/18/2020 | \$ 25,000,000 | 1.06\% |
| 7/19/2020 | \$ 25,000,000 | 1.06\% |
| 7/20/2020 | \$ 25,000,000 | 1.06\% |
| 7/21/2020 | \$ 25,000,000 | 1.06\% |
| 7/22/2020 | \$ 25,000,000 | 1.06\% |
| 7/23/2020 | \$ 25,000,000 | 1.06\% |
| 7/24/2020 | \$ 25,000,000 | 1.06\% |
| 7/25/2020 | \$ 25,000,000 | 1.06\% |
| 7/26/2020 | \$ 25,000,000 | 1.06\% |
| 7/27/2020 | \$ 25,000,000 | 1.06\% |
| 7/28/2020 | \$ 25,000,000 | 1.06\% |
| 7/29/2020 | \$ 25,000,000 | 1.06\% |
| 7/30/2020 | \$ 25,000,000 | 1.06\% |
| 7/31/2020 | \$ 25,000,000 | 1.06\% |
| 8/1/2020 | \$ 25,000,000 | 1.06\% |
| 8/2/2020 | \$ 25,000,000 | 1.06\% |
| 8/3/2020 | \$ 25,000,000 | 1.06\% |
| 8/4/2020 | \$ 25,000,000 | 1.06\% |


| Date | Outstanding Balance | Rate | Date | Outstanding Balance |  | Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 8/11/2020 | \$ 25,000,000 | 1.06\% | 10/24/2020 | \$ |  | 0.00\% |
| 8/12/2020 | \$ 25,000,000 | 1.06\% | 10/25/2020 | \$ |  | 0.00\% |
| 8/13/2020 | \$ 25,000,000 | 1.06\% | 10/26/2020 | \$ |  | 0.00\% |
| 8/14/2020 | \$ 25,000,000 | 1.06\% | 10/27/2020 | \$ |  | 0.00\% |
| 8/15/2020 | \$ 25,000,000 | 1.06\% | 10/28/2020 | \$ |  | 0.00\% |
| 8/16/2020 | \$ 25,000,000 | 1.06\% | 10/29/2020 | \$ |  | 0.00\% |
| 8/17/2020 | \$ 25,000,000 | 1.06\% | 10/30/2020 | \$ |  | 0.00\% |
| 8/18/2020 | \$ 25,000,000 | 1.06\% | 10/31/2020 | \$ |  | 0.00\% |
| 8/19/2020 | \$ 25,000,000 | 1.06\% | 11/1/2020 | \$ |  | 0.00\% |
| 8/20/2020 | \$ 25,000,000 | 1.06\% | 11/2/2020 | \$ |  | 0.00\% |
| 8/21/2020 | \$ 25,000,000 | 1.06\% | 11/3/2020 | \$ |  | 0.00\% |
| 8/22/2020 | \$ 25,000,000 | 1.06\% | 11/4/2020 | \$ |  | 0.00\% |
| 8/23/2020 | \$ 25,000,000 | 1.06\% | 11/5/2020 | \$ |  | 0.00\% |
| 8/24/2020 | \$ 25,000,000 | 1.06\% | 11/6/2020 | \$ | - | 0.00\% |
| 8/25/2020 | \$ 25,000,000 | 1.06\% | 11/7/2020 | \$ |  | 0.00\% |
| 8/26/2020 | \$ 25,000,000 | 1.06\% | 11/8/2020 | \$ |  | 0.00\% |
| 8/27/2020 | \$ 25,000,000 | 1.06\% | 11/9/2020 | \$ |  | 0.00\% |
| 8/28/2020 | \$ 25,000,000 | 1.06\% | 11/10/2020 | \$ | - | 0.00\% |
| 8/29/2020 | \$ 25,000,000 | 1.06\% | 11/11/2020 | \$ | - | 0.00\% |
| 8/30/2020 | \$ 25,000,000 | 1.06\% | 11/12/2020 | \$ | - | 0.00\% |
| 8/31/2020 | \$ 25,000,000 | 1.06\% | 11/13/2020 | \$ | - | 0.00\% |
| 9/1/2020 | \$ 25,000,000 | 1.06\% | 11/14/2020 | \$ | - | 0.00\% |
| 9/2/2020 | \$ 25,000,000 | 1.06\% | 11/15/2020 | \$ |  | 0.00\% |
| 9/3/2020 | \$ 25,000,000 | 1.06\% | 11/16/2020 | \$ | - | 0.00\% |
| 9/4/2020 | \$ 25,000,000 | 1.06\% | 11/17/2020 | \$ | - | 0.00\% |
| 9/5/2020 | \$ 25,000,000 | 1.06\% | 11/18/2020 | \$ | - | 0.00\% |
| 9/6/2020 | \$ 25,000,000 | 1.06\% | 11/19/2020 | \$ | - | 0.00\% |
| 9/7/2020 | \$ 25,000,000 | 1.06\% | 11/20/2020 | \$ |  | 0.00\% |
| 9/8/2020 | \$ 25,000,000 | 1.06\% | 11/21/2020 | \$ | - | 0.00\% |
| 9/9/2020 | \$ 25,000,000 | 1.06\% | 11/22/2020 | \$ | - | 0.00\% |
| 9/10/2020 | \$ 25,000,000 | 1.06\% | 11/23/2020 | \$ | - | 0.00\% |
| 9/11/2020 | \$ 25,000,000 | 1.06\% | 11/24/2020 | \$ | - | 0.00\% |
| 9/12/2020 | \$ 25,000,000 | 1.06\% | 11/25/2020 | \$ | - | 0.00\% |
| 9/13/2020 | \$ 25,000,000 | 1.06\% | 11/26/2020 | \$ | - | 0.00\% |
| 9/14/2020 | \$ 25,000,000 | 1.06\% | 11/27/2020 | \$ | - | 0.00\% |
| 9/15/2020 | \$ 25,000,000 | 1.06\% | 11/28/2020 | \$ | - | 0.00\% |
| 9/16/2020 | \$ 25,000,000 | 1.06\% | 11/29/2020 | \$ | - | 0.00\% |
| 9/17/2020 | \$ 25,000,000 | 1.06\% | 11/30/2020 | \$ | - | 0.00\% |
| 9/18/2020 | \$ 25,000,000 | 1.06\% | 12/1/2020 | \$ | - | 0.00\% |
| 9/19/2020 | \$ 25,000,000 | 1.06\% | 12/2/2020 | \$ | - | 0.00\% |
| 9/20/2020 | \$ 25,000,000 | 1.06\% | 12/3/2020 | \$ | - | 0.00\% |
| 9/21/2020 | \$ 25,000,000 | 1.06\% | 12/4/2020 | \$ | - | 0.00\% |
| 9/22/2020 | \$ 25,000,000 | 1.06\% | 12/5/2020 | \$ | - | 0.00\% |
| 9/23/2020 | \$ 25,000,000 | 1.06\% | 12/6/2020 | \$ | - | 0.00\% |
| 9/24/2020 | \$ 25,000,000 | 1.06\% | 12/7/2020 | \$ | - | 0.00\% |
| 9/25/2020 | \$ 25,000,000 | 1.06\% | 12/8/2020 | \$ | - | 0.00\% |
| 9/26/2020 | \$ 25,000,000 | 1.06\% | 12/9/2020 | \$ | - | 0.00\% |
| 9/27/2020 | \$ 25,000,000 | 1.06\% | 12/10/2020 | \$ | - | 0.00\% |
| 9/28/2020 | \$ 25,000,000 | 1.06\% | 12/11/2020 | \$ | - | 0.00\% |
| 9/29/2020 | \$ | 0.00\% | 12/12/2020 | \$ | - | 0.00\% |
| 9/30/2020 | \$ | 0.00\% | 12/13/2020 | \$ | - | 0.00\% |
| 10/1/2020 | \$ | 0.00\% | 12/14/2020 | \$ | - | 0.00\% |
| 10/2/2020 | \$ | 0.00\% | 12/15/2020 | \$ | - | 0.00\% |
| 10/3/2020 | \$ | 0.00\% | 12/16/2020 | \$ | - | 0.00\% |
| 10/4/2020 | \$ | 0.00\% | 12/17/2020 | \$ | - | 0.00\% |
| 10/5/2020 | \$ | 0.00\% | 12/18/2020 | \$ | - | 0.00\% |
| 10/6/2020 | \$ | 0.00\% | 12/19/2020 | \$ | - | 0.00\% |
| 10/7/2020 | \$ | 0.00\% | 12/20/2020 | \$ | - | 0.00\% |
| 10/8/2020 | \$ | 0.00\% | 12/21/2020 | \$ | - | 0.00\% |
| 10/9/2020 | \$ | 0.00\% | 12/22/2020 | \$ | - | 0.00\% |
| 10/10/2020 | \$ | 0.00\% | 12/23/2020 | \$ | - | 0.00\% |
| 10/11/2020 | \$ | 0.00\% | 12/24/2020 | \$ | - | 0.00\% |
| 10/12/2020 | \$ | 0.00\% | 12/25/2020 | \$ | - | 0.00\% |
| 10/13/2020 | \$ | 0.00\% | 12/26/2020 | \$ | - | 0.00\% |
| 10/14/2020 | \$ | 0.00\% | 12/27/2020 | \$ | - | 0.00\% |
| 10/15/2020 | \$ | 0.00\% | 12/28/2020 | \$ | - | 0.00\% |
| 10/16/2020 | \$ | 0.00\% | 12/29/2020 | \$ | - | 0.00\% |
| 10/17/2020 | \$ | 0.00\% | 12/30/2020 | \$ | - | 0.00\% |


| $3 / 9 / 2020$ | $\$$ | - | $0.00 \%$ |
| ---: | :--- | :--- | ---: |
| $3 / 10 / 2020$ | $\$$ | - | $0.00 \%$ |
| $3 / 11 / 2020$ | $\$$ | - | $0.00 \%$ |
| $3 / 12 / 2020$ | $\$$ | - | $0.00 \%$ |
| $3 / 13 / 2020$ | $\$$ | - | $0.00 \%$ |
| $3 / 14 / 2020$ | $\$$ | - | $0.00 \%$ |
| $3 / 15 / 2020$ | $\$$ | - | $0.00 \%$ |


| $5 / 23 / 2020$ | $\$ 249,227,806$ | $1.50 \%$ |
| :--- | :--- | ---: |
| $5 / 24 / 2020$ | $\$ 249,227,806$ | $1.50 \%$ |
| $5 / 25 / 2020$ | $\$ 249,227,806$ | $1.50 \%$ |
| $5 / 26 / 2020$ | $\$ 249,227,806$ | $1.06 \%$ |
| $5 / 27 / 2020$ | $\$ 249,227,806$ | $1.06 \%$ |
| $5 / 28 / 2020$ | $\$ 249,227,806$ | $1.06 \%$ |


| $8 / 5 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |
| ---: | :--- | :--- | ---: |
| $8 / 6 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |
| $8 / 7 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |
| $8 / 8 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |
| $8 / 9 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |
| $8 / 10 / 2020$ | $\$$ | $25,000,000$ | $1.06 \%$ |


\section*{| $12 / 31 / 2020$ | $\$$ |
| :--- | :--- |}



## Revolving Credit Facility Borrowings

1/1/2021 to 12/31/2021

| Date |  | Outstanding Balance | Rate | Date | Outstanding Balance | Rate | Dat | Outstanding Balance | Ra | Da | Outstanding Balance | R | Date |  | tstanding Balance | R |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1/1/2021 | \$ | \$ 16,000,000 | 1.06 | 3/16/2021 | \$ 47,000,000 | 1.00\% | 5/29/2021 | \$ 36,000,000 | 1.00\% | 8/11/2021 | \$ 21,000,000 | 1.00\% | 10/24/2021 | \$ | ,000,000 | 1.00\% |
| 1/2/2021 | \$ | 16,000,000 | $1.06 \%$ | 3/17/2021 | \$ 47,000,000 | 1.00\% | 5/30/2021 | \$ 36,000,000 | 1.00\% | 8/12/2021 | \$ 21,000,000 | 1.0 | 10/25/2021 | \$ | 10,000,000 | 1.00 |
| 1/3/2021 | \$ | 16,000,000 | 1.06 | 3/18/2021 | \$ 47,000,000 | .00 | 5/31/2021 | 36,000,000 | 1.00\% | 8/13/2021 | \$ 21,000,000 | 1.00\% | 10/26/2021 | \$ | 10,000,000 | 1.00\% |
| 1/4/2021 | \$ | \$ 16,000,000 | 1.06 | 3/19/2021 | \$ 47,000,000 | 1.00\% | 6/1/2021 | \$ 31,000,000 | 1.00\% | 8/14/2021 | \$ 21,000,000 | 1.00\% | 10/27/2021 | \$ | 10,000,000 | 1.00\% |
| 1/5/2021 | \$ | 16,000,000 | 1.0 | 3/20/2021 | \$ 47,000,000 | 1.00\% | 6/2/2021 | \$ 31,000,000 | 1.0 | 8/15/2021 | \$ 21,000,000 | 1.00\% | 10/28/2021 | \$ | 10,000,000 | 1.00\% |
| 1/6/2021 | \$ | \$ 16,000,000 | 1.0 | 3/21/2 | \$ 47,000,000 | . 00 | 6/3/202 | \$ 31,000,000 | 1.00\% | 8/16/2021 | \$ 21,000,000 | 1.00\% | 10/29/2021 | \$ | 10,000,000 | 1.00\% |
| /2021 | \$ | 16,000,000 | 1.06\% | 3/22/20 | \$ 47,000,000 | 1.00\% | 6/4/202 | \$ 31,000,000 | 1.00\% | 8/17/2021 | \$ 21,000,000 | 1.00\% | 10/30/202 | \$ | 10,000,000 | 1.00\% |
| 1/8/2021 | \$ | 16,000,000 | 1.06\% | 3/23/2021 | \$ 47,000,000 | 1.00\% | 6/5/2021 | \$ 31,000,000 | 1.00\% | 18/2021 | \$ 21,000,000 | 1.00\% | 10/31/202 | \$ | 10,000,000 | 1.00\% |
| 1/9/2021 | \$ | 16,000,000 | 1.0 | 3/24/2021 | \$ 47,000,000 | 1.0 | 6/6/2021 | 31,000,000 | 1.0 | 8/19/2021 | \$ 21,000,000 | 1.00 | 11/1/2021 | \$ | 5,000,000 | 1.00\% |
| 1/10/2021 | \$ | 16,000,000 | 1.0 | 3/25/2021 | \$ 47,000,000 | 1.00\% | 6/7/2021 | \$ 31,000,000 | 1.00\% | 8/20/2021 | \$ 21,000,000 | 1.00\% | 11/2/202 | \$ | 5,000,000 | 1.00\% |
| 1/11/2021 | \$ | \$ 16,000,000 | 1.0 | 3/26/ | \$ 47,000,000 | 1.0 | 6/8/ | \$ 31,000,000 | 1.0 | 8/21/2021 | \$ 21,000,000 | 1.00\% | 11/3/2021 | \$ | 5,000,000 | 1.00\% |
| 1/12/2021 | \$ | \$ 16,000,000 | 1.06\% | 3/27/202 | \$ 47,000,000 | 1.00\% | 6/9/2 | \$ 31,000,000 | 1.0 | 8/22/2021 | \$ 21,000,000 | 1.00\% | 11/4/202 | \$ | 5,000,000 | 1.00\% |
| 1/13/2021 | \$ | 16,000,000 | 1.06\% | 3/28/2021 | \$ 47,000,000 | 1.00\% | 6/10/2021 | \$ 31,000,000 | 1.00\% | 8/23/202 | \$ 21,000,000 | 1.00\% | 11/5/202 | \$ | 5,000,000 | 1.00\% |
| 1/14/2021 | \$ | 16,000,000 | 1.0 | 3/29/2 | \$ 47,000,000 | 1.00\% | 6/11/2 | \$ 31,000,000 | 1. | 8/24/2021 | \$ 21,000,000 | 1.00\% | 11/6/202 | \$ | 5,000,000 | 1.00\% |
| 1/15/2021 | \$ | 16,000,000 | 1. | 3/30/2021 | \$ 47,000,000 | 1.00\% | 6/12/2021 | \$ 31,000,000 | 1.00\% | 8/25/2021 | \$ 21,000,000 | 1.00\% | 11/7/202 | \$ | 5,000,000 |  |
| 1/ | \$ | 16,000,000 | 1.06\% | 3/31/ | \$ 47,000,000 | 1.00\% | 6/13 | \$ 31,000,000 | 1.00\% | 8/26/2 | \$ 21,000,000 | 1.00\% | 11/8/2021 | \$ | 5,000,000 | 1.00\% |
| 1/17/2021 | \$ | \$ 16,000,000 | 1.0 | $1 /$ | \$ 42,000,000 | 1.00\% | 6/14 | \$ 31,000,000 | 1.00\% | 8/27/2021 | \$ 21,000,000 | 1.00\% | 11/ | \$ | 5,000,000 | 1.00\% |
| 1/18/2021 | \$ | \$ 16,000,000 | 1.06\% | /2/ | \$ 42,000,000 | 1.00\% | 6/15/202 | \$ 31,000,000 | 1.00\% | 8/28/2021 | \$ 21,000,000 | 1.00\% | 11/10/202 | \$ | 5,000,000 | 1.00\% |
| 1/19/2021 | \$ | \$ 16,000,000 | 1.06\% | 4/3/2021 | \$ 42,000,000 | 1.00\% | 6/16 | \$ 31,000,000 | 1.00\% | 8/29/2021 | \$ 21,000,000 | 1.00\% | 11/11/202 | \$ | 5,000,000 | 1.00\% |
| 1/20/2021 | \$ | \$ 16,000,000 | 1.0 | 4/4/2020 | \$ 42,000,000 | 1.00\% | 6/17 | \$ 31,000,000 | 1.00\% | /30/20 | \$ 21,000, | 1.00\% | 11/12/202 | \$ | 5,000,000 | 1.00\% |
| 1/21/2021 | \$ | 16,000,000 | 1.0 | 4/5/2 | \$ 42,000,000 | 1.00\% | 6/18/2021 | \$ 31,000,000 | 1.0 | 8/31/2021 | \$ 21,000,000 | 1.00\% | 11/13/202 | \$ | 5,000,000 |  |
| 1/22/2021 | \$ | 16,000,000 | 1.0 | 4/6/ | \$ 42,000,000 | 1.00\% | 6/19 | \$ 31,000,000 | 1.00\% | /1/2021 | \$ 16,000,000 | 1.00\% | 11/14/2021 | \$ | 5,000,000 |  |
| 1/23/202 | \$ | \$ 16,000,000 | 1.0 | 4/7/20 | \$ 42,000,000 | 1.00\% | 6/20/ | \$ 31,000,000 | 1.00\% | 9/2/202 | \$ 16,000,000 | 1.00\% | 11/15 | \$ | 5,000,000 | 1.00\% |
| 1/24/2021 | \$ | \$ 16,000,000 | 1.06\% | 4/8/2021 | \$ 42,000,000 | 1.00\% | 6/21/202 | \$ 31,000,000 | 1.00\% | 9/3/2021 | \$ 16,000,000 | 1.00\% | 11/16/202 | \$ | 5,000,000 | 1.00\% |
| 1/25/2021 | \$ | \$ 16,000,000 | 1.06 | 4/9/2 | \$ 42,000,000 | 1.00 | 6/22 | \$ 31,000,000 | 1.00\% | 9/4/2021 | \$ 16,000,000 | 1.00\% | 11/17 | \$ | 5,000,000 | 1.00\% |
| 1/26/2021 | \$ | 16,000,000 | 1.0 | 4/10/2021 | \$ 42,000,000 | 1.00 | 6/23/2021 | \$ 31,000,000 | 1.00\% | 9/5/2021 | \$ 16,000,000 | 1.00\% | 11/18/202 | \$ | 5,000,000 |  |
| 1/27/2021 | \$ | 16,000,000 | 1.0 | 4/11/ | \$ 42,000,000 | 1.00\% | 6/24/ | \$ 31,000,000 | 1.00\% | 9/6/2021 | \$ 16,000,000 | 1.00\% | 11 | \$ | 5,000,000 |  |
| 1/28/2021 | \$ | \$ 16,000,000 | 1.06\% | 4/12/ | \$ 42,000,000 | 1.00\% | 6/25 | \$ 31,000,000 | 1.00\% | 9/7/ | \$ 16,000,000 | 1.00\% | 11/20/20 | \$ | 5,000,000 | 1.00\% |
| 1/29/2021 | \$ | \$ 16,000,000 | 1.06\% | 4/13/ | \$ 42,000,000 | 1.00\% | 6/26/ | \$ 31,000,000 | 1.00\% | 9/8/202 | \$ 16,000,000 | 1.00\% | 11/21/202 | \$ | 5,000,000 | 1.00\% |
| 1/30/2021 | \$ | \$ 16,000,000 | 1.06\% | 4/14/ | \$ 42,000,000 | 1.00 | 6/27 | \$ 31,000,000 | 1.00\% | 9/9/2021 | \$ 16,000,000 | 1.00\% | 11/22 | \$ | 5,000,000 | 1.00\% |
| 1/31/2021 | \$ | \$ 16,000,000 | 1.06 | 4/15/ | \$ 42,000,000 | 1.00 | 6/28/ | \$ 31,000,000 | 1.00\% | 9/10/2021 | \$ 16,000, | 1.00\% | 11/2 | \$ | 5,000,000 | 1.00\% |
| 2/1/2021 | \$ | \$ 31,000,000 | 1.0 | 4/16/2021 | \$ 42,000,000 | 1.00\% | 6/29/2021 | \$ 31,000,000 | 1.00\% | 9/11/2021 | \$ 16,000,000 | 1.00\% | 11/24/202 | \$ | 5,000,000 |  |
| 2/2/2021 | \$ | \$ 31,000,000 | 1. | 4/17/2021 | \$ 42,000,000 | 1.00 | 6/30/202 | \$ 31,000,000 | 1.00\% | 9/12/2021 | \$ 16,000,000 | 1.00\% | 11/25 | \$ | 5,000,000 |  |
| 2/3/2021 | \$ | \$ 31,000,000 | 1.06\% | 4/18/2021 | \$ 42,000,000 | 1.00\% | 7/1/2021 | \$ 26,000,000 | 1.00\% | 9/13/202 | \$ 16,000,000 | 1.00 | 11/26/202 | \$ | 5,000,000 |  |
| 2/4/2021 | \$ | \$ 31,000,000 | 1.06\% | 4/19/ | \$ 42,000,000 | 1.00\% | 7/2/2021 | \$ 26,000,000 | 1.00\% | 14/ | \$ 16,000,000 | 1.00 | 11/27/202 | \$ | 5,000,000 | 1.00\% |
| 2/5/2021 | \$ | \$ 31,000,000 | 1.0 | 4/20/2021 | \$ 42,000,000 | 1.00 | 7/3/2021 | \$ 26,000,000 | 1.00\% | 9/15/2021 | \$ 16,000,000 | 1.00\% | 11/28/202 | \$ | 5,000,000 | 1.00\% |
| 2/6/2021 | \$ | \$ 31,000,000 | 1.0 | 4/21/2 | \$ 42,000,000 | 1.00 | 7/4/2021 | \$ 26,000,000 | 1.00\% | 9/16/202 | \$ 16,000,000 | 1.00\% | 11/29/202 | \$ | 5,000,000 |  |
| 2/7/2021 | S | \$ 31,000,000 | 1.06 | 4/22 | \$ 42,000,000 | 1.00\% | 7/5/202 | \$ 26,000,000 | 1.00\% | 9/17/ | \$ 16,000,000 | 1.00\% | 11/30/20 | \$ | 5,000,00 |  |
| 2/8/2021 | \$ | \$ 31,000,000 | 1.06 | 4/23/2021 | \$ 42,000,000 | 1.00 | 7/6/2021 | \$ 26,000,000 | 1.00\% | 9/18/2021 | \$ 16,000,000 | 1.00 | 12/1/202 | \$ |  | 0.00\% |
| 2/9/2021 | \$ | \$ 31,000,000 | 1.06\% | 4/24/2021 | \$ 42,000,000 |  | 7/7/2021 | \$ 26,000,000 | $1.00 \%$ | 19/2021 | \$ 16,000,000 | 1.00 | 12/2/202 | \$ |  | 0.00\% |
| 2/10/2021 | \$ | \$ 31,000,000 | 1. | 4/25/2 | \$ 42,000,000 | 1.00\% | 7/8/2 | \$ 26,000,000 | 1.00\% | 9/20/2021 | \$ 16,000,000 | 1.00\% | 12/3/202 | \$ |  |  |
| 2/11/2021 | \$ | \$ 31,000,000 | 1.0 | 4/26/2 | \$ 42,000,000 | 1.00 | 7/9/2021 | \$ 26,000,000 | 1.0 | 9/21/2021 | \$ 16,000,000 | 1.00\% | 12/4/202 | \$ |  | 0.00\% |
| 2/12/2021 | \$ | \$ 31,000,000 | 1.0 | 4/27/2021 | \$ 42,000,000 | 1.00\% | 7/10/2021 | \$ 26,000,000 | 1.0 | 9/22/2021 | \$ 16,000,000 | 1.00\% | 12/5/202 | \$ |  | 0.00\% |
| 2/13/2021 | \$ | 31,000,000 |  | 4/28/2021 | \$ 42,000,000 | 1.00 | 7/11/20 | \$ 26,000,000 | 1.00\% | 9/23/2021 | \$ 16,000,000 | 1.00\% | 12/6/202 | \$ |  | 0.00\% |
| 2/14/2021 | \$ | \$ 31,000,000 |  | 4/29/2021 | \$ 42,000,000 | 1.00 | 7/12/20 | \$ 26,000,000 | 1.00\% | 9/24/2021 | \$ 16,000,000 |  | 12/7/202 | \$ |  | 0.00\% |
| 2/15/2021 | \$ | \$ 31,000,000 | 1.06 | 4/30/2 | \$ 42,000,000 |  | 7/13/ | \$ 26,000,000 | 00\% | 25/20 | \$ 16,000,000 |  | 12/8/202 | \$ |  |  |
| 2/16/2021 | \$ | \$ 31,000,000 | 1.06\% | 5/1/2021 | \$ 36,000,000 | 1.00 | 7/14/2021 | \$ 26,000,000 | 1.00\% | 9/26/2021 | \$ 16,000,000 | 1.00 | 12/9/2021 | \$ |  | 0.00\% |
| 2/17/2021 | \$ | \$ 31,000,000 |  | 5/2/2021 | \$ 36,000,000 | 1.0 | 7/15/2021 | \$ 26,000,000 | 1.00\% | 9/27/2021 | \$ 16,000,000 | 1.00 | 12/10/202 | \$ |  |  |
| 2/18/2021 | \$ | \$ 31,000,000 |  | 5/3/2 | \$ 36,000,000 |  | 7/16/ | \$ 26,000,000 | 1.00\% | 9/28/20 | \$ 16,000,000 |  | 12/11/202 | \$ |  |  |
| 2/19/2021 | \$ | \$ 31,000,000 | 1.06 | 5/4/2021 | \$ 36,000,000 | 1.00\% | 7/17/2021 | \$ 26,000,000 | 1.00\% | 9/29/202 | \$ 16,000,000 | 1.00\% | 12/12/202 | \$ |  | 0.00\% |
| 2/20/2021 | \$ | \$ 31,000,000 | 1.06 | 5/5/202 | \$ 36,000,000 | 1.00\% | 7/18/202 | \$ 26,000,000 | 1.00\% | 30/20 | \$ 16,000,000 | 1.00\% | 12/13/2021 | \$ |  | 0.00\% |
| 2/21/2021 | \$ | \$ 31,000,000 | 1.0 | 5/6/2021 | \$ 36,000,000 | 1.00\% | 7/19/202 | \$ 26,000,000 | 1.00\% | 10/1/202 | \$ 10,000,000 | 1.00\% | 12/14/2021 | \$ |  | 0.00\% |
| 2/22/2021 | \$ | \$ 31,000,000 | 1.0 | 5/7/2021 | \$ 36,000,000 | 1.0 | 7/20/2021 | \$ 26,000,000 | 1.00\% | 10/2/2021 | \$ 10,000,000 | 1.00 | 12/15/2021 | \$ | - | 0.00\% |
| 2/23/2021 | \$ | \$ 31,000,000 | 1.06 | 5/8/2021 | \$ 36,000,000 | 1.0 | 7/21/2021 | \$ 26,000,000 | 1.00\% | 10/3/2021 | \$ 10,000,000 | 1.00 | 12/16/2021 | \$ | - | 0.00\% |
| 2/24/2021 | \$ | \$ 31,000,000 |  | 5/9/2021 | \$ 36,000,000 | 1.00\% | 7/22/2021 | \$ 26,000,000 | 1.00\% | 10/4/2021 | \$ 10,000,000 | 1.00\% | 12/17/2021 | \$ |  | 0.00\% |
| 2/25/2021 | \$ | \$ 31,000,000 | 1.06\% | 5/10/2021 | \$ 36,000,000 | 1.00 | 7/23/2021 | \$ 26,000,000 | 1.00\% | 10/5/2021 | \$ 10,000,000 | 1.00 | 12/18/2021 | \$ |  | 0.00\% |
| 2/26/2021 | \$ | \$ 31,000,000 | 1.06 | 5/11/2021 | \$ 36,000,000 | 1.00 | 7/24/2021 | \$ 26,000,000 | $1.00 \%$ | 10/6/2021 | \$ 10,000,000 | 1.00 | 12/19/2021 | \$ | - | 0.00\% |
| 2/27/2021 | \$ | \$ 31,000,000 | 1.06 | 5/12/2021 | \$ 36,000,000 | 1.00\% | 7/25/2021 | \$ 26,000,000 | 1.00\% | 10/7/2021 | \$ 10,000,000 | 1.00\% | 12/20/2021 | \$ | - | 0.00\% |
| 2/28/2021 | \$ | \$ 31,000,000 | 1.06 | 5/13/2021 | \$ 36,000,000 | $1.00 \%$ | 7/26/2021 | \$ 26,000,000 | 1.00\% | 10/8/2021 | \$ 10,000,000 | 1.00 | 12/21/2021 | \$ | - | 0.00\% |
| 3/1/2021 | \$ | \$ 47,000,000 | 1.00\% | 5/14/2021 | \$ 36,000,000 | 1.00\% | 7/27/2021 | \$ 26,000,000 | 1.00\% | 10/9/2021 | \$ 10,000,000 | 00\% | 12/22/2021 | \$ |  | 0.00\% |


| $3 / 2 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| ---: | :--- | :--- | ---: |
| $3 / 3 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 4 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 5 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 6 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 7 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 8 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 9 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 10 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 11 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 12 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 13 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 14 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |
| $3 / 15 / 2021$ | $\$$ | $47,000,000$ | $1.00 \%$ |


| $5 / 15 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| :--- | :--- | ---: |
| $5 / 16 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 17 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 18 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 19 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 20 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 21 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 22 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 23 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 24 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 25 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 26 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 27 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |
| $5 / 28 / 2021$ | $\$ 36,000,000$ | $1.00 \%$ |


| $7 / 28 / 2021$ | $\$$ | $26,000,000$ | $1.00 \%$ |
| ---: | :--- | :--- | ---: |
| $7 / 29 / 2021$ | $\$$ | $26,000,000$ | $1.00 \%$ |
| $7 / 30 / 2021$ | $\$$ | $26,000,000$ | $1.00 \%$ |
| $7 / 31 / 2021$ | $\$$ | $26,000,000$ | $1.00 \%$ |
| $8 / 1 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 2 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 3 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 4 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 5 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 6 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 7 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 8 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 9 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |
| $8 / 10 / 2021$ | $\$$ | $21,000,000$ | $1.00 \%$ |


| 10/10/2021 | \$ 10,000,000 | 1.00\% | 12/23/2021 | \$ | - | 0.00\% |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 10/11/2021 | \$ 10,000,000 | 1.00\% | 12/24/2021 | \$ | - | 0.00\% |
| 10/12/2021 | \$ 10,000,000 | 1.00\% | 12/25/2021 | \$ | - | 0.00\% |
| 10/13/2021 | \$ 10,000,000 | 1.00\% | 12/26/2021 | \$ | - | 0.00\% |
| 10/14/2021 | \$ 10,000,000 | 1.00\% | 12/27/2021 | \$ | - | 0.00\% |
| 10/15/2021 | \$ 10,000,000 | 1.00\% | 12/28/2021 | \$ | - | 0.00\% |
| 10/16/2021 | \$ 10,000,000 | 1.00\% | 12/29/2021 | \$ | - | 0.00\% |
| 10/17/2021 | \$ 10,000,000 | 1.00\% | 12/30/2021 | \$ | - | 0.00\% |
| 10/18/2021 | \$ 10,000,000 | 1.00\% | 12/31/2021 | \$ | - | 0.00\% |
| 10/19/2021 | \$ 10,000,000 | 1.00\% |  |  |  |  |
| 10/20/2021 | \$ 10,000,000 | 1.00\% |  |  |  |  |
| 10/21/2021 | \$ 10,000,000 | 1.00\% | AVERAGE | \$ | 23,353,425 | 0.93\% |
| 10/22/2021 | \$ 10,000,000 | 1.00\% |  |  |  |  |
| 10/23/2021 | \$ 10,000,000 | 1.00\% |  |  |  |  |

Q.1. Provide detailed information concerning all other short-term debt outstanding.
A.1.
a. Duquesne Light Company maintains a $\$ 300.0$ million short-term intercompany loan facility with its parent, Duquesne Light Holdings, Inc. The facility was approved by the Pennsylvania Public Utilities Commission (Docket \#G-2008-2060987 and amended in Docket \#G-2009-2148505). The interest rate is the applicable LIBOR plus $0.875 \%$ margin.
b. The Attachment to DFR III-B-4 details the average daily balance and interest rate charged.

From $1 / 1 / 2020$ to $12 / 31 / 2020$, the average daily balance was $\$ 43.8$ million and the average interest rate was $1.35 \%$.

From $1 / 1 / 2021$ to $12 / 31 / 2021$, the average daily balance is projected to be $\$ 30.2$ million. The Company projects the average interest rate to be $0.93 \%$ for 2021.

The Company does not forecast average daily balances through 2022, but projects an average 2022 monthly balance of $\$ 80.1$ million and a year-end 2022 balance of $\$ 11.0$ million. The Company projects the average interest rate to be $1.01 \%$ for 2022 .
c. The Company utilizes short-term intercompany debt under the affiliated interest credit facility to provide working capital and for general corporate purposes.
d. The Company continues to maintain its credit facility to provide working capital and for general corporate purposes.

Intercompany Loan Borrowings

## 1/1/2020 to 12/31/2020

| Date | Outstanding Balance | Rate | Date | Outstanding Balance | Rate | Date | Outstanding Balance |  | Rate | Date | Outstanding Balance |  | Rate | Date | Outstanding Balance | Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1/1/2020 | \$ 85,000,000 | 3.48\% | 3/16/2020 | \$147,000,000 | 3.05\% | 5/29/2020 | \$ | - | 0.00\% | 8/11/2020 | \$ | - | 0.00\% | 10/24/2020 | \$ - | 0.00\% |
| 1/2/2020 | \$ 85,000,000 | 3.48\% | 3/17/2020 | \$147,000,000 | 3.05\% | 5/30/2020 | \$ | - | 0.00\% | 8/12/2020 | \$ | - | 0.00\% | 10/25/2020 | \$ - | 0.00\% |
| 1/3/2020 | \$ 85,000,000 | 3.48\% | 3/18/2020 | \$147,000,000 | 3.05\% | 5/31/2020 | \$ | - | 0.00\% | 8/13/2020 | \$ | - | 0.00\% | 10/26/2020 | \$ - | 0.00\% |
| 1/4/2020 | \$ 85,000,000 | 3.48\% | 3/19/2020 | \$147,000,000 | 3.05\% | 6/1/2020 | \$ | - | 0.00\% | 8/14/2020 | \$ |  | 0.00\% | 10/27/2020 | \$ | 0.00\% |
| 1/5/2020 | \$ 85,000,000 | 3.48\% | 3/20/2020 | \$167,000,000 | 2.75\% | 6/2/2020 | \$ | - | 0.00\% | 8/15/2020 | \$ | - | 0.00\% | 10/28/2020 | \$ - | 0.00\% |
| 1/6/2020 | \$ 85,000,000 | 3.48\% | 3/21/2020 | \$167,000,000 | 2.75\% | 6/3/2020 | \$ | - | 0.00\% | 8/16/2020 | \$ | - | 0.00\% | 10/29/2020 | \$ | 0.00\% |
| 1/7/2020 | \$ 85,000,000 | 3.48\% | 3/22/2020 | \$167,000,000 | 2.75\% | 6/4/2020 | \$ | - | 0.00\% | 8/17/2020 | \$ | - | 0.00\% | 10/30/2020 | \$ 10,000,000 | 1.58\% |
| 1/8/2020 | \$ 85,000,000 | 3.48\% | 3/23/2020 | \$167,000,000 | 2.75\% | 6/5/2020 | \$ | - | 0.00\% | 8/18/2020 | \$ | - | 0.00\% | 10/31/2020 | \$ 10,000,000 | 1.58\% |
| 1/9/2020 | \$ 85,000,000 | 3.48\% | 3/24/2020 | \$167,000,000 | 2.75\% | 6/6/2020 | \$ | - | 0.00\% | 8/19/2020 | \$ | - | 0.00\% | 11/1/2020 | \$ 10,000,000 | 1.58\% |
| 1/10/2020 | \$ 85,000,000 | 3.48\% | 3/25/2020 | \$167,000,000 | 2.75\% | 6/7/2020 | \$ | - | 0.00\% | 8/20/2020 | \$ | - | 0.00\% | 11/2/2020 | \$ 10,000,000 | 1.58\% |
| 1/11/2020 | \$ 85,000,000 | 3.48\% | 3/26/2020 | \$167,000,000 | 2.75\% | 6/8/2020 | \$ | - | 0.00\% | 8/21/2020 | \$ | - | 0.00\% | 11/3/2020 | \$ 10,000,000 | 1.58\% |
| 1/12/2020 | \$ 85,000,000 | 3.48\% | 3/27/2020 | \$167,000,000 | 2.75\% | 6/9/2020 | \$ | - | 0.00\% | 8/22/2020 | \$ | - | 0.00\% | 11/4/2020 | \$ 10,000,000 | 1.58\% |
| 1/13/2020 | \$ 85,000,000 | 3.48\% | 3/28/2020 | \$167,000,000 | 2.75\% | 6/10/2020 | \$ | - | 0.00\% | 8/23/2020 | \$ | - | 0.00\% | 11/5/2020 | \$ 10,000,000 | 1.58\% |
| 1/14/2020 | \$ 85,000,000 | 3.48\% | 3/29/2020 | \$167,000,000 | 2.75\% | 6/11/2020 | \$ | - | 0.00\% | 8/24/2020 | \$ | - | 0.00\% | 11/6/2020 | \$ 10,000,000 | 1.58\% |
| 1/15/2020 | \$ 85,000,000 | 3.48\% | 3/30/2020 | \$167,000,000 | 2.75\% | 6/12/2020 | \$ | - | 0.00\% | 8/25/2020 | \$ | - | 0.00\% | 11/7/2020 | \$ 10,000,000 | 1.58\% |
| 1/16/2020 | \$ 85,000,000 | 3.48\% | 3/31/2020 | \$167,000,000 | 2.75\% | 6/13/2020 | \$ | - | 0.00\% | 8/26/2020 | \$ | - | 0.00\% | 11/8/2020 | \$ 10,000,000 | 1.58\% |
| 1/17/2020 | \$ 85,000,000 | 3.48\% | 4/1/2020 | \$167,000,000 | 2.75\% | 6/14/2020 | \$ | - | 0.00\% | 8/27/2020 | \$ | - | 0.00\% | 11/9/2020 | \$ 10,000,000 | 1.58\% |
| 1/18/2020 | \$ 85,000,000 | 3.48\% | 4/2/2020 | \$167,000,000 | 2.75\% | 6/15/2020 | \$ | - | 0.00\% | 8/28/2020 | \$ | - | 0.00\% | 11/10/2020 | \$ 10,000,000 | 1.58\% |
| 1/19/2020 | \$ 85,000,000 | 3.48\% | 4/3/2020 | \$167,000,000 | 2.75\% | 6/16/2020 | \$ | - | 0.00\% | 8/29/2020 | \$ | - | 0.00\% | 11/11/2020 | \$ 10,000,000 | 1.58\% |
| 1/20/2020 | \$ 85,000,000 | 3.48\% | 4/4/2020 | \$167,000,000 | 2.75\% | 6/17/2020 | \$ | - | 0.00\% | 8/30/2020 | \$ | - | 0.00\% | 11/12/2020 | \$ 10,000,000 | 1.58\% |
| 1/21/2020 | \$ 85,000,000 | 3.48\% | 4/5/2020 | \$167,000,000 | 2.75\% | 6/18/2020 | \$ | - | 0.00\% | 8/31/2020 | \$ | - | 0.00\% | 11/13/2020 | \$ 10,000,000 | 1.58\% |
| 1/22/2020 | \$ 85,000,000 | 3.48\% | 4/6/2020 | \$167,000,000 | 2.75\% | 6/19/2020 | \$ | - | 0.00\% | 9/1/2020 | \$ | - | 0.00\% | 11/14/2020 | \$ 10,000,000 | 1.58\% |
| 1/23/2020 | \$ 87,000,000 | 3.44\% | 4/7/2020 | \$167,000,000 | 2.75\% | 6/20/2020 | \$ | - | 0.00\% | 9/2/2020 | \$ | - | 0.00\% | 11/15/2020 | \$ 10,000,000 | 1.58\% |
| 1/24/2020 | \$ 87,000,000 | 3.44\% | 4/8/2020 | \$167,000,000 | 2.75\% | 6/21/2020 | \$ | - | 0.00\% | 9/3/2020 | \$ | - | 0.00\% | 11/16/2020 | \$ 10,000,000 | 1.58\% |
| 1/25/2020 | \$ 87,000,000 | 3.44\% | 4/9/2020 | \$167,000,000 | 2.75\% | 6/22/2020 | \$ | - | 0.00\% | 9/4/2020 | \$ |  | 0.00\% | 11/17/2020 | \$ 10,000,000 | 1.58\% |
| 1/26/2020 | \$ 87,000,000 | 3.44\% | 4/10/2020 | \$167,000,000 | 2.75\% | 6/23/2020 | \$ | - | 0.00\% | 9/5/2020 | \$ | - | 0.00\% | 11/18/2020 | \$ 10,000,000 | 1.58\% |
| 1/27/2020 | \$ 87,000,000 | 3.44\% | 4/11/2020 | \$167,000,000 | 2.75\% | 6/24/2020 | \$ | - | 0.00\% | 9/6/2020 | \$ | - | 0.00\% | 11/19/2020 | \$ 10,000,000 | 1.58\% |
| 1/28/2020 | \$ 87,000,000 | 3.44\% | 4/12/2020 | \$167,000,000 | 2.75\% | 6/25/2020 | \$ | - | 0.00\% | 9/7/2020 | \$ | - | 0.00\% | 11/20/2020 | \$ 10,000,000 | 1.58\% |
| 1/29/2020 | \$ 87,000,000 | 3.44\% | 4/13/2020 | \$167,000,000 | 2.75\% | 6/26/2020 | \$ | - | 0.00\% | 9/8/2020 | \$ |  | 0.00\% | 11/21/2020 | \$ 10,000,000 | 1.58\% |
| 1/30/2020 | \$ 87,000,000 | 3.44\% | 4/14/2020 | \$167,000,000 | 2.75\% | 6/27/2020 | \$ | - | 0.00\% | 9/9/2020 | \$ | - | 0.00\% | 11/22/2020 | \$ 10,000,000 | 1.58\% |
| 1/31/2020 | \$ 87,000,000 | 3.44\% | 4/15/2020 | \$167,000,000 | 2.75\% | 6/28/2020 | \$ | - | 0.00\% | 9/10/2020 | \$ | - | 0.00\% | 11/23/2020 | \$ 10,000,000 | 1.58\% |
| 2/1/2020 | \$ 87,000,000 | 3.44\% | 4/16/2020 | \$167,000,000 | 2.75\% | 6/29/2020 | \$ | - | 0.00\% | 9/11/2020 | \$ | - | 0.00\% | 11/24/2020 | \$ 10,000,000 | 1.58\% |
| 2/2/2020 | \$ 87,000,000 | 3.44\% | 4/17/2020 | \$167,000,000 | 2.75\% | 6/30/2020 | \$ | - | 0.00\% | 9/12/2020 | \$ |  | 0.00\% | 11/25/2020 | \$ 10,000,000 | 1.58\% |
| 2/3/2020 | \$ 87,000,000 | 3.44\% | 4/18/2020 | \$167,000,000 | 2.75\% | 7/1/2020 | \$ | - | 0.00\% | 9/13/2020 | \$ | - | 0.00\% | 11/26/2020 | \$ 10,000,000 | 1.58\% |
| 2/4/2020 | \$ 87,000,000 | 3.44\% | 4/19/2020 | \$167,000,000 | 2.75\% | 7/2/2020 | \$ | - | 0.00\% | 9/14/2020 | \$ | - | 0.00\% | 11/27/2020 | \$ 10,000,000 | 1.58\% |
| 2/5/2020 | \$ 87,000,000 | 3.44\% | 4/20/2020 | \$167,000,000 | 2.75\% | 7/3/2020 | \$ | - | 0.00\% | 9/15/2020 | \$ | - | 0.00\% | 11/28/2020 | \$ 10,000,000 | 1.58\% |
| 2/6/2020 | \$ 87,000,000 | 3.44\% | 4/21/2020 | \$167,000,000 | 2.75\% | 7/4/2020 | \$ | - | 0.00\% | 9/16/2020 | \$ |  | 0.00\% | 11/29/2020 | \$ 10,000,000 | 1.58\% |
| 2/7/2020 | \$ 87,000,000 | 3.44\% | 4/22/2020 | \$167,000,000 | 2.75\% | 7/5/2020 | \$ | - | 0.00\% | 9/17/2020 | \$ | - | 0.00\% | 11/30/2020 | \$ 10,000,000 | 1.58\% |
| 2/8/2020 | \$ 87,000,000 | 3.44\% | 4/23/2020 | \$167,000,000 | 2.75\% | 7/6/2020 | \$ | - | 0.00\% | 9/18/2020 | \$ | - | 0.00\% | 12/1/2020 | \$ 10,000,000 | 1.58\% |
| 2/9/2020 | \$ 87,000,000 | 3.44\% | 4/24/2020 | \$167,000,000 | 2.75\% | 7/7/2020 | \$ | - | 0.00\% | 9/19/2020 | \$ | - | 0.00\% | 12/2/2020 | \$ 10,000,000 | 1.58\% |
| 2/10/2020 | \$ 87,000,000 | 3.44\% | 4/25/2020 | \$167,000,000 | 2.75\% | 7/8/2020 | \$ | - | 0.00\% | 9/20/2020 | \$ | - | 0.00\% | 12/3/2020 | \$ 10,000,000 | 1.58\% |
| 2/11/2020 | \$ 87,000,000 | 3.44\% | 4/26/2020 | \$167,000,000 | 2.75\% | 7/9/2020 | \$ | - | 0.00\% | 9/21/2020 | \$ |  | 0.00\% | 12/4/2020 | \$ 10,000,000 | 1.58\% |
| 2/12/2020 | \$ 87,000,000 | 3.44\% | 4/27/2020 | \$167,000,000 | 2.75\% | 7/10/2020 | \$ | - | 0.00\% | 9/22/2020 | \$ | - | 0.00\% | 12/5/2020 | \$ 10,000,000 | 1.58\% |
| 2/13/2020 | \$ 87,000,000 | 3.44\% | 4/28/2020 | \$167,000,000 | 2.75\% | 7/11/2020 | \$ | - | 0.00\% | 9/23/2020 | \$ | - | 0.00\% | 12/6/2020 | \$ 10,000,000 | 1.58\% |
| 2/14/2020 | \$ 87,000,000 | 3.44\% | 4/29/2020 | \$167,000,000 | 2.75\% | 7/12/2020 | \$ | - | 0.00\% | 9/24/2020 | \$ | - | 0.00\% | 12/7/2020 | \$ 10,000,000 | 1.58\% |
| 2/15/2020 | \$ 87,000,000 | 3.44\% | 4/30/2020 | \$167,000,000 | 2.75\% | 7/13/2020 | \$ | - | 0.00\% | 9/25/2020 | \$ | - | 0.00\% | 12/8/2020 | \$ 10,000,000 | 1.58\% |
| 2/16/2020 | \$ 87,000,000 | 3.44\% | 5/1/2020 | \$167,000,000 | 2.75\% | 7/14/2020 | \$ | - | 0.00\% | 9/26/2020 | \$ | - | 0.00\% | 12/9/2020 | \$ 10,000,000 | 1.58\% |
| 2/17/2020 | \$ 87,000,000 | 3.44\% | 5/2/2020 | \$167,000,000 | 2.75\% | 7/15/2020 | \$ | - | 0.00\% | 9/27/2020 | \$ | - | 0.00\% | 12/10/2020 | \$ 10,000,000 | 1.58\% |
| 2/18/2020 | \$ 87,000,000 | 3.44\% | 5/3/2020 | \$167,000,000 | 2.75\% | 7/16/2020 | \$ | - | 0.00\% | 9/28/2020 | \$ | - | 0.00\% | 12/11/2020 | \$ 10,000,000 | 1.58\% |
| 2/19/2020 | \$ 87,000,000 | 3.44\% | 5/4/2020 | \$167,000,000 | 2.75\% | 7/17/2020 | \$ | - | 0.00\% | 9/29/2020 | \$ | - | 0.00\% | 12/12/2020 | \$ 10,000,000 | 1.58\% |
| 2/20/2020 | \$ 107,000,000 | 3.17\% | 5/5/2020 | \$167,000,000 | 2.75\% | 7/18/2020 | \$ | - | 0.00\% | 9/30/2020 | \$ | - | 0.00\% | 12/13/2020 | \$ 10,000,000 | 1.58\% |
| 2/21/2020 | \$ 107,000,000 | 3.17\% | 5/6/2020 | \$ | 0.00\% | 7/19/2020 | \$ | - | 0.00\% | 10/1/2020 | \$ | - | 0.00\% | 12/14/2020 | \$ 10,000,000 | 1.58\% |
| 2/22/2020 | \$ 107,000,000 | 3.17\% | 5/7/2020 | \$ | 0.00\% | 7/20/2020 | \$ | - | 0.00\% | 10/2/2020 | \$ | - | 0.00\% | 12/15/2020 | \$ 10,000,000 | 1.58\% |
| 2/23/2020 | \$ 107,000,000 | 3.17\% | 5/8/2020 | \$ | 0.00\% | 7/21/2020 | \$ | - | 0.00\% | 10/3/2020 | \$ | - | 0.00\% | 12/16/2020 | \$ 10,000,000 | 1.58\% |
| 2/24/2020 | \$ 107,000,000 | 3.17\% | 5/9/2020 | \$ | 0.00\% | 7/22/2020 | \$ | - | 0.00\% | 10/4/2020 | \$ | - | 0.00\% | 12/17/2020 | \$ 10,000,000 | 1.58\% |
| 2/25/2020 | \$ 107,000,000 | 3.17\% | 5/10/2020 | \$ | 0.00\% | 7/23/2020 | \$ | - | 0.00\% | 10/5/2020 | \$ | - | 0.00\% | 12/18/2020 | \$ 10,000,000 | 1.58\% |
| 2/26/2020 | \$ 107,000,000 | 3.17\% | 5/11/2020 | \$ | 0.00\% | 7/24/2020 | \$ | - | 0.00\% | 10/6/2020 | \$ | - | 0.00\% | 12/19/2020 | \$ 10,000,000 | 1.58\% |
| 2/27/2020 | \$ 107,000,000 | 3.17\% | 5/12/2020 | \$ | 0.00\% | 7/25/2020 | \$ | - | 0.00\% | 10/7/2020 | \$ | - | 0.00\% | 12/20/2020 | \$ 10,000,000 | 1.58\% |
| 2/28/2020 | \$ 107,000,000 | 3.17\% | 5/13/2020 | \$ | 0.00\% | 7/26/2020 | \$ | - | 0.00\% | 10/8/2020 | \$ | - | 0.00\% | 12/21/2020 | \$ 10,000,000 | 1.58\% |
| 2/29/2020 | \$ 107,000,000 | 3.17\% | 5/14/2020 | \$ | 0.00\% | 7/27/2020 | \$ | - | 0.00\% | 10/9/2020 | \$ | - | 0.00\% | 12/22/2020 | \$ 10,000,000 | 1.58\% |
| 3/1/2020 | \$ 107,000,000 | 3.17\% | 5/15/2020 | \$ | 0.00\% | 7/28/2020 | \$ | - | 0.00\% | 10/10/2020 | \$ | - | 0.00\% | 12/23/2020 | \$ 10,000,000 | 1.58\% |
| 3/2/2020 | \$ 107,000,000 | 3.17\% | 5/16/2020 | \$ | 0.00\% | 7/29/2020 | \$ | - | 0.00\% | 10/11/2020 | \$ | - | 0.00\% | 12/24/2020 | \$ 10,000,000 | 1.58\% |
| 3/3/2020 | \$ 107,000,000 | 3.17\% | 5/17/2020 | \$ | 0.00\% | 7/30/2020 | \$ | - | 0.00\% | 10/12/2020 | \$ | - | 0.00\% | 12/25/2020 | \$ 10,000,000 | 1.58\% |
| 3/4/2020 | \$ 107,000,000 | 3.17\% | 5/18/2020 | \$ | 0.00\% | 7/31/2020 | \$ | - | 0.00\% | 10/13/2020 | \$ | - | 0.00\% | 12/26/2020 | \$ 10,000,000 | 1.58\% |
| 3/5/2020 | \$ 107,000,000 | 3.17\% | 5/19/2020 | \$ | 0.00\% | 8/1/2020 | \$ | - | 0.00\% | 10/14/2020 | \$ | - | 0.00\% | 12/27/2020 | \$ 10,000,000 | 1.58\% |
| 3/6/2020 | \$ 107,000,000 | 3.17\% | 5/20/2020 | \$ | 0.00\% | 8/2/2020 | \$ | - | 0.00\% | 10/15/2020 | \$ | - | 0.00\% | 12/28/2020 | \$ 10,000,000 | 1.58\% |
| 3/7/2020 | \$ 107,000,000 | 3.17\% | 5/21/2020 | \$ | 0.00\% | 8/3/2020 | \$ | - | 0.00\% | 10/16/2020 | \$ | - | 0.00\% | 12/29/2020 | \$ 10,000,000 | 1.58\% |
| 3/8/2020 | \$ 107,000,000 | 3.17\% | 5/22/2020 | \$ | 0.00\% | 8/4/2020 | \$ | - | 0.00\% | 10/17/2020 | \$ | - | 0.00\% | 12/30/2020 | \$ 10,000,000 | 1.58\% |
| 3/9/2020 | \$ 107,000,000 | 3.17\% | 5/23/2020 | \$ | 0.00\% | 8/5/2020 | \$ | - | 0.00\% | 10/18/2020 | \$ | - | 0.00\% | 12/31/2020 | \$ 10,000,000 | 1.58\% |
| 3/10/2020 | \$ 107,000,000 | 3.17\% | 5/24/2020 | \$ | 0.00\% | 8/6/2020 | \$ | - | 0.00\% | 10/19/2020 | \$ | - | 0.00\% |  |  |  |
| 3/11/2020 | \$ 107,000,000 | 3.17\% | 5/25/2020 | \$ | 0.00\% | 8/7/2020 | \$ | - | 0.00\% | 10/20/2020 | \$ | - | 0.00\% | AVERAGE | \$ 43,846,995 | 1.35\% |
| 3/12/2020 | \$ 107,000,000 | 3.17\% | 5/26/2020 | \$ | 0.00\% | 8/8/2020 | \$ | - | 0.00\% | 10/21/2020 | \$ | - | 0.00\% |  |  |  |
| 3/13/2020 | \$ 107,000,000 | 3.17\% | 5/27/2020 | \$ | 0.00\% | 8/9/2020 | \$ | - | 0.00\% | 10/22/2020 | \$ | - | 0.00\% |  |  |  |
| 3/14/2020 | \$ 107,000,000 | 3.17\% | 5/28/2020 | \$ | 0.00\% | 8/10/2020 | \$ | - | 0.00\% | 10/23/2020 | \$ | - | 0.00\% |  |  |  |

Intercompany Loan Borrowings
1/1/2021 to $12 / 31 / 2021$

| Date |  | standing <br> alance | Rate | Date |  | Outstanding Balance | Rate | Date | Outstanding Balance | Rate | Date | Outstanding Balance | Rate | Date | Outstanding Balance | Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1/1/2021 | \$ | 7,000,000 | 1.06\% | 3/16/2021 | \$ | \$ | 0.00\% | 5/29/2021 | \$ 12,000,000 | 1.00\% | 8/11/2021 | \$ 30,000,000 | 1.00\% | 10/24/2021 | \$ 55,000,000 | 1.00\% |
| 1/2/2021 | \$ | 7,000,000 | 1.06\% | 3/17/2021 | \$ | \$ | 0.00\% | 5/30/2021 | \$ 12,000,000 | 1.00\% | 8/12/2021 | \$ 30,000,000 | 1.00\% | 10/25/2021 | \$ 55,000,000 | 1.00\% |
| 1/3/2021 | \$ | 7,000,000 | 1.06\% | 3/18/2021 | \$ | \$ | 0.00\% | 5/31/2021 | \$ 12,000,000 | 1.00\% | 8/13/2021 | \$ 30,000,000 | 1.0 | 10/26/2021 | 55,000,000 | 1.00 |
| 1/4/2021 | \$ | 7,000,000 | 1.06\% | 3/19/2021 | \$ | \$ | 0.00\% | 6/1/2021 | \$ 18,000,000 | 1.00\% | 8/14/2021 | \$ 30,000,000 | 1.00 | 10/27/2021 | 55,000,000 | .00 |
| 1/5/2021 | \$ | 7,000,000 | 1.06 | 3/20/2021 | \$ | \$ | 0.00\% | 6/2/2021 | \$ 18,000,000 | 1.00\% | 8/15/2021 | \$ 30,000,000 | 1.00\% | 10/28/2021 | \$ 55,000,000 | 1.00\% |
| 1/6/2021 | \$ | 7,000,000 | 1.06\% | 3/21/2021 | \$ | \$ | 0.00\% | 6/3/2021 | \$ 18,000,000 | 1.00 | 8/16/2021 | \$ 30,000,000 | 1.0 | 10/29/2021 | \$ 55,000,000 | 1.00\% |
| 1/7/2021 | \$ | 7,000,000 | 1.06\% | 3/22/2021 | \$ | \$ - | 0.00\% | 6/4/2021 | \$ 18,000,000 | 1.00 | 8/17/2021 | \$ 30,000,000 | 1.00 | 10/30/2021 | \$ 55,000,000 | . 00 |
| 1/8/2021 | \$ | 7,000,000 | 1.06\% | 3/23/2021 | \$ | \$ | 0.00\% | 6/5/2021 | \$ 18,000,000 | 1.00\% | 8/18/2021 | \$ 30,000,000 | 1.00\% | 10/31/2021 | \$ 55,000,000 | 1.00\% |
| 1/9/2021 | \$ | 7,000,000 | 1.06\% | 3/24/2021 | \$ | \$ | 0.00\% | 6/6/2021 | \$ 18,000,000 | 1.00\% | 8/19/2021 | \$ 30,000,000 | 1.00 | 11/1/2021 | \$ 75,000,000 | 1.00\% |
| 1/10/2021 | \$ | 7,000,000 | 1.0 | 3/25/2021 | \$ | \$ | 0.0 | 6/7/2021 | \$ 18,000,000 | 1.0 | 8/20/2021 | \$ 30,000,000 | 1.00\% | 11/2/2021 | \$ 75,000,000 | 1.00\% |
| 1/11/2021 | \$ | 7,000,000 | 1.06\% | 3/26/2021 | \$ | \$ | 0.0\% | 6/8/2021 | \$ 18,000,000 | 1.00 | 8/21/2021 | \$ 30,000,000 | 1.0 | 11/3/2021 | \$ 75,000,000 | 1.0 |
| 1/12/2021 | \$ | 7,000,000 | 1.06\% | 3/27/2021 | \$ | \$ | 0.00\% | 6/9/2021 | \$ 18,000,000 | 1.00\% | 8/22/2021 | \$ 30,000,000 | 1.00 | 11/4/2021 | \$ 75,000,000 | 1.00 |
| 1/13/2021 | \$ | 7,000,000 | 1.06 | 3/28/2021 | \$ | \$ | 0.00\% | 6/10/2021 | \$ 18,000,000 | 1.00\% | 8/23/2021 | \$ 30,000,000 | 1.00 | 11/5/2021 | 75,000,000 | 1.00\% |
| 1/14/2021 | \$ | 7,000,000 | 1.06\% | 3/29/2021 | \$ | \$ | 0.00\% | 6/11/2021 | \$ 18,000,000 | 1.00\% | 8/24/2021 | \$ 30,000,000 | 1.00 | 11/6/2021 | \$ 75,000,000 | 1.00\% |
| 1/15/2021 | \$ | 7,000,000 | 1.06\% | 3/30/2021 | \$ | \$ | 0.00\% | 6/12/2021 | \$ 18,000,000 | 1.00\% | 8/25/2021 | \$ 30,000,000 | 1.00\% | 11/7/2021 | \$ 75,000,000 | 1.00\% |
| 1/16/2021 | \$ | 7,000,000 | 1.06\% | 3/31/2021 | \$ | \$ | .00\% | 6/13/2021 | \$ 18,000,000 | 1.0 | 8/26/2021 | \$ 30,000,000 | 1.0 | 11/8/2021 | \$ 75,000,000 | 1.00\% |
| 1/17/2021 | \$ | 7,000,000 | 1.06\% | 4/1/2021 | \$ | \$ 6,000,000 | 1.00 | 6/14/2021 | \$ 18,000,000 | 1.00 | 8/27/2021 | \$ 30,000,000 | 1.0 | 11/9/2021 | 75,000,000 | 1.00\% |
| 1/18/2021 | \$ | 7,000,000 | 1.06\% | 4/2/2021 | \$ | \$ 6,000,000 | 1.0 | 6/15/2021 | \$ 18,000,000 | 1.00\% | 8/28/2021 | \$ 30,000,000 | 1.00\% | 10/2021 | \$ 75,000,000 | 1.00\% |
| 1/19/2021 | \$ | 7,000,000 | 1.06\% | 4/3/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/16/2021 | \$ 18,000,000 | 1.00\% | 8/29/2021 | \$ 30,000,000 | 1.00\% | /11/2021 | \$ 75,000,000 | 1.00\% |
| 1/20/2021 | \$ | 7,000,000 | 1.06\% | 4/4/2021 | \$ | \$ 6,000,000 | 1.00 | 6/17/2021 | \$ 18,000,000 | 1.0 | 8/30/2021 | \$ 30,000,000 | 1.0 | 11/12/2021 | \$ 75,000,000 | 1.00\% |
| 1/21/2021 | \$ | 7,000,000 | 1.06\% | 4/5/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/18/2021 | \$ 18,000,000 | 1.00 | 8/31/2021 | \$ 30,000,000 | 1.00 | 11/13/2021 | 75,000,000 | 1.00\% |
| 1/22/2021 | \$ | 7,000,000 | 1.06\% | 4/6/2021 | \$ | \$ 6,000,000 | 1.0 | 6/19/2021 | \$ 18,000,000 | 1.0 | 9/1/2021 | \$ 36,000,000 | 1.00\% | /14/2021 | \$ 75,000,000 | 1.00\% |
| 1/23/2021 | \$ | 7,000,000 | 1.06\% | 4/7/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/20/2021 | \$ 18,000,000 | 1.0 | 9/2/2021 | \$ 36,000,000 | 1.0 | 15/2021 | \$ 75,000,000 | 1.00\% |
| 1/24/2021 | \$ | 7,000,000 | 1.06\% | 4/8/2021 | \$ | \$ 6,000,000 | .00\% | 6/21/2021 | \$ 18,000,000 | 1.00\% | 9/3/2021 | \$ 36,000,000 | 1.00\% | 11/16/2021 | \$ 75,000,000 | 1.00\% |
| 1/25/2021 | \$ | 7,000,000 | 1.06\% | 4/9/2021 | \$ | \$ 6,000,000 | 1.00 | 6/22/2021 | \$ 18,000,000 | 1.0 | 9/4/2021 | \$ 36,000,000 | 1.0 | 11/17/2021 | \$ 75,000,000 | 1.00\% |
| 1/26/2021 | \$ | 7,000,000 | 1.06\% | 4/10/2021 |  | \$ 6,000,000 | 1.0 | 6/23/2021 | \$ 18,000,000 | 1.00\% | 9/5/2021 | \$ 36,000,000 | 1.00\% | 2021 | \$ 75,000,000 | 00\% |
| 1/27/2021 | \$ | 7,000,000 | 1.06\% | 4/11/2021 | \$ | \$ 6,000,000 | 1.00 | 6/24/2021 | \$ 18,000,000 | 1.00\% | 9/6/2021 | \$ 36,000,000 | 1.00\% | 19/2021 | \$ 75,000,000 | 1.00\% |
| 1/28/2021 | \$ | 7,000,000 | 1.06\% | 4/12/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/25/2021 | \$ 18,000,000 | 1.00\% | 9/7/2021 | \$ 36,000,000 | 1.00\% | 11/20/2021 | 75,000,000 | 1.00\% |
| 1/29/2021 | \$ | 7,000,00 | 1.0 | 4/13/2021 | \$ | \$ 6,000,000 | 1.00 | 6/26/2021 | \$ 18,000,000 | 1.0 | 9/8/2021 | \$ 36,000,000 | 1.0 | 11/21/2021 | \$ 75,000,000 | 1.00\% |
| 1/30/2021 | \$ | 7,000,000 | 1.06\% | 4/14/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/27/2021 | \$ 18,000,000 | 1.00\% | 9/9/2021 | \$ 36,000,000 | 1.0 | 021 | \$ 75,000,000 | 1.00\% |
| 1/31/2021 | \$ | 7,000,000 | 1.06\% | 4/15/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/28/2021 | \$ 18,000,000 | 1.00\% | 10/2021 | \$ 36,000,000 | 1.00\% | 221 | \$ 75,000,000 | 1.00\% |
| 2/1/2021 | \$ | 3,000,000 | 1.06\% | 4/16/2021 | \$ | \$ 6,000,000 | . 00 | 6/29/2021 | \$ 18,000,000 | 1.00\% | 9/11/2021 | \$ 36,000,000 | 1.00\% | 11/24/2021 | \$ 75,000,000 | 1.00\% |
| 2/2/2021 | \$ | 3,000,000 | 1.06\% | 4/17/2021 | \$ | \$ 6,000,000 | 1.00\% | 6/30/2021 | \$ 18,000,000 | 1.00 | 9/12/2021 | \$ 36,000,000 | 1.00 | 11/25/2021 | \$ 75,000,000 | 00 |
| 2/3/2021 | \$ | 3,000,000 | 1.06\% | 4/18/2021 | \$ | \$ 6,000,000 | 1.00\% | 7/1/2021 | \$ 24,000,000 | 1.00\% | 9/13/2021 | \$ 36,000,000 | 1.00\% | 11/26/2021 | \$ 75,000,000 | \% |
| 2/4/2021 | \$ | 3,000,000 | 1.0 | 4/19/2021 | \$ | \$ 6,000,000 | 1.0 | 7/2/2021 | \$ 24,000,000 | 1.00\% | 9/14/2021 | \$ 36,000,000 | 1.00\% | 11/27/2021 | \$ 75,000,000 | 1.00\% |
| 2/5/2021 | \$ | 3,000,000 | 1.06\% | 4/20/2021 | \$ | \$ 6,000,000 | 1.0 | 7/3/2021 | \$ 24,000,000 | 1.0 | 9/15/2021 | \$ 36,000,000 | 1.0 | 11/28/2021 | \$ 75,000,000 | 1.00\% |
| 2/6/2021 | \$ | 3,000,000 | 106\% | 4/21/2021 | \$ | \$ 6,000,000 | 1.00\% | 7/4/2021 | \$ 24,000,000 | 1.0 | 9/16/2021 | \$ 36,000,000 | 1.00 | 11/29/2021 | \$ 75,000,000 | 00 |
| 2/7/2021 | \$ | 3,000,000 | 1.06\% | 4/22/2021 | \$ | S 6,000,000 | 1.0 | 7/5/2021 | \$ 24,000,000 | 1.0 | 9/17/2021 | \$ 36,000,000 | 1.00\% | 11/30/2021 | \$ 75,000,000 | 1.00\% |
| 2/8/2021 | \$ | 3,000,000 | 1.06\% | 4/23/2021 | \$ | \$ 6,000,000 | 1.0 | 7/6/2021 | \$ 24,000,000 | 1.00\% | 9/18/2021 | \$ 36,000,000 | 1.00\% | 12/1/2021 | \$ 94,000,000 | \% |
| 2/9/2021 | \$ | 3,000,000 | 1.06 | 4/24/2021 | \$ | \$ 6,000,000 | 1.0 | 7/7/2021 | \$ 24,000,000 | 1.0 | 9/19/2021 | \$ 36,000,000 | 1.00 | 12/2/2021 | \$ 94,000,000 | 00 |
| 2/10/2021 | \$ | 3,000,000 | 1.06\% | 4/25/2021 | \$ | S 6,000,000 | .00 | 7/8/2021 | \$ 24,000,000 | 1.0 | 9/20/2021 | \$ 36,000,000 | 1.00\% | 12/3/2021 | \$ 94,000,000 | 1.00\% |
| 2/11/2021 | \$ | 3,000,000 | 1.06\% | 4/26/2021 | \$ | S 6,000,000 | 1.00\% | 7/9/2021 | \$ 24,000,000 | 1.00\% | 9/21/2021 | \$ 36,000,000 | 1.00\% | 12/4/202 | \$ 94,000,000 | ,00\% |
| 2/12/2021 | \$ | 3,000,000 | 1.06\% | 4/27/2021 | \$ | S 6,000,000 | 1.00\% | 7/10/2021 | \$ 24,000,000 | 1.00\% | 9/22/2021 | \$ 36,000,000 | 1.00\% | 12/5/2021 | \$ 94,000,000 | \% |
| 2/13/2021 | \$ | 3,000,000 | 1.06\% | 4/28/2021 | \$ | S 6,000,000 | 1.00 | 7/11/2021 | \$ 24,000,000 | 1.0 | 9/23/2021 | \$ 36,000,000 | 1.00 | 12/6/2021 | \$ 94,000,000 | 1.00 |
| 2/14/2021 | \$ | 3,000,000 | 1.06\% | 4/29/2021 | \$ | S 6,000,000 | . 00 | 7/12/2021 | \$ 24,000,000 | 1.00\% | 9/24/2021 | \$ 36,000,000 | 1.00\% | 12/7/2021 | \$ 94,000,000 | 1.00\% |
| 2/15/2021 | \$ | 3,000,000 | 1.06\% | 4/30/2021 | \$ | \$ 6,000,000 | 1.00\% | 7/13/2021 | \$ 24,000,000 | 1.00\% | 9/25/2021 | \$ 36,000,000 | 1.00\% | 12/8/2021 | \$ 94,000,000 | 00 |
| 2/16/2021 | \$ | 3,000,000 | 1.06\% | 5/1/2021 | \$ | \$ 12,000,000 | 1.0 | 7/14/2021 | \$ 24,000,000 | 1.00\% | 9/26/2021 | \$ 36,000,000 | 1.00\% | 12/9/2021 | 94,000,000 | 1.00\% |
| 2/17/2021 | \$ | 3,000,000 | 1.06\% | 5/2/2021 | \$ | \$ 12,000,000 | 1.00 | 7/15/2021 | \$ 24,000,000 | 1.0 | 9/27/2021 | \$ 36,000,000 | 1.0 | 12/10/2021 | \$ 94,000,000 | 1.00\% |
| 2/18/2021 | \$ | 3,000,000 | 1.06\% | 5/3/2021 |  | \$ 12,000,000 | 1.00\% | 7/16/2021 | \$ 24,000,000 | 1.00\% | 9/28/2021 | \$ 36,000,000 | 1.00\% | 12/11/2021 | \$ 94,000,000 | 00 |
| 2/19/2021 | \$ | 3,000,000 | 1.06\% | 5/4/2021 |  | 12,000,000 | 1.00\% | 7/17/2021 | \$ 24,000,000 | 1.00\% | 9/29/202 | \$ 36,000,000 | 1.00\% | 12/12/2021 | \$ 94,000,000 | 1.00\% |
| 2/20/2021 | \$ | 3,000,000 | 1.0 | 5/5/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/18/2021 | \$ 24,000,000 | 1.00\% | 9/30/2021 | \$ 36,000,000 | 1.00\% | 12/13/2021 | \$ 94,000,000 | 1.00\% |
| 2/21/2021 | \$ | 3,000,000 | 1.06\% | 5/6/2021 | \$ | \$ 12,000,000 | 1.00 | 7/19/2021 | \$ 24,000,000 | 1.00 | 10/1/2021 | \$ 55,000,000 | 1.0 | 12/14/2021 | \$ 94,000,000 | 1.00 |
| 2/22/2021 | \$ | 3,000,000 | 1.06\% | 5/7/2021 | \$ | 12,000,000 | 1.0 | 7/20/2021 | \$ 24,000,000 | 1.00\% | 10/2/2021 | \$ 55,000,000 | 1.00\% | 12/15/2021 | \$ 94,000,000 | 1.00\% |
| 2/23/2021 | \$ | 3,000,000 | 1.06\% | 5/8/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/21/2021 | \$ 24,000,000 | 1.00\% | 10/3/2021 | \$ 55,000,000 | 1.00 | 12/16/2021 | \$ 94,000,000 | 1.00 |
| 2/24/2021 | \$ | 3,000,000 | 1.06\% | 5/9/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/22/2021 | \$ 24,000,000 | 1.00\% | 10/4/2021 | \$ 55,000,000 | 1.00\% | 12/17/2021 | \$ 94,000,000 | 1.00\% |
| 2/25/2021 | \$ | 3,000,000 | 1.06\% | 5/10/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/23/2021 | \$ 24,000,000 | 1.00\% | 10/5/2021 | \$ 55,000,000 | 1.00 | 12/18/2021 | \$ 94,000,000 | 1.00 |
| 2/26/2021 | \$ | 3,000,000 | 1.06\% | 5/11/2021 | \$ | \$ 12,000,000 | 1.0 | 7/24/2021 | \$ 24,000,000 | 1.0 | 10/6/2021 | \$ 55,000,000 | 1.00\% | 12/19/2021 | \$ 94,000,000 | 1.00\% |
| 2/27/2021 | \$ | 3,000,000 | 1.06\% | 5/12/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/25/2021 | \$ 24,000,000 | 1.00\% | 10/7/2021 | \$ 55,000,000 | 1.00 | 12/20/2021 | \$ 94,000,000 | 1.00 |
| 2/28/2021 | \$ | 3,000,000 | 1.06\% | 5/13/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/26/2021 | \$ 24,000,000 | 1.00\% | 10/8/2021 | \$ 55,000,000 | 1.00\% | 12/21/2021 | \$ 94,000,000 | 1.00 |
| 3/1/2021 | \$ |  | 0.00\% | 5/14/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/27/2021 | \$ 24,000,000 | 1.0 | 10/9/2021 | \$ 55,000,000 | 1.0 | 12/22/2021 | \$ 94,000,000 | 1.00 |
| 3/2/2021 | \$ |  | 0.00\% | 5/15/2021 |  | \$ 12,000,000 | 1.00 | 7/28/2021 | \$ 24,000,000 | 1.00 | 10/10/2021 | \$ 55,000,000 | 1.0 | 12/23/2021 | \$ 94,000,000 | 1.00\% |
| 3/3/2021 | \$ |  | 0.00\% | 5/16/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/29/2021 | \$ 24,000,000 | 1.00 | 10/11/2021 | \$ 55,000,000 | 1.00 | 12/24/2021 | \$ 94,000,000 | 00\% |
| 3/4/2021 | \$ |  | 0.00\% | 5/17/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/30/2021 | \$ 24,000,000 | 1.00\% | 10/12/2021 | \$ 55,000,000 | 1.00 | 12/25/2021 | \$ 94,000,000 | 1.00\% |
| 3/5/2021 | \$ |  | 0.00\% | 5/18/2021 | \$ | \$ 12,000,000 | 1.00\% | 7/31/2021 | \$ 24,000,000 | 1.00 | 10/13/2021 | \$ 55,000,000 | 1.00 | 12/26/2021 | \$ 94,000,000 | 1.00 |
| 3/6/2021 | \$ |  | 0.00\% | 5/19/2021 |  | \$ 12,000,000 | 1.00\% | 8/1/2021 | \$ 30,000,000 | 1.00\% | 10/14/2021 | \$ 55,000,000 | 1.00\% | 12/27/2021 | \$ 94,000,000 | 00\% |
| 3/7/2021 | \$ |  | 0.00 | 5/20/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/2/2021 | \$ 30,000,000 | 1.00\% | 10/15/2021 | \$ 55,000,000 | 1.00 | 12/28/2021 | \$ 94,000,000 | 1.00 |
| 3/8/2021 | \$ |  | 0.00\% | 5/21/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/3/2021 | \$ 30,000,000 | 1.00\% | 10/16/2021 | \$ 55,000,000 | 1.00\% | 12/29/2021 | \$ 94,000,000 | 1.00\% |
| 3/9/2021 | \$ |  | 00 | 5/22/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/4/2021 | \$ 30,000,000 | 1.00\% | 10/17/2021 | \$ 55,000,000 | 1.00\% | 12/30/2021 | \$ 94,000,000 | 1.00 |
| 3/10/2021 | \$ |  | 0.00\% | 5/23/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/5/2021 | \$ 30,000,000 | 1.0 | 10/18/2021 | \$ 55,000,000 | 1.00 | 12/31/2021 | \$ 94,000,000 | 1.00\% |
| 3/11/2021 | \$ |  | 0.00\% | 5/24/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/6/2021 | \$ 30,000,000 | 1.00\% | 10/19/2021 | \$ 55,000,000 | 1.00\% |  |  |  |
| 3/12/2021 | \$ |  | 0.0 | 5/25/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/7/2021 | \$ 30,000,000 | 1.00\% | 10/20/2021 | \$ 55,000,000 | 1.00 |  |  |  |
| 3/13/2021 | \$ |  | 0.00\% | 5/26/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/8/2021 | \$ 30,000,000 | 1.00\% | 10/21/2021 | \$ 55,000,000 | 1.00\% | AVERAGE | \$ 30,180,822 | 0.93\% |
| 3/14/2021 | \$ |  | 0.00\% | 5/27/2021 | \$ | \$ 12,000,000 | 1.00\% | 8/9/2021 | \$ 30,000,000 | 1.00\% | 10/22/2021 | \$ 55,000,000 | 1.00\% |  |  |  |
| 3/15/2021 | \$ |  | 0.00\% | 5/28/2021 |  | \$ 12,000,000 | 1.00\% | 8/10/2021 | \$ 30,000,000 | 1.00\% | 10/23/2021 | \$ 55,000,000 | 1.00\% |  |  |  |

Q.1. Describe long-term debt reacquisition by Company and Parent as follows:
a. Reacquisition by issue by year.
b. Total gain or loss on reacquisition by issue by year.
c. Accounting for gain or loss for income tax and book purposes.
d. Proposed treatment of gain or loss on such reacquisition for ratemaking purposes.
A.1. See DFR III-B-5-Attachment for the requested information.

The unamortized debt expense and/or debt discount/premium associated with bonds that are reacquired at a loss were added to the premium paid to reacquire the bonds. In accordance with General Instruction 17 of the Uniform System of Accounts, the loss is amortized over the remaining life of the bonds, or if the bonds were refinanced, the life of the new issuance.

Accounting for losses for income tax purposes:
Loss on reacquired debt set forth above was deducted as incurred for income tax purposes.

Proposed treatment of losses for ratemaking purposes:
The Company proposes that the current practice of adhering to General Instruction 17 of the Uniform System of Accounts be continued.

Duquesne Light Company
Loss on Reacquired Debt - Unamortized Balance Schedule

Q.1. Provide a schedule showing the calculation of embedded cost of preferred stock equity by issue, supporting the related rate case claim. The schedule shall contain the following information:
a. Date of issue.
b. Date of maturity.
c. Amount issued.
d. Amount outstanding.
e. Amount retired.
f. Amount reacquired.
g. Gain or loss on reacquisition.
h. Dividend rate.
i. Discount or premium at issuance.
j. Issuance expenses.
k. Net proceeds.

1. Sinking fund requirements.
m . Effective cost rate.
n. Total average weighted effective cost rate.

Projected new issues, retirements and other major changes from the comparable historic data should be clearly noted.
A.1. The Company does not have any preferred stock outstanding and does not project any new issues. Therefore, a schedule with the above requested information has not been provided, as it is not applicable.
Q.1. Provide complete support for claimed equity rate of return.
A.1. Please refer to Duquesne Light Company Exhibit PRM-1, Statement No. 9, the direct testimony of Paul R. Moul.
Q.2. Provide a summary statement of all stock dividends, splits or par value changes during the calendar year period preceding the rate case filing.
A.2. Quarterly dividends from Duquesne Light Company to Duquesne Light Holdings, Inc. in 2019 and 2020:
$1^{\text {st }}$ quarter $2019-\$ 25.0$ million
$2^{\text {nd }}$ quarter $2019-\$ 25.0$ million
$3^{\text {rd }}$ quarter $2019-\$ 0.0$ million
$4^{\text {th }}$ quarter $2019-\$ 0.0$ million

$1^{\text {st }}$ quarter $2020-\$ 50.0$ million
$2^{\text {nd }}$ quarter $2020-\$ 10.0$ million
$3^{\text {rd }}$ quarter $2020-\$ 10.0$ million
$4^{\text {th }}$ quarter $2020-\$ 10.0$ million
Q.3. Provide a schedule of all issuances of common stock, whether or not underwriters are used, for the most immediately available annual historical period and the 2 calendar years most immediately preceding the test year.
A.3. There have been no issuances of common stock by the Company.
Q.4. Submit details on the utility and parent company stock offerings - past 5 years to present as follows:
a. Date of prospectus.
b. Date of offering.
c. Record date.
d. Offering period - dates and numbers of days.
e. Amount and number of shares offered.
f. Offering ratio, if rights offering.
g. Percent subscribed.
h. Offering price.
i. Gross proceeds per share.
j. Expenses per share.
k. Net proceeds per share ( $\mathrm{i}-\mathrm{j}$ )

1. Market price per share.
1) At record date.
2) At offering date.
3) One month after close of offering.
m . Average market price during offering.
4) Price per share.
5) Rights per share.
n. Latest reported earnings per share at time of offering.
o. Latest reported dividends at time of offering.
A.4. There have been no stock offerings in the past 5 years. As of May 31, 2007, DQE Holdings LLC (the ultimate parent company) has been privately held.
Q.1. If a claim of the filing utility is based on utilization of the capital structure or capital costs of the parent company and system - consolidated - the reasons for this claim must be fully stated and supported.
A.1. Duquesne Light Company will not be filing a claim based on the capital structure or capital costs of the parent company and system.
Q.2. Regardless of the claim made, provide the capitalization data requested at Item III-A-2 for the parent company and for the system - consolidated.
A.2. See Attachment DFR III-E-2 for capitalization data for years ended December 31, 2022, December 31, 2021, December 31, 2020, and December 31, 2019.

DUQUESNE LIGHT HOLDINGS, INC.
Capitalization - Including Short-term Debt Balance
(in millions)
Short-Term Debt

Long-Term Debt

Preferred Stock

Common Equity
Total Book Capitalization

Capitalization - Excluding Short-term Debt Balance (in millions)

## Long-Term Debt

Preferred Stock
Common Equity
Total Book Capitalization


| 31-Dec-22 |  |  | 31-Dec-21 |  |  | 31-Dec-20 |  |  | 31-Dec-19 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Amount utstanding | Percent |  | Amount tstanding | Percent |  | Amount tstanding | Percent |  | Amount tstanding | Percent |
| \$ | 2,860.60 | 64.85\% | \$ | 2,707.00 | 64.50\% | \$ | 2,649.50 | 65.32\% | \$ | 2,549.30 | 66.17\% |
| \$ | - | 0.00\% | \$ | - | 0.00\% | \$ | - | 0.00\% | \$ | - | 0.00\% |
| \$ | 1,550.40 | 35.15\% | \$ | 1,490.00 | 35.50\% | \$ | 1,406.90 | 34.68\% | \$ | 1,303.20 | 33.83\% |
| \$ | 4,411.00 | 100.00\% | \$ | 4,197.00 | 100.00\% | \$ | 4,056.40 | 100.00\% | \$ | 3,852.50 | 100.00\% |

Q.3. Provide the latest available balance sheet and income statement for the parent company and system - consolidated.
A.3. See the response to Filing Requirement III-F-1 for the requested data.
Q.3. Provide an organizational chart explaining the filing utility's corporate relationship to its affiliates - system structure.
A.3. See Attachment III-E-4 which provides an organizational chart showing DQE Holdings LLC, Duquesne Light Holdings, Inc. and its direct subsidiaries, as well as a listing of all the direct and indirect subsidiaries of Duquesne Light Company.

## DQE Holdings LLC (as of December 31, 2020)

| Subsidiary / Affiliate | \% Owned by Parent |
| :--- | :--- |
| Duquesne Light Holdings, Inc | $100.00 \%$ |
| AquaSource, LLC | $100.00 \%$ |
| DQE Capital Corporation | $100.00 \%$ |
| DQE Enterprises, Inc. | $100.00 \%$ |
| DQE Financial, LLC | $100.00 \%$ |
| DQE Energy Solutions, LLC | $100.00 \%$ |
| Duquesne Generation, LLC | $100.00 \%$ |
| Duquesne Light Company | $100.00 \%$ |
| Duquesne Light Energy, LLC | $100.00 \%$ |
| Monongahela Light and Power Company (As of November 2017) | $100.00 \%$ |
| $\quad$ DataCom Information Systems, LLC | $100.00 \%$ |
| DQE Communications, LLC (As of November 2017) | $100.00 \%$ |
| The Efficiency Network, Inc. | $100.00 \%$ |


Q.1. The latest available quarterly operating and financial report, annual report to the stockholders and prospectus shall be supplied for the utility and for the utility's parent, if the relationship exists.
A.1. As Duquesne Light Company and Duquesne Light Holdings, Inc. (parent) are not registered with the Securities and Exchange Commission; no Form 10-Q's are required or prepared. Latest available information represents year ended December 31, 2020.

Attachment III-F-1a provides the Duquesne Light Company Federal Energy Regulatory Commission (FERC) Form No. 1 for the year ended December 31, 2019. Deloitte \& Touche LLP is in the fieldwork phase of its audit of the December 31, 2020 regulatory financial statements to be included in the December 31, 2020 FERC Form No. 1. The Company anticipates filing its FERC Form No. 1 in April 2021.

Highly Confidential Attachment III-F-1b provides the audited Duquesne Light Holdings, Inc. (parent) and Subsidiaries Consolidated Financial Statements as of and for the year ended December 31, 2020.

Highly Confidential Attachment III-F-1c provides the Duquesne Light Holdings, Inc. (parent) Earnings Release for the year ended December 31, 2020.

Highly Confidential Attachment III-F-1d provides the Duquesne Light Company Operational Narrative - December 31, 2020.

Highly Confidential Attachment III-F-1e provides the audited Duquesne Light Company and Subsidiaries Consolidated Financial Statements as of and for the year ended December 31, 2020.

Highly Confidential Attachment III-F-1f provides the latest Duquesne Light Company Private Placement Memorandum (associated with the April 2020 First Mortgage Bond Issuance).

Highly Confidential Attachment III-F-1g provides the latest Duquesne Light Holdings, Inc. Offering Memorandum (associated with the September 2020 Senior Notes.

| THIS FILING IS |  |
| :---: | :---: |
| Item 1: $\mathbf{\chi}$ An Initial (Original) Submission | OR $\square$ Resubmission No. |

Form 1 Approved
OMB No.1902-0021
(Expires 11/30/2022)
Form 1-F Approved
OMB No.1902-0029
(Expires 11/30/2022)
Form 3-Q Approved
OMB No.1902-0205
(Expires 11/30/2022)

# FERC FINANCIAL REPORT FERC FORM No. 1: Annual Report of Major Electric Utilities, Licensees and Others and Supplemental Form 3-Q: Quarterly Financial Report 

[^7]| Exact Legal Name of Respondent (Company) <br> Duquesne Light Company | Year/Period of Report <br> End of2019/Q4 |
| :--- | :--- |

FERC FORM NO. 1/3-Q:
REPORT OF MAJOR ELECTRIC UTILITIES, LICENSEES AND OTHER


| 01 Name <br> /s/Mark E. Kaplan | 03 Signature | 04 Date Signed <br> (Mo, Da, Yr) |
| :--- | :--- | :---: |
| 02 Title <br> Senior VP \& CFO | /s/Mark E. Kaplan | $04 / 29 / 2020$ |

Title 18, U.S.C. 1001 makes it a crime for any person to knowingly and willingly to make to any Agency or Department of the United States any false, fictitious or fraudulent statements as to any matter within its jurisdiction.

| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

Enter in column (c) the terms "none," "not applicable," or "NA," as appropriate, where no information or amounts have been reported for certain pages. Omit pages where the respondents are "none," "not applicable," or "NA".

| $\begin{array}{\|c} \hline \text { Line } \\ \text { No. } \end{array}$ | Title of Schedule <br> (a) | Reference Page No. <br> (b) | Remarks <br> (c) |
| :---: | :---: | :---: | :---: |
| 1 | General Information | 101 |  |
| 2 | Control Over Respondent | 102 |  |
| 3 | Corporations Controlled by Respondent | 103 | None |
| 4 | Officers | 104 |  |
| 5 | Directors | 105 |  |
| 6 | Information on Formula Rates | 106(a)(b) |  |
| 7 | Important Changes During the Year | 108-109 |  |
| 8 | Comparative Balance Sheet | 110-113 |  |
| 9 | Statement of Income for the Year | 114-117 |  |
| 10 | Statement of Retained Earnings for the Year | 118-119 |  |
| 11 | Statement of Cash Flows | 120-121 |  |
| 12 | Notes to Financial Statements | 122-123 |  |
| 13 | Statement of Accum Comp Income, Comp Income, and Hedging Activities | 122(a)(b) |  |
| 14 | Summary of Utility Plant \& Accumulated Provisions for Dep, Amort \& Dep | 200-201 |  |
| 15 | Nuclear Fuel Materials | 202-203 | None |
| 16 | Electric Plant in Service | 204-207 |  |
| 17 | Electric Plant Leased to Others | 213 | None |
| 18 | Electric Plant Held for Future Use | 214 | None |
| 19 | Construction Work in Progress-Electric | 216 |  |
| 20 | Accumulated Provision for Depreciation of Electric Utility Plant | 219 |  |
| 21 | Investment of Subsidiary Companies | 224-225 | None |
| 22 | Materials and Supplies | 227 |  |
| 23 | Allowances | 228(ab)-229(ab) | None |
| 24 | Extraordinary Property Losses | 230 | None |
| 25 | Unrecovered Plant and Regulatory Study Costs | 230 | None |
| 26 | Transmission Service and Generation Interconnection Study Costs | 231 |  |
| 27 | Other Regulatory Assets | 232 |  |
| 28 | Miscellaneous Deferred Debits | 233 |  |
| 29 | Accumulated Deferred Income Taxes | 234 |  |
| 30 | Capital Stock | 250-251 | None |
| 31 | Other Paid-in Capital | 253 |  |
| 32 | Capital Stock Expense | 254 | None |
| 33 | Long-Term Debt | 256-257 |  |
| 34 | Reconciliation of Reported Net Income with Taxable Inc for Fed Inc Tax | 261 |  |
| 35 | Taxes Accrued, Prepaid and Charged During the Year | 262-263 |  |
| 36 | Accumulated Deferred Investment Tax Credits | 266-267 | None |
|  |  |  |  |



Enter in column (c) the terms "none," "not applicable," or "NA," as appropriate, where no information or amounts have been reported for certain pages. Omit pages where the respondents are "none," "not applicable," or "NA".

| Line No. | Title of Schedule <br> (a) | Reference Page No. (b) | Remarks <br> (c) |
| :---: | :---: | :---: | :---: |
| 37 | Other Deferred Credits | 269 |  |
| 38 | Accumulated Deferred Income Taxes-Accelerated Amortization Property | 272-273 | None |
| 39 | Accumulated Deferred Income Taxes-Other Property | 274-275 |  |
| 40 | Accumulated Deferred Income Taxes-Other | 276-277 |  |
| 41 | Other Regulatory Liabilities | 278 |  |
| 42 | Electric Operating Revenues | 300-301 |  |
| 43 | Regional Transmission Service Revenues (Account 457.1) | 302 | None |
| 44 | Sales of Electricity by Rate Schedules | 304 |  |
| 45 | Sales for Resale | 310-311 |  |
| 46 | Electric Operation and Maintenance Expenses | 320-323 |  |
| 47 | Purchased Power | 326-327 |  |
| 48 | Transmission of Electricity for Others | 328-330 |  |
| 49 | Transmission of Electricity by ISO/RTOs | 331 |  |
| 50 | Transmission of Electricity by Others | 332 | None |
| 51 | Miscellaneous General Expenses-Electric | 335 |  |
| 52 | Depreciation and Amortization of Electric Plant | 336-337 |  |
| 53 | Regulatory Commission Expenses | 350-351 |  |
| 54 | Research, Development and Demonstration Activities | 352-353 | None |
| 55 | Distribution of Salaries and Wages | 354-355 |  |
| 56 | Common Utility Plant and Expenses | 356 | None |
| 57 | Amounts included in ISO/RTO Settlement Statements | 397 |  |
| 58 | Purchase and Sale of Ancillary Services | 398 |  |
| 59 | Monthly Transmission System Peak Load | 400 |  |
| 60 | Monthly ISO/RTO Transmission System Peak Load | 400a |  |
| 61 | Electric Energy Account | 401 |  |
| 62 | Monthly Peaks and Output | 401 |  |
| 63 | Steam Electric Generating Plant Statistics | 402-403 | None |
| 64 | Hydroelectric Generating Plant Statistics | 406-407 | None |
| 65 | Pumped Storage Generating Plant Statistics | 408-409 | None |
| 66 | Generating Plant Statistics Pages | 410-411 | None |
|  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle A n$ Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

Enter in column (c) the terms "none," "not applicable," or "NA," as appropriate, where no information or amounts have been reported for certain pages. Omit pages where the respondents are "none," "not applicable," or "NA".

| Line No. | Title of Schedule <br> (a) | Reference Page No. (b) | Remarks <br> (c) |
| :---: | :---: | :---: | :---: |
| 67 | Transmission Line Statistics Pages | 422-423 |  |
| 68 | Transmission Lines Added During the Year | 424-425 |  |
| 69 | Substations | 426-427 |  |
| 70 | Transactions with Associated (Affiliated) Companies | 429 |  |
| 71 | Footnote Data | 450 |  |
|  | Stockholders' Reports Check appropriate box: Two copies will be submitted <br> X No annual report to stockholders is prepared |  |  |


| Name of Respondent Duquesne Light Company | This Report Is: <br> (1) $X$ An Original <br> (2) $\square$ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Pe <br> End of | of Report 2019/Q4 |
| :---: | :---: | :---: | :---: | :---: |
| GENERAL INFORMATION |  |  |  |  |
| 1. Provide name and title of officer having custody of the general corporate books of account and address of office where the general corporate books are kept, and address of office where any other corporate books of account are kept, if different from that where the general corporate books are kept. <br> Mark E. Kaplan, Senior Vice President \& CFO <br> 411 Seventh Avenue <br> Pittsburgh, PA 15219 |  |  |  |  |
| 2. Provide the name of the State under the laws of which respondent is incorporated, and date of incorporation. If incorporated under a special law, give reference to such law. If not incorporated, state that fact and give the type of organization and the date organized. <br> Duquesne Light Company (DLC) is a limited liability company (LLC) under Pennsylvania law. DLC became a Pennsylvania LLC on November 27, 2017. |  |  |  |  |

3. If at any time during the year the property of respondent was held by a receiver or trustee, give (a) name of receiver or trustee, (b) date such receiver or trustee took possession, (c) the authority by which the receivership or trusteeship was created, and (d) date when possession by receiver or trustee ceased.

Not Applicable
4. State the classes or utility and other services furnished by respondent during the year in each State in which the respondent operated.

Furnished electric service - Pennsylvania
5. Have you engaged as the principal accountant to audit your financial statements an accountant who is not the principal accountant for your previous year's certified financial statements?
(1) $\square$ Yes...Enter the date when such independent accountant was initially engaged:
(2) $\triangle$ No

| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | Year/Period of Report |
| :--- | :--- | :---: | :---: | :---: |
|  | (1) X An Original |  |  |
| (2) $\square$ A Resubmission | $04 / 29 / 2020$ | End of $\quad-2019 / \mathrm{Q4}$ |  |

CONTROL OVER RESPONDENT

1. If any corporation, business trust, or similar organization or a combination of such organizations jointly held control over the repondent at the end of the year, state name of controlling corporation or organization, manner in which control was held, and extent of control. If control was in a holding company organization, show the chain of ownership or control to the main parent company or organization. If control was held by a trustee(s), state name of trustee(s), name of beneficiary or beneficiearies for whom trust was maintained, and purpose of the trust.

As of December 31, 2019, Duquesne Light Company is owned entirely by Duquesne Light Holdings, Inc. which in turn is owned by DQE Holdings LLC. DQE Holdings LLC is owned by a consortium of owners as follows (with their respective membership interests in DQE Holdings LLC indicated in parenthesis): GIC/ Epsom Investment Pte Ltd. (44.39\%); Three Rivers Utility Holdings, LLC (30.43\%); AIA Montana LLC (25.18\%).

| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original (2) $\square$ A Resubmission | $\begin{aligned} & (\mathrm{Mo}, \mathrm{Da}, \mathrm{Yr}) \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

1. Report below the name, title and salary for each executive officer whose salary is $\$ 50,000$ or more. An "executive officer" of a respondent includes its president, secretary, treasurer, and vice president in charge of a principal business unit, division or function (such as sales, administration or finance), and any other person who performs similar policy making functions.
2. If a change was made during the year in the incumbent of any position, show name and total remuneration of the previous incumbent, and the date the change in incumbency was made.

| $\begin{array}{\|c} \hline \text { Line } \\ \text { No. } \end{array}$ | $\begin{gathered} \text { Title } \\ \text { (a) } \\ \hline \end{gathered}$ | Name of Officer <br> (b) | $\qquad$ |
| :---: | :---: | :---: | :---: |
| 1 | President and Chief Executive Officer (ended 4/29/2019) | Richard Riazzi | 2,014,650 |
| 2 |  |  |  |
| 3 | President and Chief Executive Officer (began 4/30/2019) | Steven E. Malnight | 1,344,191 |
| 4 |  |  |  |
| 5 | Senior Vice President \& Chief Financial Officer | Mark E. Kaplan | 1,000,623 |
| 6 |  |  |  |
| 7 | Vice President, Rates \& Regulatory Affairs, | David T. Fisfis | 705,360 |
| 8 | General Counsel \& Corporate Secretary |  |  |
| 9 |  |  |  |
| 10 | Vice President, Operations (ended 9/6/2019) | F. Michael Doran | 619,738 |
| 11 |  |  |  |
| 12 | Interim Vice President, Operations (began 9/6/2019) | John C. Hilderbrand II | 89,627 |
| 13 |  |  |  |
| 14 | Vice President, Customer Care (ended 2/28/2019) | Campbell B. Hawkins | 272,604 |
| 15 |  |  |  |
| 16 | Vice President, Information Technology | Mark S. Miko | 612,409 |
| 17 | \& Chief Information Officer |  |  |
| 18 |  |  |  |
| 19 | Vice President, Human Resources | Todd W. Faulk | 443,669 |
| 20 |  |  |  |
| 21 | Vice President, Communications \& Corporate | Jessica J. Rock | 305,968 |
| 22 | Citizenship (ended 3/31/2020) |  |  |
| 23 |  |  |  |
| 24 | Chief Customer Officer (began 1/6/2020) | David L. Johnson |  |
| 25 |  |  |  |
| 26 | Chief Operating Officer (began 4/1/2020) | Kevin Walker |  |
| 27 |  |  |  |
| 28 | Vice President, External Affairs (began 4/1/2020) | Katie Davis |  |
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|  | of Respondent uesne Light Company | Date of Report (Mo, Da, Yr) $04 / 29 / 2020$ | Year/P <br> End of | $\begin{aligned} & \text { Report } \\ & \text { 2019/Q4 } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |
| 1. Re <br> titles <br> 2. De | eport below the information called for concern of the directors who are officers of the respond esignate members of the Executive Committe | held office at any time during the <br> the Executive Committee by a | de in colu isk. | abbreviated |
| $\begin{array}{\|l} \hline \text { Line } \\ \text { No. } \\ \hline \end{array}$ | Name (and | Princ | s Addres |  |
| 1 | Richard Riazzi (ended 4/29/2019) | Duquesne Light Company |  |  |
| 2 | President and Chief Executive Officer | 411 Seventh Avenue |  |  |
| 3 |  | Pittsburgh, PA 15219 |  |  |
| 4 |  |  |  |  |
| 5 | Steven E. Malnight (began 4/30/2019) | Duquesne Light Company |  |  |
| 6 | President and Chief Executive Officer | 411 Seventh Avenue |  |  |
| 7 |  | Pittsburgh, PA 15219 |  |  |
| 8 |  |  |  |  |
| 9 | Joseph C. Guyaux | Duquesne Light Company |  |  |
| 10 |  | 411 Seventh Avenue |  |  |
| 11 |  | Pittsburgh, PA 15219 |  |  |
| 12 |  |  |  |  |
| 13 | John McMahon | Duquesne Light Company |  |  |
| 14 |  | 411 Seventh Avenue |  |  |
| 15 |  | Pittsburgh, PA 15219 |  |  |
| 16 |  |  |  |  |
| 17 | Will Kaffenberger (ended 3/7/2019) | Duquesne Light Company |  |  |
| 18 |  | 411 Seventh Avenue |  |  |
| 19 |  | Pittsburgh, PA 15219 |  |  |
| 20 |  |  |  |  |
| 21 | Helen Newell (began 3/7/2019) | Duquesne Light Company |  |  |
| 22 |  | 411 Seventh Avenue |  |  |
| 23 |  | Pittsburgh, PA 15219 |  |  |
| 24 |  |  |  |  |
| 25 | Andrew Dench | Duquesne Light Company |  |  |
| 26 |  | 411 Seventh Avenue |  |  |
| 27 |  | Plttsburgh, PA 15219 |  |  |
| 28 |  |  |  |  |
| 29 | Edward Dunn | Duquesne Light Company |  |  |
| 30 |  | 411 Seventh Avenue |  |  |
| 31 |  | Pittsburgh, PA 15219 |  |  |
| 32 |  |  |  |  |
| 33 | Richard Klapow | Duquesne Light Company |  |  |
| 34 |  | 411 Seventh Avenue |  |  |
| 35 |  | Pittsburgh, PA 15219 |  |  |
| 36 |  |  |  |  |
| 37 | Michael Madia (ended 3/5/2020) | Duquesne Light Company |  |  |
| 38 |  | 411 Seventh Avenue |  |  |
| 39 |  | Pittsburgh, PA 15219 |  |  |
| 40 |  |  |  |  |
| 41 | Joseph Fontana (began 3/5/2020) | Duquesne Light Company |  |  |
| 42 |  | 411 Seventh Avenue |  |  |
| 43 |  | Pittsburgh, PA 15219 |  |  |
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|  | of Respondent uesne Light Company | This Re (1) $X$ (2) 2) | ort ls: An Original A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report <br> End of $2019 / Q 4$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | INFOR <br> Rate Sc | MATION ON FORMU edule/Tariff Number | TES Proceeding |  |
| Does | the respondent have formula rates? |  |  | X Yes <br> $\square$ No |  |
| 1. Pl ac | ease list the Commission accepted formula cepting the rate(s) or changes in the acce | cluding F | RC Rate Schedule | Number and FER | (i.e. Docket No) |
| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \end{array}$ | FERC Rate Schedule or Tariff Number |  | FERC Proceeding |  |  |
| 1 | PJM Interconnection, LLC |  |  |  |  |
| 2 | FERC Electric Tariff |  |  | Docket N | -1549-000 and ER06-1549-001 |
| 3 | Pages 1853-1891 |  |  |  |  |
| 4 | (Effective Date 9/17/10 ER11-2801-000) |  |  |  |  |
| 5 | Attachment H-17 |  |  |  |  |
| 6 |  |  |  |  |  |
| 7 | Revised Depreciation Rates |  |  |  | Docket No. ER 14-1258-000 |
| 8 | (Effective 6/1/14) |  |  |  |  |
| 9 |  |  |  |  |  |
| 10 | Ministerial Revisions |  |  |  | Docket No. ER 15-1202-000 |
| 11 | (Effective 5/8/15) |  |  |  |  |
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| :---: | :---: | :---: | :---: | :---: | :---: |
| INFORMATION ON FORMULA RATES Formula Rate Variances |  |  |  |  |  |
| 1. If a respondent does not submit such filings then indicate in a footnote to the applicable Form 1 schedule where formula rate inputs differ from amounts reported in the Form 1. <br> 2. The footnote should provide a narrative description explaining how the "rate" (or billing) was derived if different from the reported amount in the Form 1. <br> 3. The footnote should explain amounts excluded from the ratebase or where labor or other allocation factors, operating expenses, or other items impacting formula rate inputs differ from amounts reported in Form 1 schedule amounts. <br> 4. Where the Commission has provided guidance on formula rate inputs, the specific proceeding should be noted in the footnote. |  |  |  |  |  |
| Line No. | Page No(s). | Schedule |  | Column | Line No |
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| Name of Respondent Duquesne Light Company | This | R | ort Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | An Original |  | End of | 2019/Q4 |
|  |  |  | A Resubmission | 04/29/2020 |  |  |

Give particulars (details) concerning the matters indicated below. Make the statements explicit and precise, and number them in accordance with the inquiries. Each inquiry should be answered. Enter "none," "not applicable," or "NA" where applicable. If information which answers an inquiry is given elsewhere in the report, make a reference to the schedule in which it appears.

1. Changes in and important additions to franchise rights: Describe the actual consideration given therefore and state from whom the franchise rights were acquired. If acquired without the payment of consideration, state that fact.
2. Acquisition of ownership in other companies by reorganization, merger, or consolidation with other companies: Give names of companies involved, particulars concerning the transactions, name of the Commission authorizing the transaction, and reference to Commission authorization.
3. Purchase or sale of an operating unit or system: Give a brief description of the property, and of the transactions relating thereto, and reference to Commission authorization, if any was required. Give date journal entries called for by the Uniform System of Accounts were submitted to the Commission.
4. Important leaseholds (other than leaseholds for natural gas lands) that have been acquired or given, assigned or surrendered: Give effective dates, lengths of terms, names of parties, rents, and other condition. State name of Commission authorizing lease and give reference to such authorization.
5. Important extension or reduction of transmission or distribution system: State territory added or relinquished and date operations began or ceased and give reference to Commission authorization, if any was required. State also the approximate number of customers added or lost and approximate annual revenues of each class of service. Each natural gas company must also state major new continuing sources of gas made available to it from purchases, development, purchase contract or otherwise, giving location and approximate total gas volumes available, period of contracts, and other parties to any such arrangements, etc.
6. Obligations incurred as a result of issuance of securities or assumption of liabilities or guarantees including issuance of short-term debt and commercial paper having a maturity of one year or less. Give reference to FERC or State Commission authorization, as appropriate, and the amount of obligation or guarantee.
7. Changes in articles of incorporation or amendments to charter: Explain the nature and purpose of such changes or amendments.
8. State the estimated annual effect and nature of any important wage scale changes during the year.
9. State briefly the status of any materially important legal proceedings pending at the end of the year, and the results of any such proceedings culminated during the year.
10. Describe briefly any materially important transactions of the respondent not disclosed elsewhere in this report in which an officer, director, security holder reported on Page 104 or 105 of the Annual Report Form No. 1, voting trustee, associated company or known associate of any of these persons was a party or in which any such person had a material interest.
11. (Reserved.)
12. If the important changes during the year relating to the respondent company appearing in the annual report to stockholders are applicable in every respect and furnish the data required by Instructions 1 to 11 above, such notes may be included on this page. 13. Describe fully any changes in officers, directors, major security holders and voting powers of the respondent that may have occurred during the reporting period.
13. In the event that the respondent participates in a cash management program(s) and its proprietary capital ratio is less than 30 percent please describe the significant events or transactions causing the proprietary capital ratio to be less than 30 percent, and the extent to which the respondent has amounts loaned or money advanced to its parent, subsidiary, or affiliated companies through a cash management program(s). Additionally, please describe plans, if any to regain at least a 30 percent proprietary ratio.

PAGE 108 INTENTIONALLY LEFT BLANK
SEE PAGE 109 FOR REQUIRED INFORMATION.

| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _A Resubmission | $\begin{gathered} \text { Date of Report } \\ \text { (Mo, Da, Yr) } \\ 04 / 29 / 2020 \end{gathered}$ | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| IMPORTANT CHANGES DURING THE QUARTER/YEAR (Continued) |  |  |  |

Item 1
Not Applicable
Item 2
None
Item 3
None
Item 4
None
Item 5
None
Item 6
On October 31, 2019, the Company entered into an agreement to amend and extend its existing credit agreement, which would have terminated on November 24, 2021. The amended credit agreement allows for a revolving credit facility borrowing capacity of $\$ 250.0$ million, with a final maturity date of October 31, 2024. Additionally, the Company is authorized to borrow up to $\$ 200.0$ million on a short-term basis from Duquesne Light Holdings, Inc. under the terms of a PUC order (Docket No. G-2009-2148505) approved on May 3, 2010. As of December 31, 2019, the Company had $\$ 85.0$ million borrowings under this order. The Company is authorized to borrow up to a total of $\$ 425.0$ million on a short-term basis under the terms of a FERC order (Docket No. ES19-31-000) approved on August 2, 2019. As of December 31, 2019, the Company had $\$ 85.0$ million borrowings under this order. The Company is also authorized to borrow up to $\$ 400.0$ million on a long-term basis under the terms of a PUC order (Docket No. S-2019-3013570) approved on December 5, 2019. As of December 31, 2019, the Company had zero borrowings under this order, which expires December 31, 2021.

Item 7
None
Item 8
Market Adjustments and merit increases were granted to management employees effective March 1, 2019, resulting in an incremental annual increase to the payroll of $\$ 2,069,057$ ( 593 employees affected). Under terms of the collective bargaining agreement, union employees received a $3.00 \%$ increase effective October 1, 2019, which resulted in an increase to annual compensation of \$1,880,189 (738 employees affected).

Item 9
See Note \#9 in the Notes to Financial Statements beginning on Page 123.1
Item 10
None
Item 11
Not Applicable
Item 12
None
Item 13
During the year ended December 31, 2019, the Company experienced three officer changes: (1) Steven E. Malnight replaced Richard Riazzi as President and Chief Executive Officer, (2) John Hilderbrand II is currently serving as Interim Vice President of Operations, replacing the previous Vice President of Operations, F. Michael Doran, and (3) Campbell B. Hawkins is no longer with the Company. The Company also experienced two director changes: (1) Steven E. Malnight

| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) X An Original <br> (2) _ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report <br> 2019/Q4 |
| :---: | :---: | :---: | :---: |
| IMPORTANT CHANGES DURING THE QUARTER/YEAR (Continued) |  |  |  |

replaced Richard Riazzi as President and Chief Executive Officer, and (2) Helen Newell replaced Will Kaffenberger as a member of the Board of Directors.

Item 14
Not Applicable



| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | $\begin{gathered} \hline \text { Date of Report } \\ \text { (Mo, Da, Yr) } \\ 04 / 29 / 2020 \\ \hline \end{gathered}$ | Year/Period of Report 2019/Q4 |
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| FOOTNOTE DATA |  |  |  |



| Name of Respondent <br> Duquesne Light Company |  | This Report is: <br> (1) $X$ An Original <br> (2) <br> A Resubmission | Date o <br> (mo, da <br> 04/29 | Report Year/ <br> 20 end of | eriod of Report 2019/Q4 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| COMPARATIVE BALANCE SHEET (LIABILITIES AND OTHER CREDITS) |  |  |  |  |  |
| Line No. | Title of Account <br> (a) |  | Ref. Page No. <br> (b) | Current Year End of Quarter/Year Balance <br> (c) | Prior Year End Balance 12/31 <br> (d) |
| 1 | PROPRIETARY CAPITAL |  |  |  |  |
| 2 | Common Stock Issued (201) |  | 250-251 | 0 | 0 |
| 3 | Preferred Stock Issued (204) |  | 250-251 | 0 | 0 |
| 4 | Capital Stock Subscribed (202, 205) |  |  | 0 | 0 |
| 5 | Stock Liability for Conversion (203, 206) |  |  | 0 | 0 |
| 6 | Premium on Capital Stock (207) |  |  | 0 | 0 |
| 7 | Other Paid-In Capital (208-211) |  | 253 | 985,347,596 | 985,347,596 |
| 8 | Installments Received on Capital Stock (212) |  | 252 | 0 | 0 |
| 9 | (Less) Discount on Capital Stock (213) |  | 254 | 0 | 0 |
| 10 | (Less) Capital Stock Expense (214) |  | 254b | 0 | 0 |
| 11 | Retained Earnings (215, 215.1, 216) |  | 118-119 | 435,011,824 | 300,567,301 |
| 12 | Unappropriated Undistributed Subsidiary Earnings (216.1) |  | 118-119 | 0 | 0 |
| 13 | (Less) Reaquired Capital Stock (217) |  | 250-251 | 0 | 0 |
| 14 | Noncorporate Proprietorship (Non-major only) (218) |  |  | 0 | 0 |
| 15 | Accumulated Other Comprehensive Income (219) |  | 122(a)(b) | -1,868,839 | 1,314,435 |
| 16 | Total Proprietary Capital (lines 2 through 15) |  |  | 1,418,490,581 | 1,287,229,332 |
| 17 | LONG-TERM DEBT |  |  |  |  |
| 18 | Bonds (221) |  | 256-257 | 1,195,000,000 | 1,195,000,000 |
| 19 | (Less) Reaquired Bonds (222) |  | 256-257 | 0 | 0 |
| 20 | Advances from Associated Companies (223) |  | 256-257 | 0 | 0 |
| 21 | Other Long-Term Debt (224) |  | 256-257 | 0 | 0 |
| 22 | Unamortized Premium on Long-Term Debt (225) |  |  | 0 | 0 |
| 23 | (Less) Unamortized Discount on Long-Term Debt-Debit (226) |  |  | 0 | 0 |
| 24 | Total Long-Term Debt (lines 18 through 23) |  |  | 1,195,000,000 | 1,195,000,000 |
| 25 | OTHER NONCURRENT LIABILITIES |  |  |  |  |
| 26 | Obligations Under Capital Leases - Noncurrent (227) |  |  | 0 | 0 |
| 27 | Accumulated Provision for Property Insurance (228.1) |  |  | 0 | 0 |
| 28 | Accumulated Provision for Injuries and Damages (228.2) |  |  | 4,350,046 | 5,057,510 |
| 29 | Accumulated Provision for Pensions and Benefits (228.3) |  |  | 26,387,995 | 25,220,028 |
| 30 | Accumulated Miscellaneous Operating Provisions (228.4) |  |  | 1,800,000 | 1,300,000 |
| 31 | Accumulated Provision for Rate Refunds (229) |  |  | 0 | 0 |
| 32 | Long-Term Portion of Derivative Instrument Liabilities |  |  | 0 | 0 |
| 33 | Long-Term Portion of Derivative Instrument Liabilities - Hedges |  |  | 0 | 0 |
| 34 | Asset Retirement Obligations (230) |  |  | 922,271 | 1,024,865 |
| 35 | Total Other Noncurrent Liabilities (lines 26 through 34) |  |  | 33,460,312 | 32,602,403 |
| 36 | CURRENT AND ACCRUED LIABILITIES |  |  |  |  |
| 37 | Notes Payable (231) |  |  | 0 | 45,000,000 |
| 38 | Accounts Payable (232) |  |  | 146,241,274 | 132,534,854 |
| 39 | Notes Payable to Associated Companies (233) |  |  | 85,000,000 | 0 |
| 40 | Accounts Payable to Associated Companies (234) |  |  | 76,787 | 415,591 |
| 41 | Customer Deposits (235) |  |  | 11,778,664 | 10,762,276 |
| 42 | Taxes Accrued (236) |  | 262-263 | 13,541,684 | 13,360,509 |
| 43 | Interest Accrued (237) |  |  | 19,189,158 | 18,278,543 |
| 44 | Dividends Declared (238) |  |  | 0 | 0 |
| 45 | Matured Long-Term Debt (239) |  |  | 0 | 0 |
|  |  |  |  |  |  |
| FER | C FORM NO. 1 (rev. 12-03) | Page 112 |  |  |  |



| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |


| Schedule Page: 112 Line No.: 48 Column: c |  |  |  |
| :---: | :---: | :---: | :---: |
|  |  | : C | Column: d |
| Employee Benefits | \$12, | 261 | \$12,613,416 |
| Compensated Absences |  | , 557 | 6,785, 080 |
| Counterparty Collateral |  | , 695 | 4,965, 238 |
| Accrued Payroll |  | , 883 | 2,294,096 |
| Legal Reserve |  | , 319 | 1,823,000 |
| Workmen's Comp |  | , 281 | 1,409,564 |
| Other |  | , 000 | 610,000 |
| Total Misc Current and Accrued Liabilities | \$27, | ,996 | \$30, 500, 394 |
| Schedule Page: 112 Line No.: 63 Column: c |  |  |  |
|  | Column: c |  | umn: d |
| Accelerated Depreciation | \$674,111,257 | \$666 | 206,988 |
| Total Accum. Deferred Income Taxes - Property | \$674,111,257 | \$666 | 66,988 |
| Schedule Page: 112 Line No.: 64 Column: c |  |  |  |
|  | Column: C |  | mn: d |
| Pension Regulatory Assets | \$83,365,312 |  | 5,822 |
| Amort of Loss on Reacquisition | 5,345,670 |  | 4,460 |
| Regulatory Assets | 8,205,264 |  | 9,934 |
| Operating Lease Right of Use (ROU) | 9,028,992 |  | 0 |
| Compensated Absences | 1,478, 061 |  | 2,410 |
| Partnership Investments | 903,116 |  | 7,680 |
| Total Accum. Deferred Income Taxes | \$108,326,415 | \$99 | 8,306 |



| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

9. Use page 122 for important notes regarding the statement of income for any account thereof.
10. Give concise explanations concerning unsettled rate proceedings where a contingency exists such that refunds of a material amount may need to be made to the utility's customers or which may result in material refund to the utility with respect to power or gas purchases. State for each year effected the gross revenues or costs to which the contingency relates and the tax effects together with an explanation of the major factors which affect the rights of the utility to retain such revenues or recover amounts paid with respect to power or gas purchases.
11 Give concise explanations concerning significant amounts of any refunds made or received during the year resulting from settlement of any rate proceeding affecting revenues received or costs incurred for power or gas purches, and a summary of the adjustments made to balance sheet, income, and expense accounts.
11. If any notes appearing in the report to stokholders are applicable to the Statement of Income, such notes may be included at page 122.
12. Enter on page 122 a concise explanation of only those changes in accounting methods made during the year which had an effect on net income, including the basis of allocations and apportionments from those used in the preceding year. Also, give the appropriate dollar effect of such changes. 14. Explain in a footnote if the previous year's/quarter's figures are different from that reported in prior reports
13. If the columns are insufficient for reporting additional utility departments, supply the appropriate account titles report the information in a footnote to this schedule.

| ELECTRIC UTILITY |  | GAS UTILITY |  | OTHER UTILITY |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Current Year to Date (in dollars) <br> (g) | Previous Year to Date (in dollars) <br> (h) | Current Year to Date (in dollars) <br> (i) | Previous Year to Date (in dollars) <br> (j) | Current Year to Date (in dollars) <br> (k) | Previous Year to Date (in dollars) <br> (I) |  |
|  |  |  |  |  |  | 1 |
| 963,057,922 | 937,475,157 |  |  |  |  | 2 |
|  |  |  |  |  |  | 3 |
| 406,052,413 | 435,226,684 |  |  |  |  | 4 |
| 46,385,677 | 45,319,594 |  |  |  |  | 5 |
| 121,994,027 | 117,299,861 |  |  |  |  | 6 |
|  |  |  |  |  |  | 7 |
| 45,391,269 | 41,551,472 |  |  |  |  | 8 |
|  |  |  |  |  |  | 9 |
|  |  |  |  |  |  | 10 |
|  |  |  |  |  |  | 11 |
|  |  |  |  |  |  | 12 |
|  |  |  |  |  |  | 13 |
| 57,518,352 | 56,077,283 |  |  |  |  | 14 |
| 27,996,974 | 15,068,695 |  |  |  |  | 15 |
| 10,030,152 | 9,360,734 |  |  |  |  | 16 |
| 82,465,390 | 83,577,209 |  |  |  |  | 17 |
| 73,112,411 | 72,377,668 |  |  |  |  | 18 |
|  |  |  |  |  |  | 19 |
|  |  |  |  |  |  | 20 |
|  |  |  |  |  |  | 21 |
|  |  |  |  |  |  | 22 |
|  |  |  |  |  |  | 23 |
|  |  |  |  |  |  | 24 |
| 724,721,843 | 731,103,864 |  |  |  |  | 25 |
| 238,336,079 | 206,371,293 |  |  |  |  | 26 |
|  |  |  |  |  |  |  |


| Name of Respondent Duquesne Light Company |  | This Report Is: <br> (1) $\triangle A n$ Original <br> (2) A Resubmission |  | Date of Report (Mo, Da, Yr) <br> 04/29/2020 |  | Year/Period of Report  <br> End of 2019/Q4 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STATEMENT OF INCOME FOR THE YEAR (continued) |  |  |  |  |  |  |  |
| Line No. | Title of Account <br> (a) |  | (Ref.) Page No. (b) | TOTAL |  | Current 3 Months <br> Ended <br> Quarterly Only <br> No 4th Quarter <br> (e) | Prior 3 Months <br> Ended <br> Quarterly Only <br> No 4th Quarter (f) |
|  |  |  | Current Year <br> (c) | Previous Year <br> (d) |  |  |
| 27 | Net Utility Operating Income (Carried forward from page 114) |  |  |  | 238,336,079 | 206,371,293 |  |  |
| 28 | Other Income and Deductions |  |  |  |  |  |  |
| 29 | Other Income |  |  |  |  |  |  |
| 30 | Nonutilty Operating Income |  |  |  |  |  |  |
| 31 | Revenues From Merchandising, Jobbing and Contract Work (415) |  |  | 1,107 |  |  |  |
| 32 | (Less) Costs and Exp. of Merchandising, Job. \& Contract Work (416) |  |  |  |  |  |  |
| 33 | Revenues From Nonutility Operations (417) |  |  | 708,452 | 701,380 |  |  |
| 34 | (Less) Expenses of Nonutility Operations (417.1) |  |  |  |  |  |  |
| 35 | Nonoperating Rental Income (418) |  |  |  |  |  |  |
| 36 | Equity in Earnings of Subsidiary Companies (418.1) |  | 119 |  |  |  |  |
| 37 | Interest and Dividend Income (419) |  |  | 305,266 | 623,317 |  |  |
| 38 | Allowance for Other Funds Used During Construction (419.1) |  |  | 3,613,287 | 4,948,099 |  |  |
| 39 | Miscellaneous Nonoperating Income (421) |  |  | 610,046 | 822,988 |  |  |
| 40 | Gain on Disposition of Property (421.1) |  |  | 24,954 | 189,718 |  |  |
| 41 | TOTAL Other Income (Enter Total of lines 31 thru 40) |  |  | 5,263,112 | 7,285,502 |  |  |
| 42 | Other Income Deductions |  |  |  |  |  |  |
| 43 | Loss on Disposition of Property (421.2) |  |  | 22,884 | 232,154 |  |  |
| 44 | Miscellaneous Amortization (425) |  |  |  |  |  |  |
| 45 | Donations (426.1) |  |  | 1,788,930 | 1,972,387 |  |  |
| 46 | Life Insurance (426.2) |  |  |  |  |  |  |
| 47 | Penalties (426.3) |  |  | -334,000 |  |  |  |
| 48 | Exp. for Certain Civic, Political \& Related Activities (426.4) |  |  | 187,945 | 209,902 |  |  |
| 49 | Other Deductions (426.5) |  |  | 2,294,930 | 2,469,731 |  |  |
| 50 | TOTAL Other Income Deductions (Total of lines 43 thru 49) |  |  | 3,960,689 | 4,884,174 |  |  |
| 51 | Taxes Applic. to Other Income and Deductions |  |  |  |  |  |  |
| 52 | Taxes Other Than Income Taxes (408.2) |  | 262-263 |  |  |  |  |
| 53 | Income Taxes-Federal (409.2) |  | 262-263 | -202,727 | 494,949 |  |  |
| 54 | Income Taxes-Other (409.2) |  | 262-263 | -421,000 | 550,256 |  |  |
| 55 | Provision for Deferred Inc. Taxes (410.2) |  | 234, 272-277 | 1,417,655 | 226,188 |  |  |
| 56 | (Less) Provision for Deferred Income Taxes-Cr. (411.2) |  | 234, 272-277 | 213,865 | 377,769 |  |  |
| 57 | Investment Tax Credit Adj.-Net (411.5) |  |  |  |  |  |  |
| 58 | (Less) Investment Tax Credits (420) |  |  |  |  |  |  |
| 59 | TOTAL Taxes on Other Income and Deductions (Total of lines 52-58) |  |  | 580,063 | 893,624 |  |  |
| 60 | Net Other Income and Deductions (Total of lines 41, 50, 59) |  |  | 722,360 | 1,507,704 |  |  |
| 61 | Interest Charges |  |  |  |  |  |  |
| 62 | Interest on Long-Term Debt (427) |  |  | 51,763,015 | 53,189,927 |  |  |
| 63 | Amort. of Debt Disc. and Expense (428) |  |  | 383,535 | 345,649 |  |  |
| 64 | Amortization of Loss on Reaquired Debt (428.1) |  |  | 2,037,591 | 2,144,133 |  |  |
| 65 | (Less) Amort. of Premium on Debt-Credit (429) |  |  |  |  |  |  |
| 66 | (Less) Amortization of Gain on Reaquired Debt-Credit (429.1) |  |  |  |  |  |  |
| 67 | Interest on Debt to Assoc. Companies (430) |  |  | 2,030,148 | 11,628 |  |  |
| 68 | Other Interest Expense (431) |  |  | 2,325,715 | 2,405,285 |  |  |
| 69 | (Less) Allowance for Borrowed Funds Used During Construction-Cr. (432) |  |  | 3,926,088 | 2,336,604 |  |  |
| 70 | Net Interest Charges (Total of lines 62 thru 69) |  |  | 54,613,916 | 55,760,018 |  |  |
| 71 | Income Before Extraordinary Items (Total of lines 27, 60 and 70) |  |  | 184,444,523 | 152,118,979 |  |  |
| 72 | Extraordinary Items |  |  |  |  |  |  |
| 73 | Extraordinary Income (434) |  |  |  |  |  |  |
| 74 | (Less) Extraordinary Deductions (435) |  |  |  |  |  |  |
| 75 | Net Extraordinary Items (Total of line 73 less line 74) |  |  |  |  |  |  |
| 76 | Income Taxes-Federal and Other (409.3) |  | 262-263 |  |  |  |  |
| 77 | Extraordinary Items After Taxes (line 75 less line 76) |  |  |  |  |  |  |
| 78 | Net Income (Total of line 71 and 77) |  |  | 184,444,523 | 152,118,979 |  |  |
|  |  |  |  |  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- | | Year/Period of Report |
| :---: |
| End of |
| 2019/Q4 |

1. Do not report Lines 49-53 on the quarterly version.
2. Report all changes in appropriated retained earnings, unappropriated retained earnings, year to date, and unappropriated undistributed subsidiary earnings for the year.
3. Each credit and debit during the year should be identified as to the retained earnings account in which recorded (Accounts $433,436-$

439 inclusive). Show the contra primary account affected in column (b)
4. State the purpose and amount of each reservation or appropriation of retained earnings.
5. List first account 439, Adjustments to Retained Earnings, reflecting adjustments to the opening balance of retained earnings. Follow by credit, then debit items in that order.
6. Show dividends for each class and series of capital stock.
7. Show separately the State and Federal income tax effect of items shown in account 439, Adjustments to Retained Earnings.
8. Explain in a footnote the basis for determining the amount reserved or appropriated. If such reservation or appropriation is to be recurrent, state the number and annual amounts to be reserved or appropriated as well as the totals eventually to be accumulated.
9. If any notes appearing in the report to stockholders are applicable to this statement, include them on pages 122-123.

| Line No. | Item <br> (a) | Contra Primary Account Affected <br> (b) | Current Quarter/Year Year to Date Balance (c) | Previous Quarter/Year Year to Date Balance <br> (d) |
| :---: | :---: | :---: | :---: | :---: |
|  | UNAPPROPRIATED RETAINED EARNINGS (Account 216) |  |  |  |
| 1 | Balance-Beginning of Period |  | 300,567,301 | 226,448,322 |
| 2 | Changes |  |  |  |
| 3 | Adjustments to Retained Earnings (Account 439) |  |  |  |
| 4 |  |  |  |  |
| 5 |  |  |  |  |
| 6 |  |  |  |  |
| 7 |  |  |  |  |
| 8 |  |  |  |  |
| 9 | TOTAL Credits to Retained Earnings (Acct. 439) |  |  |  |
| 10 |  |  |  |  |
| 11 |  |  |  |  |
| 12 |  |  |  |  |
| 13 |  |  |  |  |
| 14 |  |  |  |  |
| 15 | TOTAL Debits to Retained Earnings (Acct. 439) |  |  |  |
| 16 | Balance Transferred from Income (Account 433 less Account 418.1) | 216 | 184,444,523 | 152,118,979 |
| 17 | Appropriations of Retained Earnings (Acct. 436) |  |  |  |
| 18 |  |  |  |  |
| 19 |  |  |  |  |
| 20 |  |  |  |  |
| 21 |  |  |  |  |
| 22 | TOTAL Appropriations of Retained Earnings (Acct. 436) |  |  |  |
| 23 | Dividends Declared-Preferred Stock (Account 437) |  |  |  |
| 24 |  | 238 |  |  |
| 25 |  |  |  |  |
| 26 |  |  |  |  |
| 27 |  |  |  |  |
| 28 |  |  |  |  |
| 29 | TOTAL Dividends Declared-Preferred Stock (Acct. 437) |  |  |  |
| 30 | Dividends Declared-Common Stock (Account 438) |  |  |  |
| 31 |  | 238 | -50,000,000 | ( 78,000,000) |
| 32 |  |  |  |  |
| 33 |  |  |  |  |
| 34 |  |  |  |  |
| 35 |  |  |  |  |
| 36 | TOTAL Dividends Declared-Common Stock (Acct. 438) |  | -50,000,000 | ( 78,000,000) |
| 37 | Transfers from Acct 216.1, Unapprop. Undistrib. Subsidiary Earnings |  |  |  |
| 38 | Balance - End of Period (Total 1,9,15,16,22,29,36,37) |  | 435,011,824 | 300,567,301 |
|  | APPROPRIATED RETAINED EARNINGS (Account 215) |  |  |  |
| 39 |  |  |  |  |
| 40 |  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- | | Year/Period of Report |
| :---: |
| End of |
| 2019/Q4 |

1. Do not report Lines 49-53 on the quarterly version.
2. Report all changes in appropriated retained earnings, unappropriated retained earnings, year to date, and unappropriated undistributed subsidiary earnings for the year.
3. Each credit and debit during the year should be identified as to the retained earnings account in which recorded (Accounts 433,436 439 inclusive). Show the contra primary account affected in column (b)
4. State the purpose and amount of each reservation or appropriation of retained earnings.
5. List first account 439, Adjustments to Retained Earnings, reflecting adjustments to the opening balance of retained earnings. Follow by credit, then debit items in that order.
6. Show dividends for each class and series of capital stock.
7. Show separately the State and Federal income tax effect of items shown in account 439, Adjustments to Retained Earnings.
8. Explain in a footnote the basis for determining the amount reserved or appropriated. If such reservation or appropriation is to be recurrent, state the number and annual amounts to be reserved or appropriated as well as the totals eventually to be accumulated.
9. If any notes appearing in the report to stockholders are applicable to this statement, include them on pages 122-123.



| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original (2) $\triangle$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |


| (1) Co invest <br> (2) Inf Cash (3) Op report (4) $\operatorname{Inv}$ to the the do | des to be used:(a) Net Proceeds or Payments;(b)Bonds, debentures and other lo ments, fixed assets, intangibles, etc. <br> formation about noncash investing and financing activities must be provided in the Equivalents at End of Period" with related amounts on the Balance Sheet. perating Activities - Other: Include gains and losses pertaining to operating activiti ed in those activities. Show in the Notes to the Financials the amounts of interest esting Activities: Include at Other (line 31) net cash outflow to acquire other comp Financial Statements. Do not include on this statement the dollar amount of leas ollar amount of leases capitalized with the plant cost. | commercial paper; and (d) Id <br> statements. Also provide a rec <br> sertaining to investing and fin italized) and income taxes paid ciliation of assets acquired with SofA General Instruction 20; in | y separately such items as iation between "Cash and cing activities should be bilities assumed in the Notes ad provide a reconciliation of |
| :---: | :---: | :---: | :---: |
| Line No. | Description (See Instruction No. 1 for Explanation of Codes) <br> (a) | Current Year to Date Quarter/Year (b) | Previous Year to Date Quarter/Year (c) |
| 1 | Net Cash Flow from Operating Activities: |  |  |
| 2 | Net Income (Line 78(c) on page 117) | 184,444,523 | 152,118,979 |
| 3 | Noncash Charges (Credits) to Income: |  |  |
| 4 | Depreciation and Depletion | 167,385,296 | 158,851,333 |
| 5 | Amortization of |  |  |
| 6 | Capital Leases and Other | 2,422,043 | 3,266,280 |
| 7 | Other Non Cash Charges | -2,015,307 | 35,985,097 |
| 8 | Deferred Income Taxes (Net) | 10,547,769 | 11,047,960 |
| 9 | Investment Tax Credit Adjustment (Net) |  |  |
| 10 | Net (Increase) Decrease in Receivables | 3,105,931 | -4,012,105 |
| 11 | Net (Increase) Decrease in Inventory | -4,023,420 | -4,528,247 |
| 12 | Net (Increase) Decrease in Allowances Inventory |  |  |
| 13 | Net Increase (Decrease) in Payables and Accrued Expenses | -2,471,811 | 14,264,982 |
| 14 | Net (Increase) Decrease in Other Regulatory Assets | 44,079,815 | 12,977,952 |
| 15 | Net Increase (Decrease) in Other Regulatory Liabilities | -49,098,441 | 3,471,835 |
| 16 | (Less) Allowance for Other Funds Used During Construction | 3,613,287 | 4,948,099 |
| 17 | (Less) Undistributed Earnings from Subsidiary Companies |  |  |
| 18 | Other (provide details in footnote): |  |  |
| 19 | Other: Net Change in Other Current Assets | -3,400,882 | -5,894,453 |
| 20 | Other: Pension Contribution | -10,000,000 | -23,000,000 |
| 21 | Other: Net | -4,718,977 | -5,430,784 |
| 22 | Net Cash Provided by (Used in) Operating Activities (Total 2 thru 21) | 332,643,252 | 344,170,730 |
| 23 |  |  |  |
| 24 | Cash Flows from Investment Activities: |  |  |
| 25 | Construction and Acquisition of Plant (including land): |  |  |
| 26 | Gross Additions to Utility Plant (less nuclear fuel) | -328,442,967 | -344,850,525 |
| 27 | Gross Additions to Nuclear Fuel |  |  |
| 28 | Gross Additions to Common Utility Plant |  |  |
| 29 | Gross Additions to Nonutility Plant | -1,283,792 |  |
| 30 | (Less) Allowance for Other Funds Used During Construction | -3,926,087 | -2,336,604 |
| 31 | Other (provide details in footnote): |  |  |
| 32 | Other: Net | -3,933,881 | -2,385,538 |
| 33 |  |  |  |
| 34 | Cash Outflows for Plant (Total of lines 26 thru 33) | -329,734,553 | -344,899,459 |
| 35 |  |  |  |
| 36 | Acquisition of Other Noncurrent Assets (d) |  |  |
| 37 | Proceeds from Disposal of Noncurrent Assets (d) |  |  |
| 38 |  |  |  |
| 39 | Investments in and Advances to Assoc. and Subsidiary Companies |  |  |
| 40 | Contributions and Advances from Assoc. and Subsidiary Companies |  |  |
| 41 | Disposition of Investments in (and Advances to) |  |  |
| 42 | Associated and Subsidiary Companies |  |  |
| 43 |  |  |  |
| 44 | Purchase of Investment Securities (a) |  |  |
| 45 | Proceeds from Sales of Investment Securities (a) |  |  |
|  |  |  |  |



| (1) Co invest <br> (2) Inf Cash (3) Op report (4) $\operatorname{Inv}$ to the the do | des to be used:(a) Net Proceeds or Payments;(b)Bonds, debentures and other lo ments, fixed assets, intangibles, etc. <br> formation about noncash investing and financing activities must be provided in the Equivalents at End of Period" with related amounts on the Balance Sheet. perating Activities - Other: Include gains and losses pertaining to operating activiti ed in those activities. Show in the Notes to the Financials the amounts of interest esting Activities: Include at Other (line 31) net cash outflow to acquire other comp Financial Statements. Do not include on this statement the dollar amount of leas ollar amount of leases capitalized with the plant cost. | commercial paper; and (d) Id <br> statements. Also provide a rec <br> sertaining to investing and fin italized) and income taxes paid ciliation of assets acquired with SofA General Instruction 20; in | y separately such items as iation between "Cash and cing activities should be bilities assumed in the Notes ad provide a reconciliation of |
| :---: | :---: | :---: | :---: |
| Line No. | Description (See Instruction No. 1 for Explanation of Codes) <br> (a) | Current Year to Date Quarter/Year (b) | Previous Year to Date Quarter/Year (c) |
| 46 | Loans Made or Purchased |  |  |
| 47 | Collections on Loans |  |  |
| 48 |  |  |  |
| 49 | Net (Increase) Decrease in Receivables |  |  |
| 50 | Net (Increase ) Decrease in Inventory |  |  |
| 51 | Net (Increase) Decrease in Allowances Held for Speculation |  |  |
| 52 | Net Increase (Decrease) in Payables and Accrued Expenses |  |  |
| 53 | Other (provide details in footnote): |  |  |
| 54 |  |  |  |
| 55 |  |  |  |
| 56 | Net Cash Provided by (Used in) Investing Activities |  |  |
| 57 | Total of lines 34 thru 55) | -329,734,553 | -344,899,459 |
| 58 |  |  |  |
| 59 | Cash Flows from Financing Activities: |  |  |
| 60 | Proceeds from Issuance of: |  |  |
| 61 | Long-Term Debt (b) |  | 184,041,061 |
| 62 | Preferred Stock |  |  |
| 63 | Common Stock |  |  |
| 64 | Other (provide details in footnote): |  |  |
| 65 |  |  |  |
| 66 | Net Increase in Short-Term Debt (c) | 110,000,000 | 65,000,000 |
| 67 | Other (provide details in footnote): |  |  |
| 68 | Other: Affiliated borrowings from aprent | 140,750,000 |  |
| 69 |  |  |  |
| 70 | Cash Provided by Outside Sources (Total 61 thru 69) | 250,750,000 | 249,041,061 |
| 71 | Debt Issuance Costs | -791,122 |  |
| 72 | Payments for Retirement of: |  |  |
| 73 | Long-term Debt (b) |  | -109,905,000 |
| 74 | Preferred Stock |  |  |
| 75 | Common Stock |  |  |
| 76 | Other (provide details in footnote): |  |  |
| 77 | Other: Affiliated borrowing repayments to partent | -55,750,000 |  |
| 78 | Net Decrease in Short-Term Debt (c) | -155,000,000 | -70,000,000 |
| 79 | Distributions to Parent | -50,000,000 | -78,000,000 |
| 80 | Dividends on Preferred Stock |  |  |
| 81 | Dividends on Common Stock |  |  |
| 82 | Net Cash Provided by (Used in) Financing Activities |  |  |
| 83 | (Total of lines 70 thru 81) | -10,791,122 | -8,863,939 |
| 84 |  |  |  |
| 85 | Net Increase (Decrease) in Cash and Cash Equivalents |  |  |
| 86 | (Total of lines 22,57 and 83) | -7,882,423 | -9,592,668 |
| 87 |  |  |  |
| 88 | Cash and Cash Equivalents at Beginning of Period | 14,573,823 | 24,166,491 |
| 89 |  |  |  |
| 90 | Cash and Cash Equivalents at End of period | 6,691,400 | 14,573,823 |
|  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report <br> Duquesne Light Company <br> (1) X An Original <br> $(2)$ <br> $\square$ |
| :--- | :--- | :--- | :--- |

1. Use the space below for important notes regarding the Balance Sheet, Statement of Income for the year, Statement of Retained Earnings for the year, and Statement of Cash Flows, or any account thereof. Classify the notes according to each basic statement, providing a subheading for each statement except where a note is applicable to more than one statement.
2. Furnish particulars (details) as to any significant contingent assets or liabilities existing at end of year, including a brief explanation of any action initiated by the Internal Revenue Service involving possible assessment of additional income taxes of material amount, or of a claim for refund of income taxes of a material amount initiated by the utility. Give also a brief explanation of any dividends in arrears on cumulative preferred stock.
3. For Account 116, Utility Plant Adjustments, explain the origin of such amount, debits and credits during the year, and plan of disposition contemplated, giving references to Cormmission orders or other authorizations respecting classification of amounts as plant adjustments and requirements as to disposition thereof.
4. Where Accounts 189, Unamortized Loss on Reacquired Debt, and 257, Unamortized Gain on Reacquired Debt, are not used, give an explanation, providing the rate treatment given these items. See General Instruction 17 of the Uniform System of Accounts.
5. Give a concise explanation of any retained earnings restrictions and state the amount of retained earnings affected by such restrictions.
6. If the notes to financial statements relating to the respondent company appearing in the annual report to the stockholders are applicable and furnish the data required by instructions above and on pages 114-121, such notes may be included herein.
7. For the 3Q disclosures, respondent must provide in the notes sufficient disclosures so as to make the interim information not misleading. Disclosures which would substantially duplicate the disclosures contained in the most recent FERC Annual Report may be omitted.
8. For the $3 Q$ disclosures, the disclosures shall be provided where events subsequent to the end of the most recent year have occurred which have a material effect on the respondent. Respondent must include in the notes significant changes since the most recently completed year in such items as: accounting principles and practices; estimates inherent in the preparation of the financial statements; status of long-term contracts; capitalization including significant new borrowings or modifications of existing financing agreements; and changes resulting from business combinations or dispositions. However were material contingencies exist, the disclosure of such matters shall be provided even though a significant change since year end may not have occurred.
9. Finally, if the notes to the financial statements relating to the respondent appearing in the annual report to the stockholders are applicable and furnish the data required by the above instructions, such notes may be included herein.

## PAGE 122 INTENTIONALLY LEFT BLANK <br> SEE PAGE 123 FOR REQUIRED INFORMATION.

| Name of Respondent | This Report is: <br> (1) X An Original <br> (2)_A Resubmission | Date of Report <br> $(\mathrm{Mo}, \mathrm{Da}, \mathrm{Yr)}$ <br> 04/29/2020 | Year/Period of Report |
| :--- | :--- | :---: | :---: |
| Duquesne Light Company |  | $2019 / \mathrm{Q4}$ |  |

## NOTES TO FINANCIAL STATEMENTS

## 1. General Information

DQE Holdings LLC (the LLC), a Delaware limited liability company, was formed in July 2006 to acquire Duquesne Light Holdings, Inc. (Holdings) and had no principal operations prior to the acquisition of Holdings on May 31, 2007.

The LLC is a holding company. The LLC is owned by a consortium of private equity investors (the Members) including Epsom Investment Pte. Ltd (Epsom) at 44.4\%, Three Rivers Utility Holdings, LLC at 30.4\% and AIA Montana LLC (AIA) at 25.2\%.

Duquesne Light Company (the Company), a direct subsidiary of Holdings and an indirect subsidiary of the LLC, was formed in 1912 by the consolidation and merger of three constituent companies. The Company operates as a limited liability company. The Company is an electric utility engaged in the supply (through its provider-of-last-resort service (POLR)), transmission and distribution of electric energy.

## 2. Accounting Policies

Basis of Accounting - The financial statements included herein are prepared in accordance with the accounting requirements of the FERC as set forth in its applicable USofA and published accounting releases, which is a comprehensive basis of accounting other than generally accepted accounting principles in the United States (GAAP). The primary differences between FERC accounting requirements and GAAP are (1) deferred tax assets (Account 190) are shown on the asset side of the comparative balance sheet for FERC purposes but are netted against deferred tax liabilities under GAAP; (2) the tax effect of the items included in the Statement of Accumulated Comprehensive Income and Comprehensive Income is not required to be disclosed separately for FERC, but is required under GAAP; (3) GAAP requires the presentation of certain information about operating segments which is not included for FERC reporting purposes; (4) in accordance with Accounting Standards Codification (ASC) No. 740 - Income Taxes, the Company recognized uncertain tax positions that were recorded as current and non-current tax reserve liabilities under GAAP. FERC requires such uncertain tax positions to be recorded within taxes accrued if they represent permanent differences and deferred tax liabilities if they represent temporary differences; (5) for FERC purposes debt issuance costs are shown as assets on the comparative balance sheet within unamortized debt expense (Account 181) and unamortized loss on reacquired debt (Account 189), but debt issuance costs are netted against the long-term debt liability for GAAP purposes; (6) GAAP requires that the gains and losses recorded to the income statements related to unrealized non-hedging activities be recorded along with the underlying transaction. For GAAP reporting purposes, non-hedging activities are recorded as operating expenses. For FERC reporting purposes, non-hedging transactions are recorded as below-the-line amounts in accordance with FERC Order No. 627; (7) GAAP requires under Accounting Standards Update (ASU) 2017-07 that net periodic pension and postretirement benefit cost components associated with service costs be reported in the same financial statement line as employee compensation costs and all other net periodic benefit costs be presented separately outside of income from operations. For FERC reporting purposes, the Company has continued to report all net periodic pension and postretirement benefit cost components together in their respective jurisdictional account without separation of their various cost components; (8) GAAP also requires under ASU 2017-07 that net periodic pension and postretirement benefit cost components associated with service costs are the only allowable costs for capitalization. Other non-service cost components of net periodic benefit costs must be presented as an expense. For FERC reporting purposes, the Company has continued to capitalize allowable charges associated with net periodic benefit costs regardless of their cost component; (9) GAAP requires cash and cash equivalents to be presented net of outstanding checks, however for FERC reporting purposes outstanding checks are presented in accounts payable; (10) GAAP now requires under ASU 2016-02 that lessees recognize a lease liability and a right-of-use asset for all leases, including operating leases, with a term greater than twelve months on the balance sheet. For FERC reporting purposes, the Company has elected not to show operating lease right-of-use assets and operating lease liabilities on the balance sheet, creating a FERC to GAAP difference, in order to ensure that there is no impact on existing ratemaking processes; (11) GAAP requires restricted cash to be presented separately from cash and cash equivalents, however for FERC reporting purposes restricted cash should be combined with cash and cash equivalents; (12) GAAP now allows under ASU 2018-02 for a reclassification from accumulated other comprehensive income ( AOCl ) to retained earnings for stranded tax effects resulting from the Tax Cuts and Jobs Act (TCJA). For FERC reporting purposes, the FERC issued an order that provided approval for this reclassification if both AOCl and retained earnings are included in the Company's capital structure for ratemaking purposes. Since the Company has not included AOCl in the capital part of the FERC

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| :---: | :---: | :---: | :---: |

formula, the Company will not report the stranded tax effects in AOCI and retained earnings for FERC purposes, creating a FERC to GAAP difference.

The Company's electricity delivery business segment is subject to regulation by the PUC and the FERC with respect to rates for delivery of electric power, accounting, issuance of securities and other matters. The electricity supply business segment is regulated by the FERC for wholesale power sales.

The electricity delivery business segment operations are subject to utility-specific accounting provisions and accordingly reflect regulatory assets and liabilities consistent with cost-based ratemaking regulations. Regulatory assets established by the Company represent probable future revenue, because provisions for these costs are currently included, or are expected to be included, in charges to electric utility customers through the ratemaking process. Regulatory liabilities established by the Company represent probable future reductions in revenues associated with amounts that are to be credited to customers through the ratemaking process. The preparation of financial statements in conformity with USofA requires management to make estimates and assumptions with respect to values and conditions that affect the reported amounts of assets and liabilities, and disclosure of contingent assets and liabilities, at the date of the financial statements. The reported amounts of revenues and expenses during the reporting period also may be affected by the estimates and assumptions management is required to make. Management evaluates these estimates on an ongoing basis, using historical experience and other methods considered reasonable in the particular circumstances. Nevertheless, actual results may differ significantly from these estimates.

Customer Concentrations - The Company's electric utility operations provide service to approximately 600,000 direct customers in southwestern Pennsylvania (including in the City of Pittsburgh), a territory of approximately 800 square miles.

Revenues from Utility Sales - The Company's meters are read at least monthly and electric utility customers are billed on a monthly basis. Revenues reflect estimated customer usage in an accounting period, regardless of when billed (see Note 4).

Retail sales of electricity include related excise and other taxes, primarily gross receipts taxes that are collected from ratepayers and remitted to the appropriate taxing agency. These taxes are recorded as an expense in taxes other than income taxes and as an offset to a prepaid tax account that is created at the beginning of every year. The excise and other taxes recorded in the Company's revenue were approximately $\$ 50.2$ million and $\$ 48.6$ million for the years ended December 31, 2019 and 2018, respectively.

The Company is annually permitted to recalculate its transmission revenue requirement pursuant to the formula rate accepted by the FERC. The annual update contains a true-up mechanism that allows the Company to recover expenses and earn a return on and recover investments in transmission on a current rather than a lagging basis. Accordingly, revenue is recognized for services provided during each reporting period based on actual net revenue requirements calculated using the annual update formula. The Company accrues or defers revenues to the extent that the actual net revenue requirement for the reporting period is higher or lower, respectively, than the net revenue requirement estimate (and thus billed to customers) for the reporting period. The true-up amount is amortized over the period it is included in rates to customers.

Other Operating Revenues - Other operating revenues include (i) rental fees from third parties who have cable or other equipment attached to the Company's utility poles and transmission towers, or who have cable included in the Company's underground ducts, (ii) transmission fees charged to others that use the Company's transmission system, (iii) late payment and other customer fees and (iv) short-term sales of power to other utilities made at market rates.

Investment and Other Income (Loss) - Investment and other income (loss) includes (i) allowance for funds used during construction (AFUDC), which represents the estimated cost of equity funds to finance construction, (ii) contributions in aid of construction, (iii) interest income, (iv) income or losses from long-term investments, (v) portion of pension expenses and (vi) various other gains or losses.

Cash Equivalents - Cash equivalents are short-term, highly liquid investments with original maturities of three or fewer months. They are stated at cost, which approximates market.

Restricted Cash - Deposits and other cash equivalents that are restricted by agreement or that have been clearly designated for a specific purpose are classified as restricted cash. On the balance sheets, restricted cash is classified as

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| :---: | :---: | :---: | :---: |
| NOTES TO FINANCIAL STATEMENTS (Continued) |  |  |  |

current or non-current based on the time period in which the Company expects to utilize the cash for its intended purpose.
Receivables - Receivables on the balance sheets are comprised of outstanding billings for electric customers, other utilities and amounts related to unbilled revenues. In addition, the Company has certain transactions with affiliates that give rise to receivables (see Note 11).

Purchase of Receivables - The Company purchases without recourse, at a discount, the accounts receivable for residential, small commercial and small industrial customers who have chosen (i) an alternative electric generation supplier (EGS) and (ii) to receive a consolidated bill from the Company. The discount rate reflects the costs related to the estimated incremental EGS uncollectible expenses and recovers operating and administrative costs associated with the program. The Company records a receivable for amounts due from the EGS customers and a liability for amounts owed to the EGSs. The Company reimburses the EGSs for their customer billings regardless of whether the Company receives payment from the customer.

Property, Plant and Equipment - Property, plant and equipment consists of (i) distribution poles and equipment, (ii) lower voltage distribution wires used in delivering electricity to customers, (iii) substations and transformers, (iv) high voltage transmission wires used in delivering electricity to substations, (v) meters and automated meter reading assets and (vi) internal telecommunication equipment, vehicles, software and office equipment primarily used in the electricity delivery business segment.

The asset values of the Company's utility properties are stated at original construction cost, which includes labor costs, related payroll taxes, pensions and other fringe benefits, as well as allocated overhead costs. Also included in original construction cost is an AFUDC.

Additions to, and replacements of, property units are charged to plant accounts. Maintenance, repairs and replacement of minor items of property are recorded as expenses when they are incurred. The costs of electricity delivery business segment properties that are retired (plus removal costs and less any salvage value) are charged to accumulated depreciation and amortization.

Substantially all of the electric utility properties are subject to the lien of the Company's first mortgage indenture.
Depreciation expense of $\$ 167.7$ million and $\$ 159.1$ million was recorded in the years ended December 31, 2019 and 2018, respectively. Depreciation of property, plant and equipment is recorded on a straight-line basis over the estimated remaining useful lives of properties, which is approximately 24 years for both the transmission and distribution portions of electric plant in service.

Impairment of Assets - The Company evaluates long-lived assets for recoverability whenever events or changes in circumstances indicate that the carrying amount may not be recoverable. Indicators of impairment may include a deteriorating business climate, including, but not limited to, market conditions, condition of the asset, specific regulatory disallowance, or plans to dispose of a long-lived asset significantly before the end of its useful life.

The Company determines whether or not long-lived assets and asset groups are impaired by comparing their undiscounted expected future cash flows to their carrying value. When the undiscounted cash flow analysis indicates a long-lived asset or asset group is not recoverable, the amount of the impairment loss is determined by measuring the excess of the carrying amount of the long-lived asset or asset group over its fair value less costs to sell.

Intangible assets are reviewed for impairment whenever events or circumstances indicate the carrying value of such assets may not be recoverable.

Income Taxes - The Company uses the liability method in computing deferred taxes on all differences between book and tax basis of assets and liabilities. These book/tax differences occur when events and transactions recognized for financial reporting purposes are not recognized in the same period for tax purposes. The deferred tax liability or asset is also adjusted in the period of enactment for the effect of changes in tax laws or rates. Valuation allowances are provided against deferred tax assets for amounts which are not considered more likely than not to be realized.

The Company files a consolidated United States (U.S.) federal income tax return with the LLC and its subsidiaries, all of whom participate in an intercompany tax sharing arrangement which generally provides that taxable income for each subsidiary be calculated as if it filed a separate return. The Company's federal tax receivable/payable is reflected in affiliate receivables/payable to affiliates on the balance sheets.

The Company recognizes a regulatory asset or liability for deferred tax liabilities or assets that are expected to be recovered or refunded through rates. The difference in the provision for deferred income taxes related to depreciation of

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| Duquesne Light Company | $2019 /$ Q4 |  |  |
|  |  |  |  |

electric plant in service and the amount that otherwise would be recorded under GAAP is deferred and included in regulatory assets or liabilities on the balance sheets.

The Company accounts for uncertainty in income taxes using a recognition threshold and measurement attribute for the financial statement recognition and measurement of tax positions taken or expected to be taken in a tax return. The recognition threshold is the first step which requires the Company to determine whether it is more likely than not that a tax position will be sustained upon examination, including resolution of any related appeals or litigation processes, based on the technical merits of the position in order to record any financial statement benefit. If the first step is satisfied, then the Company must measure the tax position to determine the amount of tax benefit to recognize in the financial statements. The tax position is measured at the largest amount of tax benefit that has a cumulative probability greater than $50 \%$ of being realized upon ultimate settlement.

Contingent Losses/Gains - The Company establishes reserves for estimated loss contingencies when it is management's assessment that a loss is probable and an amount or range of amounts can be reasonably estimated. Reserves for contingent liabilities are based upon management's assumptions and estimates and the advice of legal counsel, consultants or others regarding the probable outcomes of the matter. Should additional information become known, or circumstances change with respect to the likelihood or amount of loss indicating that the ultimate outcome will differ from the estimates, revisions to the estimated reserves for contingent liabilities would be recognized in income in that period. Gain contingencies are not recognized in income until they have been realized.

Dividends - Holdings' practice is for its subsidiaries to dividend their earnings on a quarterly basis, based on the availability of cash and future cash needs. Cash dividends totaling $\$ 50.0$ million and $\$ 78.0$ million were declared and paid for the years ended December 31, 2019 and 2018, respectively.

Subsequent Events - The Company has evaluated the impact of events occurring after December 31, 2019 through March 5, 2020, the date on which the financial statements were available for issuance. Through March 5, 2020, there were no subsequent events identified that would materially affect the financial statements or notes to the financial statements. The Company has additionally evaluated subsequent events for disclosure purposes through April 29, 2020 and there were no subsequent events identified that would materially affect the financial statements or notes to the financial statements other than the COVID-19 disclosure discussed below.

COVID-19 Pandemic - COVID-19 is a rapidly evolving pandemic causing heightened social and economic uncertainty worldwide, as well as within the territory of the Company. As the extent and duration of the recent outbreak of COVID-19 remains unclear, the full effect on the business, its customers and suppliers, and the regulatory environment is unknown at this time. The continued spread of the pandemic has the potential to adversely impact the Company's business by reducing the ability to collect on receivables from customers, decreasing the demand for electricity, reducing the supply of electricity from generation facilities, interrupting the Company's supply chain, and disrupting the Company's workforce and contractors, as well as other factors. The extent to which COVID-19, and associated regulatory activities, impacts the Company's future financial condition, results of operations, cash flows, liquidity, debt covenants and fair value of pension plan assets will depend on future developments, which are highly uncertain and cannot be predicted with confidence at this time. In response to the uncertainty of COVID-19 and the capital market volatility, the Company borrowed the full amount available on its revolving credit facility, $\$ 250.0$ million, on March 24, 2020.

Federal and state government and regulatory agencies have begun instituting programs in an attempt to both curb the spread of COVID-19 and to also provide economic stimulus to mitigate the economic impacts of the virus. On March 13, 2020, the Pennsylvania Public Utility Commission issued an emergency order prohibiting the termination of service of electric utility customers. The termination moratorium will remain place for as long as the COVID-19 Proclamation of Disaster, issued by Pennsylvania Governor Tom Wolf on March 6, 2020, is in effect. Additionally, on March 27, 2020, the Coronavirus Aid, Relief, and Economic Security (CARES) Act was passed by Congress and signed into law by President Trump. The CARES Act contained a number of provisions including providing financial relief from the regulations surrounding loans and distributions from $401(\mathrm{k})$ retirement plans. The Company has complied with these regulations and will continue to react to these measures as they are released.

Recent Accounting Pronouncements - In December 2019, the Financial Accounting Standards Board (FASB) issued ASU No. 2019-12, "Income Taxes (Topic 740) - Simplifying the Accounting for Income Taxes," which adds improvements

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NOTES TO FINANCIAL STATEMENTS (Continued)
and removes exceptions to Topic 740 to simplify GAAP and existing guidance. The standard is effective for fiscal years beginning after December 15, 2020 with early adoption permitted. The standard must be applied on a prospective basis. The Company is currently in the process of evaluating the potential impact of this standard on the financial statements.

Recently Adopted Accounting Pronouncements - In February 2016, the FASB issued ASU No. 2016-02, "Leases," which requires lessees to recognize a lease liability and a right-of-use asset for all leases, including operating leases, with a term greater than twelve months on the balance sheet. The Company adopted this standard as of January 1, 2019 utilizing the modified retrospective transition method for GAAP reporting. For FERC reporting purposes, the Company has elected not to show operating lease right-of-use assets and operating lease liabilities on the balance sheet, creating a FERC to GAAP difference, in order to ensure that there is no impact on existing ratemaking processes.

## 3. Rate Matters

The Company is involved in rate and regulatory proceedings with the FERC and the PUC. This note is a discussion of rate matters that could have a material effect on the Company's financial statements.

## POLR Service

The Company's customers may choose to receive their electric energy from an alternative EGS; otherwise they will be served through the Company's POLR arrangements. Customers who select an alternative EGS pay for generation and transmission charges set by that supplier and pay the Company's distribution charges.

Effective June 1, 2017, customers who do not choose an alternative EGS are served through the Company's POLR VIII plan. POLR VIII provides for a descending clock auction process for the determination of electric generation supply rates. This auction process is designed to provide greater transparency to all participants and further ensures that POLR customers are receiving the lowest price possible at the time of the auction. POLR VIII plan provisions include conducting an annual auction process for hourly price service (HPS) customers, the introduction of a combination of 12 and 24 month laddered contracts to residential and small commercial and industrial customers to provide greater rate stability and the recovery of the incremental EGS uncollectible expenses from the Company's purchase of receivable program through customer billings. Under POLR VIII, the Company also proposed to enter into long-term purchased power agreements (PPA) with developers of utility scale solar projects for a quantity of up to 27 megawatts (MW) to satisfy Alternative Energy Portfolio Standard (AEPS) requirements. The Company will collaborate with the PUC regarding potential approval of the solar plan at a later date. Pursuant to the PUC approved POLR VIII plan, the Company will continue to act as an administrative intermediary only.

The Company filed the POLR IX plan on April 20, 2020, which has an expected effective date of June 1, 2021.

## Transmission and Distribution Rates

Annually, the Company is permitted through its PUC approved Transmission Service Charge (TSC) filing to recover on a dollar-for-dollar basis the expenses it incurs from the PJM Interconnection (PJM) as a provider of transmission service to retail customers taking POLR service, as well as, update the Company's retail transmission rates to reflect the annually updated FERC revenue requirements and rates. In May 2019 and May 2018, the Company filed its annual formula update (as described in Note 2) with the FERC resulting in an increase in revenue of $\$ 4.0$ million and a decrease in revenue of $\$ 2.6$ million, respectively. Simultaneously, the Company also filed with the PUC for a pass through of costs in its state transmission rates. The updated formula and state rates are effective for customers beginning June 1st of each year. As of December 31, 2017, the Company recorded a regulatory liability for excess accumulated deferred income taxes (EDIT) that is to be refunded to transmission customers as a result of the TCJA. On November 21, 2019, FERC issued final rule Order 864, requiring public utility transmission providers with existing formula rates to revise those formula rates to account for changes caused by the TCJA, specifically the treatment of EDIT. In the order, the FERC requires utilities to refund to customers any excess tax balances collected following the change in tax rate, but did not prescribe a specific mechanism to be applied to all formula rates or a specific flow-back period for unprotected EDIT. Instead, the FERC will consider each of these on a case-by-case basis and allow each utility to propose and justify the method. Additionally, the FERC did not require the refund of interest accrued over the last year while utilities awaited final guidance. Transmission Utilities must file either a compliance filing within 30 days of the effective date of this final rule or make such changes during the utility's next annual informational filing. The Company's next annual informational filing is May 1, 2020 and is currently assessing changes to its formula filing for the final rule.

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In September 2016, the PUC approved the Company's long-term infrastructure improvement plan (LTIIP). The approval of the LTIIP allows the Company to recover reasonable and prudently incurred costs related to the repair, improvement and accelerated replacement of aging infrastructure over a six year period without the need for a traditional distribution rate case. During the six year period between 2017 and 2022, the Company plans to have capital expenditures totaling $\$ 130.0$ million related to the accelerated distribution projects capital expenditure and $\$ 651.1$ million related to the overall distribution projects.

In June 2018, the Governor of Pennsylvania signed Act 58 of 2018, which authorized the PUC to review and approve utility-proposed alternative rate mechanisms, including options such as decoupling mechanisms, formula rates, multi-year plans and performance based rates. The Company cannot predict the outcome or the potential financial impact, if any, of this matter.

In December 2018, the PUC approved new distribution rates for the Company. These rates became effective on December 29, 2018 and provide for an increase of $\$ 40.5$ million in new revenues as well as the inclusion of an additional $\$ 52.2$ million of revenues recovered under current surcharges for a total of a $\$ 92.7$ million increase to base distribution revenues. Key issues resolved in the settlement included a $\$ 24.0$ million refund to customers related to 2018 federal corporate income tax savings resulting from the TCJA, an electric vehicle pilot program, the ability to treat cloud-based computing costs as rate base and the continued recovery of pension contributions.

## 4. Revenue from Contracts with Customers

The Company generates substantially all of its revenues from contracts with tariff-based distribution and transmission electric service customers and POLR electric energy customers.

## Distribution Revenue

The Company provides distribution electric services to residential, commercial and industrial customers. The Company satisfies its performance obligation to its customers and revenue is recognized over time as electric service is delivered and simultaneously consumed by the customer. The amount of revenue recognized is based on the volume of electric service delivered during the period and a per-unit state-regulated electric rate tariff, in addition to a monthly fixed charge, applicable demand charges and any regulatory approved surcharges. Customers are typically billed monthly on a metered cycle basis and outstanding amounts are typically due within 21 days of the date of the bill. An estimate of unbilled revenues is calculated to recognize electric service provided from the last meter reading through the end of the calendar month.

Distribution customers are "at will" customers with no term contract and no minimum purchase commitment. Performance obligations are limited to the service requested and received to date. Accordingly, there are no material unsatisfied performance obligations.

## Electric Supply (POLR)

The Company serves electric energy needs for its customers who do not choose an alternative EGS through its POLR arrangements (see Note 3). These POLR arrangements serve customers under a competitive procurement process approved by the PUC. The amount of revenue recognized is based on the Company's volume of electric energy transferred to the customer at the competitive electric generation supply market rates obtained through the Company's PUC approved competitive procurement process. Customers are typically billed monthly and outstanding amounts are typically due within 21 days of the date of the bill.

The Company's agreement to provide electric energy needs contains no minimum purchase commitment. The performance obligation is limited to the service requested and received to date. Accordingly, the Company has no unsatisfied performance obligations.

## Transmission Revenue

The Company generates transmission revenue from a FERC-approved PJM Open Access Transmission Tariff. The Company calculates transmission revenue pursuant to a formula-based rate accepted by the FERC. An annual revenue requirement to provide transmission services is calculated using this formula-based rate (see Note 2). The Company satisfies its performance obligation to provide transmission services and revenue is recognized (and thus billed to customers) over time as transmission services are provided and consumed. This method of recognition fairly presents the Company's transfer of transmission services as the daily rate is set by the FERC approved formula-based rate. PJM

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remits payment on a weekly basis.
The Company's agreement to provide transmission services contains no minimum purchase commitment. The performance obligation is limited to the service requested and received to date. Accordingly, the Company has no unsatisfied performance obligations.

The following table shows revenues from contracts with customers disaggregated by type of service for the years ended December 31, 2019 and 2018, respectively.

|  | (Millions of Dollars) |  |  |
| :--- | ---: | ---: | ---: |
|  | 2019 |  | 2018 |
| Distribution | $\$ 571.3$ | $\$$ | 526.6 |
| Electric Supply (POLR) | 237.2 | 255.5 |  |
| Transmission | 137.4 | 137.7 |  |
| Other (a) | 17.9 | 18.4 |  |
| Revenue from Contracts with Customers | $\$ 963.8$ | $\$$ | 938.2 |

(a) Primarily includes revenues from pole attachments and other miscellaneous revenues.

Contract receivables from customers are included in electric customer receivables, unbilled electric customer receivables and other receivables on the balance sheets.

Contract liabilities primarily result from recording contractual billings in advance for customer pole attachments to the Company's infrastructure in addition to payments received in excess of revenues earned to date. Advanced billings for customer pole attachments are recognized as revenue ratably over the billing period. Payments received in excess of revenues earned to date are recognized as revenue as services are delivered in subsequent periods.

The following table shows the balances of contract liabilities resulting from contracts with customers:

| (Millions of Dollars) | $\$$ | 0.1 |
| :--- | :---: | :---: |
| Balance at December 31, 2017 | 5.4 |  |
| Increases as a result of additional cash received or due |  | $(4.4)$ |
| Amounts recognized into operating revenues (a) | $\$$ | 1.1 |
| Balance at December 31, 2018 | $\$$ | 1.1 |
| Balance at December 31, 2018 |  | 4.5 |
| Increases as a result of additional cash received or due | $(4.5)$ |  |
| Amounts recognized into operating revenues (a) | $\$$ | 1.1 |
| Balance at December 31, 2019 |  |  |

(a) Recognized in other operating revenues on the statement of operations.

## 5. Fair Value Measures and Derivative Instruments

The FASB provides a framework for measuring fair value under GAAP. Fair value is defined as the price that would be received for an asset or paid to transfer a liability (exit price) in the principal or most advantageous market for the asset or liability in an orderly transaction between the willing market participants on the measurement date. The fair value hierarchy prioritizes the inputs utilized to measure fair value. The hierarchy gives the highest priority to unadjusted quoted market prices in active markets for identical assets or liabilities (Level 1) and the lowest priority to unobservable inputs (Level 3). The Company uses, as appropriate, a market approach (generally, data from market transactions), income approach (generally, present value techniques and option-pricing models), and/or a cost approach (generally, replacement cost) to measure the fair value of an asset or a liability. The three levels of the fair value hierarchy are as follows:

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Level 1 - Financial instruments that are valued using quoted prices available in active markets for identical assets or liabilities as of the reporting date. Active markets are those where transactions for the asset or liability occur in sufficient frequency and volume to provide pricing information on an ongoing basis. The Company's Level 1 assets primarily consist of money market funds listed on active exchanges. The Company uses quoted prices in active markets for identical assets in valuing its money market funds.

Level 2 - Financial instruments that are valued using models or other valuation methodologies based on assumptions that are observable in the marketplace throughout the full term of the instrument, can be derived from observable data or supported by observable levels at which transactions are executed in the marketplace. These models are primarily industry-standard models that consider various assumptions including quoted forward prices for commodities, time value, volatility factors and current market and contractual prices for the underlying instruments, as well as other relevant economic measures.

Level 3 - Financial instruments that are valued using pricing inputs that are generally less observable from objective sources. These inputs may be used with internally developed methodologies that result in management's best estimate of fair value.

In some cases, the inputs used to measure fair value may meet the definition of more than one level within the fair value hierarchy. The lowest level input that is significant to the fair value measurement in its totality determines the applicable level in the fair value hierarchy. The Company's assessment of the significance of a particular input to the fair value measurement requires judgment, and may affect the valuation of fair value assets and liabilities and their placement within the fair value hierarchy levels.

The Company measures the fair value of other long-lived assets on a non-recurring basis using Level 2 or Level 3 inputs when the assets are determined to be impaired. The carrying values of accounts receivable, accounts payable, inventory and other short-term assets and liabilities are deemed to be reasonable estimates of fair values because of their short-term nature.

The Company's assets measured at fair value on a recurring basis as of December 31, 2019 and 2018 consisted of the following:

| (Millions of Dollars) <br> As of December 31, 2019 |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Recurring Fair Value Measures | Level 1 |  | Level 2 |  | Level 3 |  | Other |  | Cash Collateral |  | Total |  |
| Assets: |  |  |  |  |  |  |  |  |  |  |  |  |
| Cash and cash equivalents (a) | \$ | 6.7 | \$ | - | \$ | - | \$ | - | \$ | - | \$ | 6.7 |
| Restricted cash (b) |  | - |  | - |  | - |  | - |  | - |  | - |
| Total assets | \$ | 6.7 |  | - |  | - |  | - |  | - |  | 6.7 |

(a) Level 1 amounts primarily represent investments in money market funds.
(b) Amounts in "Other" column primarily represent restricted cash in bank accounts with financial institutions.

| (Millions of Dollars) <br> As of December 31, 2018 |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Recurring Fair Value Measures | Level 1 |  | Level 2 |  | Level 3 |  | Other |  | Cash Collateral |  | Total |  |
| Assets: |  |  |  |  |  |  |  |  |  |  |  |  |
| Cash and cash equivalents (a) | \$ | 6.1 | \$ | - | \$ | - | \$ | - | \$ | - | \$ | 6.1 |
| Restricted cash (b) |  | - |  | - |  | - |  | 0.5 |  | - |  | 0.5 |
| Total assets | \$ | 6.1 | \$ | - | \$ | - | \$ | 0.5 | \$ | - | \$ | 6.6 |

(a) Level 1 amounts primarily represent investments in money market funds.
(b) Amounts in "Other" column primarily represent restricted cash in bank accounts with financial institutions.

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## 6. Income Taxes

On November 15, 2018, FERC issued a policy statement, Docket No. PL19-2-000, requiring companies to disclose the following items related to the accounting and rate treatment of excess and deficient accumulated deferred income taxes (ADIT) that resulted from the U.S. Federal Income Tax rate change from $35 \%$ to $21 \%$, as enacted by the TCJA on December 22, 2017, and made effective January 1, 2018.

The accounts affected by the re-measurements of ADIT in 2017 due to the TCJA were account 190 - accumulated deferred income taxes, account 282 - accumulated deferred income taxes (other property), account 283 - accumulated deferred income taxes (other), account 182.3 - other regulatory assets, account 254 - other regulatory liabilities, accounts 410.1 - provision for deferred income taxes, and accounts 411.1 - provision for deferred income taxes (credit).

The Company re-measured all ADIT balances in accounts 190, 282 and 283 at December 31, 2017, and its tax-related balances in account 182.3 and 254 recorded prior to TCJA enactment. The re-measurement of ADIT that is not recoverable or refundable through rates was recorded to provision for deferred income taxes through the income statement accounts listed above. The re-measurement of plant-related ADIT created excess ADIT refundable to customers, which was recorded to account 254 - other regulatory liabilities. The re-measurement of non-plant-related ADIT created both excess and deficient ADIT to be paid to and received from customers. The non-plant excess and deficient ADIT were recorded to account 254 - other regulatory liabilities and account 182.3-other regulatory assets, respectively. As the excess and deficient ADIT reverse through the amortization period shown in the table below, the regulatory assets and liabilities will reverse with an offset to the income statement accounts 410.1 - provision for deferred income taxes and 411.1 - provision for deferred income taxes (credit), respectively. The re-measured ADIT that was recorded to other regulatory assets and liabilities was based on the regulatory treatment of the original ADIT prior to the TCJA as discussed below.

PUC Jurisdiction - Excess ADIT on distribution plant and distribution-allocated general plant is refundable. In accordance with the Company's distribution rate case settlement, the excess ADIT is being refunded to customers through new base distribution rates that became effective on December 29, 2018. The PUC approved the amortization of both protected and unprotected plant-related excess ADIT using the Average Rate Assumption Method ("ARAM").

FERC Jurisdiction - Excess ADIT on transmission plant is fully refundable. Non-plant related excess ADIT on transmission-allocated general plant and reacquired debt costs is refundable based on a net plant allocator. Non-plant related excess or deficient ADIT on employee benefits and other accruals is recoverable or refundable based on a wage and salary allocator. In accordance with FERC Order 864, Docket No. RM19-5-000, the Company expects to amortize and refund to customers through the Formula Rate beginning with the 2019 true-up filing both protected and unprotected transmission plant-related excess ADIT using the Average Rate Assumption Method ("ARAM"). The true-up adjustment with respect to the 2019 service year affects customer rates beginning on June 1, 2020. In addition, non-plant transmission excess ADIT will be refunded over a three-year period beginning on June 1, 2020.

The table below categorizes protected and unprotected excess and deficient ADIT the amortization recorded in 2019 and the proposed amortization periods. The tables also include the tax gross-up and other items to provide a complete representation of the tax-related regulatory asset and liability balances as of December 31, 2019.

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| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| NOTES TO FINANCIAL STATEMENTS (Continued) |  |  |  |  |  |  |  |  |  |
|  |  | Net <br> Regulatory Tax Liability 12/31/2017 | Less: 2018 <br> Amortization of Excess/Deficient ADIT (b), (d) | Plus: Other Activity and Adjustments <br> (a) | Net <br> Regulatory Tax Liability 12/31/2018 | Less: 2019 <br> Amortization of Excess/Deficient ADIT (b), (d) | Plus: Other Activity and Adjustments (a) |  | et <br> ulatory <br> iability <br> /2019 |
| Distribution Plant |  |  |  |  |  |  |  |  |  |
| Excess ADIT: |  |  |  |  |  |  |  |  |  |
| Protected Plant | \$ | 141.4 | (6.3) | 4.4 | 139.5 | (6.4) | (2.2) | \$ | 130.9 |
| Unprotected Plant |  | 62.2 | (2.4) | (5.9) | 53.9 | (2.5) | 5.8 |  | 57.2 |
| Total Plant-Related Excess ADIT |  | 203.6 | (8.7) | (1.5) | 193.4 | (8.9) | 3.6 |  | 188.1 |
| Unprotected Plant-Related Items: |  |  |  |  |  |  |  |  |  |
| AFUDC Equity |  | (8.1) | - | (0.4) | (8.5) | - | 1.0 |  | (7.5) |
| Flow-Through tems (c) |  | (98.7) | - | (4.5) | (103.2) | - | (15.3) |  | (118.5) |
| Net Regulatory Liability related to Distribution Plant |  | 96.8 | (8.7) | (6.4) | 81.7 | (8.9) | (10.7) |  | 62.1 |
| Transmission Plant |  |  |  |  |  |  |  |  |  |
| Excess ADIT: |  |  |  |  |  |  |  |  |  |
| Protected Plant |  | 63.7 | - | (3.0) | 60.7 | (1.0) | 1.6 |  | 61.3 |
| Unprotected Plant |  | - | - | - | - | - | (1.0) |  | (1.0) |
| Total Plant-Related Excess ADIT |  | 63.7 | - | (3.0) | 60.7 | (1.0) | 0.6 |  | 60.3 |
| Unprotected Plant-Related Items: |  |  |  |  |  |  |  |  |  |
| AFUDC Equity |  | (2.0) | - | (0.3) | (2.3) | - | 0.1 |  | (2.2) |
| Flow-Through ltems (e) |  | (41.3) | - | 3.6 | (37.7) | - | (0.1) |  | (37.8) |
| Net Regulatory Liability related to Transmission Plant |  | 20.4 | - | 0.3 | 20.7 | (1.0) | 0.6 |  | 20.3 |
| Total Plant-Related ADIT Recorded to Account 254 |  | 117.2 | (8.7) | (6.1) | 102.4 | (9.9) | (10.1) |  | 82.4 |
| Unprotected Non-Plant: |  |  |  |  |  |  |  |  |  |
| Unprotected Non-Plant Transmission Excess ADT (f) |  | 3.4 | - | - | 3.4 | (0.9) | (0.7) |  | 1.8 |
| Total Excess ADIT and Flow-Through Items Recorded to Account 254 |  | 120.6 | (8.7) | (6.1) | 105.8 | (10.8) | (10.8) |  | 84.2 |
| Tax Gross Up |  | 45.6 |  |  | 41.6 |  |  |  | 35.3 |
| Regulatory Liability including Gross Up (g) | \$ | 166.2 |  |  | 147.4 |  |  | \$ | 119.5 |

(a) The ADIT and excess ADIT include the impacts of the provision-to return-adjustments recorded in 2018 after filing the 2017 tax return. The adjustments to excess ADIT were recorded in account 254.
(b) Both protected and unprotected excess ADIT related to distribution plant are being amortized under the Average Rate Assumption Method as approved by the Pennsylvania PUC. Certain plantrelated excess deferred tax amounts are subject to statutory normalization requirements restricting the extent to which rate base is reduced and amortization of excess deferred taxes reduces recoverable income tax expense. Other deficient or excess deferred tax amounts are not "protected" by such rules.
(c) Due to flow-through ratemaking in the state of Pennsylvania, various plant-related items do not result in rate recovery of deferred income taxes as the temporary differences originate. The taxrelated regulatory assets are recoverable only as current tax expense results. Remeasurement of flow-through ADIT resulted in a reduction of the related regulatory assets.
(d) Pursuant to FERC Order 864, the Company began amortizing transmission related excess ADIT and reflecting in prices charged to customers beginning with the 2019 FERC formula true up filing. Protected and unprotected excess ADIT related to transmission plant will be amortized under the Average Rate Assumption Method pursuant to the TCJA and consistent with FERC guidance.
(e) Includes FERC-approved recovery of previously flowed through tax benefits.
(f) Amortization of transmission related non-plant excess ADIT will be reflected in prices charged to customers beginning with the 2019 FERC formula true-up filing, based on a three-year amortization period.
(g) Agrees to Regulatory Tax Liability in Account 254. Refer to page 278.

Details of federal and state income tax expense are as follows:
Income Tax Expense for the Years Ended December 31,

|  | (Millions of Dollars) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | 2019 |  | 2018 |  |
| Current: |  |  |  |  |
| Federal | \$ | 27.8 | \$ | 15.6 |
| State |  | 9.6 |  | 9.9 |
| Deferred: |  |  |  |  |
| Federal |  | 7.2 |  | 10.7 |
| State |  | 3.4 |  | 0.3 |
| Income Taxes | \$ | 48.0 | \$ | 36.5 |


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Currently, the Company is not subject to any federal or state income tax examinations. The IRS previously completed examinations of the LLC's consolidated U.S. federal income tax returns for tax years 2007 through 2012. There are no unresolved matters with the IRS from these examinations.

The Company remains subject to examination by the IRS and Pennsylvania for tax years ending December 31, 2015 through December 31, 2019.

Total income taxes differ from the amount computed by applying the statutory federal income tax rate to income before income taxes, as set forth in the following table:

Income Tax Expense Reconciliation for the Years Ended December 31,

|  | (Millions of Dollars) |  |
| :--- | ---: | ---: |
| Computed federal income tax statutory rate of 21\% at December 31, 2019 and 2018 | 2019 | 2018 |
| Increase (decrease) in taxes resulting from: | 48.8 | $\$$ |
| State income taxes, net of federal income tax benefits |  | 39.6 |
| Non-deductible expenses | 18.0 | 14.4 |
| Property related items | 0.1 | 0.3 |
| Tax reform adjustment | $(18.9)$ | $(15.7)$ |
| Other | - | $(2.3)$ |
| Total Income Tax Expense | $\$$ | 4. |

The deferred income tax assets and liabilities consisted of the following:

## Deferred Tax Assets (Liabilities) as of December 31,

|  | (Millions of Dollars) |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
|  | 2019 | 2018 |  |  |
| Benefit costs | $\$$ | 63.8 | $\$$ | 69.5 |
| Legacy liabilities | 4.7 | 5.1 |  |  |
| Receivables | 5.1 | 4.9 |  |  |
| Regulatory liability - property | 119.5 | 143.2 |  |  |
| Other | 12.3 | 3.4 |  |  |
| Deferred tax assets | $\$$ | 205.4 | $\$$ | 226.1 |
| Property depreciation | $(674.1)$ | $(666.5)$ |  |  |
| Pension liability | $(83.4)$ | $(87.5)$ |  |  |
| Unamortized loss on reacquired debt | $(5.3)$ | $(5.9)$ |  |  |
| Other | $(19.6)$ | $(6.1)$ |  |  |
| Deferred tax liabilities | $\$$ | $(782.4)$ | $\$$ | $(766.0)$ |
| Net Deferred Tax Liability | $\$$ | $(577.0)$ | $\$$ | $(539.9)$ |

The Company believes there are no unrecognized tax benefits that could change significantly during the next twelve months.

## 7. Leases

The Company leases office buildings and other property and equipment. Rental expense of $\$ 3.9$ million and $\$ 3.6$ million was recorded for the years ended December 31, 2019 and 2018, respectively. The Company also leases communication fiber from DQE Communications LLC (DQE Communications). Rental expense associated with this fiber of $\$ 4.0$ million and $\$ 3.6$ million was recorded for the years ended December 31, 2019 and 2018, respectively.

Future minimum lease payments for operating leases are related principally to corporate offices and are as follows:

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| :---: | :---: | :---: | :---: |

## Future Minimum Lease Payments as of December 31, 2019 (Millions of Dollars)

| Year Ended December 31, | Operating <br> Leases |  |
| :--- | ---: | ---: |
| 2020 | $\$$ | 6.8 |
| 2021 |  | 5.4 |
| 2022 | 4.0 |  |
| 2023 | 3.6 |  |
| 2024 | 3.5 |  |
| 2025 and thereafter |  | 14.0 |
| Total lease payments (a) | $\$$ | 37.3 |

(a) Total future minimum lease payments as of December 31, 2019 include
approximately $\$ 8.7$ million w ith DQE Communications.

## 8. Employee Benefits

## Pension Benefits

The Company maintains a qualified retirement plan that provides pension benefits to all eligible full-time employees hired before October 1, 2010. Upon retirement, an eligible employee receives a monthly pension based on his or her length of service and compensation. In 2019, the Company approved multiple amendments to the plan as part of the International Brotherhood of Electrical Workers (IBEW) collective bargaining agreement negotiations. These amendments included an annual rolling of the earnings window for the purposes of calculating pension benefits and an extension of the pre-retirement spousal protection provisions for participants. Additionally, the Plan was amended to give certain participants a limited-time opportunity to elect a lump sum distribution of their vested pension benefit. Approximately 400 former employees who had not yet commenced receiving their pension benefits were eligible to participate in this lump sum option. Lump sum payments were made in December 2019. The year-end obligation reflects the removal of participants who elected and received a lump sum payment, as well as the impacts of the previously noted amendments. The cost of funding the pension plan is determined by the unit credit actuarial cost method. Pension costs charged to expense or construction were $\$ 15.4$ million and $\$ 21.2$ million for the years ended December 31, 2019 and 2018, respectively. The Company is required to establish a regulatory asset or regulatory liability for the difference between the amount of retirement plan expense collected in rates and the amount of retirement plan expenses incurred (see Note 2). This amount is recorded in other operating and maintenance or investment and other income (loss) in the statements of operations. The amount recorded in investment and other income (loss) was $\$ 2.4$ million and $\$ 9.7$ million for the years ended December 31, 2019 and 2018, respectively. The actual amount recognized in the statements of operations was $\$ 5.0$ million and $\$ 18.6$ million for the years ended December 31, 2019 and 2018.

The Company funds the pension plan by an amount that is at least equal to the minimum funding requirements of the Pension Protection Act of 2006, but which does not exceed the maximum tax-deductible amount for the year.

The Company made pension plan contributions of $\$ 10.0$ million and $\$ 23.0$ million in 2019 and 2018, respectively. The Company is not currently required to contribute to the pension plan in 2020. Under the terms of the rate case settlement, approved by the PUC in December 2018 (see Note 3), should the Company conclude that a contribution of less than $\$ 10.0$ million (as prescribed in the rate case settlement) to the pension plan is appropriate, the Company may reduce the pension contribution and will record a regulatory liability that is equal to $50 \%$ of the reduction of the contribution below the level of $\$ 10.0$ million. Any regulatory liability recorded will be reduced to the extent of $50 \%$ of the contributions in excess of $\$ 10.0$ million in subsequent years. If a regulatory liability remains at the time of the Company's next rate proceeding, the regulatory amount will be refunded to rate payers as directed in the next base rate proceeding. Any amount recorded as a regulatory liability will not bear an interest obligation. As of December 31, 2019, there was no regulatory liability associated with the pension plan.

## Postretirement Benefits

In addition to pension benefits, the Company provides certain postretirement plans that provide health care benefits and life insurance for some retired employees that were hired before October 1, 2012. The life insurance plan is non-contributory. Participating retirees make contributions, which may be adjusted annually, to the health care plan.

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Health care benefits terminate when retirees reach age 65. The Company has the right to modify or terminate the plans. The Company maintains a Voluntary Employees Beneficiary Association (VEBA) trust for a portion of its postretirement obligations. The Company made contributions of $\$ 4.0$ million and $\$ 4.2$ million to the VEBA trust in 2019 and 2018, respectively. The Company expects to contribute approximately $\$ 3.0$ million to the VEBA trust in 2020.

The Company accrues the actuarially determined costs of the postretirement benefits over the period from the date the employee was hired until the date the employee becomes fully eligible for benefits.

The Company is required to establish a regulatory asset or liability for the difference between the amount of net periodic postretirement plan expense collected in rates and the amount of postretirement plan expense incurred. The non-current regulatory liability recorded on the Company's balance sheets as of December 31, 2019 and 2018 was $\$ 3.2$ million and $\$ 4.0$ million, respectively (see Note 2).

During 2018, due to market conditions and availability, the Company agreed to allow all retirees to retain existing Company sponsored medical plan coverage at a Company-indexed cost equivalent to the amount agreed to in the March 2016 amendment to the Plan. This plan amendment makes all healthcare cost trend rates no longer applicable. In 2019, as part of the IBEW collective bargaining agreement negotiations, the Company approved amendments to the plan including an increase in retiree life insurance coverage for future retirees and an increase in the Health Reimbursement Arrangement (HRA) stipend for retirees and spouses in 2020. The year-end obligation reflects the impacts of these amendments.

The Company uses a December 31 measurement date for its pension and postretirement plans. The following tables provide a reconciliation of the changes in the pension and postretirement plans' benefit obligations and fair value of plan assets, a statement of the funded status as of December 31, 2019 and 2018 and a summary of assumptions used in the measurement of the Company's benefit obligations:

Funded Status of the Pension and Postretirement Benefit Plans as of December 31,

|  | (Millions of Dollars) |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2019 |  |  |  | 2018 |  |  |  |
|  | Pension |  | Postretirement |  | Pension |  | Postretirement |  |
| Change in benefit obligation: |  |  |  |  |  |  |  |  |
| Benefit obligation beginning of year | \$ | 1,084.7 | \$ | 28.5 | \$ | 1,199.2 | \$ | 33.4 |
| Service cost |  | 8.1 |  | 0.4 |  | 10.1 |  | 0.5 |
| Interest cost |  | 46.1 |  | 1.1 |  | 42.8 |  | 1.1 |
| Plan amendments |  | 14.0 |  | 1.5 |  | 0.6 |  | - |
| Plan participants' contributions |  | - |  | 1.1 |  | - |  | 0.9 |
| Actuarial (gain) loss |  | 115.0 |  | 1.8 |  | (97.6) |  | (2.3) |
| Benefits paid |  | (88.6) |  | (5.1) |  | (70.4) |  | (5.1) |
| Benefit obligation at end of year | \$ | 1,179.3 | \$ | 29.3 | \$ | 1,084.7 | \$ | 28.5 |
| Change in plan assets: |  |  |  |  |  |  |  |  |
| Fair value of plan assets beginning of year |  | 984.7 |  | - |  | 1,081.3 |  | - |
| Actual (loss) return on plan assets |  | 182.2 |  | - |  | (49.2) |  | - |
| Plan participants' contributions |  | - |  | 1.1 |  | - |  | 0.9 |
| Employer contributions |  | 10.0 |  | 4.0 |  | 23.0 |  | 4.2 |
| Benefits paid |  | (88.6) |  | (5.1) |  | (70.4) |  | (5.1) |
| Fair value of plan assets at end of year | \$ | 1,088.3 | \$ | - | \$ | 984.7 | \$ | - |
| Funded status at end of year | \$ | (91.0) | \$ | (29.3) | \$ | (100.0) | \$ | (28.5) |

The funded status of the pension and postretirement plans as of December 31, 2019 and 2018 was a liability of $\$ 91.0$ million and $\$ 29.3$ million and $\$ 100.0$ million and $\$ 28.5$ million, respectively, and was reflected on the balance sheets as follows:

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|  |  |  |  |

Amounts reflected on the balance sheets as of December 31,

|  | (Millions of Dollars) |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2019 |  |  |  | 2018 |  |  |  |
|  | Pension |  | Postretirement |  | Pension |  | Postretirement |  |
| Current liabilities | \$ | - | \$ | 2.9 | \$ | - | \$ | 3.3 |
| Noncurrent liabilities | \$ | 91.0 | \$ | 26.4 | \$ | 100.0 | \$ | 25.2 |


|  |  | 2019 |  |  |  | 2018 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Pension | Postretirement |  | Pension |  | Postretirement |  |
| Components: |  |  |  |  |  |  |  |  |
| Prior service cost \$ | \$ | 28.9 | \$ | (6.4) | \$ | 19.7 | \$ | (9.0) |
| Accumulated loss (income) |  | 271.3 |  | (2.7) |  | 294.9 |  | (4.8) |
| Accumulated other comprehensive loss (income), pre-tax \$ |  | 300.2 | \$ | (9.1) | \$ | 314.6 | \$ | (13.8) |
| Recorded as: |  |  |  |  |  |  |  |  |
| Regulatory assets \$ | \$ | 288.6 | \$ |  | \$ | 302.8 | \$ | - |
| Deferred income taxes |  | 3.4 |  | (2.6) |  | 3.4 |  | (4.0) |
| Accumulated other comprehensive loss (income), after-tax |  | 8.2 |  | (6.5) |  | 8.4 |  | (9.8) |
| \$ | \$ | 300.2 | \$ | (9.1) | \$ | 314.6 | \$ | (13.8) |

The Company records a regulatory asset or regulatory liability for qualifying costs of its regulated operations that for ratemaking purposes will be deferred for future recovery or refund. Amortization expense recognized by the Company in the years ended December 31, 2019 and 2018 for pension benefits related to regulatory assets and regulatory liabilities totaled $\$ 20.1$ million and $\$ 32.3$ million, respectively.

The accumulated benefit obligation for the defined benefit pension plan was $\$ 1,157.2$ million and $\$ 1,067.4$ million as of December 31, 2019 and 2018, respectively.

| Weighted-average Assumptions Used to Determine Benefit Obligations as of December 31, |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  | 2019 |  |  |  |
|  | Pension | Postretirement | Pension | Postretirement |
|  | $3.33 \%$ | $3.29 \%$ | $4.34 \%$ | $4.26 \%$ |
| Discount rate | $3.75 \%$ | - | $3.75 \%$ | - |
| Assumed change in compensation levels |  |  |  |  |

Components of Net Periodic Benefit Cost for the Years Ended December 31,

|  | 2019 |  |  | 2018 |  |  |
| :--- | ---: | ---: | ---: | :---: | :---: | :---: |
|  |  | Pension | Postretirement | Pension | Postretirement |  |
| Service cost | $\$$ | 8.1 | $\$$ | 0.4 | $\$$ | 10.1 |
| Interest cost |  | 46.1 | 1.1 | 42.8 | 0.5 |  |
| Expected return on plan assets | $(59.2)$ | - | $(64.5)$ | - |  |  |
| Amortization of prior service cost (benefit) | 4.8 | $(1.1)$ | 4.8 | $(1.1)$ |  |  |
| Amortization of actuarial loss |  | 15.6 | $(0.4)$ | 28.1 | - |  |
| $\quad$ Net periodic benefit cost | $\$$ | 15.4 | $\$$ | - | $\$$ | 21.3 |


| Weighted-average Assumptions Used to Determine Net Periodic Benefit Cost for the Years ended December 31, |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  | 2019 |  |  | 2018 |
|  | Pension | Postretirement | Pension | Postretirement |
| Dis count rate | $4.34 \%$ | $4.26 \%$ | $3.61 \%$ | $3.49 \%$ |
| Expected long-term return on plan assets | $5.89 \%$ | - | $6.34 \%$ | - |
| Rate of compensation increase | $3.75 \%$ | $2.50 \%$ | $3.75 \%$ | $2.50 \%$ |


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The estimated net loss for the pension plan that will be amortized from accumulated other comprehensive loss into net periodic benefit cost in 2020 is approximately $\$ 0.4$ million. The estimated prior service cost that will be amortized from accumulated other comprehensive loss into net periodic benefit cost in 2020 is approximately $\$ 0.1$ million.

The estimated net gain for the postretirement plan that will be amortized from accumulated other comprehensive loss into net periodic benefit cost in 2020 is zero. The estimated prior service credit that will be amortized from accumulated other comprehensive loss into net periodic benefit cost in 2020 is $\$ 0.9$ million.

## Pension and Postretirement Plan Assets, Expected Rate of Return on Pension and Postretirement Plan Assets and Investment Policy

The Company used a $5.9 \%$ and $6.3 \%$ expected long-term rate of return on plan assets in determining net periodic pension benefit cost in 2019 and 2018, respectively. The Company's expected return on plan assets used to develop net periodic pension benefit costs for 2019 was $5.8 \%$.

The Company's expected return on plan assets for 2020 does not have net periodic postretirement benefit costs since all remaining assets meet the requirements to be held in cash for the foreseeable future.

The Company develops the long-term rate of return for the pension and postretirement benefit plans using a building block approach, taking into account the target asset class allocations contained in the table below as well as the investment management mix. Under this approach, current market factors such as inflation, interest rates and asset class risks and returns are evaluated and considered before long-term capital market assumptions are determined. Long-term historical returns and relationships between the asset classes are reviewed to verify reasonability and appropriateness. The long-term rate of return is established through this building block approach with proper consideration of diversification to reduce volatility of expected return.

The following represents the Company's target investment allocations for the pension plan assets based on the Company's pension benefit obligation funded status:

| Target Investment Allocation |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Funded Status | 90\% |  | 95\% |  | 100\% |  | 105\% |  | 110\% |  |
| Domestic equity s ecurities | 25-35\% | 20 | 30 \% | 15 | - 25 \% | 10 | - 20 \% | 4 | -14 | 4 \% |
| International equity securities | 3-13\% | 1.5 | - 11.5 \% | 0 | - 9 \% | 0 | 6.5 \% |  |  | - |
| Fixed income securities | 55-65\% | 62.5 | - 72.5 \% | 70 | - $80 \%$ | 77.5 | 87.5 \% | 85 | - 95 | 95 \% |
| Cash and cash equivalents | 0-4\% | 0 | - 4 \% | 0 | - 4 \% | 0 | 4 \% |  | - 4 | 4 \% |
| Alternative investments | 0-6\% | 0 | 5 \% | 0 | - 5 \% | 0 | - 5 \% |  | - 5 | 5 \% |

The following represents the Company's target investment allocation policy when postretirement plan assets are held in investments other than solely in cash:

|  | Target Investment <br> Allocation <br> Postretirement |
| :--- | ---: |
| Asset Category | $43-53 \%$ |
| Domestic equity securities | $7-17 \%$ |
| International equity securities | $30-50 \%$ |
| Fixed income securities | $0-5 \%$ |
| Cash and cash equivalents |  |

The following tables set forth by level within the fair value hierarchy (see Note 5) the pension plan assets that were accounted for at fair value:

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|  | (Millions of Dollars) <br> As of December 31, 2019 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Level1 |  | Level 2 |  | Level 3 |  | Total |  |
| Plan Assets: |  |  |  |  |  |  |  |  |
| Cash and cash equivalents | \$ | 4.2 | \$ | - | \$ | - | \$ | 4.2 |
| U.S. government securities |  | - |  | 168.2 |  | - |  | 168.2 |
| Corporate debt instruments |  | - |  | 223.8 |  | - |  | 223.8 |
| Mutual funds - domestic |  | 56.4 |  | - |  | - |  | 56.4 |
| Mutual funds - international |  | 69.7 |  | - |  | - |  | 69.7 |
| Preferred Stock |  | - |  | 0.7 |  | - |  | 0.7 |
| Other debt instruments |  | - |  | 26.6 |  | - |  | 26.6 |
| Private equity investments |  | - |  | - |  | 10.6 |  | 10.6 |
| Total assets in the fair value hierarchy | \$ | 130.3 | \$ | 419.3 | \$ | 10.6 | \$ | 560.2 |
| Investments measured at net asset value (a) |  |  |  |  |  |  | \$ | 528.1 |
| Investments at fair value |  |  |  |  |  |  | \$ | 1,088.3 |

(a) In accordance w ith accounting standards, certain investments that w ere measured at net asset value (NAV) per share (or its equivalent) have not been classified in the fair value hierarchy. The fair value amounts presented in this table are intended to permit reconciliation of the fair value hierarchy to the line items presented in the statements of net assets available for benefits.

|  | (Millions of Dollars) <br> As of December 31, 2018 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Level1 |  | Level 2 |  | Level 3 |  | Total |  |
| Plan Assets: |  |  |  |  |  |  |  |  |
| Cash and cash equivalents | \$ | 4.0 | \$ | - | \$ | - | \$ | 4.0 |
| U.S. government securities |  | - |  | 162.8 |  | - |  | 162.8 |
| Corporate debt instruments |  | - |  | 245.0 |  | - |  | 245.0 |
| Mutual funds - domestic |  | 60.2 |  | - |  | - |  | 60.2 |
| Mutual funds - international |  | 60.0 |  | - |  | - |  | 60.0 |
| Preferred stock |  | - |  | 0.1 |  | - |  | 0.1 |
| Other debt instruments |  | - |  | 26.7 |  | - |  | 26.7 |
| Private equity investments |  | - |  | - |  | 16.1 |  | 16.1 |
| Total assets in the fair value hierarchy | \$ | 124.2 | \$ | 434.6 | \$ | 16.1 | \$ | 574.9 |
| Investments measured at net as set value (a) |  |  |  |  |  |  | \$ | 409.8 |
| Investments at fair value |  |  |  |  |  |  | \$ | 984.7 |

(a) In accordance w ith accounting standards, certain investments that w ere measured at net asset value (NAV) per share (or its equivalent) have not been classified in the fair value hierarchy. The fair value amounts presented in this table are intended to permit reconciliation of the fair value hierarchy to the line items presented in the statements of net assets available for benefits.

The pension plan's Level 1 assets consist primarily of interest bearing cash, including sweep accounts, mutual funds, and equity securities. Interest bearing cash, sweep accounts, and mutual funds are valued daily at the NAV of shares held by the pension plan as quoted in an active market. Equity securities are valued based on observable market prices.

The pension plan's Level 2 assets consist of corporate debt instruments, U.S. government securities, corporate debt instruments, other debt instruments, and preferred stock, which are valued based on yields currently available on comparable securities of issuers with similar credit ratings.

The pension plan's Level 3 assets consist of private equity investments and are considered alternative investments. The fair values of the investments in this category have been estimated based on partner pricing, appraisals or by investment managers with whom the portfolio resides.

## Benefit Payments

The following benefit payments (shown net of postretirement plan participants' contributions), which reflect expected future service as appropriate, are expected to be paid as follows:

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| Year | (Millions of Dollars) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Pension |  | Postretirement |  |
| 2020 | \$ | 73.4 | \$ | 3.0 |
| 2021 | \$ | 74.1 | \$ | 2.8 |
| 2022 | \$ | 74.5 | \$ | 2.6 |
| 2023 | \$ | 74.6 | \$ | 2.4 |
| 2024 | \$ | 74.3 | \$ | 2.3 |
| 2025-2029 | \$ | 358.1 | \$ | 8.0 |

Investments measured using NAV per Share Practical Expedient
The following table summarizes investments measured at fair value based on NAV per share as of December 31, 2019 and 2018, respectively.

|  | Fair Value |  | (Millions of Dollars) |  |  | Redemption Notice Period |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | ed ents | Redemption Frequency |  |
| Common collective trusts | \$ | 528.1 | \$ | - | Daily | None |
|  |  |  | (Millions of Dollars) |  |  |  |
|  | Fair Value |  | Unfunded Commitments |  | Redemption Frequency | Redemption Notice Period |
| Common collective trusts | \$ | 409.8 | \$ | - | Daily | None |

The following table sets forth a reconciliation primarily of changes in the fair value of pension plan assets classified as Level 3 in the fair value hierarchy for the years ended December 31, 2019 and 2018:

|  |  | (Millions of Dollars) |  |
| :--- | :---: | :---: | :---: |
| Private Equity Investments |  | 2019 | 2018 |
| Balance as of January 1, | $\$$ | 16.1 | $\$$ |
| Realized gains |  | 2.1 | 28.2 |
| Unrealized losses | $(4.5)$ | $(4.3)$ |  |
| Purchases | - | 0.1 |  |
| Settlements |  | $(3.1)$ | $(12.3)$ |
| Balance as of December 31 | $\$$ | $10.6 \$$ | 16.1 |

## Retirement Savings Plans

There are separate 401(k) retirement savings plans for the Company's management and International Brotherhood of Electrical Workers (IBEW) represented employees.

The Holdings 401 (k) Retirement Savings Plan provides for employer contributions that vary by subsidiary. Contributions may include a participant base match, automatic contributions, and a participant incentive match. Compensation costs, excluding incentive match, that were charged to expense or construction related to this $401(\mathrm{k})$ plan were $\$ 3.3$ million and $\$ 2.7$ million for the years ended December 31, 2019 and 2018.

The Company's 401(k) Retirement Savings Plan for IBEW Represented Employees provides that the Company will match employee contributions with a base match and an additional incentive match. The Company recognized compensation charges, excluding incentive match, in expense or construction related to this plan of $\$ 2.6$ million for the years ended December 31, 2019 and 2018, respectively.

A 2019 and 2018 incentive target was established for the Holdings 401(k) Retirement Savings Plan and for the Company's 401(k) Retirement Savings Plan for IBEW Represented Employees, for which the Company will match

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employee contributions with a base match and an additional incentive match if the target is met. In 2019 and 2018, the incentive target was not achieved.

In 2019, the Company approved an increase to the non-elective core contribution amounts from $3.0 \%$ to $5.0 \%$ for both IBEW and management employees effective January 1, 2020.

## SECURE Act \& More

On December 20, 2019, The Further Consolidated Appropriations Act was passed and signed into law. The "SECURE Act \& More" inclusion of the act contains legislation changes to employer-provided benefit programs. The new law includes updates such as an increase in the age for required minimum distributions from age $701 / 2$ to age 72 for both defined benefit and defined contribution plans, requirements for in-service distributions to be available at age $591 / 2$ for defined benefit pension plans, new rules for providing part-time employees access to 401(k) plans, as well as other provisions. The Company is still in progress of measuring impacts associated with the new legislation, which became effective as of January 1, 2020.

## 9. Commitments and Contingencies

## Employees - IBEW Contract

The Company is a party to a labor contract with the IBEW Local 29, which represents $53.0 \%$ of its approximately 1,600 employees. In October 2019, members of the IBEW ratified a new four year labor contract extension that commenced on October 1, 2019 and expires on September 30, 2023. The agreement addressed key topics such as wages, retirement and workforce renewal and investment, while maintaining quality healthcare and benefit offerings at affordable levels.

## Environmental Liabilities

In 1992, the Pennsylvania Department of Environmental Protection (DEP) issued Residual Waste Management Regulations governing the generation and management of non-hazardous residual waste, such as coal ash. Following the divestiture of its generation assets, the Company retained certain facilities that remain subject to these regulations. The Company has assessed the residual waste management sites and the DEP has approved the Company's compliance strategies. The total undiscounted expected costs associated with the Company's compliance strategies were approximately $\$ 2.1$ million and $\$ 2.2$ million as of December 31, 2019 and 2018, respectively. As of December 31, 2019 and 2018, the expected discounted costs of compliance, using a discount rate of $5.75 \%$ and $6.00 \%$, respectively, were approximately $\$ 1.5$ million and $\$ 1.4$ million with respect to sites that the Company continues to own. These costs were previously recovered from ratepayers.

The Company also owns the closed Warwick Mine, located along the Monongahela River in Greene County, Pennsylvania. This property had been used in the electricity supply business segment. The remaining liability represents amounts for mine water treatment and certain healthcare liabilities. As of December 31, 2019 and 2018, the Company's estimated discounted liability, using a discount rate of $5.75 \%$ and $6.00 \%$, respectively, for mine water treatment and certain healthcare costs, was approximately $\$ 12.5$ million and $\$ 13.7$ million, respectively. The Company's undiscounted estimated liability associated with mine water treatment is approximately $\$ 0.8$ million per year, perpetually. These costs were previously recovered from ratepayers.

The Company was directed by the Environmental Protection Agency (EPA) pursuant to Section 308 of the Clean Water Act to perform water quality testing at the outfalls at the closed Warwick facility. The Company cannot predict the EPA's response to the testing results.

The discounted amounts associated with the Company's liabilities are combined and included in legacy liabilities on the balance sheets.

## Litigation

In the ordinary course of business, various legal claims and proceedings are pending or threatened against the Company. While the amounts claimed may be substantial, the Company is unable to predict with certainty the ultimate outcome of such claims and proceedings. The Company has established reserves for pending litigation, which it believes are adequate, and after consultation with counsel and giving appropriate consideration to available insurance, the Company believes that the ultimate outcome of any matter currently pending will not materially affect the financial statements.

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## Off-Balance Sheet Arrangements

Except for the letters of credit (LOCs) discussed in Note 10, the Company does not have any material off-balance sheet financial arrangements.

## 10. Long-Term Debt and Revolving Credit Facilities

On October 31, 2019, the Company entered into an agreement to amend and extend its existing credit agreement, which would have terminated on November 24, 2021. The amended credit agreement allows for a revolving credit facility borrowing capacity of $\$ 250.0$ million, with a final maturity date of October 31, 2024.

The Company is permitted to increase the size of its revolving credit facility by up to $\$ 50.0$ million. This expansion feature is unfunded. The revolving credit facility permits borrowings at the London Interbank Offered Rate (LIBOR) plus a margin of $0.75 \%$ to $1.25 \%$ or an alternate base rate plus a margin of $0.0 \%$ to $0.25 \%$. The revolving credit facility also has annual commitment fees ranging from $0.06 \%$ to $0.175 \%$. Interest rates and commitment fees are based on the Company's then-current senior debt rating. A portion of the revolving credit facility not in excess of $\$ 50.0$ million is available for the issuance of LOCs.

As of December 31, 2019 and 2018, the Company had zero and $\$ 45.0$ million in borrowings under the revolving credit facility. During the year ended December 31, 2019, the maximum amount of credit facility borrowings outstanding was $\$ 145.0$ million and the average daily borrowings were $\$ 47.4$ million. As of December 31, 2019 and 2018, the Company had zero current debt maturities. As of December 31, 2019 and 2018, the Company had $\$ 0.1$ million of outstanding LOCs issued under the revolving credit facility, and $\$ 0.8$ million and $\$ 0.9$ million of outstanding LOCs issued under stand-alone facilities unrelated to the revolving credit facility, respectively.

The credit agreement contains a covenant package consistent with investment grade companies, including default provisions for non-payment. As of December 31, 2019 and 2018, the Company was in compliance with these covenants.

The following table summarizes the long-term debt that is included in the balance sheets:

| Long-term Debt as of December 31, |  | (Millions of Dollars) |  |  |
| :--- | :---: | :---: | :---: | ---: |
|  | Interest |  | Principal Outstanding |  |
|  | Rate ${ }^{\star}$ | Maturity | 2019 | 2018 |
| First Mortgage Bonds (a) | $3.78-5.12 \%$ | $2042-2058$ | $1,195.0$ | $1,195.0$ |
| Revolver Borrowings (b) | Variable | 2024 | - | 45.0 |
| Total Long-Term Debt |  |  | $\$$ | $1,195.0$ |

(a) Excludes first mortgage bonds issued to secure pollution control notes. First mortgage bonds are all subject to make whole provisions if the bonds are redeemed prior to their stated maturity or par call date.
(b) The average rate was $3.49 \%$ for the year ended December 31, 2019.

The average rate was $3.04 \%$ for the year ended December 31, 2018.

* Interest rates and maturities reflect 2019 principal information.

In December 2019, the PUC approved the Company's application for a securities certificate requesting approval to issue up to $\$ 400.0$ million of debt in the form of first mortgage bonds, unsecured notes, pollution control revenue bonds (PCRBs) and/or long-term borrowings from Holdings, through December 31, 2021. The total available amount under the securities certificate was $\$ 400.0$ million as of December 31, 2019.

An existing PUC approved affiliated interest agreement is maintained between the Company and Holdings, which authorizes short-term borrowings up to $\$ 200.0$ million at market rates from Holdings to the Company. As of December 31, 2019, the Company was authorized to issue up to $\$ 425.0$ million of short-term debt under the terms of a FERC order approved in August 2019. As of December 31, 2019, the Company had $\$ 85.0$ million in borrowings outstanding under these approvals.

As of December 31, 2019, maturities of long-term debt outstanding, excluding revolving credit facility borrowings, for the next five years are zero.

Interest costs attributable to debt (excluding amounts capitalized as AFUDC) were $\$ 56.1$ million and $\$ 55.6$ million for the years ended December 31, 2019 and 2018, respectively. Amounts capitalized as AFUDC were $\$ 3.9$ million and $\$ 2.3$ million for the years ended December 31, 2019 and 2018, respectively. Debt discount or premium and related issuance

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expenses are amortized over the lives of the applicable issues.
The fair value of long-term debt, including revolver borrowings, is estimated using quoted market prices for the same or similar issues, or current rates offered for debt of the same remaining maturities and is categorized as Level 2 in the fair value hierarchy. As of December 31, 2019, the estimated fair value of long-term debt, including revolver borrowings, was $\$ 1,370.5$ million. The principal amount was $\$ 1,195.0$ million as of December 31, 2019.

## 11. Transactions with Affiliates

The Company participates in a tax sharing arrangement with Holdings to provide, among other things, for the payment of taxes for periods during which Holdings and the Company are included in the same consolidated group for federal tax purposes. The Company shares in the consolidated tax liability to the extent of the Company's income or loss for the year (see Note 6). The Company made tax sharing payments of $\$ 29.9$ million and $\$ 19.3$ million to Holdings for the year ended December 31, 2019 and December 31, 2018 respectively. The Company received state and federal tax refunds of $\$ 1.2$ million and $\$ 0.4$ million for the years ended December 31, 2019 and December 31, 2018, respectively.

The Company charges an administrative fee to Holdings and its affiliates based on an allocation method that considers the cost of actual or estimated services performed and other expenses incurred on behalf of Holdings or its affiliates. Holdings also charge an administrative fee to the Company, as well as its other subsidiaries.

The Company collects pole and duct revenue from DQE Communications, its affiliate, and pays it for the rental of communication fiber.

Certain of the Company's revenues and expenses relate to transactions with Holdings and its affiliates, including the following:

|  | (Millions of Dollars) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | 2019 |  | 2018 |  |
| Revenues and Other Income: |  |  |  |  |
| Duct and pole rental revenue | \$ | 1.2 | \$ | 1.2 |
| Expenses: |  |  |  |  |
| Ancillary charges | \$ | 0.1 | \$ | 1.8 |
| Administrative cost allocations (a) | \$ | (2.6) | \$ | (2.0) |
| Rental of communication fiber | \$ | 4.0 | \$ | 3.6 |
| Interest on short-term and long-term affiliate borrowings (b) | \$ | 2.0 | \$ | - |

(a) Allocated labor charges include the associated fringe benefits, including pension and health care costs.
(b) For the year ended December 31, 2019 interest rates were LIBOR plus a margin of $1.25 \%$ on short-term intercompany facility. The Company had no affiliate borrow ings for the year ended December 31, 2018.

## 12. Supplemental Cash Flow Disclosure

|  | As of December 31, |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
|  |  | 2019 | 2018 |  |
| Cash (Account 131) | $\$$ | $2,781,400$ | $\$$ | $(4,982,218)$ |
| Working Fund (Account 135) |  | 10,000 | 10,000 |  |
| Temporary Cash Investments (Account 136) | $\$$ | $3,900,000$ | $11,100,000$ |  |
| Total | $\$ 6,691,400$ | $\$$ | $6,127,782$ |  |

Non-cash investing activity in 2019 and 2018 included a $\$ 15.9$ million increase and a $\$ 2.8$ million increase, respectively, in accounts payable related to construction expenditures. As of December 31, 2019 and 2018, the amount of capital expenditures included within accounts payable was $\$ 49.4$ million and $\$ 33.5$ million, respectively.

| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) X An Original <br> (2) _ A Resubmission | $\begin{gathered} \text { Date of Report } \\ \text { (Mo, Da, Yr) } \\ 04 / 29 / 2020 \end{gathered}$ | Year/Period of Report |
| :---: | :---: | :---: | :---: |
| NOTES TO FINANCIAL STATEMENTS (Continued) |  |  |  |


|  | (Millions of Dollars) <br> Years Ended December 31, |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Cash paid during the year | 2019 |  |  |  |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |
| :--- | :--- | :--- | :--- |
| Duquesne Light Company | $(1)$ XAn Original | (Mo, Da, Yr) |  |
|  | $(2)$ | $\square$ A Resubmission | $04 / 29 / 2020$ |

1. Report in columns (b),(c),(d) and (e) the amounts of accumulated other comprehensive income items, on a net-of-tax basis, where appropriate.
2. Report in columns (f) and (g) the amounts of other categories of other cash flow hedges.
3. For each category of hedges that have been accounted for as "fair value hedges", report the accounts affected and the related amounts in a footnote.
4. Report data on a year-to-date basis.

| $\begin{array}{\|l\|l} \text { Line } \\ \text { No. } \end{array}$ | Item <br> (a) | Unrealized Gains and Losses on Available-for-Sale Securities <br> (b) | Minimum Pension Liability adjustment (net amount) (c) | Foreign Currency Hedges <br> (d) | Other Adjustments <br> (e) |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Balance of Account 219 at Beginning of Preceding Year |  |  |  | 266,274 |
| 2 | Preceding Qtr/Yr to Date Reclassifications from Acct 219 to Net Income |  |  |  |  |
| 3 | Preceding Quarter/Year to Date Changes in Fair Value |  |  |  | 1,048,161 |
| 4 | Total (lines 2 and 3) |  |  |  | 1,048,161 |
| 5 | Balance of Account 219 at End of Preceding Quarter/Year |  |  |  | 1,314,435 |
| 6 | Balance of Account 219 at Beginning of Current Year |  |  |  | 1,314,435 |
| 7 | Current Qtr/Yr to Date Reclassifications from Acct 219 to Net Income |  |  |  |  |
| 8 | Current Quarter/Year to Date Changes in Fair Value |  |  |  | ( 3,183,274) |
| 9 | Total (lines 7 and 8) |  |  |  | ( 3,183,274) |
| 10 | Balance of Account 219 at End of Current Quarter/Year |  |  |  | ( 1,868,839) |
|  |  |  |  |  |  |



| Name of Respondent | This Report Is: | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original (2) $\square$ | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

Report in Column (c) the amount for electric function, in column (d) the amount for gas function, in column (e), (f), and (g) report other (specify) and in column (h) common function.



| Name of Respondent | This Report Is: | Date of Report | Year/ | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAA Original <br> (2) $\quad$ A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |

1. Report below the original cost of electric plant in service according to the prescribed accounts.
2. In addition to Account 101, Electric Plant in Service (Classified), this page and the next include Account 102, Electric Plant Purchased or Sold; Account 103, Experimental Electric Plant Unclassified; and Account 106, Completed Construction Not Classified-Electric.
3. Include in column (c) or (d), as appropriate, corrections of additions and retirements for the current or preceding year.
4. For revisions to the amount of initial asset retirement costs capitalized, included by primary plant account, increases in column (c) additions and reductions in column (e) adjustments.
5. Enclose in parentheses credit adjustments of plant accounts to indicate the negative effect of such accounts.
6. Classify Account 106 according to prescribed accounts, on an estimated basis if necessary, and include the entries in column (c). Also to be included in column (c) are entries for reversals of tentative distributions of prior year reported in column (b). Likewise, if the respondent has a significant amount of plant retirements which have not been classified to primary accounts at the end of the year, include in column (d) a tentative distribution of such retirements, on an estimated basis, with appropriate contra entry to the account for accumulated depreciation provision. Include also in column (d)

| $\begin{aligned} & \text { Line } \\ & \text { No. } \end{aligned}$ | Account <br> (a) | Balance Beginning of Year <br> (b) | Additions <br> (c) |
| :---: | :---: | :---: | :---: |
| 1 | 1. INTANGIBLE PLANT |  |  |
| 2 | (301) Organization | 103,416 | $-3,141$ |
| 3 | (302) Franchises and Consents | 6,830 |  |
| 4 | (303) Miscellaneous Intangible Plant | 292,595,252 | 41,850,682 |
| 5 | TOTAL Intangible Plant (Enter Total of lines 2, 3, and 4) | 292,705,498 | 41,847,541 |
| 6 | 2. PRODUCTION PLANT |  |  |
| 7 | A. Steam Production Plant |  |  |
| 8 | (310) Land and Land Rights |  |  |
| 9 | (311) Structures and Improvements |  |  |
| 10 | (312) Boiler Plant Equipment |  |  |
| 11 | (313) Engines and Engine-Driven Generators |  |  |
| 12 | (314) Turbogenerator Units |  |  |
| 13 | (315) Accessory Electric Equipment |  |  |
| 14 | (316) Misc. Power Plant Equipment |  |  |
| 15 | (317) Asset Retirement Costs for Steam Production |  |  |
| 16 | TOTAL Steam Production Plant (Enter Total of lines 8 thru 15) |  |  |
| 17 | B. Nuclear Production Plant |  |  |
| 18 | (320) Land and Land Rights |  |  |
| 19 | (321) Structures and Improvements |  |  |
| 20 | (322) Reactor Plant Equipment |  |  |
| 21 | (323) Turbogenerator Units |  |  |
| 22 | (324) Accessory Electric Equipment |  |  |
| 23 | (325) Misc. Power Plant Equipment |  |  |
| 24 | (326) Asset Retirement Costs for Nuclear Production |  |  |
| 25 | TOTAL Nuclear Production Plant (Enter Total of lines 18 thru 24) |  |  |
| 26 | C. Hydraulic Production Plant |  |  |
| 27 | (330) Land and Land Rights |  |  |
| 28 | (331) Structures and Improvements |  |  |
| 29 | (332) Reservoirs, Dams, and Waterways |  |  |
| 30 | (333) Water Wheels, Turbines, and Generators |  |  |
| 31 | (334) Accessory Electric Equipment |  |  |
| 32 | (335) Misc. Power PLant Equipment |  |  |
| 33 | (336) Roads, Railroads, and Bridges |  |  |
| 34 | (337) Asset Retirement Costs for Hydraulic Production |  |  |
| 35 | TOTAL Hydraulic Production Plant (Enter Total of lines 27 thru 34) |  |  |
| 36 | D. Other Production Plant |  |  |
| 37 | (340) Land and Land Rights |  |  |
| 38 | (341) Structures and Improvements |  |  |
| 39 | (342) Fuel Holders, Products, and Accessories |  |  |
| 40 | (343) Prime Movers |  |  |
| 41 | (344) Generators |  |  |
| 42 | (345) Accessory Electric Equipment |  |  |
| 43 | (346) Misc. Power Plant Equipment |  |  |
| 44 | (347) Asset Retirement Costs for Other Production |  |  |
| 45 | TOTAL Other Prod. Plant (Enter Total of lines 37 thru 44) |  |  |
| 46 | TOTAL Prod. Plant (Enter Total of lines 16, 25, 35, and 45) |  |  |
|  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report <br> $(\mathrm{Mo}, \mathrm{Da}, \mathrm{Yr})$ <br> Duquesne Light Company | (1) XAn Original |
| :--- | :--- | :--- | :--- |
|  | $(2)$ | $\square$ A Resubmission | Year/Period of Report |
| End of |  |  |  |
| 2019/Q4 |  |  |  |

ELECTRIC PLANT IN SERVICE (Account 101, 102, 103 and 106) (Continued)
distributions of these tentative classifications in columns (c) and (d), including the reversals of the prior years tentative account distributions of these amounts. Careful observance of the above instructions and the texts of Accounts 101 and 106 will avoid serious omissions of the reported amount of respondent's plant actually in service at end of year.
7. Show in column (f) reclassifications or transfers within utility plant accounts. Include also in column (f) the additions or reductions of primary account classifications arising from distribution of amounts initially recorded in Account 102, include in column (e) the amounts with respect to accumulated provision for depreciation, acquisition adjustments, etc., and show in column (f) only the offset to the debits or credits distributed in column (f) to primary account classifications.
8. For Account 399, state the nature and use of plant included in this account and if substantial in amount submit a supplementary statement showing subaccount classification of such plant conforming to the requirement of these pages.
9. For each amount comprising the reported balance and changes in Account 102, state the property purchased or sold, name of vendor or purchase, and date of transaction. If proposed journal entries have been filed with the Commission as required by the Uniform System of Accounts, give also date

| Retirements <br> (d) | Adjustments <br> (e) | Transfers <br> (f) | Balance at End of Year (g) | Line <br> No. |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | 1 |
|  |  |  | 100,275 | 2 |
|  |  |  | 6,830 | 3 |
| 14,578,220 | 5,677,403 |  | 325,545,117 | 4 |
| 14,578,220 | 5,677,403 |  | 325,652,222 | 5 |
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| Name of Respondent Duquesne Light Company |  | This Report Is: <br> (1) $\triangle$ An Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/P <br> End of | $\begin{aligned} & \text { of Report } \\ & \text { 2019/Q4 } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| CONSTRUCTION WORK IN PROGRESS - - ELECTRIC (Account 107) |  |  |  |  |  |
| 1. Report below descriptions and balances at end of year of projects in process of construction (107) <br> 2. Show items relating to "research, development, and demonstration" projects last, under a caption Research, Development, and Demonstrating (see Account 107 of the Uniform System of Accounts) <br> 3. Minor projects ( $5 \%$ of the Balance End of the Year for Account 107 or $\$ 1,000,000$, whichever is less) may be grouped. |  |  |  |  |  |
| Line <br> No. | Description of Project <br> (a) |  |  | Construction work in progress Electric (Account 107) <br> (b) |  |
| 1 | CCB Technical \& Function Upgrade |  |  |  | 44,561,379 |
| 2 | SCADA Holistic, RTU, Change DNP Poi |  |  |  | 7,113,572 |
| 3 | Panther Hollow Dist.SS-Des.\&Materia |  |  |  | 6,738,395 |
| 4 | OPGW Universal-Plum Z154 Undergroun |  |  |  | 5,247,979 |
| 5 | Midland-Hookstown D22870 - Pole Tra |  |  |  | 4,647,467 |
| 6 | Oracle UCS Archit.Migrat.-Hardware |  |  |  | 4,609,351 |
| 7 | Hosting \& Data Center Hardware |  |  |  | 4,158,085 |
| 8 | Support OSI - DSCADA project |  |  |  | 3,978,223 |
| 9 | Elrama-Wilson Z-17-Recon \& Estab |  |  |  | 3,697,401 |
| 10 | Darlington SS Elimin Phase 2 |  |  |  | 3,593,168 |
| 11 | TSCADA \& EMS-Replace Hardware |  |  |  | 3,250,608 |
| 12 | Dravosburg-Elrama Z-75-Rec.\&Estab |  |  |  | 3,076,289 |
| 13 | Rochester/Valley 4kv Distribution S |  |  |  | 2,958,465 |
| 14 | PANTHER HOLLOW SS |  |  |  | 2,552,803 |
| 15 | Z-24 Reconductor Crescent-Montour |  |  |  | 2,526,329 |
| 16 | Z143 Reconductor Crescent-Sewickley |  |  |  | 2,377,713 |
| 17 | West Deer-Pine Creek Z-103 |  |  |  | 2,127,698 |
| 18 | Suspense work order |  |  |  | 2,086,310 |
| 19 | Electrical Modeling Tool-Software |  |  |  | 2,082,569 |
| 20 | DSCADA Replace Hardware |  |  |  | 1,956,544 |
| 21 | MWM Upgrade-Software |  |  |  | 1,888,805 |
| 22 | Montour SS Yard Expansion etc |  |  |  | 1,778,753 |
| 23 | Z-43 Reconductor B.I.-Sewickley |  |  |  | 1,771,202 |
| 24 | Elrama SS-New Substation |  |  |  | 1,627,864 |
| 25 | BIP Timekeeping Replacement |  |  |  | 1,591,903 |
| 26 | Install Potter-Nova 138kV Line |  |  |  | 1,505,783 |
| 27 | Woodville SS - Spare 50 MVA Tfmr |  |  |  | 1,375,320 |
| 28 | Z44 Reconductor B.I.-Montour |  |  |  | 1,338,160 |
| 29 | Hosting \& Data Ctr. Software/Labor |  |  |  | 1,182,095 |
| 30 | Woods Run Microgrid Line Work |  |  |  | 1,116,102 |
| 31 | Darlington SS Elimin Phase 3 |  |  |  | 1,049,127 |
| 32 | Minor Projects Total |  |  |  | 79,776,833 |
| 33 |  |  |  |  |  |
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| 42 |  |  |  |  |  |
| 43 | TOTAL |  |  |  | 209,342,295 |


| Name of Respondent | This Rep | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $X$ An Original <br> (2) $\square$ A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |

1. Explain in a footnote any important adjustments during year.
2. Explain in a footnote any difference between the amount for book cost of plant retired, Line 11, column (c), and that reported for electric plant in service, pages 204-207, column 9d), excluding retirements of non-depreciable property.
3. The provisions of Account 108 in the Uniform System of accounts require that retirements of depreciable plant be recorded when such plant is removed from service. If the respondent has a significant amount of plant retired at year end which has not been recorded and/or classified to the various reserve functional classifications, make preliminary closing entries to tentatively functionalize the book cost of the plant retired. In addition, include all costs included in retirement work in progress at year end in the appropriate functional classifications.
4. Show separately interest credits under a sinking fund or similar method of depreciation accounting.

| Section A. Balances and Changes During Year |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \end{array}$ | $\begin{aligned} & \text { Item } \\ & \text { (a) } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Total } \\ & (\mathrm{c}+\mathrm{d}+\mathrm{e}) \end{aligned}$ (b) | Electric Plant in Service (c) | Electric Prant Held for Future Use <br> (d) | Leactric Plant <br> (e) |
| 1 | Balance Beginning of Year | 1,239,491,720 | 1,239,491,720 |  |  |
| 2 | Depreciation Provisions for Year, Charged to |  |  |  |  |
| 3 | (403) Depreciation Expense | 121,994,027 | 121,994,027 |  |  |
| 4 | (403.1) Depreciation Expense for Asset Retirement Costs |  |  |  |  |
| 5 | (413) Exp. of Elec. Plt. Leas. to Others |  |  |  |  |
| 6 | Transportation Expenses-Clearing |  |  |  |  |
| 7 | Other Clearing Accounts |  |  |  |  |
| 8 | Other Accounts (Specify, details in footnote): |  |  |  |  |
| 9 |  |  |  |  |  |
| 10 | TOTAL Deprec. Prov for Year (Enter Total of lines 3 thru 9) | 121,994,027 | 121,994,027 |  |  |
| 11 | Net Charges for Plant Retired: |  |  |  |  |
| 12 | Book Cost of Plant Retired | 48,611,180 | 48,611,180 |  |  |
| 13 | Cost of Removal | 20,820,323 | 20,820,323 |  |  |
| 14 | Salvage (Credit) | 4,026,317 | 4,026,317 |  |  |
| 15 | TOTAL Net Chrgs. for Plant Ret. (Enter Total of lines 12 thru 14) | 65,405,186 | 65,405,186 |  |  |
| 16 | Other Debit or Cr. Items (Describe, details in footnote): | 98,643 | 98,643 |  |  |
| 17 |  |  |  |  |  |
| 18 | Book Cost or Asset Retirement Costs Retired |  |  |  |  |
| 19 | Balance End of Year (Enter Totals of lines 1, 10, 15, 16, and 18) | 1,296,179,204 | 1,296,179,204 |  |  |
|  | Section | ces at End of Year | ording to Functiona | lassification |  |
| 20 | Steam Production |  |  |  |  |
| 21 | Nuclear Production |  |  |  |  |
| 22 | Hydraulic Production-Conventional |  |  |  |  |
| 23 | Hydraulic Production-Pumped Storage |  |  |  |  |
| 24 | Other Production |  |  |  |  |
| 25 | Transmission | 285,546,176 | 285,546,176 |  |  |
| 26 | Distribution | 863,900,295 | 863,900,295 |  |  |
| 27 | Regional Transmission and Market Operation |  |  |  |  |
| 28 | General | 146,732,733 | 146,732,733 |  |  |
| 29 | TOTAL (Enter Total of lines 20 thru 28) | 1,296,179,204 | 1,296,179,204 |  |  |
|  |  |  |  |  |  |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report <br> 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |


| Schedule Page: 219 Line No.: 12 Column: c |
| :--- |
| Reconciliation of Page 219, Line 12 to Pages 204-207, Line 104, Column (d): |
| Book Cost of Plant Retired (Page 219, Line 12) |
| Retirements to Account 111 Property |
| Schedule Page: 219 Line No.: 16 Column: c <br> Other Debit or Credit Items: <br> (Gain)/Loss on Plant Retirements <br> ARO Depreciation recorded on Reg Asset <br> Other Accounting Adjustments/Transfers |



| Name of Respondent | This Report Is: <br> (1) $X$ An Original <br> (2) A Resubmission |  | $\begin{aligned} & \hline \text { Date of Report } \\ & (\mathrm{Mo}, \mathrm{Da}, \mathrm{Yr}) \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report <br> End of 2019/Q4 |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  |  |  |

1. Report the particulars (details) called for concerning the costs incurred and the reimbursements received for performing transmission service and generator interconnection studies.
2. List each study separately.
3. In column (a) provide the name of the study.
4. In column (b) report the cost incurred to perform the study at the end of period.
5. In column (c) report the account charged with the cost of the study.
6. In column (d) report the amounts received for reimbursement of the study costs at end of period.
7. In column (e) report the account credited with the reimbursement received for performing the study.

| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \\ \hline \end{array}$ | Description <br> (a) | Costs Incurred During Period <br> (b) | Account Charged <br> (c) | Reimbursements Received During the Period <br> (d) | Account Credited With Reimbursement <br> (e) |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Transmission Studies |  |  |  |  |
| 2 |  |  |  |  |  |
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| 19 |  |  |  |  |  |
| 20 |  |  |  |  |  |
| 21 | Generation Studies |  |  |  |  |
| 22 | AE2-114 Cain Road Solar 23kv | 1,445 | 4010000 |  |  |
| 23 | AE2-116 Hill Road Solar 23kv | 1,362 | 4010000 |  |  |
| 24 | AE2-115 Dam Road Solar 23kv | 2,735 | 4010000 |  |  |
| 25 | AE2-114 Distribution Gen Int |  |  | 2,318 | 4010000 |
| 26 | AE2-115 Distribution Gen Int | 162 | 4010000 |  |  |
| 27 | AE2-116 Distribution Gen Int | 162 | 4010000 |  |  |
| 28 | Almonco Ridc Mill 19 | 5 | 4010000 |  |  |
| 29 | PIT Microgrid Study | 2 | 4010000 |  |  |
| 30 |  |  |  |  |  |
| 31 |  |  |  |  |  |
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| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $X A n$ Original <br> (2) A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

## OTHER REGULATORY ASSETS (Account 182.3

1. Report below the particulars (details) called for concerning other regulatory assets, including rate order docket number, if applicable.
2. Minor items (5\% of the Balance in Account 182.3 at end of period, or amounts less than $\$ 100,000$ which ever is less), may be grouped
by classes.
3. For Regulatory Assets being amortized, show period of amortization.

| Line | Description and Purpose of | Balance at Beginning | Debits | CR | DITS |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | Other Regulatory Assets <br> (a) | of Current Quarter/Year <br> (b) | (c) | Written off During the Quarter / Year Account Charged <br> (d) | Written off During the Period Amount <br> (e) | Current Quarter/Year (f) |
| 1 | Compensated Absences | 5,262,374 |  | 232.45 | 146,577 | 5,115,797 |
| 2 |  |  |  |  |  |  |
| 3 | Pension | 219,307,071 | 14,246,544 | Various | 26,103,862 | 207,449,753 |
| 4 |  |  |  |  |  |  |
| 5 | Rate Case Distribution - 2018 | 2,091,187 | 284,443 | 928 | 979,650 | 1,395,980 |
| 6 |  |  |  |  |  |  |
| 7 | POLR VIII | 304,255 | 1,037,631 | 426.2 | 1,336,381 | 5,505 |
| 8 |  |  |  |  |  |  |
| 9 | POLRIX |  | 4,950 |  |  | 4,950 |
| 10 |  |  |  |  |  |  |
| 11 | Smart Meters | 377,897 | 2,137,673 | Various | 1,528,283 | 987,287 |
| 12 |  |  |  |  |  |  |
| 13 | Eligible Customer Lists | 453,066 | 10,089 | 928 | 89,209 | 373,946 |
| 14 |  |  |  |  |  |  |
| 15 | FERC Formula Annual Update Filing | 5,808,998 | 1,162,917 | 456.15 | 6,754,489 | 217,426 |
| 16 |  |  |  |  |  |  |
| 17 | Rider 5 Surcharge |  | 25,168,730 | Various | 19,827,209 | 5,341,521 |
| 18 |  |  |  |  |  |  |
| 19 | Pension - Rate Case Settlement |  | 10,833,333 | 920.38 | 10,833,333 |  |
| 20 |  |  |  |  |  |  |
| 21 | Cloud Computing | 5,179,247 |  | Various | 5,179,247 |  |
| 22 |  |  |  |  |  |  |
| 23 | STAS | 44,646 |  | Various | 44,646 |  |
| 24 |  |  |  |  |  |  |
| 25 | ADMS | 250,403 | 2,572,764 | Various | 2,616,529 | 206,638 |
| 26 |  |  |  |  |  |  |
| 27 | DSIC |  | 5,879,470 | Various | 5,350,221 | 529,249 |
| 28 |  |  |  |  |  |  |
| 29 | Electric Vehicle Rebate Program |  | 415,820 |  |  | 415,820 |
| 30 |  |  |  |  |  |  |
| 31 | Act 129 Energy Efficiency | 435,964 |  | Various | 435,964 |  |
| 32 |  |  |  |  |  |  |
| 33 |  |  |  |  |  |  |
| 34 |  |  |  |  |  |  |
| 35 |  |  |  |  |  |  |
| 36 |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |
| 38 |  |  |  |  |  |  |
| 39 |  |  |  |  |  |  |
| 40 |  |  |  |  |  |  |
| 41 |  |  |  |  |  |  |
| 42 |  |  |  |  |  |  |
| 43 |  |  |  |  |  |  |
| 44 | TOTAL: | 239,515,108 | 63,754,364 |  | 81,225,600 | 222,043,872 |
|  |  |  |  |  |  |  |


| Name of Respondent | This Report is: <br> (1) X An Original <br> $(2)$ A Resubmission | Date of Report <br> (Mo, Da, Yr) <br> 04/29/2020 | Year/Period of Report |  |  |  |  |
| :--- | :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

Schedule Page: 232 Line No.: 1 Column: a
These amounts represent recovery of costs associated with employee vacation and are being recovered over a period of up to three years.

Schedule Page: 232 Line No.: 3 Column: a
These amounts represent future recoverable pension costs. Amounts are being recovered over the remaining life of the Company's retirement plan.

Schedule Page: 232 Line No.: 5 Column: a
These amounts represent future recoverable costs related to the Company's distribution rate case filing, which are amortized over a period of up to three years.

Schedule Page: 232 Line No.: 7 Column: a
These amounts represent future recoverable costs incurred related to the POLR VIII filing and are amortized over a period of up to three years.

Schedule Page: 232 Line No.: 9 Column: a
These amounts represent future recoverable costs incurred related to the POLR IX filing and are amortized over a period of up to three years.
Schedule Page: 232 Line No.: 11 Column: a
Represents amounts received from customers related to the Smart Meters program. These amounts will be amortized as the Company continues to incur costs associated with these programs.

Schedule Page: 232 Line No.: 13 Column: a
Represents the costs incurred by the Company in order to update the electric Eligible Customers Lists (ECL), which are made available to Electric Generation Suppliers (EGSs). Costs are recovered over a period of up to two years.

## Schedule Page: 232 Line No.: 15 Column: a

Represents the difference between the estimated revenue requirement billed to customers and the actual revenue requirement calculated after a calendar year's books are final.

Schedule Page: 232 Line No.: 17 Column: a
These amounts represent costs recovered from customers associated with the Company's Universal Services Programs. These amounts will be amortized as the Company continues to incur costs associated with these programs.

Schedule Page: 232 Line No.: 19 Column: a
These amounts represent recovery of $\$ 5.0 \mathrm{M}$ in pension contributions as agreed upon

| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report <br> 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

per the 2018 rate case settlement.

## Schedule Page: 232 Line No.: 21 Column: a

These amounts represent costs incurred for cloud computing services. These amounts will be amortized over a period of up to five years. Per FERC Order AI20-1-000, under Accounting Standard Update (ASU) No. 2018-15, cloud computing costs should be capitalized as a utility plant asset. Since the Company has adopted this ASU as of $12 / 31 / 2019$, cloud computing is no longer considered to be a regulatory asset. The Company moved the asset to Utility Plant (line 2 of page 110) and the accumulated depreciation to Accum. Prov. for Depr. Amort. Depl. (line 5 of page 110).

Schedule Page: 232 Line No.: 23 Column: a
Represents amounts received in advance from customers from the State Tax Adjustment Surcharge. This surcharge pertains to the Company's obligation of state taxes due and any interest.

Schedule Page: 232 Line No.: 25 Column: a
These amounts represent ADMS costs permitted to be amortized.
Schedule Page: 232 Line No.: 27 Column: a
This balance relates to an undercollection of DSIC revenue. Under the 2019 rate case, DLC will be permitted to charge the DSIC when the total DSIC plant balances exceed the levels projected at the end of the fully projected future test year.
Schedule Page: 232 Line No.: 29 Column: a
This balance represents spending related to customer rebates for infrastructure to provide electric service to charging stations available to the public.
Schedule Page: 232 Line No.: 31 Column: a
These amounts represent the excess of revenue collected vs. costs incurred in regards to the company's Energy Efficiency Program.


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- |$\quad$| Year/Period of Report |
| :---: |
| End of |
| 2019/Q4 |

1. Report the information called for below concerning the respondent's accounting for deferred income taxes.
2. At Other (Specify), include deferrals relating to other income and deductions.

| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \end{array}$ | Description and Location <br> (a) | Balance of Begining of Year <br> (b) | Balance at End of Year <br> (c) |
| :---: | :---: | :---: | :---: |
| 1 | Electric |  |  |
| 2 |  | 226,071,629 | 205,397,659 |
| 3 |  |  |  |
| 4 |  |  |  |
| 5 |  |  |  |
| 6 |  |  |  |
| 7 | Other |  |  |
| 8 | TOTAL Electric (Enter Total of lines 2 thru 7) | 226,071,629 | 205,397,659 |
| 9 | Gas |  |  |
| 10 |  |  |  |
| 11 |  |  |  |
| 12 |  |  |  |
| 13 |  |  |  |
| 14 |  |  |  |
| 15 | Other |  |  |
| 16 | TOTAL Gas (Enter Total of lines 10 thru 15 |  |  |
| 17 | Other (Specify) |  |  |
| 18 | TOTAL (Acct 190) (Total of lines 8, 16 and 17) | 226,071,629 | 205,397,659 |
|  |  |  |  |

The change in account 190 is composed of:

| 410.1 | $\$(29,094,912)$ |
| :--- | ---: |
| 410.2 | $(1,417,655)$ |
| 411.1 | $32,053,970$ |
| 411.2 | 213,865 |
| AOCI | $1,293,408$ |
| Regulatory Liability - Property | $(23,722,646)$ |
|  |  |
| Activity in account 190 | $\$(20,673,970)$ |


| Name of Respondent Duquesne Light Company | This Report Is:(1) XAn Original(2) $\square$ A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  | End of | 2019/Q4 |

Report below the balance at the end of the year and the information specified below for the respective other paid-in capital accounts. Provide a subheading for each account and show a total for the account, as well as total of all accounts for reconciliation with balance sheet, Page 112. Add more columns for any account if deemed necessary. Explain changes made in any account during the year and give the accounting entries effecting such change.
(a) Donations Received from Stockholders (Account 208)-State amount and give brief explanation of the origin and purpose of each donation.
(b) Reduction in Par or Stated value of Capital Stock (Account 209): State amount and give brief explanation of the capital change which gave rise to amounts reported under this caption including identification with the class and series of stock to which related.
(c) Gain on Resale or Cancellation of Reacquired Capital Stock (Account 210): Report balance at beginning of year, credits, debits, and balance at end of year with a designation of the nature of each credit and debit identified by the class and series of stock to which related.
(d) Miscellaneous Paid-in Capital (Account 211)-Classify amounts included in this account according to captions which, together with brief explanations, disclose the general nature of the transactions which gave rise to the reported amounts.

| Line <br> No. | $\begin{gathered} \text { Item } \\ \hline(\mathrm{a}) \end{gathered}$ | $\begin{gathered} \text { Amount } \\ \text { (b) } \end{gathered}$ |
| :---: | :---: | :---: |
| 1 | Account 208 - Donations Received from Stockholders |  |
| 2 |  |  |
| 3 | Balance Beginning of Year \$99,090,351 |  |
| 4 |  |  |
| 5 | Ending Balance \$99,090,351 | 99,090,351 |
| 6 |  |  |
| 7 | SUBTOTAL - Account 208 | 99,090,351 |
| 8 |  |  |
| 9 | Account 209 - None |  |
| 10 |  |  |
| 11 | Account 210 - Gain on Resale or Cancellation of Reacquired Capital St |  |
| 12 |  |  |
| 13 | Balance Beginning of Year \$380,598,802 |  |
| 14 |  |  |
| 15 | Ending Balance \$380,598,802 | 380,598,802 |
| 16 |  |  |
| 17 | SUBTOTAL - Account 210 | 380,598,802 |
| 18 |  |  |
| 19 | Account 211 - Miscellaneous Paid in Capital |  |
| 20 |  |  |
| 21 | Balance Beginning of Year \$505,658,443 |  |
| 22 |  |  |
| 23 | Ending Balance \$505,658,443 | 505,658,443 |
| 24 |  |  |
| 25 | SUBTOTAL - Account 211 | 505,658,443 |
| 26 |  |  |
| 27 |  |  |
| 28 |  |  |
| 29 |  |  |
| 30 |  |  |
| 31 |  |  |
| 32 |  |  |
| 33 |  |  |
| 34 |  |  |
| 35 |  |  |
| 36 |  |  |
| 37 |  |  |
| 38 |  |  |
| 39 |  |  |
| 40 | TOTAL | 985,347,596 |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |
| :--- | :--- | :--- | :--- |
| Duquesne Light Company | $(1)$ XAn Original | (Mo, Da, Yr) <br> 24/29/2020 | End of |
|  | $(2)$ | $\square$ A Resubmission | 2019/Q4 |

1. Report by balance sheet account the particulars (details) concerning long-term debt included in Accounts 221, Bonds, 222, Reacquired Bonds, 223, Advances from Associated Companies, and 224, Other long-Term Debt.
2. In column (a), for new issues, give Commission authorization numbers and dates.
3. For bonds assumed by the respondent, include in column (a) the name of the issuing company as well as a description of the bonds.
4. For advances from Associated Companies, report separately advances on notes and advances on open accounts. Designate demand notes as such. Include in column (a) names of associated companies from which advances were received.
5. For receivers, certificates, show in column (a) the name of the court -and date of court order under which such certificates were issued.
6. In column (b) show the principal amount of bonds or other long-term debt originally issued.
7. In column (c) show the expense, premium or discount with respect to the amount of bonds or other long-term debt originally issued.
8. For column (c) the total expenses should be listed first for each issuance, then the amount of premium (in parentheses) or discount. Indicate the premium or discount with a notation, such as $(P)$ or (D). The expenses, premium or discount should not be netted.
9. Furnish in a footnote particulars (details) regarding the treatment of unamortized debt expense, premium or discount associated with issues redeemed during the year. Also, give in a footnote the date of the Commission's authorization of treatment other than as specified by the Uniform System of Accounts.

| Line <br> No. | Class and Series of Obligation, Coupon Rate (For new issue, give commission Authorization numbers and dates) <br> (a) | Principal Amount Of Debt issued <br> (b) | Total expense, Premium or Discount (c) |
| :---: | :---: | :---: | :---: |
| 1 | Account 221 - Bonds |  |  |
| 2 |  |  |  |
| 3 | First Collateral Trust Bonds: |  |  |
| 4 | 4.97\% 1st Mort Bond due 11/14/2043 | 160,000,000 | 962,455 |
| 5 | 4.76\% 1st Mort Bond due 02/03/2042 | 200,000,000 | 1,685,878 |
| 6 | 5.02\% 1st Mort Bond due 02/04/2044 | 45,000,000 | 273,501 |
| 7 | 5.12\% 1st Mort Bond due 02/04/2054 | 85,000,000 | 543,463 |
| 8 | 3.78\% 1st Mort Bond due 03/02/2045 | 100,000,000 | 446,281 |
| 9 | 3.93\% 1st Mort Bond due 03/02/2055 | 200,000,000 | 891,394 |
| 10 | 3.93\% 1st Mort Bond due 07/15/2045 | 160,000,000 | 781,258 |
| 11 | 3.82\% 1st Mort Bond due 10/03/2047 | 60,000,000 | 437,811 |
| 12 | 3.89\% 1st Mort Bond due 2/1/2048 | 60,000,000 | 377,534 |
| 13 | 4.04\% 1st Mort Bond due 2/1/2058 | 125,000,000 | 786,529 |
| 14 | SUBTOTAL | 1,195,000,000 | 7,186,104 |
| 15 |  |  |  |
| 16 |  |  |  |
| 17 |  |  |  |
| 18 |  |  |  |
| 19 | SUBTOTAL |  |  |
| 20 |  |  |  |
| 21 | Account 224 - Other Long-Term Debt |  |  |
| 22 | Ohio Air Quality and Ohio Water Development |  |  |
| 23 |  |  |  |
| 24 | Beaver County Industrial Development: |  |  |
| 25 | 1999 Series B due 2020 Variable Interest Rates | 13,700,000 | 115,718 |
| 26 | 1999 Series C due 2033 Variable Interest Rates | 18,000,000 | 150,884 |
| 27 | 1999 Series D due 2029 Variable Interest Rates | 44,250,000 | 376,475 |
| 28 | 1999 Series A due 2031 Variable Interest Rates | 25,000,000 | 290,000 |
| 29 | 1999 Series E due 2031 Variable Interest Rates | 75,500,000 | 501,619 |
| 30 |  |  |  |
| 31 |  |  |  |
| 32 |  |  |  |
| 33 | TOTAL | 1,515,060,000 | 9,682,126 |


| Name of Respondent | This Re | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAA Original <br> (2) $\quad$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & \text { 04/29/2020 } \end{aligned}$ | End of | 2019/Q4 |

1. Report by balance sheet account the particulars (details) concerning long-term debt included in Accounts 221, Bonds, 222, Reacquired Bonds, 223, Advances from Associated Companies, and 224, Other long-Term Debt.
2. In column (a), for new issues, give Commission authorization numbers and dates.
3. For bonds assumed by the respondent, include in column (a) the name of the issuing company as well as a description of the bonds.
4. For advances from Associated Companies, report separately advances on notes and advances on open accounts. Designate demand notes as such. Include in column (a) names of associated companies from which advances were received.
5. For receivers, certificates, show in column (a) the name of the court -and date of court order under which such certificates were issued.
6. In column (b) show the principal amount of bonds or other long-term debt originally issued.
7. In column (c) show the expense, premium or discount with respect to the amount of bonds or other long-term debt originally issued.
8. For column (c) the total expenses should be listed first for each issuance, then the amount of premium (in parentheses) or discount. Indicate the premium or discount with a notation, such as $(P)$ or (D). The expenses, premium or discount should not be netted.
9. Furnish in a footnote particulars (details) regarding the treatment of unamortized debt expense, premium or discount associated with issues redeemed during the year. Also, give in a footnote the date of the Commission's authorization of treatment other than as specified by the Uniform System of Accounts.

| $\begin{array}{\|l} \hline \text { Line } \\ \text { No. } \end{array}$ | Class and Series of Obligation, Coupon Rate (For new issue, give commission Authorization numbers and dates) (a) | Principal Amount Of Debt issued <br> (b) | Total expense, Premium or Discount <br> (c) |
| :---: | :---: | :---: | :---: |
| 1 |  |  |  |
| 2 |  |  |  |
| 3 | Pollution Control Revenue Refunding Bonds: |  |  |
| 4 | 1999 Series A due 2031 Variable Interest Rates | 71,000,000 | 307,095 |
| 5 | 1999 Series B due 2031 Variable Interest Rates | 13,500,000 | 141,750 |
| 6 | 1999 Series B due 2027 Variable Interest Rates | 20,500,000 | 222,410 |
| 7 | 1999 Series C due 2031 Variable Interest Rates | 33,955,000 | 205,000 |
| 8 | 1999 Series C due 2031 Variable Interest Rates | 4,655,000 | 185,071 |
| 9 | SUBTOTAL | 320,060,000 | 2,496,022 |
| 10 |  |  |  |
| 11 |  |  |  |
| 12 |  |  |  |
| 13 |  |  |  |
| 14 |  |  |  |
| 15 |  |  |  |
| 16 |  |  |  |
| 17 |  |  |  |
| 18 |  |  |  |
| 19 |  |  |  |
| 20 |  |  |  |
| 21 |  |  |  |
| 22 |  |  |  |
| 23 |  |  |  |
| 24 |  |  |  |
| 25 |  |  |  |
| 26 |  |  |  |
| 27 |  |  |  |
| 28 |  |  |  |
| 29 |  |  |  |
| 30 |  |  |  |
| 31 |  |  |  |
| 32 |  |  |  |
| 33 | TOTAL | 1,515,060,000 | 9,682,126 |


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> 04/29/2020 | Year/Period of Report <br> End of <br> 2019/Q4 |
| :--- | :--- | :--- | :--- |

LONG-TERM DEBT (Account 221, 222, 223 and 224) (Continued)
10. Identify separate undisposed amounts applicable to issues which were redeemed in prior years.
11. Explain any debits and credits other than debited to Account 428, Amortization and Expense, or credited to Account 429, Premium on Debt - Credit.
12. In a footnote, give explanatory (details) for Accounts 223 and 224 of net changes during the year. With respect to long-term advances, show for each company: (a) principal advanced during year, (b) interest added to principal amount, and (c) principle repaid during year. Give Commission authorization numbers and dates.
13. If the respondent has pledged any of its long-term debt securities give particulars (details) in a footnote including name of pledgee and purpose of the pledge.
14. If the respondent has any long-term debt securities which have been nominally issued and are nominally outstanding at end of year, describe such securities in a footnote.
15. If interest expense was incurred during the year on any obligations retired or reacquired before end of year, include such interest expense in column (i). Explain in a footnote any difference between the total of column (i) and the total of Account 427, interest on Long-Term Debt and Account 430, Interest on Debt to Associated Companies.
16. Give particulars (details) concerning any long-term debt authorized by a regulatory commission but not yet issued.

| Nominal Date of Issue <br> (d) | Date of Maturity (e) | AMORTIZATION PERIOD |  | Outstanding(Total amount outstanding withoutreduction for amounts held byrespondent)(h) | Interest for Year Amount <br> (i) | Line <br> No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Date From <br> (f) | Date To (g) |  |  |  |
|  |  |  |  |  |  | 1 |
|  |  |  |  |  |  | 2 |
|  |  |  |  |  |  | 3 |
| 111413 | 111443 | 111413 | 111443 | 160,000,000 | 7,952,000 | 4 |
| 020112 | 020342 | 020112 | 020342 | 200,000,000 | 7,860,000 | 5 |
| 020414 | 020444 | 020414 | 020444 | 45,000,000 | 2,259,000 | 6 |
| 020414 | 020454 | 020414 | 020454 | 85,000,000 | 4,352,000 | 7 |
| 030215 | 030245 | 030215 | 030245 | 100,000,000 | 3,780,000 | 8 |
| 030215 | 030255 | 030215 | 030255 | 200,000,000 | 9,520,000 | 9 |
| 071515 | 071545 | 071515 | 071545 | 160,000,000 | 6,288,000 | 10 |
| 100317 | 100347 | 100317 | 100347 | 60,000,000 | 2,292,000 | 11 |
| 020118 | 020148 | 020118 | 020148 | 60,000,000 | 2,334,000 | 12 |
| 020118 | 020158 | 020118 | 020158 | 125,000,000 | 5,050,000 | 13 |
|  |  |  |  | 1,195,000,000 | 51,687,000 | 14 |
|  |  |  |  |  |  | 15 |
|  |  |  |  |  |  | 16 |
|  |  |  |  |  |  | 17 |
|  |  |  |  |  |  | 18 |
|  |  |  |  |  |  | 19 |
|  |  |  |  |  |  | 20 |
|  |  |  |  |  |  | 21 |
|  |  |  |  |  |  | 22 |
|  |  |  |  |  |  | 23 |
|  |  |  |  |  |  | 24 |
| 062890 | 080120 | 062890 | 080120 |  | 3,257 | 25 |
| 070590 | 080133 | 070590 | 080133 |  | 4,269 | 26 |
| 070590 | 110129 | 070590 | 110129 |  | 10,748 | 27 |
| 062993 | 040131 | 062993 | 040131 |  | 5,919 | 28 |
| 102594 | 030131 | 102594 | 030131 |  | 17,814 | 29 |
|  |  |  |  |  |  | 30 |
|  |  |  |  |  |  | 31 |
|  |  |  |  |  |  | 32 |
|  |  |  |  | 1,195,000,000 | 51,763,014 | 33 |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |
| :--- | :--- | :--- | :--- |
| Duquesne Light Company | $(1)$ XAn Original | (Mo, Da, Yr) | End of |
|  | $(2)$ | $\square$ A Resubmission | $04 / 29 / 2020$ |

LONG-TERM DEBT (Account 221, 222, 223 and 224) (Continued)
10. Identify separate undisposed amounts applicable to issues which were redeemed in prior years.
11. Explain any debits and credits other than debited to Account 428, Amortization and Expense, or credited to Account 429, Premium on Debt - Credit.
12. In a footnote, give explanatory (details) for Accounts 223 and 224 of net changes during the year. With respect to long-term advances, show for each company: (a) principal advanced during year, (b) interest added to principal amount, and (c) principle repaid during year. Give Commission authorization numbers and dates.
13. If the respondent has pledged any of its long-term debt securities give particulars (details) in a footnote including name of pledgee and purpose of the pledge.
14. If the respondent has any long-term debt securities which have been nominally issued and are nominally outstanding at end of year, describe such securities in a footnote.
15. If interest expense was incurred during the year on any obligations retired or reacquired before end of year, include such interest expense in column (i). Explain in a footnote any difference between the total of column (i) and the total of Account 427, interest on Long-Term Debt and Account 430, Interest on Debt to Associated Companies.
16. Give particulars (details) concerning any long-term debt authorized by a regulatory commission but not yet issued.

| Nominal Date of Issue <br> (d) | Date of Maturity (e) | AMORTIZATION PERIOD |  | Outstanding(Total amount outstanding withoutreduction for amounts held byrespondent)(h) | Interest for Year Amount <br> (i) | Line <br> No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Date From <br> (f) | Date To (g) |  |  |  |
|  |  |  |  |  |  | 1 |
|  |  |  |  |  |  | 2 |
|  |  |  |  |  |  | 3 |
| 090888 | 030131 | 090888 | 030131 |  | 16,784 | 4 |
| 120689 | 030131 | 120689 | 030131 |  | 3,210 | 5 |
| 083093 | 100127 | 083093 | 100127 |  | 4,859 | 6 |
| 121994 | 030131 | 121994 | 030131 |  | 8,028 | 7 |
| 121994 | 030131 | 121994 | 030131 |  | 1,126 | 8 |
|  |  |  |  |  | 76,014 | 9 |
|  |  |  |  |  |  | 10 |
|  |  |  |  |  |  | 11 |
|  |  |  |  |  |  | 12 |
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|  |  |  |  |  |  | 31 |
|  |  |  |  |  |  | 32 |
|  |  |  |  | 1,195,000,000 | 51,763,014 | 33 |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |
| :--- | :--- | :--- | :--- |
| Duquesne Light Company | (1) XAn Original | (Mo, Da, Yr) | End of |
|  | $(2)$ | $\square$ A Resubmission | $04 / 29 / 2020$ |

## RECONCILIATION OF REPORTED NET INCOME WITH TAXABLE INCOME FOR FEDERAL INCOME TAXES

1. Report the reconciliation of reported net income for the year with taxable income used in computing Federal income tax accruals and show computation of such tax accruals. Include in the reconciliation, as far as practicable, the same detail as furnished on Schedule M-1 of the tax return for the year. Submit a reconciliation even though there is no taxable income for the year. Indicate clearly the nature of each reconciling amount. 2. If the utility is a member of a group which files a consolidated Federal tax return, reconcile reported net income with taxable net income as if a separate return were to be field, indicating, however, intercompany amounts to be eliminated in such a consolidated return. State names of group member, tax assigned to each group member, and basis of allocation, assignment, or sharing of the consolidated tax among the group members.
2. A substitute page, designed to meet a particular need of a company, may be used as Long as the data is consistent and meets the requirements of the above instructions. For electronic reporting purposes complete Line 27 and provide the substitute Page in the context of a footnote.

| $\begin{array}{\|r} \hline \text { Line } \\ \text { No. } \\ \hline \end{array}$ | Particulars (Details) <br> (a) | $\begin{aligned} & \text { Amount } \\ & \text { (b) } \end{aligned}$ |
| :---: | :---: | :---: |
| 1 | Net Income for the Year (Page 117) | 184,444,523 |
| 2 |  |  |
| 3 |  |  |
| 4 | Taxable Income Not Reported on Books |  |
| 5 |  | 13,559,096 |
| 6 |  |  |
| 7 |  |  |
| 8 |  |  |
| 9 | Deductions Recorded on Books Not Deducted for Return |  |
| 10 |  | 221,994,592 |
| 11 |  |  |
| 12 |  |  |
| 13 |  |  |
| 14 | Income Recorded on Books Not Included in Return |  |
| 15 |  | 3,613,287 |
| 16 |  |  |
| 17 |  |  |
| 18 |  |  |
| 19 | Deductions on Return Not Charged Against Book Income |  |
| 20 |  | 254,444,161 |
| 21 |  |  |
| 22 |  |  |
| 23 |  |  |
| 24 |  |  |
| 25 |  |  |
| 26 |  |  |
| 27 | Federal Tax Net Income | 161,940,763 |
| 28 | Show Computation of Tax: |  |
| 29 | Federal Tax Net Income @ 21\% | 34,007,560 |
| 30 | Income Taxes - Accrual to Return | -6,213,313 |
| 31 | Total Federal Current Income Tax Expense | 27,794,247 |
| 32 |  |  |
| 33 | Federal Income Tax Expense - Operating 409.1 | 27,996,974 |
| 34 | Federal Income Tax Expense - Non-Operating 409.2 | -202,727 |
| 35 | Total Federal Income Tax Expense - Current | 27,794,247 |
| 36 |  |  |
| 37 |  |  |
| 38 |  |  |
| 39 |  |  |
| 40 |  |  |
| 41 |  |  |
| 42 |  |  |
| 43 |  |  |
| 44 |  |  |
|  |  |  |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | $\begin{gathered} \hline \text { Date of Report } \\ \text { (Mo, Da, Yr) } \\ 04 / 29 / 2020 \\ \hline \end{gathered}$ | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

Schedule Page: 261 Line No.: 5 Column: b
Taxable Income Not Reported on Books:
Contributions in Aid of Construction (CIAC) \$6,080,176
Tax Interest Capitalized (TIC) 5,579,469
Unamortized Loss on Bonds (ULoB) 1,899,451 Grand Total 13,559,096
Schedule Page: 261 Line No.: 10 Column: b
Deductions Recorded on Books Not Deducted for Return:

| Book Tax Exp | $\$ 47,960,169$ |
| :--- | ---: |
| Lobbying | 166,163 |
| M\&E | 306,184 |
| Bad Debts | 833,667 |
| Benefits | $1,669,406$ |
| Book Depr | $121,991,955$ |
| Reg Assets | $3,572,655$ |
| Qualified Transp Fringe | 208,098 |
| Book Amort. | $44,075,801$ |
| Tax Gain/(Losses) | 487,536 |
| Pension | 722,958 |
| $\quad$ Grand Total | $\$ 221,994,592$ |

Schedule Page: 261 Line No.: 15 Column: b
Income Recorded on Books Not Included in Return:

| AFUDC Equity | $\$(3,613,287)$ |
| :---: | :---: |
| Grand Total | $\$(3,613,287)$ |

Schedule Page: 261 Line No.: 20 Column: b
Deductions on Return Not Charged Against Book Income:
263A
AFUDC Debt
Amort. Prtnrshp Interest
\$(16,568, 928)
$(3,926,087)$
COR
Misc Accruals
$(20,832,228)$
OPEB
Tax Depr
Tax Repairs
Workers Comp
$(2,749,272)$
$(2,823,777)$
(120, 081, 144)
$(68,708,719)$
Reg Liability
$(707,464)$
Donation
State Tax
Grand Total
$(5,235,688)$
$(445,000)$
$(12,356,572)$
\$(254, 444, 161)

| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | (1) XAn Original |
| :--- | :--- | :--- | :--- |
|  | $(2)$ | $\square$ A Resubmission | Year/Period of Report <br> End of <br> 201/29/2020 |

1. Give particulars (details) of the combined prepaid and accrued tax accounts and show the total taxes charged to operations and other accounts during the year. Do not include gasoline and other sales taxes which have been charged to the accounts to which the taxed material was charged. If the actual, or estimated amounts of such taxes are know, show the amounts in a footnote and designate whether estimated or actual amounts.
2. Include on this page, taxes paid during the year and charged direct to final accounts, (not charged to prepaid or accrued taxes.)

Enter the amounts in both columns (d) and (e). The balancing of this page is not affected by the inclusion of these taxes.
3. Include in column (d) taxes charged during the year, taxes charged to operations and other accounts through (a) accruals credited to taxes accrued, (b)amounts credited to proportions of prepaid taxes chargeable to current year, and (c) taxes paid and charged direct to operations or accounts other than accrued and prepaid tax accounts.
4. List the aggregate of each kind of tax in such manner that the total tax for each State and subdivision can readily be ascertained.

| $\begin{aligned} & \text { Line } \\ & \text { No. } \end{aligned}$ | Kind of Tax(See instruction 5)(a) | BALANCE AT BEGINNING OF YEAR |  | Iaxes Charged Quring <br> (d) | $\begin{aligned} & \text { Taxes } \\ & \text { Paid } \\ & \text { During } \\ & \text { Year } \end{aligned}$ <br> (e) | Adjustments (f) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Taxes Accrued (Account 236) <br> (b) | Prepaid Taxes (Include in Account 165) (c) |  |  |  |
| 1 | FEDERAL: |  |  |  |  |  |
| 2 |  |  |  |  |  |  |
| 3 | Corporate Income | 1,990,887 |  | 27,794,248 | 29,938,047 | 481,986 |
| 4 | Unemployment |  | 866 | 73,971 | 74,013 | -546 |
| 5 | FICA | 909,965 |  | 12,551,839 | 12,488,701 |  |
| 6 | Highway Use |  |  |  |  |  |
| 7 | Excise Tax on Coal |  |  |  |  |  |
| 8 |  |  |  |  |  |  |
| 9 | SUBTOTAL | 2,900,852 | 866 | 40,420,058 | 42,500,761 | 481,440 |
| 10 |  |  |  |  |  |  |
| 11 | STATE - PA: |  |  |  |  |  |
| 12 | PA Income | 2,449,852 |  | 9,609,153 | 4,473,148 |  |
| 13 | PA PURTA | 281,047 |  | 616,454 | 819,000 |  |
| 14 | PA Gross Receipts | 6,830,870 |  | 50,153,460 | 53,266,076 |  |
| 15 | PA Capital Stock | 39,553 |  | -39,553 |  |  |
| 16 | PA Corporate Loans |  |  |  |  |  |
| 17 | PA Insurance Premiums |  |  |  |  |  |
| 18 | PA Unemployment | 1,435 |  | 646,046 | 678,572 |  |
| 19 | PA Fuel Use |  |  |  |  |  |
| 20 | PA Motor Carriers |  |  |  |  |  |
| 21 | PA Other | 856,895 |  | -38,164 |  | 38,164 |
| 22 |  |  |  |  |  |  |
| 23 | SUBTOTAL | 10,459,652 |  | 60,947,396 | 59,236,796 | 38,164 |
| 24 |  |  |  |  |  |  |
| 25 | STATE - W. VA. |  |  |  |  |  |
| 26 | W.VA. Franchise |  |  |  |  |  |
| 27 | W. VA. Income |  |  |  |  |  |
| 28 |  |  |  |  |  |  |
| 29 | SUBTOTAL |  |  |  |  |  |
| 30 |  |  |  |  |  |  |
| 31 | LOCAL: |  |  |  |  |  |
| 32 | Gross Receipts |  |  |  |  |  |
| 33 | Real Estate |  | 2,502 | 249,142 | 257,454 |  |
| 34 | City Of Pittsburgh | 5 |  | 776,558 | 785,599 | -856 |
| 35 | SUBTOTAL | 5 | 2,502 | 1,025,700 | 1,043,053 | -856 |
| 36 |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |
| 38 |  |  |  |  |  |  |
| 39 |  |  |  |  |  |  |
| 40 |  |  |  |  |  |  |
| 41 | TOTAL | 13,360,509 | 3,368 | 102,393,154 | 102,780,610 | 518,748 |


| Name of Respondent | This Repor | Date of Report | Year/ | f Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $X$ An Original <br> (2) $\rightleftharpoons$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & \text { 04/29/2020 } \end{aligned}$ | End of | 2019/Q4 |

5. If any tax (exclude Federal and State income taxes)- covers more then one year, show the required information separately for each tax year, identifying the year in column (a).
6. Enter all adjustments of the accrued and prepaid tax accounts in column (f) and explain each adjustment in a foot- note. Designate debit adjustments by parentheses.
7. Do not include on this page entries with respect to deferred income taxes or taxes collected through payroll deductions or otherwise pending transmittal of such taxes to the taxing authority.
8. Report in columns (i) through (I) how the taxes were distributed. Report in column (I) only the amounts charged to Accounts 408.1 and 409.1 pertaining to electric operations. Report in column (I) the amounts charged to Accounts 408.1 and 109.1 pertaining to other utility departments and amounts charged to Accounts 408.2 and 409.2. Also shown in column (I) the taxes charged to utility plant or other balance sheet accounts.
9. For any tax apportioned to more than one utility department or account, state in a footnote the basis (necessity) of apportioning such tax.

| BALANCE AT END OF YEAR |  | DISTRIBUTION OF TAXES CHARGED |  |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| (Taxes accrued Account 236) | Prepaid Taxes (Incl. in Account 165) (h) | Electric (Account 408.1, 409.1) (i) | Extraordinary Items (Account 409.3) (j) | Adjustments to Ret. Earnings (Account 439) (k) | Other <br> (I) |  |
|  |  |  |  |  |  | 1 |
|  |  |  |  |  |  | 2 |
| 329,074 |  | 27,996,974 |  |  | -202,727 | 3 |
|  | 1,454 | 30,864 |  |  | 43,108 | 4 |
| 973,103 |  | 5,878,078 |  |  | 6,673,760 | 5 |
|  |  |  |  |  |  | 6 |
|  |  |  |  |  |  | 7 |
|  |  |  |  |  |  | 8 |
| 1,302,177 | 1,454 | 33,905,916 |  |  | 6,514,141 | 9 |
|  |  |  |  |  |  | 10 |
|  |  |  |  |  |  | 11 |
| 7,585,857 |  | 10,030,152 |  |  | -421,000 | 12 |
| 78,501 |  | 616,455 |  |  |  | 13 |
| 3,718,254 |  | 50,153,461 |  |  |  | 14 |
|  |  | -39,553 |  |  |  | 15 |
|  |  |  |  |  |  | 16 |
|  |  |  |  |  |  | 17 |
|  | 31,091 | 295,324 |  |  | 350,721 | 18 |
|  |  |  |  |  |  | 19 |
|  |  |  |  |  |  | 20 |
| 856,895 |  | -38,165 |  |  |  | 21 |
|  |  |  |  |  |  | 22 |
| 12,239,507 | 31,091 | 61,017,674 |  |  | -70,279 | 23 |
|  |  |  |  |  |  | 24 |
|  |  |  |  |  |  | 25 |
|  |  |  |  |  |  | 26 |
|  |  |  |  |  |  | 27 |
|  |  |  |  |  |  | 28 |
|  |  |  |  |  |  | 29 |
|  |  |  |  |  |  | 30 |
|  |  |  |  |  |  | 31 |
|  |  |  |  |  |  | 32 |
|  | 10,814 | 249,142 |  |  |  | 33 |
|  | 9,892 | 372,746 |  |  | 403,812 | 34 |
|  | 20,706 | 621,888 |  |  | 403,812 | 35 |
|  |  |  |  |  |  | 36 |
|  |  |  |  |  |  | 37 |
|  |  |  |  |  |  | 38 |
|  |  |  |  |  |  | 39 |
|  |  |  |  |  |  | 40 |
| 13,541,684 | 53,251 | 95,545,478 |  |  | 6,847,674 | 41 |




| Name of Respondent <br> Duquesne Light Company | This Report Is: <br> (1) XAn Original | Date of Report <br> (Mo, Da, Yr) <br> 04/29/2020 | Year/Period of Report <br> End of <br> 2019/Q4 |
| :--- | :--- | :--- | :--- |
| ACCUMULATED DEFERRED INCOME TAXES - OTHER PROPERTY (Account 282) (Continued) |  |  |  |

3. Use footnotes as required.



| Name of Respondent | This Report Is:(1) XAn Original(2) $\square$ A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |

3. Provide in the space below explanations for Page 276 and 277. Include amounts relating to insignificant items listed under Other.
4. Use footnotes as required.



| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | $\begin{gathered} \hline \text { Date of Report } \\ \text { (Mo, Da, Yr) } \\ 04 / 29 / 2020 \\ \hline \end{gathered}$ | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

Schedule Page: 278 Line No.: 1 Column: a
These amounts represent environmental costs previously recovered from customers associated with previously owned generation sites. These amounts are amortized as the Company incurs environmental costs associated with these sites.

## Schedule Page: 278 Line No.: 3 Column: a

These amounts represent costs recovered from customers associated with the Company's OPEB costs.

## Schedule Page: 278 Line No.: 5 Column: a

These amounts represent the true up of costs under the PUC Transmission Service Charge annual filing which are amortized June thru May each year.

## Schedule Page: 278 Line No.: 7 Column: a

Represents amounts recovered from customers related to supplier auctions of small and medium commercial and industrial generation customers.

## Schedule Page: 278 Line No.: 9 Column: a

Represents a net regulatory liability on regulated utility property that includes the excess deferred income tax flow back to customers over the average remaining book life of the regulated property resulting from the corporate tax rate reduction; net of the FAS 109 property basis differences and corresponding FAS 109 tax gross up resulting from book depreciation versus accelerated tax deduction that are being recovered over the remaining depreciable life of the regulated utility property, plant and equipment.

Schedule Page: 278 Line No.: 11 Column: a
These amounts represent the excess of costs incurred vs. revenue collected in regards to the company's Energy Efficiency Program.
Schedule Page: 278 Line No.: 13 Column: a
These amounts represent the excess accumulated deferred income taxes (EDIT) that are required by the $F E R C$ to be refunded to customers as a result of the change in tax rate caused by the adoption of TCJA.

## Schedule Page: 278 Line No.: 15 Column: a

This balance represents the underspend related to the electric vehicle customer registration credits allowed annually.
Schedule Page: 278 Line No.: 17 Column: a
These amounts represent amounts recovered from customers associated with the Company's Universal Services programs. These amounts will be amortized as the Company continues to incur costs associated with these programs.
Schedule Page: 278 Line No.: 19 Column: a
This balance relates to an overcollection of DSIC revenue associated with a change in tax rates that must be given back to customers.

| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- | | Year/Period of Report |
| :---: |
| End of |
|  |

1. The following instructions generally apply to the annual version of these pages. Do not report quarterly data in columns (c), (e), (f), and (g). Unbilled revenues and MWH related to unbilled revenues need not be reported separately as required in the annual version of these pages.
2. Report below operating revenues for each prescribed account, and manufactured gas revenues in total.
3. Report number of customers, columns (f) and ( g ), on the basis of meters, in addition to the number of flat rate accounts; except that where separate meter readings are added for billing purposes, one customer should be counted for each group of meters added. The -average number of customers means the average of twelve figures at the close of each month.
4. If increases or decreases from previous period (columns (c),(e), and (g)), are not derived from previously reported figures, explain any inconsistencies in a footnote. 5. Disclose amounts of $\$ 250,000$ or greater in a footnote for accounts 451,456 , and 457.2.



| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $\underline{X}$ An Original <br> (2) __ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |


| Schedule Page: 300 Line No.: 21 Column: b |  |  |
| :---: | :---: | :---: |
| Dominion Market Revenue | \$ | 563,387 |
| All Other Items Less Than \$250,000 |  | 160,263 |
| Total Other Electric Revenues | \$ | 723,650 |
| Schedule Page: 300 Line No.: 21 Column: c |  |  |
| Dominion Marketing Revenue | \$ | 379,181 |
| All Other Items Less Than \$250,000 |  | 255,200 |
| Total Other Electric Revenues | \$ | 634,381 |


| Name of Respondent | This Report Is:(1) XAn Original(2) $\square$ A Resubmission |  | $\begin{aligned} & \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |

1. Report below for each rate schedule in effect during the year the MWH of electricity sold, revenue, average number of customer, average Kwh per customer, and average revenue per Kwh, excluding date for Sales for Resale which is reported on Pages 310-311.
2. Provide a subheading and total for each prescribed operating revenue account in the sequence followed in "Electric Operating Revenues," Page 300-301. If the sales under any rate schedule are classified in more than one revenue account, List the rate schedule and sales data under each applicable revenue account subheading
3. Where the same customers are served under more than one rate schedule in the same revenue account classification (such as a general residential schedule and an off peak water heating schedule), the entries in column (d) for the special schedule should denote the duplication in number of reported customers.
4. The average number of customers should be the number of bills rendered during the year divided by the number of billing periods during the year (12 if all billings are made monthly).
5. For any rate schedule having a fuel adjustment clause state in a footnote the estimated additional revenue billed pursuant thereto.
6. Report amount of unbilled revenue as of end of year for each applicable revenue account subheading.

| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \\ \hline \end{array}$ | Number and Title of Rate schedule <br> (a) | MWh Sold <br> (b) | Revenue <br> (c) | Average Number of Customers (d) | KWh of Sales Per Customer (e) | Revenueper KWh Sold <br> (f) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Account 440 Residential |  |  |  |  |  |
| 2 | RA | 62,019 | 6,974,961 | 5,681 | 10,917 | 0.1125 |
| 3 | RS | 3,606,920 | 507,415,155 | 496,301 | 7,268 | 0.1407 |
| 4 | RH | 387,466 | 49,001,774 | 36,552 | 10,600 | 0.1265 |
| 5 | SM |  |  |  |  |  |
| 6 | PAL |  |  |  |  |  |
| 7 | Total A/C 440 | 4,056,405 | 563,391,890 | 538,534 | 7,532 | 0.1389 |
| 8 |  |  |  |  |  |  |
| 9 | Account 442 Comm. \& Industrial |  |  |  |  |  |
| 10 | GS/GM | 2,861,043 | 179,210,542 | 51,709 | 55,330 | 0.0626 |
| 11 | GMH | 256,151 | 16,447,406 | 3,234 | 79,206 | 0.0642 |
| 12 | GL | 2,741,523 | 76,708,543 | 739 | 3,709,774 | 0.0280 |
| 13 | GLH | 362,099 | 11,579,462 | 89 | 4,068,528 | 0.0320 |
| 14 | L | 1,039,003 | 21,467,859 | 21 | 49,476,333 | 0.0207 |
| 15 | HVPS | 1,249,983 | 817,075 | 9 | 138,887,000 | 0.0007 |
| 16 | SM |  |  |  |  |  |
| 17 | AL |  |  |  |  |  |
| 18 | UMS | 20,638 | 1,249,816 | 5,467 | 3,775 | 0.0606 |
| 19 | PAL |  |  |  |  |  |
| 20 | Total A/C 442 | 8,530,440 | 307,480,703 | 61,268 | 139,232 | 0.0360 |
| 21 |  |  |  |  |  |  |
| 22 | Account 444 Publ. St. \& Hwy Light |  |  |  |  |  |
| 23 | SM | 23,641 | 10,998,745 | 173 | 136,653 | 0.4652 |
| 24 | SE | 25,543 | 1,408,420 | 1 | 25,543,000 | 0.0551 |
| 25 | SH | 866 | 109,006 | 13 | 66,615 | 0.1259 |
| 26 | AL | 117 | 1,287 | 3 | 39,000 | 0.0110 |
| 27 | PAL | 2,609 | 516,471 | 812 | 3,213 | 0.1980 |
| 28 | UMS |  |  |  |  |  |
| 29 | Total A/C 444 | 52,776 | 13,033,929 | 1,002 | 52,671 | 0.2470 |
| 30 |  |  |  |  |  |  |
| 31 |  |  |  |  |  |  |
| 32 |  |  |  |  |  |  |
| 33 |  |  |  |  |  |  |
| 34 |  |  |  |  |  |  |
| 35 | Unbilled Acct 440 Residential | -8,522 | 148,787 |  |  | -0.0175 |
| 36 |  |  |  |  |  |  |
| 37 | Unbilled 442 Comm \& Industrial | -5,111 | 531,595 |  |  | -0.1040 |
| 38 |  |  |  |  |  |  |
| 39 | Unbilled 444 Publ St \& Hwy Lght | -23 | 4,622 |  |  | -0.2010 |
| 40 |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| 41 | TOTAL Billed | 12,639,621 | 883,906,522 | 600,804 | 21,038 | 0.0699 |
| 42 | Total Unbilled Rev.(See Instr. 6) | -13,656 | 685,003 | 0 | 0 | -0.0502 |
| 43 | TOTAL | 12,625,965 | 884,591,525 | 600,804 | 21,015 | 0.0701 |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) X An Original (2) $\square$ A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |
| SALES FOR RESALE (Account 447) |  |  |  |  |

1. Report all sales for resale (i.e., sales to purchasers other than ultimate consumers) transacted on a settlement basis other than power exchanges during the year. Do not report exchanges of electricity (i.e., transactions involving a balancing of debits and credits for energy, capacity, etc.) and any settlements for imbalanced exchanges on this schedule. Power exchanges must be reported on the Purchased Power schedule (Page 326-327).
2. Enter the name of the purchaser in column (a). Do note abbreviate or truncate the name or use acronyms. Explain in a footnote any ownership interest or affiliation the respondent has with the purchaser.
3. In column (b), enter a Statistical Classification Code based on the original contractual terms and conditions of the service as follows:

RQ - for requirements service. Requirements service is service which the supplier plans to provide on an ongoing basis (i.e., the supplier includes projected load for this service in its system resource planning). In addition, the reliability of requirements service must be the same as, or second only to, the supplier's service to its own ultimate consumers.
LF - for tong-term service. "Long-term" means five years or Longer and "firm" means that service cannot be interrupted for economic reasons and is intended to remain reliable even under adverse conditions (e.g., the supplier must attempt to buy emergency energy from third parties to maintain deliveries of LF service). This category should not be used for Long-term firm service which meets the definition of $R Q$ service. For all transactions identified as LF, provide in a footnote the termination date of the contract defined as the earliest date that either buyer or setter can unilaterally get out of the contract.
IF - for intermediate-term firm service. The same as LF service except that "intermediate-term" means longer than one year but Less than five years.
SF - for short-term firm service. Use this category for all firm services where the duration of each period of commitment for service is one year or less.
LU - for Long-term service from a designated generating unit. "Long-term" means five years or Longer. The availability and reliability of service, aside from transmission constraints, must match the availability and reliability of designated unit.
IU - for intermediate-term service from a designated generating unit. The same as LU service except that "intermediate-term" means Longer than one year but Less than five years.

| $\begin{aligned} & \text { Line } \\ & \text { No. } \end{aligned}$ | Name of Company or Public Authority (Footnote Affiliations) <br> (a) | Statistical Classification <br> (b) | FERC Rate Schedule or Tariff Number <br> (c) | Average Monthly Billing Demand (MW) <br> (d) | Actual Demand (MW) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Average Monthly NCP Demand <br> (e) | Average Monthly CPDemand <br> (f) |
| 1 | NRG Energy | SF |  |  |  |  |
| 2 |  |  |  |  |  |  |
| 3 |  |  |  |  |  |  |
| 4 |  |  |  |  |  |  |
| 5 |  |  |  |  |  |  |
| 6 |  |  |  |  |  |  |
| 7 |  |  |  |  |  |  |
| 8 |  |  |  |  |  |  |
| 9 |  |  |  |  |  |  |
| 10 |  |  |  |  |  |  |
| 11 |  |  |  |  |  |  |
| 12 |  |  |  |  |  |  |
| 13 |  |  |  |  |  |  |
| 14 |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  | Subtotal RQ |  |  | 0 | 0 | 0 |
|  | Subtotal non-RQ |  |  | 0 | 0 | 0 |
|  | Total |  |  | 0 | 0 | 0 |


| Name of Respondent | This Report Is: <br> (1) XAn Original |  | Date of Report (Mo, Da, Yr) | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) <br> (2) | XAn Original <br> AA Resubmission |  | End of | 2019/Q4 |

OS - for other service. use this category only for those services which cannot be placed in the above-defined categories, such as all non-firm service regardless of the Length of the contract and service from designated units of Less than one year. Describe the nature of the service in a footnote.
AD - for Out-of-period adjustment. Use this code for any accounting adjustments or "true-ups" for service provided in prior reporting years. Provide an explanation in a footnote for each adjustment.
4. Group requirements $R Q$ sales together and report them starting at line number one. After listing all $R Q$ sales, enter "Subtotal - RQ" in column (a). The remaining sales may then be listed in any order. Enter "Subtotal-Non-RQ" in column (a) after this Listing. Enter "Total" in column (a) as the Last Line of the schedule. Report subtotals and total for columns (9) through (k)
5. In Column (c), identify the FERC Rate Schedule or Tariff Number. On separate Lines, List all FERC rate schedules or tariffs under which service, as identified in column (b), is provided.
6. For requirements RQ sales and any type of-service involving demand charges imposed on a monthly (or Longer) basis, enter the average monthly billing demand in column (d), the average monthly non-coincident peak (NCP) demand in column (e), and the average monthly coincident peak (CP)
demand in column (f). For all other types of service, enter NA in columns (d), (e) and (f). Monthly NCP demand is the maximum metered hourly ( 60 -minute integration) demand in a month. Monthly CP demand is the metered demand during the hour ( 60 -minute integration) in which the supplier's system reaches its monthly peak. Demand reported in columns (e) and (f) must be in megawatts. Footnote any demand not stated on a megawatt basis and explain.
7. Report in column (g) the megawatt hours shown on bills rendered to the purchaser.
8. Report demand charges in column (h), energy charges in column (i), and the total of any other types of charges, including out-of-period adjustments, in column (j). Explain in a footnote all components of the amount shown in column (j). Report in column (k) the total charge shown on bills rendered to the purchaser.
9. The data in column (g) through (k) must be subtotaled based on the RQ/Non-RQ grouping (see instruction 4), and then totaled on the Last -line of the schedule. The "Subtotal - RQ" amount in column (g) must be reported as Requirements Sales For Resale on Page 401, line 23. The "Subtotal - Non-RQ" amount in column (g) must be reported as Non-Requirements Sales For Resale on Page 401,iine 24. 10. Footnote entries as required and provide explanations following all required data.

| MegaWatt Hours Sold <br> (g) | REVENUE |  |  | Total (\$) (h+i+j) <br> (k) | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Demand Charges <br> (\$) <br> (h) | Energy Charges <br> (\$) <br> (i) | Other Charges <br> (\$) <br> (j) |  |  |
| 29,018 |  | 1,472,144 |  | 1,472,144 | 1 |
|  |  |  |  |  | 2 |
|  |  |  |  |  | 3 |
|  |  |  |  |  | 4 |
|  |  |  |  |  | 5 |
|  |  |  |  |  | 6 |
|  |  |  |  |  | 7 |
|  |  |  |  |  | 8 |
|  |  |  |  |  | 9 |
|  |  |  |  |  | 10 |
|  |  |  |  |  | 11 |
|  |  |  |  |  | 12 |
|  |  |  |  |  | 13 |
|  |  |  |  |  | 14 |
|  |  |  |  |  |  |
| 0 | 0 | 0 | 0 | 0 |  |
| 29,018 | 0 | 1,472,144 | 0 | 1,472,144 |  |
| 29,018 | 0 | 1,472,144 | 0 | 1,472,144 |  |






| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $X$ An Original (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |
| $\begin{aligned} & \text { PURCHASED POWER (Account 555) } \\ & \text { (Including power exchanges) } \end{aligned}$ |  |  |  |  |

1. Report all power purchases made during the year. Also report exchanges of electricity (i.e., transactions involving a balancing of debits and credits for energy, capacity, etc.) and any settlements for imbalanced exchanges.
2. Enter the name of the seller or other party in an exchange transaction in column (a). Do not abbreviate or truncate the name or use acronyms. Explain in a footnote any ownership interest or affiliation the respondent has with the seller.
3. In column (b), enter a Statistical Classification Code based on the original contractual terms and conditions of the service as follows:

RQ - for requirements service. Requirements service is service which the supplier plans to provide on an ongoing basis (i.e., the supplier includes projects load for this service in its system resource planning). In addition, the reliability of requirement service must be the same as, or second only to, the supplier's service to its own ultimate consumers.

LF - for long-term firm service. "Long-term" means five years or longer and "firm" means that service cannot be interrupted for economic reasons and is intended to remain reliable even under adverse conditions (e.g., the supplier must attempt to buy emergency energy from third parties to maintain deliveries of LF service). This category should not be used for long-term firm service firm service which meets the definition of $R Q$ service. For all transaction identified as $L F$, provide in a footnote the termination date of the contract defined as the earliest date that either buyer or seller can unilaterally get out of the contract.

IF - for intermediate-term firm service. The same as LF service expect that "intermediate-term" means longer than one year but less than five years.

SF - for short-term service. Use this category for all firm services, where the duration of each period of commitment for service is one year or less.

LU - for long-term service from a designated generating unit. "Long-term" means five years or longer. The availability and reliability of service, aside from transmission constraints, must match the availability and reliability of the designated unit.

IU - for intermediate-term service from a designated generating unit. The same as LU service expect that "intermediate-term" means longer than one year but less than five years.

EX - For exchanges of electricity. Use this category for transactions involving a balancing of debits and credits for energy, capacity, etc. and any settlements for imbalanced exchanges.

OS - for other service. Use this category only for those services which cannot be placed in the above-defined categories, such as all non-firm service regardless of the Length of the contract and service from designated units of Less than one year. Describe the nature of the service in a footnote for each adjustment.

| Line No. | Name of Company or Public Authority (Footnote Affiliations) <br> (a) | Statistical Classification <br> (b) | FERC Rate Schedule or Tariff Number <br> (c) | Average Monthly Billing Demand (MW) <br> (d) | Actual Demand (MW) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Average Monthly NCP Demane <br> (e) | Average Monthly CP Demand <br> (f) |
| 1 | Beaver Falls Municipal Authority | SF |  |  |  |  |
| 2 | Beaver Valley Power Co. | SF |  |  |  |  |
| 3 | PJM Interconnection, LLC. | SF |  |  |  |  |
| 4 | West Penn Power Company | SF |  |  |  |  |
| 5 | AEP Service Corporation | SF |  |  |  |  |
| 6 | ConocoPhillips Company | SF |  |  |  |  |
| 7 | DTE Energy Trading, Inc. | SF |  |  |  |  |
| 8 | Exelon Generation Company, LLC | SF |  |  |  |  |
| 9 | NextEra Energy Power Marketing, LLC | SF |  |  |  |  |
| 10 | Noble Americas Gas \& Power Corp. | SF |  |  |  |  |
| 11 | PSEG Energy Resources \& Trade | SF |  |  |  |  |
| 12 | TriEagle Energy LP | SF |  |  |  |  |
| 13 | Axpo U.S. LLC | SF |  |  |  |  |
| 14 | BP Energy Company | SF |  |  |  |  |
|  | Total |  |  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |
| PURCHASED POWER (Account 555)(Including power exchanges) |  |  |  |  |

1. Report all power purchases made during the year. Also report exchanges of electricity (i.e., transactions involving a balancing of debits and credits for energy, capacity, etc.) and any settlements for imbalanced exchanges.
2. Enter the name of the seller or other party in an exchange transaction in column (a). Do not abbreviate or truncate the name or use acronyms. Explain in a footnote any ownership interest or affiliation the respondent has with the seller.
3. In column (b), enter a Statistical Classification Code based on the original contractual terms and conditions of the service as follows:

RQ - for requirements service. Requirements service is service which the supplier plans to provide on an ongoing basis (i.e., the supplier includes projects load for this service in its system resource planning). In addition, the reliability of requirement service must be the same as, or second only to, the supplier's service to its own ultimate consumers.

LF - for long-term firm service. "Long-term" means five years or longer and "firm" means that service cannot be interrupted for economic reasons and is intended to remain reliable even under adverse conditions (e.g., the supplier must attempt to buy emergency energy from third parties to maintain deliveries of LF service). This category should not be used for long-term firm service firm service which meets the definition of $R Q$ service. For all transaction identified as $L F$, provide in a footnote the termination date of the contract defined as the earliest date that either buyer or seller can unilaterally get out of the contract.

IF - for intermediate-term firm service. The same as LF service expect that "intermediate-term" means longer than one year but less than five years.

SF - for short-term service. Use this category for all firm services, where the duration of each period of commitment for service is one year or less.

LU - for long-term service from a designated generating unit. "Long-term" means five years or longer. The availability and reliability of service, aside from transmission constraints, must match the availability and reliability of the designated unit.

IU - for intermediate-term service from a designated generating unit. The same as LU service expect that "intermediate-term" means longer than one year but less than five years.

EX - For exchanges of electricity. Use this category for transactions involving a balancing of debits and credits for energy, capacity, etc. and any settlements for imbalanced exchanges.

OS - for other service. Use this category only for those services which cannot be placed in the above-defined categories, such as all non-firm service regardless of the Length of the contract and service from designated units of Less than one year. Describe the nature of the service in a footnote for each adjustment.

| $\begin{array}{\|l} \text { Line } \\ \text { No. } \end{array}$ | Name of Company or Public Authority (Footnote Affiliations) <br> (a) | Statistical Classification <br> (b) | FERC Rate Schedule or Tariff Number <br> (c) | Average Monthly Billing Demand (MW) (d) | Actual Demand (MW) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | $\begin{array}{\|c\|} \hline \text { Average } \\ \text { Monthly NCP Demand } \end{array}$ <br> (e) | $\begin{gathered} \text { Average } \\ \text { Monthly CP Demand } \end{gathered}$ (f) |
| 1 | Dynegy Marketing and Trade, LLC | SF |  |  |  |  |
| 2 | TransAlta Energy Marketing (U.S) Inc. | SF |  |  |  |  |
| 3 | Vitol Inc. | SF |  |  |  |  |
| 4 | Capacity Purchases - Net |  |  |  |  |  |
| 5 |  |  |  |  |  |  |
| 6 |  |  |  |  |  |  |
| 7 |  |  |  |  |  |  |
| 8 |  |  |  |  |  |  |
| 9 |  |  |  |  |  |  |
| 10 |  |  |  |  |  |  |
| 11 |  |  |  |  |  |  |
| 12 |  |  |  |  |  |  |
| 13 |  |  |  |  |  |  |
| 14 |  |  |  |  |  |  |
|  | Total |  |  |  |  |  |


| Name of Respondent Duquesne Light Company | This Report I | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
|  | (1) XAn Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |
| PURCHASED POWER(Account 555), (Continued)(Including power exchanges) |  |  |  |  |

AD - for out-of-period adjustment. Use this code for any accounting adjustments or "true-ups" for service provided in prior reporting years. Provide an explanation in a footnote for each adjustment.
4. In column (c), identify the FERC Rate Schedule Number or Tariff, or, for non-FERC jurisdictional sellers, include an appropriate designation for the contract. On separate lines, list all FERC rate schedules, tariffs or contract designations under which service, as identified in column (b), is provided.
5. For requirements RQ purchases and any type of service involving demand charges imposed on a monnthly (or longer) basis, enter the monthly average billing demand in column (d), the average monthly non-coincident peak (NCP) demand in column (e), and the average monthly coincident peak (CP) demand in column (f). For all other types of service, enter NA in columns (d), (e) and (f). Monthly NCP demand is the maximum metered hourly ( 60 -minute integration) demand in a month. Monthly CP demand is the metered demand during the hour (60-minute integration) in which the supplier's system reaches its monthly peak. Demand reported in columns (e) and (f) must be in megawatts. Footnote any demand not stated on a megawatt basis and explain.
6. Report in column ( g ) the megawatthours shown on bills rendered to the respondent. Report in columns (h) and (i) the megawatthours of power exchanges received and delivered, used as the basis for settlement. Do not report net exchange.
7. Report demand charges in column (j), energy charges in column (k), and the total of any other types of charges, including out-of-period adjustments, in column (I). Explain in a footnote all components of the amount shown in column (I). Report in column (m) the total charge shown on bills received as settlement by the respondent. For power exchanges, report in column ( m ) the settlement amount for the net receipt of energy. If more energy was delivered than received, enter a negative amount. If the settlement amount (I) include credits or charges other than incremental generation expenses, or (2) excludes certain credits or charges covered by the agreement, provide an explanatory footnote.
8. The data in column ( g ) through ( m ) must be totalled on the last line of the schedule. The total amount in column ( g ) must be reported as Purchases on Page 401, line 10. The total amount in column (h) must be reported as Exchange Received on Page 401, line 12. The total amount in column (i) must be reported as Exchange Delivered on Page 401, line 13.
9. Footnote entries as required and provide explanations following all required data.

| MegaWatt Hours Purchased <br> (g) | POWER EXCHANGES |  | COST/SETTLEMENT OF POWER |  |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | MegaWatt Hours Received <br> (h) | MegaWatt Hours Delivered (i) | Demand Charges <br> (\$) <br> (j) | Energy Charges <br> $(\$)$ $(\mathrm{k})$ | Other Charges <br> (\$) <br> (I) | Total (j+k+l) of Settlement (\$) (m) |  |
| 24,323 |  |  |  | 1,326,256 |  | 1,326,256 | 1 |
| 4,695 |  |  |  | 271,915 |  | 271,915 | 2 |
|  |  |  |  | -4,485,881 |  | -4,485,881 | 3 |
| 83 |  |  |  | 13,743 |  | 13,743 | 4 |
| 467,046 |  |  |  | 24,579,084 |  | 24,579,084 | 5 |
| 171,594 |  |  |  | 9,060,403 |  | 9,060,403 | 6 |
| 159,785 |  |  |  | 8,168,377 |  | 8,168,377 | 7 |
| 685,520 |  |  |  | 36,369,388 |  | 36,369,388 | 8 |
| 1,724,459 |  |  |  | 74,576,462 |  | 74,576,462 | 9 |
|  |  |  |  | 3,305,323 |  | 3,305,323 | 10 |
| 335,967 |  |  |  | 17,979,606 |  | 17,979,606 | 11 |
| 233,434 |  |  |  | 11,968,551 |  | 11,968,551 | 12 |
| 11,331 |  |  |  | 495,697 |  | 495,697 | 13 |
| 5,652 |  |  |  | 252,251 |  | 252,251 | 14 |
| 4,381,565 |  |  |  | 210,773,698 |  | 210,773,698 |  |


| Name of Respondent Duquesne Light Company | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
|  | (1) XAn Original (2) $\triangle$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |
| PURCHASED POWER(Account 555)s (Continued)(Including power exchanges) |  |  |  |  |

AD - for out-of-period adjustment. Use this code for any accounting adjustments or "true-ups" for service provided in prior reporting years. Provide an explanation in a footnote for each adjustment.
4. In column (c), identify the FERC Rate Schedule Number or Tariff, or, for non-FERC jurisdictional sellers, include an appropriate designation for the contract. On separate lines, list all FERC rate schedules, tariffs or contract designations under which service, as identified in column (b), is provided.
5. For requirements RQ purchases and any type of service involving demand charges imposed on a monnthly (or longer) basis, enter the monthly average billing demand in column (d), the average monthly non-coincident peak (NCP) demand in column (e), and the average monthly coincident peak (CP) demand in column (f). For all other types of service, enter NA in columns (d), (e) and (f). Monthly NCP demand is the maximum metered hourly ( 60 -minute integration) demand in a month. Monthly CP demand is the metered demand during the hour (60-minute integration) in which the supplier's system reaches its monthly peak. Demand reported in columns (e) and (f) must be in megawatts. Footnote any demand not stated on a megawatt basis and explain.
6. Report in column ( g ) the megawatthours shown on bills rendered to the respondent. Report in columns (h) and (i) the megawatthours of power exchanges received and delivered, used as the basis for settlement. Do not report net exchange.
7. Report demand charges in column (j), energy charges in column ( $k$ ), and the total of any other types of charges, including out-of-period adjustments, in column (I). Explain in a footnote all components of the amount shown in column (I). Report in column (m) the total charge shown on bills received as settlement by the respondent. For power exchanges, report in column ( m ) the settlement amount for the net receipt of energy. If more energy was delivered than received, enter a negative amount. If the settlement amount (I) include credits or charges other than incremental generation expenses, or (2) excludes certain credits or charges covered by the agreement, provide an explanatory footnote.
8. The data in column ( g ) through ( m ) must be totalled on the last line of the schedule. The total amount in column ( g ) must be reported as Purchases on Page 401, line 10. The total amount in column (h) must be reported as Exchange Received on Page 401, line 12. The total amount in column (i) must be reported as Exchange Delivered on Page 401, line 13.
9. Footnote entries as required and provide explanations following all required data.

| MegaWatt Hours Purchased <br> (g) | POWER EXCHANGES |  | COST/SETTLEMENT OF POWER |  |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | MegaWatt Hours Received <br> (h) | MegaWatt Hours Delivered (i) | Demand Charges <br> (\$) <br> (j) | Energy Charges <br> (\$) | Other Charges <br> (\$) <br> (I) | Total (j+k+l) of Settlement (\$) (m) |  |
| 319,753 |  |  |  | 15,039,068 |  | 15,039,068 | 1 |
| 103,379 |  |  |  | 4,349,278 |  | 4,349,278 | 2 |
| 134,544 |  |  |  | 7,504,177 |  | 7,504,177 | 3 |
|  |  |  |  |  |  |  | 4 |
|  |  |  |  |  |  |  | 5 |
|  |  |  |  |  |  |  | 6 |
|  |  |  |  |  |  |  | 7 |
|  |  |  |  |  |  |  | 8 |
|  |  |  |  |  |  |  | 9 |
|  |  |  |  |  |  |  | 10 |
|  |  |  |  |  |  |  | 11 |
|  |  |  |  |  |  |  | 12 |
|  |  |  |  |  |  |  | 13 |
|  |  |  |  |  |  |  | 14 |
| 4,381,565 |  |  |  | 210,773,698 |  | 210,773,698 |  |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

## Schedule Page: 326 Line No.: 1 Column: a

Beaver Falls Municipal Authority figures represent purchase of generation from small producers.

## Schedule Page: 326 Line No.: 2 Column: a

Beaver Valley Power Co. figures represent purchase of generation from small producers.
Schedule Page: 326 Line No.: 4 Column: a
West Penn Power figures represent Duquesne Light "borderline" customers on West Penn Power Company's system.

| Name of Respondent Duquesne Light Company | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
|  | (1) XAn Original (2) $\triangle$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |
| TRANSMISSION OF ELECTRICITY FOR OTHERS (Account 456.1)(Including transactions referred to as 'wheeling') |  |  |  |  |

1. Report all transmission of electricity, i.e., wheeling, provided for other electric utilities, cooperatives, other public authorities, qualifying facilities, non-traditional utility suppliers and ultimate customers for the quarter.
2. Use a separate line of data for each distinct type of transmission service involving the entities listed in column (a), (b) and (c).
3. Report in column (a) the company or public authority that paid for the transmission service. Report in column (b) the company or public authority that the energy was received from and in column (c) the company or public authority that the energy was delivered to. Provide the full name of each company or public authority. Do not abbreviate or truncate name or use acronyms. Explain in a footnote any ownership interest in or affiliation the respondent has with the entities listed in columns (a), (b) or (c)
4. In column (d) enter a Statistical Classification code based on the original contractual terms and conditions of the service as follows: FNO - Firm Network Service for Others, FNS - Firm Network Transmission Service for Self, LFP - "Long-Term Firm Point to Point Transmission Service, OLF - Other Long-Term Firm Transmission Service, SFP - Short-Term Firm Point to Point Transmission Reservation, NF - non-firm transmission service, OS - Other Transmission Service and AD - Out-of-Period Adjustments. Use this code for any accounting adjustments or "true-ups" for service provided in prior reporting periods. Provide an explanation in a footnote for each adjustment. See General Instruction for definitions of codes.

| Line <br> No. | Payment By <br> (Company of Public Authority) <br> (Footnote Affiliation) <br> (a) | Energy Received From <br> (Company of Public Authority) <br> (Footnote Affiliation) <br> (b) | Energy Delivered To <br> (Company of Public Authority) <br> (Footnote Affiliation) <br> (c) |
| ---: | :---: | :---: | :---: | :---: |
| 1 | Aptatistical <br> Classifi- <br> cation <br> (d) |  |  |
| 2 | PJM Interconnection, LLC (1) | Applied Energy Services-BVP | Applied Energy Services-BVP |


| Name of Respondent |  | Report Is: | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  | X An Original <br> - A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

5. In column (e), identify the FERC Rate Schedule or Tariff Number, On separate lines, list all FERC rate schedules or contract designations under which service, as identified in column (d), is provided.
6. Report receipt and delivery locations for all single contract path, "point to point" transmission service. In column (f), report the designation for the substation, or other appropriate identification for where energy was received as specified in the contract. In column (g) report the designation for the substation, or other appropriate identification for where energy was delivered as specified in the contract.
7. Report in column (h) the number of megawatts of billing demand that is specified in the firm transmission service contract. Demand reported in column (h) must be in megawatts. Footnote any demand not stated on a megawatts basis and explain.
8. Report in column (i) and (j) the total megawatthours received and delivered.

| FERC Rate Schedule of Tariff Number (e) | Point of Receipt (Subsatation or Other Designation) (f) | Point of Delivery (Substation or Other Designation) (g) | Billing Demand (MW) (h) | TRANSFER OF ENERGY |  | LineNo. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | MegaWatt Hours Received (i) | MegaWatt Hours Delivered (j) |  |
| 20 | AES-ARCO | Mitchell-Elrama Int |  |  |  | 1 |
|  | DLC Trans Network | Various |  |  |  | 2 |
|  | DLC Trans Network | Various |  |  |  | 3 |
|  | DLC Trans Network | Piney Fork SS |  | 108,706 | 108,706 | 4 |
|  | DLC Trans Network | Various |  |  |  | 5 |
|  |  |  |  |  |  | 6 |
|  |  |  |  |  |  | 7 |
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|  |  |  |  |  |  | 32 |
|  |  |  |  |  |  | 33 |
|  |  |  |  |  |  | 34 |
|  |  |  |  | 108,706 | 108,706 |  |


| Name of Respondent | This Report Is: | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original <br> (2) A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 | (Including transactions reffered to as 'wheeling')

9. In column (k) through ( n ), report the revenue amounts as shown on bills or vouchers. In column (k), provide revenues from demand charges related to the billing demand reported in column (h). In column (I), provide revenues from energy charges related to the amount of energy transferred. In column ( m ), provide the total revenues from all other charges on bills or vouchers rendered, including out of period adjustments. Explain in a footnote all components of the amount shown in column ( m ). Report in column ( n ) the total charge shown on bills rendered to the entity Listed in column (a). If no monetary settlement was made, enter zero (11011) in column ( n ). Provide a footnote explaining the nature of the non-monetary settlement, including the amount and type of energy or service rendered. 10. The total amounts in columns (i) and (j) must be reported as Transmission Received and Transmission Delivered for annual report purposes only on Page 401, Lines 16 and 17, respectively.
10. Footnote entries and provide explanations following all required data.

REVENUE FROM TRANSMISSION OF ELECTRICITY FOR OTHERS

| REVENUE FROM TRANSMISSION OF ELECTRICITY FOR OTHERS |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Demand Charges <br> (\$) <br> (k) | $\begin{aligned} & \text { Energy Charges } \\ & \text { (\$) } \\ & \text { (I) } \\ & \hline \end{aligned}$ | (Other Charges) <br> (\$) <br> (m) | $\begin{gathered} \text { Total Revenues (\$) } \\ (\mathrm{k}+\mathrm{l}+\mathrm{m}) \\ (\mathrm{n}) \\ \hline \end{gathered}$ | Line No. |
|  |  |  |  | 1 |
| 2,645 |  |  | 2,645 | 2 |
| 935,732 |  |  | 935,732 | 3 |
| 48,000 |  |  | 48,000 | 4 |
| 84,175,410 |  |  | 84,175,410 | 5 |
|  |  |  |  | 6 |
|  |  |  |  | 7 |
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|  |  |  |  | 34 |
| 85,161,787 |  |  | 85,161,787 |  |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

Schedule Page: 328 Line No.: 1 Column: d
2/12/13 AES Beaver Valley, LLC submitted a request to FERC to terminate the transmission agreement between AES Beaver Valley \& Duquesne Light Company. Per docket number ER13-927-000 the agreement was terminated effective 3/29/13.
Schedule Page: 328 Line No.: 2 Column: d
Duquesne Light Company's share of the PJM Non-Firm Point-to-Point revenue from the administration of the PJM Interconnection, LLC Open Access Transmission Tariff (OATT).
Schedule Page: 328 Line No.: 3 Column: d
Duquesne Light Company's share of the PJM Firm Point-to-Point revenue from the administration of the PJM Interconnection, LLC OATT.

## Schedule Page: 328 Line No.: 4 Column: d

Net credits due to Duquesne Light Company from PJM Interconnection, LLC for Firm Network Transmission Services from the Duquesne Light transmission system to Allegheny's Piney Fork Substation.
Schedule Page: 328 Line No.: 5 Column: d Net credits due to Duquesne Light Company from PJM Interconnection, LLC for Firm Network Transmission Services for Retail Choice and Municipal Load Servers.



| Name of Respondent | This Report Is: <br> (1) XAA Original <br> (2) A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |

DEPRECIATION AND AMORTIZATION OF ELECTRIC PLANT (Account 403, 404, 405)
(Except amortization of aquisition adjustments)

1. Report in section A for the year the amounts for: (b) Depreciation Expense (Account 403; (c) Depreciation Expense for Asset Retirement Costs (Account 403.1; (d) Amortization of Limited-Term Electric Plant (Account 404); and (e) Amortization of Other Electric Plant (Account 405).
2. Report in Section 8 the rates used to compute amortization charges for electric plant (Accounts 404 and 405). State the basis used to compute charges and whether any changes have been made in the basis or rates used from the preceding report year.
3. Report all available information called for in Section C every fifth year beginning with report year 1971, reporting annually only changes to columns (c) through (g) from the complete report of the preceding year.
Unless composite depreciation accounting for total depreciable plant is followed, list numerically in column (a) each plant subaccount, account or functional classification, as appropriate, to which a rate is applied. Identify at the bottom of Section C the type of plant included in any sub-account used.
In column (b) report all depreciable plant balances to which rates are applied showing subtotals by functional Classifications and showing composite total. Indicate at the bottom of section C the manner in which column balances are obtained. If average balances, state the method of averaging used.
For columns (c), (d), and (e) report available information for each plant subaccount, account or functional classification Listed in column (a). If plant mortality studies are prepared to assist in estimating average service Lives, show in column (f) the type mortality curve selected as most appropriate for the account and in column (g), if available, the weighted average remaining life of surviving plant. If composite depreciation accounting is used, report available information called for in columns (b) through (g) on this basis.
4. If provisions for depreciation were made during the year in addition to depreciation provided by application of reported rates, state at the bottom of section $C$ the amounts and nature of the provisions and the plant items to which related.

|  | A. Summary of Depreciation and Amortization Charges |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{array}{\|l\|l} \text { Line } \\ \text { No. } \end{array}$ | Functional Classification <br> (a) | $\begin{gathered} \text { Depreciation } \\ \text { Expense } \\ \text { (Account 403) } \\ \text { (b) } \\ \hline \end{gathered}$ | Depreciation Expense for Asset Retirement Costs (Account 403.1) <br> (c) | Amortization of Limited Term Electric Plant (Account 404) <br> (d) | Amortization of Other Electric Plant (Acc 405) (e) | Total <br> (f) |
| 1 | Intangible Plant |  |  | 44,594,487 |  | 44,594,487 |
| 2 | Steam Production Plant |  |  |  |  |  |
| 3 | Nuclear Production Plant |  |  |  |  |  |
| 4 | Hydraulic Production Plant-Conventional |  |  |  |  |  |
| 5 | Hydraulic Production Plant-Pumped Storage |  |  |  |  |  |
| 6 | Other Production Plant |  |  |  |  |  |
| 7 | Transmission Plant | 24,243,797 |  |  |  | 24,243,797 |
| 8 | Distribution Plant | 78,074,262 |  |  |  | 78,074,262 |
| 9 | Regional Transmission and Market Operation |  |  |  |  |  |
| 10 | General Plant | 19,675,968 |  | 796,782 |  | 20,472,750 |
| $\begin{aligned} & 11 \\ & 12 \end{aligned}$ | Common Plant-Electric TOTAL | 121,994,027 |  | 45,391,269 |  | 167,385,296 |
|  |  | B. Basis for Am | tization Charges |  |  |  |



| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) _ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |


| Schedule Page: 336 Line No.: 43 Column: c |  |  |
| :---: | :---: | :---: |
| Transportation equipment is | depreciated on a straig | as follows: |
| Classification | Est. Avg. Service Life | Rates |
| Passenger Cars | 72 Months | 16.667\% |
| Truck, Light | 84 Months | 14.29\% |
| Truck, Medium | 120 Months | 10\% |
| Truck, Heavy | 132 Months | 9.09\% |
| Trailer | 240 Months | 5\% |
| Schedule Page: 336 Line No.: 47 Column: c |  |  |
| Power Operated equipment is | depreciated on a straig | as follows: |
| Classification | Est. Avg. Service Life | Rates |
| Power Operated Equipment | 240 Months | 5\% |


| Name of Respondent | This Report | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original <br> (2) A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

1. Report particulars (details) of regulatory commission expenses incurred during the current year (or incurred in previous years, if being amortized) relating to format cases before a regulatory body, or cases in which such a body was a party.
2. Report in columns (b) and (c), only the current year's expenses that are not deferred and the current year's amortization of amounts deferred in previous years.


| Name of Respondent | This Repor | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAA Original (2) A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |

3. Show in column (k) any expenses incurred in prior years which are being amortized. List in column (a) the period of amortization.
4. List in column (f), (g), and (h) expenses incurred during year which were charged currently to income, plant, or other accounts.
5. Minor items (less than $\$ 25,000$ ) may be grouped.

| EXPENSES INCURRED DURING YEAR |  |  |  | AMORTIZED DURING YEAR |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CURRENTLY CHARGED TO |  |  | Deferred to Account 182.3 (i) | Contra Account <br> (j) | Amount(k) | Deferred in Account 182.3 End of Year (I) | $\begin{gathered} \hline \text { Line } \\ \text { No. } \end{gathered}$ |
| $\begin{aligned} & \text { Department } \\ & \text { (f) } \\ & \hline \end{aligned}$ | Account No. (g) | Amount <br> (h) |  |  |  |  |  |
|  | 1823266 |  |  | 426.2 | 298,750 | 5,505 | 1 |
|  |  |  |  |  |  |  | 2 |
|  |  |  |  |  |  |  | 3 |
|  | 1823280 | 2,782 | 2,782 | 928 | 697,989 | 1,395,980 | 4 |
|  |  |  |  |  |  |  | 5 |
|  |  |  |  |  |  |  | 6 |
|  | 1823244 | 5,313 | 5,313 | 928 | 84,433 | 373,946 | 7 |
|  |  |  |  |  |  |  | 8 |
|  |  |  |  |  |  |  | 9 |
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|  |  |  |  |  |  |  | 45 |
|  |  |  |  |  |  |  | 45 |
|  |  | 8,095 | 8,095 |  | 1,081,172 | 1,775,431 | 46 |


| Name of Respondent | This Report Is: | Date of Report | Yea | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & \text { 04/29/2020 } \end{aligned}$ | End of | 2019/Q4 |

Report below the distribution of total salaries and wages for the year. Segregate amounts originally charged to clearing accounts to Utility Departments, Construction, Plant Removals, and Other Accounts, and enter such amounts in the appropriate lines and columns provided. In determining this segregation of salaries and wages originally charged to clearing accounts, a method of approximation giving substantially correct results may be used.

| Line No. | Classification <br> (a) | Direct Payroll Distribution <br> (b) | Allocation of Payroll charged for Clearing Accounts (c) | Total <br> (d) |
| :---: | :---: | :---: | :---: | :---: |
| 1 | Electric |  |  |  |
| 2 | Operation |  |  |  |
| 3 | Production |  |  |  |
| 4 | Transmission | 6,058,775 |  |  |
| 5 | Regional Market |  |  |  |
| 6 | Distribution | 12,891,101 |  |  |
| 7 | Customer Accounts | 11,583,910 |  |  |
| 8 | Customer Service and Informational | 525,783 |  |  |
| 9 | Sales |  |  |  |
| 10 | Administrative and General | 37,609,083 |  |  |
| 11 | TOTAL Operation (Enter Total of lines 3 thru 10) | 68,668,652 |  |  |
| 12 | Maintenance |  |  |  |
| 13 | Production |  |  |  |
| 14 | Transmission | 2,614,730 |  |  |
| 15 | Regional Market |  |  |  |
| 16 | Distribution | 13,970,717 |  |  |
| 17 | Administrative and General | 3,131,031 |  |  |
| 18 | TOTAL Maintenance (Total of lines 13 thru 17) | 19,716,478 |  |  |
| 19 | Total Operation and Maintenance |  |  |  |
| 20 | Production (Enter Total of lines 3 and 13) |  |  |  |
| 21 | Transmission (Enter Total of lines 4 and 14) | 8,673,505 |  |  |
| 22 | Regional Market (Enter Total of Lines 5 and 15) |  |  |  |
| 23 | Distribution (Enter Total of lines 6 and 16) | 26,861,818 |  |  |
| 24 | Customer Accounts (Transcribe from line 7) | 11,583,910 |  |  |
| 25 | Customer Service and Informational (Transcribe from line 8) | 525,783 |  |  |
| 26 | Sales (Transcribe from line 9) |  |  |  |
| 27 | Administrative and General (Enter Total of lines 10 and 17) | 40,740,114 |  |  |
| 28 | TOTAL Oper. and Maint. (Total of lines 20 thru 27) | 88,385,130 | 4,534,958 | 92,920,088 |
| 29 | Gas |  |  |  |
| 30 | Operation |  |  |  |
| 31 | Production-Manufactured Gas |  |  |  |
| 32 | Production-Nat. Gas (Including Expl. and Dev.) |  |  |  |
| 33 | Other Gas Supply |  |  |  |
| 34 | Storage, LNG Terminaling and Processing |  |  |  |
| 35 | Transmission |  |  |  |
| 36 | Distribution |  |  |  |
| 37 | Customer Accounts |  |  |  |
| 38 | Customer Service and Informational |  |  |  |
| 39 | Sales |  |  |  |
| 40 | Administrative and General |  |  |  |
| 41 | TOTAL Operation (Enter Total of lines 31 thru 40) |  |  |  |
| 42 | Maintenance |  |  |  |
| 43 | Production-Manufactured Gas |  |  |  |
| 44 | Production-Natural Gas (Including Exploration and Development) |  |  |  |
| 45 | Other Gas Supply |  |  |  |
| 46 | Storage, LNG Terminaling and Processing |  |  |  |
| 47 | Transmission |  |  |  |
|  |  |  |  |  |


| Name of Respondent | This Report Is:(1) $\triangle$ An Original(2) $\square$ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |


| $\begin{array}{\|l\|l} \hline \text { Line } \\ \text { No. } \end{array}$ | Classification <br> (a) | Direct Payroll Distribution <br> (b) | Allocation of Payroll charged for Clearing Accounts (c) | Total <br> (d) |
| :---: | :---: | :---: | :---: | :---: |
| 48 | Distribution |  |  |  |
| 49 | Administrative and General |  |  |  |
| 50 | TOTAL Maint. (Enter Total of lines 43 thru 49) |  |  |  |
| 51 | Total Operation and Maintenance |  |  |  |
| 52 | Production-Manufactured Gas (Enter Total of lines 31 and 43) |  |  |  |
| 53 | Production-Natural Gas (Including Expl. and Dev.) (Total lines 32, |  |  |  |
| 54 | Other Gas Supply (Enter Total of lines 33 and 45) |  |  |  |
| 55 | Storage, LNG Terminaling and Processing (Total of lines 31 thru 47) |  |  |  |
| 56 | Transmission (Lines 35 and 47) |  |  |  |
| 57 | Distribution (Lines 36 and 48) |  |  |  |
| 58 | Customer Accounts (Line 37) |  |  |  |
| 59 | Customer Service and Informational (Line 38) |  |  |  |
| 60 | Sales (Line 39) |  |  |  |
| 61 | Administrative and General (Lines 40 and 49) |  |  |  |
| 62 | TOTAL Operation and Maint. (Total of lines 52 thru 61) |  |  |  |
| 63 | Other Utility Departments |  |  |  |
| 64 | Operation and Maintenance |  |  |  |
| 65 | TOTAL All Utility Dept. (Total of lines 28, 62, and 64) | 88,385,130 | 4,534,958 | 92,920,088 |
| 66 | Utility Plant |  |  |  |
| 67 | Construction (By Utility Departments) |  |  |  |
| 68 | Electric Plant | 78,482,672 | 4,026,872 | 82,509,544 |
| 69 | Gas Plant |  |  |  |
| 70 | Other (provide details in footnote): |  |  |  |
| 71 | TOTAL Construction (Total of lines 68 thru 70) | 78,482,672 | 4,026,872 | 82,509,544 |
| 72 | Plant Removal (By Utility Departments) |  |  |  |
| 73 | Electric Plant | 6,014,296 | 308,588 | 6,322,884 |
| 74 | Gas Plant |  |  |  |
| 75 | Other (provide details in footnote): |  |  |  |
| 76 | TOTAL Plant Removal (Total of lines 73 thru 75) | 6,014,296 | 308,588 | 6,014,296 |
| 77 | Other Accounts (Specify, provide details in footnote): |  |  |  |
| 78 |  |  |  |  |
| 79 |  |  |  |  |
| 80 |  |  |  |  |
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| 91 |  |  |  |  |
| 92 |  |  |  |  |
| 93 |  |  |  |  |
| 94 |  |  |  |  |
| 95 | TOTAL Other Accounts |  |  |  |
| 96 | TOTAL SALARIES AND WAGES | 172,882,098 | 8,870,418 | 181,443,928 |
|  |  |  |  |  |


| Name of Respondent | This Repor | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) Х $\overline{\text { An Original }}$ <br> (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

1. The respondent shall report below the details called for concerning amounts it recorded in Account 555, Purchase Power, and Account 447, Sales for Resale, for items shown on ISO/RTO Settlement Statements. Transactions should be separately netted for each ISO/RTO administered energy market for purposes of determining whether an entity is a net seller or purchaser in a given hour. Net megawatt hours are to be used as the basis for determining whether a net purchase or sale has occurred. In each monthly reporting period, the hourly sale and purchase net amounts are to be aggregated and separately reported in Account 447, Sales for Resale, or Account 555, Purchased Power, respectively.

| $\begin{array}{\|c\|} \hline \text { Line } \\ \text { No. } \\ \hline \end{array}$ | Description of Item(s) <br> (a) | Balance at End of Quarter 1 <br> (b) | Balance at End of Quarter 2 <br> (c) | Balance at End of Quarter 3 <br> (d) | Balance at End of Year <br> (e) |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Energy |  |  |  |  |
| 2 | Net Purchases (Account 555) | 115) | 115) | 115) | ( 69,115) |
| 3 | Net Sales (Account 447) |  |  |  |  |
| 4 | Transmission Rights |  |  |  |  |
| 5 | Ancillary Services | ( 158) | ( 2,592) | ( 2,256) | ( 2,359) |
| 6 | Other Items (list separately) |  |  |  |  |
| 7 | Transmission Congestion |  | ( 9,235) | ( 28,145) | ( 28,145) |
| 8 | Capacity Credit Market |  | ( 351) | ( 1,082) | ( 1,082) |
| 9 | Transmission Losses |  |  |  | 6,646 |
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| 44 |  |  |  |  |  |
| 45 |  |  |  |  |  |
| 46 | TOTAL | ( 273) | ( 12,293) | ( 31,598) | ( 94,055) |


| Name of Respondent | This Re | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & (\mathrm{Mo}, \mathrm{Da}, \mathrm{Yr}) \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

Report the amounts for each type of ancillary service shown in column (a) for the year as specified in Order No. 888 and defined in the respondents Open Access Transmission Tariff.

In columns for usage, report usage-related billing determinant and the unit of measure.
(1) On line 1 columns (b), (c), (d), (e), (f) and (g) report the amount of ancillary services purchased and sold during the year.
(2) On line 2 columns (b) (c), (d), (e), (f), and (g) report the amount of reactive supply and voltage control services purchased and sold during the year.
(3) On line 3 columns (b) (c), (d), (e), (f), and (g) report the amount of regulation and frequency response services purchased and sold during the year.
(4) On line 4 columns (b), (c), (d), (e), (f), and (g) report the amount of energy imbalance services purchased and sold during the year.
(5) On lines 5 and 6, columns (b), (c), (d), (e), (f), and (g) report the amount of operating reserve spinning and supplement services purchased and sold during the period.
(6) On line 7 columns (b), (c), (d), (e), (f), and (g) report the total amount of all other types ancillary services purchased or sold during the year. Include in a footnote and specify the amount for each type of other ancillary service provided.

|  |  | Amount Purchased for the Year |  |  | Amount Sold for the Year |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Usage - Related Billing Determinant |  |  | Usage - Related Billing Determinant |  |  |
| $\begin{array}{\|c} \text { Line } \\ \text { No. } \end{array}$ | Type of Ancillary Service <br> (a) | Number of Units <br> (b) | Unit of Measure (c) | Dollars <br> (d) | Number of Units <br> (e) | Unit of Measure (f) | Dollars <br> (g) |
| 1 | Scheduling, System Control and Dispatch |  | \$/MWH |  |  |  |  |
| 2 | Reactive Supply and Voltage |  | \$/MW | -1,699 |  |  |  |
| 3 | Regulation and Frequency Response |  | \$/MWH |  |  |  |  |
| 4 | Energy Imbalance |  |  |  |  |  |  |
| 5 | Operating Reserve - Spinning |  | \$/MWH | -803 |  |  |  |
| 6 | Operating Reserve - Supplement |  | \$/MWH | -25 |  |  |  |
| 7 | Other |  |  |  |  |  |  |
| 8 | Total (Lines 1 thru 7) |  |  | -2,527 |  |  |  |
|  |  |  |  |  |  |  |  |


| Name of Respondent |  | po | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  | XAn Original A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

(1) Report the monthly peak load on the respondent's transmission system. If the respondent has two or more power systems which are not physically integrated, furnish the required information for each non-integrated system.
(2) Report on Column (b) by month the transmission system's peak load.
(3) Report on Columns (c ) and (d) the specified information for each monthly transmission - system peak load reported on Column (b)
(4) Report on Columns (e) through (j) by month the system' monthly maximum megawatt load by statistical classifications. See General Instruction for the definition of each statistical classification.

| NAM | OF SYSTE |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line No. | Month <br> (a) | Monthly Peak MW - Total <br> (b) | Day of Monthly Peak (c) | Hour of Monthly Peak <br> (d) | Firm Network Service for Self <br> (e) | Firm Network Service for Others <br> (f) | Long-Term Firm <br> Point-to-point Reservations (g) | Other LongTerm Firm Service <br> (h) | Short-Term Firm Point-to-point Reservation (i) | Other Service <br> (j) |
| 1 | January | 2,174 | 30 | 19 | 844 | 1,329 |  |  |  |  |
| 2 | February | 2,060 | 1 | 11 | 713 | 1,348 |  |  |  |  |
| 3 | March | 1,912 | 5 | 20 | 712 | 1,200 |  |  |  |  |
| 4 | Total for Quarter 1 |  |  |  | 2,269 | 3,877 |  |  |  |  |
| 5 | April | 1,629 | 1 | 9 | 506 | 1,123 |  |  |  |  |
| 6 | May | 2,208 | 28 | 17 | 787 | 1,421 |  |  |  |  |
| 7 | June | 2,495 | 27 | 15 | 912 | 1,583 |  |  |  |  |
| 8 | Total for Quarter 2 |  |  |  | 2,205 | 4,127 |  |  |  |  |
| 9 | July | 2,691 | 10 | 17 | 1,061 | 1,630 |  |  |  |  |
| 10 | August | 2,641 | 20 | 17 | 1,038 | 1,604 |  |  |  |  |
| 11 | September | 2,592 | 11 | 18 | 1,029 | 1,563 |  |  |  |  |
| 12 | Total for Quarter 3 |  |  |  | 3,128 | 4,797 |  |  |  |  |
| 13 | October | 2,443 | 3 | 16 | 915 | 1,528 |  |  |  |  |
| 14 | November | 1,784 | 13 | 18 | 622 | 1,161 |  |  |  |  |
| 15 | December | 1,939 | 18 | 19 | 736 | 1,204 |  |  |  |  |
| 16 | Total for Quarter 4 |  |  |  | 2,273 | 3,893 |  |  |  |  |
| 17 | Total Year to Date/Year |  |  |  | 9,875 | 16,694 |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |


| Name of Respondent | This Repo | Date of Report | Year/P | of Report |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original (2) $\Rightarrow$ A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |

MONTHLY ISO/RTO TRANSMISSION SYSTEM PEAK LOAD
(1) Report the monthly peak load on the respondent's transmission system. If the Respondent has two or more power systems which are not physically integrated, furnish the required information for each non-integrated system.
(2) Report on Column (b) by month the transmission system's peak load.
(3) Report on Column (c) and (d) the specified information for each monthly transmission - system peak load reported on Column (b).
(4) Report on Columns (e) through (i) by month the system's transmission usage by classification. Amounts reported as Through and Out Service in Column ( g ) are to be excluded from those amounts reported in Columns (e) and (f).
(5) Amounts reported in Column (j) for Total Usage is the sum of Columns (h) and (i).

| Line <br> No. | Month <br> (a) | Monthly Peak MW - Total <br> (b) | Day of <br> Monthly <br> Peak <br> (c) | Hour of Monthly Peak <br> (d) | Imports into ISO/RTO <br> (e) | Exports from ISO/RTO <br> (f) | Through and Out Service <br> (g) | Network Service Usage <br> (h) | Point-to-Point Service Usage <br> (i) | Total Usage <br> (j) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | January | 2,174 | 30 | 19 |  |  |  | 2,174 |  | 2,174 |
| 2 | February | 2,060 | 1 | 11 |  |  |  | 2,060 |  | 2,060 |
| 3 | March | 1,912 | 5 | 20 |  |  |  | 1,912 |  | 1,912 |
| 4 | Total for Quarter 1 |  |  |  |  |  |  | 6,146 |  | 6,146 |
| 5 | April | 1,629 | 1 | 9 |  |  |  | 1,629 |  | 1,629 |
| 6 | May | 2,208 | 28 | 17 |  |  |  | 2,208 |  | 2,208 |
| 7 | June | 2,495 | 27 | 15 |  |  |  | 2,495 |  | 2,495 |
| 8 | Total for Quarter 2 |  |  |  |  |  |  | 6,332 |  | 6,332 |
| 9 | July | 2,691 | 10 | 17 |  |  |  | 2,691 |  | 2,691 |
| 10 | August | 2,641 | 20 | 17 |  |  |  | 2,641 |  | 2,641 |
| 11 | September | 2,592 | 11 | 18 |  |  |  | 2,592 |  | 2,592 |
| 12 | Total for Quarter 3 |  |  |  |  |  |  | 7,924 |  | 7,924 |
| 13 | October | 2,443 | 3 | 16 |  |  |  | 2,443 |  | 2,443 |
| 14 | November | 1,784 | 13 | 18 |  |  |  | 1,784 |  | 1,784 |
| 15 | December | 1,939 | 18 | 19 |  |  |  | 1,939 |  | 1,939 |
| 16 | Total for Quarter 4 |  |  |  |  |  |  | 6,166 |  | 6,166 |
| 17 | Total Year to Date/Year |  |  |  |  |  |  | 26,568 |  | 26,568 |
|  |  |  |  |  |  |  |  |  |  |  |


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |
| :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original <br> (2) $\square \mathrm{A}$ Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of 2019/Q4 |
| ELECTRIC ENERGY ACCOUNT |  |  |  |

Report below the information called for concerning the disposition of electric energy generated, purchased, exchanged and wheeled during the year.


| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) X An Original (2) $\square$ A Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |
| MONTHLY PEAKS AND OUTPUT |  |  |  |  |

1. Report the monthly peak load and energy output. If the respondent has two or more power which are not physically integrated, furnish the required information for each non- integrated system.
2. Report in column (b) by month the system's output in Megawatt hours for each month.
3. Report in column (c) by month the non-requirements sales for resale. Include in the monthly amounts any energy losses associated with the sales.
4. Report in column (d) by month the system's monthly maximum megawatt load ( 60 minute integration) associated with the system.
5. Report in column (e) and (f) the specified information for each monthly peak load reported in column (d).

| NAME OF SYSTEM: |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Month <br> (a) | Total Monthly Energy <br> (b) | Monthly Non-Requirments Sales for Resale \& Associated Losses <br> (c) | MONTHLY PEAK |  |  |
| No. |  |  |  | Megawatts (See Instr. 4) <br> (d) | Day of Month <br> (e) | Hour (f) |
| 29 | January | 1,192,963 | 2,618 | 2,154 | 30 | 1800 |
| 30 | February | 1,037,069 | 2,382 | 2,044 | 1 | 1000 |
| 31 | March | 1,090,666 | 2,283 | 1,899 | 5 | 1900 |
| 32 | April | 955,723 | 2,757 | 1,617 | 1 | 800 |
| 33 | May | 1,065,289 | 2,867 | 2,183 | 28 | 1600 |
| 34 | June | 1,138,777 | 2,650 | 2,469 | 27 | 1400 |
| 35 | July | 1,397,352 | 3,141 | 2,662 | 10 | 1600 |
| 36 | August | 1,282,938 | 2,088 | 2,612 | 20 | 1600 |
| 37 | September | 1,154,516 | 1,741 | 2,562 | 11 | 1700 |
| 38 | October | 1,024,081 | 1,494 | 2,417 | 3 | 1500 |
| 39 | November | 974,021 | 2,259 | 1,769 | 13 | 1700 |
| 40 | December | 1,120,400 | 2,738 | 1,921 | 18 | 1800 |
|  |  |  |  |  |  |  |
| 41 | TOTAL | 13,433,795 | 29,018 |  |  |  |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $X$ An Original <br> (2) A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

Schedule Page: 401 Line No.: 7 Column: b
Includes energy supplied by Electric Generation Suppliers as part of the PA Electric Choice program.
Schedule Page: 401 Line No.: 9 Column: b
Duquesne Light Co. divested all generating assets on April 28, 2000.




| Name of Respondent | This Report Is: | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) $\triangle$ An Original (2) $\square$ A Resubmission | $\begin{aligned} & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | End of | 2019/Q4 |

1. Report information concerning transmission lines, cost of lines, and expenses for year. List each transmission line having nominal voltage of 132 kilovolts or greater. Report transmission lines below these voltages in group totals only for each voltage.
2. Transmission lines include all lines covered by the definition of transmission system plant as given in the Uniform System of Accounts. Do not report substation costs and expenses on this page.
3. Report data by individual lines for all voltages if so required by a State commission.
4. Exclude from this page any transmission lines for which plant costs are included in Account 121, Nonutility Property.
5. Indicate whether the type of supporting structure reported in column (e) is: (1) single pole wood or steel; (2) H-frame wood, or steel poles; (3) tower; or (4) underground construction If a transmission line has more than one type of supporting structure, indicate the mileage of each type of construction by the use of brackets and extra lines. Minor portions of a transmission line of a different type of construction need not be distinguished from the remainder of the line.
6. Report in columns (f) and (g) the total pole miles of each transmission line. Show in column (f) the pole miles of line on structures the cost of which is reported for the line designated; conversely, show in column (g) the pole miles of line on structures the cost of which is reported for another line. Report pole miles of line on leased or partly owned structures in column (g). In a footnote, explain the basis of such occupancy and state whether expenses with respect to such structures are included in the expenses reported for the line designated.

| Line No. | DESIGNATION |  | VOLTAGE (KV) (Indicate where other than 60 cycle, 3 phase) |  | Type of Supporting Structure (e) | $\begin{aligned} & \text { LENGTH (Pole miles) } \\ & \text { (In the case of } \\ & \text { reporground Ilines } \\ & \text { report circuit miles) } \end{aligned}$ |  | Number Of Circuits (h) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | From <br> (a) | To <br> (b) | Operating <br> (c) | Designed <br> (d) |  | On Structure of Line Designated (f) | On Structures of Anothe <br> (g) |  |
| , | Arsenal | Logans Ferry | 345.00 | 345.00 | (Corten Pole) | 7.81 |  |  |
| 2 | Beaver Valley | Sammis | 345.00 | 345.00 | Tower |  |  |  |
| 3 | Beaver Valley | Clinton | 345.00 | 345.00 | (Tower) | 13.27 |  |  |
| 4 | Beaver Valley | Clinton | 345.00 | 345.00 | (Corten Pole) | 1.45 |  |  |
| 5 | Mansfield | Crescent | 345.00 | 345.00 | (Tower) | 1.95 |  | 1 |
|  | Mansfield | Crescent | 345.00 | 345.00 | (Corten Pole) | 9.68 |  |  |
| 7 | Beaver Valley | Mansfield | 345.00 | 345.00 | Tower |  |  | 1 |
| 8 | Beaver Valley | Crescent | 345.00 | 345.00 | (Tower) | 0.78 | 12.04 | 1 |
| 9 | Beaver Valley | Crescent | 345.00 | 345.00 | (Corten Pole) | 2.96 |  |  |
| 10 | Clinton | Collier | 345.00 | 345.00 | (Tower) |  | 1.27 | 1 |
| 11 | Clinton | Collier | 345.00 | 345.00 | (Corten Pole) | 12.68 |  |  |
| 12 | Brunot Island | Crescent | 345.00 | 345.00 | (Tower) |  | 1.05 | 1 |
| 13 | Brunot Island | Crescent | 345.00 | 345.00 | (Corten Pole) |  | 24.49 | 1 |
| 14 | Other Transmission | Lines | 69.00 | 69.00 | TowerHframe | 15.75 |  | 2 |
| 15 |  |  |  |  |  |  |  |  |
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| 35 |  |  |  |  |  |  |  |  |
| 36 |  |  |  |  | TOTAL | 432.41 | 235.48 | 104 |


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | Year/Period of Report <br> End <br> (1) XAn Original <br> 2019/Q4 |
| :--- | :--- | :--- | :--- |
|  | (2) $\square$ A Resubmission |  |  |

7. Do not report the same transmission line structure twice. Report Lower voltage Lines and higher voltage lines as one line. Designate in a footnote if you do not include Lower voltage lines with higher voltage lines. If two or more transmission line structures support lines of the same voltage, report the pole miles of the primary structure in column (f) and the pole miles of the other line(s) in column (g)
8. Designate any transmission line or portion thereof for which the respondent is not the sole owner. If such property is leased from another company, give name of lessor, date and terms of Lease, and amount of rent for year. For any transmission line other than a leased line, or portion thereof, for which the respondent is not the sole owner but which the respondent operates or shares in the operation of, furnish a succinct statement explaining the arrangement and giving particulars (details) of such matters as percent ownership by respondent in the line, name of co-owner, basis of sharing expenses of the Line, and how the expenses borne by the respondent are accounted for, and accounts affected. Specify whether lessor, co-owner, or other party is an associated company.
9. Designate any transmission line leased to another company and give name of Lessee, date and terms of lease, annual rent for year, and how determined. Specify whether lessee is an associated company.
10. Base the plant cost figures called for in columns (j) to (I) on the book cost at end of year.


| Name of Respondent | This Re | Date of Report | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company | (1) XAn Original <br> (2) $\square \mathrm{A}$ Resubmission | (Mo, Da, Yr) 04/29/2020 | End of | 2019/Q4 |

7. Do not report the same transmission line structure twice. Report Lower voltage Lines and higher voltage lines as one line. Designate in a footnote if you do not include Lower voltage lines with higher voltage lines. If two or more transmission line structures support lines of the same voltage, report the pole miles of the primary structure in column (f) and the pole miles of the other line(s) in column (g)
8. Designate any transmission line or portion thereof for which the respondent is not the sole owner. If such property is leased from another company, give name of lessor, date and terms of Lease, and amount of rent for year. For any transmission line other than a leased line, or portion thereof, for which the respondent is not the sole owner but which the respondent operates or shares in the operation of, furnish a succinct statement explaining the arrangement and giving particulars (details) of such matters as percent ownership by respondent in the line, name of co-owner, basis of sharing expenses of the Line, and how the expenses borne by the respondent are accounted for, and accounts affected. Specify whether lessor, co-owner, or other party is an associated company.
9. Designate any transmission line leased to another company and give name of Lessee, date and terms of lease, annual rent for year, and how determined. Specify whether lessee is an associated company.
10. Base the plant cost figures called for in columns (j) to (I) on the book cost at end of year

| Size of Conductor and Material <br> (i) | COST OF LINE (Include in Column (j) Land, Land rights, and clearing right-of-way) |  |  | EXPENSES, EXCEPT DEPRECIATION AND TAXES |  |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Land <br> (j) | Construction and Other Costs <br> (k) | Total Cost <br> (I) | Operation Expenses (m) | Maintenance Expenses (n) | Rents <br> (o) | Total Expenses (p) |  |
| (17) |  | 9,654,677 | 9,654,677 |  |  |  |  | 1 |
| (19) |  |  |  |  |  |  |  | 2 |
| (19) |  | 11,153,851 | 11,153,851 |  |  |  |  | 3 |
| (8) (9) | 550 | 2,567,185 | 2,567,735 |  |  |  |  | 4 |
| (9) (17) |  |  |  |  |  |  |  | 5 |
| (8) (9) (17) |  | 2,244,373 | 2,244,373 |  |  |  |  | 6 |
| (17) |  | 899,491 | 899,491 |  |  |  |  | 7 |
| (17) | 550 | 511,776 | 512,326 |  |  |  |  | 8 |
| (8) (9) (14) | 246,447 | 2,531,817 | 2,778,264 |  |  |  |  | 9 |
| (9) | 191,27¢ | 4,842,006 | 5,033,282 |  |  |  |  | 10 |
| (9) |  | 1,434,455 | 1,434,455 |  |  |  |  | 11 |
| (8) (9) | 63,869 | 1,299,041 | 1,362,909 |  |  |  |  | 12 |
| (17) |  | 12,946,729 | 12,946,729 |  |  |  |  | 13 |
| (17) |  | 5,718,735 | 5,718,735 |  |  |  |  | 14 |
| (9) | 84,866 | 2,337,936 | 2,422,802 |  |  |  |  | 15 |
| 8, 9, 10, 17, 22 | 1,879,93 | 1,692,864 | 3,572,798 |  |  |  |  | 16 |
| (17) | 31,955 | 1,153,453 | 1,185,408 |  |  |  |  | 17 |
| (17) |  | 670,006 | 670,006 |  |  |  |  | 18 |
| (9) |  | 6,168,020 | 6,168,020 |  |  |  |  | 19 |
| (3) (8) (9) |  |  |  |  |  |  |  | 20 |
| (16) |  | 22,340,058 | 22,340,058 |  |  |  |  | 21 |
| (9) (22) | 62,449 | 1,804,291 | 1,866,740 |  |  |  |  | 22 |
| (8) (9) | 1,246,649 | 7,471,393 | 8,718,042 |  |  |  |  | 23 |
| (20) (21) |  | 229,726 | 229,726 |  |  |  |  | 24 |
| (20) (21) |  | 483,618 | 483,618 |  |  |  |  | 25 |
| (8) |  | 89,147 | 89,147 |  |  |  |  | 26 |
| (8) (9) |  | 746,437 | 746,437 |  |  |  |  | 27 |
| (8) (9) | 3,162 | 2,296,527 | 2,299,689 |  |  |  |  | 28 |
| (8) (9) (17) | 53,972 | 3,237,788 | 3,291,760 |  |  |  |  | 29 |
| (9) (17) |  | 789,243 | 789,243 |  |  |  |  | 30 |
| (17) |  |  |  |  |  |  |  | 31 |
| (9) | 179,349 | 1,195,374 | 1,374,720 |  |  |  |  | 32 |
| (8) (9) | 18,021 | 5,049,911 | 5,067,932 |  |  |  |  | 33 |
| (9) |  | 75,143 | 75,143 |  |  |  |  | 34 |
| (8) (9) |  | 2,949,714 | 2,949,714 |  |  |  |  | 35 |
|  | 14,014,643 | 469,032,352 | 483,046,995 |  |  |  |  | 36 |


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- |$\quad$| Year/Period of Report |
| :--- |
| End of |
|  |

7. Do not report the same transmission line structure twice. Report Lower voltage Lines and higher voltage lines as one line. Designate in a footnote if you do not include Lower voltage lines with higher voltage lines. If two or more transmission line structures support lines of the same voltage, report the pole miles of the primary structure in column (f) and the pole miles of the other line(s) in column (g)
8. Designate any transmission line or portion thereof for which the respondent is not the sole owner. If such property is leased from another company, give name of lessor, date and terms of Lease, and amount of rent for year. For any transmission line other than a leased line, or portion thereof, for which the respondent is not the sole owner but which the respondent operates or shares in the operation of, furnish a succinct statement explaining the arrangement and giving particulars (details) of such matters as percent ownership by respondent in the line, name of co-owner, basis of sharing expenses of the Line, and how the expenses borne by the respondent are accounted for, and accounts affected. Specify whether lessor, co-owner, or other party is an associated company.
9. Designate any transmission line leased to another company and give name of Lessee, date and terms of lease, annual rent for year, and how determined. Specify whether lessee is an associated company.
10. Base the plant cost figures called for in columns (j) to (I) on the book cost at end of year


| Name of Respondent | This Report Is: | Date of Report <br> (Mo, Da, Yr) <br> Duquesne Light Company | $(1)$ XAn Original |
| :--- | :--- | :--- | :--- |$\quad$| Year/Period of Report |
| :--- |
| End of |
|  |

7. Do not report the same transmission line structure twice. Report Lower voltage Lines and higher voltage lines as one line. Designate in a footnote if you do not include Lower voltage lines with higher voltage lines. If two or more transmission line structures support lines of the same voltage, report the pole miles of the primary structure in column (f) and the pole miles of the other line(s) in column (g)
8. Designate any transmission line or portion thereof for which the respondent is not the sole owner. If such property is leased from another company, give name of lessor, date and terms of Lease, and amount of rent for year. For any transmission line other than a leased line, or portion thereof, for which the respondent is not the sole owner but which the respondent operates or shares in the operation of, furnish a succinct statement explaining the arrangement and giving particulars (details) of such matters as percent ownership by respondent in the line, name of co-owner, basis of sharing expenses of the Line, and how the expenses borne by the respondent are accounted for, and accounts affected. Specify whether lessor, co-owner, or other party is an associated company.
9. Designate any transmission line leased to another company and give name of Lessee, date and terms of lease, annual rent for year, and how determined. Specify whether lessee is an associated company.
10. Base the plant cost figures called for in columns (j) to (I) on the book cost at end of year

| Size of Conductor and Material <br> (i) | COST OF LINE (Include in Column (j) Land, Land rights, and clearing right-of-way) |  |  | EXPENSES, EXCEPT DEPRECIATION AND TAXES |  |  |  | Line <br> No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Land <br> (j) | Construction and Other Costs <br> (k) | Total Cost <br> (I) | Operation Expenses (m) | Maintenance Expenses (n) | Rents <br> (o) | Total Expenses (p) |  |
| (24) |  |  |  |  |  |  |  | 1 |
| (10) | 43,179 |  | 43,179 |  |  |  |  | 2 |
| (24) | 408,099 | 9,234,008 | 9,642,106 |  |  |  |  | 3 |
| (24) |  |  |  |  |  |  |  | 4 |
| (24) | 323,962 | 5,508,561 | 5,832,523 |  |  |  |  | 5 |
| (24) |  |  |  |  |  |  |  | 6 |
| (24) | 42,349 | 10,879 | 53,227 |  |  |  |  | 7 |
| (24) | 159,951 | 7,188,598 | 7,348,549 |  |  |  |  | 8 |
| (24) |  |  |  |  |  |  |  | 9 |
| (24) | 620,71才 | 7,623,894 | 8,244,611 |  |  |  |  | 10 |
| (24) |  |  |  |  |  |  |  | 11 |
| (24) |  |  |  |  |  |  |  | 12 |
| (24) |  | 16,682,963 | 16,682,963 |  |  |  |  | 13 |
| VARIOUS | 2,114,630 | 30,786,811 | 32,901,441 |  |  |  |  | 14 |
|  |  |  |  |  |  |  |  | 15 |
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|  |  |  |  |  |  |  |  |  |
|  | 14,014,643 | 469,032,352 | 483,046,995 |  |  |  |  | 36 |


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) $\underline{X}$ An Original <br> (2) __ A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

## Schedule Page: 422 Line No.: 1 Column: i

Size of Conductor and Material:
(1) $1 / 0$ Bare
(2) $4 / 0$ Bare
(3) 336 Aluminum
(4) 500 Bare
(5) 500 MCM
(6) 2-543 ACAR
(7) 636 ACSR
(8) 795 ACSR
(9) 853 ACAR
(10) 954 ACSR
(11) 1024 ACAR
(12) 1500 Aluminum
(13) 1500 Oil Static
(14) 1590 Aluminum
(15) 2500 KCM Aluminum
(16) 2500 KCM Copper
(17) 795 ACSS
(18) 1250 KCM Copper
(19) 3000 KCM Copper
(20) 2-795 ACSR
(21) 2-795 ACSS
(22) 2-853 ACAR
(23) 2-954 ACSR
(24) 2-1024 ACAR
(25) 3500 KCM Copper
(26) 958 ACCR/TW


| Name of Respondent | This Report Is:(1) $\quad$ XAn Original(2) $\square$ A Resubmission |  | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |

costs. Designate, however, if estimated amounts are reported. Include costs of Clearing Land and Rights-of-Way, and Roads and
Trails, in column (I) with appropriate footnote, and costs of Underground Conduit in column (m).
3. If design voltage differs from operating voltage, indicate such fact by footnote; also where line is other than 60 cycle, 3 phase, indicate such other characteristic.

| CONDUCTORS |  |  | Voltage <br> KV <br> (Operating) <br> (k) | LINE COST |  |  |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Size <br> (h) | Specification <br> (i) | Configuration and Spacing (j) |  | Land and Land Rights <br> (I) | Poles, Towers and Fixtures (m) | Conductors and Devices (n) | Asset Retire. Costs (o) | Total <br> (p) |  |
| 795 | ACSS |  | 138 |  |  |  |  |  | 1 |
| 795 | ACSS |  | 138 |  |  |  |  |  | 2 |
|  |  |  |  |  |  |  |  |  | 3 |
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| Name of Respondent | This Report Is: <br> (1) XAA Original |  |  | Date of Report (Mo, Da, Yr) | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  |  | End of | 2019/Q4 |

5. Show in columns (I), (j), and (k) special equipment such as rotary converters, rectifiers, condensers, etc. and auxiliary equipment for increasing capacity.
6. Designate substations or major items of equipment leased from others, jointly owned with others, or operated otherwise than by reason of sole ownership by the respondent. For any substation or equipment operated under lease, give name of lessor, date and period of lease, and annual rent. For any substation or equipment operated other than by reason of sole ownership or lease, give name of co-owner or other party, explain basis of sharing expenses or other accounting between the parties, and state amounts and accounts affected in respondent's books of account. Specify in each case whether lessor, co-owner, or other party is an associated company

| Capacity of Substation (In Service) (In MVa) <br> (f) | Number of Transformers In Service (g) | Number of Spare Transformers <br> (h) | CONVERSION APPARATUS AND SPECIAL EQUIPMENT |  |  | Line No. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Type of Equipment <br> (i) | Number of Units <br> (j) | Total Capacity (In MVa) (k) |  |
|  |  |  | Feeds Distr Ckt |  |  | 1 |
|  |  |  |  |  |  | 2 |
|  |  |  |  |  |  | 3 |
| 2 | 1 |  |  |  |  | 4 |
| 350 | 1 |  |  |  |  | 5 |
| 225 | 3 |  |  |  |  | 6 |
| 2 | 1 |  |  |  |  | 7 |
| 2 | 1 |  |  |  |  | 8 |
| 4 | 1 |  |  |  |  | 9 |
| 5 | 2 |  |  |  |  | 10 |
| 12 | 6 |  |  |  |  | 11 |
| 700 | 2 |  |  |  |  | 12 |
|  |  |  |  |  |  | 13 |
| 2 | 1 |  |  |  |  | 14 |
| 16 | 6 | 1 |  |  |  | 15 |
| 4 | 1 |  |  |  |  | 16 |
| 2 | 1 |  |  |  |  | 17 |
| 30 | 1 |  |  |  |  | 18 |
| 350 | 1 | 1 | Shunt Reactor | 4 | 201 | 19 |
| 575 | 7 | 1 | Feeds Dist Ckt. |  |  | 20 |
| 260 | 2 |  |  |  |  | 21 |
| 5 | 1 |  |  |  |  | 22 |
|  |  |  | Feeds Dist Ckt |  |  | 23 |
| 30 | 1 |  |  |  |  | 24 |
|  |  |  |  |  |  | 25 |
| 8 | 2 |  |  |  |  | 26 |
| 12 | 2 |  |  |  |  | 27 |
| 350 | 1 |  |  |  |  | 28 |
| 50 | 1 |  |  |  |  | 29 |
| 2 | 1 |  |  |  |  | 30 |
| 15 | 2 |  |  |  |  | 31 |
|  |  |  |  |  |  | 32 |
|  |  |  | Capacitor Bank |  |  | 33 |
| 6 | 3 |  |  |  |  | 34 |
| 350 | 1 |  |  |  |  | 35 |
| 50 | 1 |  |  |  |  | 36 |
| 3 | 1 |  |  |  |  | 37 |
| 1030 | 3 |  |  |  |  | 38 |
| 4 | 2 |  |  |  |  | 39 |
| 4 | 4 |  |  |  |  | 40 |


5. Show in columns (I), (j), and (k) special equipment such as rotary converters, rectifiers, condensers, etc. and auxiliary equipment for increasing capacity.
6. Designate substations or major items of equipment leased from others, jointly owned with others, or operated otherwise than by reason of sole ownership by the respondent. For any substation or equipment operated under lease, give name of lessor, date and period of lease, and annual rent. For any substation or equipment operated other than by reason of sole ownership or lease, give name of co-owner or other party, explain basis of sharing expenses or other accounting between the parties, and state amounts and accounts affected in respondent's books of account. Specify in each case whether lessor, co-owner, or other party is an associated company


5. Show in columns (I), (j), and (k) special equipment such as rotary converters, rectifiers, condensers, etc. and auxiliary equipment for increasing capacity.
6. Designate substations or major items of equipment leased from others, jointly owned with others, or operated otherwise than by reason of sole ownership by the respondent. For any substation or equipment operated under lease, give name of lessor, date and period of lease, and annual rent. For any substation or equipment operated other than by reason of sole ownership or lease, give name of co-owner or other party, explain basis of sharing expenses or other accounting between the parties, and state amounts and accounts affected in respondent's books of account. Specify in each case whether lessor, co-owner, or other party is an associated company


5. Show in columns (I), (j), and (k) special equipment such as rotary converters, rectifiers, condensers, etc. and auxiliary equipment for increasing capacity.
6. Designate substations or major items of equipment leased from others, jointly owned with others, or operated otherwise than by reason of sole ownership by the respondent. For any substation or equipment operated under lease, give name of lessor, date and period of lease, and annual rent. For any substation or equipment operated other than by reason of sole ownership or lease, give name of co-owner or other party, explain basis of sharing expenses or other accounting between the parties, and state amounts and accounts affected in respondent's books of account. Specify in each case whether lessor, co-owner, or other party is an associated company


5. Show in columns (I), (j), and (k) special equipment such as rotary converters, rectifiers, condensers, etc. and auxiliary equipment for increasing capacity.
6. Designate substations or major items of equipment leased from others, jointly owned with others, or operated otherwise than by reason of sole ownership by the respondent. For any substation or equipment operated under lease, give name of lessor, date and period of lease, and annual rent. For any substation or equipment operated other than by reason of sole ownership or lease, give name of co-owner or other party, explain basis of sharing expenses or other accounting between the parties, and state amounts and accounts affected in respondent's books of account. Specify in each case whether lessor, co-owner, or other party is an associated company


| Name of Respondent <br> Duquesne Light Company | This Report is: <br> (1) X An Original <br> (2) _A Resubmission | Date of Report (Mo, Da, Yr) 04/29/2020 | Year/Period of Report 2019/Q4 |
| :---: | :---: | :---: | :---: |
| FOOTNOTE DATA |  |  |  |

## Schedule Page: 426 Line No.: 33 Column: $i$

Cap Bank Switching Stat. Only

| Name of Respondent | This Report Is: <br> (1) $\triangle$ An Original <br> (2) $\square$ A Resubmission | $\begin{aligned} & \hline \text { Date of Report } \\ & \text { (Mo, Da, Yr) } \\ & 04 / 29 / 2020 \end{aligned}$ | Year/Period of Report |  |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light Company |  |  | End of | 2019/Q4 |

1. Report below the information called for concerning all non-power goods or services received from or provided to associated (affiliated) companies.
2. The reporting threshold for reporting purposes is $\$ 250,000$. The threshold applies to the annual amount billed to the respondent or billed to an associated/affiliated company for non-power goods and services. The good or service must be specific in nature. Respondents should not attempt to include or aggregate amounts in a nonspecific category such as "general"
3. Where amounts billed to or received from the associated (affiliated) company are based on an allocation process, explain in a footnote.

| Line <br> No. | Description of the of <br> Non-Power Good or Service | Name of <br> Associated/Affiliated <br> Company <br> (b) | Account <br> Charged or <br> Credited <br> (c) | Amount <br> Charged or <br> Credited <br> (d) |
| :---: | :---: | :---: | :---: | :---: |

## 1 Non-power Goods or Services Provided by Affiliated

DFR III-F-1b through III-F-1g contain HIGHLY CONFIDENTIAL information and will be provided upon issuance of a Protective Order.
Q.2. Supply projected capital requirements and sources of the filing utility, its parent and system consolidated for the test year and each of 3 comparable future years.
A.2. Attachment III-F-2 provides the requested information.

## DUQUESNE LIGHT COMPANY

Requirements and Sources of Funds
(\$ in Millions)

|  | 2020 | 2021 | 2022 |
| :---: | :---: | :---: | :---: |
| Capital Requirements: |  |  |  |
| Construction* | \$347.7 | \$408.1 | \$380.8 |
| Security Maturities and Revolver Repayments (including intercompany) | 75.0 | - | 82.6 |
| Distributions to Parent | 80.0 | 29.0 | 29.5 |
| Pension Funding | 10.0 | 10.0 | 10.0 |
| Income Tax Payments | 42.4 | 45.6 | 44.0 |
| Financing Costs | 57.6 | 59.1 | 62.7 |
| Other | 31.6 | 6.1 | 8.6 |
| Total Requirements | \$644.3 | \$557.9 | \$618.2 |
| Sources: |  |  |  |
| Total Internal | \$444.3 | \$474.3 | \$468.2 |
| Outside Financing: |  |  |  |
| Long-Term Debt (including intercompany) | 200.0 | 83.6 | 150.0 |
| Short-Term Debt (inlcuding revolver) | - | - | - |
| Total Outside | \$200.0 | \$83.6 | \$150.0 |
| Total Fund Sources | \$644.3 | \$557.9 | \$618.2 |

## DUQUESNE LIGHT HOLDINGS

Requirements and Sources of Funds
(\$ in Millions)

## Capital Requirements:

DLC Construction*
Non-Utility Subsidiary Construction
Security Maturities and revolver Repayments
Distributions to Parent
Pension Funding
Income Tax Payments / (Refunds)
Financing Costs
Other
Total Requirements

## Sources:

Total Internal

| $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ | $\mathbf{2 0 2 2}$ |
| ---: | ---: | ---: |
|  |  |  |
| $\$ 347.7$ | $\$ 408.1$ | $\$ 380.8$ |
| 23.7 | 20.3 | 21.1 |
| 700.0 | 500.0 | 15.9 |
| - | 40.0 | 55.0 |
| 10.0 | 10.0 | 10.0 |
| $(21.0)$ | 21.5 | 36.3 |
| 147.9 | 125.0 | 111.1 |
| 31.5 | 6.1 | 9.6 |
| $\$ 1,239.8$ | $\$ 1,131.0$ | $\$ 639.8$ |
|  |  |  |
|  |  |  |
| $\$ 439.8$ | $\$ 565.1$ | $\$ 489.8$ |
|  |  |  |
|  |  |  |
| 800.0 | 565.9 | 150.0 |
| - | - | - |
| $\$ 800.0$ | $\$ 565.9$ | $\$ 150.0$ |
|  |  |  |
| $\$ 1,239.8$ | $\$ 1,131.0$ | $\$ 639.8$ |

Q.3. State what coverage requirements or capital structure ratios are required in the most restrictive of applicable indentures/charter tests and how these measures have been computed.
A.3. Duquesne Light Company's $\$ 250.0$ million 5-year Revolving Credit Facility ("RCF") expiring October 2024, has a Leverage Ratio that shall not be more than $65.0 \%$. At December 31, 2020, the Company's Leverage as defined by the RCF was $47.8 \%$. See DFR III-F-3 - Attachment A for the computation of the ratio.

Duquesne Light Company's Indenture of Mortgage and Deed of Trust ("Indenture") dated as of October 1, 2004 has two restrictions regarding the issuance of First Mortgage Bonds under the Indenture. The first restriction limits the issuance of secured debt upon the basis of Property Additions (which excludes Funded Property) in a principal amount not to exceed $70 \%$ of the cost or fair value of the utility's assets. A copy of the most recently completed calculation with respect to a new First Mortgage Bond issuance has been attached as DFR III-F-3 - Attachment B. The second restriction requires the Company to provide a Net Earnings Certificate showing the Adjusted Net Earnings of the Company to have been not less than an amount equal to twice the Annual Interest Requirements, as a condition precedent to the issuance of First Mortgage Bonds. A copy of the most recently completed Net Earnings Certificate issued with respect to a new First Mortgage Bond issuance in 2020 has been attached as DFR III-F-3 - Attachment C as reference.

Duquesne Light Company
Revolving Credit Facility Financial Covenant Calculations
(Millions of Dollars)

|  | As of |
| :--- | ---: | ---: |
| $12 / 31 / 2020$ |  |$)$

Duquesne Light Company
Retired First Mortgage Trust Securities Available for Issuance
(Millions of Dollars)

|  | As of |
| :--- | ---: |
|  | $02 / 01 / 20$ |
| Total Qualified Plant | $4,293.5$ |
| Total Bonding Capacity | $3,005.5$ |
| Total Bonds Outstanding | $1,391.9$ |
| Total Unused Capacity | $1,613.6$ |

Total Unused Capacity Allocation:

| Retired Bonds Backed by Plant | $1,251.0$ |
| :--- | ---: |
| Bonds Available from Property Additions | 362.6 |
| Total Unused Capacity | $1,613.6$ |

## DUQUESNE LIGHT COMPANY

## NET EARNINGS CERTIFICATE

(Under Sections 103, 105 and 401(d) of the Indenture of Mortgage and Deed of Trust of Duquesne Light Company)

We, the undersigned, James H. Milligan, the Treasurer of Duquesne Light Company (the "Company"), and Matthew Ankrum, the Controller of the Company and an accountant, in accordance with Sections 103 and 401(d) of the Indenture of Mortgage and Deed of Trust, dated as of April 1, 1992, as supplemented and amended by various instruments and as amended and restated in its entirety by Supplemental Indenture No. 22, dated as of October 1, 2004 and as further supplemented and amended, including as supplemented and amended by Supplemental Indenture No. 33, dated as of April 15, 2020 (as so supplemented, amended and restated, the "Indenture"; capitalized terms used herein and not defined herein having the meanings specified in the Indenture), of the Company to The Bank of New York Mellon Trust Company, N.A. (successor in trust to JPMorgan Chase Trust Company, National Association, successor by merger to The Chase Manhattan Trust Company, N.A., successor in trust to Mellon Bank, N.A.), as trustee, and in connection with the Company Order of even date herewith for the authentication and delivery of $\$ 200,000,000$ in aggregate principal amount of a new series of the Company's Securities, to be designated First Mortgage Bonds, Series AC (the "Bonds"), do hereby certify that the Adjusted Net Earnings for the twelve month period ended December 31, 2019 are not less than an amount equal to twice the Annual Interest Requirements, as shown by the following tabulations:

Adjusted Net Earnings (in millions)
(i) Operating Revenues

Sales of Electric Energy
Other Electric Revenues [excludes profits and losses from the sale and disposition of property of \$0 (net)]
\$ 944.4
19.4

Total Operating Revenues
\$ 963.8
(ii) Operating Expenses

Repairs and Maintenance
Taxes (except as provided in Section 103 of the Indenture)
Other Operating Expenses (including, without limitation, assessments, rentals and insurance; and except as provided in Section 103 of the Indenture)

Total Operating Expenses \$ 511.5
(iii) Amount remaining after deducting (ii) from (i)
(iv) Rental revenues (net of expenses not included in clause (ii) above)
(v) Sum of (iii) and (iv)
(vi) Other income
(vii) Sum of (v) and (vi)
(viii) The amount, if any, by which the aggregate of (A) such other income and (B) that portion of the amount stated in clause (v) which is directly received from the operations of property (other than paving, grading and other improvements to, under or upon public highways, bridges, parks or other public properties of analogous character) not subject to the Lien of the Indenture at the date of this certificate, exceeds twenty per centum ( $20 \%$ ) of the sum stated by clause (vii); provided, however, if the amount stated in clause (v) includes revenues from the operation of property not subject to the Lien of the Indenture, the calculation made pursuant to this clause (viii) includes such reasonable interdepartmental or interproperty revenues and expenses between the Mortgaged Property and the property not subject to the Lien of the Indenture as is allocated to such respective properties by the Company.
$\underline{221.7}$
\$ 232.3
57.5
\$ 452.3
\$ 0.0
\$ 452.3
\$ 2.4
\$ 454.7
0.0
(ix) Adjusted Net Earnings for twelve (12) consecutive months ended December 31, 2019 amount remaining after deducting (viii) from (vii)

Annual Interest Requirements (in millions)
(i) Upon all Securities Outstanding under the Indenture at the date of this Net Earnings Certificate as shown in Schedule A hereto
\$ 52.2
(ii)(a) Upon Securities applied for in the application in connection with which this Net Earnings Certificate is made
(\$200,000,000 aggregate principal amount at a Stated Interest Rate of $3.11 \%$ per annum)
\$ 6.2
(b) Upon Securities applied for in other pending applications
(iii) Upon all Class "A" Bonds Outstanding (none) under Class "A" Mortgages (none), except those held by the Trustee under the Indenture
\$ 0.0
\$ 0.0
(iv) Upon the principal amount of all other indebtedness outstanding at this date and secured by a Lien prior to the Lien of the Indenture upon property subject to the Lien of the Indenture (except indebtedness excluded in accordance with Section 103(b)(iv) of the Indenture)

Total Annual Interest Requirements
\$ 58.4
Twice Annual Interest Requirements

In accordance with Section 105 of the Indenture, the undersigned further hereby certify that:
(a) we have read the Indenture, including without limitation the covenants and conditions precedent provided for therein with respect to compliance with which this Net Earnings Certificate is delivered and the definitions in the Indenture relating thereto;
(b) we have made an examination of the accounting records of the Company and caused to be followed such other procedures as we consider necessary in the circumstances to determine the correctness, in accordance with generally accepted accounting principles applied on a consistent basis and in accordance with the
provisions of the Indenture, of the information in this Net Earnings Certificate set forth;
(c) in our opinion, we have made such examination or investigation as is necessary to enable us to express an informed opinion as to the matters set forth herein and as to whether or not such covenants and conditions have been complied with; and
(d) in our opinion, such covenants and conditions have been complied with.

IN WITNESS WHEREOF, we have executed this Net Earnings Certificate this 5th day of May 2020.


Title: Treasurer

Name: Matthew S. Ankrum
Title: Managing Director, Controller

IN WITNESS WHEREOF, we have executed this Net Earnings Certificate this Fth day of May 2020.

Name: James H. Milligan
Title: Treasurer


Name: Matthew S. Antrum
Title: Managing Director, Controller

## Schedule A

## Securities Outstanding

(May 4, 2020)

| Series <br> No. | Series <br> Designation | Principal <br> Amount Outstanding (\$) | Interest <br> Rate (\%) | Annual Interest Requirement (\$) (1) |
| :---: | :---: | :---: | :---: | :---: |
| 12 | First Mortgage Bond, Pollution Control Series K-3 | 33,955,000 | Variable (0.23\%) | \$78,097 |
| 14 | First Mortgage Bond, Pollution Control Series L-2 | 20,500,000 | Variable (0.23\%) | \$47,150 |
| 15 | First Mortgage Bond, Pollution Control Series L-3 | 4,655,000 | Variable (0.23\%) | \$10,707 |
| 18 | First Mortgage Bond, Pollution Control Series M-3 | 18,000,000 | Variable (0.23\%) | \$41,400 |
| 19 | First Mortgage Bond, Pollution Control Series M-4 | 44,250,000 | Variable (0.23\%) | \$101,775 |
| 20 | First Mortgage Bond, Pollution Control Series M-5 | 75,500,000 | Variable (0.23\%) | \$173,650 |
| 27 | First Mortgage Bond, Series S | 200,000,000 | 4.76 | 9,520,000 |
| 28 | First Mortgage Bond, Series T | 160,000,000 | 4.97 | 7,952,000 |
| 29 | First Mortgage Bond, Series U | 45,000,000 | 5.02 | 2,259,000 |
| 30 | First Mortgage Bond, Series V | 85,000,000 | 5.12 | 4,352,000 |
| 31 | First Mortgage Bond, Series W | 100,000,000 | 3.78 | 3,780,000 |
| 32 | First Mortgage Bond, Series X | 200,000,000 | 3.93 | 7,860,000 |
| 33 | First Mortgage Bond, Series Y | 160,000,000 | 3.93 | 6,288,000 |
| 34 | First Mortgage Bond, Series Z | 60,000,000 | 3.82 | 2,292,000 |
| 35 | First Mortgage Bond, Series AA | 60,000,000 | 3.89 | 2,334,000 |
| 36 | First Mortgage Bond, Series AB | 125,000,000 | 4.04 | 5,050,000 |
|  | Total | 1,391,860,000 |  | \$52,139,779 |

(1) The annual interest requirements in respect of series having variable interest rates are determined by reference to the respective rates in effect on such series on May 4, 2020 (the day preceding the date of this certificate).
Q.4. A schedule of comparative financial data shall be supplied for the test year, the most immediately available annual historical period, prior to the test year, and the 2 calendar years most immediately preceding the test year. Changes in Moody's/S\&P ratings, noted on this schedule, shall be accompanied by the Moody's S\&P write-up of such change, if available. The following financial data and ratios shall be supplied for the utility's parent, where applicable, if not available for the utility.
a. Times interest earned ratio - pre-tax and post-tax basis
b. Preferred stock dividend coverage ratio - post-tax basis
c. Times fixed charges earned ratio - pre-tax basis
d. Earnings per share
e. Dividend per share
f. Average dividend yield (52-week high/low common stock price)
g. Average book value per share
h. Average market price per share
i. Market price-book value ratio
j. Earnings-book value ratio (per share basis, average book value)
k. Dividend payout ratio

1. AFUDC as a $\%$ of earnings available for common equity
m . Construction work in progress as a $\%$ of net utility plant
n. Effective income tax rate
o. Internal cash generations as a \% of total capital requirements
A.4. See DFR III F-4 - Attachment A for above computations (a through o) for the years ended December 31, 2022, December 31, 2021, December 31, 2020 and December 31, 2019.

Changes to credit ratings:
On December 19, 2019, S\&P upgraded Duquesne Light Company's (DLC) credit ratings, specifically the long-term issuer credit rating was revised to ' $\mathrm{BBB}+$ ' from ' BBB ' and the senior secured debt rating was revised to 'A' from 'A-'. DLC's outlook remained 'stable'. The ratings action was the result of a S\&P methodology revision, and not a reflection of action taken by DLC. No additional revisions occurred to DLC's credit ratings or outlook during 2020.

No revisions occurred to Duquesne Light Holdings, Inc.'s credit ratings or outlook during 2019 or 2020.

See DFR III F-4 - Attachment B for detailed listings of credit ratings, and DFR III-F-4 Attachment C for the most recent rating agency publications as well as the publication detailing DLC's 2019 credit ratings upgrade.
a) Times interest earned ratio - pre-tax
b) Times interest earned ratio - - post-tax
c) Preferred stock dividend coverage ratio - post-tax
d) Times fixed charges earned ratio - - pre-tax
e) Earnings per share
f) Dividend per share
g) Average dividend yield (52-week high/low common stock price)
h) Average book value per share
i) Average market price per share
j) Market price-book value ratio
k) Earnings-book value ratio (per share basis, average book value)
I) Dividend payout ratio
m) AFUDC as a \% of earnings available for common equity
n) Construction work in progress as a \% of net utility plant
o) Effective income tax rate
p) Internal cash generations as a \% of total capital requirements

Year Ended Year Ended Year Ended Year Ended Company $\quad 12 / 31 / 2022$ 12/31/2021 $12 / 31 / 2020 \quad 12 / 31 / 2019$

| Duquesne Light | 7.08 | 7.63 | 7.69 | 8.28 |
| :---: | :---: | :---: | :---: | :---: |
| Duquesne Light | 6.39 | 6.88 | 7.06 | 7.40 |
| Duquesne Light | N/A | N/A | N/A | N/A |
| Duquesne Light | 3.59 | 3.94 | 4.10 | 4.68 |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| NA | N/A | N/A | N/A | N/A |
| Duquesne Light | $21.2 \%$ | $19.1 \%$ | $47.0 \%$ | $27.1 \%$ |
| Duquesne Light | $3.2 \%$ | $2.4 \%$ | $2.3 \%$ | $2.1 \%$ |
| Duquesne Light | $8.7 \%$ | $7.8 \%$ | $7.4 \%$ | $6.0 \%$ |
| Duquesne Light | $24.3 \%$ | $22.7 \%$ | $17.7 \%$ | $20.7 \%$ |
| Duquesne Light | $110.5 \%$ | $100.6 \%$ | $90.7 \%$ | $102.6 \%$ |

Duquesne Light Company
Credit ratings

|  | 12/31/2020 | 12/31/2019 | 12/31/2018 |
| :---: | :---: | :---: | :---: |
| Moody's Investors Services: |  |  |  |
| Outlook | Stable | Stable | Stable |
| Secured Debt | A1 | A1 | A1 |
| Issuer Rating | A3 | A3 | A3 |
| Standard \& Poor's Rating Agency: |  |  |  |
| Outlook | Stable | Stable | Stable |
| Secured Debt | A | A | A- |
| Issuer Rating | BBB+ | BBB+ | BBB |

## Duquesne Light Holdings <br> Credit ratings

Moody's Investors Services:

| Outlook | Stable |
| :--- | :---: |
| Senior Unsecured | Baa3 |
| Issuer Rating | NA |

## Standard \& Poor's Rating Agency:

Outlook
Senior Unsecured
Issuer Rating

| Stable | Stable | Stable |
| :---: | :---: | :---: |
| BBB- | BBB- | BBB- |
| BBB | BBB | BBB |

Research Update:

# Duquesne Light Co. Upgraded To 'BBB+' On Revised Group Rating Methodology, Ratings Removed From UCO, Outlook Stable 

December 19, 2019

## Rating Action Overview

- We have reviewed our ratings on Duquesne Light Co. (DLC) that we labeled as under criteria observation (UCO) after publishing our revised Group Rating Methodology criteria on July 1, 2019.
- Following this review, we concluded that the cumulative value of the regulatory and structural protections between DLC and its parent Duquesne Light Holdings Inc. (DLH), are sufficient to insulate our issuer credit rating on DLC from our group credit profile on DLH by as much as one notch.
- We are raising our long-term issuer credit rating on DLC to 'BBB+' from 'BBB' and our issue-level ratings on DLC's first-mortgage bonds to 'A' from 'A-' and are removing our ratings on the company from UCO.
- At the same time, we are revising our stand-alone credit profile (SACP) on DLC to 'aa-' from 'a', largely reflecting our view of the company's track record of effectively managing its regulatory risk that we expect will persist.
- The stable outlook on DLC is consistent with our outlook on parent DLH as well as our expectation that DLC will maintain stand-alone funds from operations (FFO) to debt of about $26 \%-29 \%$ over our forecast period. The stable outlook on DLH reflects our baseline forecast of DLH's consolidated FFO to debt of about 11\%-13\% over the next few years. Our baseline forecast also includes our expectation that DLC will continue to effectively manage its regulatory risk, thereby supporting consistent operating results and a financial profile for DLH that is in line with expectations at the current ratings.


## Rating Action Rationale

The upgrade follows the review of our ratings on DLC under our revised Group Rating Methodology criteria, which we published on July 1, 2019.

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We view the strength of DLC's stand-alone credit profile (SACP), as well as the cumulative value of the regulatory and structural protections that insulate the company from DLH, as warranting an upgrade.

Our analysis of the insulating measures incorporates the following:

- DLC's distribution business is independently regulated by the Pennsylvania Public Utility Commission (PPUC) and its transmission business is independently regulated by the Federal Energy Regulatory Commission;
- DLC holds itself out as a separate entity from DLH;
- DLC has its own funding arrangements including issuing its own long-term debt and has a separate committed credit facility to cover its short-term funding needs;
- DLC has no significant operational dependence on other group entities;
- DLC maintains its own records;
- DLC does not commingle funds, assets, or cash flows with the rest of the DLH group;
- DLC's financial performance is independent of DLH;
- We believe there is a strong economic basis for DLH to preserve DLC's credit strength due to DLC's low-risk, profitable, and regulated operations that make up the vast majority of DLH's operations;
- DLC is a regulated utility with a regulatory capital structure; and
- There are no cross-default provisions between DLC and DLH that imply that a default at DLH would lead to a default at DLC, which supports our opinion that a default at DLH would not directly lead to a default at the company.

We assess the above insulating measures as sufficient to insulate our ratings on DLC from our group credit profile on its parent by as much as one notch. Furthermore, we deem DLC to be a core subsidiary of DLH.

Our revised SACP on DLC primarily stems from the use of our low volatility financial benchmark table to assess DLC's financial measures, which we previously assessed under our medial volatility table. Our revised assessment reflects DLC's track record of effectively managing its regulatory risk in Pennsylvania, and because we expect this track record to persist.

We base our business risk assessment for DLC on its low-risk electric transmission and distribution operations that provide an essential service to DLC's customers. Furthermore, DLC effectively manages its regulatory risk. Although DLC's customer base is smaller than other electric utility peers and is concentrated in one regulatory jurisdiction, it benefits from numerous credit supportive mechanisms, such as future test years and the distribution system improvement charge (DSIC) rider, which mitigate regulatory lag, allow DLC to recover expenditures in between rate cases, and support its cash flow stability. Furthermore, DLC demonstrated effective management of regulatory risk through the PPUC's approval of its distribution rate settlement at the end of 2018, as the company was able to negotiate a constructive settlement with numerous interveners that was beneficial for its future cash flows (a $\$ 40.5$ million net increase to revenues). In addition, the company's business risk benefits from load stability as the electric transmission and distribution (T\&D) provider to the City of Pittsburgh.

We assess DLC's financial measures using our low volatility table, which largely reflects our view of the company's low-risk electric T\&D operations and its effective management of regulatory risk. Under our base case scenario, we expect FFO to debt to average about 26\%-29\%. Our base case
assumes continued use of existing regulatory mechanisms, the impact of the company's most recent rate case, capital spending that averages about $\$ 330$ million annually over the next three years, a dividend policy that enables the company to maintain its debt-to-capitalization ratio at or below its regulatory capital structure, and the refinancing of all debt maturities.

Our assessment of the comparable ratings analysis modifier on the company as negative reflects our holistic view of the company's business risk and financial risk, which we view to be moderately weaker relative to peers with similar stand-alone credit profiles.

## Outlook

The stable outlook on DLC reflects our stable outlook on DLH as well as our expectation that DLC will maintain a stand-alone FFO-to-debt ratio of about $26 \%-29 \%$ over our forecast period. The stable outlook on DLH reflects our baseline forecast of parent DLH's consolidated FFO to debt of about $11 \%-13 \%$ over the next few years. Our baseline forecast also includes our expectation that DLC will continue to effectively manage its regulatory risk, thereby supporting consistent operating results and a financial profile for DLH that is in line with expectations at the current ratings.

## Downside scenario

Absent a downgrade of DLH, we view a downgrade of DLC as unlikely over the next 24 months. However, a downgrade could result if business risk at DLH increases due to an unexpected increase in nonutility operations or if financial performance at DLH is lower than projected, such that DLH's consolidated FFO to debt is less than 9\% for a sustained period. Such deterioration in financial performance could result from inadequate cost recovery or materially large distributions to the company's owners.

## Upside scenario

We could upgrade DLC over the next 24 months if we upgrade DLH, which could occur if consolidated cash flow and leverage improve such that DLH maintains consolidated FFO to debt at more than $13 \%$ and its business profile remains focused on growing its low-risk electric T\&D operations.

## Company Description

DLC engages in the supply (through its provider-of-last-resort services), transmission, and distribution of electricity to about 600,000 customers in Southwestern Pennsylvania, inclusive of the City of Pittsburgh. It is owned by DLH, which is a utility holding company based in Pittsburgh that is ultimately owned by Epsom Investment Pte. Ltd. (an affiliate of Singaporean sovereign wealth fund GIC Pte. Ltd., which owns about $44.4 \%$ of DLH), Three Rivers Utility Holdings LLC (a company whose members are large Dutch pension fund services provider PGGM Infrastructure Fund and subsidiaries of multinational Manulife Financial Corp., which collectively own 30.4\% of DLH), and AIA Energy North America (a fund owned by large Dutch pension manager APG Americas Infrastructure and the California State Teachers' Retirement System, which collectively own $25.2 \%$ of DLH).

## Liquidity

DLC has adequate liquidity, reflecting our expectation that its liquidity sources will exceed uses by more than $1.1 \times$ over the next 12 months, even if EBITDA declines by $10 \%$. Under our stress scenario, we do not expect that DLC would require access to the capital markets during that period to meet its liquidity needs. DLC likely has the ability to absorb a high-impact, low-probability event with limited need for refinancing. Moreover, it has sound relationships with banks, a generally satisfactory standing in the credit markets, and maintains generally prudent risk-management practices.

## Principal Liquidity Sources

- FFO of about \$365 million over the next 12 months;
- Credit facility availability of about \$180 million; and
- Minimal cash on hand.


## Principal Liquidity Uses

- Capital spending of about \$340 million over the next 12 months; and
- No long-term debt maturities in 2020


## Issue Ratings - Recovery Analysis

- We assign recovery ratings to first-mortgage bonds (FMB) issued by U.S. utilities, which can lead us to notch our issue-level ratings above our issuer credit rating on a utility depending on the rating category and the extent of the collateral coverage. The FMBs U.S. utilities issue are a form of secured utility bond (SUB) that qualify for a recovery rating as defined in our criteria (see "Utilities: Collateral Coverage And Issue Notching Rules For '1+' And '1' Recovery Ratings On Senior Bonds Secured By Utility Real Property," published Feb. 14, 2013).
- DLC's FMBs benefit from a first-priority lien on substantially all of the utility's real property owned or subsequently acquired. Collateral coverage of more than $1.5 \times$ supports a recovery rating of ' $1+$ ' and an issue-level rating two notches above the issuer credit rating.


## Ratings Score Snapshot

Issuer credit rating: BBB+/Stable/--
Business risk: Excellent

- Country risk: Very low
- Industry risk: Very low
- Competitive position: Strong

Financial risk: Modest

- Cash flow/leverage: Modest

Anchor: aa
Modifiers

- Diversification/portfolio effect: Neutral (no impact)
- Capital structure: Neutral (no impact)
- Financial policy: Neutral (no impact)
- Liquidity: Adequate (no impact)
- Management and governance: Satisfactory (no impact)
- Comparable rating analysis: Negative (-1 notch)

Stand-alone credit profile: aa-
Group credit profile: bbb

- Entity status within group: Insulated (-4 notches from SACP)


## Related Criteria

- General Criteria: Group Rating Methodology, July 1, 2019
- Criteria | Corporates | General: Corporate Methodology: Ratios And Adjustments, April 1, 2019
- Criteria | Corporates | General: Methodology And Assumptions: Liquidity Descriptors For Global Corporate Issuers, Dec. 16, 2014
- Criteria | Corporates | General: Corporate Methodology, Nov. 19, 2013
- Criteria | Corporates | Utilities: Key Credit Factors For The Regulated Utilities Industry, Nov. 19, 2013
- General Criteria: Methodology: Industry Risk, Nov. 19, 2013
- General Criteria: Country Risk Assessment Methodology And Assumptions, Nov. 19, 2013
- Criteria | Corporates | Utilities: Collateral Coverage And Issue Notching Rules For '1+' And '1' Recovery Ratings On Senior Bonds Secured By Utility Real Property, Feb. 14, 2013
- General Criteria: Methodology: Management And Governance Credit Factors For Corporate Entities, Nov. 13, 2012
- General Criteria: Use Of CreditWatch And Outlooks, Sept. 14, 2009


## Ratings List

| Upgraded; Outlook Action |  |  |
| :--- | :--- | :--- |
|  | To | From |
| Duquesne Light Co. |  |  |
| Issuer Credit Rating | BBB+/Stable/-- | BBB/Stable/-- |
| Raised; Recovery Unchanged |  |  |
| Duquesne Light Co. |  | A- |
| Senior Secured | A | $1+$ |
| Recovery Rating | $1+$ |  |

Certain terms used in this report, particularly certain adjectives used to express our view on rating relevant factors, have specific meanings ascribed to them in our criteria, and should therefore be read in conjunction with such criteria. Please see Ratings Criteria at www.standardandpoors.com for further information. Complete ratings information is available to subscribers of RatingsDirect at www.capitaliq.com. All ratings affected by this rating action can be found on S\&P Global Ratings' public website at www.standardandpoors.com. Use the Ratings search box located in the left column.

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## CREDIT OPINION

29 June 2020

Update

## Rate this Research

RATINGS
Duquesne Light Company

| Domicile | Pittsburgh, <br> Pennsylvania, United <br> States |
| :--- | :--- |
| Long Term Rating | A3 |
| Type | LT Issuer Rating |
| Outlook | Stable |

Please see the ratings section at the end of this report for more information. The ratings and outlook shown reflect information as of the publication date.

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## Duquesne Light Company

## Update to credit analysis

## Summary

Duquesne Light Company's (DLC) credit profile is supported by the company's low risk, stable and predictable regulated transmission and distribution (T\&D) business model. The credit profile also considers DLC's position as a subsidiary of privately owned Duquesne Light Holdings, Inc. (DLH). DLC's credit profile has been constrained by a significant level of parent debt at DLH since 2007 when DQE Holdings LLC (DQE) was acquired by a private consortium. The differential in the credit profiles of DLC and DLH reflects the structural subordination of the parent debt compared to the debt at DLC and some ring-fencing provisions at DLC. DLH relies significantly on cash flows from DLC to service its debt and to pay equity distributions to its owners. We note that DLC does not provide a guarantee for either the existing senior unsecured notes or the bank facility at DLH.

The rapid spread of the coronavirus outbreak, severe global economic shock, low oil prices, and asset price volatility are creating a severe and extensive credit shock across many sectors, regions and markets. The combined credit effects of these developments are unprecedented. We regard the coronavirus outbreak as a social risk under our ESG framework, given the substantial implications for public health and safety. We expect DLC to be relatively resilient to recessionary pressures related to the coronavirus because of its fully rate regulated operations. However we are monitoring customer usage declines, utility bill payment delinquency, and the regulatory response to counter any negative impacts on earnings and cash flow. The effects of the pandemic could result in financial metrics that are temporarily weaker than expected but not reflective of the companies' core operations or long-term financial or credit profile.

Exhibit 1
Historical CFO Pre-WC, Total Debt and CFO Pre-WC to Debt(\$MM)


[^8]
## Credit strengths

» Approximately $\$ 2$ billion distribution rate base and $\$ 630$ million transmission rate base utility operating in the credit supportive Pennsylvania regulatory environment
» Strong financial metrics on a stand-alone basis

## Credit challenges

» Heavily levered parent company
» Primary subsidiary supporting the parent company's financial standing

## Rating outlook

DLC's stable outlook recognizes the regulated, predictable nature of its T\&D operations, continued strong financial metrics, and no significant changes to the capital structure. It also reflects our expectation that DLC's regulatory jurisdiction will remain credit supportive.

## Factors that could lead to an upgrade

» Significant deleveraging of the parent such that holding company debt is below $40 \%$ of consolidated debt, alleviating pressure on DLC's cash flow and obligation to support parent debt
" Cash flow from operations pre-working capital (CFO pre-WC) to debt sustained above 25\%
» A material improvement of the utility's regulatory environment, further shortening regulatory lag and positively impacting its financial profile

## Factors that could lead to a downgrade

» A significant increase in parent level debt
» Parent company's cash needs lead to an increase in the level of dividends from DLC
» A deterioration in credit metrics such that the CFO pre-WC to debt ratio is sustained below 20\%
» Regulatory jurisdiction becomes less credit supportive such that regulatory lag increases or cost recovery is negatively affected

## Key indicators

Exhibit 2
Duquesne Light Company [1]

|  | Dec-16 | Dec-17 | Dec-18 | LTM Mar-20 |
| :--- | ---: | ---: | ---: | ---: |
| CFO Pre-W/C + Interest / Interest | $7.4 x$ | $7.2 x$ | $6.5 x$ | $6.7 x$ |
| CFO Pre-W/C / Debt | $27.5 \%$ | $26.9 \%$ | $24.7 \%$ |  |
| CFO Pre-W/C - Dividends / Debt | $20.7 \%$ | $20.1 \%$ | $19.0 \%$ | $26.6 \%$ |
| Debt / Capitalization | $40.0 \%$ | $43.8 \%$ | $43.3 \%$ | $18.2 \%$ |

[1] All ratios are based on 'Adjusted' financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations. Source: Moody's Financial Metrics ${ }^{\text {TM }}$

## Profile

Duquesne Light Company (DLC, A3 stable) is a regulated electric transmission and distribution (T\&D) utility subsidiary of Duquesne Light Holdings (DLH, Baa3 stable). DLC serves approximately 600,000 residential, commercial, and industrial customers in

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southwestern Pennsylvania, including Pittsburgh. Residential customers account for about $90 \%$ of total customers. DLC's operations are subject to purview of the Pennsylvania Public Utility Commission (PUC) and the Federal Energy Regulatory Commission (FERC).

DLH is a wholly owned subsidiary of DQE Holdings LLC (Not Rated). DQE Holdings is privately owned by a consortium of institutional investors.

Exhibit 3
Duquesne Light Company Service Territory


[^9]Exhibit 4
Duquesne Organizational Chart


Source: Duquesne Light Holdings

## Detailed credit considerations

## Supportive regulatory environment in Pennsylvania

We view the regulatory environment in Pennsylvania for transmission and distribution (T\&D) utilities as credit supportive, with regulatory mechanisms that allow T\&D utilities to recover investment costs on a timely basis and earn reasonable returns.

Legislative initiatives that have worked to improve DLC's regulatory framework include the Distribution System Improvement Charge (DSIC). Established in 2012, the DSIC is a recovery mechanism for investment costs related to the repair, improvement, and replacement of infrastructure. The DSIC is designed to provide timely recovery of reasonable costs incurred to execute the company's Long Term Infrastructure Improvement Plan (LTIIP), a credit positive as it helps reduce regulatory lag for infrastructure spending. The LTIIP reflects DLC's plan to improve, repair and replace aging distribution infrastructure to enhance efficiency and reliability of service for customers. DLC's last LTIIP was approved in September 2016 and is expected to be in effect until 2022.

DLC has little commodity risk as a result of deregulation in Pennsylvania. As a wires only utility, DLC provides power through a Default Service Plan (DSP) for those customers who do not choose another power provider. DLC procures the power to meet customer needs through a competitive Provider of Last Resort (POLR) auction process. The POLR auction process places volume and price risk onto third party generators. This eliminates cash flow volatility related to changes in commodity prices and the differences in purchased volume and usage, a credit positive.

In December 2018, DLC received final approval from the PUC for its distribution rate case settled in September 2018. The rate case was filed by the company in March 2018. The approved settlement was for a revenue increase of $\$ 40.5$ million, about half of the utility's request. The settlement also included a provision rolling \$52.2 million in annual surcharge revenue into base revenue and a one-time $\$ 24$ million refund to customers through the first quarter of 2019 related to tax reform. The settlement did not specify an allowed return on equity (ROE) or equity layer, as is often the case in Pennsylvania.

We expect DLC to spend approximately $\$ 350-\$ 400$ million per year in capital investments over the next two years. This level of spending compares to about $\$ 350$ million in capex in 2019 and 2018 and a much lower historical average before then of approximately $\$ 250$ million. Drivers of the utility's elevated capital spending include the expansion of its transmission system capacity in its service
territory due to the planned retirement of several nearby power plants. DLC has approval to earn a return on construction work in progress (CWIP) on the transmission expansion projects and also to recover investments made in the event that the projects are not needed if power plant closures do not occur as planned.

The company's capital investment plan also includes a new substation to support growth in the Oakland neighborhood of its service territory. Capital expenditures on DLC's distribution system may be added to rate base upon the filing of a distribution rate case or DSIC with the PUC. Capital investment in the transmission system is added to rate base annually through the company's Federal Energy Regulatory Commission (FERC) approved filing.

Strong financial metrics on a stand-alone basis
Historically, DLC's credit profile has been supported by strong credit metrics and we expect the company to maintain a strong financial profile. For the last three years ended 2019, DLC's CFO pre-WC to debt and interest coverage ratios averaged $26.1 \%$ and $6.7 x$, respectively. For the twelve months ended 31 March 2020, DLC's CFO pre-WC to debt and interest coverage ratios were $23.0 \%$ and $6.7 x$ respectively. The lower CFO pre-WC to debt ratio was driven by higher short term debt as a result of the company's effort to bolster its liquidity in response to market uncertainty due to the coronavirus pandemic, by drawing the full $\$ 250$ million available under its revolving credit facility.

We expect 2020 credit metrics to be temporarily lower than historical levels due to the impact of the coronavirus pandemic. In addition to working with regulators to recover some pandemic associated costs, we expect DLC to use other avenues, such as O\&M improvements, to offset some of these costs. We also expect dividends to be managed to achieve the utility's targeted capital structure. We project DLC's key financial metrics to be in the low-to-mid twenty percent range for CFO pre-WC to debt and between $6.5 x-7.0 x$ for interest coverage over the next two years.

## Parent level constraints

The DLH corporate family is characterized by high financial leverage at the parent holding company, which is a major constraint on DLH's credit profile. Approximately 53\% of total reported debt was at the parent level as of 31 March 2020. Through the refinancing and repayment of debt, DLH has reduced the level of parent debt materially over the last few years. However, we see holding company debt maintained around 55\% over the next two years, with new borrowings primarily at the parent. Over the last three years, the dividend payout ratio for DLC averaged approximately $65 \%$. DLH's ownership group has demonstrated a willingness to forego dividends to preserve the financial health of the utility and we expect that dividends out of DLC will be moderated as needed during the next few years of high capital spending.

DLH has a small fiber optics and telecommunications business, DQE Communications, LLC, currently representing about 6\% of the company's consolidated EBITDA. In June 2019, DLH acquired The Efficiency Network, Inc. (TEN), a provider of customized energy solutions for large organizations. TEN generated less than 1\% of DLH's 2019 EBITDA but helps to position DLH to better meet the energy efficiency and sustainability goals of its customers. We anticipate that DLH will approach the growth of non-utility operations conservatively such that they do not become a strain on the less risky T\&D business.

## ESG considerations

Environmental considerations incorporated into our credit analysis for DLC are primarily related to the company's exposure to carbon regulations. As a T\&D utility, DLC owns no generation and as such has much lower carbon transition risk than vertically integrated utility peers. All commodity costs associated with power procurement for customers are fully passed through to customers.

Social risks are primarily related to demographic trends, safety, customer and regulatory relations. To help support customers financially affected by the coronavirus pandemic, DLC has discontinued shutoff activities and has been waiving late fees since March 2020. The utility also increased the size of its bill payment assistance fund and expanded customer eligibility for payment assistance.

Corporate governance considerations, including financial policy and risk management, are key to managing the company's environmental and social risk. DLH's owners have demonstrated a credit supportive willingness to forego dividends during times of high capital spending or reduced cash flows to help preserve the utility's credit quality.

## Liquidity analysis

We expect DLC to maintain an adequate liquidity profile over the next 12-18 month horizon.
As of 31 March 2020, DLC reported $\$ 225$ million of cash on hand. DLH and DLC have a combined revolving credit facility borrowing capacity of $\$ 500$ million ( $\$ 250$ million at DLH and $\$ 250$ million at DLC), each with a maturity date in October 2024. Both entities have the ability to increase the size of their respective credit facilities by up to $\$ 50$ million. At 31 March 2020, DLC had borrowed the full amount available under its revolving credit facility to strengthen its liquidity in response to the coronavirus related capital markets uncertainty.

DLC also has in place a PUC approved affiliated interest agreement which makes up to $\$ 200$ million available to the utility at market rates from DLH. There was $\$ 167$ million borrowed under this agreement at 31 March 2020.

DLC and DLH's facilities do not have material adverse event clauses for new borrowings. However, the DLH revolving credit facility is subject to cross default if it or any of its subsidiaries default on interest or principal payments exceeding \$50 million in aggregate. Also, DLC and DLH are subject to financial covenants that require a maximum debt-to-capitalization ratio of $65 \%$ and $70 \%$ respectively. Both entities were in compliance with these covenants as of 31 March 2020.

DLC's next long term debt maturity is in 2042.

## Rating methodology and scorecard factors

Exhibit 5
Rating Factors
Duquesne Light Company - Private

| Regulated Electric and Gas Utilities Industry [1][2] | $\begin{gathered} \text { Current } \\ \text { LTM } 3 / 31 / 2020 \end{gathered}$ |  | Moody's 12-18 Month Forward View As of $6 / 24 / 2020$ [3] |  |
| :---: | :---: | :---: | :---: | :---: |
| Factor 1 : Regulatory Framework (25\%) | Measure | Score | Measure | Score |
| a) Legislative and Judicial Underpinnings of the Regulatory Framework | A | A | A | A |
| b) Consistency and Predictability of Regulation | A | A | A | A |
| Factor 2 : Ability to Recover Costs and Earn Returns (25\%) |  |  |  |  |
| a) Timeliness of Recovery of Operating and Capital Costs | A | A | A | A |
| b) Sufficiency of Rates and Returns | Baa | Baa | Baa | Baa |
| Factor 3 : Diversification (10\%) |  |  |  |  |
| a) Market Position | Ba | Ba | Ba | Ba |
| b) Generation and Fuel Diversity | N/A | N/A | N/A | N/A |
| Factor 4 : Financial Strength (40\%) |  |  |  |  |
| a) CFO pre-WC + Interest / Interest (3 Year Avg) | 6.4 x | Aa | $6.5 \mathrm{x}-7 \mathrm{x}$ | Aa |
| b) CFO pre-WC / Debt (3 Year Avg) | 22.3\% | A | 22\% - 25\% | A |
| c) CFO pre-WC - Dividends / Debt (3 Year Avg) | 16.9\% | A | 22\% - 25\% | Aa |
| d) Debt / Capitalization (3 Year Avg) | 44.8\% | A | 40\% - 43\% | A |
| Rating: |  |  |  |  |
| Scorecard-Indicated Outcome Before Notching Adjustment |  | A3 |  | A2 |
| HoldCo Structural Subordination Notching | 0 | 0 | 0 | 0 |
| a) Scorecard-Indicated Outcome |  | A3 |  | A2 |
| b) Actual Rating Assigned |  |  |  | A3 |

[1] All ratios are based on 'Adjusted' financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations.
[2] As of 9/30/2019 (L)
[3] This represents Moody's forward view; not the view of the issuer; and unless noted in the text, does not incorporate significant acquisitions and divestitures.
Source: Moody's Financial Metrics ${ }^{\text {TM }}$

## Appendix

Exhibit 6
Cash Flow and Credit Metrics [1]

| CF Metrics | Dec-16 | Dec-17 | Dec-18 | Dec-19 | LTM Mar-20 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| As Adjusted |  |  |  |  |  |
| FFO | 333 | 332 | 314 | 353 | 353 |
| +/- Other | 39 | 24 | 25 | (3) | 6 |
| CFO Pre-WC | 371 | 356 | 340 | 351 | 359 |
| +/- $\triangle$ WC | (3) | 31 | 12 | (19) | (14) |
| CFO | 368 | 387 | 352 | 331 | 345 |
| - Div | 92 | 90 | 78 | 50 | 75 |
| - Capex | 254 | 282 | 346 | 321 | 341 |
| FCF | 23 | 14 | (72) | (40) | (71) |
|  |  |  |  |  |  |
| (CFO Pre-W/C) / Debt | 27.5\% | 26.9\% | 24.7\% | 26.6\% | 23.0\% |
| (CFO Pre-W/C - Dividends) / Debt | 20.7\% | 20.1\% | 19.0\% | 22.8\% | 18.2\% |
| FFO / Debt | 24.7\% | 25.1\% | 22.9\% | 26.8\% | 22.6\% |
| RCF / Debt | 17.9\% | 18.3\% | 17.2\% | 23.0\% | 17.8\% |
|  |  |  |  |  |  |
| Revenue | 903 | 911 | 938 | 964 | 953 |
| Cost of Good Sold | 463 | 437 | 472 | 451 | 450 |
| Interest Expense | 58 | 58 | 62 | 63 | 63 |
| Net Income | 117 | 133 | 87 | 185 | 174 |
| Total Assets | 3,655 | 3,437 | 3,638 | 3,760 | 4,060 |
| Total Liabilities | 2,494 | 2,254 | 2,379 | 2,371 | 2,690 |
| Total Equity | 1,161 | 1,183 | 1,259 | 1,389 | 1,370 |

[1] All figures and ratios are calculated using Moody's estimates and standard adjustments. Periods are Financial Year-End unless indicated. LTM = Last Twelve Months Source: Moody's Financial Metrics

Exhibit 7
Peer Comparison Table [1]

|  | Duquesne Light Company |  |  | Puget Sound Energy, Inc. |  |  | Cleco Power LLC |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | FYE | FYE | Lтм | FYE | FYE | LTM | FYE | FYE | LTM |
| (in US millions) | Dec-18 | Dec-19 | Mar-20 | Dec-18 | Dec-19 | Mar-20 | Dec-18 | Dec-19 | Mar-20 |
| Revenue | 938 | 964 | 953 | 3,346 | 3,401 | 3,332 | 1,242 | 1,168 | 1,133 |
| CFO Pre-W/C | 340 | 351 | 359 | 928 | 731 | 887 | 283 | 325 | 310 |
| Total Debt | 1,375 | 1,317 | 1,560 | 4,578 | 4,828 | 4,725 | 1,592 | 1,598 | 1,734 |
| CFO Pre-W/C / Debt | 24.7\% | 26.6\% | 23.0\% | 20.3\% | 15.1\% | 18.8\% | 17.8\% | 20.3\% | 17.9\% |
| CFO Pre-W/C - Dividends / Debt | 19.0\% | 22.8\% | 18.2\% | 16.5\% | 11.7\% | 15.5\% | 10.2\% | 19.1\% | 16.8\% |
| Debt / Capitalization | 43.3\% | 40.1\% | 44.4\% | 49.9\% | 49.3\% | 48.3\% | 41.9\% | 40.5\% | 42.2\% |

[1] All figures \& ratios calculated using Moody's estimates \& standard adjustments. FYE = Financial Year-End. LTM = Last Twelve Months. RUR* $=$ Ratings under Review, where UPG = for upgrade and DNG = for downgrade
Source: Moody's Financial Metrics

## Ratings

| Exhibit 8 | Moody's Rating |
| :--- | ---: |
| Category |  |
| DUQUESNE LIGHT COMPANY | Stable |
| Outlook | A 3 |
| Issuer Rating | A 1 |
| First Mortgage Bonds | A 1 |
| Bkd Senior Secured |  |
| PARENT: DUQUESNE LIGHT HOLDINGS, INC. | Stable |
| Outlook | Baa3 |
| Senior Unsecured |  |

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## Moody's

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## Duquesne Light Co.



## Credit Highlights

## Overview

| Key strengths | Key risks |
| :--- | :--- |
| Lower-risk, rate-regulated electric transmission and distribution operations in <br> Pennsylvania, including from Pittsburgh. | A lack of regulatory diversity makes the company dependent on <br> the Pennsylvania Public Utility Commission to sustain its credit <br> quality. |
| The company effectively manages its regulatory risk under a generally <br> constructive regulatory framework. | Forecast negative discretionary cash flow indicates future <br> external funding needs. |
| Several regulatory mechanisms, including future test years and a distribution <br> system improvement charge rider, help mitigate regulatory lag and support <br> credit measures. |  |
| Our view of Duquesne Light Co. (DLC) as an insulated subsidiary of its parent <br> Duquesne Light Holdings Inc. (DLH) allows us to rate DLC one notch above <br> DLH. |  |

S\&P Global Ratings expects Duquesne Light Co. (DLC) to effectively manage regulatory risk, bolstering its business risk profile. The company benefits from numerous regulatory mechanisms under a generally constructive regulatory environment in Pennsylvania. However, the company's lack of regulatory diversity makes it dependent on the Pennsylvania Public Utility Commission (PPUC) to sustain its credit quality.

There is some potential for regulatory lag due to COVID-19. DLC does not have a revenue decoupling mechanism and derives about $40 \%$ of its distribution revenue from more cyclical commercial and industrial (C\&I) customers, which have been hurt throughout the pandemic. Although residential sales, which make up most of the company's margins, did help offset the company's C\&I load declines, we still expect its funds from operations (FFO) for fiscal year 2020 to be hampered due to the COVID-19 pandemic. This being said, we expect the company's financial measures to remain within the modest financial risk profile category, with FFO to debt averaging $23 \%-26 \%$ throughout our forecast period.

Although the company is ultimately owned by a small number of investors, this does not directly affect our ratings because none of the owners are controlling shareholders. The company's ultimate owners are large and stable funds with long-term investment horizons and we do not expect any material deviations from currently implemented financial policies or governance arrangements.

We view DLC as a core insulated subsidiary of Duquesne Light Holdings (DLH). The cumulative value of the structural and regulatory protections that insulate DLC from DLH, combined with the strength of DLC's stand-alone credit profile, allow us to rate DLC one notch above DLH.

## Outlook: Stable

The stable outlook on DLC reflects our stable outlook on DLH, as well as our expectation that DLC will maintain a stand-alone FFO-to-debt ratio of about $23 \%-26 \%$ over our forecast period. The stable outlook on DLH reflects our baseline forecast of parent DLH's consolidated FFO to debt of about $11 \%-13 \%$ over the next few years. Our baseline forecast also includes our expectation that DLC will continue to effectively manage its regulatory risk, thereby supporting consistent operating results and a financial profile for DLH that is in line with expectations at the current rating.

## Downside scenario

Absent a downgrade of DLH, we view a downgrade of DLC as unlikely over the next 24 months. However, a downgrade could result if:

- DLH's business risk increases due to an unexpected increase in nonutility operations.
- DLH's financial performance is lower than projected, such that its consolidated FFO to debt is less than $9 \%$ for a sustained period. Such deterioration in financial performance could result from inadequate cost recovery or materially large distributions to the company's owners.


## Upside scenario

We could upgrade DLC over the next 24 months if we upgrade DLH, which could occur if:

- Consolidated cash flow and leverage improve such that DLH maintains consolidated FFO to debt at more than $13 \%$ while its business profile remains focused on growing its low-risk electric transmission and distribution (T\&D) operations.


## Our Base-Case Scenario

## Assumptions

- Continued use of existing regulatory mechanisms;
- Sales load decline in 2020 stemming from the COVID-19 pandemic;
- Capital spending that averages about $\$ 380$ million annually;
- A dividend policy that enables the company to maintain its debt to capitalization ratio close to its current level;
- Negative discretionary cash flow; and
- All debt maturities are assumed to be refinanced.


## Key Metrics

|  | 2019a | 2020e | 2021f |
| :--- | ---: | ---: | ---: |
| FFO to debt (\%) | 28.3 | $22-25$ | $22-25$ |
| Debt to EBITDA (x) | 2.8 | $3.0-3.5$ | $3.0-3.5$ |
| OCF to debt (\%) | 25.7 | $17-20$ | $21-24$ |

a--Actual. e--Estimate. f--Forecast. FFO--Funds from operations. OCF--Operating cash flow.

## Company Description

DLC engages in the supply (through its provider-of-last-resort services), transmission, and distribution of electricity to about 600,000 customers in Southwestern Pennsylvania, including Pittsburgh. Its parent DLH is a utility holding company based in Pittsburgh that is ultimately owned by Epsom Investment Pte. Ltd. (an affiliate of Singaporean sovereign wealth fund GIC Pte. Ltd., which owns about $44.4 \%$ of DLH), Three Rivers Utility Holdings LLC (a company whose members are large Dutch pension fund services provider PGGM Infrastructure Fund and subsidiaries of multinational Manulife Financial Corp., which collectively own 30.4\% of DLH), and AIA Energy North America (a fund that is owned by large Dutch pension manager APG Americas Infrastructure and the California State Teachers' Retirement System, which collectively own $25.2 \%$ of DLH).

## Business Risk: Excellent

We base our business risk assessment for DLC's electric T\&D operations, which are low risk and provide an essential service to its customers, as well as the company's effective management of its regulatory risk. Although DLC's customer base is smaller than other electric utility peers and is concentrated in one regulatory jurisdiction, it benefits from numerous credit-supportive mechanisms, such as future test years and the distribution system improvement charge rider, which mitigate regulatory lag, allow DLC to recover expenditures in between rate cases, and support its cash flow stability. This being said, DLC does not have a revenue decoupling mechanism and derives about $40 \%$ of its distribution revenue from more cyclical C\&I customers, which have been hurt throughout the pandemic. However, the company's business risk benefits from load stability as the electric T\&D provider to Pittsburgh, and residential sales, which make up most of the company's margins, did offset the company's C\&I load declines.

## Financial Risk: Modest

We assess DLC's financial measures using our low volatility table, which reflects our view of its low-risk electric T\&D operations and its effective management of regulatory risk. Under our base-case scenario, we expect FFO to debt to average about $23 \%-26 \%$, which is consistent with a modest financial risk profile. Our base case assumes continued use of existing regulatory mechanisms, sales load decline in 2020 stemming from the COVID-19 pandemic, capital spending that averages about $\$ 380$ million annually, a dividend policy that enables the company to maintain its debt-to-capitalization ratio near its current level, negative discretionary cash flow, and refinance all debt maturities. Our assessment of the comparable ratings analysis modifier on the company as negative reflects our holistic view of
the company's business risk and financial risk, which we view to be moderately weaker relative to peers with similar stand-alone credit profiles.

## Liquidity: Adequate

DLC has adequate liquidity, reflecting our expectation that liquidity sources will exceed uses by more than 1.1 x over the next 12 months, even if EBITDA declines $10 \%$. Under our stress scenario, we do not expect that DLC would require access to the capital markets during that period to meet its liquidity needs. DLC likely could absorb a high-impact, low probability event with limited need for refinancing. Moreover, it has sound relationships with banks, a generally satisfactory standing in the credit markets, and maintains generally prudent risk management practices.

| Principal liquidity sources | Principal liquidity uses |
| :--- | :--- |

- FFO of about $\$ 350$ million over the next 12 months; and
- Credit facility availability of about $\$ 250$ million.
- Capital spending of about $\$ 420$ million over the next 12 months; and
- Dividends of about $\$ 50$ million.


## Covenant Analysis

## Compliance expectations

- We expect the company to maintain cushion under the leverage ratio covenants in its credit agreements.


## Requirements

- DLC's revolving credit agreement contains a maximum leverage ratio covenant of $65 \%$ (as defined in the relevant documents).


## Environmental, Social, And Governance

DLC's exposure to environmental risk is limited compared to peers, reflecting its lower-risk electric T\&D network utility operations. Furthermore, no social factors have had a material impact on the rating, although the affordability of steadily increasing rates could be a future risk and the company will need to continue to comply with very high standards in relation to security given the nature of its utility business. Nevertheless, DLC's internal safety system has enabled it to effectively provide T\&D services to its customers throughout its history.

Governance factors are neutral. Although the company has a small number of ultimate owners, none of them have a controlling interest in the company's parent. Furthermore, DLH has a board of directors that is largely independent from management and, in our view, is capably engaged in risk oversight on behalf of all stakeholders.

## Group Influence

We assess DLC as a core subsidiary of DLH because it is highly unlikely to be sold, is integral to the overall group strategy, is successful at what it does, possesses the strong long-term commitment from parent management, is a significant contributor to the group, operates as a profit center of the group, and is closely linked to the parent's name and reputation.

Furthermore, we rate DLC one notch higher than DLH's 'bbb' group credit profile because of the strength of DLC's stand-alone credit profile and the cumulative value of structural and regulatory protections in place that insulate it from DLH.

Key insulating measures include:

- DLC's distribution business is independently regulated by the PPUC and its transmission business is independently regulated by the Federal Energy Regulatory Commission;
- DLC holds itself out as a separate entity from DLH;
- DLC has its own funding arrangements including issuing its own long-term debt and has a separate committed credit facility to cover its short-term funding needs;
- DLC has no significant operational dependence on other group entities;
- DLC maintains its own records;
- DLC does not commingle funds, assets, or cash flows with the rest of the DLH group;
- DLC's financial performance is independent of DLH;
- We believe there is a strong economic basis for DLH to preserve DLC's credit strength due to DLC's low-risk, profitable, and regulated operations that make up the vast majority of DLH's operations;
- DLC is a regulated utility with a regulatory capital structure; and
- There are no cross-default provisions between DLC and DLH that imply that a default at DLH would lead to a default at DLC, which supports our opinion that a default at DLH would not directly lead to a default at the company.


## Issue Ratings - Recovery Analysis

We assign recovery ratings to first-mortgage bonds (FMB) issued by U.S. utilities, which can lead us to notch our issue-level ratings above our issuer credit rating on a utility depending on the rating category and the extent of the collateral coverage. The FMBs U.S. utilities issue are a form of secured utility bond that qualify for a recovery rating as defined in our criteria (see "Utilities: Collateral Coverage And Issue Notching Rules For '1+' And '1' Recovery Ratings On Senior Bonds Secured By Utility Real Property," published Feb. 14, 2013).

DLC's FMBs benefit from a first-priority lien on substantially all of the utility's real property owned or subsequently acquired. Collateral coverage of more than 1.5 x supports a recovery rating of ' $1+$ ' and an issue-level rating two notches
above the issuer credit rating.

## Ratings Score Snapshot

Issuer Credit Rating
BBB+/Stable/NR

## Business risk: Excellent

- Country risk: Very low
- Industry risk: Very low
- Competitive position: Strong


## Financial risk: Modest

- Cash flow/leverage: Modest

Anchor: aa

## Modifiers

- Diversification/portfolio effect: Neutral (no impact)
- Capital structure: Neutral (no impact)
- Financial policy: Neutral (no impact)
- Liquidity: Adequate (no impact)
- Management and governance: Satisfactory (no impact)
- Comparable rating analysis: Negative ( -1 notch)


## Stand-alone credit profile : aa-

- Group credit profile: bbb
- Entity status within group: Insulated (-4 notches from SACP)


## Related Criteria

- General Criteria: Group Rating Methodology, July 1, 2019
- Criteria | Corporates | General: Corporate Methodology: Ratios And Adjustments, April 1, 2019
- Criteria | Corporates | General: Methodology And Assumptions: Liquidity Descriptors For Global Corporate Issuers, Dec. 16, 2014
- Criteria | Corporates | Utilities: Key Credit Factors For The Regulated Utilities Industry, Nov. 19, 2013
- Criteria | Corporates | General: Corporate Methodology, Nov. 19, 2013
- General Criteria: Country Risk Assessment Methodology And Assumptions, Nov. 19, 2013
- General Criteria: Methodology: Industry Risk, Nov. 19, 2013
- Criteria | Corporates | Utilities: Collateral Coverage And Issue Notching Rules For '1+' And '1' Recovery Ratings On Senior Bonds Secured By Utility Real Property, Feb. 14, 2013
- General Criteria: Methodology: Management And Governance Credit Factors For Corporate Entities, Nov. 13, 2012
- General Criteria: Use Of CreditWatch And Outlooks, Sept. 14, 2009


## Business And Financial Risk Matrix

| Business Risk Profile | Financial Risk Profile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Minimal | Modest | Intermediate | Significant | Aggressive | Highly leveraged |
| Excellent | aaa/aa+ | aa | $a+/ \mathrm{a}$ | a- | bbb | bbb-/bb+ |
| Strong | aa/aa- | $a+/ a$ | a-/bbb+ | bbb | bb+ | bb |
| Satisfactory | a/a- | bbb+ | bbb/bbb- | bbb-/bb+ | bb | b+ |
| Fair | bbb/bbb- | bbb- | bb+ | bb | bb- | b |
| Weak | bb+ | bb+ | bb | bb- | b+ | b/b- |
| Vulnerable | bb- | bb- | bb-/b+ | b+ | b | b- |

## Ratings Detail (As Of November 20, 2020)*

Duquesne Light Co.
Issuer Credit Rating BBB+/Stable/NR

## Issuer Credit Ratings History

| 19-Dec-2019 | $\mathrm{BBB}+/$ Stable/NR |
| :--- | :--- |
| 30-Jun-2014 | $\mathrm{BBB} /$ Stable/NR |
| 13-Jun-2013 | $\mathrm{BBB}-$ /Positive/NR |

Related Entities
Duquesne Light Holdings Inc.

| Issuer Credit Rating | BBB/Stable/NR |
| :--- | :--- |
| Senior Unsecured | BBB- |

*Unless otherwise noted, all ratings in this report are global scale ratings. S\&P Global Ratings' credit ratings on the global scale are comparable across countries. S\&P Global Ratings' credit ratings on a national scale are relative to obligors or obligations within that specific country. Issue and debt ratings could include debt guaranteed by another entity, and rated debt that an entity guarantees.

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## CREDIT OPINION

29 June 2020

Update

## Rate this Research

RATINGS
Duquesne Light Holdings, Inc.

| Domicile | Pittsburgh, <br> Pennsylvania, United <br> States |
| :--- | :--- |
| Long Term Rating | Baa3 |
| Type | Senior Unsecured - <br> Dom Curr |
| Outlook | Stable |

Please see the ratings section at the end of this report for more information. The ratings and outlook shown reflect information as of the publication date.

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## Duquesne Light Holdings, Inc.

## Update to credit analysis

## Summary

Our credit view of Duquesne Light Holdings, Inc. (DLH) considers the low risk transmission and distribution (T\&D) operations of its primary subsidiary Duquesne Light Company (DLC). DLH's credit profile is constrained by a sizable amount of debt at the parent level and weak credit metrics. Approximately $53 \%$ of reported total consolidated debt is at the parent level and is structurally subordinated to the debt at DLC. DLH relies greatly on cash flows from DLC to meet its significant debt service obligations and dividends. We note that DLC does not provide a guarantee to either the existing senior unsecured notes or the bank facility at DLH.

The rapid spread of the coronavirus outbreak, severe global economic shock, low oil prices, and asset price volatility are creating a severe and extensive credit shock across many sectors, regions and markets. The combined credit effects of these developments are unprecedented. We regard the coronavirus outbreak as a social risk under our ESG framework, given the substantial implications for public health and safety. We expect DLH to be relatively resilient to recessionary pressures related to the coronavirus because of its predominantly rate regulated operations. However we are monitoring customer usage declines, utility bill payment delinquency, and the regulatory response to counter any negative impacts on earnings and cash flow at DLC. The effects of the pandemic could result in financial metrics that are temporarily weaker than expected but not reflective of the core operations or longterm financial or credit profile.

Exhibit 1
Historical CFO Pre-WC, Total Debt and CFO Pre-WC to Debt (\$ MM)


[^10]
## Credit strengths

» Supportive regulatory environment for utility subsidiary
» Approximately $\$ 2$ billion distribution rate base and $\$ 630$ million transmission rate base utility subsidiary with strong financial profile

## Credit challenges

» Continued high level of parent debt and weak coverage metrics
» Heavy dependence on utility cash flow

## Rating outlook

DLH's stable outlook incorporates our expectation that leverage at the DLH parent company level will not increase significantly, and that the more predictable regulated operations of DLC will remain DLH's primary business. Also, we expect DLH to maintain its cash flow from operations pre-working capital (CFO pre-WC) to debt ratio in the low teens range.

## Factors that could lead to an upgrade

» A rating upgrade could be considered with significant deleveraging of the parent such that holding company debt falls below $40 \%$ of total debt, which could cause a narrowing of the ratings notching between DLH and DLC. Additionally, an upgrade could be possible with an improvement in credit metrics such that the ratio of CFO pre-WC to debt is sustained above $15 \%$ on a consolidated basis.

## Factors that could lead to a downgrade

» A rating downgrade could be considered if parent company leverage increases or if DLH materially increases its unregulated operations. A downgrade could also be possible if cash flow deteriorates, or CFO pre-WC to debt declines to $11 \%$ or lower on a sustained basis.

## Key indicators

Exhibit 2
Duquesne Light Holdings, Inc. [1]

|  | Dec-16 | Dec-17 | Dec-18 | Dec-19 | LTM Mar-20 |
| :--- | ---: | ---: | ---: | ---: | ---: |
| CFO Pre-W/C + Interest / Interest | $3.5 x$ | $3.5 x$ | $3.0 x$ | $3.6 x$ | $3.6 x$ |
| CFO Pre-W/C Debt | $12.6 \%$ | $12.6 \%$ | $10.2 \%$ | $12.5 \%$ | $10.8 \%$ |
| CFO Pre-W/C - Dividends / Debt | $9.4 \%$ | $8.6 \%$ | $8.4 \%$ | $11.2 \%$ | $9.7 \%$ |
| Debt / Capitalization | $57.2 \%$ | $62.8 \%$ | $61.6 \%$ | $59.9 \%$ | $63.8 \%$ |

[1] All ratios are based on 'Adjusted' financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations. Financial Metrics ${ }^{\top \mathrm{M}}$
Source: Moody's Financial Metrics

## Profile

Duquesne Light Holdings, Inc. (DLH, Baa3 stable) is an intermediate holding company headquarted in Pittsburgh Pennsylvania. Its principal subsidiary, Duquesne Light Company (DLC, A3 stable), is a regulated electric transmission and distribution company, serving approximately 600,000 primarily residential ( $90 \%$ ), commercial and industrial customers in and around the city of Pittsburgh and southwestern Pennsylvania. DLH additionally has two small non-utility subsidiaries, DQE Communications, which owns, operates, and maintains a high-speed, fiber based network in southwestern Pennsylvania and The Efficiency Network, Inc. (TEN), a provider
of customized energy solutions for large organizations. DQE Communications and TEN represented about 6\% and 1\% of DLH's consolidated 2019 EBITDA, respectively.

DLC's operations are subject to the purview of the Public Utility Commission of Pennsylvania (PUC) and the Federal Energy Regulatory Commission (FERC).

Since 2007, DLH has been a wholly owned subsidiary of DQE Holdings LLC (Not Rated). DQE Holdings is privately owned by a consortium institutional investors.

Exhibit 3
Duquesne Organizational Chart


Source: Duquesne Light Holdings

## Detailed credit considerations

## Significant holding company debt

The DLH corporate family is characterized by high financial leverage at the parent company, which acts as a major constraint on DLH's credit profile. The wide differential between the credit profiles of DLH and utility subsidiary DLC reflects both the sizeable amount of holding company debt, with approximately $53 \%$ of consolidated reported debt at the holding company level as of 31 March 2020 and, to a lesser degree, the modest amount of unregulated non-utility business activities. These unregulated activities are primarily related to a small fiber optics and telecommunications business, which accounts for about $6 \%$ of the company's consolidated EBITDA.

Since 2007, when DQE Holdings was acquired by a private equity consortium and levered up at the DLH level, DLH has made a material effort to reduce the amount of holding company debt. In 2009, approximately $76 \%$ of reported total consolidated debt was at the holding company level. Parent company debt was meaningfully reduced to 55\% by the end of 2013 and has stayed between 50\% and $55 \%$ since, reaching a low of $51 \%$ at the end of 2018 . We expect holding company debt to be maintained close to $55 \%$ of total debt over the next two years.

[^11]Exhibit 4
Holding company debt has declined over time but remains high


Source: Moody's Investors Service
Supportive regulatory environment for primary subsidiary DLC
We view the regulatory environment in Pennsylvania for T\&D utilities as credit supportive, with regulatory mechanisms that allow T\&D utilities to recover investment costs on a timely basis and earn reasonable returns.

Legislative initiatives that have worked to improve DLC's regulatory framework include the Distribution System Improvement Charge (DSIC). Established in 2012, the DSIC is a recovery mechanism for investment costs related to the repair, improvement, and replacement of infrastructure. The DSIC is designed to provide timely recovery of reasonable costs incurred to execute the company's Long Term Infrastructure Improvement Plan (LTIIP), a credit positive as it helps reduce regulatory lag for infrastructure spending. The LTIIP reflects DLC's plan to improve, repair and replace aging distribution infrastructure to enhance efficiency and reliability of service for customers. DLC's last LTIIP was approved in September 2016 and is expected to be in effect until 2022.

DLC has little commodity risk as a result of deregulation in Pennsylvania. As a wires only utility, DLC provides power through a Default Service Plan (DSP) for those customers who do not choose another power provider. DLC procures the power to meet customer needs through a competitive Provider of Last Resort (POLR) auction process. The POLR auction process places volume and price risk onto third party generators. Thus, DLC eliminates the cash flow volatility related to changes in commodity prices and the differences in purchased volume and usage, a credit positive.

In December 2018, DLC received final approval from the PUC for its distribution rate case settled in September 2018. The rate case was filed by the company in March 2018. The approved settlement was for a revenue increase of $\$ 40.5$ million, about half of the utility's request. The settlement also includes a provision rolling $\$ 52.2$ million in annual surcharge revenue into base revenue and a one-time $\$ 24$ million refund to customers through the first quarter of 2019 related to tax reform. The settlement did not specify an allowed return on equity (ROE) or equity layer, as is often the case in Pennsylvania.

We expect DLC to spend approximately $\$ 350-\$ 400$ million per year in capital investments over the next two years. This level of spending compares to about $\$ 350$ million in capex in 2019 and 2018 and a much lower historical average before then of approximately \$250 million. Drivers of the utility's elevated capital spending include the expansion of its transmission system capacity in its service territory due to the planned retirement of several nearby power plants. DLC has approval to earn a return on construction work in progress (CWIP) on the transmission expansion projects and to also recover investments made in the event that the projects are not needed if power plant closures do not occur as planned.

The company's capital investment plan also includes a new substation to support growth in the Oakland neighborhood of its service territory. Capital expenditures on DLC's distribution system may be added to rate base upon the filing of a distribution rate case or DSIC with the PUC. Capital investment in the transmission system is added to rate base annually through the company's Federal Energy Regulatory Commission (FERC) approved filing.

## Weak financial profile

For the last three years ended 2019, DLH's CFO pre-WC to debt and interest coverage ratios have been weak, averaging about 11.8\% and $3.2 x$, respectively. For the last twelve months (LTM) ending 31 March 2020, the ratio of CFO pre-WC was $10.8 \%$ due to a higher debt balance as financial market uncertainty related to the coronavirus drove the company to draw down the full $\$ 500$ million
available under the DLC and DLH revolving credit facilities to bolster liquidity. We project the CFO pre-WC to debt ratio to be in the 11-13\% range over the next two years.

DLC's strong financial performance continues to support DLH's credit profile. For the last three years ended 2019, DLC's CFO pre-WC to debt and interest coverage ratios averaged $26.1 \%$ and $6.7 x$, respectively. For the twelve months ended 31 March 2020, DLC's CFO preWC to debt and interest coverage ratios were $23.0 \%$ and $6.7 \times$ respectively. We project DLC's key financial metrics to be in the low-tomid twenty percent range for CFO pre-WC to debt and between $6.5 \mathrm{x}-7.0 \mathrm{x}$ for interest coverage over the next two years.

DLH's ownership group has demonstrated a willingness to forego dividends to preserve the financial health of the company. DLH's dividend payouts in 2018 and 2019 were $43 \%$ and $23 \%$ respectively, significantly lower than historical levels of $100 \%$ or higher, following the passage of tax reform and to support higher capital spending. We expect that dividends out of DLC and DLH will be moderated as needed to achieve the companies' targeted capital structure and maintain credit quality.

DLH has a small fiber optics and telecommunications business, DQE Communications, LLC. It currently represents about $6 \%$ of the company's consolidated EBITDA. In June 2019, DLH acquired The Efficiency Network, Inc. (TEN) a provider of customized energy solutions for large organizations. TEN generated less than 1\% of DLH's 2019 EBITDA but helps to position DLH to better meet the energy efficiency and sustainability goals of its customers. We anticipate that DLH will approach the growth of non-utility operations conservatively such that they do not become a strain on the less risky T\&D business.

## ESG considerations

Environmental considerations incorporated into our credit analysis for DLH are primarily related to the company's exposure to carbon regulations. As a T\&D utility, DLH's primary subsidiary DLC owns no generation and therefore has much lower carbon transition risk than vertically integrated utility peers. All commodity costs associated with power procurement for customers are fully passed through to customers.

Social risks are primarily related to demographic trends, safety, customer and regulatory relations. To help support customers financially affected by the coronavirus pandemic, DLC has discontinued shutoff activities and has been waiving late fees since March 2020. The utility also increased the size of its bill payment assistance fund and expanded customer eligibility for payment assistance.

Corporate governance considerations, including financial policy and risk management, are key to managing the company's environmental and social risk. DLH's owners have demonstrated a credit supportive willingness to forego dividends during times of high capital spending or reduced cash flow to help preserve the utility's credit quality.

## Liquidity analysis

We expect DLH to maintain an adequate, albeit strained, liquidity profile over the next 12-18 months given upcoming debt maturities.
As of 31 March 2020, DLH reported about $\$ 447$ million of cash on hand. DLH and DLC have a combined revolving credit facility borrowing capacity of $\$ 500$ million ( $\$ 250$ million at DLH and $\$ 250$ million at DLC), each with a maturity date in October 2024. Both entities have the ability to increase the size of their respective credit facilities by up to $\$ 50$ million each. As of 31 March 2020, DLC and DLH had borrowed the full amount available under their revolving credit facilities to strengthen its liquidity in response to the coronavirus related capital markets uncertainty.

DLC also has in place a PUC approved affiliated interest agreement which makes up to $\$ 200$ million available to the utility at market rates from DLH. There was \$167 million outstanding under this agreement at 31 March 2020.

DLC and DLH's facilities do not have material adverse event clauses for new borrowings. However, the DLH revolving credit facility is subject to cross default if it or any of its subsidiaries default on interest or principal payments exceeding \$50 million in aggregate. Also, DLC and DLH are subject to financial covenants that require a maximum debt-to-capitalization ratio of $65 \%$ and $70 \%$ respectively. Both entities were in compliance with these covenants as of 31 March 2020.

DLH has a $\$ 250$ million 364-day term loan due in April 2021, a $\$ 150$ million term loan due in June 2021 and $\$ 350$ million of unsecured notes due in December 2021.

## Rating methodology and scorecard factors

Exhibit 5
Rating Factors
Duquesne Light Holdings, Inc.

| Regulated Electric and Gas Utilities Industry [1][2] | $\begin{gathered} \text { Current } \\ \text { LTM } 3 / 31 / 2020 \end{gathered}$ |  |
| :---: | :---: | :---: |
| Factor 1 : Regulatory Framework (25\%) | Measure | Score |
| a) Legislative and Judicial Underpinnings of the Regulatory Framework | A | A |
| b) Consistency and Predictability of Regulation | A | A |
| Factor 2 : Ability to Recover Costs and Earn Returns (25\%) |  |  |
| a) Timeliness of Recovery of Operating and Capital Costs | A | A |
| b) Sufficiency of Rates and Returns | Baa | Baa |
| Factor 3 : Diversification (10\%) |  |  |
| a) Market Position | Ba | Ba |
| b) Generation and Fuel Diversity | N/A | N/A |
| Factor 4 : Financial Strength (40\%) |  |  |
| a) CFO pre-WC + Interest / Interest (3 Year Avg) | 3.2x | Baa |
| b) CFO pre-WC / Debt (3 Year Avg) | 10.3\% | Ba |
| c) CFO pre-WC - Dividends / Debt (3 Year Avg) | 8.5\% | Baa |
| d) Debt / Capitalization (3 Year Avg) | 63.1\% | Ba |
| Rating: |  |  |
| Scorecard-Indicated Outcome Before Notching Adjustment |  | Baa2 |
| HoldCo Structural Subordination Notching | -2 | -2 |
| a) Scorecard-Indicated Outcome |  | Ba1 |
| b) Actual Rating Assigned |  |  |


| Moody's 12-18 Month Forward View As of 6/24/2020 [3] |  |
| :---: | :---: |
| Measure | Score |
| A | A |
| A | A |
| A | A |
| Baa | Baa |
| Ba | Ba |
| N/A | N/A |
| $3 \mathrm{x}-4 \mathrm{x}$ | Baa |
| 11\%-13\% | Baa |
| 10\% - 12\% | Baa |
| 58\%-60\% | Ba |
|  | Baa1 |
| -2 | -2 |
|  | Baa3 |
|  | Baa3 |

[1] All ratios are based on 'Adjusted' financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations.
[2] As of 9/30/2019(L)
[3] This represents Moody's forward view; not the view of the issuer; and unless noted in the text, does not incorporate significant acquisitions and divestitures.
Source: Moody's Financial Metrics

## Appendix

Exhibit 6
Cash Flow and Credit Metrics [1]

| CF Metrics | Dec-16 | Dec-17 | Dec-18 | Dec-19 | LTM Mar-20 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| As Adjusted |  |  |  |  |  |
| FFO | 318 | 327 | 269 | 338 | 345 |
| +/- Other | - | - | - | - | - |
| CFO Pre-WC | 318 | 327 | 269 | 338 | 345 |
| +/- $\triangle$ WC | 16 | 13 | (6) | 16 | 29 |
| CFO | 335 | 340 | 264 | 354 | 374 |
| - Div | 82 | 103 | 47 | 35 | 35 |
| - Capex | 272 | 300 | 358 | 350 | 372 |
| FCF | (19) | (63) | (141) | (31) | (33) |
|  |  |  |  |  |  |
| (CFO Pre-W/C) / Debt | 12.6\% | 12.6\% | 10.2\% | 12.5\% | 10.8\% |
| (CFO Pre-W/C - Dividends) / Debt | 9.4\% | 8.6\% | 8.4\% | 11.2\% | 9.7\% |
| FFO / Debt | 12.6\% | 12.6\% | 10.2\% | 12.5\% | 10.8\% |
| RCF / Debt | 9.4\% | 8.6\% | 8.4\% | 11.2\% | 9.7\% |
|  |  |  |  |  |  |
| Revenue | 942 | 953 | 983 | 1,018 | 1,013 |
| Cost of Good Sold | 470 | 449 | 484 | 476 | 481 |
| Interest Expense | 127 | 129 | 135 | 132 | 132 |
| Net Income | 83 | 69 | 48 | 157 | 122 |
| Total Assets | 4,788 | 4,661 | 4,783 | 4,962 | 5,456 |
| Total Liabilities | 3,657 | 3,583 | 3,639 | 3,702 | 4,199 |
| Total Equity | 1,131 | 1,078 | 1,144 | 1,260 | 1,257 |

[1] All figures and ratios are calculated using Moody's estimates and standard adjustments. Periods are Financial Year-End unless indicated. LTM = Last Twelve Months Source: Moody's Financial Metrics

Exhibit 7
Peer Comparison Table [1]

| (in US millions) | Duquesne Light Holdings, Inc. <br> Baa3 Stable |  |  | Cleco Corporate Holdings LLC <br> Baa3 Stable |  |  | Puget Energy, Inc. <br> Baa3 Stable |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | FYE | FYE | LTM | FYE | FYE | LTM | FYE | FYE | LTM |
|  | Dec-18 | Dec-19 | Mar-20 | Dec-18 | Dec-19 | Mar-20 | Dec-18 | Dec-19 | Mar-20 |
| Revenue | 983 | 1,018 | 1,013 | 1,231 | 1,640 | 1,643 | 3,346 | 3,401 | 3,332 |
| CFO Pre-W/C | 269 | 338 | 345 | 276 | 429 | 426 | 845 | 653 | 633 |
| Total Debt | 2,643 | 2,708 | 3,205 | 3,017 | 3,350 | 3,574 | 6,534 | 7,035 | 6,939 |
| CFO Pre-W/C / Debt | 10.2\% | 12.5\% | 10.8\% | 9.1\% | 12.8\% | 11.9\% | 12.9\% | 9.3\% | 9.1\% |
| CFO Pre-W/C - Dividends / Debt | 8.4\% | 11.2\% | 9.7\% | 6.8\% | 12.8\% | 11.9\% | 11.8\% | 8.4\% | 8.4\% |
| Debt / Capitalization | 61.6\% | 59.9\% | 63.8\% | 52.6\% | 50.5\% | 52.1\% | 59.6\% | 60.4\% | 59.6\% |

[1] All figures \& ratios calculated using Moody's estimates \& standard adjustments. FYE = Financial Year-End. LTM = Last Twelve Months. RUR* $=$ Ratings under Review, where UPG = for upgrade and DNG = for downgrade
Source: Moody's Financial Metrics

## Ratings

Exhibit 8

| Category | Moody's Rating |
| :--- | ---: |
| DUQUESNE LIGHT HOLDINGS, INC. |  |
| Outlook | Stable |
| Senior Unsecured | Baa33 |
| DUQUESNE LIGHT COMPANY |  |
| Outlook | Stable |
| Issuer Rating | A 3 |
| First Mortgage Bonds | A 1 |
| Bkd Senior Secured | A 1 |
| Source: Moody's lnvestors Service |  |

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| Japan | $81-3-5408-4100$ |
| EMEA | $44-20-7772-5454$ |

## Moody's

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## Duquesne Light Holdings Inc.



## Credit Highlights

| Overview |  |
| :---: | :---: |
| Key strengths | Key risks |
| The vast majority of Duquesne Light Holdings Inc.'s (DLH's) cash flows are derived from lower-risk, rate-regulated electric transmission and distribution operations in Pennsylvania, including from Pittsburgh. | A lack of regulatory diversity makes the company dependent on the Pennsylvania Public Utility Commission to sustain its credit quality. |
| The company effectively manages its regulatory risk under a generally constructive regulatory framework. | DLH's higher-risk fiber optics business, which is subject to competitive market forces, contributes about 5\%-10\% of consolidated EBITDA. |
| Several regulatory mechanisms, including future test years and a distribution system improvement charge rider, help mitigate regulatory lag and support credit measures. | Forecast negative discretionary cash flow indicates future external funding needs. |
|  | Forecast credit measures indicate an aggressive financial risk profile. |

S\&P Global Ratings expects Duquesne Light Holdings (DLH) to effectively manage regulatory risk, bolstering its business risk profile. The company benefits from numerous regulatory mechanisms under a generally constructive regulatory environment in Pennsylvania. However, the company's lack of regulatory diversity makes it dependent on the Pennsylvania Public Utility Commission (PPUC) to sustain its credit quality.

There is some potential for regulatory lag due to COVID-19. DLH does not have a revenue decoupling mechanism and derives about $40 \%$ of its distribution revenue from more cyclical commercial and industrial (C\&I) customers, which have been hurt throughout the pandemic. Although residential sales, which make up most of the company's margins, did offset the company's C\&I load declines, we still expect its funds from operations (FFO) for fiscal year 2020 to be hampered due to the COVID-19 pandemic. This being said, we expect the company's financial measures to remain within the aggressive financial risk profile category, with FFO to debt averaging $11 \%-13 \%$ throughout the forecast period.

We view the company's fiber-optics business as riskier than its utility operations. The company's fiber optics business is subject to competitive market forces that could introduce volatility to its credit metrics, though the proportion of this business to the consolidated company is limited (about $5 \%-10 \%$ of EBITDA). In the company's latest debt offering, it announced that it was considering a strategic review of this business. We continue to monitor the developments surrounding this strategic review, as well how may affect the company's credit quality.

Although the company is owned by a small number of investors, this does not directly affect our rating because none of the owners are controlling shareholders. Furthermore, the company's owners are large and stable funds with long-term investment horizons and we do not expect any material deviations from currently implemented financial policies or governance arrangements.

## Outlook: Stable

The stable outlook on Pittsburgh-based DLH reflects our baseline forecast of DLH's consolidated FFO to debt of about $11 \%-13 \%$ over the next few years. Our baseline forecast also includes our expectation that DLH will continue to effectively manage its regulatory risk, thereby supporting consistent operating results and a financial profile that's in line with expectations at the current rating.

## Downside scenario

A downgrade could result over the next 12 months if:

- Business risk increases due to an unexpected increase in nonutility operations.
- Financial performance is lower than projected, such that DLH's FFO to debt is less than $9 \%$ for a sustained period. Such deterioration in financial performance could result from inadequate cost recovery or materially large distributions to the company's owners.


## Upside scenario

We could raise the rating on DLH over a similar period if:

- Cash flow and leverage improve such that DLH maintains FFO to debt at more than $13 \%$ while its business profile remains focused on its growing low-risk electric transmission and distribution (T\&D) operations.


## Our Base-Case Scenario

## Assumptions

- Continued use of existing regulatory mechanisms;
- Load decline in 2020 stemming from the COVID-19 pandemic;
- Capital spending that averages about $\$ 400$ million annually;
- A dividend policy that enables the company to maintain its debt to capitalization ratio close to its current level;
- Negative discretionary cash flow; and
- All debt maturities are assumed to be refinanced.


## Key Metrics

|  | 2019a | 2020e | 2021f |
| :--- | ---: | ---: | ---: |
| FFO to debt (\%) | 14.4 | $11.0-13.0$ | $11.0-13.0$ |
| Debt to EBITDA (x) | 5.4 | $5.0-6.0$ | $5.0-6.0$ |
| FFO cash interest coverage (x) | 3.9 | $3.3-3.7$ | $3.4-3.8$ |

a--Actual. e--Estimate. f--Forecast. FFO--Funds from operations.

## Company Description

DLH is a utility holding company based in Pittsburgh that is ultimately owned by Epsom Investment Pte. Ltd. (an affiliate of Singaporean sovereign wealth fund GIC Pte. Ltd., which owns about $44.4 \%$ of DLH), Three Rivers Utility Holdings LLC (a company whose members are large Dutch pension fund services provider PGGM Infrastructure Fund and subsidiaries of multinational Manulife Financial Corp., which collectively own $30.4 \%$ of DLH), and AIA Energy North America (a fund that is owned by large Dutch pension manager APG Americas Infrastructure and the California State Teachers' Retirement System, which collectively own $25.2 \%$ of DLH).

Through its electric utility subsidiary Duquesne Light Co. (DLC) (about 90\%-95\% of consolidated EBITDA), DLH engages in the supply (through its provider-of-last-resort services), transmission, and distribution of electricity to about 600,000 customers in Southwestern Pennsylvania, including Pittsburgh. In addition, DLH's subsidiary DQE Communications LLC (about 5\%-10\% of EBITDA) owns, operates, and maintains a high-speed fiber optic-based metropolitan network, leases dark fiber, and provides managed ethernet and internet services to commercial, industrial, governmental, and academic customers.

## Business Risk: Excellent

We base our business risk assessment for DLH on its operations through DLC, as these operations make up most of DLH's business. DLC's electric T\&D operations are low risk and provide an essential service to its customers. Furthermore, it effectively manages its regulatory risk. Although DLC's customer base is smaller than other electric utility peers and is concentrated in one regulatory jurisdiction, it benefits from numerous credit supportive mechanisms, such as future test years and the distribution system improvement charge rider, which mitigate regulatory lag, allow DLC to recover expenditures in between rate cases, and support its cash flow stability. This being said, DLC does not have a revenue decoupling mechanism and derives about $40 \%$ of its distribution revenue from more cyclical C\&I customers, which have been hurt throughout the pandemic. However, the company's business risk benefits from load stability as the electric T\&D provider to Pittsburgh, and residential sales make up most of the company's margins, offsetting the company's C\&I load declines.

DLH's fiber optics business introduces some risk to the company. This reflects our view that the business is subject to competitive market forces, and the recoverability of costs for these operations is less certain compared to DLH's regulated utility business. Overall DLH's fiber optics business could introduce volatility to its cash flows. However, the relative size of this business, which accounts for about $5 \%-10 \%$ of DLH's consolidated EBITDA, partially mitigates its
relative risk in relation to DLH, and hence, is not the primary focus of our business risk assessment for DLH.

## Financial Risk: Aggressive

We assess DLH's financial measures using our medial volatility table, which largely reflects our view of the company's low-risk electric T\&D operations and its effective management of regulatory risk. Under our base-case scenario, we expect FFO to debt to average about $11 \%-13 \%$, which is consistent with an aggressive financial risk profile. Our base case assumes continued use of existing regulatory mechanisms, load decline in 2020 stemming from the COVID-19 pandemic, capital spending that averages about $\$ 400$ million annually, a dividend policy that enables the company to maintain its debt-to-capitalization ratio near its current level, negative discretionary cash flow, and the refinancing of all debt maturities.

## Liquidity: Adequate

DLH has adequate liquidity, reflecting our expectation that the company's liquidity sources will exceed uses by more than 1.1 x over the next 12 months, even if EBITDA declines $10 \%$. Under our stress scenario, we do not expect that DLH would require access to the capital markets during that period to meet its liquidity needs. DLH likely could absorb a high-impact, low probability event with limited need for refinancing. Moreover, it has sound relationships with banks, a generally satisfactory standing in the credit markets, and maintains generally prudent risk management practices.

## Principal liquidity sources

- FFO of about $\$ 350$ million over the next 12 months;
- Credit facility availability of about $\$ 450$ million;
- Cash on hand of about $\$ 115$ million.


## Principal liquidity uses

- Assumed maintenance capital spending of about $\$ 250$ million over the next 12 months;
- Long-term debt maturities of $\$ 500$ million; and
- Dividends of about $\$ 25$ million.


## Covenant Analysis

## Compliance expectations

- We expect the company to maintain cushion under the leverage ratio covenants in its credit agreements.


## Requirements

- DLH's revolving credit agreement contains a maximum leverage ratio covenant of $70 \%$ (as defined in the relevant documents).


## Environmental, Social, And Governance

DLH's exposure to environmental risk is limited compared to peers, reflecting its lower-risk electric T\&D network utility operations. Furthermore, no social factors have had a material impact on the rating, although the affordability of steadily increasing rates could be a future risk and the company will need to continue to comply with very high standards in relation to security given the nature of its utility and fiber optics businesses. Nevertheless, DLH's internal safety system has enabled it to effectively provide T\&D and fiber optics services to its customers throughout its history.

Governance factors are neutral. Although the company has a small number of owners, none of them have a controlling interest in the company. Furthermore, DLH has a board of directors that is largely independent from management and, in our view, is capably engaged in risk oversight on behalf of all stakeholders.

## Group Influence

Under our group rating methodology, we view DLH as the parent and the ultimate rated entity in the group. As a result, DLH's group and stand-alone credit profile are the same at 'bbb'.

## Issue Ratings - Subordination Risk Analysis

## Capital structure

- DLH's capital structure consists of about $\$ 2.7$ billion of long-term debt, out of which about $\$ 1.4$ billion is at DLC and the balance is unsecured debt at DLH.


## Analytical conclusions

- We rate DLH's senior unsecured debt 'BBB-', one notch below the issuer credit rating because this debt is structurally subordinated to a significant amount of subsidiary debt.


## Ratings Score Snapshot

## Issuer Credit Rating

BBB/Stable/NR

## Business risk: Excellent

- Country risk: Very low
- Industry risk: Very low
- Competitive position: Strong

Financial risk: Aggressive

- Cash flow/leverage: Aggressive


## Anchor: bbb

## Modifiers

- Diversification/portfolio effect: Neutral (no impact)
- Capital structure: Neutral (no impact)
- Financial policy: Neutral (no impact)
- Liquidity: Adequate (no impact)
- Management and governance: Satisfactory (no impact)
- Comparable rating analysis: Neutral (no impact)


## Stand-alone credit profile : bbb

- Group credit profile: bbb


## Related Criteria

- Criteria - Corporates - General: Reflecting Subordination Risk In Corporate Issue Ratings, March 28, 2018
- General Criteria: Methodology For Linking Long-Term And Short-Term Ratings, April 7, 2017
- Criteria - Corporates - General: Corporate Methodology: Ratios And Adjustments, Nov. 19, 2013
- General Criteria: Country Risk Assessment Methodology And Assumptions, Nov. 19, 2013
- General Criteria: Group Rating Methodology, Nov. 19, 2013
- General Criteria: Methodology: Industry Risk, Nov. 19, 2013
- Criteria - Corporates - Utilities: Key Credit Factors For The Regulated Utilities Industry, Nov. 19, 2013
- Criteria - Corporates - General: Corporate Methodology, Nov. 19, 2013
- Criteria - Corporates - Utilities: Collateral Coverage And Issue Notching Rules For '1+' And '1' Recovery Ratings On Senior Bonds Secured By Utility Real Property, Feb. 14, 2013
- General Criteria: Methodology: Management And Governance Credit Factors For Corporate Entities And Insurers, Nov. 13, 2012
- General Criteria: Use Of CreditWatch And Outlooks, Sept. 14, 2009
- Criteria - Insurance - General: Hybrid Capital Handbook: September 2008 Edition, Sept. 15, 2008


## Business And Financial Risk Matrix

|  | Financial Risk Profile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Business Risk Profile | Minimal | Modest | Intermediate | Significant | Aggressive | Highly leveraged |
| Excellent | aaa/aa+ | aa | $a+/ \mathrm{a}$ | a- | bbb | bbb-/bb+ |
| Strong | aa/aa- | $a+/ a$ | a-/bbb+ | bbb | bb+ | bb |
| Satisfactory | a/a- | bbb+ | bbb/bbb- | bbb-/bb+ | bb | b+ |
| Fair | bbb/bbb- | bbb- | bb+ | bb | bb- | b |
| Weak | bb+ | bb+ | bb | bb- | b+ | b/b- |
| Vulnerable | bb- | bb- | bb-/b+ | b+ | b | b- |

## Ratings Detail (As Of November 20, 2020)*

## Duquesne Light Holdings Inc.

| Issuer Credit Rating | $\mathrm{BBB} /$ Stable/NR |
| :--- | :--- |
| Senior Unsecured | $\mathrm{BBB}-$ |
| Issuer Credit Ratings History |  |
| 30-Jun-2014 | $\mathrm{BBB} /$ Stable/NR |
| 13-Jun-2013 | $\mathrm{BBB}-/$ Positive/NR |
| 17-Dec-2009 | $\mathrm{BBB}-/$ Stable/NR |

## Related Entities

Duquesne Light Co.
Issuer Credit Rating
BBB+/Stable/NR
*Unless otherwise noted, all ratings in this report are global scale ratings. S\&P Global Ratings' credit ratings on the global scale are comparable across countries. S\&P Global Ratings' credit ratings on a national scale are relative to obligors or obligations within that specific country. Issue and debt ratings could include debt guaranteed by another entity, and rated debt that an entity guarantees.

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Duquesne Light Company
Docket No. R-2021-3024750

DLC Exhibit 1, Part IV<br>Rate Structure and Cost Allocation

## BOOK 3

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

## Book 1

Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation

## Book 4

Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

## Book 5

Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022) Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021)
Book 7
Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

## Book 8

Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6 - Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 - Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13 - Paul R. Moul
Statement 14 - James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10
Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies
Book 11
Exhibit 7 - Depreciation Studies
Book 12
Confidential Testimony and Exhibits
Q.1. Provide a summary schedule of the individual rate effects. For each state jurisdictional rate, show the following information for the test period elected:

1. Rate schedule designation.
A.1. DFR IV - Attachment A - Fully Projected Future provides the requested information.
Q.2. Provide a summary schedule of the individual rate effects. For each state jurisdictional rate, show the following information for the test period elected:
2. For existing rates:
(a) Customers served as of end of period.
(b) Annual Kwh sales.
(c) Base rate revenues adjusted for any changes in base rate application that may have occurred during the test period.
(d) Tax surcharge revenues.
(e) Energy Cost adjustment clause revenues.
(f) Revenues received from other clauses or riders separately accounted for.
(g) Total of all revenues.
A.2. DFR IV - Attachment A - Fully Projected Future provides the requested information.
Q.3. Provide a summary schedule of the individual rate effects. For each state jurisdictional rate, show the following information for the test period elected:
3. For proposed rates:
(a) Estimated number of customers whose charges for electric service will be increased or decreased as a result of this filing.
(b) Base rate revenues:
(1) Annual dollar amount of increase or decrease.
(2) Percentage change.
(c) Estimated tax surcharge revenues based on the assumption that the base rate changes proposed were in place.
(d) Estimated Energy cost adjustment clause revenues.
(e) Revenues received from other clauses or riders separately accounted for.
(f) Total of all revenues:
(1) Amount of total annual dollar change.
(2) Percentage change.
A.3. DFR IV - Attachment A - Fully Projected Future provides the requested information.
Q.4. Provide a summary schedule of the individual rate effects. For each state jurisdictional rate, show the following information for the test period elected:
4. Supplement the revenue summary to obtain a complete revenue statement of the electric business, that is, show delayed payments, other electric revenues, FERC jurisdictional sales and revenues and all other appropriate revenue items and adjustments.
A.4. DFR IV - Attachment A - Fully Projected Future provides the requested information.
Q.5. Provide a summary schedule of the individual rate effects. For each state jurisdictional rate, show the following information for the test period elected:
5. Develop the grand total showing total sales and revenues as adjusted and the various increases and decreases and percent effects as described above.
A.5. DFR IV - Attachment A - Fully Projected Future provides the requested information.



Q.1. Provide a description of changes proposed for the new tariff:
(1) For each rate schedule proposed to be modified.
(2) For each rate schedule proposed to be deleted.
(3) For each new rate schedule proposed to be added.
A.1. Please refer to the direct testimony of David B. Ogden in Exhibit 5, Statement No. 16 and Exhibit No. DBO-3.
Q.1. The annual revenue effect of any proposed change to any rate must be supported by a billing analysis. This may consist of the use of bill frequency distributions or individual customer billing records for the most recent annual periods available. All billing determinants should be displayed. The blocking and corresponding prices of the existing rate and the proposed rate should be applied to the determinants to derive the base rate revenues under both present and proposed rates. The derived base rate revenues should form the basis for measuring the annual base rate effect of the rates in question for the test periods.
A.1. Attachment DFR IV-C-Proof provides the bill frequency analysis and proof of revenue calculations for each rate schedule. These calculations are based on forecast fully projected future test year billing determinants at current and proposed distribution rates.

DFR IV - Attachment C, Parts 1-13, provide a bill distribution for each of the metered rate classes.

# Duquesne Light Company <br> Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022 <br> Rate RS - Residential Service 

Attachment DFR IV-C-Proof
Page 1

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate RS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 5,952,167 | \$12.50 | \$74,402,089 |
| kWh | 3,435,988,994 | \$0.060233 | \$206,959,925 |
| CAP Revenue Credit |  |  | (\$19,425,733) |
| Subtotal | 3,435,988,994 |  | \$261,936,281 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 2,484,985 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 3,467,226 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 1,494,561 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 1,244,690,851 | \$0.00078 | \$972,037 |
| Energy Efficiency, Jun-Dec, kWh | 2,191,321,729 | \$0.00078 | \$1,708,177 |
| Universal Services, Jan-Dec, Non-Cap kWh | 3,168,153,591 | \$0.01111 | \$35,192,039 |
| Subtotal |  |  | \$37,872,254 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 892,164,171 | \$0.018753 | \$16,730,369 |
| Transmission, Jun-Dec | 1,570,700,792 | \$0.019857 | \$31,190,144 |
| Subtotal | 2,462,864,963 |  | \$47,920,513 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 892,164,171 | \$0.053326 | \$47,575,791 |
| Generation, Jun-Nov | 1,360,318,615 | \$0.057447 | \$78,146,389 |
| Generation, Dec | 210,382,178 | \$0.057447 | \$12,085,851 |
| Subtotal | 2,462,864,963 |  | \$137,808,030 |
| Rate RS \& Rider 14 |  |  |  |
| Distribution |  |  |  |
| Meter Charge | 44 | \$1.63 | \$72 |
| kWh Summer, May-Oct | 7,155 | \$0.060233 | \$431 |
| kWh, Winter Nov-Apr | 16,431 | \$0.045677 | \$751 |
| Subtotal | 23,586 |  | \$1,253 |
| Transmission - All kWh |  |  |  |
| Transmission, Jan-Apr | 10,319 | \$0.0082514 | \$85 |
| Transmission, May | 1,184 | \$0.0187526 | \$22 |
| Transmission, Jun-Oct | 4,309 | \$0.0198575 | \$86 |
| Transmission, Nov-Dec | 2,294 | \$0.0084954 | \$19 |
| Subtotal | 18,105 |  | \$212 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 11,503 | \$0.053326 | \$613 |
| Generation, Jun-Nov | 5,199 | \$0.057447 | \$299 |
| Generation, Dec | 1,403 | \$0.057447 | \$81 |
| Subtotal | 18,105 |  | \$993 |
| Subtotal Revenue |  |  | \$485,539,537 |
| Rider 10-State Tax Adjustment |  | -0.0080\% | $(\$ 26,816)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$15,961,776 |
| Total Calculated Revenue |  |  | \$501,474,498 |


| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate RS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 5,952,167 | \$16.25 | \$96,722,716 |
| All kWh | 3,435,988,994 | \$0.070564 | \$242,457,127 |
| CAP Revenue Credit |  |  | (\$19,425,733) |
| Subtotal | 3,435,988,994 |  | \$319,754,111 |
| EV Home Charging | 1,500 | \$19.57 | \$29,355 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 2,484,985 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 3,467,226 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 1,494,561 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 1,494,561 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 1,244,690,851 | \$0.00078 | \$972,037 |
| Energy Efficiency, Jun-Dec, kWh | 2,191,321,729 | \$0.00078 | \$1,708,177 |
| Universal Services, Jan-Dec, Non-Cap kWh | 3,168,153,591 | \$0.01111 | \$35,192,039 |
| Subtotal | 3,436,012,580 |  | \$37,872,254 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 892,164,171 | \$0.018753 | \$16,730,369 |
| Transmission, Jun-Dec | 1,570,700,792 | \$0.019857 | \$31,190,144 |
| Subtotal | 2,462,864,963 |  | \$47,920,513 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 892,164,171 | \$0.053326 | \$47,575,791 |
| Generation, Jun-Dec | 1,360,318,615 | \$0.057447 | \$78,146,389 |
| Generation, Jun-Dec | 210,382,178 | \$0.057447 | \$12,085,851 |
| Subtotal | 2,462,864,963 |  | \$137,808,030 |

## Rate RS \& Rider 14

Distribution

| Meter Charge | 44 | \$1.63 | \$72 |
| :---: | :---: | :---: | :---: |
| Winter kWh | 16,431 | \$0.063410 | \$1,042 |
| Summer kWh | 7,155 | \$0.070564 | \$505 |
| Subtotal | 23,586 |  | \$1,618 |
| Transmission - All kWh |  |  |  |
| Transmission, Jan-Apr | 10,319 | \$0.008251 | \$85 |
| Transmission, May | 1,184 | \$0.018753 | \$22 |
| Transmission, Jun-Oct | 4,309 | \$0.019857 | \$86 |
| Transmission, Nov-Dec | 2,294 | \$0.008495 | \$19 |
| Subtotal | 18,105 |  | \$212 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 11,503 | \$0.053326 | \$613 |
| Generation, Jun-Nov | 5,199 | \$0.057447 | \$299 |
| Generation, Dec | 1,403 | \$0.057447 | \$81 |
| Subtotal | 18,105 |  | \$993 |
| Subtotal Revenue |  |  | \$543,387,087 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$543,387,087 |
| Revenue Summary Distribution | Transmission | Generation | Total |
| Current Rates \$315,744,749 | \$47,920,726 | \$137,809,023 | \$501,474,498 |
| Proposed Rates \$357,657,338 | \$47,920,726 | \$137,809,023 | \$543,387,087 |
| Revenue Change \$41,912,589 | \$0 | \$0 | \$41,912,589 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022 Rate RH - Residential Service Heating

Attachment DFR IV-C-Proof
Part 2 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate RH |  |  |  |
| Distribution |  |  |  |
| Total Bills | 478,910 | \$12.50 | \$5,986,371 |
| kWh Summer, May-Oct | 139,502,572 | \$0.060233 | \$8,402,658 |
| kWh, Winter Nov-Apr | 259,179,423 | \$0.045677 | \$11,838,538 |
| CAP Revenue Credit |  |  | $(\$ 3,686,038)$ |
| Subtotal | 398,681,994 |  | \$22,541,531 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 198,469 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 280,441 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 114,660 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 196,487,870 | \$0.00078 | \$153,447 |
| Energy Efficiency, Jun-Dec, kWh | 202,194,124 | \$0.00078 | \$157,614 |
| Universal Services, Jan-Dec, Non-Cap kWh | 347,855,683 | \$0.01111 | \$3,864,002 |
| Subtotal |  |  | \$4,175,062 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 166,964,477 | \$0.008251 | \$1,377,699 |
| Transmission, Jun-Dec | 171,813,335 | \$0.008495 | \$1,459,625 |
| Subtotal | 338,777,811 |  | \$2,837,324 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 166,964,477 | \$0.053326 | \$8,903,593 |
| Generation, Jun-Nov | 128,775,288 | \$0.057447 | \$7,397,770 |
| Generation, Dec | 43,038,047 | \$0.057447 | \$2,472,412 |
| Subtotal | 338,777,811 |  | \$18,773,775 |
| Subtotal Revenue |  |  | \$48,327,692 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | $(\$ 2,554)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$1,520,132 |
| Total Calculated Revenue |  |  | \$49,845,270 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022 Rate RH - Residential Service Heating

Part 2 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate RH |  |  |  |
| Distribution |  |  |  |
| Total Bills | 478,910 | \$16.25 | \$7,782,283 |
| Summer, All kWh | 139,502,572 | \$0.070564 | \$9,843,859 |
| Winter, All kWh | 259,179,423 | \$0.063410 | \$16,434,567 |
| CAP Revenue Credit |  |  | (\$3,686,038) |
| Subtotal | 398,681,994 |  | \$30,374,672 |
| EV Home Charging | 0 | \$19.57 | \$0 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 198,469 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 280,441 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 114,660 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 114,660 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 196,487,870 | \$0.0008 | \$153,447 |
| Energy Efficiency, Jun-Dec, kWh | 202,194,124 | \$0.0008 | \$157,614 |
| Universal Services, Jan-Dec, Non-Cap kWh | 347,855,683 | \$0.01111 | \$3,864,002 |
| Subtotal |  |  | \$4,175,062 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 166,964,477 | \$0.008251 | \$1,377,699 |
| Transmission, Jun-Dec | 171,813,335 | \$0.008495 | \$1,459,625 |
| Subtotal | 338,777,811 |  | \$2,837,324 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 166,964,477 | \$0.053326 | \$8,903,593 |
| Generation, Jun-Dec | 128,775,288 | \$0.057447 | \$7,397,770 |
| Generation, Dec | 43,038,047 | \$0.057447 | \$2,472,412 |
| Subtotal | 338,777,811 |  | \$18,773,775 |
| Subtotal Revenue |  |  | \$56,160,833 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$56,160,833 |
| Revenue Summary Distribution | Transmission | Generation | Total |
| Current Rates \$28,234,171 | \$2,837,324 | \$18,773,775 | \$49,845,270 |
| Proposed Rates \$34,549,734 | \$2,837,324 | \$18,773,775 | \$56,160,833 |
| Revenue Change \$6,315,563 | \$0 | \$0 | \$6,315,563 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate RA - Residential Service Add-On Heat Pump

Attachment DFR IV-C-Proof
Part 3 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate RA |  |  |  |
| Distribution |  |  |  |
| Total Bills | 71,035 | \$12.50 | \$887,941 |
| kWh Summer, May-Oct | 27,663,986 | \$0.060233 | \$1,666,285 |
| kWh, Winter Nov-Apr | 32,396,596 | \$0.016394 | \$531,110 |
| CAP Revenue Credit |  |  | $(\$ 127,848)$ |
| Subtotal | 60,060,581 |  | \$2,957,488 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 29,397 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 41,639 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 17,226 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 17,226 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 17,226 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 17,226 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 24,940,496 | \$0.00078 | \$19,477 |
| Energy Efficiency, Jun-Dec, kWh | 35,120,085 | \$0.00078 | \$27,377 |
| Universal Services, Jan-Dec, Non-Cap kWh | 58,297,700 | \$0.01111 | \$647,574 |
| Subtotal |  |  | \$694,428 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 19,144,953 | \$0.014601 | \$279,533 |
| Transmission, Jun-Dec | 26,959,062 | \$0.015269 | \$411,634 |
| Subtotal | 46,104,014 |  | \$691,167 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 19,144,953 | \$0.053326 | \$1,020,929 |
| Generation, Jun-Nov | 22,088,901 | \$0.057447 | \$1,268,944 |
| Generation, Dec | 4,870,161 | \$0.057447 | \$279,777 |
| Subtotal | 46,104,014 |  | \$2,569,649 |
| Subtotal Revenue |  |  | \$6,912,733 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$318) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$188,988 |
| Total Calculated Revenue |  |  | \$7,101,403 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate RA - Residential Service Add-On Heat Pump

Attachment DFR IV-C-Proof
Part 3 of 18
Page 2 of 2
Sponsor: D. B. Ogden


Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate GS - General Service Small

Attachment DFR IV-C-Proof
Part 4 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 299,088 | \$12.50 | \$3,738,598 |
| kWh | 100,264,835 | \$0.073313 | \$7,350,716 |
| Subtotal | 100,264,835 |  | \$11,089,314 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 124,588 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 174,644 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 77,475 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 42,498,217 | \$0.00147 | \$62,324 |
| Energy Efficiency, Jun-Dec, kWh | 57,973,274 | \$0.00143 | \$82,717 |
| Subtotal |  |  | \$145,041 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 31,312,390 | \$0.010552 | \$330,413 |
| Transmission, Jun-Dec | 42,698,662 | \$0.010873 | \$464,260 |
| Subtotal | 74,011,052 |  | \$794,673 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 31,312,390 | \$0.053035 | \$1,660,640 |
| Generation, Jun-Nov | 35,777,741 | \$0.057133 | \$2,044,086 |
| Generation, Dec | 6,920,920 | \$0.057133 | \$395,412 |
| Subtotal | 74,011,052 |  | \$4,100,138 |
| Rate GS \& Rider 12 |  |  |  |
| Distribution |  |  |  |
| Meter Charge | 144 | \$12.50 | \$1,800 |
| kWh | 206,657 | \$0.060233 | \$12,448 |
| Subtotal | 206,657 |  | \$14,248 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 58,000 | \$0.018753 | \$1,088 |
| Transmission, Jun-Dec | 94,762 | \$0.019857 | \$1,882 |
| Subtotal | 152,762 |  | \$2,969 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 58,000 | \$0.053326 | \$3,093 |
| Generation, Jun-Nov | 74,559 | \$0.057447 | \$4,283 |
| Generation, Dec | 20,203 | \$0.057447 | \$1,161 |
| Subtotal | 152,762 |  | \$8,537 |
| Subtotal Revenue |  |  | \$16,154,919 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$945) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$562,430 |
| Total Calculated Revenue |  |  | \$16,716,404 |

Duquesne Light Company Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022

Rate GS - General Service Small

Attachment DFR IV-C-Proof
Part 4 of 18 Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 299,088 | \$16.25 | \$4,860,177 |
| All kWh | 100,264,835 | \$0.084241 | \$8,446,410 |
| Subtotal | 100,264,835 |  | \$13,306,587 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 124,588 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 174,644 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 77,475 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 77,475 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh | 42,498,217 | \$0.0015 | \$62,324 |
| Energy Efficiency, Jun-Dec, kWh | 57,973,274 | \$0.0014 | \$82,717 |
| Subtotal |  |  | \$145,041 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 31,312,390 | \$0.010552 | \$330,413 |
| Transmission, Jun-Dec | 42,698,662 | \$0.010873 | \$464,260 |
| Subtotal | 74,011,052 |  | \$794,673 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 31,312,390 | \$0.053035 | \$1,660,640 |
| Generation, Jun-Dec | 35,777,741 | \$0.057133 | \$2,044,086 |
| Generation, Dec | 6,920,920 | \$0.057133 | \$395,412 |
| Subtotal | 74,011,052 |  | \$4,100,138 |

Rate GS \& Rider 12
Distribution

| Meter Charge | 144 | \$16.25 | \$2,340 |
| :---: | :---: | :---: | :---: |
| All kWh | 206,657 | \$0.070564 | \$14,583 |
| Subtotal | 206,657 |  | \$16,923 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 58,000 | \$0.018753 | \$1,088 |
| Transmission, Jun-Dec | 94,762 | \$0.019857 | \$1,882 |
| Subtotal | 152,762 |  | \$2,969 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 58,000 | \$0.053326 | \$3,093 |
| Generation, Jun-Nov | 74,559 | \$0.057447 | \$4,283 |
| Generation, Dec | 20,203 | \$0.057447 | \$1,161 |
| Subtotal | 152,762 |  | \$8,537 |
| Subtotal Revenue |  |  | ,374,867 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | ,374,867 |


|  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Revenue Summary | Distribution | Transmission | Generation | Total |
| Current Rates | $\$ 11,810,087$ | $\$ 797,643$ | $\$ 4,108,674$ | $\$ 16,716,404$ |
| Proposed Rates | $\$ 13,468,551$ | $\$ 797,643$ | $\$ 4,108,674$ | $\$ 18,374,867$ |
| Revenue Change | $\$ 1,658,463$ | $\$ 0$ | $\$ 0$ | $\$ 1,658,463$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate GM<25 - General Service Small

Attachment DFR IV-C-Proof
Part 5 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GM<25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 240,308 | \$54.50 | \$13,096,803 |
| Demand first 5 kW | 1,091,143 | \$0.00 | \$0 |
| Demand additional kW | 1,529,825 | \$6.54 | \$10,005,059 |
| kWh | 606,422,246 | \$0.013961 | \$8,466,261 |
| Subtotal | 606,422,246 |  | \$31,568,122 |
| Rider 13 Meter Charge | 72 | \$13.21 | \$951 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 101,112 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 141,364 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 70,428 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 242,652,014 | \$0.00147 | \$355,852 |
| Energy Efficiency, Jun-Dec, kWh (1) | 369,422,100 | \$0.00143 | \$527,094 |
| Subtotal |  |  | \$882,946 |
| Transmission |  |  |  |
| KW, Jan-May | 549,113 | \$1.76 | \$964,032 |
| KW, Jun-Dec | 854,956 | \$1.80 | \$1,542,368 |
| kWh, Jan-May | 131,086,354 | \$0.00747 | \$978,836 |
| kWh, Jun-Dec | 199,517,915 | \$0.00775 | \$1,545,685 |
| Subtotal | 330,604,269 |  | \$5,030,922 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 131,086,354 | \$0.053035 | \$6,952,110 |
| Generation, Jun-Nov | 171,922,034 | \$0.057133 | \$9,822,403 |
| Generation, Dec | 27,595,881 | \$0.057133 | \$1,576,632 |
| Subtotal | 330,604,269 |  | \$18,351,145 |
| Rate GM<25 \& Rider 12 |  |  |  |
| Distribution |  |  |  |
| Meter Charge | 2,168 | \$12.50 | \$27,100 |
| kWh | 5,651,868 | \$0.060233 | \$340,429 |
| Subtotal | 5,651,868 |  | \$367,529 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 1,203,227 | \$0.018753 | \$22,564 |
| Transmission, Jun-Dec | 1,894,955 | \$0.019857 | \$37,629 |
| Subtotal | 3,098,183 |  | \$60,193 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 1,203,227 | \$0.053326 | \$64,164 |
| Generation, Jun-Nov | 1,665,533 | \$0.057447 | \$95,680 |
| Generation, Dec | 229,422 | \$0.057447 | \$13,180 |
| Subtotal | 3,098,183 |  | \$173,023 |
| Subtotal Revenue |  |  | \$56,434,832 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | $(\$ 2,757)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$1,640,977 |
| Total Calculated Revenue |  |  | \$58,073,052 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Duquesne Light Company
Attachment DFR IV-C-Proof
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate GM<25-General Service Small

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GM<25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 240,308 | \$63.00 | \$15,139,423 |
| Demand first 5 kW | 1,091,143 | \$0.00 | \$0 |
| Demand additional kW | 1,529,825 | \$7.89 | \$12,070,323 |
| All kWh | 606,422,246 | \$0.018390 | \$11,152,105 |
| Subtotal | 606,422,246 |  | \$38,361,852 |
| Rider 13 Meter Charge | 72 | \$13.21 | \$951 |
| EV Fleet CaaS | 0 | \$61.50 | \$0 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 101,112 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 141,364 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 70,428 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 70,428 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 242,652,014 | \$0.0015 | \$355,852 |
| Energy Efficiency, Jun-Dec, kWh (1) | 369,422,100 | \$0.0014 | \$527,094 |
| Subtotal |  |  | \$882,946 |
| Transmission |  |  |  |
| KW, Jan-May | 549,113 | \$1.76 | \$964,032 |
| KW, Jun-Dec | 854,956 | \$1.80 | \$1,542,368 |
| kWh, Jan-May | 131,086,354 | \$0.007467 | \$978,836 |
| kWh, Jun-Dec | 199,517,915 | \$0.007747 | \$1,545,685 |
| Subtotal | 330,604,269 |  | \$5,030,922 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 131,086,354 | \$0.053035 | \$6,952,110 |
| Generation, Jun-Nov | 171,922,034 | \$0.057133 | \$9,822,403 |
| Generation, Dec | 27,595,881 | \$0.057133 | \$1,576,632 |
| Subtotal | 330,604,269 |  | \$18,351,145 |
| Rate GM<25 \& Rider 12 |  |  |  |
| Distribution |  |  |  |
| Meter Charge | 2,168 | \$16.25 | \$35,230 |
| All kWh | 5,651,868 | \$0.070564 | \$398,818 |
| Subtotal | 5,651,868 |  | \$434,048 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 1,203,227 | \$0.018753 | \$22,564 |
| Transmission, Jun-Dec | 1,894,955 | \$0.019857 | \$37,629 |
| Subtotal | 3,098,183 |  | \$60,193 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 1,203,227 | \$0.053326 | \$64,164 |
| Generation, Jun-Nov | 1,665,533 | \$0.057447 | \$95,680 |
| Generation, Dec | 229,422 | \$0.057447 | \$13,180 |
| Subtotal | 3,098,183 |  | \$173,023 |
| Subtotal Revenue |  |  | \$63,295,080 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$63,295,080 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :---: | :---: | :---: | :---: | :---: |
| Current Rates | \$34,457,769 | \$5,091,114 | \$18,524,169 | \$58,073,052 |
| Proposed Rates | \$39,679,797 | \$5,091,114 | \$18,524,169 | \$63,295,080 |
| Revenue Change | \$5,222,028 | \$0 | \$0 | \$5,222,028 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate GM>25 - General Service Medium

Attachment DFR IV-C-Proof
Part 6 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GM>25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 81,264 | \$65.65 | \$5,334,988 |
| Demand first 5 kW | 406,320 | \$0.00 | \$0 |
| Demand additional kW | 6,145,512 | \$6.54 | \$40,191,652 |
| kWh | 2,111,921,912 | \$0.009685 | \$20,453,964 |
| Subtotal | 2,111,921,912 |  | \$65,980,603 |
| Rider 13 Meter Charge | 144 | \$13.21 | \$1,902 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 33,871 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 47,394 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 23,604 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 845,691,708 | \$0.00147 | \$1,240,217 |
| Energy Efficiency, Jun-Dec, kWh (1) | 1,266,230,203 | \$0.00143 | \$1,806,666 |
| Subtotal |  |  | \$3,046,882 |
| Transmission |  |  |  |
| KW, Jan-May | 692,731 | \$1.85 | \$1,284,860 |
| KW, Jun-Dec | 1,067,627 | \$1.90 | \$2,029,422 |
| kWh, Jan-May | 228,364,063 | \$0.005748 | \$1,312,742 |
| kWh, Jun-Dec | 342,473,507 | \$0.005896 | \$2,019,074 |
| Subtotal | 570,837,570 |  | \$6,646,098 |
| Generation, All kWh |  |  |  |
| Generation, Jan-Feb | 91,279,644 | \$0.053035 | \$4,840,978 |
| Generation, Mar-May | 137,084,419 | \$0.053035 | \$7,270,215 |
| Generation, Jun-Aug | 160,797,422 | \$0.057133 | \$9,186,822 |
| Generation, Sep-Nov | 135,488,639 | \$0.057133 | \$7,740,858 |
| Generation, Dec | 46,187,446 | \$0.057133 | \$2,638,822 |
| Subtotal | 570,837,570 |  | \$31,677,694 |
| Subtotal Revenue |  |  | \$107,353,180 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | $(\$ 5,798)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$3,451,469 |
| Total Calculated Revenue |  |  | \$110,798,851 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate GM>25 - General Service Medium

Attachment DFR IV-C-Proof
Part 6 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GM>25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 81,264 | \$76.00 | \$6,176,071 |
| Demand first 5 kW | 406,320 | \$0.00 | \$0 |
| Demand additional kW | 6,145,512 | \$7.89 | \$48,488,093 |
| All kWh | 2,111,921,912 | \$0.012661 | \$26,739,043 |
| Subtotal | 2,111,921,912 |  | \$81,403,208 |
| Meter Charge | 144 | \$13.21 | \$1,902 |
| EV Fleet CaaS | 552 | \$61.50 | \$33,948 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 33,871 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 47,394 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 23,604 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 23,604 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 845,691,708 | \$0.0015 | \$1,240,217 |
| Energy Efficiency, Jun-Dec, kWh (1) | 1,266,230,203 | \$0.0014 | \$1,806,666 |
| Subtotal |  |  | \$3,046,882 |
| Transmission |  |  |  |
| KW, Jan-May | 692,731 | \$1.85 | \$1,284,860 |
| KW, Jun-Dec | 1,067,627 | \$1.90 | \$2,029,422 |
| kWh, Jan-May | 228,364,063 | \$0.005748 | \$1,312,742 |
| kWh, Jun-Dec | 342,473,507 | \$0.005896 | \$2,019,074 |
| Subtotal | 570,837,570 |  | \$6,646,098 |
| Generation, All kWh |  |  |  |
| Generation, Jan-Feb | 91,279,644 | \$0.053035 | \$4,840,978 |
| Generation, Mar-May | 137,084,419 | \$0.053035 | \$7,270,215 |
| Generation, Jun-Aug | 160,797,422 | \$0.057133 | \$9,186,822 |
| Generation, Sep-Nov | 135,488,639 | \$0.057133 | \$7,740,858 |
| Generation, Dec | 46,187,446 | \$0.057133 | \$2,638,822 |
| Subtotal | 570,837,570 |  | \$31,677,694 |
| Subtotal Revenue |  |  | \$122,809,733 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$122,809,733 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | ---: |
| Current Rates | $\$ 72,475,059$ | $\$ 6,646,098$ | $\$ 31,677,694$ | $\$ 110,798,851$ |
| Proposed Rates | $\$ 84,485,941$ | $\$ 6,646,098$ | $\$ 31,677,694$ | $\$ 122,809,733$ |
| Revenue Change | $\$ 12,010,882$ | $\$ 0$ | $\$ 0$ | $\$ 12,010,882$ |

Rate GMH<25-General Service Small Heating
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GMH<25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 30,061 | \$54.50 | \$1,638,305 |
| Demand first 5 kW, Jun-Sep | 40,064 | \$0.00 | \$0 |
| Demand additional kW, Jun-Sep | 49,138 | \$6.54 | \$321,366 |
| kWh, Jun-Sep | 17,472,222 | \$0.013961 | \$243,930 |
| kWh, Oct-May | 40,744,770 | \$0.029609 | \$1,206,412 |
| Subtotal | 58,216,993 |  | \$3,410,013 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 12,578 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 17,506 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 8,098 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 26,029,426 | \$0.00147 | \$38,172 |
| Energy Efficiency, Jun-Dec, kWh (1) | 32,220,805 | \$0.00143 | \$45,973 |
| Subtotal |  |  | \$84,145 |
| Transmission |  |  |  |
| Jan-May, kWh | 16,066,554 | \$0.00505 | \$81,072 |
| Jun-Dec, kWh | 19,882,724 | \$0.00517 | \$102,742 |
| Jun-Sep, kW | 54,754 | \$3.38 | \$185,001 |
| Subtotal | 54,754 |  | \$368,814 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 16,066,554 | \$0.053035 | \$852,083 |
| Generation, Jun-Nov | 16,309,691 | \$0.057133 | \$931,820 |
| Generation, Dec | 3,573,034 | \$0.057133 | \$204,138 |
| Subtotal | 35,949,279 |  | \$1,988,041 |
| Rate GMH<25 \& Rider 12 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 24 | \$12.50 | \$300 |
| kWh Summer, May-Oct | 18,009 | \$0.060233 | \$1,085 |
| kWh, Winter Nov-Apr | 15,229 | \$0.045677 | \$696 |
| Subtotal | 33,239 |  | \$2,080 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 7,646 | \$0.008251 | \$63 |
| Transmission, Jun-Dec | 12,758 | \$0.008495 | \$108 |
| Subtotal | 20,404 |  | \$171 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 7,646 | \$0.053326 | \$408 |
| Generation, Jun-Nov | 11,414 | \$0.057447 | \$656 |
| Generation, Dec | 1,344 | \$0.057447 | \$77 |
| Subtotal | 20,404 |  | \$1,141 |
| Subtotal Revenue |  |  | \$5,854,405 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$294) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$174,812 |
| Total Calculated Revenue |  |  | \$6,028,923 |

[^12]Duquesne Light Company
Attachment DFR IV-C-Proof
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate GMH<25-General Service Small Heating

Part 7 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GMH<25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 30,061 | \$63.00 | \$1,893,821 |
| Demand first 5 kW, Jun-Sep | 40,064 | \$0.00 | \$0 |
| Demand additional kW, Jun-Sep | 49,138 | \$7.89 | \$387,703 |
| kWh, Oct-May | 40,744,770 | \$0.038382 | \$1,563,866 |
| kWh, Jun-Sep | 17,472,222 | \$0.018390 | \$321,314 |
| Subtotal | 58,216,993 |  | \$4,166,703 |
| EV Fleet CaaS | 0 | \$61.50 | \$0 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 12,578 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 17,506 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 8,098 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 8,098 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 26,029,426 | \$0.0015 | \$38,172 |
| Energy Efficiency, Jun-Dec, kWh (1) | 32,220,805 | \$0.0014 | \$45,973 |
| Subtotal |  |  | \$84,145 |
| Transmission |  |  |  |
| Jan-May, kWh | 16,066,554 | \$0.005046 | \$81,072 |
| Jun-Dec, kWh | 19,882,724 | \$0.005167 | \$102,742 |
| Jun-Sep, kW | 54,754 | \$3.38 | \$185,001 |
| Subtotal | 35,949,279 |  | \$368,814 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 16,066,554 | \$0.053035 | \$852,083 |
| Generation, Jun-Nov | 16,309,691 | \$0.057133 | \$931,820 |
| Generation, Dec | 3,573,034 | \$0.057133 | \$204,138 |
| Subtotal | 35,949,279 |  | \$1,988,041 |
| Rate GMH<25 \& Rider 12 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 24 | \$16.25 | \$390 |
| kWh Winter, Nov-Apr | 15,229 | \$0.063410 | \$966 |
| kWh Summer, May-Oct | 18,009 | \$0.070564 | \$1,271 |
| Subtotal | 33,239 |  | \$2,627 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 7,646 | \$0.008251 | \$63 |
| Transmission, Jun-Dec | 12,758 | \$0.008495 | \$108 |
| Subtotal | 20,404 |  | \$171 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 7,646 | \$0.053326 | \$408 |
| Generation, Jun-Nov | 11,414 | \$0.057447 | \$656 |
| Generation, Dec | 1,344 | \$0.057447 | \$77 |
| Subtotal | 20,404 |  | \$1,141 |
| Subtotal Revenue |  |  | \$6,611,642 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$6,611,642 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | ---: |
| Current Rates | $\$ 3,670,756$ | $\$ 368,986$ | $\$ 1,989,181$ | $\$ 6,028,923$ |
| Proposed Rates | $\$ 4,253,475$ | $\$ 368,986$ | $\$ 1,989,181$ | $\$ 6,611,642$ |
| Revenue Change | $\$ 582,719$ | $\$ 0$ | $\$ 0$ | $\$ 582,719$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate GMH>25-General Service Medium Heating

Attachment DFR IV-C-Proof
Part 8 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :--- | ---: | ---: | ---: |
| Rate GMH $>25$ |  |  |  |
| Distribution |  |  |  |
| Total Bills | 7,699 | $\$ 54.50$ | $\$ 419,580$ |
| Demand first 5 kW, Jun-Sep | 12,824 | $\$ 0.00$ | $\$ 0$ |
| Demand additional kW, Jun-Sep | 137,733 | $\$ 6.54$ | $\$ 900,777$ |
| kWh, Jun-Sep | $51,356,286$ | $\$ 0.013961$ | $\$ 716,985$ |
| kWh, Oct-May |  | $129,725,263$ | $\$ 0.029609$ |
| Subtotal |  |  |  |
|  |  | $181,081,549$ |  |

Surcharges

| Retail Market Enhancement, Jan-May, Bills | 3,212 | \$0.00 | \$0 |
| :---: | :---: | :---: | :---: |
| Retail Market Enhancement, Jun-Dec, Bills | 4,486 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 2,072 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 2,072 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 2,072 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 2,072 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, kWh (1) | 84,543,977 | \$0.00147 | \$123,985 |
| Energy Efficiency, Jun-Dec, kWh (1) | 96,537,572 | \$0.00143 | \$137,740 |
| Subtotal |  |  | \$261,725 |
| Transmission |  |  |  |
| Jan-May, kWh | 21,145,219 | \$0.004975 | \$105,201 |
| Jun-Dec, kWh | 24,064,165 | \$0.005324 | \$128,124 |
| Jun-Sep, kW | 37,037 | \$6.32 | \$234,043 |
| Subtotal | 37,037 |  | \$467,368 |
| Generation, All kWh |  |  |  |
| Generation, Jan-Feb | 10,531,607 | \$0.053035 | \$558,539 |
| Generation, Mar-May | 10,613,612 | \$0.053035 | \$562,888 |
| Generation, Jun-Aug | 9,925,788 | \$0.057133 | \$567,089 |
| Generation, Sep-Nov | 9,360,812 | \$0.057133 | \$534,810 |
| Generation, Dec | 4,777,564 | \$0.057133 | \$272,956 |
| Subtotal | 45,209,383 |  | \$2,496,283 |

Subtotal Revenue

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Duquesne Light Company Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022 Rate GMH>25-General Service Medium Heating

Attachment DFR IV-C-Proof
Part 8 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :--- | ---: | ---: | ---: |
| Rate GMH>25 |  |  |  |
| Distribution |  |  |  |
| Total Bills | 7,699 | $\$ 63.00$ | $\$ 485,020$ |
| Demand first 5 kW, Jun-Sep | 12,824 | $\$ 0.00$ | $\$ 0$ |
| Demand additional kW, Jun-Sep | 137,733 | $\$ 7.89$ | $\$ 1,086,717$ |
| kWh, Oct-May |  |  | $\$ 9,725,263$ |
| kWh, Jun-Sep |  | $\$ 0.038382$ | $\$ 4,979,115$ |
| Subtotal |  | $181,356,286$ | $\$ 0.018390$ |

EV Fleet CaaS
Surcharges

| Retail Market Enhancement, Jan-May, Bills |
| :--- |
| Retail Market Enhancement, Jun-Dec, Bills |
| Smart Meter, Jan-Mar, Meters |
| Smart Meter, Apr-Jun, Meters |
| Smart Meter, Jul-Sep, Meters |
| Smart Meter, Oct-Dec, Meters |
| Energy Efficiency, Jan-May, kWh (1) |
| Energy Efficiency, Jun-Dec, kWh (1) |

Subtotal
Transmission
Jan-May, kWh
Jun-Dec, kWh
Jun-Sep, kW
Subtotal

| $21,145,219$ | $\$ 0.004975$ | $\$ 105,201$ |
| ---: | ---: | ---: |
| $24,064,165$ | $\$ 0.005324$ | $\$ 128,124$ |
| 37,037 | $\$ 6.32$ | $\$ 234,043$ |
| $45,209,383$ |  | $\$ 467,368$ |

Generation, All kWh
Generation, Jan-Feb

| $10,531,607$ | $\$ 0.053035$ | $\$ 558,539$ |
| ---: | ---: | ---: |
| $10,613,612$ | $\$ 0.053035$ | $\$ 562,888$ |
| $9,925,788$ | $\$ 0.057133$ | $\$ 567,089$ |
| $9,360,812$ | $\$ 0.057133$ | $\$ 534,810$ |
| $4,777,564$ | $\$ 0.057133$ | $\$ 272,956$ |
| $45,209,383$ |  | $\$ 2,496,283$ |

Subtotal Revenue
Rider 10-State Tax Adjustment
Rider 22 - Distribution System Improvement Charge
Total Calculated Revenue

|  | $\$ 10,721,408$ |
| ---: | ---: |
| $0.0000 \%$ | $\$ 0$ |
| $0.0000 \%$ | $\$ 0$ |
|  | $\$ 10,721,408$ |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Revenue Summary
Current Rates
Proposed Rates
Revenue Change

| Distribution | Transmission |
| :---: | ---: |
| $\$ 6,446,592$ | $\$ 467,368$ |
| $\$ 7,757,757$ | $\$ 467,368$ |
| $\$ 1,311,165$ | $\$ 0$ |

Generation
\$2,496,283
\$2,496,283
\$0

Total
\$9,410,244
\$10,721,408
\$1,311,165

# Duquesne Light Company <br> Bill Frequency Current and Proposed Rates <br> 12 Months Ending December 31, 2022 <br> Rate GL - General Service Large 

Attachment DFR IV-C-Proof
Part 9 of 18
Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GL |  |  |  |
| Distribution |  |  |  |
| First 300 kW or less | 8,837 | \$3,180.00 | \$28,101,495 |
| Demand additional kW | 4,017,186 | \$8.41 | \$33,784,530 |
| All kWh | 2,559,510,775 | \$0.000000 | \$0 |
| Subtotal | 4,017,186 |  | \$61,886,025 |
| Untransformed Service Credit |  |  | $(\$ 64,544)$ |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 3,687 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 5,150 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 2,898 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 3,687 | \$411.69 | \$1,517,704 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 2,383,723 | \$0.36 | \$858,175 |
| Energy Efficiency, Jun-Dec, Bills (1) | 5,150 | \$404.97 | \$2,085,752 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 3,337,212 | \$0.34 | \$1,143,618 |
| Subtotal |  |  | \$5,605,249 |
| Transmission, 1CP |  |  |  |
| KW, Jan-May | 117,909 | \$4.88 | \$575,955 |
| KW, Jun-Dec | 165,073 | \$5.12 | \$844,486 |
| Subtotal | 282,983 |  | \$1,420,441 |
| Generation, All kWh |  |  |  |
| Generation | 125,035,488 | \$0.055425 | \$6,930,125 |
| Subtotal | 125,035,488 |  | \$6,930,125 |
| Rate GL \& Rider 16 |  |  |  |
| Distribution |  |  |  |
| Demand Charge kW | 277,609 | \$2.50 | \$694,021 |
| Subtotal |  |  | \$694,021 |
| Subtotal Revenue |  |  | \$76,471,317 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | $(\$ 5,722)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$3,406,038 |
| Total Calculated Revenue |  |  | \$79,871,632 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

# Duquesne Light Company <br> Bill Frequency Current and Proposed Rates <br> 12 Months Ending December 31, 2022 <br> Rate GL - General Service Large 

Attachment DFR IV-C-Proof
Part 9 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GL |  |  |  |
| Distribution |  |  |  |
| First 300 kW or less | 8,837 | \$3,675.00 | \$32,475,784 |
| Demand additional kW | 4,017,186 | \$10.66 | \$42,823,198 |
| Subtotal | 4,017,186 |  | \$75,298,982 |
| Untransformed Service Credit |  |  | $(\$ 64,544)$ |
| EV Fleet CaaS | 12 | \$61.50 | \$738 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 3,687 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 5,150 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 2,898 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 2,898 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 3,687 | \$411.69 | \$1,517,704 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 2,383,723 | \$0.36 | \$858,175 |
| Energy Efficiency, Jun-Dec, Bills (1) | 5,150 | \$404.97 | \$2,085,752 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 3,337,212 | \$0.34 | \$1,143,618 |
| Subtotal |  |  | \$5,605,249 |
| Transmission, 1CP |  |  |  |
| KW, Jan-May | 117,909 | \$4.88 | \$575,955 |
| KW, Jun-Dec | 165,073 | \$5.12 | \$844,486 |
| Subtotal | 282,983 |  | \$1,420,441 |
| Generation, All kWh |  |  |  |
| Generation | 125,035,488 | \$0.055425 | \$6,930,125 |
| Subtotal | 125,035,488 |  | \$6,930,125 |
| Rate GL \& Rider 16 |  |  |  |
| Distribution |  |  |  |
| Demand Charge kW | 277,609 | \$3.00 | \$832,826 |
| Subtotal |  |  | \$832,826 |
| Subtotal Revenue |  |  | \$90,023,816 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$90,023,816 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | :--- |
|  | $\$ 71,521,066$ | $\$ 1,420,441$ | $\$ 6,930,125$ | $\$ 79,871,632$ |
| Croposed Rates | $\$ 81,673,250$ | $\$ 1,420,441$ | $\$ 6,930,125$ | $\$ 90,023,816$ |
| Revenue Change | $\$ 10,152,184$ | $\$ 0$ | $\$ 0$ | $\$ 10,152,184$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate GLH - General Service Large Heating

Attachment DFR IV-C-Proof
Part 10 of 18 Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate GLH |  |  |  |
| Distribution |  |  |  |
| Total Bills | 705 | \$67.00 | \$47,224 |
| First 300 kW or less, Jun-Sep | 352 | \$3,180.00 | \$1,118,832 |
| Demand additional kW, Jun-Sep | 145,707 | \$8.41 | \$1,225,395 |
| kWh, Oct-May | 215,256,771 | \$0.023145 | \$4,982,118 |
| Summer, All kWh | 99,272,886 | \$0.000000 | \$0 |
| Subtotal | 314,529,656 |  | \$7,373,569 |
| Untransformed Credit |  |  | $(\$ 3,322)$ |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 442 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 615 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 345 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 345 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 345 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 345 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 442 | \$364.10 | \$160,919 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 312,840 | \$0.36 | \$111,166 |
| Energy Efficiency, Jun-Dec, Bills (1) | 615 | \$358.36 | \$220,283 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 437,976 | \$0.34 | \$148,141 |
| Subtotal |  |  | \$640,508 |
| Transmission, 1CP |  |  |  |
| KW, Jan-May | 28,955 | \$4.88 | \$141,435 |
| KW, Jun-Dec | 40,536 | \$5.12 | \$207,377 |
| Subtotal | 69,491 |  | \$348,812 |
| Generation, All kWh |  |  |  |
| Generation | 35,001,437 | \$0.055425 | \$1,939,964 |
| Subtotal | 35,001,437 |  | \$1,939,964 |
| Subtotal Revenue |  |  | \$10,299,531 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$673) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$400,538 |
| Total Calculated Revenue |  |  | \$10,699,396 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Duquesne Light Company Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate GLH - General Service Large Heating

Part 10 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :--- | ---: | ---: | ---: |
| Rate GLH |  |  |  |
| Distribution |  |  |  |
| Total Bills | 705 | $\$ 77.50$ | $\$ 54,625$ |
| First 300 kW or less, Jun-Sep | 352 | $\$ 3,675.00$ | $\$ 1,292,990$ |
| Demand additional kW, Jun-Sep | 145,707 | $\$ 10.66$ | $\$ 1,553,236$ |
| All kWh Oct-May |  | $215,256,771$ | $\$ 0.030162$ |
| Subtotal |  |  | $\$ 6,492,575$ |

Untransformed Credit
EV Fleet CaaS
Surcharges

| Retail Market Enhancement, Jan-May, Bills |
| :--- |
| Retail Market Enhancement, Jun-Dec, Bills |
| Smart Meter, Jan-Mar, Meters |
| Smart Meter, Apr-Jun, Meters |
| Smart Meter, Jul-Sep, Meters |
| Smart Meter, Oct-Dec, Meters |
| Energy Efficiency, Jan-May, Bills (1) |
| Energy Efficiency, Jan-May, kW (PLC) (1) |
| Energy Efficiency, Jun-Dec, Bills (1) |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) |
| Subtotal |


| 442 | $\$ 0.00$ | $\$ 0$ |
| ---: | ---: | ---: |
| 615 | $\$ 0.00$ | $\$ 0$ |
| 345 | $\$ 0.00$ | $\$ 0$ |
| 345 | $\$ 0.00$ | $\$ 0$ |
| 345 | $\$ 0.00$ | $\$ 0$ |
| 345 | $\$ 0.00$ | $\$ 0$ |
| 442 | $\$ 364.10$ | $\$ 160,919$ |
| 312,840 | $\$ 0.36$ | $\$ 111,166$ |
| 615 | $\$ 358.36$ | $\$ 220,283$ |
| 437,976 | $\$ 0.34$ | $\$ 148,141$ |

Transmission, 1CP
KW, Jan-May
KW, Jun-Dec
Subtotal

| 28,955 | $\$ 4.88$ | $\$ 141,435$ |
| :---: | :--- | :--- |
| 40,536 | $\$ 5.12$ | $\$ 207,377$ |
| 69,491 |  | $\$ 348,812$ |

Generation, All kWh
Generation

| $35,001,437$ | $\$ 0.055425$ | $\$ 1,939,964$ |
| :--- | :--- | :--- |
| $35,001,437$ | $\$ 1,939,964$ |  |

Subtotal Revenue

|  | $\$ 12,319,387$ |
| ---: | ---: |
| $0.0000 \%$ | $\$ 0$ |
| $0.0000 \%$ | $\$ 0$ |

Rider 10 - State Tax Adjustment
Rider 22 - Distribution System Improvement Charge
Total Calculated Revenue

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | ---: |
| Current Rates | $\$ 8,410,620$ | $\$ 348,812$ | $\$ 1,939,964$ | $\$ 10,699,396$ |
| Proposed Rates | $\$ 1,030,611$ | $\$ 348,812$ | $\$ 1,939,964$ | $\$ 12,319,387$ |
| Revenue Change | $\$ 1,619,991$ | $\$ 0$ | $\$ 0$ | $\$ 1,619,991$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022

Rate L-Large Power Service

Attachment DFR IV-C-Proof
Part 11 of 18 Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate L |  |  |  |
| Distribution |  |  |  |
| First 5,000 kW or less | 241 | \$34,900.00 | \$8,396,940 |
| Demand additional kW | 769,231 | \$13.12 | \$10,092,314 |
| All kWh | 937,896,579 | \$0.000000 | \$0 |
| Subtotal | 769,231 |  | \$18,489,254 |
| Untransformed Service Credit |  |  | (\$216,861) |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 100 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 140 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 156 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 100 | \$399.33 | \$40,033 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 849,408 | \$0.36 | \$304,769 |
| Energy Efficiency, Jun-Dec, Bills (1) | 140 | \$392.86 | \$55,138 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 1,189,171 | \$0.34 | \$406,140 |
| Subtotal |  |  | \$806,080 |
| Transmission, 1-P |  |  |  |
| KW, Jan-May | 0 | \$4.88 | \$0 |
| KW, Jun-Dec | 0 | \$5.12 | \$0 |
| Subtotal | 0 |  | \$0 |
| Generation, All kWh |  |  |  |
| Generation | 0 | \$0.055425 | \$0 |
| Subtotal | 0 |  | \$0 |
| Subtotal Revenue |  |  | \$19,078,473 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | $(\$ 1,603)$ |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$953,924 |
| Total Calculated Revenue |  |  | \$20,030,794 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

# Duquesne Light Company <br> Bill Frequency Current and Proposed Rates <br> 12 Months Ending December 31, 2022 <br> Rate L-Large Power Service 

Part 11 of 18
Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate L |  |  |  |
| Distribution |  |  |  |
| First 5,000 kW or less | 241 | \$41,800.00 | \$10,057,080 |
| Demand additional kW | 769,231 | \$16.63 | \$12,792,315 |
| Subtotal | 769,231 |  | \$22,849,395 |
| Untransformed Service Credit |  |  | (\$216,861) |
| EV Fleet CaaS | 0 | \$61.50 | \$0 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 100 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 140 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 156 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 156 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 100 | \$399.33 | \$40,033 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 849,408 | \$0.36 | \$304,769 |
| Energy Efficiency, Jun-Dec, Bills (1) | 140 | \$392.86 | \$55,138 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 1,189,171 | \$0.34 | \$406,140 |
| Subtotal |  |  | \$806,080 |
| Transmission, 1CP |  |  |  |
| KW, Jan-May | 0 | \$4.88 | \$0 |
| KW, Jun-Dec | 0 | \$5.12 | \$0 |
| Subtotal | 0 |  | \$0 |
| Generation, All kWh |  |  |  |
| Generation | 0 | \$0.055425 | \$0 |
| Subtotal | 0 |  | \$0 |
| Subtotal Revenue |  |  | \$23,438,614 |
| Rider 10-State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$23,438,614 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | ---: |
|  | $\$ 20,030,794$ | $\$ 0$ | $\$ 0$ | $\$ 20,030,794$ |
| Proposed Rates | $\$ 23,438,614$ | $\$ 0$ | $\$ 0$ | $\$ 23,438,614$ |
| Revenue Change | $\$ 3,407,821$ | $\$ 0$ | $\$ 0$ | $\$ 3,407,821$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate HVPS - High Voltage Power Service

Attachment DFR IV-C-Proof
Part 12 of 18

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate HVPS |  |  |  |
| Distribution |  |  |  |
| Demand first 50,000 kW | 84 | \$2,050.31 | \$172,226 |
| Demand 50,001-100,000 kW | 12 | \$3,202.72 | \$38,433 |
| Demand >100,000 kW | 12 | \$4,541.96 | \$54,504 |
| Total kWh | 1,213,146,604 | \$0.000000 | \$0 |
| Subtotal | 108 |  | \$265,162 |
| Untransformed Service Credit |  |  | \$0 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 45 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 63 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 33 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 33 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 33 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 33 | \$0.00 | \$0 |
| Energy Efficiency, Jan-May, Bills (1) | 45 | \$657.10 | \$29,570 |
| Energy Efficiency, Jan-May, kW (PLC) (1) | 935,312 | \$0.38 | \$359,256 |
| Energy Efficiency, Jun-Dec, Bills (1) | 63 | \$645.34 | \$40,657 |
| Energy Efficiency, Jun-Dec, kW (PLC) (1) | 1,309,437 | \$0.37 | \$478,750 |
| Subtotal |  |  | \$908,232 |
| Transmission, 1CP |  |  |  |
| KW, Jan-May | 0 | \$4.88 | \$0 |
| KW, Jun-Dec | 0 | \$5.12 | \$0 |
| Subtotal | 0 |  | \$0 |
| Generation, All kWh |  |  |  |
| Generation | 0 | \$0.055425 | \$0 |
| Subtotal | 0 |  | \$0 |
| Subtotal Revenue |  |  | \$1,173,395 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$99) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$58,670 |
| Total Calculated Revenue |  |  | \$1,231,966 |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate HVPS - High Voltage Power Service

Attachment DFR IV-C-Proof
Part 12 of 18
Page 2 of 2
Sponsor: D. B. Ogden
PROPOSED RATES $\quad$ Units $\quad$ Rate $\quad$ Revenue

Rate HVPS
Distribution

| Demand first 50,000 kW | 84 | $\$ 2,503.20$ | $\$ 210,269$ |
| :--- | ---: | ---: | ---: |
| Demand $50,001-100,000 \mathrm{~kW}$ | 12 | $\$ 3,910.17$ | $\$ 46,922$ |
| Demand $>100,000 \mathrm{~kW}$ | 12 | $\$ 5,545.24$ | $\$ 66,543$ |
| Subtotal | 108 | $\$ 323,734$ |  |

Untransformed Service Credit \$0

Surcharges
Retail Market Enhancement, Jan-May, Bills

| 45 | $\$ 0.00$ | $\$ 0$ |
| ---: | ---: | ---: |
| 63 | $\$ 0.00$ | $\$ 0$ |
| 33 | $\$ 0.00$ | $\$ 0$ |
| 33 | $\$ 0.00$ | $\$ 0$ |
| 33 | $\$ 0.00$ | $\$ 0$ |
| 33 | $\$ 0.00$ | $\$ 0$ |
| 45 | $\$ 657.10$ | $\$ 29,570$ |
| 935,312 | $\$ 0.38$ | $\$ 359,256$ |
| 63 | $\$ 645.34$ | $\$ 40,657$ |
| $1,309,437$ | $\$ 0.37$ | $\$ 478,750$ |
|  |  | $\$ 908,232$ |


| 0 | $\$ 4.88$ | $\$ 0$ |
| :---: | :---: | :---: |
| 0 | $\$ 5.12$ | $\$ 0$ |
| 0 |  | $\$ 0$ |

Generation, All kWh
Generation
Subtotal

| 0 | $\$ 0.055425$ | $\$ 0$ |
| :--- | :--- | :--- |
| 0 |  | $\$ 0$ |


| Subtotal Revenue |  | $\$ 1,231,966$ |
| :--- | :--- | ---: |
| Rider 10 - State Tax Adjustment | $0.0000 \%$ | $\$ 0$ |
| Rider 22 - Distribution System Improvement Charge | $0.0000 \%$ | $\$ 0$ |
| Total Calculated Revenue |  | $\mathbf{\$ 1 , 2 3 1 , 9 6 6}$ |

1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

| Revenue Summary | Distribution | Transmission | Generation | Total |
| :---: | :---: | :---: | :---: | :---: |
| Current Rates | \$1,231,966 | \$0 | \$0 | \$1,231,966 |
| Proposed Rates | \$1,231,966 | \$0 | \$0 | \$1,231,966 |
| Revenue Change | \$0 | \$0 | \$0 | \$0 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022 Rate UMS - Unmetered Service

Attachment DFR IV-C-Proof
Part 13 of 18 Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate UMS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 67,561 | \$10.00 | \$675,606 |
| kWh | 21,127,282 | \$0.018171 | \$383,904 |
| Subtotal | 21,127,282 |  | \$1,059,510 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 28,175 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 39,385 | \$0.00 | \$0 |
| Subtotal | 67,561 |  | \$0 |
| Transmission |  |  |  |
| Transmission, kWh Jan-May | 1,346,156 | \$0.003625 | \$4,879 |
| Transmission, kWh Jun-Dec | 1,903,678 | \$0.003965 | \$7,549 |
| Transmission, 1CP Jan-May | 2,103 | \$2.44 | \$5,135 |
| Transmission, 1CP Jun-Dec | 2,944 | \$2.56 | \$7,529 |
| Subtotal | 3,249,834 |  | \$25,092 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 1,346,156 | \$0.053326 | \$71,785 |
| Generation, Jun-Nov | 1,627,165 | \$0.057447 | \$93,476 |
| Generation, Dec | 276,513 | \$0.057447 | \$15,885 |
| Subtotal | 3,249,834 |  | \$181,146 |
| Subtotal Revenue |  |  | \$1,265,748 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$89) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$52,975 |
| Total Calculated Revenue |  |  | \$1,318,635 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate UMS - Unmetered Service

Attachment DFR IV-C-Proof
Part 13 of 18 Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate UMS |  |  |  |
| Distribution |  |  |  |
| Total Bills | 67,561 | \$11.50 | \$776,947 |
| Total kWh | 21,127,282 | \$0.027761 | \$586,514 |
| Subtotal | 21,127,282 |  | \$1,363,461 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 28,175 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 39,385 | \$0.00 | \$0 |
| Subtotal |  |  | \$0 |
| Transmission |  |  |  |
| Transmission, kWh Jan-May | 1,346,156 | \$0.003625 | \$4,879 |
| Transmission, kWh Jun-Dec | 1,903,678 | \$0.003965 | \$7,549 |
| Transmission, 1CP Jan-May | 2,103 | \$2.44 | \$5,135 |
| Transmission, 1CP Jun-Dec | 2,944 | \$2.56 | \$7,529 |
| Subtotal | 3,249,834 |  | \$25,092 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 1,346,156 | \$0.053326 | \$71,785 |
| Generation, Jun-Nov | 1,627,165 | \$0.057447 | \$93,476 |
| Generation, Dec | 276,513 | \$0.057447 | \$15,885 |
| Subtotal | 3,249,834 |  | \$181,146 |
| Subtotal Revenue |  |  | \$1,569,700 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$1,569,700 |
| Revenue Summary Distribution | Transmission | Generation | Total |
| Current Rates \$1,112,396 | \$25,092 | \$181,146 | \$1,318,635 |
| Proposed Rates \$1,363,461 | \$25,092 | \$181,146 | \$1,569,700 |
| Revenue Change \$251,065 | \$0 | \$0 | \$251,065 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022

Rate SE - Street Lighting Energy

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate SE |  |  |  |
| Distribution |  |  |  |
| Total Bills | 12 | \$0.00 | \$0 |
| Total Fixtures | 486,528 | \$2.92 | \$1,420,662 |
| All kWh | 24,591,733 | \$0.00000 | \$0 |
| Subtotal | 486,528 |  | \$1,420,662 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 5 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 7 | \$0.00 | \$0 |
| Subtotal | 12 |  | \$0 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 0 | \$0.000000 | \$0 |
| Transmission, Jun-Dec | 0 | \$0.000000 | \$0 |
| Subtotal | 0 |  | \$0 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 0 | \$0.031868 | \$0 |
| Generation, Jun-Nov | 0 | \$0.034331 | \$0 |
| Generation, Dec | 0 | \$0.034331 | \$0 |
| Subtotal | 0 |  | \$0 |
| Subtotal Revenue |  |  | \$1,420,662 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$119) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$71,033 |
| Total Calculated Revenue |  |  | \$1,491,576 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate SE - Street Lighting Energy

Attachment DFR IV-C-Proof
Part 14 of 18 Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate SE |  |  |  |
| Distribution |  |  |  |
| Total Fixtures | 486,528 | \$3.23 | \$1,571,485 |
| Subtotal | 486,528 |  | \$1,571,485 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 5 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 7 | \$0.00 | \$0 |
| Subtotal | 12 |  | \$0 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 0 | \$0.000000 | \$0 |
| Transmission, Jun-Dec | 0 | \$0.000000 | \$0 |
| Subtotal | 0 |  | \$0 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 0 | \$0.031868 | \$0 |
| Generation, Jun-Nov | 0 | \$0.034331 | \$0 |
| Generation, Dec | 0 | \$0.034331 | \$0 |
| Subtotal | 0 |  | \$0 |
| Subtotal Revenue |  |  | \$1,571,485 |
| Rider 10-State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$1,571,485 |


| Revenue Summary |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Cistribution | Transmission | Generation | Total |  |
|  | $\$ 1,491,576$ | $\$ 0$ | $\$ 0$ | $\$ 1,491,576$ |
| Proposed Rates | $\$ 1,571,485$ | $\$ 0$ | $\$ 0$ | $\$ 1,571,485$ |
| Revenue Change | $\$ 79,910$ | $\$ 0$ | $\$ 0$ | $\$ 79,910$ |

Duquesne Light Company Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate AL - Architectural Lighting Service

Part 15 of 18 Page 1 of 2
Sponsor: D. B. Ogden

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate AL |  |  |  |
| Distribution |  |  |  |
| Total Bills | 36 | \$8.00 | \$288 |
| kWh | 109,708 | \$0.002110 | \$231 |
| All kW | 336 | \$1.59 | \$534 |
| Subtotal | 109,708 |  | \$1,054 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 15 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 21 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 9 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters | 9 | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 9 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 9 | \$0.00 | \$0 |
| Subtotal |  |  | \$0 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 4,054 | \$0.009528 | \$39 |
| Transmission, Jun-Dec | 5,528 | \$0.010501 | \$58 |
| Subtotal | 9,582 |  | \$97 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 4,054 | \$0.031868 | \$129 |
| Generation, Jun-Nov | 4,536 | \$0.034331 | \$156 |
| Generation, Dec | 993 | \$0.034331 | \$34 |
| Subtotal | 9,582 |  | \$319 |
| Subtotal Revenue |  |  | \$1,469 |
| Rider 10-State Tax Adjustment |  | -0.0080\% | (\$0) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$53 |
| Total Calculated Revenue |  |  | \$1,522 |

Duquesne Light Company Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate AL - Architectural Lighting Service

Attachment DFR IV-C-Proof
Part 15 of 18 Page 2 of 2
Sponsor: D. B. Ogden

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate AL |  |  |  |
| Distribution |  |  |  |
| Total Bills | 36 | \$8.00 | \$288 |
| All kWh | 109,708 | \$0.002396 | \$263 |
| All kW | 336 | \$1.83 | \$615 |
| Subtotal | 109,708 |  | \$1,166 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 15 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 21 | \$0.00 | \$0 |
| Smart Meter, Jan-Mar, Meters | 9 | \$0.00 | \$0 |
| Smart Meter, Apr-Jun, Meters |  | \$0.00 | \$0 |
| Smart Meter, Jul-Sep, Meters | 9 | \$0.00 | \$0 |
| Smart Meter, Oct-Dec, Meters | 9 | \$0.00 | \$0 |
| Subtotal |  |  | \$0 |
| Transmission, All kWh |  |  |  |
| Transmission, Jan-May | 4,054 | \$0.009528 | \$39 |
| Transmission, Jun-Dec | 5,528 | \$0.010501 | \$58 |
| Subtotal | 9,582 |  | \$97 |
| Generation, All kWh |  |  |  |
| Generation, Jan-May | 4,054 | \$0.031868 | \$129 |
| Generation, Jun-Nov | 4,536 | \$0.034331 | \$156 |
| Generation, Dec | 993 | \$0.034331 | \$34 |
| Subtotal | 9,582 |  | \$319 |
| Subtotal Revenue |  |  | \$1,581 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$1,581 |


| Revenue Summary |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Current Rates | Distribution | Transmission | Generation | Total |
| Proposed Rates | $\$ 1,106$ | $\$ 97$ | $\$ 319$ | $\$ 1,522$ |
| Revenue Change | $\$ 1,166$ | $\$ 97$ | $\$ 319$ | $\$ 1,581$ |
|  | $\$ 59$ | $\$ 0$ | $\$ 0$ | $\$ 59$ |

Rate PAL - Private Area Lighting

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate PAL |  |  |  |
| Distribution |  |  |  |
| PAL High Pressure Sodium 70W | 8,820 | \$13.11 | \$115,630 |
| PAL High Pressure Sodium 100W | 1,992 | \$13.21 | \$26,314 |
| PAL High Pressure Sodium 150W | 3,396 | \$13.40 | \$45,506 |
| PAL High Pressure Sodium 250W | 4,308 | \$13.75 | \$59,235 |
| PAL High Pressure Sodium 400W | 2,220 | \$14.30 | \$31,746 |
| PAL Flood Lighting 100W | 1,500 | \$13.11 | \$19,665 |
| PAL Flood Lighting 250W | 2,316 | \$13.72 | \$31,776 |
| PAL Flood Lighting 400W | 5,040 | \$14.34 | \$72,274 |
| PAL LED Cobra Head 45W | 96 | \$13.01 | \$1,249 |
| PAL LED Cobra Head 60W | 36 | \$13.52 | \$487 |
| PAL LED Cobra Head 95W | 84 | \$13.99 | \$1,175 |
| PAL LED Cobra Head 139W | 0 | \$15.08 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$17.54 | \$0 |
| PAL LED Cobra Head 275W | 0 | \$19.24 | \$0 |
| PAL LED Colonial 48W | 0 | \$12.18 | \$0 |
| PAL LED Colonial 83W | 0 | \$12.18 | \$0 |
| PAL LED Contemporary 47W | 0 | \$14.19 | \$0 |
| PAL LED Contemporary 62W | 0 | \$14.19 | \$0 |
| PAL Customer Owned \& Maintained | 1,752 | \$2.71 | \$4,748 |
| Pole Fee | 540 | \$10.32 | \$5,573 |
| Subtotal | 31,560 |  | \$415,378 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 3,870 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 5,418 | \$0.00 | \$0 |
| Subtotal | 9,288 |  | \$0 |
| Transmission, Jan-May |  |  |  |
| PAL High Pressure Sodium 70W | 2,707 | \$0.00 | \$0 |
| PAL High Pressure Sodium 100W | 602 | \$0.01 | \$6 |
| PAL High Pressure Sodium 150W | 1,172 | \$0.01 | \$12 |
| PAL High Pressure Sodium 250W | 1,306 | \$0.01 | \$13 |
| PAL High Pressure Sodium 400W | 671 | \$0.02 | \$13 |
| PAL Flood Lighting 100W | 457 | \$0.00 | \$0 |
| PAL Flood Lighting 250W | 1,020 | \$0.00 | \$0 |
| PAL Flood Lighting 400W | 1,539 | \$0.00 | \$0 |
| PAL LED Cobra Head 45W | 29 | \$0.00 | \$0 |
| PAL LED Cobra Head 60W | 15 | \$0.00 | \$0 |
| PAL LED Cobra Head 95W | 25 | \$0.00 | \$0 |
| PAL LED Cobra Head 139W | - | \$0.00 | \$0 |
| PAL LED Cobra Head 219W | - | \$0.00 | \$0 |
| PAL LED Cobra Head 275W | - | \$0.00 | \$0 |
| PAL LED Colonial 48W | - | \$0.00 | \$0 |
| PAL LED Colonial 83W | - | \$0.00 | \$0 |
| PAL LED Contemporary 47W | - | \$0.00 | \$0 |
| PAL LED Contemporary 62W | - | \$0.00 | \$0 |
| Subtotal | 9,544 |  | \$44 |
| Transmission, Jun-Dec |  |  |  |
| PAL High Pressure Sodium 70W | 3,790 | \$0.00 | \$0 |
| PAL High Pressure Sodium 100W | 843 | \$0.00 | \$0 |
| PAL High Pressure Sodium 150W | 1,641 | \$0.00 | \$0 |
| PAL High Pressure Sodium 250W | 1,829 | \$0.00 | \$0 |
| PAL High Pressure Sodium 400W | 940 | \$0.00 | \$0 |
| PAL Flood Lighting 100W | 640 | \$0.00 | \$0 |
| PAL Flood Lighting 250W | 1,428 | \$0.00 | \$0 |
| PAL Flood Lighting 400W | 2,154 | \$0.00 | \$0 |
| PAL LED Cobra Head 45W | 41 | \$0.00 | \$0 |
| PAL LED Cobra Head 60W | 20 | \$0.00 | \$0 |
| PAL LED Cobra Head 95W | 36 | \$0.00 | \$0 |
| PAL LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 275W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 48W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 83W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 47W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 62W | 0 | \$0.00 | \$0 |
| Subtotal | 13,362 |  | \$0 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate PAL - Private Area Lighting

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Generation, Jan-May |  |  |  |
| PAL High Pressure Sodium 70W | 2,707 | \$0.92 | \$2,491 |
| PAL High Pressure Sodium 100W | 602 | \$1.59 | \$958 |
| PAL High Pressure Sodium 150W | 1,172 | \$2.26 | \$2,649 |
| PAL High Pressure Sodium 250W | 1,306 | \$3.51 | \$4,586 |
| PAL High Pressure Sodium 400W | 671 | \$5.42 | \$3,639 |
| PAL Flood Lighting 100W | 457 | \$1.47 | \$672 |
| PAL Flood Lighting 250W | 1,020 | \$3.19 | \$3,253 |
| PAL Flood Lighting 400W | 1,539 | \$4.94 | \$7,601 |
| PAL LED Cobra Head 45W | 29 | \$0.51 | \$15 |
| PAL LED Cobra Head 60W | 15 | \$0.67 | \$10 |
| PAL LED Cobra Head 95W | 25 | \$1.08 | \$27 |
| PAL LED Cobra Head 139W | 0 | \$1.56 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.45 | \$0 |
| PAL LED Cobra Head 275W | 0 | \$3.09 | \$0 |
| PAL LED Colonial 48W | 0 | \$0.54 | \$0 |
| PAL LED Colonial 83W | 0 | \$0.92 | \$0 |
| PAL LED Contemporary 47W | 0 | \$0.54 | \$0 |
| PAL LED Contemporary 62W | 0 | \$0.70 | \$0 |
| Subtotal | 9,544 |  | \$25,900 |
| Generation, Jun-Nov |  |  |  |
| PAL High Pressure Sodium 70W | 3,249 | \$1.00 | \$3,249 |
| PAL High Pressure Sodium 100W | 723 | \$1.72 | \$1,243 |
| PAL High Pressure Sodium 150W | 1,407 | \$2.44 | \$3,432 |
| PAL High Pressure Sodium 250W | 1,568 | \$3.78 | \$5,926 |
| PAL High Pressure Sodium 400W | 806 | \$5.84 | \$4,705 |
| PAL Flood Lighting 100W | 549 | \$1.58 | \$867 |
| PAL Flood Lighting 250W | 1,224 | \$3.43 | \$4,197 |
| PAL Flood Lighting 400W | 1,846 | \$5.32 | \$9,823 |
| PAL LED Cobra Head 45W | 35 | \$0.55 | \$19 |
| PAL LED Cobra Head 60W | 17 | \$0.72 | \$13 |
| PAL LED Cobra Head 95W | 30 | \$1.17 | \$36 |
| PAL LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.64 | \$0 |
| PAL LED Cobra Head 275W | 0 | \$3.33 | \$0 |
| PAL LED Colonial 48W | 0 | \$0.58 | \$0 |
| PAL LED Colonial 83W | 0 | \$1.00 | \$0 |
| PAL LED Contemporary 47W | 0 | \$0.58 | \$0 |
| PAL LED Contemporary 62W | 0 | \$0.76 | \$0 |
| Subtotal | 11,453 |  | \$33,509 |
| Generation, Dec |  |  |  |
| PAL High Pressure Sodium 70W | 541 | \$1.00 | \$541 |
| PAL High Pressure Sodium 100W | 120 | \$1.72 | \$207 |
| PAL High Pressure Sodium 150W | 234 | \$2.44 | \$572 |
| PAL High Pressure Sodium 250W | 261 | \$3.78 | \$988 |
| PAL High Pressure Sodium 400W | 134 | \$5.84 | \$784 |
| PAL Flood Lighting 100W | 91 | \$1.58 | \$144 |
| PAL Flood Lighting 250W | 204 | \$3.43 | \$700 |
| PAL Flood Lighting 400W | 308 | \$5.32 | \$1,637 |
| PAL LED Cobra Head 45W | 6 | \$0.55 | \$3 |
| PAL LED Cobra Head 60W | 3 | \$0.72 | \$2 |
| PAL LED Cobra Head 95W | 5 | \$1.17 | \$6 |
| PAL LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.64 | \$0 |
| PAL LED Cobra Head 275W | 0 | \$3.33 | \$0 |
| PAL LED Colonial 48W | 0 | \$0.58 | \$0 |
| PAL LED Colonial 83W | 0 | \$1.00 | \$0 |
| PAL LED Contemporary 47W | 0 | \$0.58 | \$0 |
| PAL LED Contemporary 62W | 0 | \$0.76 | \$0 |
| Subtotal | 1,909 |  | \$5,585 |
| Subtotal Revenue |  |  | \$480,416 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$35) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$20,769 |
| Total Calculated Revenue |  |  | \$501,150 |

Rate PAL - Private Area Lighting

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate PAL |  |  |  |
| Distribution |  |  |  |
| PAL High Pressure Sodium 70W | 8,820 | \$14.66 | \$129,301 |
| PAL High Pressure Sodium 100W | 1,992 | \$14.77 | \$29,422 |
| PAL High Pressure Sodium 150W | 3,396 | \$14.99 | \$50,906 |
| PAL High Pressure Sodium 250W | 4,308 | \$15.38 | \$66,257 |
| PAL High Pressure Sodium 400W | 2,220 | \$15.99 | \$35,498 |
| PAL Flood Lighting 100W | 1,500 | \$14.66 | \$21,990 |
| PAL Flood Lighting 250W | 2,316 | \$15.34 | \$35,527 |
| PAL Flood Lighting 400W | 5,040 | \$16.04 | \$80,842 |
| PAL LED Cobra Head 30W | 0 | \$12.91 | \$0 |
| PAL LED Cobra Head 45W | 96 | \$12.91 | \$1,239 |
| PAL LED Cobra Head 60W | 36 | \$13.33 | \$480 |
| PAL LED Cobra Head 95W | 84 | \$14.71 | \$1,236 |
| PAL LED Cobra Head 139W | 0 | \$15.37 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$15.65 | \$0 |
| PAL LED Colonial 20W | 0 | \$16.89 | \$0 |
| PAL LED Colonial 45W | 0 | \$17.23 | \$0 |
| PAL LED Contemporary 40W | 0 | \$15.59 | \$0 |
| PAL LED Contemporary 55W | 0 | \$15.59 | \$0 |
| PAL Customer Owned \& Maintained | 1,752 | \$3.03 | \$5,309 |
| Pole Fee | 540 | \$11.54 | \$6,232 |
| Subtotal | 31,560 |  | \$464,238 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 3,870 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 5,418 | \$0.00 | \$0 |
| Subtotal | 9,288 |  | \$0 |
| Transmission, Jan-May |  |  |  |
| PAL High Pressure Sodium 70W | 2,707 | \$0.00 | \$0 |
| PAL High Pressure Sodium 100W | 602 | \$0.01 | \$6 |
| PAL High Pressure Sodium 150W | 1,172 | \$0.01 | \$12 |
| PAL High Pressure Sodium 250W | 1,306 | \$0.01 | \$13 |
| PAL High Pressure Sodium 400W | 671 | \$0.02 | \$13 |
| PAL Flood Lighting 100W | 457 | \$0.00 | \$0 |
| PAL Flood Lighting 250W | 1,020 | \$0.00 | \$0 |
| PAL Flood Lighting 400W | 1,539 | \$0.00 | \$0 |
| PAL LED Cobra Head 30W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 45W | 29 | \$0.00 | \$0 |
| PAL LED Cobra Head 60W | 15 | \$0.00 | \$0 |
| PAL LED Cobra Head 95W | 25 | \$0.00 | \$0 |
| PAL LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 20W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 45W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 40W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 55W | 0 | \$0.00 | \$0 |
| Subtotal | 9,544 |  | \$44 |
| Transmission, Jun-Dec |  |  |  |
| PAL High Pressure Sodium 70W | 3,790 | \$0.00 | \$0 |
| PAL High Pressure Sodium 100W | 843 | \$0.00 | \$0 |
| PAL High Pressure Sodium 150W | 1,641 | \$0.00 | \$0 |
| PAL High Pressure Sodium 250W | 1,829 | \$0.00 | \$0 |
| PAL High Pressure Sodium 400W | 940 | \$0.00 | \$0 |
| PAL Flood Lighting 100W | 640 | \$0.00 | \$0 |
| PAL Flood Lighting 250W | 1,428 | \$0.00 | \$0 |
| PAL Flood Lighting 400W | 2,154 | \$0.00 | \$0 |
| PAL LED Cobra Head 30W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 45W | 41 | \$0.00 | \$0 |
| PAL LED Cobra Head 60W | 20 | \$0.00 | \$0 |
| PAL LED Cobra Head 95W | 36 | \$0.00 | \$0 |
| PAL LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 20W | 0 | \$0.00 | \$0 |
| PAL LED Colonial 45W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 40W | 0 | \$0.00 | \$0 |
| PAL LED Contemporary 55W | 0 | \$0.00 | \$0 |
| Subtotal | 13,362 |  | \$0 |

Rate PAL - Private Area Lighting

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Generation, Jan-May |  |  |  |
| PAL High Pressure Sodium 70W | 2,707 | \$0.92 | \$2,491 |
| PAL High Pressure Sodium 100W | 602 | \$1.59 | \$958 |
| PAL High Pressure Sodium 150W | 1,172 | \$2.26 | \$2,649 |
| PAL High Pressure Sodium 250W | 1,306 | \$3.51 | \$4,586 |
| PAL High Pressure Sodium 400W | 671 | \$5.42 | \$3,639 |
| PAL Flood Lighting 100W | 457 | \$1.47 | \$672 |
| PAL Flood Lighting 250W | 1,020 | \$3.19 | \$3,253 |
| PAL Flood Lighting 400W | 1,539 | \$4.94 | \$7,601 |
| PAL LED Cobra Head 30W | 0 | \$0.51 | \$0 |
| PAL LED Cobra Head 45W | 29 | \$0.51 | \$15 |
| PAL LED Cobra Head 60W | 15 | \$0.67 | \$10 |
| PAL LED Cobra Head 95W | 25 | \$1.08 | \$27 |
| PAL LED Cobra Head 139W | 0 | \$1.56 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.45 | \$0 |
| PAL LED Colonial 20W | 0 | \$0.54 | \$0 |
| PAL LED Colonial 45W | 0 | \$0.92 | \$0 |
| PAL LED Contemporary 40W | 0 | \$0.54 | \$0 |
| PAL LED Contemporary 55W | 0 | \$0.70 | \$0 |
| Subtotal | 9,544 |  | \$25,900 |
| Generation, Jun-Nov |  |  |  |
| PAL High Pressure Sodium 70W | 3,249 | \$1.00 | \$3,249 |
| PAL High Pressure Sodium 100W | 723 | \$1.72 | \$1,243 |
| PAL High Pressure Sodium 150W | 1,407 | \$2.44 | \$3,432 |
| PAL High Pressure Sodium 250W | 1,568 | \$3.78 | \$5,926 |
| PAL High Pressure Sodium 400W | 806 | \$5.84 | \$4,705 |
| PAL Flood Lighting 100W | 549 | \$1.58 | \$867 |
| PAL Flood Lighting 250W | 1,224 | \$3.43 | \$4,197 |
| PAL Flood Lighting 400W | 1,846 | \$5.32 | \$9,823 |
| PAL LED Cobra Head 30W | 0 | \$0.55 | \$0 |
| PAL LED Cobra Head 45W | 35 | \$0.55 | \$19 |
| PAL LED Cobra Head 60W | 17 | \$0.72 | \$13 |
| PAL LED Cobra Head 95W | 30 | \$1.17 | \$36 |
| PAL LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.64 | \$0 |
| PAL LED Colonial 20W | 0 | \$0.58 | \$0 |
| PAL LED Colonial 45W | 0 | \$1.00 | \$0 |
| PAL LED Contemporary 40W | 0 | \$0.58 | \$0 |
| PAL LED Contemporary 55W | 0 | \$0.76 | \$0 |
| Subtotal | 11,453 |  | \$33,509 |
| Generation, Dec |  |  |  |
| PAL High Pressure Sodium 70W | 541 | \$1.00 | \$541 |
| PAL High Pressure Sodium 100W | 120 | \$1.72 | \$207 |
| PAL High Pressure Sodium 150W | 234 | \$2.44 | \$572 |
| PAL High Pressure Sodium 250W | 261 | \$3.78 | \$988 |
| PAL High Pressure Sodium 400W | 134 | \$5.84 | \$784 |
| PAL Flood Lighting 100W | 91 | \$1.58 | \$144 |
| PAL Flood Lighting 250W | 204 | \$3.43 | \$700 |
| PAL Flood Lighting 400W | 308 | \$5.32 | \$1,637 |
| PAL LED Cobra Head 30W | 0 | \$0.55 | \$0 |
| PAL LED Cobra Head 45W | 6 | \$0.55 | \$3 |
| PAL LED Cobra Head 60W | 3 | \$0.72 | \$2 |
| PAL LED Cobra Head 95W | 5 | \$1.17 | \$6 |
| PAL LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| PAL LED Cobra Head 219W | 0 | \$2.64 | \$0 |
| PAL LED Colonial 20W | 0 | \$0.58 | \$0 |
| PAL LED Colonial 45W | 0 | \$1.00 | \$0 |
| PAL LED Contemporary 40W | 0 | \$0.58 | \$0 |
| PAL LED Contemporary 55W | 0 | \$0.76 | \$0 |
| Subtotal | 1,909 |  | \$5,585 |
| Subtotal Revenue |  |  | \$529,277 |
| Rider 10 - State Tax Adjustment |  | 0.0000\% | \$0 |
| Rider 22 - Distribution System Improvement Charge |  | 0.0000\% | \$0 |
| Total Calculated Revenue |  |  | \$529,277 |


| Revenue Summary | Distribution | Transmission | Generation | Total |
| :--- | ---: | ---: | ---: | ---: |
| Current Rates | $\$ 436,112$ | $\$ 44$ | $\$ 64,994$ | $\$ 501,150$ |
| Proposed Rates | $\$ 464,238$ | $\$ 44$ | $\$ 64,994$ | $\$ 529,277$ |
| Revenue Change | $\$ 28,126$ | $\$ 0$ | $\$ 0$ | $\$ 28,126$ |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate SM - Street Lighting Municipal

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate SM |  |  |  |
| Distribution |  |  |  |
| SM Sodium Vapor 70W | 437,532 | \$13.11 | \$5,736,045 |
| SM Sodium Vapor 100W | 53,556 | \$13.21 | \$707,475 |
| SM Sodium Vapor 150W | 61,416 | \$13.40 | \$822,974 |
| SM Sodium Vapor 250W | 14,748 | \$13.75 | \$202,785 |
| SM Sodium Vapor 400W | 2,568 | \$14.30 | \$36,722 |
| SM Sodium Vapor 1,000W | 60 | \$16.44 | \$986 |
| SM Mercury Vapor 100W | 3,420 | \$12.69 | \$43,400 |
| SM Mercury Vapor 175W | 9,060 | \$12.95 | \$117,327 |
| SM Mercury Vapor 250W | 1,440 | \$13.20 | \$19,008 |
| SM Mercury Vapor 400W | 984 | \$13.73 | \$13,510 |
| SM Mercury Vapor 1,000W | 0 | \$15.79 | \$0 |
| SM LED Cobra Head 45W | 54,996 | \$13.01 | \$715,498 |
| SM LED Cobra Head 60W | 4,524 | \$13.52 | \$61,164 |
| SM LED Cobra Head 95W | 31,908 | \$13.99 | \$446,393 |
| SM LED Cobra Head 139W | 144 | \$15.08 | \$2,172 |
| SM LED Cobra Head 219W | 0 | \$17.54 | \$0 |
| SM LED Cobra Head 275W | 0 | \$19.24 | \$0 |
| SM LED Colonial 48W | 0 | \$12.18 | \$0 |
| SM LED Colonial 83W | 0 | \$12.18 | \$0 |
| SM LED Contemporary 47W | 24 | \$14.19 | \$341 |
| SM LED Contemporary 62W | 120 | \$14.19 | \$1,703 |
| SM Customer Owned \& Maintinated | 0 | \$2.71 | \$0 |
| Poles | 4,536 | \$10.32 | \$46,812 |
| Subtotal | 676,500 |  | \$8,974,314 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 870 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 1,218 | \$0.00 | \$0 |
| Subtotal | 2,088 |  | \$0 |
| Transmission, Jan-May |  |  |  |
| SM Sodium Vapor 70W | 58,552 | \$0.00 | \$0 |
| SM Sodium Vapor 100W | 7,167 | \$0.00 | \$0 |
| SM Sodium Vapor 150W | 8,219 | \$0.00 | \$0 |
| SM Sodium Vapor 250W | 1,974 | \$0.00 | \$0 |
| SM Sodium Vapor 400W | 344 | \$0.00 | \$0 |
| SM Sodium Vapor 1,000W | 8 | \$0.00 | \$0 |
| SM Mercury Vapor 100W | 458 | \$0.00 | \$0 |
| SM Mercury Vapor 175W | 1,212 | \$0.00 | \$0 |
| SM Mercury Vapor 250W | 193 | \$0.00 | \$0 |
| SM Mercury Vapor 400W | 132 | \$0.00 | \$0 |
| SM Mercury Vapor 1,000W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 45W | 7,360 | \$0.00 | \$0 |
| SM LED Cobra Head 60W | 605 | \$0.00 | \$0 |
| SM LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 275W | 0 | \$0.00 | \$0 |
| SM LED Colonial 48W | 0 | \$0.00 | \$0 |
| SM LED Colonial 83W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 47W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 62W | 0 | \$0.00 | \$0 |
| Subtotal | 86,223 |  | \$0 |
| Transmission, Jun-Dec |  |  |  |
| SM Sodium Vapor 70W | 81,973 | \$0.00 | \$0 |
| SM Sodium Vapor 100W | 10,034 | \$0.00 | \$0 |
| SM Sodium Vapor 150W | 11,506 | \$0.00 | \$0 |
| SM Sodium Vapor 250W | 2,763 | \$0.00 | \$0 |
| SM Sodium Vapor 400W | 481 | \$0.00 | \$0 |
| SM Sodium Vapor 1,000W | 11 | \$0.00 | \$0 |
| SM Mercury Vapor 100W | 641 | \$0.00 | \$0 |
| SM Mercury Vapor 175W | 1,697 | \$0.00 | \$0 |
| SM Mercury Vapor 250W | 270 | \$0.00 | \$0 |
| SM Mercury Vapor 400W | 184 | \$0.00 | \$0 |
| SM Mercury Vapor 1,000W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 45W | 10,304 | \$0.00 | \$0 |
| SM LED Cobra Head 60W | 848 | \$0.00 | \$0 |
| SM LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 275W | 0 | \$0.00 | \$0 |
| SM LED Colonial 48W | 0 | \$0.00 | \$0 |
| SM LED Colonial 83W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 47W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 62W | 0 | \$0.00 | \$0 |
| Subtotal | 120,712 |  | \$0 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates 12 Months Ending December 31, 2022
Rate SM - Street Lighting Municipal

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Generation, Jan-May |  |  |  |
| SM Sodium Vapor 70W | 58,552 | \$0.92 | \$53,868 |
| SM Sodium Vapor 100W | 7,167 | \$1.59 | \$11,396 |
| SM Sodium Vapor 150W | 8,219 | \$2.26 | \$18,575 |
| SM Sodium Vapor 250W | 1,974 | \$3.51 | \$6,927 |
| SM Sodium Vapor 400W | 344 | \$5.42 | \$1,863 |
| SM Sodium Vapor 1,000W | 8 | \$12.33 | \$99 |
| SM Mercury Vapor 100W | 458 | \$1.40 | \$641 |
| SM Mercury Vapor 175W | 1,212 | \$2.36 | \$2,861 |
| SM Mercury Vapor 250W | 193 | \$3.25 | \$626 |
| SM Mercury Vapor 400W | 132 | \$5.13 | \$676 |
| SM Mercury Vapor 1,000W | 0 | \$12.30 | \$0 |
| SM LED Cobra Head 45W | 7,360 | \$0.51 | \$3,753 |
| SM LED Cobra Head 60W | 605 | \$0.67 | \$406 |
| SM LED Cobra Head 95W | 0 | \$1.08 | \$0 |
| SM LED Cobra Head 139W | 0 | \$1.56 | \$0 |
| SM LED Cobra Head 219W | 0 | \$2.45 | \$0 |
| SM LED Cobra Head 275W | 0 | \$3.09 | \$0 |
| SM LED Colonial 48W | 0 | \$0.54 | \$0 |
| SM LED Colonial 83W | 0 | \$0.92 | \$0 |
| SM LED Contemporary 47W | 0 | \$0.54 | \$0 |
| SM LED Contemporary 62W | 0 | \$0.70 | \$0 |
| Subtotal | 86,223 |  | \$101,691 |
| Generation, Jun-Nov |  |  |  |
| SM Sodium Vapor 70W | 70,263 | \$1.00 | \$70,263 |
| SM Sodium Vapor 100W | 8,600 | \$1.72 | \$14,793 |
| SM Sodium Vapor 150W | 9,863 | \$2.44 | \$24,065 |
| SM Sodium Vapor 250W | 2,368 | \$3.78 | \$8,952 |
| SM Sodium Vapor 400W | 412 | \$5.84 | \$2,408 |
| SM Sodium Vapor 1,000W | 10 | \$13.29 | \$128 |
| SM Mercury Vapor 100W | 549 | \$1.51 | \$829 |
| SM Mercury Vapor 175W | 1,455 | \$2.54 | \$3,696 |
| SM Mercury Vapor 250W | 231 | \$3.50 | \$809 |
| SM Mercury Vapor 400W | 158 | \$5.53 | \$874 |
| SM Mercury Vapor 1,000W | 0 | \$13.25 | \$0 |
| SM LED Cobra Head 45W | 8,832 | \$0.55 | \$4,857 |
| SM LED Cobra Head 60W | 727 | \$0.72 | \$523 |
| SM LED Cobra Head 95W | 0 | \$1.17 | \$0 |
| SM LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| SM LED Cobra Head 219W | 0 | \$2.64 | \$0 |
| SM LED Cobra Head 275W | 0 | \$3.33 | \$0 |
| SM LED Colonial 48W | 0 | \$0.58 | \$0 |
| SM LED Colonial 83W | 0 | \$1.00 | \$0 |
| SM LED Contemporary 47W | 0 | \$0.58 | \$0 |
| SM LED Contemporary 62W | 0 | \$0.76 | \$0 |
| Subtotal | 103,468 |  | \$132,198 |
| Generation, Dec |  |  |  |
| SM Sodium Vapor 70W | 11,710 | \$1.72 | \$20,142 |
| SM Sodium Vapor 100W | 1,433 | \$2.44 | \$3,498 |
| SM Sodium Vapor 150W | 1,644 | \$3.78 | \$6,214 |
| SM Sodium Vapor 250W | 395 | \$5.84 | \$2,305 |
| SM Sodium Vapor 400W | 69 | \$13.29 | \$913 |
| SM Sodium Vapor 1,000W | 2 | \$1.51 | \$2 |
| SM Mercury Vapor 100W | 92 | \$2.54 | \$232 |
| SM Mercury Vapor 175W | 242 | \$3.50 | \$849 |
| SM Mercury Vapor 250W | 39 | \$5.53 | \$213 |
| SM Mercury Vapor 400W | 26 | \$13.25 | \$349 |
| SM Mercury Vapor 1,000W | 0 | \$0.55 | \$0 |
| SM LED Cobra Head 45W | 1,472 | \$0.72 | \$1,060 |
| SM LED Cobra Head 60W | 121 | \$1.17 | \$142 |
| SM LED Cobra Head 95W | 0 | \$1.68 | \$0 |
| SM LED Cobra Head 139W | 0 | \$2.64 | \$0 |
| SM LED Cobra Head 219W | 0 | \$3.33 | \$0 |
| SM LED Cobra Head 275W | 0 | \$0.58 | \$0 |
| SM LED Colonial 48W | 0 | \$1.00 | \$0 |
| SM LED Colonial 83W | 0 | \$0.58 | \$0 |
| SM LED Contemporary 47W | 0 | \$0.76 | \$0 |
| SM LED Contemporary 62W | 0 | \$0.00 | \$0 |
| Subtotal | 17,245 |  | \$35,919 |
| Subtotal Revenue |  |  | \$9,244,121 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$754) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$448,716 |
| Total Calculated Revenue |  |  | \$9,692,083 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate SM - Street Lighting Municipal

| PROPOSED RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate SM |  |  |  |
| Distribution |  |  |  |
| SM Sodium Vapor 70W | 437,532 | \$14.66 | \$6,414,219 |
| SM Sodium Vapor 100W | 53,556 | \$14.77 | \$791,022 |
| SM Sodium Vapor 150W | 61,416 | \$14.99 | \$920,626 |
| SM Sodium Vapor 250W | 14,748 | \$15.38 | \$226,824 |
| SM Sodium Vapor 400W | 2,568 | \$15.99 | \$41,062 |
| SM Sodium Vapor 1,000W | 60 | \$18.39 | \$1,103 |
| SM Mercury Vapor 100W | 3,420 | \$14.19 | \$48,530 |
| SM Mercury Vapor 175W | 9,060 | \$14.48 | \$131,189 |
| SM Mercury Vapor 250W | 1,440 | \$14.76 | \$21,254 |
| SM Mercury Vapor 400W | 984 | \$15.36 | \$15,114 |
| SM Mercury Vapor 1,000W | 0 | \$17.66 | \$0 |
| SM LED Cobra Head 30W | 0 | \$12.91 | \$0 |
| SM LED Cobra Head 45W | 55,020 | \$12.91 | \$710,308 |
| SM LED Cobra Head 60W | 4,644 | \$13.33 | \$61,905 |
| SM LED Cobra Head 95W | 31,908 | \$14.71 | \$469,367 |
| SM LED Cobra Head 139W | 144 | \$15.37 | \$2,213 |
| SM LED Cobra Head 219W | 0 | \$15.65 | \$0 |
| SM LED Colonial 20W | 0 | \$16.89 | \$0 |
| SM LED Colonial 45W | 0 | \$17.23 | \$0 |
| SM LED Contemporary 40W | 0 | \$15.59 | \$0 |
| SM LED Contemporary 55W | 0 | \$15.59 | \$0 |
| SM Customer Owned \& Maintinated | 0 | \$3.03 | \$0 |
| Poles | 4,536 | \$11.54 | \$52,345 |
| Subtotal | 676,500 |  | \$9,907,082 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 870 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 1,218 | \$0.00 | \$0 |
| Subtotal | 2,088 |  | \$0 |
| Transmission, Jan-May |  |  |  |
| SM Sodium Vapor 70W | 58,552 | \$0.00 | \$0 |
| SM Sodium Vapor 100W | 7,167 | \$0.00 | \$0 |
| SM Sodium Vapor 150W | 8,219 | \$0.00 | \$0 |
| SM Sodium Vapor 250W | 1,974 | \$0.00 | \$0 |
| SM Sodium Vapor 400W | 344 | \$0.00 | \$0 |
| SM Sodium Vapor 1,000W | 8 | \$0.00 | \$0 |
| SM Mercury Vapor 100W | 458 | \$0.00 | \$0 |
| SM Mercury Vapor 175W | 1,212 | \$0.00 | \$0 |
| SM Mercury Vapor 250W | 193 | \$0.00 | \$0 |
| SM Mercury Vapor 400W | 132 | \$0.00 | \$0 |
| SM Mercury Vapor 1,000W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 30W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 45W | 7,363 | \$0.00 | \$0 |
| SM LED Cobra Head 60W | 621 | \$0.00 | \$0 |
| SM LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| SM LED Colonial 20W | 0 | \$0.00 | \$0 |
| SM LED Colonial 45W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 40W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 55W | 0 | \$0.00 | \$0 |
| Subtotal | 86,242 |  | \$0 |
| Transmission, Jun-Dec |  |  |  |
| SM Sodium Vapor 70W | 81,973 | \$0.00 | \$0 |
| SM Sodium Vapor 100W | 10,034 | \$0.00 | \$0 |
| SM Sodium Vapor 150W | 11,506 | \$0.00 | \$0 |
| SM Sodium Vapor 250W | 2,763 | \$0.00 | \$0 |
| SM Sodium Vapor 400W | 481 | \$0.00 | \$0 |
| SM Sodium Vapor 1,000W | 11 | \$0.00 | \$0 |
| SM Mercury Vapor 100W | 641 | \$0.00 | \$0 |
| SM Mercury Vapor 175W | 1,697 | \$0.00 | \$0 |
| SM Mercury Vapor 250W | 270 | \$0.00 | \$0 |
| SM Mercury Vapor 400W | 184 | \$0.00 | \$0 |
| SM Mercury Vapor 1,000W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 30W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 45W | 10,308 | \$0.00 | \$0 |
| SM LED Cobra Head 60W | 870 | \$0.00 | \$0 |
| SM LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SM LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| SM LED Colonial 20W | 0 | \$0.00 | \$0 |
| SM LED Colonial 45W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 40W | 0 | \$0.00 | \$0 |
| SM LED Contemporary 55W | 0 | \$0.00 | \$0 |
| Subtotal | 120,739 |  | \$0 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate SM - Street Lighting Municipal

| Rate SM - Street Lighting Municipal |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| PROPOSED RATES | Units | Rate | Revenue |  |


| PROPOSED RATES |
| :--- |
| Generation, Jan-May |
| SM Sodium Vapor 70W |
| SM Sodium Vapor 100W |
| SM Sodium Vapor 150W |
| SM Sodium Vapor 250W |
| SM Sodium Vapor 400W |
| SM Sodium Vapor 1,000W |
| SM Mercury Vapor 100W |
| SM Mercury Vapor 175W |
| SM Mercury Vapor 250W |
| SM Mercury Vapor 400W |
| SM Mercury Vapor 1,000W |
| SM LED Cobra Head 30W |
| SM LED Cobra Head 45W |
| SM LED Cobra Head 60W |
| SM LED Cobra Head 95W |
| SM LED Cobra Head 139W |
| SM LED Cobra Head 219W |
| SM LED Colonial 20W |
| SM LED Colonial 45W |
| SM LED Contemporary 40W |
| SM LED Contemporary 55W |
| Subtotal |

Generation, Jun-Nov
SM Sodium Vapor 70W
SM Sodium Vapor 100W
SM Sodium Vapor 150W
SM Sodium Vapor 250W
SM Sodium Vapor 400W
SM Sodium Vapor 1,000W
SM Mercury Vapor 100W
SM Mercury Vapor 175W
SM Mercury Vapor 250W
SM Mercury Vapor 400W
SM Mercury Vapor 1,000W
SM LED Cobra Head 30W
SM LED Cobra Head 45W
SM LED Cobra Head 95W
SM LED Cobra Head 139W SM LED Cobra Head 219W
SM LED Colonial 20W
SM LED Colonial 45W
SM LED Contemporary 40W
SM LED Contemporary 55W
Subtotal
Generation, Dec

| Generation, Dec |
| :--- |
| SM Sodium Vapor 70W |
| SM Sodium Vapor 100W |
| SM Sodium Vapor 150W |
| SM Sodium Vapor 250W |
| SM Sodium Vapor 400W |
| SM Sodium Vapor 1,000W |
| SM Mercury Vapor 100W |
| SM Mercury Vapor 175W |
| SM Mercury Vapor 250W |
| SM Mercury Vapor 400W |
| SM Mercury Vapor 1,000W |
| SM LED Cobra Head 30W |
| SM LED Cobra Head 45W |
| SM LED Cobra Head 60W |
| SM LED Cobra Head 95W |
| SM LED Cobra Head 139W |
| SM LED Cobra Head 219W |
| SM LED Colonial 20W |
| SM LED Colonial 45W |
| SM LED Contemporary 40W |
| SM LED Contemporary 55W |
| Subtotal |

Subtotal Revenue
Rider 10 - State Tax Adjustment
Rider 22 - Distribution System Improvement Charge
Total Calculated Revenue

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate SH - Street Lighting Highway

| CURRENT RATES | Units | Rate | Revenue |
| :---: | :---: | :---: | :---: |
| Rate SH |  |  |  |
| Distribution |  |  |  |
| SH Sodium Vapor 100W | 168 | \$12.54 | \$2,107 |
| SH Sodium Vapor 150W | 480 | \$12.71 | \$6,101 |
| SH Sodium Vapor 200W | 6,660 | \$12.89 | \$85,847 |
| SH Sodium Vapor 400W | 1,128 | \$13.57 | \$15,307 |
| SH LED Cobra Head 60W | 0 | \$13.52 | \$0 |
| SH LED Cobra Head 95W | 0 | \$13.99 | \$0 |
| SH LED Cobra Head 139W | 0 | \$15.08 | \$0 |
| SH LED Cobra Head 219W | 0 | \$17.54 | \$0 |
| SH Customer Owned \& Maintinated | 0 | \$2.71 | \$0 |
| Subtotal | 8,436 |  | \$109,362 |
| Surcharges |  |  |  |
| Retail Market Enhancement, Jan-May, Bills | 65 | \$0.00 | \$0 |
| Retail Market Enhancement, Jun-Dec, Bills | 91 | \$0.00 | \$0 |
| Subtotal | 156 |  | \$0 |
| Transmission, Jan-May |  |  |  |
| SH Sodium Vapor 100W | 20 | \$0.00 | \$0 |
| SH Sodium Vapor 150W | 57 | \$0.00 | \$0 |
| SH Sodium Vapor 200W | 789 | \$0.00 | \$0 |
| SH Sodium Vapor 400W | 134 | \$0.00 | \$0 |
| SH LED Cobra Head 60W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| Subtotal | 999 |  | \$0 |
| Transmission, Jun-Dec |  |  |  |
| SH Sodium Vapor 100W | 28 | \$0.00 | \$0 |
| SH Sodium Vapor 150W | 80 | \$0.00 | \$0 |
| SH Sodium Vapor 200W | 1,104 | \$0.00 | \$0 |
| SH Sodium Vapor 400W | 187 | \$0.00 | \$0 |
| SH LED Cobra Head 60W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 95W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 139W | 0 | \$0.00 | \$0 |
| SH LED Cobra Head 219W | 0 | \$0.00 | \$0 |
| Subtotal | 1,399 |  | \$0 |
| Generation, Jan-May |  |  |  |
| SH Sodium Vapor 100W | 20 | \$1.59 | \$32 |
| SH Sodium Vapor 150W | 57 | \$2.26 | \$128 |
| SH Sodium Vapor 200W | 789 | \$3.03 | \$2,390 |
| SH Sodium Vapor 400W | 134 | \$5.42 | \$724 |
| SH LED Cobra Head 60W | 0 | \$0.67 | \$0 |
| SH LED Cobra Head 95W | 0 | \$1.08 | \$0 |
| SH LED Cobra Head 139W | 0 | \$1.56 | \$0 |
| SH LED Cobra Head 219W | 0 | \$2.45 | \$0 |
| Subtotal | 999 |  | \$3,274 |
| Generation, Jun-Nov |  |  |  |
| SH Sodium Vapor 100W | 24 | \$1.72 | \$41 |
| SH Sodium Vapor 150W | 68 | \$2.44 | \$166 |
| SH Sodium Vapor 200W | 946 | \$3.26 | \$3,086 |
| SH Sodium Vapor 400W | 160 | \$5.84 | \$936 |
| SH LED Cobra Head 60W | 0 | \$0.72 | \$0 |
| SH LED Cobra Head 95W | 0 | \$1.17 | \$0 |
| SH LED Cobra Head 139W | 0 | \$1.68 | \$0 |
| SH LED Cobra Head 219W | 0 | \$1.72 | \$0 |
| Subtotal | 1,199 |  | \$4,229 |
| Generation, Dec |  |  |  |
| SH Sodium Vapor 100W | 4 | \$2.44 | \$10 |
| SH Sodium Vapor 150W | 11 | \$3.26 | \$37 |
| SH Sodium Vapor 200W | 158 | \$5.84 | \$921 |
| SH Sodium Vapor 400W | 27 | \$0.72 | \$19 |
| SH LED Cobra Head 60W | 0 | \$1.17 | \$0 |
| SH LED Cobra Head 95W | 0 | \$1.68 | \$0 |
| SH LED Cobra Head 139W | 0 | \$2.64 | \$0 |
| SH LED Cobra Head 219W | 0 | \$1.00 | \$0 |
| Subtotal | 200 |  | \$987 |
| Subtotal Revenue |  |  | \$117,852 |
| Rider 10 - State Tax Adjustment |  | -0.0080\% | (\$9) |
| Rider 22 - Distribution System Improvement Charge |  | 5.00\% | \$5,468 |
| Total Calculated Revenue |  |  | \$123,311 |

Duquesne Light Company
Bill Frequency Current and Proposed Rates
12 Months Ending December 31, 2022
Rate SH - Street Lighting Highway


Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 1 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 43,408 | 43,408 | 0 | 0 | 0 |
| 2 | 1 | 1 | 5,011 | 48,419 | 5,031 | 5,031 | 5,928,351 |
| 3 | 2 | 2 | 5,980 | 54,399 | 12,009 | 17,040 | 11,851,720 |
| 4 | 3 | 3 | 5,491 | 59,890 | 16,540 | 33,580 | 17,769,127 |
| 5 | 4 | 4 | 6,120 | 66,010 | 24,580 | 58,160 | 23,681,076 |
| 6 | 5 | 5 | 5,786 | 71,796 | 29,048 | 87,208 | 29,586,923 |
| 7 | 6 | 6 | 5,153 | 76,949 | 31,044 | 118,252 | 35,486,992 |
| 8 | 7 | 7 | 4,778 | 81,727 | 33,582 | 151,834 | 41,381,918 |
| 9 | 8 | 8 | 4,838 | 86,565 | 38,862 | 190,696 | 47,272,088 |
| 10 | 9 | 9 | 4,576 | 91,141 | 41,352 | 232,048 | 53,157,430 |
| 11 | 10 | 10 | 4,225 | 95,366 | 42,422 | 274,470 | 59,038,200 |
| 12 | 11 | 11 | 4,245 | 99,611 | 46,885 | 321,356 | 64,914,764 |
| 13 | 12 | 12 | 4,199 | 103,810 | 50,593 | 371,949 | 70,787,097 |
| 14 | 13 | 13 | 4,069 | 107,879 | 53,113 | 425,062 | 76,655,242 |
| 15 | 14 | 14 | 3,879 | 111,758 | 54,527 | 479,589 | 82,519,323 |
| 16 | 15 | 15 | 3,794 | 115,552 | 57,142 | 536,731 | 88,379,536 |
| 17 | 16 | 16 | 3,603 | 119,155 | 57,883 | 594,614 | 94,235,958 |
| 18 | 17 | 17 | 3,576 | 122,731 | 61,040 | 655,654 | 100,088,790 |
| 19 | 18 | 18 | 3,646 | 126,377 | 65,896 | 721,549 | 105,938,065 |
| 20 | 19 | 19 | 3,512 | 129,889 | 67,000 | 788,549 | 111,783,699 |
| 21 | 20 | 20 | 3,638 | 133,527 | 73,057 | 861,606 | 117,625,846 |
| 22 | 21 | 21 | 3,529 | 137,056 | 74,411 | 936,017 | 123,464,360 |
| 23 | 22 | 22 | 3,536 | 140,592 | 78,109 | 1,014,126 | 129,299,360 |
| 24 | 23 | 23 | 3,537 | 144,129 | 81,683 | 1,095,808 | 135,130,838 |
| 25 | 24 | 24 | 3,604 | 147,733 | 86,849 | 1,182,657 | 140,958,801 |
| 26 | 25 | 25 | 3,664 | 151,397 | 91,973 | 1,274,630 | 146,783,180 |
| 27 | 26 | 26 | 3,482 | 154,879 | 90,901 | 1,365,531 | 152,603,891 |
| 28 | 27 | 27 | 3,456 | 158,335 | 93,692 | 1,459,224 | 158,421,132 |
| 29 | 28 | 28 | 3,638 | 161,973 | 102,279 | 1,561,503 | 164,234,951 |
| 30 | 29 | 29 | 3,532 | 165,505 | 102,846 | 1,664,348 | 170,045,134 |
| 31 | 30 | 30 | 3,384 | 168,889 | 101,934 | 1,766,282 | 175,851,782 |
| 32 | 31 | 31 | 3,429 | 172,318 | 106,732 | 1,873,015 | 181,655,066 |
| 33 | 32 | 32 | 3,388 | 175,706 | 108,858 | 1,981,872 | 187,454,928 |
| 34 | 33 | 33 | 3,570 | 179,276 | 118,290 | 2,100,163 | 193,251,442 |
| 35 | 34 | 34 | 3,556 | 182,832 | 121,397 | 2,221,559 | 199,044,397 |
| 36 | 35 | 35 | 3,497 | 186,329 | 122,894 | 2,344,453 | 204,833,803 |
| 37 | 36 | 36 | 3,484 | 189,813 | 125,935 | 2,470,389 | 210,619,725 |
| 38 | 37 | 37 | 3,540 | 193,353 | 131,514 | 2,601,902 | 216,402,184 |
| 39 | 38 | 38 | 3,467 | 196,820 | 132,283 | 2,734,185 | 222,181,107 |
| 40 | 39 | 39 | 3,491 | 200,311 | 136,704 | 2,870,889 | 227,956,581 |
| 41 | 40 | 40 | 3,422 | 203,733 | 137,438 | 3,008,327 | 233,728,567 |
| 42 | 41 | 41 | 3,464 | 207,197 | 142,603 | 3,150,930 | 239,497,152 |
| 43 | 42 | 42 | 3,535 | 210,732 | 149,075 | 3,300,005 | 245,262,299 |
| 44 | 43 | 43 | 3,365 | 214,097 | 145,285 | 3,445,290 | 251,023,896 |
| 45 | 44 | 44 | 3,594 | 217,691 | 158,781 | 3,604,071 | 256,782,183 |
| 46 | 45 | 45 | 3,486 | 221,177 | 157,509 | 3,761,580 | 262,536,870 |
| 47 | 46 | 46 | 3,476 | 224,653 | 160,548 | 3,922,128 | 268,288,084 |
| 48 | 47 | 47 | 3,461 | 228,114 | 163,330 | 4,085,458 | 274,035,833 |
| 49 | 48 | 48 | 3,472 | 231,586 | 167,335 | 4,252,793 | 279,780,137 |

Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 2 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 50 | 49 | 49 | 3,492 | 235,078 | 171,805 | 4,424,599 | 285,520,988 |
| 51 | 50 | 50 | 3,495 | 238,573 | 175,462 | 4,600,061 | 291,258,361 |
| 52 | 51 | 55 | 16,575 | 255,148 | 935,306 | 5,535,367 | 319,947,872 |
| 53 | 56 | 60 | 16,615 | 271,763 | 1,025,896 | 6,561,262 | 348,559,822 |
| 54 | 61 | 65 | 16,924 | 288,687 | 1,133,897 | 7,695,160 | 377,093,540 |
| 55 | 66 | 70 | 17,440 | 306,127 | 1,259,081 | 8,954,241 | 405,547,081 |
| 56 | 71 | 75 | 17,504 | 323,631 | 1,356,626 | 10,310,867 | 433,918,967 |
| 57 | 76 | 80 | 17,767 | 341,398 | 1,469,812 | 11,780,679 | 462,207,959 |
| 58 | 81 | 85 | 18,610 | 360,008 | 1,634,372 | 13,415,050 | 490,412,185 |
| 59 | 86 | 90 | 18,744 | 378,752 | 1,744,619 | 15,159,670 | 518,528,500 |
| 60 | 91 | 95 | 19,103 | 397,855 | 1,877,456 | 17,037,125 | 546,556,105 |
| 61 | 96 | 100 | 19,565 | 417,420 | 2,023,905 | 19,061,030 | 574,492,930 |
| 62 | 101 | 105 | 20,134 | 437,554 | 2,185,857 | 21,246,888 | 602,336,313 |
| 63 | 106 | 110 | 20,723 | 458,277 | 2,356,447 | 23,603,335 | 630,084,155 |
| 64 | 111 | 115 | 20,905 | 479,182 | 2,485,688 | 26,089,022 | 657,733,077 |
| 65 | 116 | 120 | 21,774 | 500,956 | 2,698,300 | 28,787,322 | 685,281,282 |
| 66 | 121 | 125 | 22,402 | 523,358 | 2,890,695 | 31,678,017 | 712,725,642 |
| 67 | 126 | 130 | 22,834 | 546,192 | 3,063,030 | 34,741,047 | 740,062,157 |
| 68 | 131 | 135 | 23,428 | 569,620 | 3,262,647 | 38,003,694 | 767,289,759 |
| 69 | 136 | 140 | 23,973 | 593,593 | 3,460,618 | 41,464,313 | 794,404,753 |
| 70 | 141 | 145 | 24,962 | 618,555 | 3,727,630 | 45,191,943 | 821,403,623 |
| 71 | 146 | 150 | 25,395 | 643,950 | 3,922,404 | 49,114,347 | 848,282,697 |
| 72 | 151 | 155 | 25,475 | 669,425 | 4,067,589 | 53,181,936 | 875,040,606 |
| 73 | 156 | 160 | 26,123 | 695,548 | 4,302,876 | 57,484,812 | 901,675,372 |
| 74 | 161 | 165 | 26,702 | 722,250 | 4,533,580 | 62,018,392 | 928,184,077 |
| 75 | 166 | 170 | 27,516 | 749,766 | 4,810,546 | 66,828,938 | 954,564,348 |
| 76 | 171 | 175 | 27,751 | 777,517 | 4,994,150 | 71,823,088 | 980,811,938 |
| 77 | 176 | 180 | 28,133 | 805,650 | 5,206,897 | 77,029,986 | 1,006,926,006 |
| 78 | 181 | 185 | 28,818 | 834,468 | 5,479,322 | 82,509,308 | 1,032,904,443 |
| 79 | 186 | 190 | 29,171 | 863,639 | 5,695,409 | 88,204,716 | 1,058,743,716 |
| 80 | 191 | 195 | 29,941 | 893,580 | 5,995,748 | 94,200,464 | 1,084,441,469 |
| 81 | 196 | 200 | 30,164 | 923,744 | 6,195,870 | 100,396,334 | 1,109,995,334 |
| 82 | 201 | 225 | 162,331 | 1,086,075 | 34,950,451 | 135,346,786 | 1,234,621,186 |
| 83 | 226 | 250 | 170,560 | 1,256,635 | 41,015,063 | 176,361,849 | 1,355,137,849 |
| 84 | 251 | 275 | 177,063 | 1,433,698 | 47,033,843 | 223,395,692 | 1,471,356,967 |
| 85 | 276 | 300 | 181,668 | 1,615,366 | 53,119,559 | 276,515,251 | 1,583,427,151 |
| 86 | 301 | 325 | 184,194 | 1,799,560 | 58,519,617 | 335,034,867 | 1,690,993,042 |
| 87 | 326 | 350 | 185,123 | 1,984,683 | 63,503,265 | 398,538,132 | 1,794,007,732 |
| 88 | 351 | 375 | 183,098 | 2,167,781 | 67,463,454 | 466,001,586 | 1,892,485,836 |
| 89 | 376 | 400 | 181,213 | 2,348,994 | 71,369,865 | 537,371,452 | 1,986,469,452 |
| 90 | 401 | 425 | 177,589 | 2,526,583 | 74,464,532 | 611,835,984 | 2,076,027,284 |
| 91 | 426 | 450 | 171,156 | 2,697,739 | 76,144,113 | 687,980,097 | 2,161,280,097 |
| 92 | 451 | 475 | 165,590 | 2,863,329 | 77,899,287 | 765,879,384 | 2,242,374,134 |
| 93 | 476 | 500 | 158,415 | 3,021,744 | 78,590,178 | 844,469,563 | 2,319,467,063 |
| 94 | 501 | 525 | 151,995 | 3,173,739 | 79,307,364 | 923,776,926 | 2,392,726,926 |
| 95 | 526 | 550 | 145,218 | 3,318,957 | 79,512,306 | 1,003,289,232 | 2,462,319,332 |
| 96 | 551 | 575 | 137,107 | 3,456,064 | 78,620,289 | 1,081,909,521 | 2,528,422,646 |
| 97 | 576 | 600 | 131,291 | 3,587,355 | 78,678,006 | 1,160,587,527 | 2,591,217,927 |
| 98 | 601 | 625 | 123,807 | 3,711,162 | 77,420,131 | 1,238,007,658 | 2,650,868,283 |

Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 3 of 7
Sponsor: D. B. Ogden
\(\left.$$
\begin{array}{|r|r|r|r|r|r|r|}\hline \text { kWh Step } & \begin{array}{r}\text { Start Range } \\
\text { (kWh }\end{array} & \begin{array}{c}\text { End Range } \\
\text { (kWh) }\end{array} & \begin{array}{c}\text { Number Of } \\
\text { Bills }\end{array} & \begin{array}{c}\text { Cumulative } \\
\text { Number of Bills }\end{array} & \begin{array}{c}\text { Total Usage } \\
\text { (kWh) }\end{array} & \begin{array}{c}\text { Cumulative Usage } \\
\text { (kWh) }\end{array}
$$ <br>
\hline 99 \& 626 \& 650 \& 117,100 \& 3,828,262 \& 76,280,784 \& 1,314,288,442 <br>

Consolidation Factor\end{array}\right]\)| $2,707,548,492$ |
| :--- |
| 100 |

Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 4 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 148 | 4,401 | 4,500 | 444 | 5,966,885 | 1,983,848 | 3,739,736,518 | 3,761,579,518 |
| 149 | 4,501 | 4,600 | 343 | 5,967,228 | 1,566,741 | 3,741,303,259 | 3,762,053,859 |
| 150 | 4,601 | 4,700 | 341 | 5,967,569 | 1,592,249 | 3,742,895,508 | 3,762,494,508 |
| 151 | 4,701 | 4,800 | 343 | 5,967,912 | 1,636,623 | 3,744,532,131 | 3,762,901,731 |
| 152 | 4,801 | 4,900 | 297 | 5,968,209 | 1,446,552 | 3,745,978,683 | 3,763,275,683 |
| 153 | 4,901 | 5,000 | 255 | 5,968,464 | 1,266,869 | 3,747,245,552 | 3,763,620,552 |
| 154 | 5,001 | 5,100 | 242 | 5,968,706 | 1,227,332 | 3,748,472,885 | 3,763,941,185 |
| 155 | 5,101 | 5,200 | 215 | 5,968,921 | 1,111,989 | 3,749,584,874 | 3,764,238,474 |
| 156 | 5,201 | 5,300 | 206 | 5,969,127 | 1,086,202 | 3,750,671,076 | 3,764,514,676 |
| 157 | 5,301 | 5,400 | 191 | 5,969,318 | 1,026,432 | 3,751,697,508 | 3,764,770,908 |
| 158 | 5,401 | 5,500 | 176 | 5,969,494 | 963,011 | 3,752,660,519 | 3,765,008,019 |
| 159 | 5,501 | 5,600 | 145 | 5,969,639 | 807,836 | 3,753,468,356 | 3,765,228,356 |
| 160 | 5,601 | 5,700 | 111 | 5,969,750 | 629,614 | 3,754,097,970 | 3,765,435,270 |
| 161 | 5,701 | 5,800 | 123 | 5,969,873 | 710,332 | 3,754,808,301 | 3,765,631,101 |
| 162 | 5,801 | 5,900 | 94 | 5,969,967 | 552,268 | 3,755,360,569 | 3,765,815,369 |
| 163 | 5,901 | 6,000 | 107 | 5,970,074 | 638,917 | 3,755,999,486 | 3,765,989,486 |
| 164 | 6,001 | 6,100 | 88 | 5,970,162 | 534,789 | 3,756,534,275 | 3,766,153,975 |
| 165 | 6,101 | 6,200 | 79 | 5,970,241 | 487,539 | 3,757,021,814 | 3,766,309,414 |
| 166 | 6,201 | 6,300 | 73 | 5,970,314 | 458,440 | 3,757,480,254 | 3,766,457,754 |
| 167 | 6,301 | 6,400 | 89 | 5,970,403 | 567,348 | 3,758,047,602 | 3,766,598,002 |
| 168 | 6,401 | 6,500 | 78 | 5,970,481 | 505,258 | 3,758,552,860 | 3,766,729,860 |
| 169 | 6,501 | 6,600 | 64 | 5,970,545 | 420,669 | 3,758,973,529 | 3,766,853,929 |
| 170 | 6,601 | 6,700 | 58 | 5,970,603 | 387,457 | 3,759,360,986 | 3,766,972,186 |
| 171 | 6,701 | 6,800 | 57 | 5,970,660 | 386,080 | 3,759,747,066 | 3,767,084,266 |
| 172 | 6,801 | 6,900 | 49 | 5,970,709 | 337,000 | 3,760,084,066 | 3,767,191,066 |
| 173 | 6,901 | 7,000 | 64 | 5,970,773 | 446,818 | 3,760,530,884 | 3,767,292,884 |
| 174 | 7,001 | 7,100 | 36 | 5,970,809 | 254,760 | 3,760,785,644 | 3,767,388,644 |
| 175 | 7,101 | 7,200 | 30 | 5,970,839 | 215,736 | 3,761,001,380 | 3,767,481,380 |
| 176 | 7,201 | 7,300 | 33 | 5,970,872 | 240,578 | 3,761,241,958 | 3,767,571,058 |
| 177 | 7,301 | 7,400 | 36 | 5,970,908 | 265,613 | 3,761,507,571 | 3,767,656,971 |
| 178 | 7,401 | 7,500 | 31 | 5,970,939 | 231,818 | 3,761,739,389 | 3,767,739,389 |
| 179 | 7,501 | 7,600 | 43 | 5,970,982 | 325,874 | 3,762,065,263 | 3,767,818,463 |
| 180 | 7,601 | 7,700 | 39 | 5,971,021 | 299,795 | 3,762,365,058 | 3,767,893,658 |
| 181 | 7,701 | 7,800 | 34 | 5,971,055 | 264,340 | 3,762,629,398 | 3,767,964,598 |
| 182 | 7,801 | 7,900 | 36 | 5,971,091 | 283,983 | 3,762,913,381 | 3,768,032,581 |
| 183 | 7,901 | 8,000 | 29 | 5,971,120 | 231,482 | 3,763,144,863 | 3,768,096,863 |
| 184 | 8,001 | 8,100 | 19 | 5,971,139 | 153,708 | 3,763,298,571 | 3,768,158,571 |
| 185 | 8,101 | 8,200 | 19 | 5,971,158 | 155,600 | 3,763,454,170 | 3,768,218,370 |
| 186 | 8,201 | 8,300 | 14 | 5,971,172 | 115,976 | 3,763,570,146 | 3,768,276,246 |
| 187 | 8,301 | 8,400 | 11 | 5,971,183 | 92,156 | 3,763,662,302 | 3,768,332,702 |
| 188 | 8,401 | 8,500 | 18 | 5,971,201 | 152,898 | 3,763,815,200 | 3,768,388,200 |
| 189 | 8,501 | 8,600 | 20 | 5,971,221 | 171,588 | 3,763,986,787 | 3,768,441,587 |
| 190 | 8,601 | 8,700 | 19 | 5,971,240 | 164,921 | 3,764,151,709 | 3,768,493,009 |
| 191 | 8,701 | 8,800 | 18 | 5,971,258 | 158,110 | 3,764,309,819 | 3,768,542,619 |
| 192 | 8,801 | 8,900 | 23 | 5,971,281 | 204,380 | 3,764,514,198 | 3,768,590,398 |
| 193 | 8,901 | 9,000 | 23 | 5,971,304 | 206,780 | 3,764,720,979 | 3,768,635,979 |
| 194 | 9,001 | 9,100 | 16 | 5,971,320 | 145,405 | 3,764,866,384 | 3,768,679,284 |
| 195 | 9,101 | 9,200 | 21 | 5,971,341 | 193,171 | 3,765,059,555 | 3,768,721,155 |
| 196 | 9,201 | 9,300 | 13 | 5,971,354 | 120,839 | 3,765,180,394 | 3,768,760,894 |

Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 5 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 197 | 9,301 | 9,400 | 12 | 5,971,366 | 112,673 | 3,765,293,067 | 3,768,799,267 |
| 198 | 9,401 | 9,500 | 15 | 5,971,381 | 142,451 | 3,765,435,518 | 3,768,836,518 |
| 199 | 9,501 | 9,600 | 11 | 5,971,392 | 105,602 | 3,765,541,120 | 3,768,872,320 |
| 200 | 9,601 | 9,700 | 11 | 5,971,403 | 106,738 | 3,765,647,858 | 3,768,907,058 |
| 201 | 9,701 | 9,800 | 11 | 5,971,414 | 107,626 | 3,765,755,484 | 3,768,940,484 |
| 202 | 9,801 | 9,900 | 14 | 5,971,428 | 138,422 | 3,765,893,906 | 3,768,972,806 |
| 203 | 9,901 | 10,000 | 8 | 5,971,436 | 79,701 | 3,765,973,607 | 3,769,003,607 |
| 204 | 10,001 | 10,100 | 8 | 5,971,444 | 80,738 | 3,766,054,345 | 3,769,033,845 |
| 205 | 10,101 | 10,200 | 5 | 5,971,449 | 51,038 | 3,766,105,383 | 3,769,063,383 |
| 206 | 10,201 | 10,300 | 8 | 5,971,457 | 82,298 | 3,766,187,681 | 3,769,092,281 |
| 207 | 10,301 | 10,400 | 12 | 5,971,469 | 124,681 | 3,766,312,362 | 3,769,120,362 |
| 208 | 10,401 | 10,500 | 16 | 5,971,485 | 167,910 | 3,766,480,272 | 3,769,147,272 |
| 209 | 10,501 | 10,600 | 12 | 5,971,497 | 127,185 | 3,766,607,457 | 3,769,172,657 |
| 210 | 10,601 | 10,700 | 8 | 5,971,505 | 85,414 | 3,766,692,871 | 3,769,196,671 |
| 211 | 10,701 | 10,800 | 4 | 5,971,509 | 43,136 | 3,766,736,007 | 3,769,220,007 |
| 212 | 10,801 | 10,900 | 8 | 5,971,517 | 87,119 | 3,766,823,125 | 3,769,242,925 |
| 213 | 10,901 | 11,000 | 8 | 5,971,525 | 87,900 | 3,766,911,025 | 3,769,265,025 |
| 214 | 11,001 | 11,100 | 10 | 5,971,535 | 110,970 | 3,767,021,996 | 3,769,286,396 |
| 215 | 11,101 | 11,200 | 2 | 5,971,537 | 22,372 | 3,767,044,368 | 3,769,306,768 |
| 216 | 11,201 | 11,300 | 11 | 5,971,548 | 124,201 | 3,767,168,569 | 3,769,326,869 |
| 217 | 11,301 | 11,400 | 8 | 5,971,556 | 91,125 | 3,767,259,694 | 3,769,345,894 |
| 218 | 11,401 | 11,500 | 4 | 5,971,560 | 45,899 | 3,767,305,593 | 3,769,364,093 |
| 219 | 11,501 | 11,600 | 2 | 5,971,562 | 23,201 | 3,767,328,794 | 3,769,381,994 |
| 220 | 11,601 | 11,700 | 6 | 5,971,568 | 70,134 | 3,767,398,928 | 3,769,399,628 |
| 221 | 11,701 | 11,800 | 5 | 5,971,573 | 59,169 | 3,767,458,097 | 3,769,416,897 |
| 222 | 11,801 | 11,900 | 6 | 5,971,579 | 71,422 | 3,767,529,519 | 3,769,433,519 |
| 223 | 11,901 | 12,000 | 6 | 5,971,585 | 71,900 | 3,767,601,419 | 3,769,449,419 |
| 224 | 12,001 | 12,100 | 6 | 5,971,591 | 72,532 | 3,767,673,951 | 3,769,464,751 |
| 225 | 12,101 | 12,200 | 4 | 5,971,595 | 48,810 | 3,767,722,762 | 3,769,479,562 |
| 226 | 12,201 | 12,300 | 4 | 5,971,599 | 49,197 | 3,767,771,958 | 3,769,493,958 |
| 227 | 12,301 | 12,400 | 4 | 5,971,603 | 49,528 | 3,767,821,486 | 3,769,507,886 |
| 228 | 12,401 | 12,500 | 2 | 5,971,605 | 25,017 | 3,767,846,503 | 3,769,521,503 |
| 229 | 12,501 | 12,600 | 5 | 5,971,610 | 63,030 | 3,767,909,533 | 3,769,534,933 |
| 230 | 12,601 | 12,700 | 3 | 5,971,613 | 38,098 | 3,767,947,630 | 3,769,547,830 |
| 231 | 12,701 | 12,800 | 3 | 5,971,616 | 38,398 | 3,767,986,028 | 3,769,560,428 |
| 232 | 12,801 | 12,900 | 6 | 5,971,622 | 77,429 | 3,768,063,458 | 3,769,572,758 |
| 233 | 12,901 | 13,000 | 2 | 5,971,624 | 26,002 | 3,768,089,459 | 3,769,584,459 |
| 234 | 13,001 | 13,100 | 2 | 5,971,626 | 26,202 | 3,768,115,662 | 3,769,595,962 |
| 235 | 13,101 | 13,200 | 1 | 5,971,627 | 13,238 | 3,768,128,899 | 3,769,607,299 |
| 236 | 13,201 | 13,300 | 3 | 5,971,630 | 39,956 | 3,768,168,855 | 3,769,618,555 |
| 237 | 13,301 | 13,400 | 1 | 5,971,631 | 13,413 | 3,768,182,269 | 3,769,629,469 |
| 238 | 13,401 | 13,500 | 2 | 5,971,633 | 27,031 | 3,768,209,300 | 3,769,640,300 |
| 239 | 13,501 | 13,600 | 3 | 5,971,636 | 40,788 | 3,768,250,087 | 3,769,650,887 |
| 240 | 13,701 | 13,800 | 1 | 5,971,637 | 13,809 | 3,768,263,896 | 3,769,671,496 |
| 241 | 13,801 | 13,900 | 3 | 5,971,640 | 41,670 | 3,768,305,566 | 3,769,681,666 |
| 242 | 13,901 | 14,000 | 3 | 5,971,643 | 42,049 | 3,768,347,615 | 3,769,691,615 |
| 243 | 14,001 | 14,100 | 2 | 5,971,645 | 28,222 | 3,768,375,837 | 3,769,701,237 |
| 244 | 14,101 | 14,200 | 1 | 5,971,646 | 14,216 | 3,768,390,052 | 3,769,710,652 |
| 245 | 14,201 | 14,300 | 1 | 5,971,647 | 14,281 | 3,768,404,333 | 3,769,719,933 |

Duquesne Light Company
Bill Frequency Distribution
Rate RS - 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 1 of 13
Page 6 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 246 | 14,301 | 14,400 | 2 | 5,971,649 | 28,777 | 3,768,433,110 | 3,769,729,110 |
| 247 | 14,401 | 14,500 | 1 | 5,971,650 | 14,505 | 3,768,447,615 | 3,769,738,115 |
| 248 | 14,501 | 14,600 | 3 | 5,971,653 | 43,820 | 3,768,491,435 | 3,769,747,035 |
| 249 | 14,601 | 14,700 | 1 | 5,971,654 | 14,742 | 3,768,506,177 | 3,769,755,677 |
| 250 | 14,801 | 14,900 | 1 | 5,971,655 | 14,931 | 3,768,521,107 | 3,769,772,707 |
| 251 | 14,901 | 15,000 | 1 | 5,971,656 | 15,048 | 3,768,536,156 | 3,769,781,156 |
| 252 | 15,001 | 15,100 | 1 | 5,971,657 | 15,076 | 3,768,551,232 | 3,769,789,432 |
| 253 | 15,101 | 15,200 | 1 | 5,971,658 | 15,243 | 3,768,566,475 | 3,769,797,675 |
| 254 | 15,201 | 15,300 | 1 | 5,971,659 | 15,284 | 3,768,581,759 | 3,769,805,759 |
| 255 | 15,301 | 15,400 | 1 | 5,971,660 | 15,456 | 3,768,597,214 | 3,769,813,814 |
| 256 | 15,501 | 15,600 | 1 | 5,971,661 | 15,630 | 3,768,612,845 | 3,769,829,645 |
| 257 | 15,601 | 15,700 | 3 | 5,971,664 | 47,100 | 3,768,659,945 | 3,769,837,445 |
| 258 | 15,701 | 15,800 | 1 | 5,971,665 | 15,829 | 3,768,675,774 | 3,769,844,974 |
| 259 | 15,901 | 16,000 | 5 | 5,971,670 | 80,015 | 3,768,755,789 | 3,769,859,789 |
| 260 | 16,001 | 16,100 | 2 | 5,971,672 | 32,277 | 3,768,788,066 | 3,769,866,766 |
| 261 | 16,101 | 16,200 | 2 | 5,971,674 | 32,440 | 3,768,820,506 | 3,769,873,506 |
| 262 | 16,201 | 16,300 | 2 | 5,971,676 | 32,629 | 3,768,853,135 | 3,769,880,035 |
| 263 | 16,301 | 16,400 | 2 | 5,971,678 | 32,820 | 3,768,885,956 | 3,769,886,356 |
| 264 | 16,401 | 16,500 | 2 | 5,971,680 | 33,025 | 3,768,918,981 | 3,769,892,481 |
| 265 | 16,501 | 16,600 | 3 | 5,971,683 | 49,888 | 3,768,968,868 | 3,769,898,468 |
| 266 | 16,601 | 16,700 | 2 | 5,971,685 | 33,421 | 3,769,002,289 | 3,769,904,089 |
| 267 | 16,801 | 16,900 | 2 | 5,971,687 | 33,875 | 3,769,036,163 | 3,769,914,963 |
| 268 | 17,001 | 17,100 | 1 | 5,971,688 | 17,122 | 3,769,053,285 | 3,769,925,385 |
| 269 | 17,301 | 17,400 | 2 | 5,971,690 | 34,884 | 3,769,088,168 | 3,769,940,768 |
| 270 | 17,401 | 17,500 | 1 | 5,971,691 | 17,531 | 3,769,105,700 | 3,769,945,700 |
| 271 | 17,601 | 17,700 | 2 | 5,971,693 | 35,396 | 3,769,141,095 | 3,769,955,295 |
| 272 | 17,701 | 17,800 | 1 | 5,971,694 | 17,773 | 3,769,158,868 | 3,769,959,868 |
| 273 | 17,901 | 18,000 | 1 | 5,971,695 | 18,024 | 3,769,176,893 | 3,769,968,893 |
| 274 | 18,001 | 18,100 | 1 | 5,971,696 | 18,138 | 3,769,195,030 | 3,769,973,330 |
| 275 | 18,201 | 18,300 | 1 | 5,971,697 | 18,300 | 3,769,213,331 | 3,769,981,931 |
| 276 | 18,301 | 18,400 | 2 | 5,971,699 | 36,901 | 3,769,250,231 | 3,769,986,231 |
| 277 | 18,501 | 18,600 | 2 | 5,971,701 | 37,286 | 3,769,287,518 | 3,769,994,318 |
| 278 | 19,401 | 19,500 | 1 | 5,971,702 | 19,563 | 3,769,307,081 | 3,770,028,581 |
| 279 | 19,601 | 19,700 | 1 | 5,971,703 | 19,706 | 3,769,326,787 | 3,770,035,987 |
| 280 | 19,701 | 19,800 | 1 | 5,971,704 | 19,808 | 3,769,346,596 | 3,770,039,596 |
| 281 | 20,401 | 20,500 | 1 | 5,971,705 | 20,584 | 3,769,367,179 | 3,770,064,179 |
| 282 | 20,701 | 20,800 | 1 | 5,971,706 | 20,790 | 3,769,387,969 | 3,770,074,369 |
| 283 | 20,801 | 20,900 | 1 | 5,971,707 | 20,918 | 3,769,408,887 | 3,770,077,687 |
| 284 | 21,001 | 21,100 | 1 | 5,971,708 | 21,173 | 3,769,430,060 | 3,770,084,160 |
| 285 | 22,501 | 22,600 | 1 | 5,971,709 | 22,657 | 3,769,452,717 | 3,770,130,717 |
| 286 | 22,901 | 23,000 | 1 | 5,971,710 | 23,079 | 3,769,475,796 | 3,770,142,796 |
| 287 | 24,701 | 24,800 | 1 | 5,971,711 | 24,807 | 3,769,500,603 | 3,770,195,003 |
| 288 | 27,801 | 27,900 | 2 | 5,971,713 | 55,840 | 3,769,556,442 | 3,770,281,842 |
| 289 | 28,401 | 28,500 | 1 | 5,971,714 | 28,598 | 3,769,585,040 | 3,770,297,540 |
| 290 | 30,001 | 30,100 | 1 | 5,971,715 | 30,148 | 3,769,615,189 | 3,770,337,589 |
| 291 | 30,301 | 30,400 | 1 | 5,971,716 | 30,505 | 3,769,645,694 | 3,770,344,894 |
| 292 | 33,101 | 33,200 | 1 | 5,971,717 | 33,330 | 3,769,679,024 | 3,770,409,424 |
| 293 | 34,201 | 34,300 | 1 | 5,971,718 | 34,370 | 3,769,713,394 | 3,770,433,694 |
| 294 | 34,901 | 35,000 | 1 | 5,971,719 | 35,108 | 3,769,748,501 | 3,770,448,501 |


| kWh Step | Start Range (kWh) | End Range <br> (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 295 | 35,001 | 35,100 | 1 | 5,971,720 | 35,211 | 3,769,783,712 | 3,770,450,612 |
| 296 | 35,701 | 35,800 | 1 | 5,971,721 | 35,916 | 3,769,819,628 | 3,770,464,028 |
| 297 | 37,801 | 37,900 | 1 | 5,971,722 | 37,992 | 3,769,857,620 | 3,770,501,920 |
| 298 | 38,001 | 38,100 | 1 | 5,971,723 | 38,222 | 3,769,895,842 | 3,770,505,442 |
| 299 | 38,601 | 38,700 | 1 | 5,971,724 | 38,823 | 3,769,934,665 | 3,770,515,165 |
| 300 | 38,901 | 39,000 | 1 | 5,971,725 | 39,100 | 3,769,973,765 | 3,770,519,765 |
| 301 | 40,001 | 40,100 | 1 | 5,971,726 | 40,216 | 3,770,013,981 | 3,770,535,281 |
| 302 | 40,401 | 40,500 | 1 | 5,971,727 | 40,573 | 3,770,054,553 | 3,770,540,553 |
| 303 | 40,501 | 40,600 | 1 | 5,971,728 | 40,713 | 3,770,095,267 | 3,770,541,867 |
| 304 | 41,301 | 41,400 | 1 | 5,971,729 | 41,509 | 3,770,136,775 | 3,770,550,775 |
| 305 | 41,501 | 41,600 | 1 | 5,971,730 | 41,720 | 3,770,178,496 | 3,770,552,896 |
| 306 | 41,801 | 41,900 | 1 | 5,971,731 | 41,981 | 3,770,220,477 | 3,770,555,677 |
| 307 | 44,401 | 44,500 | 1 | 5,971,732 | 44,582 | 3,770,265,059 | 3,770,576,559 |
| 308 | 44,501 | 44,600 | 1 | 5,971,733 | 44,724 | 3,770,309,783 | 3,770,577,383 |
| 309 | 45,801 | 45,900 | 1 | 5,971,734 | 46,076 | 3,770,355,859 | 3,770,585,359 |
| 310 | 48,801 | 48,900 | 1 | 5,971,735 | 49,081 | 3,770,404,940 | 3,770,600,540 |
| 311 | 49,501 | 49,600 | 1 | 5,971,736 | 49,772 | 3,770,454,712 | 3,770,603,512 |
| 312 | 50,101 | 50,200 | 1 | 5,971,737 | 50,357 | 3,770,505,069 | 3,770,605,469 |
| 313 | 51,701 | 51,800 | 1 | 5,971,738 | 51,997 | 3,770,557,066 | 3,770,608,866 |
| 314 | 55,301 | 55,400 | 1 | 5,971,739 | 55,611 | 3,770,612,677 | 3,770,612,677 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 2,925 | 2,925 | 0 | 0 | 0 |
| 2 | 1 | 1 | 308 | 3,233 | 308 | 308 | 451,235 |
| 3 | 2 | 2 | 319 | 3,552 | 638 | 945 | 902,161 |
| 4 | 3 | 3 | 305 | 3,857 | 914 | 1,860 | 1,352,769 |
| 5 | 4 | 4 | 286 | 4,143 | 1,143 | 3,003 | 1,803,071 |
| 6 | 5 | 5 | 264 | 4,407 | 1,319 | 4,322 | 2,253,087 |
| 7 | 6 | 6 | 287 | 4,694 | 1,721 | 6,042 | 2,702,838 |
| 8 | 7 | 7 | 293 | 4,987 | 2,049 | 8,092 | 3,152,303 |
| 9 | 8 | 8 | 256 | 5,243 | 2,046 | 10,138 | 3,601,474 |
| 10 | 9 | 9 | 204 | 5,447 | 1,835 | 11,973 | 4,050,390 |
| 11 | 10 | 10 | 219 | 5,666 | 2,188 | 14,161 | 4,499,101 |
| 12 | 11 | 11 | 201 | 5,867 | 2,209 | 16,371 | 4,947,594 |
| 13 | 12 | 12 | 251 | 6,118 | 3,010 | 19,380 | 5,395,884 |
| 14 | 13 | 13 | 257 | 6,375 | 3,338 | 22,719 | 5,843,924 |
| 15 | 14 | 14 | 229 | 6,604 | 3,204 | 25,922 | 6,291,706 |
| 16 | 15 | 15 | 276 | 6,880 | 4,137 | 30,059 | 6,739,259 |
| 17 | 16 | 16 | 258 | 7,138 | 4,125 | 34,184 | 7,186,536 |
| 18 | 17 | 17 | 227 | 7,365 | 3,856 | 38,040 | 7,633,555 |
| 19 | 18 | 18 | 243 | 7,608 | 4,371 | 42,411 | 8,080,347 |
| 20 | 19 | 19 | 236 | 7,844 | 4,481 | 46,891 | 8,526,895 |
| 21 | 20 | 20 | 239 | 8,083 | 4,776 | 51,668 | 8,973,208 |
| 22 | 21 | 21 | 246 | 8,329 | 5,162 | 56,830 | 9,419,281 |
| 23 | 22 | 22 | 234 | 8,563 | 5,144 | 61,974 | 9,865,108 |
| 24 | 23 | 23 | 248 | 8,811 | 5,700 | 67,674 | 10,310,701 |
| 25 | 24 | 24 | 267 | 9,078 | 6,403 | 74,077 | 10,756,045 |
| 26 | 25 | 25 | 243 | 9,321 | 6,070 | 80,147 | 11,201,122 |
| 27 | 26 | 26 | 258 | 9,579 | 6,703 | 86,850 | 11,645,956 |
| 28 | 27 | 27 | 255 | 9,834 | 6,880 | 93,730 | 12,090,532 |
| 29 | 28 | 28 | 246 | 10,080 | 6,883 | 100,613 | 12,534,853 |
| 30 | 29 | 29 | 244 | 10,324 | 7,071 | 107,683 | 12,978,927 |
| 31 | 30 | 30 | 229 | 10,553 | 6,865 | 114,548 | 13,422,758 |
| 32 | 31 | 31 | 252 | 10,805 | 7,806 | 122,354 | 13,866,359 |
| 33 | 32 | 32 | 256 | 11,061 | 8,186 | 130,540 | 14,309,708 |
| 34 | 33 | 33 | 271 | 11,332 | 8,936 | 139,476 | 14,752,800 |
| 35 | 34 | 34 | 284 | 11,616 | 9,649 | 149,125 | 15,195,621 |
| 36 | 35 | 35 | 269 | 11,885 | 9,408 | 158,533 | 15,638,158 |
| 37 | 36 | 36 | 301 | 12,186 | 10,828 | 169,360 | 16,080,424 |
| 38 | 37 | 37 | 276 | 12,462 | 10,204 | 179,565 | 16,522,391 |
| 39 | 38 | 38 | 306 | 12,768 | 11,619 | 191,184 | 16,964,080 |
| 40 | 39 | 39 | 274 | 13,042 | 10,678 | 201,862 | 17,405,464 |
| 41 | 40 | 40 | 292 | 13,334 | 11,671 | 213,533 | 17,846,573 |
| 42 | 41 | 41 | 289 | 13,623 | 11,840 | 225,373 | 18,287,390 |
| 43 | 42 | 42 | 252 | 13,875 | 10,576 | 235,949 | 18,727,919 |
| 44 | 43 | 43 | 301 | 14,176 | 12,933 | 248,882 | 19,168,194 |
| 45 | 44 | 44 | 256 | 14,432 | 11,255 | 260,138 | 19,608,170 |
| 46 | 45 | 45 | 275 | 14,707 | 12,366 | 272,503 | 20,047,888 |
| 47 | 46 | 46 | 302 | 15,009 | 13,881 | 286,385 | 20,487,331 |
| 48 | 47 | 47 | 302 | 15,311 | 14,183 | 300,568 | 20,926,471 |
| 49 | 48 | 48 | 296 | 15,607 | 14,197 | 314,765 | 21,365,309 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 50 | 49 | 49 | 268 | 15,875 | 13,122 | 327,887 | 21,803,852 |
| 51 | 50 | 50 | 299 | 16,174 | 14,939 | 342,826 | 22,242,126 |
| 52 | 51 | 55 | 1,545 | 17,719 | 81,883 | 424,709 | 24,428,964 |
| 53 | 56 | 60 | 1,468 | 19,187 | 85,039 | 509,748 | 26,608,128 |
| 54 | 61 | 65 | 1,478 | 20,665 | 93,189 | 602,937 | 28,780,112 |
| 55 | 66 | 70 | 1,584 | 22,249 | 107,634 | 710,572 | 30,944,342 |
| 56 | 71 | 75 | 1,618 | 23,867 | 118,002 | 828,574 | 33,100,549 |
| 57 | 76 | 80 | 1,628 | 25,495 | 126,802 | 955,376 | 35,248,576 |
| 58 | 81 | 85 | 1,641 | 27,136 | 136,096 | 1,091,471 | 37,388,511 |
| 59 | 86 | 90 | 1,648 | 28,784 | 144,865 | 1,236,336 | 39,520,176 |
| 60 | 91 | 95 | 1,629 | 30,413 | 151,452 | 1,387,788 | 41,643,753 |
| 61 | 96 | 100 | 1,688 | 32,101 | 165,264 | 1,553,052 | 43,758,952 |
| 62 | 101 | 105 | 1,704 | 33,805 | 175,396 | 1,728,448 | 45,865,723 |
| 63 | 106 | 110 | 1,714 | 35,519 | 184,948 | 1,913,395 | 47,963,905 |
| 64 | 111 | 115 | 1,675 | 37,194 | 189,151 | 2,102,547 | 50,053,637 |
| 65 | 116 | 120 | 1,695 | 38,889 | 199,820 | 2,302,367 | 52,134,887 |
| 66 | 121 | 125 | 1,759 | 40,648 | 216,169 | 2,518,536 | 54,207,536 |
| 67 | 126 | 130 | 1,758 | 42,406 | 224,954 | 2,743,490 | 56,271,510 |
| 68 | 131 | 135 | 1,828 | 44,234 | 243,000 | 2,986,490 | 58,326,500 |
| 69 | 136 | 140 | 1,775 | 46,009 | 244,780 | 3,231,270 | 60,372,410 |
| 70 | 141 | 145 | 1,823 | 47,832 | 260,537 | 3,491,807 | 62,409,367 |
| 71 | 146 | 150 | 1,744 | 49,576 | 257,964 | 3,749,771 | 64,437,371 |
| 72 | 151 | 155 | 1,777 | 51,353 | 271,758 | 4,021,529 | 66,456,614 |
| 73 | 156 | 160 | 1,785 | 53,138 | 281,802 | 4,303,331 | 68,466,851 |
| 74 | 161 | 165 | 1,770 | 54,908 | 288,273 | 4,591,604 | 70,468,184 |
| 75 | 166 | 170 | 1,837 | 56,745 | 308,434 | 4,900,038 | 72,460,588 |
| 76 | 171 | 175 | 1,872 | 58,617 | 323,656 | 5,223,694 | 74,443,719 |
| 77 | 176 | 180 | 1,887 | 60,504 | 335,680 | 5,559,374 | 76,417,454 |
| 78 | 181 | 185 | 1,941 | 62,445 | 355,005 | 5,914,380 | 78,381,655 |
| 79 | 186 | 190 | 1,921 | 64,366 | 360,884 | 6,275,264 | 80,336,124 |
| 80 | 191 | 195 | 1,963 | 66,329 | 378,475 | 6,653,738 | 82,280,783 |
| 81 | 196 | 200 | 1,956 | 68,285 | 386,984 | 7,040,723 | 84,215,723 |
| 82 | 201 | 225 | 9,075 | 77,360 | 2,144,719 | 9,185,441 | 93,965,441 |
| 83 | 226 | 250 | 9,441 | 86,801 | 2,483,470 | 11,668,911 | 103,508,661 |
| 84 | 251 | 275 | 9,577 | 96,378 | 2,779,693 | 14,448,603 | 112,838,653 |
| 85 | 276 | 300 | 9,771 | 106,149 | 3,100,108 | 17,548,712 | 121,952,012 |
| 86 | 301 | 325 | 9,632 | 115,781 | 3,325,547 | 20,874,259 | 130,847,434 |
| 87 | 326 | 350 | 9,759 | 125,540 | 3,632,653 | 24,506,912 | 139,523,912 |
| 88 | 351 | 375 | 9,718 | 135,258 | 3,887,626 | 28,394,539 | 147,982,789 |
| 89 | 376 | 400 | 9,712 | 144,970 | 4,153,109 | 32,547,647 | 156,223,647 |
| 90 | 401 | 425 | 9,350 | 154,320 | 4,271,896 | 36,819,543 | 164,251,543 |
| 91 | 426 | 450 | 9,300 | 163,620 | 4,506,609 | 41,326,152 | 172,069,152 |
| 92 | 451 | 475 | 9,241 | 172,861 | 4,737,330 | 46,063,482 | 179,680,507 |
| 93 | 476 | 500 | 9,699 | 182,560 | 4,728,622 | 50,792,104 | 186,592,104 |
| 94 | 501 | 525 | 9,832 | 192,392 | 5,040,125 | 55,832,229 | 193,260,429 |
| 95 | 526 | 550 | 9,223 | 201,615 | 4,956,901 | 60,789,130 | 199,688,880 |
| 96 | 551 | 575 | 9,147 | 210,762 | 5,144,502 | 65,933,632 | 205,887,482 |
| 97 | 576 | 600 | 8,874 | 219,636 | 5,212,638 | 71,146,271 | 211,860,671 |
| 98 | 601 | 625 | 8,398 | 228,034 | 5,143,055 | 76,289,326 | 217,618,076 |


| kWh Step | Start Range <br> (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 99 | 626 | 650 | 8,129 | 236,163 | 5,181,597 | 81,470,923 | 223,168,973 |
| 100 | 651 | 675 | 7,662 | 243,825 | 5,075,364 | 86,546,287 | 228,522,412 |
| 101 | 676 | 700 | 7,541 | 251,366 | 5,184,383 | 91,730,670 | 233,686,470 |
| 102 | 701 | 725 | 7,218 | 258,584 | 5,142,744 | 96,873,413 | 238,666,013 |
| 103 | 726 | 750 | 7,077 | 265,661 | 5,218,460 | 102,091,874 | 243,466,124 |
| 104 | 751 | 775 | 6,645 | 272,306 | 5,066,154 | 107,158,027 | 248,094,877 |
| 105 | 776 | 800 | 6,501 | 278,807 | 5,119,481 | 112,277,509 | 252,559,909 |
| 106 | 801 | 825 | 6,255 | 285,062 | 5,081,195 | 117,358,704 | 256,864,554 |
| 107 | 826 | 850 | 6,089 | 291,151 | 5,097,187 | 122,455,891 | 261,013,541 |
| 108 | 851 | 875 | 5,733 | 296,884 | 4,943,010 | 127,398,901 | 265,015,401 |
| 109 | 876 | 900 | 5,555 | 302,439 | 4,928,759 | 132,327,660 | 268,876,560 |
| 110 | 901 | 925 | 5,515 | 307,954 | 5,030,147 | 137,357,807 | 272,598,357 |
| 111 | 926 | 950 | 5,199 | 313,153 | 4,871,471 | 142,229,278 | 276,185,928 |
| 112 | 951 | 975 | 4,889 | 318,042 | 4,704,015 | 146,933,292 | 279,648,342 |
| 113 | 976 | 1,000 | 4,660 | 322,702 | 4,600,860 | 151,534,152 | 282,992,152 |
| 114 | 1,001 | 1,100 | 17,400 | 340,102 | 18,413,834 | 169,947,986 | 295,411,786 |
| 115 | 1,101 | 1,200 | 15,088 | 355,190 | 17,327,794 | 187,275,780 | 306,039,780 |
| 116 | 1,201 | 1,300 | 12,843 | 368,033 | 16,031,918 | 203,307,698 | 315,272,798 |
| 117 | 1,301 | 1,400 | 11,030 | 379,063 | 14,867,140 | 218,174,838 | 323,310,638 |
| 118 | 1,401 | 1,500 | 9,656 | 388,719 | 13,985,702 | 232,160,540 | 330,322,040 |
| 119 | 1,501 | 1,600 | 8,141 | 396,860 | 12,605,499 | 244,766,039 | 336,446,039 |
| 120 | 1,601 | 1,700 | 7,017 | 403,877 | 11,561,609 | 256,327,648 | 341,808,748 |
| 121 | 1,701 | 1,800 | 6,306 | 410,183 | 11,019,413 | 267,347,061 | 346,505,661 |
| 122 | 1,801 | 1,900 | 5,503 | 415,686 | 10,169,585 | 277,516,646 | 350,617,246 |
| 123 | 1,901 | 2,000 | 4,697 | 420,383 | 9,150,859 | 286,667,504 | 354,221,504 |
| 124 | 2,001 | 2,100 | 4,007 | 424,390 | 8,205,953 | 294,873,457 | 357,390,457 |
| 125 | 2,101 | 2,200 | 3,499 | 427,889 | 7,513,230 | 302,386,687 | 360,182,887 |
| 126 | 2,201 | 2,300 | 3,029 | 430,918 | 6,810,780 | 309,197,467 | 362,654,067 |
| 127 | 2,301 | 2,400 | 2,670 | 433,588 | 6,267,502 | 315,464,969 | 364,837,769 |
| 128 | 2,401 | 2,500 | 2,362 | 435,950 | 5,781,960 | 321,246,929 | 366,771,929 |
| 129 | 2,501 | 2,600 | 1,989 | 437,939 | 5,064,040 | 326,310,970 | 368,485,570 |
| 130 | 2,601 | 2,700 | 1,810 | 439,749 | 4,790,284 | 331,101,254 | 370,010,954 |
| 131 | 2,701 | 2,800 | 1,561 | 441,310 | 4,289,088 | 335,390,341 | 371,370,341 |
| 132 | 2,801 | 2,900 | 1,400 | 442,710 | 3,985,658 | 339,376,000 | 372,581,000 |
| 133 | 2,901 | 3,000 | 1,258 | 443,968 | 3,707,122 | 343,083,121 | 373,659,121 |
| 134 | 3,001 | 3,100 | 1,077 | 445,045 | 3,282,112 | 346,365,233 | 374,621,733 |
| 135 | 3,101 | 3,200 | 966 | 446,011 | 3,040,021 | 349,405,254 | 375,482,054 |
| 136 | 3,201 | 3,300 | 796 | 446,807 | 2,583,849 | 351,989,103 | 376,254,003 |
| 137 | 3,301 | 3,400 | 791 | 447,598 | 2,648,910 | 354,638,013 | 376,948,813 |
| 138 | 3,401 | 3,500 | 616 | 448,214 | 2,123,057 | 356,761,071 | 377,572,071 |
| 139 | 3,501 | 3,600 | 629 | 448,843 | 2,230,810 | 358,991,881 | 378,133,081 |
| 140 | 3,601 | 3,700 | 577 | 449,420 | 2,105,476 | 361,097,357 | 378,635,357 |
| 141 | 3,701 | 3,800 | 468 | 449,888 | 1,752,920 | 362,850,278 | 379,083,878 |
| 142 | 3,801 | 3,900 | 413 | 450,301 | 1,588,312 | 364,438,590 | 379,488,690 |
| 143 | 3,901 | 4,000 | 361 | 450,662 | 1,424,686 | 365,863,276 | 379,855,276 |
| 144 | 4,001 | 4,100 | 356 | 451,018 | 1,440,368 | 367,303,644 | 380,185,844 |
| 145 | 4,101 | 4,200 | 332 | 451,350 | 1,376,514 | 368,680,158 | 380,482,158 |
| 146 | 4,201 | 4,300 | 273 | 451,623 | 1,158,975 | 369,839,134 | 380,748,234 |
| 147 | 4,301 | 4,400 | 257 | 451,880 | 1,116,544 | 370,955,678 | 380,987,678 |


| kWh Step | Start Range <br> (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage <br> (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 148 | 4,401 | 4,500 | 207 | 452,087 | 919,978 | 371,875,655 | 381,204,155 |
| 149 | 4,501 | 4,600 | 210 | 452,297 | 954,410 | 372,830,066 | 381,399,866 |
| 150 | 4,601 | 4,700 | 175 | 452,472 | 813,484 | 373,643,550 | 381,577,150 |
| 151 | 4,701 | 4,800 | 121 | 452,593 | 573,977 | 374,217,527 | 381,739,127 |
| 152 | 4,801 | 4,900 | 137 | 452,730 | 663,322 | 374,880,850 | 381,887,850 |
| 153 | 4,901 | 5,000 | 105 | 452,835 | 519,436 | 375,400,285 | 382,025,285 |
| 154 | 5,001 | 5,100 | 120 | 452,955 | 605,965 | 376,006,250 | 382,151,750 |
| 155 | 5,101 | 5,200 | 98 | 453,053 | 504,335 | 376,510,585 | 382,266,985 |
| 156 | 5,201 | 5,300 | 76 | 453,129 | 398,800 | 376,909,386 | 382,373,686 |
| 157 | 5,301 | 5,400 | 80 | 453,209 | 427,541 | 377,336,927 | 382,472,327 |
| 158 | 5,401 | 5,500 | 66 | 453,275 | 359,425 | 377,696,352 | 382,563,852 |
| 159 | 5,501 | 5,600 | 59 | 453,334 | 327,370 | 378,023,723 | 382,649,323 |
| 160 | 5,601 | 5,700 | 66 | 453,400 | 372,618 | 378,396,341 | 382,728,341 |
| 161 | 5,701 | 5,800 | 45 | 453,445 | 258,470 | 378,654,811 | 382,801,811 |
| 162 | 5,801 | 5,900 | 50 | 453,495 | 291,984 | 378,946,795 | 382,870,295 |
| 163 | 5,901 | 6,000 | 40 | 453,535 | 237,769 | 379,184,564 | 382,934,564 |
| 164 | 6,001 | 6,100 | 44 | 453,579 | 266,043 | 379,450,607 | 382,994,707 |
| 165 | 6,101 | 6,200 | 30 | 453,609 | 184,297 | 379,634,904 | 383,051,104 |
| 166 | 6,201 | 6,300 | 34 | 453,643 | 212,350 | 379,847,254 | 383,104,354 |
| 167 | 6,301 | 6,400 | 31 | 453,674 | 196,691 | 380,043,945 | 383,154,345 |
| 168 | 6,401 | 6,500 | 37 | 453,711 | 238,236 | 380,282,181 | 383,200,681 |
| 169 | 6,501 | 6,600 | 32 | 453,743 | 209,431 | 380,491,612 | 383,243,812 |
| 170 | 6,601 | 6,700 | 28 | 453,771 | 186,172 | 380,677,784 | 383,284,084 |
| 171 | 6,701 | 6,800 | 31 | 453,802 | 209,529 | 380,887,313 | 383,321,713 |
| 172 | 6,801 | 6,900 | 20 | 453,822 | 137,078 | 381,024,391 | 383,356,591 |
| 173 | 6,901 | 7,000 | 19 | 453,841 | 132,031 | 381,156,421 | 383,389,421 |
| 174 | 7,001 | 7,100 | 19 | 453,860 | 133,951 | 381,290,373 | 383,420,373 |
| 175 | 7,101 | 7,200 | 10 | 453,870 | 71,495 | 381,361,867 | 383,449,867 |
| 176 | 7,201 | 7,300 | 12 | 453,882 | 86,895 | 381,448,762 | 383,478,162 |
| 177 | 7,301 | 7,400 | 12 | 453,894 | 88,356 | 381,537,118 | 383,505,518 |
| 178 | 7,401 | 7,500 | 15 | 453,909 | 111,507 | 381,648,626 | 383,531,126 |
| 179 | 7,501 | 7,600 | 20 | 453,929 | 150,969 | 381,799,595 | 383,555,195 |
| 180 | 7,601 | 7,700 | 14 | 453,943 | 106,955 | 381,906,550 | 383,577,450 |
| 181 | 7,701 | 7,800 | 13 | 453,956 | 100,836 | 382,007,386 | 383,598,586 |
| 182 | 7,801 | 7,900 | 11 | 453,967 | 86,233 | 382,093,619 | 383,618,319 |
| 183 | 7,901 | 8,000 | 10 | 453,977 | 79,425 | 382,173,043 | 383,637,043 |
| 184 | 8,001 | 8,100 | 10 | 453,987 | 80,484 | 382,253,527 | 383,654,827 |
| 185 | 8,101 | 8,200 | 9 | 453,996 | 73,211 | 382,326,739 | 383,671,539 |
| 186 | 8,201 | 8,300 | 7 | 454,003 | 57,798 | 382,384,537 | 383,687,637 |
| 187 | 8,301 | 8,400 | 10 | 454,013 | 83,458 | 382,467,995 | 383,702,795 |
| 188 | 8,401 | 8,500 | 7 | 454,020 | 59,058 | 382,527,053 | 383,717,053 |
| 189 | 8,501 | 8,600 | 8 | 454,028 | 68,367 | 382,595,420 | 383,730,620 |
| 190 | 8,601 | 8,700 | 10 | 454,038 | 86,576 | 382,681,996 | 383,743,396 |
| 191 | 8,701 | 8,800 | 5 | 454,043 | 43,631 | 382,725,627 | 383,755,227 |
| 192 | 8,801 | 8,900 | 8 | 454,051 | 70,808 | 382,796,435 | 383,766,535 |
| 193 | 8,901 | 9,000 | 5 | 454,056 | 44,803 | 382,841,238 | 383,777,238 |
| 194 | 9,001 | 9,100 | 2 | 454,058 | 18,025 | 382,859,263 | 383,787,463 |
| 195 | 9,101 | 9,200 | 2 | 454,060 | 18,298 | 382,877,562 | 383,797,562 |
| 196 | 9,201 | 9,300 | 4 | 454,064 | 37,011 | 382,914,572 | 383,807,372 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 197 | 9,301 | 9,400 | 4 | 454,068 | 37,299 | 382,951,871 | 383,816,671 |
| 198 | 9,401 | 9,500 | 3 | 454,071 | 28,334 | 382,980,206 | 383,825,706 |
| 199 | 9,501 | 9,600 | 4 | 454,075 | 38,154 | 383,018,360 | 383,834,360 |
| 200 | 9,601 | 9,700 | 1 | 454,076 | 9,605 | 383,027,964 | 383,842,764 |
| 201 | 9,701 | 9,800 | 1 | 454,077 | 9,751 | 383,037,715 | 383,851,115 |
| 202 | 9,801 | 9,900 | 2 | 454,079 | 19,704 | 383,057,419 | 383,859,319 |
| 203 | 9,901 | 10,000 | 4 | 454,083 | 39,711 | 383,097,130 | 383,867,130 |
| 204 | 10,001 | 10,100 | 3 | 454,086 | 30,098 | 383,127,228 | 383,874,628 |
| 205 | 10,101 | 10,200 | 3 | 454,089 | 30,471 | 383,157,699 | 383,881,899 |
| 206 | 10,201 | 10,300 | 2 | 454,091 | 20,471 | 383,178,170 | 383,888,870 |
| 207 | 10,301 | 10,400 | 5 | 454,096 | 51,675 | 383,229,845 | 383,895,445 |
| 208 | 10,401 | 10,500 | 3 | 454,099 | 31,400 | 383,261,245 | 383,901,745 |
| 209 | 10,501 | 10,600 | 3 | 454,102 | 31,685 | 383,292,930 | 383,907,730 |
| 210 | 10,601 | 10,700 | 1 | 454,103 | 10,603 | 383,303,533 | 383,913,433 |
| 211 | 10,701 | 10,800 | 3 | 454,106 | 32,153 | 383,335,686 | 383,918,886 |
| 212 | 10,801 | 10,900 | 2 | 454,108 | 21,747 | 383,357,433 | 383,924,233 |
| 213 | 11,001 | 11,100 | 3 | 454,111 | 33,134 | 383,390,567 | 383,934,467 |
| 214 | 11,101 | 11,200 | 1 | 454,112 | 11,191 | 383,401,758 | 383,939,358 |
| 215 | 11,201 | 11,300 | 1 | 454,113 | 11,258 | 383,413,016 | 383,944,116 |
| 216 | 11,301 | 11,400 | 2 | 454,115 | 22,684 | 383,435,700 | 383,948,700 |
| 217 | 11,401 | 11,500 | 2 | 454,117 | 22,824 | 383,458,524 | 383,953,024 |
| 218 | 11,501 | 11,600 | 2 | 454,119 | 23,126 | 383,481,650 | 383,957,250 |
| 219 | 11,601 | 11,700 | 3 | 454,122 | 35,007 | 383,516,657 | 383,961,257 |
| 220 | 11,701 | 11,800 | 1 | 454,123 | 11,790 | 383,528,447 | 383,965,047 |
| 221 | 11,801 | 11,900 | 3 | 454,126 | 35,497 | 383,563,944 | 383,968,544 |
| 222 | 12,001 | 12,100 | 3 | 454,129 | 36,104 | 383,600,048 | 383,975,148 |
| 223 | 12,201 | 12,300 | 2 | 454,131 | 24,465 | 383,624,513 | 383,981,213 |
| 224 | 12,301 | 12,400 | 1 | 454,132 | 12,355 | 383,636,868 | 383,984,068 |
| 225 | 12,401 | 12,500 | 1 | 454,133 | 12,402 | 383,649,270 | 383,986,770 |
| 226 | 12,501 | 12,600 | 2 | 454,135 | 25,054 | 383,674,324 | 383,989,324 |
| 227 | 12,701 | 12,800 | 1 | 454,136 | 12,749 | 383,687,073 | 383,994,273 |
| 228 | 12,801 | 12,900 | 1 | 454,137 | 12,817 | 383,699,890 | 383,996,590 |
| 229 | 13,001 | 13,100 | 1 | 454,138 | 13,058 | 383,712,948 | 384,001,148 |
| 230 | 13,101 | 13,200 | 2 | 454,140 | 26,250 | 383,739,198 | 384,003,198 |
| 231 | 13,201 | 13,300 | 1 | 454,141 | 13,251 | 383,752,449 | 384,005,149 |
| 232 | 13,301 | 13,400 | 1 | 454,142 | 13,358 | 383,765,807 | 384,007,007 |
| 233 | 13,401 | 13,500 | 2 | 454,144 | 26,866 | 383,792,673 | 384,008,673 |
| 234 | 13,501 | 13,600 | 1 | 454,145 | 13,502 | 383,806,175 | 384,010,175 |
| 235 | 13,801 | 13,900 | 1 | 454,146 | 13,839 | 383,820,014 | 384,014,614 |
| 236 | 13,901 | 14,000 | 1 | 454,147 | 13,965 | 383,833,979 | 384,015,979 |
| 237 | 14,001 | 14,100 | 1 | 454,148 | 14,063 | 383,848,043 | 384,017,243 |
| 238 | 14,101 | 14,200 | 1 | 454,149 | 14,126 | 383,862,169 | 384,018,369 |
| 239 | 14,401 | 14,500 | 1 | 454,150 | 14,390 | 383,876,559 | 384,021,559 |
| 240 | 14,701 | 14,800 | 1 | 454,151 | 14,748 | 383,891,307 | 384,024,507 |
| 241 | 14,801 | 14,900 | 1 | 454,152 | 14,817 | 383,906,124 | 384,025,324 |
| 242 | 15,501 | 15,600 | 1 | 454,153 | 15,518 | 383,921,642 | 384,030,842 |
| 243 | 15,801 | 15,900 | 3 | 454,156 | 47,584 | 383,969,226 | 384,032,826 |
| 244 | 19,301 | 19,400 | 1 | 454,157 | 19,373 | 383,988,599 | 384,046,799 |
| 245 | 20,501 | 20,600 | 1 | 454,158 | 20,584 | 384,009,183 | 384,050,383 |


| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{gathered} \text { Number Of } \\ \text { Bills } \end{gathered}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 246 | 20,801 | 20,900 | 1 | 454,159 | 20,873 | 384,030,057 | 384,050,957 |
| 247 | 38,201 | 38,300 | 1 | 454,160 | 38,266 | 384,068,323 | 384,068,323 |


| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{gathered} \hline \text { Number Of } \\ \text { Bills } \\ \hline \end{gathered}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 351 | 351 | 0 | 0 | 0 |
| 2 | 1 | 1 | 29 | 380 | 29 | 29 | 68,222 |
| 3 | 2 | 2 | 56 | 436 | 112 | 141 | 136,415 |
| 4 | 3 | 3 | 50 | 486 | 150 | 291 | 204,552 |
| 5 | 4 | 4 | 42 | 528 | 168 | 459 | 272,639 |
| 6 | 5 | 5 | 34 | 562 | 170 | 628 | 340,683 |
| 7 | 6 | 6 | 23 | 585 | 138 | 766 | 408,694 |
| 8 | 7 | 7 | 27 | 612 | 189 | 955 | 476,682 |
| 9 | 8 | 8 | 14 | 626 | 112 | 1,067 | 544,643 |
| 10 | 9 | 9 | 16 | 642 | 144 | 1,211 | 612,590 |
| 11 | 10 | 10 | 17 | 659 | 170 | 1,381 | 680,521 |
| 12 | 11 | 11 | 18 | 677 | 198 | 1,579 | 748,435 |
| 13 | 12 | 12 | 30 | 707 | 360 | 1,938 | 816,330 |
| 14 | 13 | 13 | 27 | 734 | 351 | 2,289 | 884,196 |
| 15 | 14 | 14 | 25 | 759 | 350 | 2,639 | 952,035 |
| 16 | 15 | 15 | 23 | 782 | 345 | 2,984 | 1,019,849 |
| 17 | 16 | 16 | 22 | 804 | 352 | 3,335 | 1,087,639 |
| 18 | 17 | 17 | 35 | 839 | 595 | 3,930 | 1,155,408 |
| 19 | 18 | 18 | 41 | 880 | 737 | 4,667 | 1,223,141 |
| 20 | 19 | 19 | 26 | 906 | 494 | 5,161 | 1,290,834 |
| 21 | 20 | 20 | 32 | 938 | 639 | 5,800 | 1,358,500 |
| 22 | 21 | 21 | 34 | 972 | 713 | 6,514 | 1,426,135 |
| 23 | 22 | 22 | 31 | 1,003 | 681 | 7,195 | 1,493,735 |
| 24 | 23 | 23 | 33 | 1,036 | 758 | 7,954 | 1,561,305 |
| 25 | 24 | 24 | 42 | 1,078 | 1,007 | 8,961 | 1,628,841 |
| 26 | 25 | 25 | 27 | 1,105 | 674 | 9,635 | 1,696,335 |
| 27 | 26 | 26 | 28 | 1,133 | 727 | 10,363 | 1,763,803 |
| 28 | 27 | 27 | 31 | 1,164 | 836 | 11,199 | 1,831,242 |
| 29 | 28 | 28 | 44 | 1,208 | 1,231 | 12,430 | 1,898,650 |
| 30 | 29 | 29 | 37 | 1,245 | 1,072 | 13,502 | 1,966,014 |
| 31 | 30 | 30 | 43 | 1,288 | 1,289 | 14,791 | 2,033,341 |
| 32 | 31 | 31 | 43 | 1,331 | 1,332 | 16,123 | 2,100,625 |
| 33 | 32 | 32 | 42 | 1,373 | 1,343 | 17,466 | 2,167,866 |
| 34 | 33 | 33 | 32 | 1,405 | 1,055 | 18,521 | 2,235,065 |
| 35 | 34 | 34 | 32 | 1,437 | 1,087 | 19,608 | 2,302,232 |
| 36 | 35 | 35 | 26 | 1,463 | 909 | 20,517 | 2,369,367 |
| 37 | 36 | 36 | 44 | 1,507 | 1,583 | 22,100 | 2,436,476 |
| 38 | 37 | 37 | 44 | 1,551 | 1,627 | 23,727 | 2,503,541 |
| 39 | 38 | 38 | 34 | 1,585 | 1,291 | 25,018 | 2,570,562 |
| 40 | 39 | 39 | 29 | 1,614 | 1,130 | 26,148 | 2,637,549 |
| 41 | 40 | 40 | 28 | 1,642 | 1,119 | 27,267 | 2,704,507 |
| 42 | 41 | 41 | 27 | 1,669 | 1,106 | 28,373 | 2,771,437 |
| 43 | 42 | 42 | 30 | 1,699 | 1,259 | 29,632 | 2,838,340 |
| 44 | 43 | 43 | 31 | 1,730 | 1,332 | 30,964 | 2,905,213 |
| 45 | 44 | 44 | 34 | 1,764 | 1,495 | 32,459 | 2,972,055 |
| 46 | 45 | 45 | 23 | 1,787 | 1,034 | 33,493 | 3,038,863 |
| 47 | 46 | 46 | 34 | 1,821 | 1,563 | 35,056 | 3,105,648 |
| 48 | 47 | 47 | 35 | 1,856 | 1,644 | 36,699 | 3,172,398 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 49 | 48 | 48 | 28 | 1,884 | 1,343 | 38,042 | 3,239,114 |
| 50 | 49 | 49 | 35 | 1,919 | 1,714 | 39,756 | 3,305,802 |
| 51 | 50 | 50 | 39 | 1,958 | 1,948 | 41,704 | 3,372,454 |
| 52 | 51 | 55 | 204 | 2,162 | 10,795 | 52,500 | 3,705,105 |
| 53 | 56 | 60 | 255 | 2,417 | 14,809 | 67,309 | 4,036,669 |
| 54 | 61 | 65 | 261 | 2,678 | 16,456 | 83,765 | 4,366,940 |
| 55 | 66 | 70 | 260 | 2,938 | 17,670 | 101,434 | 4,695,884 |
| 56 | 71 | 75 | 265 | 3,203 | 19,274 | 120,709 | 5,023,459 |
| 57 | 76 | 80 | 288 | 3,491 | 22,475 | 143,184 | 5,349,744 |
| 58 | 81 | 85 | 318 | 3,809 | 26,382 | 169,566 | 5,674,506 |
| 59 | 86 | 90 | 279 | 4,088 | 25,433 | 194,998 | 5,998,648 |
| 60 | 91 | 95 | 259 | 4,347 | 24,981 | 219,979 | 6,321,449 |
| 61 | 96 | 100 | 253 | 4,600 | 25,715 | 245,694 | 6,642,994 |
| 62 | 101 | 105 | 237 | 4,837 | 25,388 | 271,082 | 6,963,362 |
| 63 | 106 | 110 | 226 | 5,063 | 25,475 | 296,557 | 7,282,657 |
| 64 | 111 | 115 | 222 | 5,285 | 26,326 | 322,883 | 7,601,003 |
| 65 | 116 | 120 | 203 | 5,488 | 24,059 | 346,942 | 7,917,142 |
| 66 | 121 | 125 | 202 | 5,690 | 24,799 | 371,741 | 8,232,116 |
| 67 | 126 | 130 | 175 | 5,865 | 23,667 | 395,408 | 8,547,448 |
| 68 | 131 | 135 | 162 | 6,027 | 22,854 | 418,261 | 8,861,971 |
| 69 | 136 | 140 | 176 | 6,203 | 25,660 | 443,922 | 9,175,722 |
| 70 | 141 | 145 | 168 | 6,371 | 25,395 | 469,316 | 9,488,606 |
| 71 | 146 | 150 | 164 | 6,535 | 24,258 | 493,575 | 9,799,275 |
| 72 | 151 | 155 | 164 | 6,699 | 26,611 | 520,185 | 10,110,655 |
| 73 | 156 | 160 | 171 | 6,870 | 26,990 | 547,176 | 10,419,656 |
| 74 | 161 | 165 | 160 | 7,030 | 27,699 | 574,874 | 10,729,469 |
| 75 | 166 | 170 | 182 | 7,212 | 30,524 | 605,399 | 11,036,769 |
| 76 | 171 | 175 | 168 | 7,380 | 30,770 | 636,169 | 11,344,944 |
| 77 | 176 | 180 | 168 | 7,548 | 31,682 | 667,851 | 11,652,351 |
| 78 | 181 | 185 | 158 | 7,706 | 30,714 | 698,566 | 11,958,961 |
| 79 | 186 | 190 | 173 | 7,879 | 32,548 | 731,113 | 12,262,973 |
| 80 | 191 | 195 | 177 | 8,056 | 34,143 | 765,256 | 12,566,071 |
| 81 | 196 | 200 | 193 | 8,249 | 38,178 | 803,434 | 12,868,234 |
| 82 | 201 | 225 | 970 | 9,219 | 208,766 | 1,012,200 | 14,366,850 |
| 83 | 226 | 250 | 935 | 10,154 | 246,631 | 1,258,832 | 15,863,582 |
| 84 | 251 | 275 | 1,001 | 11,155 | 292,252 | 1,551,083 | 17,341,033 |
| 85 | 276 | 300 | 1,092 | 12,247 | 343,045 | 1,894,128 | 18,791,928 |
| 86 | 301 | 325 | 1,168 | 13,415 | 396,282 | 2,290,410 | 20,216,760 |
| 87 | 326 | 350 | 1,154 | 14,569 | 424,072 | 2,714,482 | 21,615,882 |
| 88 | 351 | 375 | 1,292 | 15,861 | 504,388 | 3,218,870 | 22,985,870 |
| 89 | 376 | 400 | 1,299 | 17,160 | 542,265 | 3,761,135 | 24,326,335 |
| 90 | 401 | 425 | 1,375 | 18,535 | 608,616 | 4,369,752 | 25,635,902 |
| 91 | 426 | 450 | 1,388 | 19,923 | 648,578 | 5,018,329 | 26,910,829 |
| 92 | 451 | 475 | 1,515 | 21,438 | 700,662 | 5,718,991 | 28,108,116 |
| 93 | 476 | 500 | 1,574 | 23,012 | 767,414 | 6,486,406 | 29,266,906 |
| 94 | 501 | 525 | 1,508 | 24,520 | 773,075 | 7,259,480 | 30,387,305 |
| 95 | 526 | 550 | 1,512 | 26,032 | 812,567 | 8,072,047 | 31,469,597 |
| 96 | 551 | 575 | 1,466 | 27,498 | 824,503 | 8,896,551 | 32,514,676 |

Rate RA - 12 Months Ending December 31, 2020
Part 3 of 13
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 97 | 576 | 600 | 1,384 | 28,882 | 813,448 | 9,709,999 | 33,524,599 |
| 98 | 601 | 625 | 1,415 | 30,297 | 866,130 | 10,576,129 | 34,498,629 |
| 99 | 626 | 650 | 1,293 | 31,590 | 824,347 | 11,400,476 | 35,439,426 |
| 100 | 651 | 675 | 1,320 | 32,910 | 874,136 | 12,274,612 | 36,347,137 |
| 101 | 676 | 700 | 1,228 | 34,138 | 844,026 | 13,118,638 | 37,223,138 |
| 102 | 701 | 725 | 1,246 | 35,384 | 887,941 | 14,006,579 | 38,068,604 |
| 103 | 726 | 750 | 1,187 | 36,571 | 875,480 | 14,882,059 | 38,883,559 |
| 104 | 751 | 775 | 1,099 | 37,670 | 838,160 | 15,720,220 | 39,670,045 |
| 105 | 776 | 800 | 1,123 | 38,793 | 884,120 | 16,604,340 | 40,428,340 |
| 106 | 801 | 825 | 1,046 | 39,839 | 849,859 | 17,454,199 | 41,159,749 |
| 107 | 826 | 850 | 1,036 | 40,875 | 867,393 | 18,321,592 | 41,864,892 |
| 108 | 851 | 875 | 1,002 | 41,877 | 864,320 | 19,185,912 | 42,544,912 |
| 109 | 876 | 900 | 910 | 42,787 | 806,914 | 19,992,827 | 43,200,227 |
| 110 | 901 | 925 | 950 | 43,737 | 866,511 | 20,859,338 | 43,832,638 |
| 111 | 926 | 950 | 851 | 44,588 | 797,790 | 21,657,128 | 44,442,878 |
| 112 | 951 | 975 | 876 | 45,464 | 842,831 | 22,499,958 | 45,031,233 |
| 113 | 976 | 1,000 | 876 | 46,340 | 864,859 | 23,364,817 | 45,597,817 |
| 114 | 1,001 | 1,100 | 3,017 | 49,357 | 3,162,840 | 26,527,657 | 47,665,257 |
| 115 | 1,101 | 1,200 | 2,646 | 52,003 | 3,038,060 | 29,565,718 | 49,449,718 |
| 116 | 1,201 | 1,300 | 2,293 | 54,296 | 2,861,542 | 32,427,259 | 50,987,359 |
| 117 | 1,301 | 1,400 | 1,985 | 56,281 | 2,676,291 | 35,103,550 | 52,312,350 |
| 118 | 1,401 | 1,500 | 1,661 | 57,942 | 2,407,361 | 37,510,911 | 53,457,411 |
| 119 | 1,501 | 1,600 | 1,458 | 59,400 | 2,257,039 | 39,767,950 | 54,444,750 |
| 120 | 1,601 | 1,700 | 1,221 | 60,621 | 2,010,060 | 41,778,010 | 55,296,410 |
| 121 | 1,701 | 1,800 | 1,025 | 61,646 | 1,790,075 | 43,568,085 | 56,036,685 |
| 122 | 1,801 | 1,900 | 862 | 62,508 | 1,591,215 | 45,159,300 | 56,682,800 |
| 123 | 1,901 | 2,000 | 753 | 63,261 | 1,466,402 | 46,625,702 | 57,249,702 |
| 124 | 2,001 | 2,100 | 603 | 63,864 | 1,235,015 | 47,860,717 | 57,749,617 |
| 125 | 2,101 | 2,200 | 550 | 64,414 | 1,180,432 | 49,041,149 | 58,190,949 |
| 126 | 2,201 | 2,300 | 488 | 64,902 | 1,096,765 | 50,137,914 | 58,581,214 |
| 127 | 2,301 | 2,400 | 383 | 65,285 | 898,964 | 51,036,878 | 58,928,078 |
| 128 | 2,401 | 2,500 | 357 | 65,642 | 873,839 | 51,910,717 | 59,238,217 |
| 129 | 2,501 | 2,600 | 346 | 65,988 | 882,291 | 52,793,008 | 59,514,008 |
| 130 | 2,601 | 2,700 | 285 | 66,273 | 753,895 | 53,546,903 | 59,756,903 |
| 131 | 2,701 | 2,800 | 231 | 66,504 | 634,966 | 54,181,869 | 59,975,069 |
| 132 | 2,801 | 2,900 | 223 | 66,727 | 634,952 | 54,816,820 | 60,170,220 |
| 133 | 2,901 | 3,000 | 184 | 66,911 | 542,068 | 55,358,888 | 60,344,888 |
| 134 | 3,001 | 3,100 | 151 | 67,062 | 459,802 | 55,818,690 | 60,502,790 |
| 135 | 3,101 | 3,200 | 133 | 67,195 | 419,108 | 56,237,798 | 60,647,398 |
| 136 | 3,201 | 3,300 | 127 | 67,322 | 411,891 | 56,649,689 | 60,777,989 |
| 137 | 3,301 | 3,400 | 122 | 67,444 | 408,911 | 57,058,600 | 60,897,200 |
| 138 | 3,401 | 3,500 | 109 | 67,553 | 375,561 | 57,434,161 | 61,004,161 |
| 139 | 3,501 | 3,600 | 97 | 67,650 | 344,160 | 57,778,321 | 61,101,121 |
| 140 | 3,601 | 3,700 | 74 | 67,724 | 270,764 | 58,049,085 | 61,190,385 |
| 141 | 3,701 | 3,800 | 86 | 67,810 | 322,380 | 58,371,465 | 61,270,865 |
| 142 | 3,801 | 3,900 | 59 | 67,869 | 226,749 | 58,598,215 | 61,343,815 |
| 143 | 3,901 | 4,000 | 51 | 67,920 | 201,158 | 58,799,373 | 61,411,373 |
| 144 | 4,001 | 4,100 | 47 | 67,967 | 190,098 | 58,989,471 | 61,474,071 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 145 | 4,101 | 4,200 | 41 | 68,008 | 170,000 | 59,159,471 | 61,532,471 |
| 146 | 4,201 | 4,300 | 36 | 68,044 | 153,133 | 59,312,604 | 61,587,304 |
| 147 | 4,301 | 4,400 | 41 | 68,085 | 178,586 | 59,491,190 | 61,638,390 |
| 148 | 4,401 | 4,500 | 42 | 68,127 | 186,780 | 59,677,969 | 61,684,969 |
| 149 | 4,501 | 4,600 | 24 | 68,151 | 109,364 | 59,787,333 | 61,728,533 |
| 150 | 4,601 | 4,700 | 27 | 68,178 | 125,618 | 59,912,951 | 61,769,451 |
| 151 | 4,701 | 4,800 | 34 | 68,212 | 161,405 | 60,074,356 | 61,807,156 |
| 152 | 4,801 | 4,900 | 20 | 68,232 | 96,772 | 60,171,128 | 61,842,028 |
| 153 | 4,901 | 5,000 | 22 | 68,254 | 109,047 | 60,280,176 | 61,875,176 |
| 154 | 5,001 | 5,100 | 16 | 68,270 | 80,903 | 60,361,079 | 61,906,379 |
| 155 | 5,101 | 5,200 | 21 | 68,291 | 108,133 | 60,469,211 | 61,935,611 |
| 156 | 5,201 | 5,300 | 20 | 68,311 | 104,975 | 60,574,187 | 61,962,787 |
| 157 | 5,301 | 5,400 | 11 | 68,322 | 58,686 | 60,632,873 | 61,988,273 |
| 158 | 5,401 | 5,500 | 8 | 68,330 | 43,385 | 60,676,258 | 62,012,758 |
| 159 | 5,501 | 5,600 | 12 | 68,342 | 66,764 | 60,743,022 | 62,036,622 |
| 160 | 5,601 | 5,700 | 18 | 68,360 | 101,669 | 60,844,691 | 62,058,791 |
| 161 | 5,701 | 5,800 | 11 | 68,371 | 63,232 | 60,907,923 | 62,079,523 |
| 162 | 5,801 | 5,900 | 9 | 68,380 | 52,555 | 60,960,478 | 62,099,178 |
| 163 | 5,901 | 6,000 | 7 | 68,387 | 41,566 | 61,002,044 | 62,118,044 |
| 164 | 6,001 | 6,100 | 13 | 68,400 | 78,815 | 61,080,858 | 62,136,158 |
| 165 | 6,101 | 6,200 | 8 | 68,408 | 49,386 | 61,130,244 | 62,153,244 |
| 166 | 6,201 | 6,300 | 7 | 68,415 | 43,683 | 61,173,927 | 62,169,327 |
| 167 | 6,301 | 6,400 | 4 | 68,419 | 25,318 | 61,199,245 | 62,184,845 |
| 168 | 6,401 | 6,500 | 5 | 68,424 | 32,186 | 61,231,431 | 62,199,931 |
| 169 | 6,501 | 6,600 | 8 | 68,432 | 52,365 | 61,283,796 | 62,214,396 |
| 170 | 6,601 | 6,700 | 5 | 68,437 | 33,153 | 61,316,949 | 62,228,149 |
| 171 | 6,701 | 6,800 | 2 | 68,439 | 13,477 | 61,330,426 | 62,241,626 |
| 172 | 6,801 | 6,900 | 2 | 68,441 | 13,726 | 61,344,152 | 62,254,952 |
| 173 | 6,901 | 7,000 | 8 | 68,449 | 55,552 | 61,399,704 | 62,267,704 |
| 174 | 7,001 | 7,100 | 7 | 68,456 | 49,314 | 61,449,019 | 62,279,719 |
| 175 | 7,101 | 7,200 | 3 | 68,459 | 21,492 | 61,470,510 | 62,291,310 |
| 176 | 7,201 | 7,300 | 4 | 68,463 | 28,930 | 61,499,440 | 62,302,440 |
| 177 | 7,301 | 7,400 | 4 | 68,467 | 29,327 | 61,528,768 | 62,313,168 |
| 178 | 7,401 | 7,500 | 7 | 68,474 | 52,099 | 61,580,867 | 62,323,367 |
| 179 | 7,501 | 7,600 | 5 | 68,479 | 37,814 | 61,618,680 | 62,333,080 |
| 180 | 7,601 | 7,700 | 4 | 68,483 | 30,602 | 61,649,283 | 62,342,283 |
| 181 | 7,701 | 7,800 | 2 | 68,485 | 15,495 | 61,664,777 | 62,351,177 |
| 182 | 7,801 | 7,900 | 2 | 68,487 | 15,669 | 61,680,446 | 62,359,846 |
| 183 | 7,901 | 8,000 | 1 | 68,488 | 7,974 | 61,688,420 | 62,368,420 |
| 184 | 8,001 | 8,100 | 4 | 68,492 | 32,214 | 61,720,634 | 62,376,734 |
| 185 | 8,101 | 8,200 | 2 | 68,494 | 16,331 | 61,736,965 | 62,384,765 |
| 186 | 8,301 | 8,400 | 1 | 68,495 | 8,361 | 61,745,326 | 62,400,526 |
| 187 | 8,401 | 8,500 | 3 | 68,498 | 25,357 | 61,770,683 | 62,408,183 |
| 188 | 8,501 | 8,600 | 3 | 68,501 | 25,728 | 61,796,411 | 62,415,611 |
| 189 | 8,601 | 8,700 | 5 | 68,506 | 43,285 | 61,839,696 | 62,422,596 |
| 190 | 8,701 | 8,800 | 2 | 68,508 | 17,469 | 61,857,165 | 62,429,165 |
| 191 | 8,801 | 8,900 | 3 | 68,511 | 26,534 | 61,883,699 | 62,435,499 |
| 192 | 9,001 | 9,100 | 1 | 68,512 | 9,008 | 61,892,707 | 62,447,807 |


| kWh Step | Start Range (kWh) | End Range <br> (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 | 9,101 | 9,200 | 2 | 68,514 | 18,201 | 61,910,908 | 62,453,708 |
| 194 | 9,201 | 9,300 | 2 | 68,516 | 18,493 | 61,929,401 | 62,459,501 |
| 195 | 9,401 | 9,500 | 2 | 68,518 | 18,913 | 61,948,314 | 62,470,814 |
| 196 | 9,501 | 9,600 | 2 | 68,520 | 19,110 | 61,967,423 | 62,476,223 |
| 197 | 9,701 | 9,800 | 2 | 68,522 | 19,483 | 61,986,907 | 62,486,707 |
| 198 | 9,801 | 9,900 | 3 | 68,525 | 29,589 | 62,016,496 | 62,491,696 |
| 199 | 9,901 | 10,000 | 2 | 68,527 | 19,908 | 62,036,404 | 62,496,404 |
| 200 | 10,101 | 10,200 | 2 | 68,529 | 20,340 | 62,056,744 | 62,505,544 |
| 201 | 10,201 | 10,300 | 1 | 68,530 | 10,224 | 62,066,967 | 62,509,867 |
| 202 | 10,301 | 10,400 | 1 | 68,531 | 10,386 | 62,077,353 | 62,514,153 |
| 203 | 10,401 | 10,500 | 2 | 68,533 | 20,826 | 62,098,179 | 62,518,179 |
| 204 | 10,501 | 10,600 | 1 | 68,534 | 10,529 | 62,108,708 | 62,522,108 |
| 205 | 10,601 | 10,700 | 1 | 68,535 | 10,691 | 62,119,399 | 62,525,999 |
| 206 | 10,701 | 10,800 | 1 | 68,536 | 10,723 | 62,130,123 | 62,529,723 |
| 207 | 10,801 | 10,900 | 2 | 68,538 | 21,685 | 62,151,807 | 62,533,307 |
| 208 | 11,201 | 11,300 | 1 | 68,539 | 11,250 | 62,163,057 | 62,547,257 |
| 209 | 11,301 | 11,400 | 2 | 68,541 | 22,661 | 62,185,718 | 62,550,518 |
| 210 | 11,701 | 11,800 | 1 | 68,542 | 11,771 | 62,197,488 | 62,563,288 |
| 211 | 11,801 | 11,900 | 1 | 68,543 | 11,874 | 62,209,363 | 62,566,363 |
| 212 | 12,301 | 12,400 | 1 | 68,544 | 12,347 | 62,221,710 | 62,581,310 |
| 213 | 12,601 | 12,700 | 1 | 68,545 | 12,630 | 62,234,340 | 62,589,940 |
| 214 | 12,801 | 12,900 | 1 | 68,546 | 12,811 | 62,247,150 | 62,595,450 |
| 215 | 13,301 | 13,400 | 1 | 68,547 | 13,339 | 62,260,490 | 62,608,890 |
| 216 | 13,901 | 14,000 | 1 | 68,548 | 13,965 | 62,274,454 | 62,624,454 |
| 217 | 14,001 | 14,100 | 1 | 68,549 | 14,051 | 62,288,505 | 62,626,905 |
| 218 | 15,101 | 15,200 | 1 | 68,550 | 15,135 | 62,303,640 | 62,653,240 |
| 219 | 15,201 | 15,300 | 3 | 68,553 | 45,701 | 62,349,341 | 62,655,341 |
| 220 | 15,501 | 15,600 | 1 | 68,554 | 15,554 | 62,364,896 | 62,661,296 |
| 221 | 15,801 | 15,900 | 1 | 68,555 | 15,879 | 62,380,775 | 62,666,975 |
| 222 | 15,901 | 16,000 | 2 | 68,557 | 31,861 | 62,412,636 | 62,668,636 |
| 223 | 16,201 | 16,300 | 2 | 68,559 | 32,533 | 62,445,169 | 62,673,369 |
| 224 | 16,601 | 16,700 | 1 | 68,560 | 16,684 | 62,461,852 | 62,678,952 |
| 225 | 16,901 | 17,000 | 1 | 68,561 | 16,918 | 62,478,771 | 62,682,771 |
| 226 | 17,001 | 17,100 | 1 | 68,562 | 17,065 | 62,495,836 | 62,683,936 |
| 227 | 17,201 | 17,300 | 1 | 68,563 | 17,252 | 62,513,088 | 62,686,088 |
| 228 | 17,301 | 17,400 | 1 | 68,564 | 17,374 | 62,530,462 | 62,687,062 |
| 229 | 18,101 | 18,200 | 1 | 68,565 | 18,162 | 62,548,625 | 62,694,225 |
| 230 | 18,201 | 18,300 | 2 | 68,567 | 36,527 | 62,585,151 | 62,694,951 |
| 231 | 19,101 | 19,200 | 1 | 68,568 | 19,098 | 62,604,249 | 62,700,249 |
| 232 | 21,001 | 21,100 | 1 | 68,569 | 20,996 | 62,625,245 | 62,709,645 |
| 233 | 21,301 | 21,400 | 1 | 68,570 | 21,285 | 62,646,530 | 62,710,730 |
| 234 | 22,701 | 22,800 | 1 | 68,571 | 22,760 | 62,669,290 | 62,714,890 |
| 235 | 23,101 | 23,200 | 1 | 68,572 | 23,132 | 62,692,422 | 62,715,622 |
| 236 | 24,601 | 24,700 | 1 | 68,573 | 24,622 | 62,717,044 | 62,717,044 |

Attachment DFR IV -C
Bill Frequency Distribution
Rate GS- 12 Months Ending December 31, 2020

Part 4 of 13
Page 1 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 20,239 | 20,239 | 0 | 0 | 0 |
| 2 | 1 | 100 | 96,771 | 117,010 | 3,987,785 | 3,987,785 | 21,453,485 |
| 3 | 101 | 200 | 48,158 | 165,168 | 7,171,210 | 11,158,995 | 36,458,795 |
| 4 | 201 | 300 | 31,857 | 197,025 | 8,005,179 | 19,164,174 | 47,556,774 |
| 5 | 301 | 400 | 23,330 | 220,355 | 8,262,443 | 27,426,617 | 55,951,417 |
| 6 | 401 | 500 | 17,725 | 238,080 | 8,103,062 | 35,529,679 | 62,323,179 |
| 7 | 501 | 600 | 13,298 | 251,378 | 7,441,715 | 42,971,394 | 67,144,794 |
| 8 | 601 | 700 | 10,341 | 261,719 | 6,856,400 | 49,827,794 | 70,791,394 |
| 9 | 701 | 800 | 7,598 | 269,317 | 5,833,874 | 55,661,668 | 73,541,668 |
| 10 | 801 | 900 | 5,571 | 274,888 | 4,869,719 | 60,531,388 | 75,632,488 |
| 11 | 901 | 1,000 | 3,712 | 278,600 | 3,660,542 | 64,191,930 | 77,258,930 |
| 12 | 1,001 | 1,100 | 2,526 | 281,126 | 2,784,631 | 66,976,561 | 78,571,661 |
| 13 | 1,101 | 1,200 | 1,812 | 282,938 | 2,224,502 | 69,201,063 | 79,675,863 |
| 14 | 1,201 | 1,300 | 1,399 | 284,337 | 1,767,244 | 70,968,307 | 80,497,307 |
| 15 | 1,301 | 1,400 | 1,096 | 285,433 | 1,497,574 | 72,465,880 | 81,193,480 |
| 16 | 1,401 | 1,500 | 843 | 286,276 | 1,235,937 | 73,701,818 | 81,788,318 |
| 17 | 1,501 | 1,600 | 624 | 286,900 | 977,365 | 74,679,183 | 82,306,383 |
| 18 | 1,601 | 1,700 | 495 | 287,395 | 826,270 | 75,505,453 | 82,767,853 |
| 19 | 1,701 | 1,800 | 425 | 287,820 | 752,477 | 76,257,929 | 83,182,529 |
| 20 | 1,801 | 1,900 | 366 | 288,186 | 685,254 | 76,943,184 | 83,557,084 |
| 21 | 1,901 | 2,000 | 297 | 288,483 | 586,309 | 77,529,492 | 83,897,492 |
| 22 | 2,001 | 2,100 | 235 | 288,718 | 487,702 | 78,017,194 | 84,210,094 |
| 23 | 2,101 | 2,200 | 185 | 288,903 | 435,309 | 78,452,503 | 84,533,303 |
| 24 | 2,201 | 2,300 | 184 | 289,087 | 419,124 | 78,871,626 | 84,805,626 |
| 25 | 2,301 | 2,400 | 140 | 289,227 | 333,094 | 79,204,720 | 85,060,720 |
| 26 | 2,401 | 2,500 | 152 | 289,379 | 377,617 | 79,582,337 | 85,302,337 |
| 27 | 2,501 | 2,600 | 128 | 289,507 | 330,435 | 79,912,772 | 85,528,772 |
| 28 | 2,601 | 2,700 | 139 | 289,646 | 372,768 | 80,285,540 | 85,742,240 |
| 29 | 2,701 | 2,800 | 101 | 289,747 | 281,498 | 80,567,038 | 85,943,038 |
| 30 | 2,801 | 2,900 | 113 | 289,860 | 326,394 | 80,893,432 | 86,133,732 |
| 31 | 2,901 | 3,000 | 99 | 289,959 | 295,246 | 81,188,678 | 86,312,678 |
| 32 | 3,001 | 3,100 | 77 | 290,036 | 238,020 | 81,426,698 | 86,482,798 |
| 33 | 3,101 | 3,200 | 76 | 290,112 | 242,920 | 81,669,618 | 86,645,618 |
| 34 | 3,201 | 3,300 | 69 | 290,181 | 227,084 | 81,896,702 | 86,800,502 |
| 35 | 3,301 | 3,400 | 56 | 290,237 | 190,288 | 82,086,990 | 86,948,990 |
| 36 | 3,401 | 3,500 | 70 | 290,307 | 244,622 | 82,331,612 | 87,091,612 |
| 37 | 3,501 | 3,600 | 56 | 290,363 | 201,051 | 82,532,663 | 87,227,063 |
| 38 | 3,601 | 3,700 | 54 | 290,417 | 199,897 | 82,732,560 | 87,357,560 |
| 39 | 3,701 | 3,800 | 49 | 290,466 | 186,363 | 82,918,923 | 87,482,723 |
| 40 | 3,801 | 3,900 | 43 | 290,509 | 167,745 | 83,086,669 | 87,602,869 |
| 41 | 3,901 | 4,000 | 41 | 290,550 | 164,130 | 83,250,799 | 87,718,799 |
| 42 | 4,001 | 4,100 | 48 | 290,598 | 196,647 | 83,447,446 | 87,830,346 |
| 43 | 4,101 | 4,200 | 55 | 290,653 | 231,093 | 83,678,539 | 87,937,339 |
| 44 | 4,201 | 4,300 | 31 | 290,684 | 133,579 | 83,812,118 | 88,039,018 |
| 45 | 4,301 | 4,400 | 48 | 290,732 | 211,244 | 84,023,362 | 88,137,362 |
| 46 | 4,401 | 4,500 | 33 | 290,765 | 148,927 | 84,172,289 | 88,231,289 |

Duquesne Light Company
Bill Frequency Distribution
Rate GS- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 4 of 13
Page 2 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range <br> (kWh) | End Range <br> (kWh) | Number <br> Of Bills | Cumulative <br> Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$|$| 47 | 4,501 | 4,600 | 28 | 290,793 |
| ---: | ---: | ---: | ---: | ---: |

Duquesne Light Company
Bill Frequency Distribution
Rate GS- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 4 of 13
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range <br> (kWh) | End Range <br> (kWh) | Number <br> Of Bills | Cumulative <br> Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$|$| 93 | 9,101 | 9,200 | 7 | 291,405 |
| ---: | ---: | ---: | ---: | ---: |

Duquesne Light Company
Bill Frequency Distribution
Rate GS- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 4 of 13
Page 4 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range <br> (kWh) | End Range <br> (kWh) | Number <br> Of Bills | Cumulative <br> Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$|$| 139 | 13,801 | 13,900 | 1 | 291,554 |
| ---: | ---: | ---: | ---: | ---: |

Duquesne Light Company
Bill Frequency Distribution
Rate GS- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 4 of 13
Page 5 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 185 | 21,401 | 21,500 | 1 | 291,625 | 21,772 | 91,049,394 | 91,952,394 |
| 186 | 21,601 | 21,700 | 1 | 291,626 | 21,883 | 91,071,277 | 91,960,977 |
| 187 | 22,001 | 22,100 | 2 | 291,628 | 44,623 | 91,115,900 | 91,977,800 |
| 188 | 22,101 | 22,200 | 1 | 291,629 | 22,471 | 91,138,371 | 91,981,971 |
| 189 | 22,301 | 22,400 | 1 | 291,630 | 22,649 | 91,161,020 | 91,989,820 |
| 190 | 23,001 | 23,100 | 2 | 291,632 | 46,686 | 91,207,706 | 92,016,206 |
| 191 | 23,501 | 23,600 | 1 | 291,633 | 23,815 | 91,231,522 | 92,033,922 |
| 192 | 23,701 | 23,800 | 1 | 291,634 | 24,040 | 91,255,562 | 92,040,962 |
| 193 | 24,401 | 24,500 | 1 | 291,635 | 24,783 | 91,280,345 | 92,064,345 |
| 194 | 24,601 | 24,700 | 1 | 291,636 | 24,992 | 91,305,337 | 92,071,037 |
| 195 | 24,901 | 25,000 | 1 | 291,637 | 25,234 | 91,330,571 | 92,080,571 |
| 196 | 25,001 | 25,100 | 1 | 291,638 | 25,348 | 91,355,919 | 92,083,819 |
| 197 | 25,101 | 25,200 | 1 | 291,639 | 25,520 | 91,381,439 | 92,087,039 |
| 198 | 26,101 | 26,200 | 1 | 291,640 | 26,505 | 91,407,944 | 92,115,344 |
| 199 | 26,301 | 26,400 | 1 | 291,641 | 26,724 | 91,434,668 | 92,121,068 |
| 200 | 27,201 | 27,300 | 2 | 291,643 | 55,209 | 91,489,877 | 92,145,077 |
| 201 | 27,301 | 27,400 | 1 | 291,644 | 27,680 | 91,517,557 | 92,147,757 |
| 202 | 27,901 | 28,000 | 1 | 291,645 | 28,340 | 91,545,897 | 92,161,897 |
| 203 | 28,901 | 29,000 | 2 | 291,647 | 58,641 | 91,604,538 | 92,184,538 |
| 204 | 29,001 | 29,100 | 1 | 291,648 | 29,443 | 91,633,981 | 92,186,881 |
| 205 | 29,201 | 29,300 | 1 | 291,649 | 29,607 | 91,663,588 | 92,190,988 |
| 206 | 29,301 | 29,400 | 1 | 291,650 | 29,747 | 91,693,335 | 92,193,135 |
| 207 | 29,801 | 29,900 | 1 | 291,651 | 30,251 | 91,723,586 | 92,201,986 |
| 208 | 29,901 | 30,000 | 1 | 291,652 | 30,332 | 91,753,918 | 92,203,918 |
| 209 | 30,401 | 30,500 | 2 | 291,654 | 61,617 | 91,815,535 | 92,212,035 |
| 210 | 32,001 | 32,100 | 1 | 291,655 | 32,446 | 91,847,981 | 92,233,181 |
| 211 | 32,801 | 32,900 | 2 | 291,657 | 66,472 | 91,914,453 | 92,243,453 |
| 212 | 33,001 | 33,100 | 1 | 291,658 | 33,523 | 91,947,976 | 92,245,876 |
| 213 | 33,601 | 33,700 | 3 | 291,661 | 102,304 | 92,050,280 | 92,252,480 |
| 214 | 34,501 | 34,600 | 1 | 291,662 | 34,959 | 92,085,239 | 92,258,239 |
| 215 | 34,601 | 34,700 | 1 | 291,663 | 35,141 | 92,120,380 | 92,259,180 |
| 216 | 35,001 | 35,100 | 1 | 291,664 | 35,473 | 92,155,853 | 92,261,153 |
| 217 | 35,301 | 35,400 | 2 | 291,666 | 71,565 | 92,227,418 | 92,262,818 |
| 218 | 36,201 | 36,300 | 1 | 291,667 | 36,764 | 92,264,182 | 92,264,182 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 1,146 | 1,146 | 0 | 0 | 0 |
| 2 | 1 | 100 | 4,508 | 5,654 | 215,145 | 215,145 | 24,400,845 |
| 3 | 101 | 200 | 4,801 | 10,455 | 736,406 | 951,551 | 48,362,751 |
| 4 | 201 | 300 | 5,677 | 16,132 | 1,413,650 | 2,365,202 | 71,778,902 |
| 5 | 301 | 400 | 6,383 | 22,515 | 2,222,913 | 4,588,115 | 94,586,515 |
| 6 | 401 | 500 | 7,069 | 29,584 | 3,204,093 | 7,792,208 | 116,755,708 |
| 7 | 501 | 600 | 7,343 | 36,927 | 4,059,371 | 11,851,579 | 138,201,979 |
| 8 | 601 | 700 | 8,063 | 44,990 | 5,194,305 | 17,045,884 | 158,810,584 |
| 9 | 701 | 800 | 8,134 | 53,124 | 6,193,874 | 23,239,758 | 178,749,358 |
| 10 | 801 | 900 | 8,742 | 61,866 | 7,353,478 | 30,593,236 | 197,673,736 |
| 11 | 901 | 1,000 | 8,419 | 70,285 | 8,107,614 | 38,700,850 | 215,926,850 |
| 12 | 1,001 | 1,100 | 8,407 | 78,692 | 8,839,891 | 47,540,741 | 233,241,641 |
| 13 | 1,101 | 1,200 | 8,237 | 86,929 | 9,489,638 | 57,030,379 | 249,728,779 |
| 14 | 1,201 | 1,300 | 7,888 | 94,817 | 9,881,796 | 66,912,175 | 265,414,375 |
| 15 | 1,301 | 1,400 | 7,579 | 102,396 | 10,261,583 | 77,173,758 | 280,334,758 |
| 16 | 1,401 | 1,500 | 7,032 | 109,428 | 10,237,038 | 87,410,796 | 294,535,296 |
| 17 | 1,501 | 1,600 | 6,252 | 115,680 | 10,054,959 | 97,465,755 | 308,395,355 |
| 18 | 1,601 | 1,700 | 6,127 | 121,807 | 10,168,075 | 107,633,830 | 321,330,630 |
| 19 | 1,701 | 1,800 | 5,414 | 127,221 | 9,899,481 | 117,533,312 | 334,055,312 |
| 20 | 1,801 | 1,900 | 5,430 | 132,651 | 10,124,452 | 127,657,764 | 345,891,764 |
| 21 | 1,901 | 2,000 | 5,032 | 137,683 | 9,714,593 | 137,372,357 | 357,028,357 |
| 22 | 2,001 | 2,100 | 4,670 | 142,353 | 9,880,691 | 147,253,048 | 368,084,848 |
| 23 | 2,101 | 2,200 | 4,590 | 146,943 | 9,767,922 | 157,020,970 | 378,270,570 |
| 24 | 2,201 | 2,300 | 4,410 | 151,353 | 9,822,830 | 166,843,800 | 388,007,200 |
| 25 | 2,301 | 2,400 | 4,157 | 155,510 | 9,671,467 | 176,515,267 | 397,317,667 |
| 26 | 2,401 | 2,500 | 3,955 | 159,465 | 9,592,920 | 186,108,187 | 406,223,187 |
| 27 | 2,501 | 2,600 | 3,908 | 163,373 | 9,861,611 | 195,969,798 | 414,728,598 |
| 28 | 2,601 | 2,700 | 3,803 | 167,176 | 9,977,809 | 205,947,607 | 422,852,107 |
| 29 | 2,701 | 2,800 | 3,421 | 170,597 | 9,585,149 | 215,532,756 | 430,891,956 |
| 30 | 2,801 | 2,900 | 3,402 | 173,999 | 9,598,638 | 225,131,394 | 438,316,194 |
| 31 | 2,901 | 3,000 | 3,285 | 177,284 | 9,590,697 | 234,722,092 | 445,403,092 |
| 32 | 3,001 | 3,100 | 2,920 | 180,204 | 8,816,058 | 243,538,150 | 452,189,850 |
| 33 | 3,101 | 3,200 | 2,715 | 182,919 | 8,776,836 | 252,314,985 | 459,009,385 |
| 34 | 3,201 | 3,300 | 2,712 | 185,631 | 8,723,769 | 261,038,754 | 465,242,754 |
| 35 | 3,301 | 3,400 | 2,567 | 188,198 | 8,513,657 | 269,552,411 | 471,216,611 |
| 36 | 3,401 | 3,500 | 2,416 | 190,614 | 8,372,571 | 277,924,982 | 477,064,482 |
| 37 | 3,501 | 3,600 | 2,340 | 192,954 | 8,222,360 | 286,147,342 | 482,552,542 |
| 38 | 3,601 | 3,700 | 2,150 | 195,104 | 8,126,478 | 294,273,820 | 488,179,720 |
| 39 | 3,701 | 3,800 | 2,131 | 197,235 | 7,911,775 | 302,185,595 | 493,234,395 |
| 40 | 3,801 | 3,900 | 2,089 | 199,324 | 7,962,375 | 310,147,970 | 498,077,270 |
| 41 | 3,901 | 4,000 | 1,954 | 201,278 | 7,640,419 | 317,788,389 | 502,720,389 |
| 42 | 4,001 | 4,100 | 1,892 | 203,170 | 7,584,590 | 325,372,979 | 507,171,079 |
| 43 | 4,101 | 4,200 | 1,847 | 205,017 | 7,586,983 | 332,959,962 | 511,434,762 |
| 44 | 4,201 | 4,300 | 1,532 | 206,549 | 6,865,058 | 339,825,020 | 515,961,620 |
| 45 | 4,301 | 4,400 | 1,692 | 208,241 | 7,286,206 | 347,111,225 | 519,899,225 |
| 46 | 4,401 | 4,500 | 1,619 | 209,860 | 7,130,574 | 354,241,799 | 523,671,299 |
| 47 | 4,501 | 4,600 | 1,517 | 211,377 | 6,832,802 | 361,074,601 | 527,291,001 |
| 48 | 4,601 | 4,700 | 1,485 | 212,862 | 6,836,039 | 367,910,640 | 530,760,940 |
| 49 | 4,701 | 4,800 | 1,353 | 214,215 | 6,360,978 | 374,271,618 | 534,092,418 |
| 50 | 4,801 | 4,900 | 1,273 | 215,488 | 6,591,953 | 380,863,571 | 537,776,271 |
| 51 | 4,901 | 5,000 | 1,235 | 216,723 | 6,051,012 | 386,914,583 | 540,854,583 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 52 | 5,001 | 5,100 | 1,204 | 217,927 | 6,017,520 | 392,932,102 | 543,810,502 |
| 53 | 5,101 | 5,200 | 1,198 | 219,125 | 6,108,259 | 399,040,361 | 546,647,561 |
| 54 | 5,201 | 5,300 | 1,196 | 220,321 | 6,214,269 | 405,254,630 | 549,361,630 |
| 55 | 5,301 | 5,400 | 1,091 | 221,412 | 5,777,985 | 411,032,615 | 551,967,215 |
| 56 | 5,401 | 5,500 | 1,046 | 222,458 | 5,642,276 | 416,674,892 | 554,466,392 |
| 57 | 5,501 | 5,600 | 1,042 | 223,500 | 5,725,133 | 422,400,024 | 556,861,624 |
| 58 | 5,601 | 5,700 | 932 | 224,432 | 5,212,516 | 427,612,540 | 559,162,840 |
| 59 | 5,701 | 5,800 | 961 | 225,393 | 5,469,617 | 433,082,158 | 561,366,558 |
| 60 | 5,801 | 5,900 | 930 | 226,323 | 5,386,317 | 438,468,474 | 563,477,674 |
| 61 | 5,901 | 6,000 | 860 | 227,183 | 5,064,925 | 443,533,400 | 565,501,400 |
| 62 | 6,001 | 6,100 | 863 | 228,046 | 5,168,149 | 448,701,548 | 567,438,048 |
| 63 | 6,101 | 6,200 | 829 | 228,875 | 5,047,211 | 453,748,759 | 569,291,959 |
| 64 | 6,201 | 6,300 | 786 | 229,661 | 4,863,286 | 458,612,045 | 571,067,045 |
| 65 | 6,301 | 6,400 | 704 | 230,365 | 4,424,780 | 463,036,825 | 572,771,225 |
| 66 | 6,401 | 6,500 | 730 | 231,095 | 4,660,813 | 467,697,638 | 574,401,638 |
| 67 | 6,501 | 6,600 | 642 | 231,737 | 4,163,932 | 471,861,570 | 575,969,970 |
| 68 | 6,601 | 6,700 | 631 | 232,368 | 4,154,739 | 476,016,309 | 577,474,409 |
| 69 | 6,701 | 6,800 | 650 | 233,018 | 4,343,027 | 480,359,336 | 578,911,736 |
| 70 | 6,801 | 6,900 | 647 | 233,665 | 4,386,530 | 484,745,866 | 580,283,266 |
| 71 | 6,901 | 7,000 | 568 | 234,233 | 3,907,860 | 488,653,726 | 581,599,726 |
| 72 | 7,001 | 7,100 | 544 | 234,777 | 3,796,449 | 492,450,175 | 582,861,575 |
| 73 | 7,101 | 7,200 | 527 | 235,304 | 3,731,733 | 496,181,908 | 584,072,308 |
| 74 | 7,201 | 7,300 | 503 | 235,807 | 3,610,438 | 499,792,346 | 585,231,546 |
| 75 | 7,301 | 7,400 | 478 | 236,285 | 3,477,692 | 503,270,039 | 586,342,439 |
| 76 | 7,401 | 7,500 | 473 | 236,758 | 3,487,753 | 506,757,791 | 587,405,291 |
| 77 | 7,501 | 7,600 | 472 | 237,230 | 3,527,538 | 510,285,330 | 588,420,930 |
| 78 | 7,601 | 7,700 | 411 | 237,641 | 3,112,645 | 513,397,975 | 589,396,975 |
| 79 | 7,701 | 7,800 | 405 | 238,046 | 3,108,131 | 516,506,106 | 590,333,106 |
| 80 | 7,801 | 7,900 | 405 | 238,451 | 3,147,180 | 519,653,285 | 591,227,285 |
| 81 | 7,901 | 8,000 | 336 | 238,787 | 2,644,095 | 522,297,380 | 592,089,380 |
| 82 | 8,001 | 8,100 | 350 | 239,137 | 2,789,092 | 525,086,473 | 592,915,873 |
| 83 | 8,101 | 8,200 | 342 | 239,479 | 2,758,779 | 527,845,251 | 593,707,651 |
| 84 | 8,201 | 8,300 | 320 | 239,799 | 2,612,395 | 530,457,647 | 594,467,247 |
| 85 | 8,301 | 8,400 | 329 | 240,128 | 2,719,234 | 533,176,880 | 595,194,080 |
| 86 | 8,401 | 8,500 | 307 | 240,435 | 2,567,478 | 535,744,358 | 595,890,358 |
| 87 | 8,501 | 8,600 | 297 | 240,732 | 2,513,706 | 538,258,064 | 596,557,464 |
| 88 | 8,601 | 8,700 | 294 | 241,026 | 2,516,716 | 540,774,779 | 597,194,279 |
| 89 | 8,701 | 8,800 | 260 | 241,286 | 2,251,648 | 543,026,428 | 597,806,428 |
| 90 | 8,801 | 8,900 | 247 | 241,533 | 2,163,700 | 545,190,128 | 598,394,328 |
| 91 | 8,901 | 9,000 | 222 | 241,755 | 1,966,087 | 547,156,216 | 598,960,216 |
| 92 | 9,001 | 9,100 | 237 | 241,992 | 2,122,330 | 549,278,546 | 599,501,446 |
| 93 | 9,101 | 9,200 | 238 | 242,230 | 2,156,013 | 551,434,559 | 600,019,759 |
| 94 | 9,201 | 9,300 | 208 | 242,438 | 1,904,096 | 553,338,655 | 600,517,555 |
| 95 | 9,301 | 9,400 | 197 | 242,635 | 1,824,145 | 555,162,800 | 600,997,200 |
| 96 | 9,401 | 9,500 | 177 | 242,812 | 1,656,124 | 556,818,924 | 601,459,424 |
| 97 | 9,501 | 9,600 | 178 | 242,990 | 1,683,060 | 558,501,984 | 601,903,584 |
| 98 | 9,601 | 9,700 | 214 | 243,204 | 2,044,700 | 560,546,684 | 602,324,584 |
| 99 | 9,701 | 9,800 | 167 | 243,371 | 1,611,492 | 562,158,177 | 602,730,177 |
| 100 | 9,801 | 9,900 | 147 | 243,518 | 1,433,452 | 563,591,629 | 603,122,329 |
| 101 | 9,901 | 10,000 | 148 | 243,666 | 1,458,006 | 565,049,635 | 603,499,635 |
| 102 | 10,001 | 11,000 | 1,178 | 244,844 | 12,212,941 | 577,262,576 | 606,599,576 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 103 | 11,001 | 12,000 | 832 | 245,676 | 9,442,318 | 586,704,894 | 608,724,894 |
| 104 | 12,001 | 13,000 | 521 | 246,197 | 6,441,239 | 593,146,133 | 610,228,133 |
| 105 | 13,001 | 14,000 | 347 | 246,544 | 4,624,656 | 597,770,789 | 611,308,789 |
| 106 | 14,001 | 15,000 | 219 | 246,763 | 3,143,374 | 600,914,162 | 612,134,162 |
| 107 | 15,001 | 16,000 | 173 | 246,936 | 2,648,447 | 603,562,610 | 612,762,610 |
| 108 | 16,001 | 17,000 | 102 | 247,038 | 1,664,853 | 605,227,463 | 613,268,463 |
| 109 | 17,001 | 18,000 | 70 | 247,108 | 1,208,794 | 606,436,257 | 613,690,257 |
| 110 | 18,001 | 19,000 | 49 | 247,157 | 896,122 | 607,332,379 | 614,058,379 |
| 111 | 19,001 | 20,000 | 36 | 247,193 | 693,698 | 608,026,077 | 614,386,077 |
| 112 | 20,001 | 21,000 | 27 | 247,220 | 546,297 | 608,572,373 | 614,683,373 |
| 113 | 21,001 | 22,000 | 34 | 247,254 | 722,968 | 609,295,341 | 614,949,341 |
| 114 | 22,001 | 23,000 | 17 | 247,271 | 378,397 | 609,673,738 | 615,193,738 |
| 115 | 23,001 | 24,000 | 11 | 247,282 | 255,383 | 609,929,121 | 615,425,121 |
| 116 | 24,001 | 25,000 | 15 | 247,297 | 362,489 | 610,291,610 | 615,641,610 |
| 117 | 25,001 | 26,000 | 6 | 247,303 | 151,729 | 610,443,340 | 615,851,340 |
| 118 | 26,001 | 27,000 | 12 | 247,315 | 314,842 | 610,758,182 | 616,050,182 |
| 119 | 27,001 | 28,000 | 2 | 247,317 | 54,310 | 610,812,492 | 616,244,492 |
| 120 | 28,001 | 29,000 | 11 | 247,328 | 309,248 | 611,121,740 | 616,428,740 |
| 121 | 29,001 | 30,000 | 4 | 247,332 | 116,457 | 611,238,197 | 616,608,197 |
| 122 | 30,001 | 31,000 | 6 | 247,338 | 181,096 | 611,419,293 | 616,782,293 |
| 123 | 31,001 | 32,000 | 4 | 247,342 | 123,773 | 611,543,066 | 616,951,066 |
| 124 | 32,001 | 33,000 | 6 | 247,348 | 192,678 | 611,735,744 | 617,114,744 |
| 125 | 33,001 | 34,000 | 7 | 247,355 | 231,822 | 611,967,566 | 617,271,566 |
| 126 | 34,001 | 35,000 | 5 | 247,360 | 170,487 | 612,138,052 | 617,423,052 |
| 127 | 35,001 | 36,000 | 5 | 247,365 | 176,387 | 612,314,439 | 617,570,439 |
| 128 | 36,001 | 37,000 | 5 | 247,370 | 180,566 | 612,495,005 | 617,712,005 |
| 129 | 37,001 | 38,000 | 2 | 247,372 | 73,804 | 612,568,809 | 617,850,809 |
| 130 | 38,001 | 39,000 | 5 | 247,377 | 190,482 | 612,759,292 | 617,985,292 |
| 131 | 39,001 | 40,000 | 5 | 247,382 | 195,534 | 612,954,826 | 618,114,826 |
| 132 | 40,001 | 41,000 | 11 | 247,393 | 439,656 | 613,394,482 | 618,232,482 |
| 133 | 41,001 | 42,000 | 5 | 247,398 | 205,167 | 613,599,649 | 618,345,649 |
| 134 | 42,001 | 43,000 | 8 | 247,406 | 336,328 | 613,935,977 | 618,450,977 |
| 135 | 43,001 | 44,000 | 7 | 247,413 | 300,220 | 614,236,197 | 618,548,197 |
| 136 | 44,001 | 45,000 | 2 | 247,415 | 87,935 | 614,324,132 | 618,644,132 |
| 137 | 45,001 | 46,000 | 2 | 247,417 | 90,743 | 614,414,875 | 618,738,875 |
| 138 | 46,001 | 47,000 | 5 | 247,422 | 228,782 | 614,643,657 | 618,826,657 |
| 139 | 47,001 | 48,000 | 1 | 247,423 | 47,497 | 614,691,155 | 618,915,155 |
| 140 | 48,001 | 49,000 | 2 | 247,425 | 95,878 | 614,787,032 | 619,001,032 |
| 141 | 49,001 | 50,000 | 1 | 247,426 | 48,895 | 614,835,927 | 619,085,927 |
| 142 | 50,001 | 51,000 | 4 | 247,430 | 199,787 | 615,035,714 | 619,166,714 |
| 143 | 52,001 | 53,000 | 7 | 247,437 | 362,993 | 615,398,707 | 619,320,707 |
| 144 | 53,001 | 54,000 | 3 | 247,440 | 158,507 | 615,557,213 | 619,391,213 |
| 145 | 54,001 | 55,000 | 1 | 247,441 | 53,619 | 615,610,833 | 619,460,833 |
| 146 | 55,001 | 56,000 | 5 | 247,446 | 273,602 | 615,884,435 | 619,524,435 |
| 147 | 56,001 | 57,000 | 3 | 247,449 | 168,440 | 616,052,874 | 619,586,874 |
| 148 | 57,001 | 58,000 | 8 | 247,457 | 453,932 | 616,506,806 | 619,638,806 |
| 149 | 58,001 | 59,000 | 2 | 247,459 | 115,933 | 616,622,739 | 619,690,739 |
| 150 | 59,001 | 60,000 | 1 | 247,460 | 59,073 | 616,681,813 | 619,741,813 |
| 151 | 60,001 | 61,000 | 3 | 247,463 | 179,227 | 616,861,039 | 619,789,039 |
| 152 | 61,001 | 62,000 | 3 | 247,466 | 183,179 | 617,044,219 | 619,834,219 |
| 153 | 62,001 | 63,000 | 1 | 247,467 | 61,748 | 617,105,967 | 619,877,967 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | 63,001 | 64,000 | 1 | 247,468 | 62,917 | 617,168,884 | 619,920,884 |
| 155 | 65,001 | 66,000 | 1 | 247,469 | 64,670 | 617,233,554 | 620,005,554 |
| 156 | 66,001 | 67,000 | 2 | 247,471 | 131,676 | 617,365,230 | 620,045,230 |
| 157 | 68,001 | 69,000 | 1 | 247,472 | 67,683 | 617,432,913 | 620,123,913 |
| 158 | 69,001 | 70,000 | 1 | 247,473 | 69,180 | 617,502,093 | 620,162,093 |
| 159 | 70,001 | 71,000 | 1 | 247,474 | 70,057 | 617,572,149 | 620,199,149 |
| 160 | 71,001 | 72,000 | 2 | 247,476 | 141,355 | 617,713,504 | 620,233,504 |
| 161 | 74,001 | 75,000 | 1 | 247,477 | 73,680 | 617,787,183 | 620,337,183 |
| 162 | 76,001 | 77,000 | 1 | 247,478 | 76,113 | 617,863,296 | 620,404,296 |
| 163 | 80,001 | 81,000 | 4 | 247,482 | 319,314 | 618,182,610 | 620,531,610 |
| 164 | 81,001 | 82,000 | 2 | 247,484 | 161,262 | 618,343,873 | 620,557,873 |
| 165 | 83,001 | 84,000 | 1 | 247,485 | 82,997 | 618,426,869 | 620,610,869 |
| 166 | 84,001 | 85,000 | 1 | 247,486 | 83,561 | 618,510,430 | 620,635,430 |
| 167 | 86,001 | 87,000 | 2 | 247,488 | 170,921 | 618,681,352 | 620,682,352 |
| 168 | 87,001 | 88,000 | 3 | 247,491 | 259,340 | 618,940,692 | 620,700,692 |
| 169 | 90,001 | 91,000 | 2 | 247,493 | 179,710 | 619,120,402 | 620,758,402 |
| 170 | 94,001 | 95,000 | 1 | 247,494 | 93,999 | 619,214,401 | 620,829,401 |
| 171 | 97,001 | 98,000 | 2 | 247,496 | 193,742 | 619,408,142 | 620,878,142 |
| 172 | 100,001 | 110,000 | 3 | 247,499 | 308,326 | 619,716,469 | 621,036,469 |
| 173 | 110,001 | 120,000 | 2 | 247,501 | 227,497 | 619,943,966 | 621,143,966 |
| 174 | 120,001 | 130,000 | 2 | 247,503 | 239,940 | 620,183,906 | 621,223,906 |
| 175 | 130,001 | 140,000 | 1 | 247,504 | 134,852 | 620,318,759 | 621,298,759 |
| 176 | 140,001 | 150,000 | 2 | 247,506 | 287,286 | 620,606,045 | 621,356,045 |
| 177 | 170,001 | 180,000 | 1 | 247,507 | 168,370 | 620,774,415 | 621,494,415 |
| 178 | 180,001 | 190,000 | 1 | 247,508 | 186,317 | 620,960,732 | 621,530,732 |
| 179 | 200,001 | 210,000 | 2 | 247,510 | 400,492 | 621,361,224 | 621,571,224 |
| 180 | 240,001 | 250,000 | 1 | 247,511 | 243,523 | 621,604,747 | 621,604,747 |

Duquesne Light Company
Bill Frequency Distribution
Rate GM>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 6 of 13
Page 1 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 429 | 429 | 0 | 0 | 0 |
| 2 | 1 | 100 | 440 | 869 | 17,614 | 17,614 | 8,064,814 |
| 3 | 101 | 200 | 262 | 1,131 | 39,607 | 57,221 | 16,099,221 |
| 4 | 201 | 300 | 212 | 1,343 | 52,160 | 109,381 | 24,108,781 |
| 5 | 301 | 400 | 197 | 1,540 | 69,297 | 178,678 | 32,099,078 |
| 6 | 401 | 500 | 189 | 1,729 | 90,802 | 269,480 | 40,075,480 |
| 7 | 501 | 600 | 184 | 1,913 | 100,980 | 370,460 | 48,027,260 |
| 8 | 601 | 700 | 180 | 2,093 | 116,926 | 487,386 | 55,960,986 |
| 9 | 701 | 800 | 180 | 2,273 | 134,738 | 622,123 | 63,876,523 |
| 10 | 801 | 900 | 182 | 2,455 | 154,629 | 776,753 | 71,774,153 |
| 11 | 901 | 1,000 | 196 | 2,651 | 186,696 | 963,449 | 79,653,449 |
| 12 | 1,001 | 1,100 | 173 | 2,824 | 181,780 | 1,145,229 | 87,513,929 |
| 13 | 1,101 | 1,200 | 173 | 2,997 | 199,022 | 1,344,251 | 95,357,051 |
| 14 | 1,201 | 1,300 | 200 | 3,197 | 250,019 | 1,594,270 | 103,181,470 |
| 15 | 1,301 | 1,400 | 189 | 3,386 | 255,633 | 1,849,902 | 110,986,902 |
| 16 | 1,401 | 1,500 | 217 | 3,603 | 314,407 | 2,164,309 | 118,771,309 |
| 17 | 1,501 | 1,600 | 226 | 3,829 | 350,433 | 2,514,743 | 126,533,943 |
| 18 | 1,601 | 1,700 | 192 | 4,021 | 316,268 | 2,831,011 | 134,275,011 |
| 19 | 1,701 | 1,800 | 208 | 4,229 | 381,362 | 3,212,373 | 142,013,973 |
| 20 | 1,801 | 1,900 | 207 | 4,436 | 382,509 | 3,594,882 | 149,714,382 |
| 21 | 1,901 | 2,000 | 179 | 4,615 | 349,083 | 3,943,965 | 157,395,965 |
| 22 | 2,001 | 2,100 | 227 | 4,842 | 464,691 | 4,408,656 | 165,056,556 |
| 23 | 2,101 | 2,200 | 205 | 5,047 | 461,325 | 4,869,982 | 172,716,782 |
| 24 | 2,201 | 2,300 | 211 | 5,258 | 473,481 | 5,343,462 | 180,334,362 |
| 25 | 2,301 | 2,400 | 230 | 5,488 | 539,151 | 5,882,613 | 187,929,813 |
| 26 | 2,401 | 2,500 | 218 | 5,706 | 532,954 | 6,415,567 | 195,503,067 |
| 27 | 2,501 | 2,600 | 247 | 5,953 | 654,154 | 7,069,722 | 203,078,522 |
| 28 | 2,601 | 2,700 | 239 | 6,192 | 631,948 | 7,701,670 | 210,603,970 |
| 29 | 2,701 | 2,800 | 230 | 6,422 | 630,811 | 8,332,481 | 218,105,681 |
| 30 | 2,801 | 2,900 | 283 | 6,705 | 805,231 | 9,137,711 | 225,582,111 |
| 31 | 2,901 | 3,000 | 234 | 6,939 | 717,973 | 9,855,684 | 233,061,684 |
| 32 | 3,001 | 3,100 | 265 | 7,204 | 806,068 | 10,661,752 | 240,486,452 |
| 33 | 3,101 | 3,200 | 247 | 7,451 | 775,773 | 11,437,526 | 247,885,526 |
| 34 | 3,201 | 3,300 | 308 | 7,759 | 1,031,602 | 12,469,128 | 255,289,728 |
| 35 | 3,301 | 3,400 | 272 | 8,031 | 908,328 | 13,377,456 | 262,631,456 |
| 36 | 3,401 | 3,500 | 297 | 8,328 | 1,022,702 | 14,400,158 | 269,945,658 |
| 37 | 3,501 | 3,600 | 277 | 8,605 | 979,783 | 15,379,940 | 277,229,540 |
| 38 | 3,601 | 3,700 | 276 | 8,881 | 1,040,876 | 16,420,816 | 284,522,816 |
| 39 | 3,701 | 3,800 | 281 | 9,162 | 1,088,544 | 17,509,359 | 291,789,559 |
| 40 | 3,801 | 3,900 | 288 | 9,450 | 1,143,113 | 18,652,472 | 299,027,372 |
| 41 | 3,901 | 4,000 | 288 | 9,738 | 1,133,849 | 19,786,322 | 306,198,322 |
| 42 | 4,001 | 4,100 | 314 | 10,052 | 1,268,095 | 21,054,417 | 313,339,317 |
| 43 | 4,101 | 4,200 | 328 | 10,380 | 1,357,548 | 22,411,965 | 320,448,165 |
| 44 | 4,201 | 4,300 | 297 | 10,677 | 1,258,053 | 23,670,018 | 327,525,218 |
| 45 | 4,301 | 4,400 | 293 | 10,970 | 1,269,880 | 24,939,899 | 334,572,299 |
| 46 | 4,401 | 4,500 | 341 | 11,311 | 1,512,118 | 26,452,017 | 341,587,017 |
| 47 | 4,501 | 4,600 | 329 | 11,640 | 1,491,982 | 27,943,999 | 348,568,599 |
| 48 | 4,601 | 4,700 | 322 | 11,962 | 1,491,897 | 29,435,896 | 355,517,196 |

Bill Frequency Distribution
Rate GM>25-12 Months Ending December 31, 2020

Part 6 of 13
Page 2 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 49 | 4,701 | 4,800 | 345 | 12,307 | 1,632,176 | 31,068,072 | 362,431,272 |
| 50 | 4,801 | 4,900 | 324 | 12,631 | 1,564,551 | 32,632,624 | 369,311,624 |
| 51 | 4,901 | 5,000 | 342 | 12,973 | 1,687,202 | 34,319,826 | 376,159,826 |
| 52 | 5,001 | 5,100 | 354 | 13,327 | 1,779,601 | 36,099,427 | 382,970,827 |
| 53 | 5,101 | 5,200 | 383 | 13,710 | 1,964,963 | 38,064,390 | 389,745,590 |
| 54 | 5,201 | 5,300 | 377 | 14,087 | 1,972,173 | 40,036,563 | 396,482,763 |
| 55 | 5,301 | 5,400 | 362 | 14,449 | 1,928,675 | 41,965,238 | 403,182,038 |
| 56 | 5,401 | 5,500 | 370 | 14,819 | 2,007,499 | 43,972,737 | 409,843,737 |
| 57 | 5,501 | 5,600 | 371 | 15,190 | 2,049,792 | 46,022,529 | 416,468,129 |
| 58 | 5,601 | 5,700 | 369 | 15,559 | 2,076,825 | 48,099,354 | 423,056,754 |
| 59 | 5,701 | 5,800 | 348 | 15,907 | 1,992,072 | 50,091,425 | 429,608,625 |
| 60 | 5,801 | 5,900 | 366 | 16,273 | 2,132,157 | 52,223,583 | 436,124,783 |
| 61 | 5,901 | 6,000 | 369 | 16,642 | 2,185,673 | 54,409,256 | 442,603,256 |
| 62 | 6,001 | 6,100 | 346 | 16,988 | 2,082,440 | 56,491,696 | 449,044,996 |
| 63 | 6,101 | 6,200 | 358 | 17,346 | 2,190,457 | 58,682,153 | 455,451,153 |
| 64 | 6,201 | 6,300 | 342 | 17,688 | 2,126,687 | 60,808,840 | 461,822,740 |
| 65 | 6,301 | 6,400 | 374 | 18,062 | 2,363,242 | 63,172,081 | 468,157,681 |
| 66 | 6,401 | 6,500 | 338 | 18,400 | 2,167,107 | 65,339,188 | 474,455,688 |
| 67 | 6,501 | 6,600 | 399 | 18,799 | 2,601,164 | 67,940,352 | 480,717,552 |
| 68 | 6,601 | 6,700 | 393 | 19,192 | 2,601,122 | 70,541,474 | 486,939,774 |
| 69 | 6,701 | 6,800 | 352 | 19,544 | 2,361,932 | 72,903,406 | 493,123,006 |
| 70 | 6,801 | 6,900 | 413 | 19,957 | 2,813,584 | 75,716,990 | 499,266,590 |
| 71 | 6,901 | 7,000 | 388 | 20,345 | 2,681,478 | 78,398,468 | 505,370,468 |
| 72 | 7,001 | 7,100 | 366 | 20,711 | 2,565,650 | 80,964,118 | 511,437,118 |
| 73 | 7,101 | 7,200 | 351 | 21,062 | 2,493,863 | 83,457,981 | 517,466,781 |
| 74 | 7,201 | 7,300 | 347 | 21,409 | 2,571,755 | 86,029,736 | 523,533,336 |
| 75 | 7,301 | 7,400 | 363 | 21,772 | 2,651,224 | 88,680,960 | 529,491,560 |
| 76 | 7,401 | 7,500 | 380 | 22,152 | 2,812,937 | 91,493,897 | 535,411,397 |
| 77 | 7,501 | 7,600 | 391 | 22,543 | 2,933,116 | 94,427,012 | 541,291,812 |
| 78 | 7,601 | 7,700 | 389 | 22,932 | 3,111,242 | 97,538,254 | 547,287,554 |
| 79 | 7,701 | 7,800 | 373 | 23,305 | 2,949,462 | 100,487,716 | 553,168,516 |
| 80 | 7,801 | 7,900 | 340 | 23,645 | 2,649,605 | 103,137,322 | 558,935,722 |
| 81 | 7,901 | 8,000 | 372 | 24,017 | 3,017,515 | 106,154,837 | 564,746,837 |
| 82 | 8,001 | 8,100 | 327 | 24,344 | 2,692,084 | 108,846,920 | 570,522,620 |
| 83 | 8,101 | 8,200 | 359 | 24,703 | 2,904,101 | 111,751,022 | 576,182,622 |
| 84 | 8,201 | 8,300 | 350 | 25,053 | 2,865,816 | 114,616,837 | 581,807,237 |
| 85 | 8,301 | 8,400 | 339 | 25,392 | 2,891,366 | 117,508,203 | 587,479,803 |
| 86 | 8,401 | 8,500 | 362 | 25,754 | 3,120,451 | 120,628,654 | 593,118,154 |
| 87 | 8,501 | 8,600 | 347 | 26,101 | 2,943,623 | 123,572,277 | 598,636,277 |
| 88 | 8,601 | 8,700 | 354 | 26,455 | 3,037,991 | 126,610,268 | 604,118,468 |
| 89 | 8,701 | 8,800 | 347 | 26,802 | 3,099,077 | 129,709,345 | 609,652,545 |
| 90 | 8,801 | 8,900 | 361 | 27,163 | 3,169,458 | 132,878,803 | 615,063,003 |
| 91 | 8,901 | 9,000 | 339 | 27,502 | 3,097,242 | 135,976,046 | 620,527,046 |
| 92 | 9,001 | 9,100 | 353 | 27,855 | 3,167,980 | 139,144,025 | 625,866,625 |
| 93 | 9,101 | 9,200 | 341 | 28,196 | 3,093,305 | 142,237,331 | 631,171,331 |
| 94 | 9,201 | 9,300 | 319 | 28,515 | 3,015,703 | 145,253,034 | 636,534,834 |
| 95 | 9,301 | 9,400 | 344 | 28,859 | 3,187,205 | 148,440,239 | 641,771,039 |
| 96 | 9,401 | 9,500 | 317 | 29,176 | 2,966,889 | 151,407,128 | 646,974,628 |

Duquesne Light Company
Bill Frequency Distribution
Rate GM>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 6 of 13
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 97 | 9,501 | 9,600 | 358 | 29,534 | 3,389,355 | 154,796,483 | 652,143,683 |
| 98 | 9,601 | 9,700 | 336 | 29,870 | 3,212,900 | 158,009,383 | 657,278,083 |
| 99 | 9,701 | 9,800 | 297 | 30,167 | 2,864,982 | 160,874,365 | 662,379,565 |
| 100 | 9,801 | 9,900 | 331 | 30,498 | 3,228,659 | 164,103,024 | 667,448,724 |
| 101 | 9,901 | 10,000 | 313 | 30,811 | 3,082,212 | 167,185,236 | 672,485,236 |
| 102 | 10,001 | 11,000 | 3,183 | 33,994 | 34,423,047 | 201,608,283 | 722,425,283 |
| 103 | 11,001 | 12,000 | 2,878 | 36,872 | 34,189,070 | 235,797,353 | 769,425,353 |
| 104 | 12,001 | 13,000 | 2,678 | 39,550 | 34,679,304 | 270,476,657 | 813,759,657 |
| 105 | 13,001 | 14,000 | 2,435 | 41,985 | 34,143,020 | 304,619,677 | 855,603,677 |
| 106 | 14,001 | 15,000 | 2,215 | 44,200 | 33,499,442 | 338,119,120 | 895,234,120 |
| 107 | 15,001 | 16,000 | 2,050 | 46,250 | 31,685,110 | 369,804,230 | 931,260,230 |
| 108 | 16,001 | 17,000 | 1,731 | 47,981 | 30,112,988 | 399,917,219 | 967,037,219 |
| 109 | 17,001 | 18,000 | 1,618 | 49,599 | 29,969,188 | 429,886,407 | 1,001,242,407 |
| 110 | 18,001 | 19,000 | 1,614 | 51,213 | 29,768,708 | 459,655,114 | 1,032,087,114 |
| 111 | 19,001 | 20,000 | 1,442 | 52,655 | 29,957,061 | 489,612,175 | 1,063,332,175 |
| 112 | 20,001 | 21,000 | 1,336 | 53,991 | 29,334,044 | 518,946,219 | 1,093,296,219 |
| 113 | 21,001 | 22,000 | 1,211 | 55,202 | 28,076,379 | 547,022,598 | 1,122,080,598 |
| 114 | 22,001 | 23,000 | 1,132 | 56,334 | 25,354,108 | 572,376,706 | 1,147,537,706 |
| 115 | 23,001 | 24,000 | 1,048 | 57,382 | 24,978,574 | 597,355,280 | 1,172,371,280 |
| 116 | 24,001 | 25,000 | 972 | 58,354 | 23,671,378 | 621,026,658 | 1,195,701,658 |
| 117 | 25,001 | 26,000 | 949 | 59,303 | 24,055,223 | 645,081,881 | 1,218,069,881 |
| 118 | 26,001 | 27,000 | 850 | 60,153 | 22,395,294 | 667,477,176 | 1,239,553,176 |
| 119 | 27,001 | 28,000 | 749 | 60,902 | 20,478,998 | 687,956,173 | 1,260,248,173 |
| 120 | 28,001 | 29,000 | 766 | 61,668 | 21,687,998 | 709,644,171 | 1,280,161,171 |
| 121 | 29,001 | 30,000 | 714 | 62,382 | 20,912,338 | 730,556,510 | 1,299,326,510 |
| 122 | 30,001 | 31,000 | 658 | 63,040 | 19,916,981 | 750,473,491 | 1,317,804,491 |
| 123 | 31,001 | 32,000 | 682 | 63,722 | 21,335,577 | 771,809,068 | 1,335,617,068 |
| 124 | 32,001 | 33,000 | 658 | 64,380 | 21,224,040 | 793,033,109 | 1,352,746,109 |
| 125 | 33,001 | 34,000 | 575 | 64,955 | 19,117,271 | 812,150,380 | 1,369,274,380 |
| 126 | 34,001 | 35,000 | 604 | 65,559 | 21,019,307 | 833,169,687 | 1,385,539,687 |
| 127 | 35,001 | 36,000 | 523 | 66,082 | 18,406,818 | 851,576,505 | 1,400,900,505 |
| 128 | 36,001 | 37,000 | 508 | 66,590 | 18,737,471 | 870,313,976 | 1,416,100,976 |
| 129 | 37,001 | 38,000 | 463 | 67,053 | 17,182,515 | 887,496,491 | 1,430,440,491 |
| 130 | 38,001 | 39,000 | 528 | 67,581 | 20,153,436 | 907,649,927 | 1,444,289,927 |
| 131 | 39,001 | 40,000 | 438 | 68,019 | 17,506,655 | 925,156,582 | 1,458,036,582 |
| 132 | 40,001 | 41,000 | 446 | 68,465 | 17,871,077 | 943,027,659 | 1,470,943,659 |
| 133 | 41,001 | 42,000 | 440 | 68,905 | 18,080,692 | 961,108,351 | 1,483,420,351 |
| 134 | 42,001 | 43,000 | 406 | 69,311 | 17,532,583 | 978,640,934 | 1,495,930,934 |
| 135 | 43,001 | 44,000 | 381 | 69,692 | 16,383,454 | 995,024,388 | 1,507,580,388 |
| 136 | 44,001 | 45,000 | 405 | 70,097 | 17,827,451 | 1,012,851,839 | 1,518,831,839 |
| 137 | 45,001 | 46,000 | 366 | 70,463 | 16,458,078 | 1,029,309,917 | 1,529,697,917 |
| 138 | 46,001 | 47,000 | 388 | 70,851 | 17,839,467 | 1,047,149,384 | 1,540,179,384 |
| 139 | 47,001 | 48,000 | 335 | 71,186 | 15,710,849 | 1,062,860,233 | 1,550,300,233 |
| 140 | 48,001 | 49,000 | 327 | 71,513 | 15,645,558 | 1,078,505,791 | 1,560,077,791 |
| 141 | 49,001 | 50,000 | 321 | 71,834 | 15,665,811 | 1,094,171,602 | 1,569,521,602 |
| 142 | 50,001 | 51,000 | 247 | 72,081 | 12,254,807 | 1,106,426,409 | 1,578,686,409 |
| 143 | 51,001 | 52,000 | 270 | 72,351 | 13,691,846 | 1,120,118,255 | 1,587,598,255 |
| 144 | 52,001 | 53,000 | 282 | 72,633 | 14,582,716 | 1,134,700,971 | 1,596,224,971 |

Duquesne Light Company
Bill Frequency Distribution
Rate GM>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 6 of 13
Page 4 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 145 | 53,001 | 54,000 | 279 | 72,912 | 14,705,435 | 1,149,406,406 | 1,604,572,406 |
| 146 | 54,001 | 55,000 | 246 | 73,158 | 13,193,547 | 1,162,599,953 | 1,612,664,953 |
| 147 | 55,001 | 56,000 | 265 | 73,423 | 14,475,086 | 1,177,075,039 | 1,620,483,039 |
| 148 | 56,001 | 57,000 | 208 | 73,631 | 11,521,121 | 1,188,596,160 | 1,628,066,160 |
| 149 | 57,001 | 58,000 | 232 | 73,863 | 13,106,420 | 1,201,702,580 | 1,635,426,580 |
| 150 | 58,001 | 59,000 | 225 | 74,088 | 12,923,937 | 1,214,626,517 | 1,642,553,517 |
| 151 | 59,001 | 60,000 | 212 | 74,300 | 12,377,754 | 1,227,004,272 | 1,649,464,272 |
| 152 | 60,001 | 61,000 | 217 | 74,517 | 12,890,236 | 1,239,894,508 | 1,656,158,508 |
| 153 | 61,001 | 62,000 | 198 | 74,715 | 11,929,999 | 1,251,824,508 | 1,662,636,508 |
| 154 | 62,001 | 63,000 | 175 | 74,890 | 10,688,556 | 1,262,513,063 | 1,668,926,063 |
| 155 | 63,001 | 64,000 | 175 | 75,065 | 10,868,245 | 1,273,381,309 | 1,675,045,309 |
| 156 | 64,001 | 65,000 | 173 | 75,238 | 10,909,595 | 1,284,290,904 | 1,680,985,904 |
| 157 | 65,001 | 66,000 | 151 | 75,389 | 9,648,158 | 1,293,939,062 | 1,686,771,062 |
| 158 | 66,001 | 67,000 | 178 | 75,567 | 11,582,449 | 1,305,521,511 | 1,692,379,511 |
| 159 | 67,001 | 68,000 | 178 | 75,745 | 11,759,959 | 1,317,281,470 | 1,697,809,470 |
| 160 | 68,001 | 69,000 | 127 | 75,872 | 8,440,902 | 1,325,722,372 | 1,703,083,372 |
| 161 | 69,001 | 70,000 | 148 | 76,020 | 10,031,451 | 1,335,753,823 | 1,708,223,823 |
| 162 | 70,001 | 71,000 | 146 | 76,166 | 10,035,178 | 1,345,789,001 | 1,713,214,001 |
| 163 | 71,001 | 72,000 | 132 | 76,298 | 9,177,509 | 1,354,966,510 | 1,718,062,510 |
| 164 | 72,001 | 73,000 | 136 | 76,434 | 9,593,520 | 1,364,560,029 | 1,722,771,029 |
| 165 | 73,001 | 74,000 | 122 | 76,556 | 8,702,036 | 1,373,262,066 | 1,727,352,066 |
| 166 | 74,001 | 75,000 | 112 | 76,668 | 8,074,242 | 1,381,336,307 | 1,731,811,307 |
| 167 | 75,001 | 76,000 | 116 | 76,784 | 8,489,287 | 1,389,825,595 | 1,736,157,595 |
| 168 | 76,001 | 77,000 | 129 | 76,913 | 9,595,922 | 1,399,421,516 | 1,740,377,516 |
| 169 | 77,001 | 78,000 | 111 | 77,024 | 8,334,857 | 1,407,756,373 | 1,744,482,373 |
| 170 | 78,001 | 79,000 | 106 | 77,130 | 8,043,418 | 1,415,799,791 | 1,748,468,791 |
| 171 | 79,001 | 80,000 | 97 | 77,227 | 7,434,614 | 1,423,234,405 | 1,752,354,405 |
| 172 | 80,001 | 81,000 | 88 | 77,315 | 6,808,305 | 1,430,042,710 | 1,756,148,710 |
| 173 | 81,001 | 82,000 | 97 | 77,412 | 7,626,525 | 1,437,669,235 | 1,759,847,235 |
| 174 | 82,001 | 83,000 | 93 | 77,505 | 7,395,920 | 1,445,065,155 | 1,763,453,155 |
| 175 | 83,001 | 84,000 | 97 | 77,602 | 7,818,564 | 1,452,883,719 | 1,766,959,719 |
| 176 | 84,001 | 85,000 | 88 | 77,690 | 7,150,291 | 1,460,034,010 | 1,770,369,010 |
| 177 | 85,001 | 86,000 | 82 | 77,772 | 6,726,408 | 1,466,760,419 | 1,773,694,419 |
| 178 | 86,001 | 87,000 | 91 | 77,863 | 7,586,958 | 1,474,347,376 | 1,776,933,376 |
| 179 | 87,001 | 88,000 | 77 | 77,940 | 6,455,732 | 1,480,803,108 | 1,780,091,108 |
| 180 | 88,001 | 89,000 | 73 | 78,013 | 6,174,855 | 1,486,977,963 | 1,783,169,963 |
| 181 | 89,001 | 90,000 | 97 | 78,110 | 8,389,846 | 1,495,367,809 | 1,786,157,809 |
| 182 | 90,001 | 91,000 | 80 | 78,190 | 6,948,597 | 1,502,316,406 | 1,789,057,406 |
| 183 | 91,001 | 92,000 | 87 | 78,277 | 7,666,707 | 1,509,983,113 | 1,791,871,113 |
| 184 | 92,001 | 93,000 | 82 | 78,359 | 7,293,118 | 1,517,276,230 | 1,794,602,230 |
| 185 | 93,001 | 94,000 | 77 | 78,436 | 6,900,081 | 1,524,176,312 | 1,797,246,312 |
| 186 | 94,001 | 95,000 | 64 | 78,500 | 5,751,947 | 1,529,928,258 | 1,799,823,258 |
| 187 | 95,001 | 96,000 | 69 | 78,569 | 6,291,351 | 1,536,219,610 | 1,802,331,610 |
| 188 | 96,001 | 97,000 | 67 | 78,636 | 6,165,578 | 1,542,385,188 | 1,804,770,188 |
| 189 | 97,001 | 98,000 | 60 | 78,696 | 5,548,381 | 1,547,933,569 | 1,807,143,569 |
| 190 | 98,001 | 99,000 | 67 | 78,763 | 6,295,330 | 1,554,228,899 | 1,809,450,899 |
| 191 | 99,001 | 100,000 | 69 | 78,832 | 6,563,420 | 1,560,792,319 | 1,811,692,319 |
| 192 | 100,001 | 110,000 | 576 | 79,408 | 60,225,972 | 1,621,018,291 | 1,833,648,291 |

Duquesne Light Company
Bill Frequency Distribution
Rate GM>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 6 of 13
Page 5 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 | 110,001 | 120,000 | 428 | 79,836 | 48,863,459 | 1,669,881,750 | 1,850,481,750 |
| 194 | 120,001 | 130,000 | 343 | 80,179 | 42,392,481 | 1,712,274,230 | 1,863,334,230 |
| 195 | 130,001 | 140,000 | 252 | 80,431 | 33,589,621 | 1,745,863,851 | 1,873,263,851 |
| 196 | 140,001 | 150,000 | 195 | 80,626 | 27,900,299 | 1,773,764,150 | 1,881,014,150 |
| 197 | 150,001 | 160,000 | 122 | 80,748 | 18,512,977 | 1,792,277,127 | 1,887,157,127 |
| 198 | 160,001 | 170,000 | 110 | 80,858 | 17,764,085 | 1,810,041,212 | 1,892,151,212 |
| 199 | 170,001 | 180,000 | 87 | 80,945 | 14,884,178 | 1,824,925,389 | 1,896,205,389 |
| 200 | 180,001 | 190,000 | 76 | 81,021 | 13,679,563 | 1,838,604,952 | 1,899,404,952 |
| 201 | 190,001 | 200,000 | 52 | 81,073 | 9,777,611 | 1,848,382,563 | 1,901,982,563 |
| 202 | 200,001 | 210,000 | 31 | 81,104 | 5,995,910 | 1,854,378,473 | 1,904,148,473 |
| 203 | 210,001 | 220,000 | 28 | 81,132 | 5,637,895 | 1,860,016,368 | 1,905,996,368 |
| 204 | 220,001 | 230,000 | 20 | 81,152 | 4,142,673 | 1,864,159,041 | 1,907,629,041 |
| 205 | 230,001 | 240,000 | 26 | 81,178 | 5,737,237 | 1,869,896,278 | 1,909,016,278 |
| 206 | 240,001 | 250,000 | 15 | 81,193 | 3,294,766 | 1,873,191,044 | 1,910,191,044 |
| 207 | 250,001 | 260,000 | 15 | 81,208 | 3,473,973 | 1,876,665,017 | 1,911,245,017 |
| 208 | 260,001 | 270,000 | 19 | 81,227 | 4,660,963 | 1,881,325,980 | 1,912,105,980 |
| 209 | 270,001 | 280,000 | 8 | 81,235 | 1,822,706 | 1,883,148,686 | 1,912,828,686 |
| 210 | 280,001 | 290,000 | 11 | 81,246 | 2,774,226 | 1,885,922,912 | 1,913,472,912 |
| 211 | 290,001 | 300,000 | 6 | 81,252 | 1,404,318 | 1,887,327,230 | 1,914,027,230 |
| 212 | 300,001 | 310,000 | 7 | 81,259 | 1,771,107 | 1,889,098,337 | 1,914,518,337 |
| 213 | 310,001 | 320,000 | 6 | 81,265 | 1,513,802 | 1,890,612,139 | 1,914,932,139 |
| 214 | 320,001 | 330,000 | 6 | 81,271 | 1,575,768 | 1,892,187,907 | 1,915,287,907 |
| 215 | 330,001 | 340,000 | 3 | 81,274 | 642,453 | 1,892,830,360 | 1,915,610,360 |
| 216 | 340,001 | 350,000 | 7 | 81,281 | 2,043,398 | 1,894,873,758 | 1,915,873,758 |
| 217 | 350,001 | 360,000 | 5 | 81,286 | 1,397,036 | 1,896,270,794 | 1,916,070,794 |
| 218 | 360,001 | 370,000 | 4 | 81,290 | 1,087,442 | 1,897,358,236 | 1,916,228,236 |
| 219 | 370,001 | 380,000 | 1 | 81,291 | 3,871 | 1,897,362,107 | 1,916,362,107 |
| 220 | 380,001 | 390,000 | 8 | 81,299 | 2,701,770 | 1,900,063,876 | 1,916,443,876 |
| 221 | 390,001 | 400,000 | 3 | 81,302 | 813,721 | 1,900,877,598 | 1,916,477,598 |
| 222 | 400,001 | 410,000 | 2 | 81,304 | 439,235 | 1,901,316,833 | 1,916,486,833 |
| 223 | 410,001 | 420,000 | 4 | 81,308 | 1,287,800 | 1,902,604,633 | 1,916,464,633 |
| 224 | 420,001 | 430,000 | 4 | 81,312 | 1,338,921 | 1,903,943,554 | 1,916,413,554 |
| 225 | 440,001 | 450,000 | 7 | 81,319 | 2,735,195 | 1,906,678,749 | 1,916,578,749 |
| 226 | 450,001 | 460,000 | 4 | 81,323 | 1,441,091 | 1,908,119,840 | 1,916,399,840 |
| 227 | 460,001 | 470,000 | 4 | 81,327 | 1,489,541 | 1,909,609,381 | 1,916,189,381 |
| 228 | 470,001 | 480,000 | 1 | 81,328 | 98,126 | 1,909,707,507 | 1,915,947,507 |
| 229 | 480,001 | 490,000 | 2 | 81,330 | 602,202 | 1,910,309,710 | 1,915,699,710 |
| 230 | 490,001 | 500,000 | 3 | 81,333 | 1,117,364 | 1,911,427,074 | 1,915,427,074 |
| 231 | 500,001 | 510,000 | 1 | 81,334 | 131,791 | 1,911,558,865 | 1,915,128,865 |
| 232 | 510,001 | 520,000 | 1 | 81,335 | 139,407 | 1,911,698,271 | 1,914,818,271 |
| 233 | 580,001 | 590,000 | 1 | 81,336 | 208,431 | 1,911,906,702 | 1,914,856,702 |
| 234 | 640,001 | 650,000 | 2 | 81,338 | 912,645 | 1,912,819,347 | 1,914,769,347 |
| 235 | 670,001 | 680,000 | 1 | 81,339 | 297,648 | 1,913,116,995 | 1,914,476,995 |
| 236 | 700,001 | 710,000 | 1 | 81,340 | 328,534 | 1,913,445,529 | 1,914,155,529 |
| 237 | 780,001 | 790,000 | 1 | 81,341 | 410,683 | 1,913,856,212 | 1,913,856,212 |


| kWh Step | Start Range <br> (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage <br> (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 490 | 490 | 0 | 0 | 0 |
| 2 | 1 | 100 | 2,659 | 3,149 | 116,674 | 116,674 | 2,867,574 |
| 3 | 101 | 200 | 1,675 | 4,824 | 254,288 | 370,962 | 5,537,762 |
| 4 | 201 | 300 | 1,614 | 6,438 | 408,644 | 779,607 | 8,045,607 |
| 5 | 301 | 400 | 1,815 | 8,253 | 638,711 | 1,418,318 | 10,380,318 |
| 6 | 401 | 500 | 1,771 | 10,024 | 798,176 | 2,216,494 | 12,533,494 |
| 7 | 501 | 600 | 1,558 | 11,582 | 866,136 | 3,082,630 | 14,528,230 |
| 8 | 601 | 700 | 1,370 | 12,952 | 892,534 | 3,975,164 | 16,369,364 |
| 9 | 701 | 800 | 1,201 | 14,153 | 912,977 | 4,888,142 | 18,092,142 |
| 10 | 801 | 900 | 1,081 | 15,234 | 924,815 | 5,812,956 | 19,694,556 |
| 11 | 901 | 1,000 | 1,032 | 16,266 | 987,999 | 6,800,955 | 21,192,955 |
| 12 | 1,001 | 1,100 | 939 | 17,205 | 994,207 | 7,795,162 | 22,593,462 |
| 13 | 1,101 | 1,200 | 873 | 18,078 | 1,020,042 | 8,815,204 | 23,911,204 |
| 14 | 1,201 | 1,300 | 782 | 18,860 | 987,843 | 9,803,047 | 25,140,447 |
| 15 | 1,301 | 1,400 | 729 | 19,589 | 981,753 | 10,784,800 | 26,281,400 |
| 16 | 1,401 | 1,500 | 731 | 20,320 | 1,071,396 | 11,856,196 | 27,363,196 |
| 17 | 1,501 | 1,600 | 653 | 20,973 | 1,031,012 | 12,887,209 | 28,383,209 |
| 18 | 1,601 | 1,700 | 559 | 21,532 | 935,533 | 13,822,742 | 29,336,942 |
| 19 | 1,701 | 1,800 | 529 | 22,061 | 923,695 | 14,746,437 | 30,221,037 |
| 20 | 1,801 | 1,900 | 467 | 22,528 | 862,661 | 15,609,098 | 31,056,098 |
| 21 | 1,901 | 2,000 | 422 | 22,950 | 838,402 | 16,447,500 | 31,863,500 |
| 22 | 2,001 | 2,100 | 392 | 23,342 | 801,534 | 17,249,034 | 32,612,634 |
| 23 | 2,101 | 2,200 | 387 | 23,729 | 829,327 | 18,078,360 | 33,322,160 |
| 24 | 2,201 | 2,300 | 292 | 24,021 | 655,115 | 18,733,476 | 33,998,576 |
| 25 | 2,301 | 2,400 | 330 | 24,351 | 773,856 | 19,507,331 | 34,644,131 |
| 26 | 2,401 | 2,500 | 299 | 24,650 | 730,456 | 20,237,787 | 35,257,787 |
| 27 | 2,501 | 2,600 | 309 | 24,959 | 786,079 | 21,023,866 | 35,841,266 |
| 28 | 2,601 | 2,700 | 243 | 25,202 | 641,719 | 21,665,585 | 36,396,785 |
| 29 | 2,701 | 2,800 | 251 | 25,453 | 688,550 | 22,354,135 | 36,928,135 |
| 30 | 2,801 | 2,900 | 227 | 25,680 | 645,198 | 22,999,333 | 37,435,533 |
| 31 | 2,901 | 3,000 | 178 | 25,858 | 523,473 | 23,522,807 | 37,922,807 |
| 32 | 3,001 | 3,100 | 173 | 26,031 | 526,270 | 24,049,077 | 38,392,777 |
| 33 | 3,101 | 3,200 | 178 | 26,209 | 560,028 | 24,609,105 | 38,845,905 |
| 34 | 3,201 | 3,300 | 194 | 26,403 | 629,789 | 25,238,894 | 39,280,394 |
| 35 | 3,301 | 3,400 | 174 | 26,577 | 581,967 | 25,820,861 | 39,696,261 |
| 36 | 3,401 | 3,500 | 149 | 26,726 | 512,235 | 26,333,096 | 40,095,096 |
| 37 | 3,501 | 3,600 | 166 | 26,892 | 587,723 | 26,920,819 | 40,478,419 |
| 38 | 3,601 | 3,700 | 137 | 27,029 | 498,810 | 27,419,629 | 40,846,929 |
| 39 | 3,701 | 3,800 | 131 | 27,160 | 490,319 | 27,909,948 | 41,202,348 |
| 40 | 3,801 | 3,900 | 131 | 27,291 | 503,223 | 28,413,171 | 41,544,471 |
| 41 | 3,901 | 4,000 | 132 | 27,423 | 520,363 | 28,933,534 | 41,873,534 |
| 42 | 4,001 | 4,100 | 127 | 27,550 | 512,746 | 29,446,280 | 42,189,080 |
| 43 | 4,101 | 4,200 | 104 | 27,654 | 430,299 | 29,876,579 | 42,493,379 |
| 44 | 4,201 | 4,300 | 109 | 27,763 | 461,862 | 30,338,441 | 42,786,941 |
| 45 | 4,301 | 4,400 | 107 | 27,870 | 464,112 | 30,802,552 | 43,069,752 |
| 46 | 4,401 | 4,500 | 100 | 27,970 | 443,872 | 31,246,424 | 43,342,424 |
| 47 | 4,501 | 4,600 | 98 | 28,068 | 444,444 | 31,690,869 | 43,604,869 |
| 48 | 4,601 | 4,700 | 119 | 28,187 | 552,134 | 32,243,002 | 43,856,702 |
| 49 | 4,701 | 4,800 | 91 | 28,278 | 430,888 | 32,673,891 | 44,097,891 |
| 50 | 4,801 | 4,900 | 92 | 28,370 | 444,861 | 33,118,752 | 44,329,952 |
| 51 | 4,901 | 5,000 | 96 | 28,466 | 494,325 | 33,613,077 | 44,573,077 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 52 | 5,001 | 5,100 | 76 | 28,542 | 382,967 | 33,996,044 | 44,787,644 |
| 53 | 5,101 | 5,200 | 77 | 28,619 | 395,381 | 34,391,425 | 44,994,225 |
| 54 | 5,201 | 5,300 | 76 | 28,695 | 398,225 | 34,789,650 | 45,193,550 |
| 55 | 5,301 | 5,400 | 88 | 28,783 | 469,384 | 35,259,033 | 45,384,033 |
| 56 | 5,401 | 5,500 | 73 | 28,856 | 396,519 | 35,655,552 | 45,566,552 |
| 57 | 5,501 | 5,600 | 66 | 28,922 | 365,048 | 36,020,601 | 45,742,201 |
| 58 | 5,601 | 5,700 | 62 | 28,984 | 349,602 | 36,370,203 | 45,912,003 |
| 59 | 5,701 | 5,800 | 73 | 29,057 | 418,492 | 36,788,694 | 46,074,494 |
| 60 | 5,801 | 5,900 | 59 | 29,116 | 344,330 | 37,133,024 | 46,230,824 |
| 61 | 5,901 | 6,000 | 56 | 29,172 | 332,218 | 37,465,243 | 46,381,243 |
| 62 | 6,001 | 6,100 | 51 | 29,223 | 307,769 | 37,773,011 | 46,526,511 |
| 63 | 6,101 | 6,200 | 50 | 29,273 | 306,858 | 38,079,869 | 46,666,869 |
| 64 | 6,201 | 6,300 | 50 | 29,323 | 311,600 | 38,391,470 | 46,801,970 |
| 65 | 6,301 | 6,400 | 57 | 29,380 | 361,383 | 38,752,853 | 46,932,053 |
| 66 | 6,401 | 6,500 | 49 | 29,429 | 315,556 | 39,068,409 | 47,056,909 |
| 67 | 6,501 | 6,600 | 53 | 29,482 | 346,190 | 39,414,599 | 47,176,199 |
| 68 | 6,601 | 6,700 | 31 | 29,513 | 205,758 | 39,620,357 | 47,291,857 |
| 69 | 6,701 | 6,800 | 36 | 29,549 | 242,030 | 39,862,386 | 47,403,586 |
| 70 | 6,801 | 6,900 | 37 | 29,586 | 253,115 | 40,115,501 | 47,512,301 |
| 71 | 6,901 | 7,000 | 40 | 29,626 | 277,695 | 40,393,196 | 47,617,196 |
| 72 | 7,001 | 7,100 | 41 | 29,667 | 288,339 | 40,681,535 | 47,717,635 |
| 73 | 7,101 | 7,200 | 28 | 29,695 | 199,941 | 40,881,476 | 47,815,076 |
| 74 | 7,201 | 7,300 | 30 | 29,725 | 217,102 | 41,098,578 | 47,909,478 |
| 75 | 7,301 | 7,400 | 33 | 29,758 | 241,816 | 41,340,394 | 48,000,394 |
| 76 | 7,401 | 7,500 | 15 | 29,773 | 111,424 | 41,451,818 | 48,089,318 |
| 77 | 7,501 | 7,600 | 27 | 29,800 | 203,335 | 41,655,153 | 48,175,953 |
| 78 | 7,601 | 7,700 | 23 | 29,823 | 175,253 | 41,830,406 | 48,259,906 |
| 79 | 7,701 | 7,800 | 34 | 29,857 | 262,937 | 42,093,342 | 48,341,142 |
| 80 | 7,801 | 7,900 | 26 | 29,883 | 203,463 | 42,296,806 | 48,419,306 |
| 81 | 7,901 | 8,000 | 30 | 29,913 | 238,081 | 42,534,887 | 48,494,887 |
| 82 | 8,001 | 8,100 | 19 | 29,932 | 152,797 | 42,687,683 | 48,568,283 |
| 83 | 8,101 | 8,200 | 20 | 29,952 | 162,848 | 42,850,531 | 48,639,731 |
| 84 | 8,201 | 8,300 | 28 | 29,980 | 230,462 | 43,080,993 | 48,708,393 |
| 85 | 8,301 | 8,400 | 22 | 30,002 | 183,203 | 43,264,196 | 48,774,596 |
| 86 | 8,401 | 8,500 | 24 | 30,026 | 202,322 | 43,466,518 | 48,838,518 |
| 87 | 8,501 | 8,600 | 20 | 30,046 | 170,692 | 43,637,210 | 48,900,410 |
| 88 | 8,601 | 8,700 | 24 | 30,070 | 207,193 | 43,844,403 | 48,960,003 |
| 89 | 8,701 | 8,800 | 18 | 30,088 | 156,969 | 44,001,372 | 49,017,372 |
| 90 | 8,801 | 8,900 | 21 | 30,109 | 185,428 | 44,186,801 | 49,072,901 |
| 91 | 8,901 | 9,000 | 17 | 30,126 | 151,696 | 44,338,497 | 49,126,497 |
| 92 | 9,001 | 9,100 | 22 | 30,148 | 198,531 | 44,537,028 | 49,178,028 |
| 93 | 9,101 | 9,200 | 14 | 30,162 | 127,774 | 44,664,802 | 49,228,002 |
| 94 | 9,201 | 9,300 | 13 | 30,175 | 119,923 | 44,784,726 | 49,276,626 |
| 95 | 9,301 | 9,400 | 15 | 30,190 | 139,868 | 44,924,594 | 49,323,794 |
| 96 | 9,401 | 9,500 | 13 | 30,203 | 122,372 | 45,046,966 | 49,369,466 |
| 97 | 9,501 | 9,600 | 20 | 30,223 | 190,411 | 45,237,377 | 49,413,377 |
| 98 | 9,601 | 9,700 | 14 | 30,237 | 134,770 | 45,372,148 | 49,455,848 |
| 99 | 9,701 | 9,800 | 16 | 30,253 | 155,576 | 45,527,723 | 49,496,723 |
| 100 | 9,801 | 9,900 | 17 | 30,270 | 166,972 | 45,694,695 | 49,535,895 |
| 101 | 9,901 | 10,000 | 17 | 30,287 | 168,406 | 45,863,101 | 49,573,101 |
| 102 | 10,001 | 11,000 | 91 | 30,378 | 950,701 | 46,813,802 | 49,893,802 |


| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{aligned} & \text { Number Of } \\ & \text { Bills } \end{aligned}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 103 | 11,001 | 12,000 | 73 | 30,451 | 831,084 | 47,644,886 | 50,128,886 |
| 104 | 12,001 | 13,000 | 69 | 30,520 | 860,453 | 48,505,339 | 50,299,339 |
| 105 | 13,001 | 14,000 | 33 | 30,553 | 444,117 | 48,949,456 | 50,419,456 |
| 106 | 14,001 | 15,000 | 27 | 30,580 | 386,298 | 49,335,754 | 50,505,754 |
| 107 | 15,001 | 16,000 | 19 | 30,599 | 292,761 | 49,628,515 | 50,572,515 |
| 108 | 16,001 | 17,000 | 12 | 30,611 | 194,235 | 49,822,750 | 50,621,750 |
| 109 | 17,001 | 18,000 | 12 | 30,623 | 209,975 | 50,032,726 | 50,662,726 |
| 110 | 18,001 | 19,000 | 6 | 30,629 | 109,910 | 50,142,635 | 50,693,635 |
| 111 | 19,001 | 20,000 | 4 | 30,633 | 78,164 | 50,220,799 | 50,720,799 |
| 112 | 20,001 | 21,000 | 4 | 30,637 | 81,882 | 50,302,681 | 50,743,681 |
| 113 | 21,001 | 22,000 | 6 | 30,643 | 128,306 | 50,430,987 | 50,760,987 |
| 114 | 22,001 | 23,000 | 1 | 30,644 | 22,126 | 50,453,113 | 50,775,113 |
| 115 | 23,001 | 24,000 | 1 | 30,645 | 23,760 | 50,476,874 | 50,788,874 |
| 116 | 24,001 | 25,000 | 2 | 30,647 | 48,854 | 50,525,728 | 50,800,728 |
| 117 | 26,001 | 27,000 | 1 | 30,648 | 26,039 | 50,551,767 | 50,821,767 |
| 118 | 27,001 | 28,000 | 1 | 30,649 | 27,772 | 50,579,539 | 50,831,539 |
| 119 | 28,001 | 29,000 | 1 | 30,650 | 28,007 | 50,607,546 | 50,839,546 |
| 120 | 29,001 | 30,000 | 1 | 30,651 | 29,163 | 50,636,709 | 50,846,709 |
| 121 | 30,001 | 31,000 | 1 | 30,652 | 30,897 | 50,667,606 | 50,853,606 |
| 122 | 34,001 | 35,000 | 1 | 30,653 | 34,819 | 50,702,425 | 50,877,425 |
| 123 | 35,001 | 36,000 | 1 | 30,654 | 35,059 | 50,737,484 | 50,881,484 |
| 124 | 50,001 | 51,000 | 1 | 30,655 | 50,517 | 50,788,001 | 50,941,001 |
| 125 | 54,001 | 55,000 | 1 | 30,656 | 53,881 | 50,841,882 | 50,951,882 |
| 126 | 69,001 | 70,000 | 1 | 30,657 | 69,658 | 50,911,540 | 50,981,540 |
| 127 | 93,001 | 94,000 | 1 | 30,658 | 93,167 | 51,004,707 | 51,004,707 |

Duquesne Light Company
Bill Frequency Distribution
Rate GMH>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 8 of 13
Page 1 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 55 | 55 | 0 | 0 | 0 |
| 2 | 1 | 100 | 35 | 90 | 1,981 | 1,981 | 765,181 |
| 3 | 101 | 200 | 36 | 126 | 4,876 | 6,857 | 1,526,057 |
| 4 | 201 | 300 | 20 | 146 | 5,405 | 12,262 | 2,285,062 |
| 5 | 301 | 400 | 23 | 169 | 13,534 | 25,796 | 3,046,996 |
| 6 | 401 | 500 | 23 | 192 | 10,341 | 36,137 | 3,801,137 |
| 7 | 501 | 600 | 11 | 203 | 6,088 | 42,225 | 4,553,625 |
| 8 | 601 | 700 | 14 | 217 | 10,437 | 52,662 | 5,306,162 |
| 9 | 701 | 800 | 11 | 228 | 8,265 | 60,927 | 6,056,127 |
| 10 | 801 | 900 | 16 | 244 | 13,685 | 74,611 | 6,804,811 |
| 11 | 901 | 1,000 | 16 | 260 | 15,344 | 89,955 | 7,551,955 |
| 12 | 1,001 | 1,100 | 17 | 277 | 17,793 | 107,748 | 8,297,248 |
| 13 | 1,101 | 1,200 | 21 | 298 | 24,319 | 132,067 | 9,040,867 |
| 14 | 1,201 | 1,300 | 15 | 313 | 18,750 | 150,817 | 9,782,517 |
| 15 | 1,301 | 1,400 | 22 | 335 | 29,693 | 180,510 | 10,522,310 |
| 16 | 1,401 | 1,500 | 14 | 349 | 20,547 | 201,058 | 11,260,558 |
| 17 | 1,501 | 1,600 | 17 | 366 | 31,015 | 232,072 | 12,001,672 |
| 18 | 1,601 | 1,700 | 18 | 384 | 29,665 | 261,737 | 12,736,337 |
| 19 | 1,701 | 1,800 | 31 | 415 | 60,021 | 321,758 | 13,474,358 |
| 20 | 1,801 | 1,900 | 24 | 439 | 44,374 | 366,132 | 14,203,832 |
| 21 | 1,901 | 2,000 | 20 | 459 | 49,057 | 415,190 | 14,941,190 |
| 22 | 2,001 | 2,100 | 31 | 490 | 64,001 | 479,191 | 15,666,391 |
| 23 | 2,101 | 2,200 | 28 | 518 | 73,412 | 552,603 | 16,401,403 |
| 24 | 2,201 | 2,300 | 18 | 536 | 40,970 | 593,573 | 17,121,373 |
| 25 | 2,301 | 2,400 | 24 | 560 | 56,779 | 650,352 | 17,839,152 |
| 26 | 2,401 | 2,500 | 24 | 584 | 69,163 | 719,516 | 18,564,516 |
| 27 | 2,501 | 2,600 | 25 | 609 | 64,057 | 783,573 | 19,277,373 |
| 28 | 2,601 | 2,700 | 28 | 637 | 74,654 | 858,228 | 19,987,728 |
| 29 | 2,701 | 2,800 | 28 | 665 | 83,094 | 941,322 | 20,700,922 |
| 30 | 2,801 | 2,900 | 29 | 694 | 83,047 | 1,024,369 | 21,405,569 |
| 31 | 2,901 | 3,000 | 25 | 719 | 74,350 | 1,098,719 | 22,107,719 |
| 32 | 3,001 | 3,100 | 26 | 745 | 79,599 | 1,178,318 | 22,807,018 |
| 33 | 3,101 | 3,200 | 25 | 770 | 79,152 | 1,257,470 | 23,503,870 |
| 34 | 3,201 | 3,300 | 20 | 790 | 65,300 | 1,322,770 | 24,198,370 |
| 35 | 3,301 | 3,400 | 34 | 824 | 121,168 | 1,443,938 | 24,897,138 |
| 36 | 3,401 | 3,500 | 23 | 847 | 79,707 | 1,523,645 | 25,586,145 |
| 37 | 3,501 | 3,600 | 38 | 885 | 146,101 | 1,669,746 | 26,282,946 |
| 38 | 3,601 | 3,700 | 32 | 917 | 117,425 | 1,787,171 | 26,965,671 |
| 39 | 3,701 | 3,800 | 25 | 942 | 101,649 | 1,888,820 | 27,652,820 |
| 40 | 3,801 | 3,900 | 29 | 971 | 112,278 | 2,001,099 | 28,329,999 |
| 41 | 3,901 | 4,000 | 30 | 1,001 | 119,261 | 2,120,360 | 29,004,360 |
| 42 | 4,001 | 4,100 | 33 | 1,034 | 134,591 | 2,254,951 | 29,675,751 |
| 43 | 4,101 | 4,200 | 29 | 1,063 | 120,958 | 2,375,908 | 30,343,708 |
| 44 | 4,201 | 4,300 | 30 | 1,093 | 128,284 | 2,504,192 | 31,008,892 |
| 45 | 4,301 | 4,400 | 21 | 1,114 | 91,744 | 2,595,936 | 31,671,136 |

Duquesne Light Company
Bill Frequency Distribution
Rate GMH>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 8 of 13
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Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 46 | 4,401 | 4,500 | 35 | 1,149 | 174,324 | 2,770,260 | 32,348,760 |
| 47 | 4,501 | 4,600 | 27 | 1,176 | 123,542 | 2,893,802 | 33,005,402 |
| 48 | 4,601 | 4,700 | 31 | 1,207 | 163,544 | 3,057,346 | 33,677,846 |
| 49 | 4,701 | 4,800 | 36 | 1,243 | 172,105 | 3,229,451 | 34,328,651 |
| 50 | 4,801 | 4,900 | 33 | 1,276 | 160,795 | 3,390,246 | 34,975,646 |
| 51 | 4,901 | 5,000 | 36 | 1,312 | 179,204 | 3,569,450 | 35,619,450 |
| 52 | 5,001 | 5,100 | 27 | 1,339 | 137,133 | 3,706,582 | 36,259,882 |
| 53 | 5,101 | 5,200 | 32 | 1,371 | 165,698 | 3,872,280 | 36,897,480 |
| 54 | 5,201 | 5,300 | 19 | 1,390 | 100,328 | 3,972,608 | 37,532,208 |
| 55 | 5,301 | 5,400 | 35 | 1,425 | 225,840 | 4,198,448 | 38,202,248 |
| 56 | 5,401 | 5,500 | 32 | 1,457 | 175,414 | 4,373,862 | 38,831,362 |
| 57 | 5,501 | 5,600 | 36 | 1,493 | 200,832 | 4,574,694 | 39,457,094 |
| 58 | 5,601 | 5,700 | 28 | 1,521 | 187,577 | 4,762,271 | 40,107,971 |
| 59 | 5,701 | 5,800 | 29 | 1,550 | 167,710 | 4,929,981 | 40,727,581 |
| 60 | 5,801 | 5,900 | 31 | 1,581 | 182,295 | 5,112,277 | 41,344,177 |
| 61 | 5,901 | 6,000 | 27 | 1,608 | 161,790 | 5,274,067 | 41,958,067 |
| 62 | 6,001 | 6,100 | 28 | 1,636 | 200,742 | 5,474,809 | 42,599,409 |
| 63 | 6,101 | 6,200 | 22 | 1,658 | 135,888 | 5,610,697 | 43,207,497 |
| 64 | 6,201 | 6,300 | 28 | 1,686 | 207,276 | 5,817,973 | 43,844,773 |
| 65 | 6,301 | 6,400 | 41 | 1,727 | 293,624 | 6,111,597 | 44,479,597 |
| 66 | 6,401 | 6,500 | 27 | 1,754 | 174,862 | 6,286,460 | 45,078,460 |
| 67 | 6,501 | 6,600 | 30 | 1,784 | 197,708 | 6,484,167 | 45,674,967 |
| 68 | 6,601 | 6,700 | 37 | 1,821 | 274,156 | 6,758,323 | 46,295,023 |
| 69 | 6,701 | 6,800 | 33 | 1,854 | 223,856 | 6,982,180 | 46,884,580 |
| 70 | 6,801 | 6,900 | 27 | 1,881 | 185,851 | 7,168,031 | 47,470,931 |
| 71 | 6,901 | 7,000 | 29 | 1,910 | 202,565 | 7,370,596 | 48,054,596 |
| 72 | 7,001 | 7,100 | 27 | 1,937 | 191,462 | 7,562,058 | 48,635,558 |
| 73 | 7,101 | 7,200 | 25 | 1,962 | 179,992 | 7,742,050 | 49,214,050 |
| 74 | 7,201 | 7,300 | 35 | 1,997 | 255,292 | 7,997,342 | 49,789,842 |
| 75 | 7,301 | 7,400 | 37 | 2,034 | 273,555 | 8,270,897 | 50,362,097 |
| 76 | 7,401 | 7,500 | 39 | 2,073 | 329,092 | 8,599,989 | 50,967,489 |
| 77 | 7,501 | 7,600 | 26 | 2,099 | 197,361 | 8,797,350 | 51,532,150 |
| 78 | 7,601 | 7,700 | 35 | 2,134 | 292,286 | 9,089,636 | 52,117,236 |
| 79 | 7,701 | 7,800 | 32 | 2,166 | 248,994 | 9,338,630 | 52,675,430 |
| 80 | 7,801 | 7,900 | 36 | 2,202 | 284,258 | 9,622,888 | 53,230,888 |
| 81 | 7,901 | 8,000 | 32 | 2,234 | 255,627 | 9,878,515 | 53,782,515 |
| 82 | 8,001 | 8,100 | 26 | 2,260 | 210,498 | 10,089,013 | 54,331,213 |
| 83 | 8,101 | 8,200 | 26 | 2,286 | 212,855 | 10,301,867 | 54,877,067 |
| 84 | 8,201 | 8,300 | 21 | 2,307 | 174,215 | 10,476,083 | 55,420,583 |
| 85 | 8,301 | 8,400 | 35 | 2,342 | 335,532 | 10,811,614 | 56,003,614 |
| 86 | 8,401 | 8,500 | 32 | 2,374 | 272,008 | 11,083,622 | 56,541,622 |
| 87 | 8,501 | 8,600 | 39 | 2,413 | 335,367 | 11,418,989 | 57,076,389 |
| 88 | 8,601 | 8,700 | 32 | 2,445 | 277,675 | 11,696,664 | 57,606,564 |
| 89 | 8,701 | 8,800 | 31 | 2,476 | 272,249 | 11,968,914 | 58,133,714 |
| 90 | 8,801 | 8,900 | 28 | 2,504 | 275,717 | 12,244,631 | 58,684,831 |

Duquesne Light Company
Bill Frequency Distribution
Rate GMH>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 8 of 13
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 91 | 8,901 | 9,000 | 32 | 2,536 | 287,713 | 12,532,343 | 59,206,343 |
| 92 | 9,001 | 9,100 | 31 | 2,567 | 318,153 | 12,850,496 | 59,760,996 |
| 93 | 9,101 | 9,200 | 22 | 2,589 | 202,225 | 13,052,721 | 60,276,321 |
| 94 | 9,201 | 9,300 | 23 | 2,612 | 213,916 | 13,266,636 | 60,789,636 |
| 95 | 9,301 | 9,400 | 30 | 2,642 | 281,905 | 13,548,542 | 61,300,542 |
| 96 | 9,401 | 9,500 | 22 | 2,664 | 209,140 | 13,757,681 | 61,808,681 |
| 97 | 9,501 | 9,600 | 22 | 2,686 | 211,158 | 13,968,839 | 62,314,439 |
| 98 | 9,601 | 9,700 | 30 | 2,716 | 290,912 | 14,259,752 | 62,817,952 |
| 99 | 9,701 | 9,800 | 22 | 2,738 | 215,526 | 14,475,278 | 63,318,478 |
| 100 | 9,801 | 9,900 | 27 | 2,765 | 267,372 | 14,742,649 | 63,816,949 |
| 101 | 9,901 | 10,000 | 33 | 2,798 | 330,213 | 15,072,862 | 64,312,862 |
| 102 | 10,001 | 11,000 | 306 | 3,104 | 3,237,206 | 18,310,068 | 69,108,068 |
| 103 | 11,001 | 12,000 | 279 | 3,383 | 3,226,147 | 21,536,216 | 73,604,216 |
| 104 | 12,001 | 13,000 | 253 | 3,636 | 3,177,759 | 24,713,975 | 77,831,975 |
| 105 | 13,001 | 14,000 | 238 | 3,874 | 3,222,640 | 27,936,615 | 81,808,615 |
| 106 | 14,001 | 15,000 | 239 | 4,113 | 3,475,412 | 31,412,027 | 85,547,027 |
| 107 | 15,001 | 16,000 | 191 | 4,304 | 2,976,810 | 34,388,837 | 89,076,837 |
| 108 | 16,001 | 17,000 | 191 | 4,495 | 3,161,811 | 37,550,649 | 92,409,649 |
| 109 | 17,001 | 18,000 | 183 | 4,678 | 3,224,430 | 40,775,079 | 95,567,079 |
| 110 | 18,001 | 19,000 | 169 | 4,847 | 3,149,096 | 43,924,175 | 98,549,175 |
| 111 | 19,001 | 20,000 | 117 | 4,964 | 2,292,752 | 46,216,927 | 101,376,927 |
| 112 | 20,001 | 21,000 | 145 | 5,109 | 2,986,762 | 49,203,688 | 104,076,688 |
| 113 | 21,001 | 22,000 | 102 | 5,211 | 2,203,658 | 51,407,346 | 106,649,346 |
| 114 | 22,001 | 23,000 | 96 | 5,307 | 2,169,455 | 53,576,802 | 109,121,802 |
| 115 | 23,001 | 24,000 | 117 | 5,424 | 2,757,189 | 56,333,991 | 111,485,991 |
| 116 | 24,001 | 25,000 | 82 | 5,506 | 2,018,415 | 58,352,406 | 113,752,406 |
| 117 | 25,001 | 26,000 | 78 | 5,584 | 2,000,676 | 60,353,081 | 115,941,081 |
| 118 | 26,001 | 27,000 | 76 | 5,660 | 2,025,613 | 62,378,694 | 118,052,694 |
| 119 | 27,001 | 28,000 | 90 | 5,750 | 2,485,541 | 64,864,236 | 120,080,236 |
| 120 | 28,001 | 29,000 | 62 | 5,812 | 1,774,095 | 66,638,331 | 122,028,331 |
| 121 | 29,001 | 30,000 | 53 | 5,865 | 1,572,310 | 68,210,641 | 123,920,641 |
| 122 | 30,001 | 31,000 | 50 | 5,915 | 1,534,863 | 69,745,504 | 125,762,504 |
| 123 | 31,001 | 32,000 | 57 | 5,972 | 1,807,535 | 71,553,039 | 127,553,039 |
| 124 | 32,001 | 33,000 | 56 | 6,028 | 1,831,622 | 73,384,660 | 129,286,660 |
| 125 | 33,001 | 34,000 | 54 | 6,082 | 1,816,130 | 75,200,790 | 130,960,790 |
| 126 | 34,001 | 35,000 | 68 | 6,150 | 2,359,002 | 77,559,792 | 132,579,792 |
| 127 | 35,001 | 36,000 | 55 | 6,205 | 1,962,196 | 79,521,988 | 134,133,988 |
| 128 | 36,001 | 37,000 | 56 | 6,261 | 2,058,344 | 81,580,332 | 135,637,332 |
| 129 | 37,001 | 38,000 | 62 | 6,323 | 2,334,108 | 83,914,440 | 137,076,440 |
| 130 | 38,001 | 39,000 | 58 | 6,381 | 2,246,740 | 86,161,179 | 138,460,179 |
| 131 | 39,001 | 40,000 | 57 | 6,438 | 2,265,171 | 88,426,351 | 139,786,351 |
| 132 | 40,001 | 41,000 | 48 | 6,486 | 1,952,207 | 90,378,558 | 141,054,558 |
| 133 | 41,001 | 42,000 | 41 | 6,527 | 1,712,791 | 92,091,349 | 142,281,349 |
| 134 | 42,001 | 43,000 | 52 | 6,579 | 2,220,179 | 94,311,528 | 143,460,528 |
| 135 | 43,001 | 44,000 | 46 | 6,625 | 2,009,953 | 96,321,480 | 144,589,480 |

Duquesne Light Company
Bill Frequency Distribution
Rate GMH>25-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 8 of 13
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Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 136 | 44,001 | 45,000 | 41 | 6,666 | 1,833,323 | 98,154,804 | 145,674,804 |
| 137 | 45,001 | 46,000 | 38 | 6,704 | 1,740,542 | 99,895,345 | 146,723,345 |
| 138 | 46,001 | 47,000 | 36 | 6,740 | 1,679,554 | 101,574,899 | 147,728,899 |
| 139 | 47,001 | 48,000 | 33 | 6,773 | 1,578,287 | 103,153,187 | 148,705,187 |
| 140 | 48,001 | 49,000 | 24 | 6,797 | 1,172,618 | 104,325,805 | 149,650,805 |
| 141 | 49,001 | 50,000 | 32 | 6,829 | 1,588,669 | 105,914,474 | 150,564,474 |
| 142 | 50,001 | 51,000 | 21 | 6,850 | 1,067,333 | 106,981,807 | 151,453,807 |
| 143 | 51,001 | 52,000 | 21 | 6,871 | 1,088,773 | 108,070,580 | 152,322,580 |
| 144 | 52,001 | 53,000 | 22 | 6,893 | 1,158,117 | 109,228,698 | 153,165,698 |
| 145 | 53,001 | 54,000 | 32 | 6,925 | 1,720,379 | 110,949,077 | 153,987,077 |
| 146 | 54,001 | 55,000 | 22 | 6,947 | 1,204,102 | 112,153,179 | 154,778,179 |
| 147 | 55,001 | 56,000 | 24 | 6,971 | 1,339,580 | 113,492,760 | 155,548,760 |
| 148 | 56,001 | 57,000 | 19 | 6,990 | 1,079,959 | 114,572,719 | 156,296,719 |
| 149 | 57,001 | 58,000 | 16 | 7,006 | 924,635 | 115,497,354 | 157,025,354 |
| 150 | 58,001 | 59,000 | 22 | 7,028 | 1,293,984 | 116,791,338 | 157,737,338 |
| 151 | 59,001 | 60,000 | 17 | 7,045 | 1,015,180 | 117,806,518 | 158,426,518 |
| 152 | 60,001 | 61,000 | 27 | 7,072 | 1,643,554 | 119,450,072 | 159,100,072 |
| 153 | 61,001 | 62,000 | 23 | 7,095 | 1,423,179 | 120,873,251 | 159,747,251 |
| 154 | 62,001 | 63,000 | 25 | 7,120 | 1,572,419 | 122,445,670 | 160,371,670 |
| 155 | 63,001 | 64,000 | 19 | 7,139 | 1,210,977 | 123,656,647 | 160,968,647 |
| 156 | 64,001 | 65,000 | 20 | 7,159 | 1,295,455 | 124,952,102 | 161,547,102 |
| 157 | 65,001 | 66,000 | 17 | 7,176 | 1,120,942 | 126,073,044 | 162,109,044 |
| 158 | 66,001 | 67,000 | 17 | 7,193 | 1,136,026 | 127,209,070 | 162,652,070 |
| 159 | 67,001 | 68,000 | 9 | 7,202 | 610,821 | 127,819,891 | 163,179,891 |
| 160 | 68,001 | 69,000 | 13 | 7,215 | 895,282 | 128,715,172 | 163,698,172 |
| 161 | 69,001 | 70,000 | 19 | 7,234 | 1,329,285 | 130,044,458 | 164,204,458 |
| 162 | 70,001 | 71,000 | 15 | 7,249 | 1,064,346 | 131,108,804 | 164,691,804 |
| 163 | 71,001 | 72,000 | 16 | 7,265 | 1,147,307 | 132,256,110 | 165,160,110 |
| 164 | 72,001 | 73,000 | 10 | 7,275 | 730,019 | 132,986,129 | 165,617,129 |
| 165 | 73,001 | 74,000 | 8 | 7,283 | 592,446 | 133,578,576 | 166,064,576 |
| 166 | 74,001 | 75,000 | 11 | 7,294 | 825,416 | 134,403,992 | 166,503,992 |
| 167 | 75,001 | 76,000 | 7 | 7,301 | 531,353 | 134,935,344 | 166,931,344 |
| 168 | 76,001 | 77,000 | 7 | 7,308 | 537,750 | 135,473,095 | 167,351,095 |
| 169 | 77,001 | 78,000 | 10 | 7,318 | 778,651 | 136,251,746 | 167,763,746 |
| 170 | 78,001 | 79,000 | 11 | 7,329 | 868,531 | 137,120,277 | 168,167,277 |
| 171 | 79,001 | 80,000 | 12 | 7,341 | 960,506 | 138,080,784 | 168,560,784 |
| 172 | 80,001 | 81,000 | 14 | 7,355 | 1,132,898 | 139,213,682 | 168,940,682 |
| 173 | 81,001 | 82,000 | 12 | 7,367 | 982,991 | 140,196,673 | 169,306,673 |
| 174 | 82,001 | 83,000 | 16 | 7,383 | 1,326,560 | 141,523,233 | 169,660,233 |
| 175 | 83,001 | 84,000 | 8 | 7,391 | 672,122 | 142,195,355 | 169,999,355 |
| 176 | 84,001 | 85,000 | 12 | 7,403 | 1,018,512 | 143,213,867 | 170,328,867 |
| 177 | 85,001 | 86,000 | 9 | 7,412 | 773,750 | 143,987,618 | 170,647,618 |
| 178 | 86,001 | 87,000 | 7 | 7,419 | 607,271 | 144,594,888 | 170,955,888 |
| 179 | 87,001 | 88,000 | 8 | 7,427 | 702,975 | 145,297,863 | 171,257,863 |
| 180 | 88,001 | 89,000 | 7 | 7,434 | 622,759 | 145,920,622 | 171,552,622 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 181 | 89,001 | 90,000 | 9 | 7,443 | 810,322 | 146,730,945 | 171,840,945 |
| 182 | 90,001 | 91,000 | 10 | 7,453 | 908,342 | 147,639,287 | 172,118,287 |
| 183 | 91,001 | 92,000 | 9 | 7,462 | 825,958 | 148,465,245 | 172,385,245 |
| 184 | 92,001 | 93,000 | 6 | 7,468 | 558,944 | 149,024,189 | 172,646,189 |
| 185 | 93,001 | 94,000 | 5 | 7,473 | 469,239 | 149,493,428 | 172,899,428 |
| 186 | 94,001 | 95,000 | 6 | 7,479 | 570,295 | 150,063,723 | 173,148,723 |
| 187 | 95,001 | 96,000 | 6 | 7,485 | 575,668 | 150,639,391 | 173,391,391 |
| 188 | 96,001 | 97,000 | 3 | 7,488 | 291,333 | 150,930,724 | 173,628,724 |
| 189 | 97,001 | 98,000 | 8 | 7,496 | 783,194 | 151,713,918 | 173,861,918 |
| 190 | 98,001 | 99,000 | 5 | 7,501 | 495,836 | 152,209,755 | 174,088,755 |
| 191 | 99,001 | 100,000 | 8 | 7,509 | 799,644 | 153,009,399 | 174,309,399 |
| 192 | 100,001 | 110,000 | 59 | 7,568 | 6,245,072 | 159,254,470 | 176,194,470 |
| 193 | 110,001 | 120,000 | 43 | 7,611 | 4,985,556 | 164,240,026 | 177,560,026 |
| 194 | 120,001 | 130,000 | 29 | 7,640 | 3,656,755 | 167,896,781 | 178,556,781 |
| 195 | 130,001 | 140,000 | 23 | 7,663 | 3,109,685 | 171,006,467 | 179,266,467 |
| 196 | 140,001 | 150,000 | 15 | 7,678 | 2,162,238 | 173,168,705 | 179,768,705 |
| 197 | 150,001 | 160,000 | 11 | 7,689 | 1,691,094 | 174,859,799 | 180,139,799 |
| 198 | 160,001 | 170,000 | 9 | 7,698 | 1,492,928 | 176,352,726 | 180,432,726 |
| 199 | 170,001 | 180,000 | 5 | 7,703 | 875,907 | 177,228,633 | 180,648,633 |
| 200 | 180,001 | 190,000 | 1 | 7,704 | 188,534 | 177,417,167 | 180,837,167 |
| 201 | 190,001 | 200,000 | 4 | 7,708 | 775,570 | 178,192,737 | 180,992,737 |
| 202 | 200,001 | 210,000 | 1 | 7,709 | 204,961 | 178,397,698 | 181,127,698 |
| 203 | 210,001 | 220,000 | 1 | 7,710 | 212,389 | 178,610,087 | 181,250,087 |
| 204 | 220,001 | 230,000 | 1 | 7,711 | 230,058 | 178,840,145 | 181,370,145 |
| 205 | 230,001 | 240,000 | 2 | 7,713 | 472,501 | 179,312,646 | 181,472,646 |
| 206 | 240,001 | 250,000 | 1 | 7,714 | 245,760 | 179,558,406 | 181,558,406 |
| 207 | 250,001 | 260,000 | 1 | 7,715 | 257,214 | 179,815,619 | 181,635,619 |
| 208 | 260,001 | 270,000 | 3 | 7,718 | 803,483 | 180,619,102 | 181,699,102 |
| 209 | 270,001 | 280,000 | 3 | 7,721 | 826,513 | 181,445,615 | 181,725,615 |
| 210 | 280,001 | 290,000 | 1 | 7,722 | 285,000 | 181,730,615 | 181,730,615 |

Duquesne Light Company
Bill Frequency Distribution
Rate GL- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 9 of 13
Page 1 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 21 | 21 | 0 | 0 | 0 |
| 2 | 1 | 1,000 | 23 | 44 | 20,687 | 20,687 | 20,687 |
| 3 | 1,001 | 2,000 | 10 | 54 | 15,834 | 36,522 | 36,522 |
| 4 | 2,001 | 3,000 | 6 | 60 | 14,068 | 50,590 | 50,590 |
| 5 | 3,001 | 4,000 | 11 | 71 | 40,247 | 90,836 | 90,836 |
| 6 | 4,001 | 5,000 | 14 | 85 | 62,336 | 153,172 | 153,172 |
| 7 | 5,001 | 6,000 | 7 | 92 | 39,127 | 192,299 | 192,299 |
| 8 | 6,001 | 7,000 | 7 | 99 | 45,454 | 237,753 | 237,753 |
| 9 | 7,001 | 8,000 | 5 | 104 | 37,206 | 274,960 | 274,960 |
| 10 | 8,001 | 9,000 | 11 | 115 | 92,270 | 367,229 | 367,229 |
| 11 | 9,001 | 10,000 | 15 | 130 | 141,535 | 508,764 | 508,764 |
| 12 | 10,001 | 11,000 | 19 | 149 | 196,653 | 705,417 | 705,417 |
| 13 | 11,001 | 12,000 | 5 | 154 | 56,395 | 761,812 | 761,812 |
| 14 | 12,001 | 13,000 | 14 | 168 | 173,772 | 935,584 | 935,584 |
| 15 | 13,001 | 14,000 | 15 | 183 | 202,117 | 1,137,701 | 1,137,701 |
| 16 | 14,001 | 15,000 | 5 | 188 | 71,603 | 1,209,305 | 1,209,305 |
| 17 | 15,001 | 16,000 | 5 | 193 | 76,913 | 1,286,218 | 1,286,218 |
| 18 | 16,001 | 17,000 | 5 | 198 | 82,070 | 1,368,288 | 1,368,288 |
| 19 | 17,001 | 18,000 | 13 | 211 | 225,374 | 1,593,662 | 1,593,662 |
| 20 | 18,001 | 19,000 | 15 | 226 | 276,159 | 1,869,822 | 1,869,822 |
| 21 | 19,001 | 20,000 | 14 | 240 | 272,104 | 2,141,926 | 2,141,926 |
| 22 | 20,001 | 21,000 | 12 | 252 | 244,153 | 2,386,079 | 2,386,079 |
| 23 | 21,001 | 22,000 | 9 | 261 | 191,908 | 2,577,987 | 2,577,987 |
| 24 | 22,001 | 23,000 | 10 | 271 | 224,558 | 2,802,545 | 2,802,545 |
| 25 | 23,001 | 24,000 | 9 | 280 | 210,629 | 3,013,174 | 3,013,174 |
| 26 | 24,001 | 25,000 | 12 | 292 | 292,947 | 3,306,121 | 3,306,121 |
| 27 | 25,001 | 26,000 | 12 | 304 | 304,358 | 3,610,480 | 3,610,480 |
| 28 | 26,001 | 27,000 | 14 | 318 | 366,715 | 3,977,194 | 3,977,194 |
| 29 | 27,001 | 28,000 | 11 | 329 | 300,821 | 4,278,016 | 4,278,016 |
| 30 | 28,001 | 29,000 | 10 | 339 | 282,668 | 4,560,684 | 4,560,684 |
| 31 | 29,001 | 30,000 | 9 | 348 | 263,159 | 4,823,843 | 4,823,843 |
| 32 | 30,001 | 31,000 | 10 | 358 | 302,315 | 5,126,158 | 5,126,158 |
| 33 | 31,001 | 32,000 | 10 | 368 | 311,358 | 5,437,516 | 5,437,516 |
| 34 | 32,001 | 33,000 | 12 | 380 | 387,883 | 5,825,399 | 5,825,399 |
| 35 | 33,001 | 34,000 | 12 | 392 | 398,824 | 6,224,223 | 6,224,223 |
| 36 | 34,001 | 35,000 | 9 | 401 | 306,724 | 6,530,947 | 6,530,947 |
| 37 | 35,001 | 36,000 | 15 | 416 | 529,366 | 7,060,313 | 7,060,313 |
| 38 | 36,001 | 37,000 | 13 | 429 | 472,447 | 7,532,760 | 7,532,760 |
| 39 | 37,001 | 38,000 | 15 | 444 | 562,245 | 8,095,005 | 8,095,005 |
| 40 | 38,001 | 39,000 | 12 | 456 | 460,500 | 8,555,505 | 8,555,505 |
| 41 | 39,001 | 40,000 | 17 | 473 | 667,850 | 9,223,355 | 9,223,355 |
| 42 | 40,001 | 41,000 | 15 | 488 | 643,798 | 9,867,152 | 9,867,152 |
| 43 | 41,001 | 42,000 | 16 | 504 | 702,345 | 10,569,498 | 10,569,498 |
| 44 | 42,001 | 43,000 | 12 | 516 | 508,237 | 11,077,734 | 11,077,734 |
| 45 | 43,001 | 44,000 | 14 | 530 | 606,526 | 11,684,261 | 11,684,261 |
| 46 | 44,001 | 45,000 | 19 | 549 | 844,181 | 12,528,442 | 12,528,442 |
| 47 | 45,001 | 46,000 | 13 | 562 | 588,638 | 13,117,080 | 13,117,080 |
| 48 | 46,001 | 47,000 | 16 | 578 | 739,326 | 13,856,405 | 13,856,405 |
| 49 | 47,001 | 48,000 | 15 | 593 | 757,478 | 14,613,883 | 14,613,883 |
| 50 | 48,001 | 49,000 | 10 | 603 | 482,912 | 15,096,796 | 15,096,796 |
| 51 | 49,001 | 50,000 | 18 | 621 | 1,033,895 | 16,130,691 | 16,130,691 |
| 52 | 50,001 | 51,000 | 9 | 630 | 553,500 | 16,684,190 | 16,684,190 |
| 53 | 51,001 | 52,000 | 11 | 641 | 666,561 | 17,350,751 | 17,350,751 |
| 54 | 52,001 | 53,000 | 20 | 661 | 1,201,338 | 18,552,089 | 18,552,089 |
| 55 | 53,001 | 54,000 | 16 | 677 | 905,062 | 19,457,151 | 19,457,151 |

Duquesne Light Company
Bill Frequency Distribution
Rate GL- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 9 of 13
Page 2 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 56 | 54,001 | 55,000 | 16 | 693 | 866,253 | 20,323,403 | 20,323,403 |
| 57 | 55,001 | 56,000 | 16 | 709 | 883,984 | 21,207,388 | 21,207,388 |
| 58 | 56,001 | 57,000 | 25 | 734 | 1,404,926 | 22,612,314 | 22,612,314 |
| 59 | 57,001 | 58,000 | 13 | 747 | 744,777 | 23,357,091 | 23,357,091 |
| 60 | 58,001 | 59,000 | 18 | 765 | 1,049,039 | 24,406,129 | 24,406,129 |
| 61 | 59,001 | 60,000 | 23 | 788 | 1,362,238 | 25,768,367 | 25,768,367 |
| 62 | 60,001 | 61,000 | 37 | 825 | 2,226,857 | 27,995,224 | 27,995,224 |
| 63 | 61,001 | 62,000 | 23 | 848 | 1,652,621 | 29,647,845 | 29,647,845 |
| 64 | 62,001 | 63,000 | 28 | 876 | 1,928,094 | 31,575,939 | 31,575,939 |
| 65 | 63,001 | 64,000 | 19 | 895 | 1,202,420 | 32,778,359 | 32,778,359 |
| 66 | 64,001 | 65,000 | 25 | 920 | 1,796,130 | 34,574,489 | 34,574,489 |
| 67 | 65,001 | 66,000 | 27 | 947 | 1,761,455 | 36,335,944 | 36,335,944 |
| 68 | 66,001 | 67,000 | 27 | 974 | 1,786,353 | 38,122,297 | 38,122,297 |
| 69 | 67,001 | 68,000 | 24 | 998 | 1,613,198 | 39,735,495 | 39,735,495 |
| 70 | 68,001 | 69,000 | 28 | 1,026 | 1,910,166 | 41,645,661 | 41,645,661 |
| 71 | 69,001 | 70,000 | 20 | 1,046 | 1,383,677 | 43,029,338 | 43,029,338 |
| 72 | 70,001 | 71,000 | 27 | 1,073 | 2,315,802 | 45,345,140 | 45,345,140 |
| 73 | 71,001 | 72,000 | 22 | 1,095 | 1,565,417 | 46,910,557 | 46,910,557 |
| 74 | 72,001 | 73,000 | 24 | 1,119 | 1,731,808 | 48,642,365 | 48,642,365 |
| 75 | 73,001 | 74,000 | 24 | 1,143 | 1,756,852 | 50,399,217 | 50,399,217 |
| 76 | 74,001 | 75,000 | 25 | 1,168 | 1,851,170 | 52,250,387 | 52,250,387 |
| 77 | 75,001 | 76,000 | 29 | 1,197 | 2,179,220 | 54,429,607 | 54,429,607 |
| 78 | 76,001 | 77,000 | 37 | 1,234 | 2,815,853 | 57,245,459 | 57,245,459 |
| 79 | 77,001 | 78,000 | 31 | 1,265 | 2,394,119 | 59,639,579 | 59,639,579 |
| 80 | 78,001 | 79,000 | 22 | 1,287 | 1,719,512 | 61,359,091 | 61,359,091 |
| 81 | 79,001 | 80,000 | 36 | 1,323 | 3,325,059 | 64,684,149 | 64,684,149 |
| 82 | 80,001 | 81,000 | 27 | 1,350 | 2,725,033 | 67,409,182 | 67,409,182 |
| 83 | 81,001 | 82,000 | 26 | 1,376 | 2,109,733 | 69,518,915 | 69,518,915 |
| 84 | 82,001 | 83,000 | 28 | 1,404 | 2,298,567 | 71,817,482 | 71,817,482 |
| 85 | 83,001 | 84,000 | 31 | 1,435 | 2,580,504 | 74,397,986 | 74,397,986 |
| 86 | 84,001 | 85,000 | 29 | 1,464 | 2,773,077 | 77,171,063 | 77,171,063 |
| 87 | 85,001 | 86,000 | 37 | 1,501 | 3,149,583 | 80,320,646 | 80,320,646 |
| 88 | 86,001 | 87,000 | 28 | 1,529 | 2,927,928 | 83,248,574 | 83,248,574 |
| 89 | 87,001 | 88,000 | 31 | 1,560 | 2,962,165 | 86,210,740 | 86,210,740 |
| 90 | 88,001 | 89,000 | 35 | 1,595 | 3,084,227 | 89,294,967 | 89,294,967 |
| 91 | 89,001 | 90,000 | 28 | 1,623 | 2,492,513 | 91,787,479 | 91,787,479 |
| 92 | 90,001 | 91,000 | 26 | 1,649 | 3,689,365 | 95,476,844 | 95,476,844 |
| 93 | 91,001 | 92,000 | 27 | 1,676 | 2,460,494 | 97,937,338 | 97,937,338 |
| 94 | 92,001 | 93,000 | 32 | 1,708 | 2,947,577 | 100,884,915 | 100,884,915 |
| 95 | 93,001 | 94,000 | 33 | 1,741 | 3,067,495 | 103,952,410 | 103,952,410 |
| 96 | 94,001 | 95,000 | 37 | 1,778 | 3,481,030 | 107,433,440 | 107,433,440 |
| 97 | 95,001 | 96,000 | 39 | 1,817 | 3,707,767 | 111,141,208 | 111,141,208 |
| 98 | 96,001 | 97,000 | 31 | 1,848 | 2,979,086 | 114,120,293 | 114,120,293 |
| 99 | 97,001 | 98,000 | 39 | 1,887 | 3,784,135 | 117,904,428 | 117,904,428 |
| 100 | 98,001 | 99,000 | 36 | 1,923 | 3,526,950 | 121,431,378 | 121,431,378 |
| 101 | 99,001 | 100,000 | 45 | 1,968 | 4,455,005 | 125,886,383 | 125,886,383 |
| 102 | 100,001 | 110,000 | 403 | 2,371 | 42,146,799 | 168,033,183 | 168,033,183 |
| 103 | 110,001 | 120,000 | 407 | 2,778 | 46,947,425 | 214,980,608 | 214,980,608 |
| 104 | 120,001 | 130,000 | 386 | 3,164 | 47,960,564 | 262,941,172 | 262,941,172 |
| 105 | 130,001 | 140,000 | 358 | 3,522 | 47,996,603 | 310,937,775 | 310,937,775 |
| 106 | 140,001 | 150,000 | 324 | 3,846 | 46,746,236 | 357,684,011 | 357,684,011 |
| 107 | 150,001 | 160,000 | 315 | 4,161 | 48,512,357 | 406,196,368 | 406,196,368 |
| 108 | 160,001 | 170,000 | 257 | 4,418 | 42,263,532 | 448,459,901 | 448,459,901 |
| 109 | 170,001 | 180,000 | 271 | 4,689 | 47,150,106 | 495,610,007 | 495,610,007 |
| 110 | 180,001 | 190,000 | 246 | 4,935 | 45,244,912 | 540,854,919 | 540,854,919 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 111 | 190,001 | 200,000 | 262 | 5,197 | 50,780,789 | 591,635,708 | 591,635,708 |
| 112 | 200,001 | 210,000 | 210 | 5,407 | 42,796,456 | 634,432,164 | 634,432,164 |
| 113 | 210,001 | 220,000 | 208 | 5,615 | 44,534,965 | 678,967,129 | 678,967,129 |
| 114 | 220,001 | 230,000 | 179 | 5,794 | 40,044,829 | 719,011,958 | 719,011,958 |
| 115 | 230,001 | 240,000 | 145 | 5,939 | 33,919,215 | 752,931,173 | 752,931,173 |
| 116 | 240,001 | 250,000 | 137 | 6,076 | 33,420,509 | 786,351,683 | 786,351,683 |
| 117 | 250,001 | 260,000 | 147 | 6,223 | 37,293,194 | 823,644,876 | 823,644,876 |
| 118 | 260,001 | 270,000 | 114 | 6,337 | 30,092,622 | 853,737,499 | 853,737,499 |
| 119 | 270,001 | 280,000 | 150 | 6,487 | 41,015,213 | 894,752,711 | 894,752,711 |
| 120 | 280,001 | 290,000 | 122 | 6,609 | 34,603,073 | 929,355,784 | 929,355,784 |
| 121 | 290,001 | 300,000 | 106 | 6,715 | 31,086,205 | 960,441,989 | 960,441,989 |
| 122 | 300,001 | 310,000 | 86 | 6,801 | 26,110,447 | 986,552,435 | 986,552,435 |
| 123 | 310,001 | 320,000 | 87 | 6,888 | 27,247,798 | 1,013,800,233 | 1,013,800,233 |
| 124 | 320,001 | 330,000 | 92 | 6,980 | 29,746,377 | 1,043,546,610 | 1,043,546,610 |
| 125 | 330,001 | 340,000 | 76 | 7,056 | 25,375,411 | 1,068,922,021 | 1,068,922,021 |
| 126 | 340,001 | 350,000 | 64 | 7,120 | 21,955,881 | 1,090,877,902 | 1,090,877,902 |
| 127 | 350,001 | 360,000 | 59 | 7,179 | 20,877,896 | 1,111,755,798 | 1,111,755,798 |
| 128 | 360,001 | 370,000 | 61 | 7,240 | 22,174,665 | 1,133,930,463 | 1,133,930,463 |
| 129 | 370,001 | 380,000 | 52 | 7,292 | 19,382,582 | 1,153,313,045 | 1,153,313,045 |
| 130 | 380,001 | 390,000 | 59 | 7,351 | 22,605,317 | 1,175,918,363 | 1,175,918,363 |
| 131 | 390,001 | 400,000 | 46 | 7,397 | 18,043,224 | 1,193,961,587 | 1,193,961,587 |
| 132 | 400,001 | 410,000 | 45 | 7,442 | 18,136,936 | 1,212,098,523 | 1,212,098,523 |
| 133 | 410,001 | 420,000 | 47 | 7,489 | 19,449,827 | 1,231,548,351 | 1,231,548,351 |
| 134 | 420,001 | 430,000 | 28 | 7,517 | 11,838,383 | 1,243,386,734 | 1,243,386,734 |
| 135 | 430,001 | 440,000 | 37 | 7,554 | 16,007,230 | 1,259,393,963 | 1,259,393,963 |
| 136 | 440,001 | 450,000 | 28 | 7,582 | 12,412,319 | 1,271,806,282 | 1,271,806,282 |
| 137 | 450,001 | 460,000 | 37 | 7,619 | 16,753,126 | 1,288,559,409 | 1,288,559,409 |
| 138 | 460,001 | 470,000 | 28 | 7,647 | 12,955,834 | 1,301,515,243 | 1,301,515,243 |
| 139 | 470,001 | 480,000 | 33 | 7,680 | 15,610,333 | 1,317,125,576 | 1,317,125,576 |
| 140 | 480,001 | 490,000 | 35 | 7,715 | 16,894,636 | 1,334,020,211 | 1,334,020,211 |
| 141 | 490,001 | 500,000 | 38 | 7,753 | 18,713,674 | 1,352,733,885 | 1,352,733,885 |
| 142 | 500,001 | 510,000 | 38 | 7,791 | 19,093,400 | 1,371,827,286 | 1,371,827,286 |
| 143 | 510,001 | 520,000 | 26 | 7,817 | 13,328,199 | 1,385,155,485 | 1,385,155,485 |
| 144 | 520,001 | 530,000 | 37 | 7,854 | 19,321,135 | 1,404,476,619 | 1,404,476,619 |
| 145 | 530,001 | 540,000 | 17 | 7,871 | 9,064,374 | 1,413,540,993 | 1,413,540,993 |
| 146 | 540,001 | 550,000 | 20 | 7,891 | 10,846,193 | 1,424,387,186 | 1,424,387,186 |
| 147 | 550,001 | 560,000 | 22 | 7,913 | 12,133,471 | 1,436,520,657 | 1,436,520,657 |
| 148 | 560,001 | 570,000 | 17 | 7,930 | 9,555,732 | 1,446,076,388 | 1,446,076,388 |
| 149 | 570,001 | 580,000 | 24 | 7,954 | 13,745,582 | 1,459,821,971 | 1,459,821,971 |
| 150 | 580,001 | 590,000 | 17 | 7,971 | 9,908,492 | 1,469,730,463 | 1,469,730,463 |
| 151 | 590,001 | 600,000 | 16 | 7,987 | 9,474,947 | 1,479,205,410 | 1,479,205,410 |
| 152 | 600,001 | 610,000 | 10 | 7,997 | 6,012,379 | 1,485,217,789 | 1,485,217,789 |
| 153 | 610,001 | 620,000 | 20 | 8,017 | 12,238,020 | 1,497,455,809 | 1,497,455,809 |
| 154 | 620,001 | 630,000 | 18 | 8,035 | 11,221,520 | 1,508,677,328 | 1,508,677,328 |
| 155 | 630,001 | 640,000 | 13 | 8,048 | 8,222,866 | 1,516,900,194 | 1,516,900,194 |
| 156 | 640,001 | 650,000 | 12 | 8,060 | 7,691,919 | 1,524,592,113 | 1,524,592,113 |
| 157 | 650,001 | 660,000 | 11 | 8,071 | 7,172,226 | 1,531,764,339 | 1,531,764,339 |
| 158 | 660,001 | 670,000 | 21 | 8,092 | 13,909,246 | 1,545,673,585 | 1,545,673,585 |
| 159 | 670,001 | 680,000 | 13 | 8,105 | 8,733,094 | 1,554,406,679 | 1,554,406,679 |
| 160 | 680,001 | 690,000 | 8 | 8,113 | 5,465,187 | 1,559,871,866 | 1,559,871,866 |
| 161 | 690,001 | 700,000 | 14 | 8,127 | 9,674,013 | 1,569,545,879 | 1,569,545,879 |
| 162 | 700,001 | 710,000 | 6 | 8,133 | 4,214,842 | 1,573,760,721 | 1,573,760,721 |
| 163 | 710,001 | 720,000 | 6 | 8,139 | 4,264,210 | 1,578,024,931 | 1,578,024,931 |
| 164 | 720,001 | 730,000 | 13 | 8,152 | 9,380,408 | 1,587,405,339 | 1,587,405,339 |
| 165 | 730,001 | 740,000 | 4 | 8,156 | 2,929,560 | 1,590,334,899 | 1,590,334,899 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 166 | 740,001 | 750,000 | 6 | 8,162 | 4,449,831 | 1,594,784,730 | 1,594,784,730 |
| 167 | 750,001 | 760,000 | 9 | 8,171 | 6,775,954 | 1,601,560,684 | 1,601,560,684 |
| 168 | 760,001 | 770,000 | 5 | 8,176 | 3,800,961 | 1,605,361,645 | 1,605,361,645 |
| 169 | 770,001 | 780,000 | 4 | 8,180 | 3,091,774 | 1,608,453,419 | 1,608,453,419 |
| 170 | 780,001 | 790,000 | 6 | 8,186 | 4,695,468 | 1,613,148,887 | 1,613,148,887 |
| 171 | 790,001 | 800,000 | 9 | 8,195 | 7,131,981 | 1,620,280,868 | 1,620,280,868 |
| 172 | 800,001 | 810,000 | 10 | 8,205 | 8,001,708 | 1,628,282,576 | 1,628,282,576 |
| 173 | 810,001 | 820,000 | 9 | 8,214 | 7,288,850 | 1,635,571,426 | 1,635,571,426 |
| 174 | 820,001 | 830,000 | 9 | 8,223 | 7,390,223 | 1,642,961,649 | 1,642,961,649 |
| 175 | 830,001 | 840,000 | 8 | 8,231 | 6,655,818 | 1,649,617,467 | 1,649,617,467 |
| 176 | 840,001 | 850,000 | 13 | 8,244 | 10,922,155 | 1,660,539,621 | 1,660,539,621 |
| 177 | 850,001 | 860,000 | 13 | 8,257 | 11,054,998 | 1,671,594,619 | 1,671,594,619 |
| 178 | 860,001 | 870,000 | 9 | 8,266 | 7,747,729 | 1,679,342,348 | 1,679,342,348 |
| 179 | 870,001 | 880,000 | 13 | 8,279 | 11,336,457 | 1,690,678,806 | 1,690,678,806 |
| 180 | 880,001 | 890,000 | 11 | 8,290 | 9,686,257 | 1,700,365,062 | 1,700,365,062 |
| 181 | 890,001 | 900,000 | 12 | 8,302 | 10,693,425 | 1,711,058,487 | 1,711,058,487 |
| 182 | 900,001 | 910,000 | 11 | 8,313 | 9,918,726 | 1,720,977,214 | 1,720,977,214 |
| 183 | 910,001 | 920,000 | 6 | 8,319 | 5,462,464 | 1,726,439,678 | 1,726,439,678 |
| 184 | 920,001 | 930,000 | 8 | 8,327 | 7,354,552 | 1,733,794,230 | 1,733,794,230 |
| 185 | 930,001 | 940,000 | 11 | 8,338 | 10,218,423 | 1,744,012,653 | 1,744,012,653 |
| 186 | 940,001 | 950,000 | 11 | 8,349 | 10,351,265 | 1,754,363,919 | 1,754,363,919 |
| 187 | 950,001 | 960,000 | 9 | 8,358 | 8,557,126 | 1,762,921,045 | 1,762,921,045 |
| 188 | 960,001 | 970,000 | 4 | 8,362 | 3,831,249 | 1,766,752,294 | 1,766,752,294 |
| 189 | 970,001 | 980,000 | 8 | 8,370 | 7,758,907 | 1,774,511,201 | 1,774,511,201 |
| 190 | 980,001 | 990,000 | 9 | 8,379 | 8,825,575 | 1,783,336,776 | 1,783,336,776 |
| 191 | 990,001 | 1,000,000 | 8 | 8,387 | 7,925,851 | 1,791,262,627 | 1,791,262,627 |
| 192 | 1,000,001 | 1,010,000 | 10 | 8,397 | 10,005,668 | 1,801,268,295 | 1,801,268,295 |
| 193 | 1,010,001 | 1,020,000 | 7 | 8,404 | 7,064,598 | 1,808,332,893 | 1,808,332,893 |
| 194 | 1,020,001 | 1,030,000 | 5 | 8,409 | 5,112,967 | 1,813,445,860 | 1,813,445,860 |
| 195 | 1,030,001 | 1,040,000 | 6 | 8,415 | 6,174,473 | 1,819,620,334 | 1,819,620,334 |
| 196 | 1,040,001 | 1,050,000 | 10 | 8,425 | 10,385,288 | 1,830,005,621 | 1,830,005,621 |
| 197 | 1,050,001 | 1,060,000 | 8 | 8,433 | 8,400,959 | 1,838,406,580 | 1,838,406,580 |
| 198 | 1,060,001 | 1,070,000 | 10 | 8,443 | 10,597,199 | 1,849,003,779 | 1,849,003,779 |
| 199 | 1,070,001 | 1,080,000 | 4 | 8,447 | 4,271,638 | 1,853,275,418 | 1,853,275,418 |
| 200 | 1,080,001 | 1,090,000 | 5 | 8,452 | 5,405,582 | 1,858,680,999 | 1,858,680,999 |
| 201 | 1,090,001 | 1,100,000 | 4 | 8,456 | 4,361,861 | 1,863,042,860 | 1,863,042,860 |
| 202 | 1,100,001 | 1,110,000 | 9 | 8,465 | 9,899,923 | 1,872,942,783 | 1,872,942,783 |
| 203 | 1,110,001 | 1,120,000 | 6 | 8,471 | 6,657,770 | 1,879,600,553 | 1,879,600,553 |
| 204 | 1,120,001 | 1,130,000 | 6 | 8,477 | 6,723,824 | 1,886,324,376 | 1,886,324,376 |
| 205 | 1,130,001 | 1,140,000 | 5 | 8,482 | 5,651,578 | 1,891,975,954 | 1,891,975,954 |
| 206 | 1,140,001 | 1,150,000 | 7 | 8,489 | 7,965,729 | 1,899,941,683 | 1,899,941,683 |
| 207 | 1,150,001 | 1,160,000 | 7 | 8,496 | 8,046,556 | 1,907,988,239 | 1,907,988,239 |
| 208 | 1,160,001 | 1,170,000 | 7 | 8,503 | 8,109,305 | 1,916,097,543 | 1,916,097,543 |
| 209 | 1,170,001 | 1,180,000 | 7 | 8,510 | 8,178,495 | 1,924,276,038 | 1,924,276,038 |
| 210 | 1,180,001 | 1,190,000 | 6 | 8,516 | 7,065,755 | 1,931,341,793 | 1,931,341,793 |
| 211 | 1,190,001 | 1,200,000 | 5 | 8,521 | 5,958,976 | 1,937,300,769 | 1,937,300,769 |
| 212 | 1,200,001 | 1,210,000 | 6 | 8,527 | 7,187,792 | 1,944,488,561 | 1,944,488,561 |
| 213 | 1,210,001 | 1,220,000 | 3 | 8,530 | 3,626,731 | 1,948,115,292 | 1,948,115,292 |
| 214 | 1,220,001 | 1,230,000 | 5 | 8,535 | 6,099,690 | 1,954,214,982 | 1,954,214,982 |
| 215 | 1,230,001 | 1,240,000 | 5 | 8,540 | 6,155,874 | 1,960,370,856 | 1,960,370,856 |
| 216 | 1,240,001 | 1,250,000 | 10 | 8,550 | 12,373,810 | 1,972,744,666 | 1,972,744,666 |
| 217 | 1,250,001 | 1,260,000 | 3 | 8,553 | 3,742,018 | 1,976,486,684 | 1,976,486,684 |
| 218 | 1,260,001 | 1,270,000 | 12 | 8,565 | 15,126,594 | 1,991,613,277 | 1,991,613,277 |
| 219 | 1,270,001 | 1,280,000 | 9 | 8,574 | 11,426,581 | 2,003,039,858 | 2,003,039,858 |
| 220 | 1,280,001 | 1,290,000 | 3 | 8,577 | 3,837,572 | 2,006,877,430 | 2,006,877,430 |

Duquesne Light Company
Bill Frequency Distribution
Rate GL- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 9 of 13
Page 5 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 221 | 1,290,001 | 1,300,000 | 9 | 8,586 | 11,596,715 | 2,018,474,145 | 2,018,474,145 |
| 222 | 1,300,001 | 1,310,000 | 6 | 8,592 | 7,800,097 | 2,026,274,243 | 2,026,274,243 |
| 223 | 1,310,001 | 1,320,000 | 7 | 8,599 | 9,170,322 | 2,035,444,565 | 2,035,444,565 |
| 224 | 1,320,001 | 1,330,000 | 11 | 8,610 | 14,501,526 | 2,049,946,090 | 2,049,946,090 |
| 225 | 1,330,001 | 1,340,000 | 7 | 8,617 | 9,300,846 | 2,059,246,936 | 2,059,246,936 |
| 226 | 1,340,001 | 1,350,000 | 4 | 8,621 | 5,357,685 | 2,064,604,621 | 2,064,604,621 |
| 227 | 1,350,001 | 1,360,000 | 4 | 8,625 | 5,397,159 | 2,070,001,780 | 2,070,001,780 |
| 228 | 1,360,001 | 1,370,000 | 6 | 8,631 | 8,150,158 | 2,078,151,938 | 2,078,151,938 |
| 229 | 1,370,001 | 1,380,000 | 6 | 8,637 | 8,211,460 | 2,086,363,398 | 2,086,363,398 |
| 230 | 1,380,001 | 1,390,000 | 2 | 8,639 | 2,753,985 | 2,089,117,383 | 2,089,117,383 |
| 231 | 1,390,001 | 1,400,000 | 6 | 8,645 | 8,338,430 | 2,097,455,813 | 2,097,455,813 |
| 232 | 1,400,001 | 1,410,000 | 8 | 8,653 | 11,183,890 | 2,108,639,703 | 2,108,639,703 |
| 233 | 1,410,001 | 1,420,000 | 1 | 8,654 | 1,403,331 | 2,110,043,034 | 2,110,043,034 |
| 234 | 1,420,001 | 1,430,000 | 2 | 8,656 | 2,839,463 | 2,112,882,497 | 2,112,882,497 |
| 235 | 1,430,001 | 1,440,000 | 2 | 8,658 | 2,861,678 | 2,115,744,175 | 2,115,744,175 |
| 236 | 1,440,001 | 1,450,000 | 4 | 8,662 | 5,751,771 | 2,121,495,946 | 2,121,495,946 |
| 237 | 1,450,001 | 1,460,000 | 2 | 8,664 | 2,889,280 | 2,124,385,226 | 2,124,385,226 |
| 238 | 1,460,001 | 1,470,000 | 3 | 8,667 | 4,373,772 | 2,128,758,998 | 2,128,758,998 |
| 239 | 1,470,001 | 1,480,000 | 4 | 8,671 | 5,862,118 | 2,134,621,116 | 2,134,621,116 |
| 240 | 1,480,001 | 1,490,000 | 6 | 8,677 | 8,866,376 | 2,143,487,492 | 2,143,487,492 |
| 241 | 1,490,001 | 1,500,000 | 1 | 8,678 | 1,484,954 | 2,144,972,446 | 2,144,972,446 |
| 242 | 1,500,001 | 1,510,000 | 2 | 8,680 | 2,996,484 | 2,147,968,930 | 2,147,968,930 |
| 243 | 1,510,001 | 1,520,000 | 5 | 8,685 | 7,543,288 | 2,155,512,218 | 2,155,512,218 |
| 244 | 1,520,001 | 1,530,000 | 1 | 8,686 | 1,518,194 | 2,157,030,412 | 2,157,030,412 |
| 245 | 1,530,001 | 1,540,000 | 3 | 8,689 | 4,572,680 | 2,161,603,091 | 2,161,603,091 |
| 246 | 1,540,001 | 1,550,000 | 4 | 8,693 | 6,144,666 | 2,167,747,758 | 2,167,747,758 |
| 247 | 1,550,001 | 1,560,000 | 4 | 8,697 | 6,190,613 | 2,173,938,371 | 2,173,938,371 |
| 248 | 1,560,001 | 1,570,000 | 7 | 8,704 | 10,906,171 | 2,184,844,542 | 2,184,844,542 |
| 249 | 1,570,001 | 1,580,000 | 2 | 8,706 | 3,138,365 | 2,187,982,906 | 2,187,982,906 |
| 250 | 1,580,001 | 1,590,000 | 1 | 8,707 | 1,578,817 | 2,189,561,724 | 2,189,561,724 |
| 251 | 1,590,001 | 1,600,000 | 1 | 8,708 | 1,589,925 | 2,191,151,649 | 2,191,151,649 |
| 252 | 1,600,001 | 1,610,000 | 6 | 8,714 | 9,585,370 | 2,200,737,019 | 2,200,737,019 |
| 253 | 1,610,001 | 1,620,000 | 3 | 8,717 | 4,819,280 | 2,205,556,299 | 2,205,556,299 |
| 254 | 1,620,001 | 1,630,000 | 2 | 8,719 | 3,234,247 | 2,208,790,546 | 2,208,790,546 |
| 255 | 1,630,001 | 1,640,000 | 1 | 8,720 | 1,631,926 | 2,210,422,472 | 2,210,422,472 |
| 256 | 1,640,001 | 1,650,000 | 4 | 8,724 | 6,554,173 | 2,216,976,645 | 2,216,976,645 |
| 257 | 1,650,001 | 1,660,000 | 4 | 8,728 | 6,585,180 | 2,223,561,825 | 2,223,561,825 |
| 258 | 1,660,001 | 1,670,000 | 1 | 8,729 | 1,655,038 | 2,225,216,863 | 2,225,216,863 |
| 259 | 1,680,001 | 1,690,000 | 3 | 8,732 | 5,028,838 | 2,230,245,700 | 2,230,245,700 |
| 260 | 1,690,001 | 1,700,000 | 1 | 8,733 | 1,689,159 | 2,231,934,859 | 2,231,934,859 |
| 261 | 1,700,001 | 1,710,000 | 3 | 8,736 | 5,100,972 | 2,237,035,831 | 2,237,035,831 |
| 262 | 1,710,001 | 1,720,000 | 3 | 8,739 | 5,124,602 | 2,242,160,433 | 2,242,160,433 |
| 263 | 1,720,001 | 1,730,000 | 3 | 8,742 | 5,140,254 | 2,247,300,687 | 2,247,300,687 |
| 264 | 1,730,001 | 1,740,000 | 3 | 8,745 | 5,172,599 | 2,252,473,285 | 2,252,473,285 |
| 265 | 1,740,001 | 1,750,000 | 4 | 8,749 | 6,947,364 | 2,259,420,649 | 2,259,420,649 |
| 266 | 1,750,001 | 1,760,000 | 3 | 8,752 | 5,246,375 | 2,264,667,024 | 2,264,667,024 |
| 267 | 1,760,001 | 1,770,000 | 1 | 8,753 | 1,756,638 | 2,266,423,662 | 2,266,423,662 |
| 268 | 1,770,001 | 1,780,000 | 1 | 8,754 | 1,770,876 | 2,268,194,538 | 2,268,194,538 |
| 269 | 1,780,001 | 1,790,000 | 1 | 8,755 | 1,774,358 | 2,269,968,896 | 2,269,968,896 |
| 270 | 1,790,001 | 1,800,000 | 1 | 8,756 | 1,782,530 | 2,271,751,426 | 2,271,751,426 |
| 271 | 1,800,001 | 1,810,000 | 6 | 8,762 | 10,786,655 | 2,282,538,081 | 2,282,538,081 |
| 272 | 1,810,001 | 1,820,000 | 1 | 8,763 | 1,811,032 | 2,284,349,113 | 2,284,349,113 |
| 273 | 1,820,001 | 1,830,000 | 2 | 8,765 | 3,636,448 | 2,287,985,561 | 2,287,985,561 |
| 274 | 1,830,001 | 1,840,000 | 4 | 8,769 | 7,298,795 | 2,295,284,356 | 2,295,284,356 |
| 275 | 1,840,001 | 1,850,000 | 1 | 8,770 | 1,839,473 | 2,297,123,829 | 2,297,123,829 |

Duquesne Light Company
Bill Frequency Distribution
Rate GL- 12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 9 of 13
Page 6 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 276 | 1,860,001 | 1,870,000 | 2 | 8,772 | 3,712,663 | 2,300,836,492 | 2,300,836,492 |
| 277 | 1,890,001 | 1,900,000 | 4 | 8,776 | 7,537,899 | 2,308,374,391 | 2,308,374,391 |
| 278 | 1,910,001 | 1,920,000 | 1 | 8,777 | 1,905,022 | 2,310,279,413 | 2,310,279,413 |
| 279 | 1,920,001 | 1,930,000 | 4 | 8,781 | 7,672,142 | 2,317,951,555 | 2,317,951,555 |
| 280 | 1,930,001 | 1,940,000 | 1 | 8,782 | 1,922,119 | 2,319,873,674 | 2,319,873,674 |
| 281 | 1,940,001 | 1,950,000 | 3 | 8,785 | 5,803,268 | 2,325,676,941 | 2,325,676,941 |
| 282 | 1,950,001 | 1,960,000 | 2 | 8,787 | 3,889,316 | 2,329,566,257 | 2,329,566,257 |
| 283 | 1,980,001 | 1,990,000 | 1 | 8,788 | 1,980,293 | 2,331,546,550 | 2,331,546,550 |
| 284 | 1,990,001 | 2,000,000 | 3 | 8,791 | 5,959,896 | 2,337,506,447 | 2,337,506,447 |
| 285 | 2,000,001 | 2,010,000 | 2 | 8,793 | 3,990,300 | 2,341,496,747 | 2,341,496,747 |
| 286 | 2,010,001 | 2,020,000 | 2 | 8,795 | 4,016,165 | 2,345,512,912 | 2,345,512,912 |
| 287 | 2,020,001 | 2,030,000 | 2 | 8,797 | 4,024,976 | 2,349,537,888 | 2,349,537,888 |
| 288 | 2,030,001 | 2,040,000 | 1 | 8,798 | 2,024,650 | 2,351,562,538 | 2,351,562,538 |
| 289 | 2,040,001 | 2,050,000 | 1 | 8,799 | 2,032,685 | 2,353,595,223 | 2,353,595,223 |
| 290 | 2,050,001 | 2,060,000 | 1 | 8,800 | 2,043,346 | 2,355,638,570 | 2,355,638,570 |
| 291 | 2,060,001 | 2,070,000 | 3 | 8,803 | 6,160,533 | 2,361,799,102 | 2,361,799,102 |
| 292 | 2,100,001 | 2,110,000 | 3 | 8,806 | 6,281,312 | 2,368,080,415 | 2,368,080,415 |
| 293 | 2,110,001 | 2,120,000 | 2 | 8,808 | 4,208,046 | 2,372,288,461 | 2,372,288,461 |
| 294 | 2,120,001 | 2,130,000 | 1 | 8,809 | 2,113,873 | 2,374,402,333 | 2,374,402,333 |
| 295 | 2,140,001 | 2,150,000 | 1 | 8,810 | 2,139,101 | 2,376,541,435 | 2,376,541,435 |
| 296 | 2,150,001 | 2,160,000 | 2 | 8,812 | 4,284,099 | 2,380,825,534 | 2,380,825,534 |
| 297 | 2,160,001 | 2,170,000 | 2 | 8,814 | 4,314,171 | 2,385,139,705 | 2,385,139,705 |
| 298 | 2,170,001 | 2,180,000 | 1 | 8,815 | 2,162,986 | 2,387,302,691 | 2,387,302,691 |
| 299 | 2,180,001 | 2,190,000 | 2 | 8,817 | 4,356,012 | 2,391,658,703 | 2,391,658,703 |
| 300 | 2,200,001 | 2,210,000 | 1 | 8,818 | 2,199,416 | 2,393,858,118 | 2,393,858,118 |
| 301 | 2,220,001 | 2,230,000 | 1 | 8,819 | 2,214,848 | 2,396,072,966 | 2,396,072,966 |
| 302 | 2,230,001 | 2,240,000 | 1 | 8,820 | 2,222,663 | 2,398,295,629 | 2,398,295,629 |
| 303 | 2,240,001 | 2,250,000 | 1 | 8,821 | 2,238,893 | 2,400,534,522 | 2,400,534,522 |
| 304 | 2,280,001 | 2,290,000 | 2 | 8,823 | 4,549,406 | 2,405,083,928 | 2,405,083,928 |
| 305 | 2,290,001 | 2,300,000 | 1 | 8,824 | 2,279,795 | 2,407,363,723 | 2,407,363,723 |
| 306 | 2,310,001 | 2,320,000 | 1 | 8,825 | 2,303,407 | 2,409,667,130 | 2,409,667,130 |
| 307 | 2,320,001 | 2,330,000 | 1 | 8,826 | 2,315,976 | 2,411,983,107 | 2,411,983,107 |
| 308 | 2,330,001 | 2,340,000 | 1 | 8,827 | 2,328,736 | 2,414,311,843 | 2,414,311,843 |
| 309 | 2,340,001 | 2,350,000 | 1 | 8,828 | 2,334,874 | 2,416,646,717 | 2,416,646,717 |
| 310 | 2,350,001 | 2,360,000 | 1 | 8,829 | 2,341,790 | 2,418,988,507 | 2,418,988,507 |
| 311 | 2,360,001 | 2,370,000 | 1 | 8,830 | 2,353,540 | 2,421,342,047 | 2,421,342,047 |
| 312 | 2,370,001 | 2,380,000 | 2 | 8,832 | 4,736,508 | 2,426,078,555 | 2,426,078,555 |
| 313 | 2,380,001 | 2,390,000 | 2 | 8,834 | 4,749,236 | 2,430,827,791 | 2,430,827,791 |
| 314 | 2,390,001 | 2,400,000 | 1 | 8,835 | 2,381,266 | 2,433,209,057 | 2,433,209,057 |
| 315 | 2,400,001 | 2,410,000 | 1 | 8,836 | 2,392,795 | 2,435,601,851 | 2,435,601,851 |
| 316 | 2,440,001 | 2,450,000 | 2 | 8,838 | 4,874,687 | 2,440,476,539 | 2,440,476,539 |
| 317 | 2,450,001 | 2,460,000 | 2 | 8,840 | 4,881,336 | 2,445,357,874 | 2,445,357,874 |
| 318 | 2,470,001 | 2,480,000 | 2 | 8,842 | 4,925,999 | 2,450,283,874 | 2,450,283,874 |
| 319 | 2,480,001 | 2,490,000 | 1 | 8,843 | 2,473,608 | 2,452,757,482 | 2,452,757,482 |
| 320 | 2,490,001 | 2,500,000 | 2 | 8,845 | 4,966,113 | 2,457,723,595 | 2,457,723,595 |
| 321 | 2,500,001 | 2,510,000 | 3 | 8,848 | 7,474,978 | 2,465,198,572 | 2,465,198,572 |
| 322 | 2,520,001 | 2,530,000 | 1 | 8,849 | 2,510,266 | 2,467,708,838 | 2,467,708,838 |
| 323 | 2,530,001 | 2,540,000 | 1 | 8,850 | 2,527,909 | 2,470,236,747 | 2,470,236,747 |
| 324 | 2,540,001 | 2,550,000 | 1 | 8,851 | 2,530,083 | 2,472,766,830 | 2,472,766,830 |
| 325 | 2,580,001 | 2,590,000 | 1 | 8,852 | 2,577,613 | 2,475,344,443 | 2,475,344,443 |
| 326 | 2,610,001 | 2,620,000 | 1 | 8,853 | 2,600,578 | 2,477,945,021 | 2,477,945,021 |
| 327 | 2,620,001 | 2,630,000 | 1 | 8,854 | 2,614,926 | 2,480,559,946 | 2,480,559,946 |
| 328 | 2,630,001 | 2,640,000 | 1 | 8,855 | 2,621,139 | 2,483,181,085 | 2,483,181,085 |
| 329 | 2,650,001 | 2,660,000 | 1 | 8,856 | 2,641,657 | 2,485,822,742 | 2,485,822,742 |
| 330 | 2,660,001 | 2,670,000 | 1 | 8,857 | 2,654,417 | 2,488,477,160 | 2,488,477,160 |

Part 9 of 13
Page 7 of 7
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 331 | 2,680,001 | 2,690,000 | 1 | 8,858 | 2,667,593 | 2,491,144,753 | 2,491,144,753 |
| 332 | 2,690,001 | 2,700,000 | 2 | 8,860 | 5,362,548 | 2,496,507,301 | 2,496,507,301 |
| 333 | 2,700,001 | 2,710,000 | 1 | 8,861 | 2,696,229 | 2,499,203,530 | 2,499,203,530 |
| 334 | 2,710,001 | 2,720,000 | 1 | 8,862 | 2,699,417 | 2,501,902,947 | 2,501,902,947 |
| 335 | 2,720,001 | 2,730,000 | 1 | 8,863 | 2,708,855 | 2,504,611,802 | 2,504,611,802 |
| 336 | 2,730,001 | 2,740,000 | 1 | 8,864 | 2,717,713 | 2,507,329,516 | 2,507,329,516 |
| 337 | 2,750,001 | 2,760,000 | 1 | 8,865 | 2,741,291 | 2,510,070,806 | 2,510,070,806 |
| 338 | 2,760,001 | 2,770,000 | 1 | 8,866 | 2,748,726 | 2,512,819,532 | 2,512,819,532 |
| 339 | 2,800,001 | 2,810,000 | 1 | 8,867 | 2,788,672 | 2,515,608,205 | 2,515,608,205 |
| 340 | 2,840,001 | 2,850,000 | 3 | 8,870 | 8,495,649 | 2,524,103,853 | 2,524,103,853 |
| 341 | 2,860,001 | 2,870,000 | 1 | 8,871 | 2,848,112 | 2,526,951,965 | 2,526,951,965 |
| 342 | 2,900,001 | 2,910,000 | 1 | 8,872 | 2,888,972 | 2,529,840,937 | 2,529,840,937 |
| 343 | 2,950,001 | 2,960,000 | 1 | 8,873 | 2,944,986 | 2,532,785,923 | 2,532,785,923 |
| 344 | 3,000,001 | 3,010,000 | 1 | 8,874 | 2,987,462 | 2,535,773,385 | 2,535,773,385 |
| 345 | 3,040,001 | 3,050,000 | 1 | 8,875 | 3,031,358 | 2,538,804,744 | 2,538,804,744 |
| 346 | 3,050,001 | 3,060,000 | 1 | 8,876 | 3,037,077 | 2,541,841,820 | 2,541,841,820 |
| 347 | 3,070,001 | 3,080,000 | 1 | 8,877 | 3,055,507 | 2,544,897,328 | 2,544,897,328 |
| 348 | 3,130,001 | 3,140,000 | 1 | 8,878 | 3,115,212 | 2,548,012,540 | 2,548,012,540 |
| 349 | 3,260,001 | 3,270,000 | 1 | 8,879 | 3,245,327 | 2,551,257,867 | 2,551,257,867 |
| 350 | 3,290,001 | 3,300,000 | 1 | 8,880 | 3,277,192 | 2,554,535,059 | 2,554,535,059 |
| 351 | 3,450,001 | 3,460,000 | 1 | 8,881 | 3,435,504 | 2,557,970,562 | 2,557,970,562 |
| 352 | 3,550,001 | 3,560,000 | 1 | 8,882 | 3,542,350 | 2,561,512,912 | 2,561,512,912 |
| 353 | 3,610,001 | 3,620,000 | 1 | 8,883 | 3,597,997 | 2,565,110,909 | 2,565,110,909 |

Duquesne Light Company
Bill Frequency Distribution
Rate GLH-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 10 of 13
Page 1 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 4,001 | 5,000 | 4 | 4 | 17,351 | 17,351 | 5,362,351 |
| 2 | 5,001 | 6,000 | 8 | 12 | 48,692 | 66,043 | 5,371,043 |
| 3 | 6,001 | 7,000 | 3 | 15 | 25,162 | 91,206 | 5,381,206 |
| 4 | 7,001 | 8,000 | 3 | 18 | 22,810 | 114,015 | 5,389,015 |
| 5 | 8,001 | 9,000 | 2 | 20 | 16,613 | 130,628 | 5,395,628 |
| 6 | 9,001 | 10,000 | 3 | 23 | 29,090 | 159,718 | 5,409,718 |
| 7 | 10,001 | 11,000 | 3 | 26 | 31,212 | 190,930 | 5,425,930 |
| 8 | 11,001 | 12,000 | 1 | 27 | 11,621 | 202,551 | 5,432,551 |
| 9 | 12,001 | 13,000 | 2 | 29 | 24,296 | 226,847 | 5,446,847 |
| 10 | 13,001 | 14,000 | 1 | 30 | 13,418 | 240,265 | 5,455,265 |
| 11 | 16,001 | 17,000 | 1 | 31 | 16,232 | 256,497 | 5,466,497 |
| 12 | 18,001 | 19,000 | 2 | 33 | 37,259 | 293,756 | 5,493,756 |
| 13 | 22,001 | 23,000 | 1 | 34 | 22,554 | 316,309 | 5,511,309 |
| 14 | 23,001 | 24,000 | 3 | 37 | 69,758 | 386,067 | 5,566,067 |
| 15 | 24,001 | 25,000 | 1 | 38 | 23,844 | 409,911 | 5,584,911 |
| 16 | 25,001 | 26,000 | 1 | 39 | 25,698 | 435,609 | 5,605,609 |
| 17 | 26,001 | 27,000 | 3 | 42 | 78,244 | 513,853 | 5,668,853 |
| 18 | 28,001 | 29,000 | 1 | 43 | 27,827 | 541,680 | 5,691,680 |
| 19 | 29,001 | 30,000 | 2 | 45 | 58,697 | 600,377 | 5,740,377 |
| 20 | 30,001 | 31,000 | 2 | 47 | 60,305 | 660,682 | 5,790,682 |
| 21 | 31,001 | 32,000 | 2 | 49 | 62,366 | 723,048 | 5,843,048 |
| 22 | 32,001 | 33,000 | 2 | 51 | 96,547 | 819,595 | 5,929,595 |
| 23 | 34,001 | 35,000 | 3 | 54 | 102,474 | 922,069 | 6,017,069 |
| 24 | 36,001 | 37,000 | 3 | 57 | 108,983 | 1,031,053 | 6,111,053 |
| 25 | 37,001 | 38,000 | 1 | 58 | 36,991 | 1,068,044 | 6,143,044 |
| 26 | 38,001 | 39,000 | 2 | 60 | 76,819 | 1,144,862 | 6,209,862 |
| 27 | 39,001 | 40,000 | 2 | 62 | 117,838 | 1,262,700 | 6,317,700 |
| 28 | 40,001 | 41,000 | 1 | 63 | 40,449 | 1,303,149 | 6,353,149 |
| 29 | 41,001 | 42,000 | 1 | 64 | 40,899 | 1,344,048 | 6,389,048 |
| 30 | 43,001 | 44,000 | 1 | 65 | 43,082 | 1,387,130 | 6,427,130 |
| 31 | 44,001 | 45,000 | 2 | 67 | 88,559 | 1,475,690 | 6,505,690 |
| 32 | 46,001 | 47,000 | 1 | 68 | 45,969 | 1,521,659 | 6,546,659 |
| 33 | 47,001 | 48,000 | 1 | 69 | 46,523 | 1,568,182 | 6,588,182 |
| 34 | 48,001 | 49,000 | 1 | 70 | 47,816 | 1,615,997 | 6,630,997 |
| 35 | 49,001 | 50,000 | 1 | 71 | 48,743 | 1,664,741 | 6,674,741 |
| 36 | 50,001 | 51,000 | 1 | 72 | 49,507 | 1,714,248 | 6,719,248 |
| 37 | 51,001 | 52,000 | 2 | 74 | 101,837 | 1,816,085 | 6,811,085 |
| 38 | 52,001 | 53,000 | 1 | 75 | 51,575 | 1,867,660 | 6,857,660 |
| 39 | 55,001 | 56,000 | 2 | 77 | 110,089 | 1,977,749 | 6,957,749 |
| 40 | 56,001 | 57,000 | 5 | 82 | 390,931 | 2,368,680 | 7,323,680 |
| 41 | 57,001 | 58,000 | 1 | 83 | 57,342 | 2,426,022 | 7,376,022 |
| 42 | 58,001 | 59,000 | 3 | 86 | 173,616 | 2,599,638 | 7,534,638 |
| 43 | 59,001 | 60,000 | 3 | 89 | 176,709 | 2,776,347 | 7,696,347 |
| 44 | 62,001 | 63,000 | 4 | 93 | 308,094 | 3,084,441 | 7,984,441 |
| 45 | 63,001 | 64,000 | 1 | 94 | 62,425 | 3,146,866 | 8,041,866 |
| 46 | 64,001 | 65,000 | 1 | 95 | 63,618 | 3,210,484 | 8,100,484 |
| 47 | 65,001 | 66,000 | 4 | 99 | 259,141 | 3,469,625 | 8,339,625 |
| 48 | 68,001 | 69,000 | 3 | 102 | 203,160 | 3,672,786 | 8,527,786 |
| 49 | 69,001 | 70,000 | 3 | 105 | 206,270 | 3,879,056 | 8,719,056 |
| 50 | 70,001 | 71,000 | 4 | 109 | 348,500 | 4,227,556 | 9,047,556 |
| 51 | 71,001 | 72,000 | 3 | 112 | 212,132 | 4,439,688 | 9,244,688 |

Attachment DFR IV -C
Bill Frequency Distribution
Part 10 of 13
Rate GLH- 12 Months Ending December 31, 2020
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 52 | 72,001 | 73,000 |  | 115 | 214,956 | 4,654,644 | 9,444,644 |
| 53 | 73,001 | 74,000 | 2 | 117 | 145,417 | 4,800,061 | 9,580,061 |
| 54 | 74,001 | 75,000 | 3 | 120 | 220,734 | 5,020,795 | 9,785,795 |
| 55 | 75,001 | 76,000 | 3 | 123 | 224,133 | 5,244,929 | 9,994,929 |
| 56 | 76,001 | 77,000 | 1 | 124 | 75,453 | 5,320,381 | 10,065,381 |
| 57 | 77,001 | 78,000 | 2 | 126 | 153,408 | 5,473,789 | 10,208,789 |
| 58 | 78,001 | 79,000 | 1 | 127 | 78,103 | 5,551,892 | 10,281,892 |
| 59 | 79,001 | 80,000 | 3 | 130 | 314,659 | 5,866,551 | 10,581,551 |
| 60 | 80,001 | 81,000 | 2 | 132 | 159,272 | 6,025,823 | 10,730,823 |
| 61 | 81,001 | 82,000 | 1 | 133 | 80,341 | 6,106,165 | 10,806,165 |
| 62 | 82,001 | 83,000 | 5 | 138 | 407,643 | 6,513,808 | 11,188,808 |
| 63 | 84,001 | 85,000 | 1 | 139 | 83,815 | 6,597,623 | 11,267,623 |
| 64 | 85,001 | 86,000 | 4 | 143 | 338,107 | 6,935,731 | 11,585,731 |
| 65 | 86,001 | 87,000 | 8 | 151 | 771,357 | 7,707,088 | 12,317,088 |
| 66 | 87,001 | 88,000 | 3 | 154 | 258,988 | 7,966,075 | 12,561,075 |
| 67 | 88,001 | 89,000 | 2 | 156 | 174,540 | 8,140,615 | 12,725,615 |
| 68 | 89,001 | 90,000 | 3 | 159 | 265,178 | 8,405,793 | 12,975,793 |
| 69 | 90,001 | 91,000 | 5 | 164 | 446,922 | 8,852,715 | 13,397,715 |
| 70 | 91,001 | 92,000 | 4 | 168 | 362,104 | 9,214,819 | 13,739,819 |
| 71 | 92,001 | 93,000 | 8 | 176 | 823,122 | 10,037,942 | 14,522,942 |
| 72 | 93,001 | 94,000 | 4 | 180 | 370,094 | 10,408,035 | 14,873,035 |
| 73 | 94,001 | 95,000 | 6 | 186 | 560,112 | 10,968,147 | 15,403,147 |
| 74 | 95,001 | 96,000 | 3 | 189 | 283,810 | 11,251,958 | 15,671,958 |
| 75 | 96,001 | 97,000 | 4 | 193 | 382,657 | 11,634,615 | 16,034,615 |
| 76 | 97,001 | 98,000 | 4 | 197 | 385,785 | 12,020,400 | 16,400,400 |
| 77 | 98,001 | 99,000 | 1 | 198 | 96,944 | 12,117,344 | 16,492,344 |
| 78 | 99,001 | 100,000 | 7 | 205 | 689,433 | 12,806,777 | 17,146,777 |
| 79 | 100,001 | 110,000 | 36 | 241 | 3,818,971 | 16,625,748 | 20,785,748 |
| 80 | 110,001 | 120,000 | 38 | 279 | 4,443,496 | 21,069,245 | 25,039,245 |
| 81 | 120,001 | 130,000 | 62 | 341 | 7,790,334 | 28,859,579 | 32,519,579 |
| 82 | 130,001 | 140,000 | 49 | 390 | 6,640,559 | 35,500,138 | 38,915,138 |
| 83 | 140,001 | 150,000 | 34 | 424 | 5,030,744 | 40,530,882 | 43,775,882 |
| 84 | 150,001 | 160,000 | 40 | 464 | 6,141,189 | 46,672,071 | 49,717,071 |
| 85 | 160,001 | 170,000 | 36 | 500 | 5,876,225 | 52,548,296 | 55,413,296 |
| 86 | 170,001 | 180,000 | 34 | 534 | 5,884,360 | 58,432,656 | 61,127,656 |
| 87 | 180,001 | 190,000 | 24 | 558 | 4,398,841 | 62,831,497 | 65,406,497 |
| 88 | 190,001 | 200,000 | 37 | 595 | 7,308,304 | 70,139,802 | 72,529,802 |
| 89 | 200,001 | 210,000 | 26 | 621 | 5,268,467 | 75,408,268 | 77,668,268 |
| 90 | 210,001 | 220,000 | 28 | 649 | 6,155,255 | 81,563,524 | 83,683,524 |
| 91 | 220,001 | 230,000 | 18 | 667 | 3,995,473 | 85,558,997 | 87,588,997 |
| 92 | 230,001 | 240,000 | 23 | 690 | 5,324,596 | 90,883,593 | 92,798,593 |
| 93 | 240,001 | 250,000 | 12 | 702 | 2,893,493 | 93,777,086 | 95,632,086 |
| 94 | 250,001 | 260,000 | 19 | 721 | 5,049,720 | 98,826,807 | 100,586,807 |
| 95 | 260,001 | 270,000 | 17 | 738 | 4,441,307 | 103,268,114 | 104,943,114 |
| 96 | 270,001 | 280,000 | 13 | 751 | 3,537,781 | 106,805,896 | 108,415,896 |
| 97 | 280,001 | 290,000 | 18 | 769 | 5,077,789 | 111,883,685 | 113,403,685 |
| 98 | 290,001 | 300,000 | 15 | 784 | 4,374,409 | 116,258,094 | 117,703,094 |
| 99 | 300,001 | 310,000 | 16 | 800 | 4,823,174 | 121,081,268 | 122,446,268 |
| 100 | 310,001 | 320,000 | 10 | 810 | 3,098,041 | 124,179,309 | 125,494,309 |
| 101 | 320,001 | 330,000 | 10 | 820 | 3,215,039 | 127,394,348 | 128,659,348 |
| 102 | 330,001 | 340,000 | 9 | 829 | 2,964,031 | 130,358,379 | 131,578,379 |

Attachment DFR IV -C
Bill Frequency Distribution
Part 10 of 13
Rate GLH- 12 Months Ending December 31, 2020
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{aligned} & \text { Number Of } \\ & \text { Bills } \end{aligned}$ | Cumulative <br> Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 103 | 340,001 | 350,000 | 9 | 838 | 3,066,036 | 133,424,415 | 134,599,415 |
| 104 | 350,001 | 360,000 | 9 | 847 | 3,156,105 | 136,580,521 | 137,710,521 |
| 105 | 360,001 | 370,000 | 9 | 856 | 3,255,195 | 139,835,716 | 140,920,716 |
| 106 | 370,001 | 380,000 | 6 | 862 | 2,218,812 | 142,054,528 | 143,109,528 |
| 107 | 380,001 | 390,000 | 4 | 866 | 1,525,881 | 143,580,408 | 144,615,408 |
| 108 | 390,001 | 400,000 | 3 | 869 | 1,165,815 | 144,746,224 | 145,766,224 |
| 109 | 400,001 | 410,000 | 6 | 875 | 2,407,262 | 147,153,486 | 148,143,486 |
| 110 | 410,001 | 420,000 | 4 | 879 | 1,650,270 | 148,803,756 | 149,773,756 |
| 111 | 420,001 | 430,000 | 6 | 885 | 2,528,350 | 151,332,106 | 152,272,106 |
| 112 | 430,001 | 440,000 | 4 | 889 | 1,723,603 | 153,055,708 | 153,975,708 |
| 113 | 440,001 | 450,000 | 6 | 895 | 2,638,598 | 155,694,306 | 156,584,306 |
| 114 | 450,001 | 460,000 | 2 | 897 | 902,026 | 156,596,333 | 157,476,333 |
| 115 | 460,001 | 470,000 | 7 | 904 | 3,220,849 | 159,817,182 | 160,662,182 |
| 116 | 470,001 | 480,000 | 2 | 906 | 941,188 | 160,758,370 | 161,593,370 |
| 117 | 480,001 | 490,000 | 5 | 911 | 2,405,354 | 163,163,724 | 163,973,724 |
| 118 | 490,001 | 500,000 | 5 | 916 | 2,455,473 | 165,619,197 | 166,404,197 |
| 119 | 500,001 | 510,000 | 4 | 920 | 1,996,874 | 167,616,071 | 168,381,071 |
| 120 | 510,001 | 520,000 | 3 | 923 | 1,521,705 | 169,137,776 | 169,887,776 |
| 121 | 520,001 | 530,000 | 2 | 925 | 1,031,185 | 170,168,962 | 170,908,962 |
| 122 | 530,001 | 540,000 | 1 | 926 | 533,346 | 170,702,308 | 171,437,308 |
| 123 | 540,001 | 550,000 | 5 | 931 | 2,703,211 | 173,405,519 | 174,115,519 |
| 124 | 550,001 | 560,000 | 1 | 932 | 552,701 | 173,958,220 | 174,663,220 |
| 125 | 560,001 | 570,000 | 3 | 935 | 1,677,531 | 175,635,751 | 176,325,751 |
| 126 | 570,001 | 580,000 | 2 | 937 | 1,133,994 | 176,769,745 | 177,449,745 |
| 127 | 580,001 | 590,000 | 4 | 941 | 2,319,508 | 179,089,253 | 179,749,253 |
| 128 | 590,001 | 600,000 | 4 | 945 | 2,351,071 | 181,440,324 | 182,080,324 |
| 129 | 610,001 | 620,000 | 2 | 947 | 1,213,771 | 182,654,096 | 183,284,096 |
| 130 | 620,001 | 630,000 | 2 | 949 | 1,241,008 | 183,895,103 | 184,515,103 |
| 131 | 630,001 | 640,000 | 3 | 952 | 1,890,319 | 185,785,423 | 186,390,423 |
| 132 | 640,001 | 650,000 | 2 | 954 | 1,279,725 | 187,065,148 | 187,660,148 |
| 133 | 650,001 | 660,000 | 2 | 956 | 1,300,441 | 188,365,588 | 188,950,588 |
| 134 | 660,001 | 670,000 | 1 | 957 | 652,948 | 189,018,536 | 189,598,536 |
| 135 | 670,001 | 680,000 | 5 | 962 | 3,340,356 | 192,358,892 | 192,913,892 |
| 136 | 680,001 | 690,000 | 1 | 963 | 675,379 | 193,034,271 | 193,584,271 |
| 137 | 690,001 | 700,000 | 1 | 964 | 687,560 | 193,721,832 | 194,266,832 |
| 138 | 710,001 | 720,000 | 3 | 967 | 2,122,305 | 195,844,136 | 196,374,136 |
| 139 | 720,001 | 730,000 | 1 | 968 | 719,692 | 196,563,829 | 197,088,829 |
| 140 | 730,001 | 740,000 | 1 | 969 | 729,101 | 197,292,929 | 197,812,929 |
| 141 | 750,001 | 760,000 | 1 | 970 | 742,519 | 198,035,448 | 198,550,448 |
| 142 | 760,001 | 770,000 | 2 | 972 | 1,515,819 | 199,551,267 | 200,056,267 |
| 143 | 780,001 | 790,000 | 2 | 974 | 1,553,587 | 201,104,854 | 201,599,854 |
| 144 | 810,001 | 820,000 | 1 | 975 | 811,056 | 201,915,910 | 202,405,910 |
| 145 | 820,001 | 830,000 | 3 | 978 | 2,456,382 | 204,372,292 | 204,847,292 |
| 146 | 840,001 | 850,000 | 3 | 981 | 2,511,263 | 206,883,555 | 207,343,555 |
| 147 | 850,001 | 860,000 | 2 | 983 | 1,694,223 | 208,577,778 | 209,027,778 |
| 148 | 860,001 | 870,000 | 3 | 986 | 2,563,626 | 211,141,405 | 211,576,405 |
| 149 | 870,001 | 880,000 | 3 | 989 | 2,601,768 | 213,743,173 | 214,163,173 |
| 150 | 880,001 | 890,000 | 1 | 990 | 874,421 | 214,617,594 | 215,032,594 |
| 151 | 890,001 | 900,000 | 1 | 991 | 883,096 | 215,500,690 | 215,910,690 |
| 152 | 900,001 | 910,000 | 2 | 993 | 1,791,584 | 217,292,274 | 217,692,274 |
| 153 | 910,001 | 920,000 | 1 | 994 | 900,261 | 218,192,535 | 218,587,535 |

Duquesne Light Company
Bill Frequency Distribution
Rate GLH-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 10 of 13
Page 4 of 5
Sponsor: D. B. Ogden
$\left.\begin{array}{|r|r|r|r|r|r|r|r|}\hline \text { kWh Step } & \begin{array}{c}\text { Start Range } \\ \text { (kWh) }\end{array} & \begin{array}{c}\text { End Range } \\ \text { (kWh) }\end{array} & \begin{array}{c}\text { Number Of } \\ \text { Bills }\end{array} & \begin{array}{c}\text { Cumulative } \\ \text { Number of Bills }\end{array} & \begin{array}{c}\text { Total Usage } \\ \text { (kWh) }\end{array} & \begin{array}{c}\text { Cumulative } \\ \text { Usage (kWh) }\end{array} & \text { Consolidation Factor } \\ \hline 154 & 920,001 & 930,000 & 3 & 997 & 2,746,823 & 220,939,357 & 221,319,357 \\ \hline 155 & 930,001 & 940,000 & 3 & 1,000 & 2,775,208 & 223,714,565 & 224,079,565 \\ \hline 156 & 940,001 & 950,000 & 2 & 1,002 & 1,871,850 & 225,586,415 & 225,941,415 \\ \hline 157 & 960,001 & 970,000 & 1 & 1,003 & 956,546 & 226,542,961 & 226,892,961 \\ \hline 158 & 970,001 & 980,000 & 2 & 1,005 & 1,929,297 & 228,472,258 & 228,812,258 \\ \hline 159 & 980,001 & 990,000 & 3 & 1,008 & 2,918,744 & 231,391,001 & 231,716,001 \\ \hline 160 & 990,001 & 1,000,000 & 1 & 1,009 & 980,046 & 232,371,047 & 232,691,047 \\ \hline 161 & 1,000,001 & 1,010,000 & 4 & 1,013 & 3,971,693 & 236,342,740 & 236,642,740 \\ \hline 162 & 1,010,001 & 1,020,000 & 1 & 1,014 & 999,336 & 237,342,076 & 237,637,076 \\ \hline 163 & 1,020,001 & 1,030,000 & 2 & 1,016 & 2,025,257 & 239,367,333 & 239,652,333 \\ \hline 164 & 1,030,001 & 1,040,000 & 1 & 1,017 & 1,025,393 & 240,392,726 & 240,672,726 \\ \hline 165 & 1,040,001 & 1,050,000 & 1 & 1,018 & 1,035,212 & 241,427,938 & 241,702,938 \\ \hline 166 & 1,050,001 & 1,060,000 & 2 & 1,020 & 2,083,516 & 243,511,454 & 243,776,454 \\ \hline 167 & 1,060,001 & 1,070,000 & 2 & 1,022 & 2,114,607 & 245,626,061 & 245,881,061 \\ \hline 168 & 1,070,001 & 1,080,000 & 1 & 1,023 & 1,063,423 & 246,689,484 & 246,939,484 \\ \hline 169 & 1,090,001 & 1,100,000 & 1 & 2 & 1,025 & 2,169,092 & 248,858,576\end{array}\right] 249,098,576 \mid$

| kWh Step | Start Range <br> $\mathbf{( k W h )}$ | End Range <br> $\mathbf{( k W h )}$ | Number Of <br> Bills | Cumulative <br> Number of Bills | Total Usage <br> (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$|$| 205 | $2,050,001$ | $2,060,000$ |  | 2 |
| ---: | ---: | ---: | ---: | ---: |

Duquesne Light Company
Bill Frequency Distribution
Rate L-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 11 of 13
Page 1 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 120,001 | 130,000 | 2 | 2 | 237,329 | 237,329 | 34,297,329 |
| 2 | 130,001 | 140,000 | 2 | 4 | 388,046 | 625,375 | 37,025,375 |
| 3 | 240,001 | 250,000 | 1 | 5 | 231,675 | 857,050 | 65,607,050 |
| 4 | 300,001 | 310,000 | 1 | 6 | 288,153 | 1,145,203 | 81,125,203 |
| 5 | 340,001 | 350,000 | 1 | 7 | 667,161 | 1,812,364 | 91,762,364 |
| 6 | 350,001 | 360,000 | 1 | 8 | 341,048 | 2,153,412 | 94,313,412 |
| 7 | 380,001 | 390,000 | 2 | 10 | 741,179 | 2,894,591 | 101,954,591 |
| 8 | 440,001 | 450,000 | 2 | 12 | 858,201 | 3,752,792 | 117,152,792 |
| 9 | 620,001 | 630,000 | 1 | 13 | 601,050 | 4,353,842 | 162,483,842 |
| 10 | 710,001 | 720,000 | 1 | 14 | 686,778 | 5,040,620 | 185,040,620 |
| 11 | 740,001 | 750,000 | 1 | 15 | 710,949 | 5,751,569 | 192,501,569 |
| 12 | 780,001 | 790,000 | 1 | 16 | 754,355 | 6,505,924 | 202,425,924 |
| 13 | 790,001 | 800,000 | 1 | 17 | 766,746 | 7,272,670 | 204,872,670 |
| 14 | 830,001 | 840,000 | 1 | 18 | 799,687 | 8,072,358 | 214,712,358 |
| 15 | 1,000,001 | 1,010,000 | 1 | 19 | 964,692 | 9,037,050 | 256,487,050 |
| 16 | 1,020,001 | 1,030,000 | 1 | 20 | 980,822 | 10,017,873 | 261,337,873 |
| 17 | 1,030,001 | 1,040,000 | 1 | 21 | 991,731 | 11,009,604 | 263,729,604 |
| 18 | 1,050,001 | 1,060,000 | 1 | 22 | 1,013,511 | 12,023,114 | 268,543,114 |
| 19 | 1,060,001 | 1,070,000 | 1 | 23 | 1,024,580 | 13,047,695 | 270,917,695 |
| 20 | 1,080,001 | 1,090,000 | 1 | 24 | 1,037,834 | 14,085,528 | 275,685,528 |
| 21 | 1,100,001 | 1,110,000 | 1 | 25 | 1,061,972 | 15,147,500 | 280,437,500 |
| 22 | 1,110,001 | 1,120,000 | 1 | 26 | 1,067,420 | 16,214,920 | 282,774,920 |
| 23 | 1,130,001 | 1,140,000 | 1 | 27 | 1,087,754 | 17,302,673 | 287,482,673 |
| 24 | 1,160,001 | 1,170,000 | 1 | 28 | 1,117,646 | 18,420,319 | 294,540,319 |
| 25 | 1,220,001 | 1,230,000 | 2 | 30 | 2,344,088 | 20,764,407 | 308,584,407 |
| 26 | 1,250,001 | 1,260,000 | 1 | 31 | 1,205,367 | 21,969,774 | 315,549,774 |
| 27 | 1,260,001 | 1,270,000 | 1 | 32 | 1,211,316 | 23,181,090 | 317,821,090 |
| 28 | 1,300,001 | 1,310,000 | 1 | 33 | 1,248,260 | 24,429,350 | 327,039,350 |
| 29 | 1,310,001 | 1,320,000 | 1 | 34 | 1,266,290 | 25,695,640 | 329,295,640 |
| 30 | 1,330,001 | 1,340,000 | 1 | 35 | 1,277,731 | 26,973,370 | 333,833,370 |
| 31 | 1,370,001 | 1,380,000 | 2 | 37 | 2,645,396 | 29,618,766 | 342,878,766 |
| 32 | 1,400,001 | 1,410,000 | 1 | 38 | 1,353,059 | 30,971,825 | 349,631,825 |
| 33 | 1,420,001 | 1,430,000 | 1 | 39 | 1,370,133 | 32,341,958 | 354,091,958 |
| 34 | 1,530,001 | 1,540,000 | 1 | 40 | 1,476,777 | 33,818,735 | 378,778,735 |
| 35 | 1,590,001 | 1,600,000 | 1 | 41 | 1,535,511 | 35,354,246 | 392,154,246 |
| 36 | 1,600,001 | 1,610,000 | 1 | 42 | 1,545,155 | 36,899,401 | 394,319,401 |
| 37 | 1,630,001 | 1,640,000 | 2 | 44 | 3,142,999 | 40,042,400 | 400,842,400 |
| 38 | 1,690,001 | 1,700,000 | 1 | 45 | 1,624,904 | 41,667,304 | 413,967,304 |
| 39 | 1,700,001 | 1,710,000 | 1 | 46 | 1,632,248 | 43,299,552 | 416,079,552 |
| 40 | 1,750,001 | 1,760,000 | 1 | 47 | 1,686,906 | 44,986,458 | 426,906,458 |
| 41 | 1,770,001 | 1,780,000 | 1 | 48 | 1,700,250 | 46,686,707 | 431,166,707 |
| 42 | 1,860,001 | 1,870,000 | 2 | 50 | 3,585,850 | 50,272,557 | 450,452,557 |
| 43 | 1,870,001 | 1,880,000 | 1 | 51 | 1,802,418 | 52,074,975 | 452,514,975 |
| 44 | 1,910,001 | 1,920,000 | 1 | 52 | 1,840,020 | 53,914,995 | 460,954,995 |
| 45 | 1,920,001 | 1,930,000 | 4 | 56 | 7,388,276 | 61,303,271 | 462,743,271 |
| 46 | 1,940,001 | 1,950,000 | 2 | 58 | 3,731,158 | 65,034,430 | 466,734,430 |
| 47 | 1,960,001 | 1,970,000 | 2 | 60 | 3,769,423 | 68,803,852 | 470,683,852 |
| 48 | 1,990,001 | 2,000,000 | 1 | 61 | 1,916,730 | 70,720,582 | 476,720,582 |
| 49 | 2,030,001 | 2,040,000 | 1 | 62 | 1,956,618 | 72,677,200 | 484,757,200 |

Duquesne Light Company
Bill Frequency Distribution
Rate L-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 11 of 13
Page 2 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 50 | 2,040,001 | 2,050,000 | 1 | 63 | 1,959,473 | 74,636,673 | 486,686,673 |
| 51 | 2,060,001 | 2,070,000 | 1 | 64 | 1,983,631 | 76,620,304 | 490,620,304 |
| 52 | 2,100,001 | 2,110,000 | 1 | 65 | 2,018,960 | 78,639,264 | 498,529,264 |
| 53 | 2,130,001 | 2,140,000 | 1 | 66 | 2,049,032 | 80,688,297 | 504,408,297 |
| 54 | 2,150,001 | 2,160,000 | 1 | 67 | 2,064,682 | 82,752,979 | 508,272,979 |
| 55 | 2,160,001 | 2,170,000 | 1 | 68 | 2,078,926 | 84,831,905 | 510,151,905 |
| 56 | 2,200,001 | 2,210,000 | 1 | 69 | 2,111,736 | 86,943,641 | 517,893,641 |
| 57 | 2,220,001 | 2,230,000 | 1 | 70 | 2,132,200 | 89,075,841 | 521,695,841 |
| 58 | 2,230,001 | 2,240,000 | 1 | 71 | 2,140,675 | 91,216,516 | 523,536,516 |
| 59 | 2,240,001 | 2,250,000 | 2 | 73 | 6,464,322 | 97,680,838 | 527,430,838 |
| 60 | 2,270,001 | 2,280,000 | 2 | 75 | 4,361,707 | 102,042,545 | 532,962,545 |
| 61 | 2,290,001 | 2,300,000 | 1 | 76 | 2,204,257 | 104,246,803 | 536,646,803 |
| 62 | 2,320,001 | 2,330,000 | 1 | 77 | 2,234,342 | 106,481,145 | 542,191,145 |
| 63 | 2,350,001 | 2,360,000 | 2 | 79 | 4,521,254 | 111,002,399 | 547,602,399 |
| 64 | 2,380,001 | 2,390,000 | 1 | 80 | 2,289,039 | 113,291,439 | 553,051,439 |
| 65 | 2,390,001 | 2,400,000 | 2 | 82 | 4,595,941 | 117,887,380 | 554,687,380 |
| 66 | 2,400,001 | 2,410,000 | 1 | 83 | 2,303,622 | 120,191,002 | 556,401,002 |
| 67 | 2,410,001 | 2,420,000 | 1 | 84 | 2,316,573 | 122,507,575 | 558,107,575 |
| 68 | 2,480,001 | 2,490,000 | 1 | 85 | 2,385,967 | 124,893,543 | 570,603,543 |
| 69 | 2,500,001 | 2,510,000 | 1 | 86 | 2,403,480 | 127,297,023 | 574,077,023 |
| 70 | 2,520,001 | 2,530,000 | 1 | 87 | 2,424,846 | 129,721,870 | 577,531,870 |
| 71 | 2,530,001 | 2,540,000 | 1 | 88 | 2,435,332 | 132,157,201 | 579,197,201 |
| 72 | 2,610,001 | 2,620,000 | 1 | 89 | 2,507,286 | 134,664,487 | 593,164,487 |
| 73 | 2,640,001 | 2,650,000 | 1 | 90 | 2,543,337 | 137,207,824 | 598,307,824 |
| 74 | 2,650,001 | 2,660,000 | 1 | 91 | 2,546,256 | 139,754,079 | 599,934,079 |
| 75 | 2,700,001 | 2,710,000 | 1 | 92 | 2,595,572 | 142,349,651 | 608,469,651 |
| 76 | 2,750,001 | 2,760,000 | 1 | 93 | 2,639,720 | 144,989,371 | 616,949,371 |
| 77 | 2,790,001 | 2,800,000 | 1 | 94 | 2,685,273 | 147,674,644 | 623,674,644 |
| 78 | 2,850,001 | 2,860,000 | 1 | 95 | 2,737,630 | 150,412,274 | 633,752,274 |
| 79 | 2,880,001 | 2,890,000 | 1 | 96 | 2,770,299 | 153,182,574 | 638,702,574 |
| 80 | 2,890,001 | 2,900,000 | 1 | 97 | 2,778,839 | 155,961,412 | 640,261,412 |
| 81 | 2,900,001 | 2,910,000 | 2 | 99 | 8,358,949 | 164,320,361 | 644,470,361 |
| 82 | 2,940,001 | 2,950,000 | 1 | 100 | 2,829,483 | 167,149,845 | 650,949,845 |
| 83 | 2,970,001 | 2,980,000 | 1 | 101 | 2,859,382 | 170,009,227 | 655,749,227 |
| 84 | 3,000,001 | 3,010,000 | 1 | 102 | 2,886,525 | 172,895,752 | 660,515,752 |
| 85 | 3,080,001 | 3,090,000 | 1 | 103 | 2,957,345 | 175,853,097 | 673,343,097 |
| 86 | 3,100,001 | 3,110,000 | 1 | 104 | 2,977,484 | 178,830,581 | 676,430,581 |
| 87 | 3,120,001 | 3,130,000 | 2 | 106 | 5,993,142 | 184,823,723 | 679,363,723 |
| 88 | 3,140,001 | 3,150,000 | 1 | 107 | 3,015,498 | 187,839,221 | 682,389,221 |
| 89 | 3,170,001 | 3,180,000 | 1 | 108 | 3,045,087 | 190,884,309 | 686,964,309 |
| 90 | 3,180,001 | 3,190,000 | 1 | 109 | 3,058,082 | 193,942,391 | 688,392,391 |
| 91 | 3,200,001 | 3,210,000 | 1 | 110 | 3,073,182 | 197,015,573 | 691,355,573 |
| 92 | 3,210,001 | 3,220,000 | 1 | 111 | 3,083,603 | 200,099,177 | 692,759,177 |
| 93 | 3,220,001 | 3,230,000 | 1 | 112 | 3,097,361 | 203,196,537 | 694,156,537 |
| 94 | 3,240,001 | 3,250,000 | 1 | 113 | 3,110,631 | 206,307,169 | 697,057,169 |
| 95 | 3,260,001 | 3,270,000 | 2 | 115 | 6,263,198 | 212,570,366 | 699,800,366 |
| 96 | 3,280,001 | 3,290,000 | 1 | 116 | 3,151,894 | 215,722,260 | 702,642,260 |
| 97 | 3,330,001 | 3,340,000 | 1 | 117 | 3,203,777 | 218,926,037 | 709,906,037 |
| 98 | 3,340,001 | 3,350,000 | 1 | 118 | 3,214,386 | 222,140,424 | 711,240,424 |

Duquesne Light Company
Bill Frequency Distribution
Rate L-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 11 of 13
Page 3 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{gathered} \hline \text { Number Of } \\ \text { Bills } \\ \hline \end{gathered}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 99 | 3,350,001 | 3,360,000 | 1 | 119 | 3,222,784 | 225,363,208 | 712,563,208 |
| 100 | 3,380,001 | 3,390,000 | 1 | 120 | 3,252,555 | 228,615,763 | 716,775,763 |
| 101 | 3,390,001 | 3,400,000 | 1 | 121 | 3,258,423 | 231,874,186 | 718,074,186 |
| 102 | 3,400,001 | 3,410,000 | 1 | 122 | 3,267,209 | 235,141,394 | 719,361,394 |
| 103 | 3,410,001 | 3,420,000 | 1 | 123 | 3,280,174 | 238,421,569 | 720,641,569 |
| 104 | 3,430,001 | 3,440,000 | 2 | 125 | 9,888,878 | 248,310,447 | 726,470,447 |
| 105 | 3,440,001 | 3,450,000 | 1 | 126 | 3,310,669 | 251,621,116 | 727,721,116 |
| 106 | 3,480,001 | 3,490,000 | 1 | 127 | 3,344,273 | 254,965,389 | 733,095,389 |
| 107 | 3,510,001 | 3,520,000 | 1 | 128 | 3,375,390 | 258,340,779 | 737,060,779 |
| 108 | 3,520,001 | 3,530,000 | 1 | 129 | 3,378,625 | 261,719,403 | 738,269,403 |
| 109 | 3,560,001 | 3,570,000 | 1 | 130 | 3,425,989 | 265,145,393 | 743,525,393 |
| 110 | 3,570,001 | 3,580,000 | 1 | 131 | 3,434,516 | 268,579,909 | 744,719,909 |
| 111 | 3,580,001 | 3,590,000 | 1 | 132 | 3,438,510 | 272,018,418 | 745,898,418 |
| 112 | 3,610,001 | 3,620,000 | 1 | 133 | 3,465,866 | 275,484,284 | 749,704,284 |
| 113 | 3,630,001 | 3,640,000 | 1 | 134 | 3,491,395 | 278,975,679 | 752,175,679 |
| 114 | 3,650,001 | 3,660,000 | 1 | 135 | 3,504,336 | 282,480,015 | 754,620,015 |
| 115 | 3,700,001 | 3,710,000 | 1 | 136 | 3,551,917 | 286,031,932 | 760,911,932 |
| 116 | 3,740,001 | 3,750,000 | 1 | 137 | 3,592,344 | 289,624,276 | 765,874,276 |
| 117 | 3,760,001 | 3,770,000 | 4 | 141 | 14,452,796 | 304,077,072 | 767,787,072 |
| 118 | 3,770,001 | 3,780,000 | 1 | 142 | 3,622,356 | 307,699,428 | 768,859,428 |
| 119 | 3,820,001 | 3,830,000 | 1 | 143 | 3,669,681 | 311,369,109 | 774,799,109 |
| 120 | 3,840,001 | 3,850,000 | 1 | 144 | 3,693,742 | 315,062,851 | 777,062,851 |
| 121 | 3,850,001 | 3,860,000 | 1 | 145 | 3,699,551 | 318,762,402 | 778,102,402 |
| 122 | 3,910,001 | 3,920,000 | 1 | 146 | 3,759,364 | 322,521,766 | 785,081,766 |
| 123 | 3,950,001 | 3,960,000 | 1 | 147 | 3,800,896 | 326,322,661 | 789,642,661 |
| 124 | 3,990,001 | 4,000,000 | 1 | 148 | 3,838,469 | 330,161,131 | 794,161,131 |
| 125 | 4,020,001 | 4,030,000 | 1 | 149 | 3,864,967 | 334,026,097 | 797,476,097 |
| 126 | 4,050,001 | 4,060,000 | 1 | 150 | 3,889,173 | 337,915,270 | 800,755,270 |
| 127 | 4,060,001 | 4,070,000 | 1 | 151 | 3,899,333 | 341,814,603 | 801,724,603 |
| 128 | 4,070,001 | 4,080,000 | 1 | 152 | 3,913,662 | 345,728,265 | 802,688,265 |
| 129 | 4,080,001 | 4,090,000 | 1 | 153 | 3,922,154 | 349,650,420 | 803,640,420 |
| 130 | 4,140,001 | 4,150,000 | 2 | 155 | 7,955,724 | 357,606,143 | 809,956,143 |
| 131 | 4,190,001 | 4,200,000 | 1 | 156 | 4,030,459 | 361,636,602 | 815,236,602 |
| 132 | 4,200,001 | 4,210,000 | 1 | 157 | 4,031,990 | 365,668,593 | 816,138,593 |
| 133 | 4,220,001 | 4,230,000 | 1 | 158 | 4,051,024 | 369,719,616 | 818,099,616 |
| 134 | 4,250,001 | 4,260,000 | 1 | 159 | 4,088,007 | 373,807,623 | 821,107,623 |
| 135 | 4,260,001 | 4,270,000 | 1 | 160 | 4,095,624 | 377,903,247 | 821,983,247 |
| 136 | 4,280,001 | 4,290,000 | 2 | 162 | 8,224,730 | 386,127,978 | 823,707,978 |
| 137 | 4,290,001 | 4,300,000 | 1 | 163 | 4,125,178 | 390,253,156 | 824,553,156 |
| 138 | 4,300,001 | 4,310,000 | 1 | 164 | 4,133,392 | 394,386,548 | 825,386,548 |
| 139 | 4,340,001 | 4,350,000 | 1 | 165 | 4,172,881 | 398,559,429 | 829,209,429 |
| 140 | 4,350,001 | 4,360,000 | 1 | 166 | 4,175,713 | 402,735,142 | 830,015,142 |
| 141 | 4,370,001 | 4,380,000 | 1 | 167 | 4,202,387 | 406,937,529 | 831,797,529 |
| 142 | 4,390,001 | 4,400,000 | 1 | 168 | 4,216,361 | 411,153,889 | 833,553,889 |
| 143 | 4,450,001 | 4,460,000 | 1 | 169 | 4,280,623 | 415,434,512 | 839,134,512 |
| 144 | 4,460,001 | 4,470,000 | 1 | 170 | 4,290,176 | 419,724,688 | 839,904,688 |
| 145 | 4,490,001 | 4,500,000 | 1 | 171 | 4,314,842 | 424,039,530 | 842,539,530 |
| 146 | 4,560,001 | 4,570,000 | 2 | 173 | 8,764,851 | 432,804,380 | 848,674,380 |
| 147 | 4,640,001 | 4,650,000 | 1 | 174 | 4,460,730 | 437,265,110 | 855,765,110 |

Duquesne Light Company
Bill Frequency Distribution
Rate L-12 Months Ending December 31, 2020

Attachment DFR IV -C
Part 11 of 13
Page 4 of 5
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{gathered} \hline \text { Number Of } \\ \text { Bills } \\ \hline \end{gathered}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 148 | 4,730,001 | 4,740,000 | 1 | 175 | 4,544,234 | 441,809,344 | 863,669,344 |
| 149 | 4,760,001 | 4,770,000 | 1 | 176 | 4,570,125 | 446,379,469 | 866,139,469 |
| 150 | 4,780,001 | 4,790,000 | 1 | 177 | 4,592,138 | 450,971,607 | 867,701,607 |
| 151 | 4,810,001 | 4,820,000 | 1 | 178 | 4,619,914 | 455,591,521 | 870,111,521 |
| 152 | 4,830,001 | 4,840,000 | 2 | 180 | 9,284,640 | 464,876,161 | 871,436,161 |
| 153 | 4,880,001 | 4,890,000 | 1 | 181 | 4,693,080 | 469,569,242 | 875,439,242 |
| 154 | 4,910,001 | 4,920,000 | 1 | 182 | 4,713,880 | 474,283,122 | 877,723,122 |
| 155 | 5,010,001 | 5,020,000 | 2 | 184 | 9,624,188 | 483,907,310 | 885,507,310 |
| 156 | 5,020,001 | 5,030,000 | 1 | 185 | 4,821,827 | 488,729,137 | 886,099,137 |
| 157 | 5,030,001 | 5,040,000 | 1 | 186 | 4,832,955 | 493,562,092 | 886,682,092 |
| 158 | 5,040,001 | 5,050,000 | 1 | 187 | 4,839,162 | 498,401,254 | 887,251,254 |
| 159 | 5,050,001 | 5,060,000 | 1 | 188 | 4,856,388 | 503,257,642 | 887,817,642 |
| 160 | 5,120,001 | 5,130,000 | 1 | 189 | 4,922,272 | 508,179,914 | 892,929,914 |
| 161 | 5,190,001 | 5,200,000 | 1 | 190 | 4,988,983 | 513,168,897 | 897,968,897 |
| 162 | 5,210,001 | 5,220,000 | 1 | 191 | 5,001,477 | 518,170,374 | 899,230,374 |
| 163 | 5,270,001 | 5,280,000 | 1 | 192 | 5,058,593 | 523,228,967 | 903,388,967 |
| 164 | 5,280,001 | 5,290,000 | 1 | 193 | 5,067,999 | 528,296,966 | 903,886,966 |
| 165 | 5,340,001 | 5,350,000 | 1 | 194 | 5,126,799 | 533,423,765 | 907,923,765 |
| 166 | 5,370,001 | 5,380,000 | 1 | 195 | 5,154,699 | 538,578,464 | 909,798,464 |
| 167 | 5,450,001 | 5,460,000 | 1 | 196 | 5,233,341 | 543,811,805 | 915,091,805 |
| 168 | 5,470,001 | 5,480,000 | 1 | 197 | 5,250,882 | 549,062,687 | 916,222,687 |
| 169 | 5,560,001 | 5,570,000 | 1 | 198 | 5,340,366 | 554,403,053 | 922,023,053 |
| 170 | 5,570,001 | 5,580,000 | 1 | 199 | 5,355,041 | 559,758,094 | 922,458,094 |
| 171 | 5,610,001 | 5,620,000 | 1 | 200 | 5,385,075 | 565,143,169 | 924,823,169 |
| 172 | 5,710,001 | 5,720,000 | 1 | 201 | 5,480,842 | 570,624,011 | 930,984,011 |
| 173 | 5,730,001 | 5,740,000 | 1 | 202 | 5,504,543 | 576,128,554 | 932,008,554 |
| 174 | 5,770,001 | 5,780,000 | 1 | 203 | 5,543,445 | 581,671,999 | 934,251,999 |
| 175 | 5,880,001 | 5,890,000 | 1 | 204 | 5,645,794 | 587,317,793 | 940,717,793 |
| 176 | 5,890,001 | 5,900,000 | 2 | 206 | 11,314,385 | 598,632,179 | 940,832,179 |
| 177 | 6,020,001 | 6,030,000 | 1 | 207 | 5,779,312 | 604,411,491 | 948,121,491 |
| 178 | 6,030,001 | 6,040,000 | 1 | 208 | 5,794,386 | 610,205,877 | 948,445,877 |
| 179 | 6,040,001 | 6,050,000 | 1 | 209 | 5,801,276 | 616,007,153 | 948,757,153 |
| 180 | 6,050,001 | 6,060,000 | 1 | 210 | 5,815,902 | 621,823,054 | 949,063,054 |
| 181 | 6,060,001 | 6,070,000 | 2 | 212 | 11,641,435 | 633,464,490 | 949,104,490 |
| 182 | 6,090,001 | 6,100,000 | 1 | 213 | 5,854,374 | 639,318,863 | 950,418,863 |
| 183 | 6,100,001 | 6,110,000 | 2 | 215 | 11,719,926 | 651,038,789 | 950,428,789 |
| 184 | 6,120,001 | 6,130,000 | 1 | 216 | 5,879,145 | 656,917,934 | 951,157,934 |
| 185 | 6,140,001 | 6,150,000 | 1 | 217 | 5,900,811 | 662,818,745 | 951,868,745 |
| 186 | 6,170,001 | 6,180,000 | 1 | 218 | 5,926,291 | 668,745,036 | 953,025,036 |
| 187 | 6,210,001 | 6,220,000 | 1 | 219 | 5,967,878 | 674,712,914 | 954,612,914 |
| 188 | 6,220,001 | 6,230,000 | 1 | 220 | 5,974,881 | 680,687,795 | 954,807,795 |
| 189 | 6,250,001 | 6,260,000 | 1 | 221 | 6,006,745 | 686,694,540 | 955,874,540 |
| 190 | 6,280,001 | 6,290,000 | 1 | 222 | 6,027,925 | 692,722,465 | 956,902,465 |
| 191 | 6,300,001 | 6,310,000 | 1 | 223 | 6,051,957 | 698,774,421 | 957,484,421 |
| 192 | 6,310,001 | 6,320,000 | 1 | 224 | 6,059,182 | 704,833,603 | 957,633,603 |
| 193 | 6,360,001 | 6,370,000 | 1 | 225 | 6,111,181 | 710,944,785 | 959,374,785 |
| 194 | 6,380,001 | 6,390,000 | 2 | 227 | 12,257,616 | 723,202,401 | 959,632,401 |
| 195 | 6,400,001 | 6,410,000 | 1 | 228 | 6,147,518 | 729,349,918 | 960,109,918 |
| 196 | 6,440,001 | 6,450,000 | 1 | 229 | 6,183,976 | 735,533,894 | 961,283,894 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 197 | 6,450,001 | 6,460,000 | 1 | 230 | 6,196,741 | 741,730,635 | 961,370,635 |
| 198 | 6,460,001 | 6,470,000 | 1 | 231 | 6,203,315 | 747,933,950 | 961,443,950 |
| 199 | 6,520,001 | 6,530,000 | 1 | 232 | 6,259,572 | 754,193,522 | 963,153,522 |
| 200 | 6,570,001 | 6,580,000 | 1 | 233 | 6,312,861 | 760,506,383 | 964,486,383 |
| 201 | 6,580,001 | 6,590,000 | 1 | 234 | 6,324,995 | 766,831,378 | 964,531,378 |
| 202 | 6,610,001 | 6,620,000 | 2 | 236 | 12,700,406 | 779,531,784 | 964,891,784 |
| 203 | 6,700,001 | 6,710,000 | 1 | 237 | 6,440,222 | 785,972,005 | 967,142,005 |
| 204 | 6,710,001 | 6,720,000 | 1 | 238 | 6,449,917 | 792,421,923 | 967,141,923 |
| 205 | 6,790,001 | 6,800,000 | 1 | 239 | 6,518,850 | 798,940,773 | 968,940,773 |
| 206 | 6,870,001 | 6,880,000 | 1 | 240 | 6,600,161 | 805,540,934 | 970,660,934 |
| 207 | 6,880,001 | 6,890,000 | 1 | 241 | 6,606,956 | 812,147,890 | 970,617,890 |
| 208 | 6,920,001 | 6,930,000 | 1 | 242 | 6,644,390 | 818,792,280 | 971,252,280 |
| 209 | 7,050,001 | 7,060,000 | 1 | 243 | 6,769,943 | 825,562,223 | 973,822,223 |
| 210 | 7,100,001 | 7,110,000 | 1 | 244 | 6,821,534 | 832,383,757 | 974,583,757 |
| 211 | 7,210,001 | 7,220,000 | 2 | 246 | 13,848,308 | 846,232,065 | 976,192,065 |
| 212 | 7,290,001 | 7,300,000 | 1 | 247 | 7,006,714 | 853,238,779 | 977,338,779 |
| 213 | 7,670,001 | 7,680,000 | 1 | 248 | 7,365,862 | 860,604,641 | 983,484,641 |
| 214 | 7,700,001 | 7,710,000 | 1 | 249 | 7,392,422 | 867,997,064 | 983,647,064 |
| 215 | 7,740,001 | 7,750,000 | 1 | 250 | 7,435,748 | 875,432,811 | 983,932,811 |
| 216 | 7,810,001 | 7,820,000 | 2 | 252 | 15,004,626 | 890,437,437 | 984,277,437 |
| 217 | 7,900,001 | 7,910,000 | 1 | 253 | 7,586,421 | 898,023,858 | 985,033,858 |
| 218 | 7,910,001 | 7,920,000 | 1 | 254 | 7,599,783 | 905,623,641 | 984,823,641 |
| 219 | 7,990,001 | 8,000,000 | 1 | 255 | 7,673,017 | 913,296,658 | 985,296,658 |
| 220 | 8,090,001 | 8,100,000 | 1 | 256 | 7,774,509 | 921,071,166 | 985,871,166 |
| 221 | 8,160,001 | 8,170,000 | 1 | 257 | 7,837,266 | 928,908,432 | 986,098,432 |
| 222 | 8,210,001 | 8,220,000 | 2 | 259 | 15,771,593 | 944,680,025 | 985,780,025 |
| 223 | 8,220,001 | 8,230,000 | 1 | 260 | 7,897,966 | 952,577,991 | 985,497,991 |
| 224 | 8,330,001 | 8,340,000 | 1 | 261 | 7,998,568 | 960,576,559 | 985,596,559 |
| 225 | 8,340,001 | 8,350,000 | 1 | 262 | 8,010,429 | 968,586,988 | 985,286,988 |
| 226 | 11,020,001 | 11,030,000 | 1 | 263 | 10,582,982 | 979,169,970 | 990,199,970 |
| 227 | 11,130,001 | 11,140,000 | 1 | 264 | 10,687,850 | 989,857,820 | 989,857,820 |

Attachment DFR IV -C
Bill Frequency Distribution
Rate HVPS - 12 Months Ending December 31, 2020
Page 1 of 3
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 2 | 60,001 | 70,000 | 3 | 4 | 203,310 | 203,310 | 8,323,310 |
| 3 | 70,001 | 80,000 | 1 | 5 | 73,126 | 276,436 | 9,476,436 |
| 4 | 90,001 | 100,000 | 1 | 6 | 96,135 | 372,571 | 11,772,571 |
| 5 | 100,001 | 110,000 | 1 | 7 | 104,909 | 477,479 | 12,907,479 |
| 6 | 110,001 | 120,000 | 1 | 8 | 115,603 | 593,082 | 14,033,082 |
| 7 | 120,001 | 130,000 | 1 | 9 | 120,758 | 713,840 | 15,143,840 |
| 8 | 140,001 | 150,000 | 2 | 11 | 291,744 | 1,005,584 | 17,355,584 |
| 9 | 340,001 | 350,000 | 1 | 12 | 348,075 | 1,353,659 | 39,153,659 |
| 10 | 350,001 | 360,000 | 1 | 13 | 356,577 | 1,710,236 | 40,230,236 |
| 11 | 410,001 | 420,000 | 1 | 14 | 417,666 | 2,127,902 | 46,647,902 |
| 12 | 450,001 | 460,000 | 1 | 15 | 457,518 | 2,585,420 | 50,885,420 |
| 13 | 470,001 | 480,000 | 2 | 17 | 953,962 | 3,539,382 | 52,979,382 |
| 14 | 480,001 | 490,000 | 1 | 18 | 489,681 | 4,029,063 | 54,009,063 |
| 15 | 500,001 | 510,000 | 1 | 19 | 504,972 | 4,534,035 | 56,044,035 |
| 16 | 540,001 | 550,000 | 1 | 20 | 543,841 | 5,077,876 | 60,077,876 |
| 17 | 550,001 | 560,000 | 1 | 21 | 561,300 | 5,639,176 | 61,079,176 |
| 18 | 570,001 | 580,000 | 1 | 22 | 575,096 | 6,214,272 | 63,054,272 |
| 19 | 580,001 | 590,000 | 1 | 23 | 591,016 | 6,805,288 | 64,035,288 |
| 20 | 600,001 | 610,000 | 1 | 24 | 612,449 | 7,417,737 | 65,977,737 |
| 21 | 640,001 | 650,000 | 1 | 25 | 644,811 | 8,062,548 | 69,812,548 |
| 22 | 650,001 | 660,000 | 1 | 26 | 658,931 | 8,721,479 | 70,761,479 |
| 23 | 740,001 | 750,000 | 1 | 27 | 753,922 | 9,475,402 | 79,225,402 |
| 24 | 900,001 | 910,000 | 1 | 28 | 908,327 | 10,383,728 | 94,103,728 |
| 25 | 1,040,001 | 1,050,000 | 1 | 29 | 1,049,072 | 11,432,801 | 106,982,801 |
| 26 | 1,080,001 | 1,090,000 | 1 | 30 | 1,094,212 | 12,527,012 | 110,627,012 |
| 27 | 1,090,001 | 1,100,000 | 1 | 31 | 1,099,054 | 13,626,066 | 111,526,066 |
| 28 | 1,210,001 | 1,220,000 | 1 | 32 | 1,225,648 | 14,851,714 | 122,211,714 |
| 29 | 1,560,001 | 1,570,000 | 1 | 33 | 1,575,432 | 16,427,146 | 153,017,146 |
| 30 | 1,840,001 | 1,850,000 | 1 | 34 | 1,852,696 | 18,279,842 | 177,379,842 |
| 31 | 1,990,001 | 2,000,000 | 1 | 35 | 2,008,794 | 20,288,636 | 190,288,636 |
| 32 | 2,000,001 | 2,010,000 | 1 | 36 | 2,012,595 | 22,301,231 | 191,141,231 |
| 33 | 2,010,001 | 2,020,000 | 1 | 37 | 2,029,936 | 24,331,167 | 191,991,167 |
| 34 | 2,070,001 | 2,080,000 | 1 | 38 | 2,091,405 | 26,422,572 | 196,982,572 |
| 35 | 2,250,001 | 2,260,000 | 1 | 39 | 2,266,027 | 28,688,599 | 211,748,599 |
| 36 | 2,290,001 | 2,300,000 | 1 | 40 | 2,311,676 | 31,000,275 | 215,000,275 |
| 37 | 2,300,001 | 2,310,000 | 1 | 41 | 2,322,078 | 33,322,353 | 215,812,353 |
| 38 | 2,360,001 | 2,370,000 | 1 | 42 | 2,381,375 | 35,703,728 | 220,563,728 |
| 39 | 2,380,001 | 2,390,000 | 1 | 43 | 2,393,358 | 38,097,086 | 222,127,086 |
| 40 | 2,400,001 | 2,410,000 | 1 | 44 | 2,418,035 | 40,515,121 | 223,675,121 |
| 41 | 2,470,001 | 2,480,000 | 1 | 45 | 2,487,492 | 43,002,613 | 229,002,613 |
| 42 | 2,510,001 | 2,520,000 | 1 | 46 | 2,526,638 | 45,529,251 | 232,009,251 |
| 43 | 2,540,001 | 2,550,000 | 1 | 47 | 2,561,162 | 48,090,413 | 234,240,413 |
| 44 | 2,660,001 | 2,670,000 | 1 | 48 | 2,684,595 | 50,775,007 | 243,015,007 |
| 45 | 2,670,001 | 2,680,000 | 1 | 49 | 2,689,699 | 53,464,707 | 243,744,707 |
| 46 | 2,720,001 | 2,730,000 | 1 | 50 | 2,742,589 | 56,207,296 | 247,307,296 |
| 47 | 2,810,001 | 2,820,000 | 1 | 51 | 2,828,820 | 59,036,115 | 253,616,115 |
| 48 | 3,270,001 | 3,280,000 | 2 | 53 | 6,589,960 | 65,626,076 | 285,386,076 |
| 49 | 3,310,001 | 3,320,000 | 1 | 54 | 3,328,901 | 68,954,976 | 288,074,976 |

Attachment DFR IV -C
Bill Frequency Distribution
Rate HVPS - 12 Months Ending December 31, 2020
Page 2 of 3
Sponsor: D. B. Ogden

| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 50 | 3,700,001 | 3,710,000 | 1 | 55 | 3,721,320 | 72,676,296 | 313,826,296 |
| 51 | 3,800,001 | 3,810,000 | 2 | 57 | 7,655,398 | 80,331,694 | 320,361,694 |
| 52 | 3,860,001 | 3,870,000 | 1 | 58 | 7,768,738 | 88,100,432 | 328,040,432 |
| 53 | 3,900,001 | 3,910,000 | 1 | 59 | 3,925,976 | 92,026,408 | 330,536,408 |
| 54 | 4,000,001 | 4,010,000 | 1 | 60 | 4,022,901 | 96,049,309 | 336,649,309 |
| 55 | 4,060,001 | 4,070,000 | 1 | 61 | 4,086,998 | 100,136,307 | 340,266,307 |
| 56 | 4,170,001 | 4,180,000 | 1 | 62 | 4,196,892 | 104,333,199 | 346,773,199 |
| 57 | 4,240,001 | 4,250,000 | 1 | 63 | 4,270,327 | 108,603,526 | 350,853,526 |
| 58 | 4,250,001 | 4,260,000 | 1 | 64 | 4,276,885 | 112,880,411 | 351,440,411 |
| 59 | 4,260,001 | 4,270,000 | 1 | 65 | 4,291,244 | 117,171,655 | 352,021,655 |
| 60 | 4,350,001 | 4,360,000 | 1 | 66 | 4,374,965 | 121,546,620 | 356,986,620 |
| 61 | 4,370,001 | 4,380,000 | 1 | 67 | 4,400,282 | 125,946,902 | 358,086,902 |
| 62 | 4,400,001 | 4,410,000 | 1 | 68 | 4,429,448 | 130,376,350 | 359,696,350 |
| 63 | 4,410,001 | 4,420,000 | 1 | 69 | 4,440,513 | 134,816,863 | 360,236,863 |
| 64 | 4,420,001 | 4,430,000 | 1 | 70 | 4,446,595 | 139,263,458 | 360,763,458 |
| 65 | 4,440,001 | 4,450,000 | 1 | 71 | 4,466,674 | 143,730,132 | 361,780,132 |
| 66 | 4,510,001 | 4,520,000 | 1 | 72 | 4,537,471 | 148,267,603 | 365,227,603 |
| 67 | 4,530,001 | 4,540,000 | 1 | 73 | 9,123,045 | 157,390,648 | 370,770,648 |
| 68 | 4,560,001 | 4,570,000 | 1 | 74 | 4,591,406 | 161,982,054 | 372,202,054 |
| 69 | 4,580,001 | 4,590,000 | 1 | 75 | 4,612,492 | 166,594,547 | 373,144,547 |
| 70 | 4,690,001 | 4,700,000 | 1 | 76 | 4,721,047 | 171,315,593 | 378,115,593 |
| 71 | 4,920,001 | 4,930,000 | 1 | 77 | 4,950,453 | 176,266,046 | 388,256,046 |
| 72 | 5,140,001 | 5,150,000 | 1 | 78 | 5,175,882 | 181,441,928 | 397,741,928 |
| 73 | 5,290,001 | 5,300,000 | 1 | 79 | 5,323,034 | 186,764,962 | 404,064,962 |
| 74 | 5,410,001 | 5,420,000 | 1 | 80 | 5,445,106 | 192,210,068 | 409,010,068 |
| 75 | 5,520,001 | 5,530,000 | 1 | 81 | 5,559,604 | 197,769,673 | 413,439,673 |
| 76 | 5,670,001 | 5,680,000 | 2 | 83 | 11,413,558 | 209,183,230 | 419,343,230 |
| 77 | 5,750,001 | 5,760,000 | 1 | 84 | 5,787,734 | 214,970,964 | 422,330,964 |
| 78 | 5,760,001 | 5,770,000 | 1 | 85 | 5,795,203 | 220,766,168 | 422,716,168 |
| 79 | 5,820,001 | 5,830,000 | 1 | 86 | 5,859,364 | 226,625,531 | 424,845,531 |
| 80 | 6,000,001 | 6,010,000 | 1 | 87 | 6,037,424 | 232,662,956 | 430,992,956 |
| 81 | 6,040,001 | 6,050,000 | 1 | 88 | 6,078,730 | 238,741,685 | 432,341,685 |
| 82 | 6,370,001 | 6,380,000 | 2 | 90 | 12,819,169 | 251,560,854 | 442,960,854 |
| 83 | 6,690,001 | 6,700,000 | 1 | 91 | 6,734,023 | 258,294,877 | 452,594,877 |
| 84 | 6,810,001 | 6,820,000 | 1 | 92 | 6,848,285 | 265,143,162 | 456,103,162 |
| 85 | 7,280,001 | 7,290,000 | 1 | 93 | 7,327,110 | 272,470,272 | 469,300,272 |
| 86 | 7,560,001 | 7,570,000 | 1 | 94 | 7,606,502 | 280,076,774 | 476,896,774 |
| 87 | 8,840,001 | 8,850,000 | 1 | 95 | 8,892,814 | 288,969,588 | 510,219,588 |
| 88 | 9,200,001 | 9,210,000 | 1 | 96 | 9,260,330 | 298,229,918 | 519,269,918 |
| 89 | 25,180,001 | 25,190,000 | 1 | 97 | 25,325,796 | 323,555,714 | 902,925,714 |
| 90 | 26,570,001 | 26,580,000 | 1 | 98 | 26,728,368 | 350,284,082 | 935,044,082 |
| 91 | 26,590,001 | 26,600,000 | 1 | 99 | 26,743,331 | 377,027,414 | 935,627,414 |
| 92 | 26,630,001 | 26,640,000 | 1 | 100 | 26,787,593 | 403,815,007 | 936,615,007 |
| 93 | 27,260,001 | 27,270,000 | 1 | 101 | 27,414,450 | 431,229,457 | 949,359,457 |
| 94 | 27,420,001 | 27,430,000 | 1 | 102 | 27,577,354 | 458,806,811 | 952,546,811 |
| 95 | 27,450,001 | 27,460,000 | 1 | 103 | 27,611,625 | 486,418,436 | 953,238,436 |
| 96 | 27,590,001 | 27,600,000 | 1 | 104 | 27,749,864 | 514,168,300 | 955,768,300 |
| 97 | 27,930,001 | 27,940,000 | 1 | 105 | 28,087,837 | 542,256,137 | 961,356,137 |
| 98 | 28,050,001 | 28,060,000 | 1 | 106 | 28,214,154 | 570,470,292 | 963,310,292 |


| kWh Step | Start Range (kWh) | End Range (kWh) | Number Of Bills | Cumulative Number of Bills | Total Usage (kWh) | Cumulative <br> Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 99 | 28,540,001 | 28,550,000 | 1 | 107 | 28,708,419 | 599,178,711 | 970,328,711 |
| 100 | 28,700,001 | 28,710,000 | 1 | 108 | 28,860,511 | 628,039,222 | 972,559,222 |
| 101 | 30,870,001 | 30,880,000 | 1 | 109 | 31,046,956 | 659,086,178 | 998,766,178 |
| 102 | 32,090,001 | 32,100,000 | 1 | 110 | 32,274,122 | 691,360,301 | 1,012,360,301 |
| 103 | 40,740,001 | 40,750,000 | 1 | 111 | 40,968,544 | 732,328,845 | 1,099,078,845 |
| 104 | 42,560,001 | 42,570,000 | 1 | 112 | 42,805,818 | 775,134,664 | 1,115,694,664 |
| 105 | 43,550,001 | 43,560,000 | 1 | 113 | 43,794,734 | 818,929,397 | 1,123,849,397 |
| 106 | 44,260,001 | 44,270,000 | 1 | 114 | 44,513,348 | 863,442,745 | 1,129,062,745 |
| 107 | 46,090,001 | 46,100,000 | 1 | 115 | 46,355,642 | 909,798,387 | 1,140,298,387 |
| 108 | 46,340,001 | 46,350,000 | 1 | 116 | 46,599,685 | 956,398,072 | 1,141,798,072 |
| 109 | 47,860,001 | 47,870,000 | 1 | 117 | 48,131,905 | 1,004,529,977 | 1,148,139,977 |
| 110 | 48,050,001 | 48,060,000 | 1 | 118 | 48,323,432 | 1,052,853,409 | 1,148,973,409 |
| 111 | 55,690,001 | 55,700,000 | 1 | 119 | 56,010,211 | 1,108,863,621 | 1,164,563,621 |
| 112 | 55,960,001 | 55,970,000 | 1 | 120 | 56,281,091 | 1,165,144,712 | 1,165,144,712 |


| kWh Step | Start Range (kWh) | End Range (kWh) | $\begin{gathered} \text { Number Of } \\ \text { Bills } \end{gathered}$ | Cumulative Number of Bills | Total Usage (kWh) | Cumulative Usage (kWh) | Consolidation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 1 | 100 | 9 | 9 | 229 | 229 | 2,929 |
| 2 | 101 | 200 | 3 | 12 | 678 | 907 | 5,707 |
| 3 | 601 | 700 | 2 | 14 | 831 | 1,738 | 17,138 |
| 4 | 801 | 900 | 4 | 18 | 3,550 | 5,288 | 21,488 |
| 5 | 901 | 1,000 | 5 | 23 | 5,392 | 10,680 | 23,680 |
| 6 | 1,001 | 1,100 | 2 | 25 | 1,472 | 12,152 | 24,252 |
| 7 | 1,401 | 1,500 | 1 | 26 | 1,979 | 14,131 | 29,131 |
| 8 | 6,601 | 6,700 | 1 | 27 | 9,214 | 23,345 | 83,645 |
| 9 | 7,201 | 7,300 | 2 | 29 | 10,032 | 33,378 | 84,478 |
| 10 | 7,701 | 7,800 | 1 | 30 | 10,705 | 44,083 | 90,883 |
| 11 | 7,901 | 8,000 | 1 | 31 | 10,985 | 55,067 | 95,067 |
| 12 | 8,701 | 8,800 | 1 | 32 | 12,021 | 67,089 | 102,289 |
| 13 | 8,901 | 9,000 | 1 | 33 | 12,302 | 79,391 | 106,391 |
| 14 | 9,101 | 9,200 | 1 | 34 | 12,666 | 92,057 | 110,457 |
| 15 | 9,201 | 9,300 | 1 | 35 | 12,796 | 104,853 | 114,153 |
| 16 | 10,501 | 10,600 | 1 | 36 | 14,546 | 119,400 | 119,400 |

Q.1. The effects of the proposed rates on monthly billing conditions should be provided as follows:

## Residential Bill Comparisons

For each rate applicable to residential service provide a chart or tabulation which shows the dollar and percentage effect of the proposed base rate on monthly bills ranging from the use of zero kWh to $5,000 \mathrm{kWh}$ at appropriate intervals.
A.1. DFR IV - Attachment D-1 provides the requested information in tabular format for each of the residential rate classes. Each residential rate class table shows the monthly distribution charges at current and proposed rates. Current rates include the forecasted January 15, 2022 surcharges that the Company is proposing to roll into base rates. For heating rates, separate tables are provided showing the monthly billing at both winter and summer rates.

Duquesne Light Company
Residential Bill Comparison Monthly Distribution Charges

Rate Schedule RS

C
$D=B+C$
Attachment DFR IV-D-1
Page 1 of 15
Sponsor: D. B. Ogden

## $E=D / B$

B

Monthly Bill
Current Distribution

A
KWH

| 0 | $\$ 13.13$ |
| ---: | ---: |
| 50 | $\$ 16.32$ |
| 100 | $\$ 19.51$ |
| 150 | $\$ 22.70$ |
| 200 | $\$ 25.89$ |
| 250 | $\$ 29.08$ |
| 300 | $\$ 32.28$ |
| 350 | $\$ 35.47$ |
| 400 | $\$ 38.66$ |
| 450 | $\$ 41.85$ |
| 500 | $\$ 45.04$ |
| 550 | $\$ 48.24$ |
| 600 | $\$ 51.43$ |
| 650 | $\$ 54.62$ |
| 700 | $\$ 57.81$ |

$750 \quad \$ 61.00$
800 \$64.20
$850 \quad \$ 67.39$
$900 \quad \$ 70.58$
$950 \quad \$ 73.77$
1000 \$76.96
1050 \$80.16
1100 \$83.35
1150 \$86.54
1200 \$89.73
1250 \$92.92
1300 \$96.12
$1350 \quad \$ 99.31$
1400 \$102.50
1450 \$105.69
1500 \$108.88
$1550 \quad \$ 112.08$
1600 \$115.27
1650 \$118.46
1700 \$121.65
1750 \$124.84
1800 \$128.04
1850 \$131.23
1900 \$134.42
1950 \$137.61
2000 \$140.80
2050 \$144.00
2100 \$147.19
2150 \$150.38
2200 \$153.57
2250 \$156.76

Monthly Bill
Proposed Distribution
\$ Difference

Din

|  |  |  |
| :--- | ---: | :--- |
| $\$ 16.25$ | $\$ 3.13$ | $23.8 \%$ |
| $\$ 19.78$ | $\$ 3.46$ | $21.2 \%$ |
| $\$ 23.31$ | $\$ 3.80$ | $19.5 \%$ |
| $\$ 26.83$ | $\$ 4.13$ | $18.2 \%$ |
| $\$ 30.36$ | $\$ 4.47$ | $17.3 \%$ |
| $\$ 33.89$ | $\$ 4.81$ | $16.5 \%$ |
| $\$ 37.42$ | $\$ 5.14$ | $15.9 \%$ |
| $\$ 40.95$ | $\$ 5.48$ | $15.4 \%$ |
| $\$ 44.48$ | $\$ 5.81$ | $15.0 \%$ |
| $\$ 48.00$ | $\$ 6.15$ | $14.7 \%$ |
| $\$ 51.53$ | $\$ 6.49$ | $14.4 \%$ |
| $\$ 55.06$ | $\$ 6.82$ | $14.1 \%$ |
| $\$ 58.59$ | $\$ 7.16$ | $13.9 \%$ |
| $\$ 62.12$ | $\$ 7.50$ | $13.7 \%$ |
| $\$ 65.64$ | $\$ 7.83$ | $13.5 \%$ |
| $\$ 69.17$ | $\$ 8.17$ | $13.4 \%$ |
| $\$ 72.70$ | $\$ 8.50$ | $13.2 \%$ |
| $\$ 76.23$ | $\$ 8.84$ | $13.1 \%$ |
| $\$ 79.76$ | $\$ 9.18$ | $13.0 \%$ |
| $\$ 83.29$ | $\$ 9.51$ | $12.9 \%$ |
| $\$ 86.81$ | $\$ 9.85$ | $12.8 \%$ |
| $\$ 90.34$ | $\$ 10.19$ | $12.7 \%$ |
| $\$ 93.87$ | $\$ 10.52$ | $12.6 \%$ |
| $\$ 97.40$ | $\$ 10.86$ | $12.5 \%$ |
| $\$ 100.93$ | $\$ 11.19$ | $12.5 \%$ |
| $\$ 104.46$ | $\$ 11.53$ | $12.4 \%$ |
| $\$ 107.98$ | $\$ 11.87$ | $12.3 \%$ |
| $\$ 111.51$ | $\$ 12.20$ | $12.3 \%$ |
| $\$ 115.04$ | $\$ 12.54$ | $12.2 \%$ |
| $\$ 118.57$ | $\$ 12.88$ | $12.2 \%$ |
| $\$ 122.10$ | $\$ 13.21$ | $12.1 \%$ |
| $\$ 125.62$ | $\$ 13.55$ | $12.1 \%$ |
| $\$ 129.15$ | $\$ 13.88$ | $12.0 \%$ |
| $\$ 132.68$ | $\$ 14.22$ | $12.0 \%$ |
| $\$ 136.21$ | $\$ 14.56$ | $12.0 \%$ |
| $\$ 139.74$ | $\$ 14.89$ | $11.9 \%$ |
| $\$ 143.27$ | $\$ 15.23$ | $11.9 \%$ |
| $\$ 146.79$ | $\$ 15.57$ | $11.9 \%$ |
| $\$ 150.32$ | $\$ 15.90$ | $11.8 \%$ |
| $\$ 153.85$ | $\$ 16.24$ | $11.8 \%$ |
| $\$ 157.38$ | $\$ 16.57$ | $11.8 \%$ |
| $\$ 160.91$ | $\$ 16.91$ | $11.7 \%$ |
| $\$ 164.43$ | $\$ 17.25$ | $11.7 \%$ |
| $\$ 167.96$ | $\$ 17.58$ | $11.7 \%$ |
| $\$ 171.49$ | $\$ 17.92$ | $11.7 \%$ |
| $\$ 175.02$ | $\$ 18.26$ | $11.6 \%$ |
|  |  |  |

Duquesne Light Company
Residential Bill Comparison Monthly Distribution Charges Rate Schedule RS

B

Monthly Bill
Current Distribution

C

## $\mathrm{D}=\mathrm{B}+\mathrm{C}$

Page 2 of 15
Sponsor: D. B. Ogden

## E=D/B

Monthly Bill
Proposed Distribution
\$ Difference


2300
2350
2400
2450
$2500 \quad \$ 172.72$
$2550 \quad \$ 175.91$
$2600 \quad \$ 179.11$
$2650 \quad \$ 182.30$
$2700 \quad \$ 185.49$
$2750 \quad \$ 188.68$
2800 \$191.87
2850 \$195.07
2900 \$198.26
2950 \$201.45
3000 \$204.64
3050 \$207.83
3100 \$211.03
$3150 \quad \$ 214.22$
$3200 \quad \$ 217.41$
$3250 \quad \$ 220.60$
3300 \$223.79
3350 \$226.99
3400 \$230.18
$3450 \quad \$ 233.37$
3500 \$236.56
3550 \$239.75
3600 \$242.95
3650 \$246.14
3700 \$249.33
$3750 \quad \$ 252.52$
$3800 \quad \$ 255.71$
$3850 \quad \$ 258.91$
3900 \$262.10
$3950 \quad \$ 265.29$
4000 \$268.48
$4050 \quad \$ 271.67$
4100 \$274.87
4150 \$278.06
4200 \$281.25
$4250 \quad \$ 284.44$
4300 \$287.63
$4350 \quad \$ 290.83$
4400 \$294.02
4450 \$297.21
$4500 \quad \$ 300.40$
$4550 \quad \$ 303.59$
$\$ 178.55$
$\$ 182.08$
$\$ 185.60$
$\$ 189.13$
$\$ 192.66$
$\$ 196.19$
$\$ 199.72$
$\$ 203.24$
$\$ 206.77$
$\$ 210.30$
$\$ 213.83$
$\$ 217.36$
$\$ 220.89$
$\$ 224.41$
$\$ 227.94$
$\$ 231.47$
$\$ 235.00$
$\$ 238.53$
$\$ 242.05$
$\$ 245.58$
$\$ 249.11$
$\$ 252.64$
$\$ 256.17$
$\$ 259.70$
$\$ 263.22$
$\$ 266.75$
$\$ 270.28$
$\$ 273.81$
$\$ 277.34$
$\$ 280.87$
$\$ 284.39$
$\$ 287.92$
$\$ 291.45$
$\$ 294.98$
$\$ 298.51$
$\$ 302.03$
$\$ 305.56$
$\$ 309.09$
$\$ 312.62$
$\$ 316.15$
$\$ 319.68$
$\$ 323.20$
$\$ 326.73$
$\$ 330.26$
$\$ 333.79$
$\$ 337.32$
$\$ 18.59$
$\$ 18.93$
\$19.26
\$19.60
$\$ 19.94 \quad 11.5 \%$
\$20.27 11.5\%
\$20.61 11.5\%
\$20.95 11.5\%
\$21.28 11.5\%
\$21.62 11.5\%
\$21.95 11.4\%
\$22.29 11.4\%
\$22.63 11.4\%
\$22.96 11.4\%
\$23.30 11.4\%
\$23.64 11.4\%
$\$ 23.97 \quad 11.4 \%$
\$24.31 11.3\%
$\$ 24.64 \quad 11.3 \%$
$\$ 24.98 \quad 11.3 \%$
\$25.32 11.3\%
$\$ 25.65 \quad 11.3 \%$
$\$ 25.99 \quad 11.3 \%$
$\$ 26.33 \quad 11.3 \%$
\$26.66 11.3\%
$\$ 27.00 \quad 11.3 \%$
$\$ 27.33 \quad 11.3 \%$
$\$ 27.67 \quad 11.2 \%$
$\$ 28.01 \quad 11.2 \%$
$\$ 28.34 \quad 11.2 \%$
$\$ 28.68 \quad 11.2 \%$
$\$ 29.02 \quad 11.2 \%$
$\$ 29.35$ 11.2\%
$\$ 29.69 \quad 11.2 \%$
$\$ 30.02 \quad 11.2 \%$
$\begin{array}{ll}\$ 30.36 & 11.2 \% \\ \$ 30.70 & 11.2 \%\end{array}$
\$31.03 11.2\%
\$31.37 11.2\%
\$31.71 11.1\%
\$32.04 11.1\%
\$32.38 11.1\%
\$32.71 11.1\%
\$33.05 11.1\%
\$33.39 11.1\%
\$33.72 11.1\%

Duquesne Light Company
Residential Bill Comparison
Monthly Distribution Charges Rate Schedule RS

| A | B | $\mathbf{C}$ | D=B+C | E=D/B |
| :---: | :---: | :---: | :---: | :---: |
| Monthly Bill <br> Current <br> Kistribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |  |
| 4600 | $\$ 306.78$ | $\$ 340.84$ | $\$ 34.06$ | $11.1 \%$ |
| 4650 | $\$ 309.98$ | $\$ 344.37$ | $\$ 34.40$ | $11.1 \%$ |
| 4700 | $\$ 313.17$ | $\$ 347.90$ | $\$ 34.73$ | $11.1 \%$ |
| 4750 | $\$ 316.36$ | $\$ 351.43$ | $\$ 35.07$ | $11.1 \%$ |
| 4800 | $\$ 319.55$ | $\$ 354.96$ | $\$ 35.40$ | $11.1 \%$ |
| 4850 | $\$ 322.74$ | $\$ 358.49$ | $\$ 35.74$ | $11.1 \%$ |
| 4900 | $\$ 325.94$ | $\$ 362.01$ | $\$ 36.08$ | $11.1 \%$ |
| 4950 | $\$ 329.13$ | $\$ 365.54$ | $\$ 36.41$ | $11.1 \%$ |
| 5000 | $\$ 332.32$ | $\$ 369.07$ | $\$ 36.75$ | $11.1 \%$ |


| Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RH (Summer) |  |  |  | Attachment DFR IV-D-1 <br> Page 4 of 15 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Difference |
| 0 | \$13.13 | \$16.25 | \$3.13 | 23.8\% |
| 50 | \$16.32 | \$19.78 | \$3.46 | 21.2\% |
| 100 | \$19.51 | \$23.31 | \$3.80 | 19.5\% |
| 150 | \$22.70 | \$26.83 | \$4.13 | 18.2\% |
| 200 | \$25.89 | \$30.36 | \$4.47 | 17.3\% |
| 250 | \$29.08 | \$33.89 | \$4.81 | 16.5\% |
| 300 | \$32.28 | \$37.42 | \$5.14 | 15.9\% |
| 350 | \$35.47 | \$40.95 | \$5.48 | 15.4\% |
| 400 | \$38.66 | \$44.48 | \$5.81 | 15.0\% |
| 450 | \$41.85 | \$48.00 | \$6.15 | 14.7\% |
| 500 | \$45.04 | \$51.53 | \$6.49 | 14.4\% |
| 550 | \$48.24 | \$55.06 | \$6.82 | 14.1\% |
| 600 | \$51.43 | \$58.59 | \$7.16 | 13.9\% |
| 650 | \$54.62 | \$62.12 | \$7.50 | 13.7\% |
| 700 | \$57.81 | \$65.64 | \$7.83 | 13.5\% |
| 750 | \$61.00 | \$69.17 | \$8.17 | 13.4\% |
| 800 | \$64.20 | \$72.70 | \$8.50 | 13.2\% |
| 850 | \$67.39 | \$76.23 | \$8.84 | 13.1\% |
| 900 | \$70.58 | \$79.76 | \$9.18 | 13.0\% |
| 950 | \$73.77 | \$83.29 | \$9.51 | 12.9\% |
| 1000 | \$76.96 | \$86.81 | \$9.85 | 12.8\% |
| 1050 | \$80.16 | \$90.34 | \$10.19 | 12.7\% |
| 1100 | \$83.35 | \$93.87 | \$10.52 | 12.6\% |
| 1150 | \$86.54 | \$97.40 | \$10.86 | 12.5\% |
| 1200 | \$89.73 | \$100.93 | \$11.19 | 12.5\% |
| 1250 | \$92.92 | \$104.46 | \$11.53 | 12.4\% |
| 1300 | \$96.12 | \$107.98 | \$11.87 | 12.3\% |
| 1350 | \$99.31 | \$111.51 | \$12.20 | 12.3\% |
| 1400 | \$102.50 | \$115.04 | \$12.54 | 12.2\% |
| 1450 | \$105.69 | \$118.57 | \$12.88 | 12.2\% |
| 1500 | \$108.88 | \$122.10 | \$13.21 | 12.1\% |
| 1550 | \$112.08 | \$125.62 | \$13.55 | 12.1\% |
| 1600 | \$115.27 | \$129.15 | \$13.88 | 12.0\% |
| 1650 | \$118.46 | \$132.68 | \$14.22 | 12.0\% |
| 1700 | \$121.65 | \$136.21 | \$14.56 | 12.0\% |
| 1750 | \$124.84 | \$139.74 | \$14.89 | 11.9\% |
| 1800 | \$128.04 | \$143.27 | \$15.23 | 11.9\% |
| 1850 | \$131.23 | \$146.79 | \$15.57 | 11.9\% |
| 1900 | \$134.42 | \$150.32 | \$15.90 | 11.8\% |
| 1950 | \$137.61 | \$153.85 | \$16.24 | 11.8\% |
| 2000 | \$140.80 | \$157.38 | \$16.57 | 11.8\% |
| 2050 | \$144.00 | \$160.91 | \$16.91 | 11.7\% |
| 2100 | \$147.19 | \$164.43 | \$17.25 | 11.7\% |
| 2150 | \$150.38 | \$167.96 | \$17.58 | 11.7\% |
| 2200 | \$153.57 | \$171.49 | \$17.92 | 11.7\% |
| 2250 | \$156.76 | \$175.02 | \$18.26 | 11.6\% |


|  | Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RH (Summer) |  |  | Attachment DFR IV-D-1 <br> Page 5 of 15 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Difference |
| 2300 | \$159.95 | \$178.55 | \$18.59 | 11.6\% |
| 2350 | \$163.15 | \$182.08 | \$18.93 | 11.6\% |
| 2400 | \$166.34 | \$185.60 | \$19.26 | 11.6\% |
| 2450 | \$169.53 | \$189.13 | \$19.60 | 11.6\% |
| 2500 | \$172.72 | \$192.66 | \$19.94 | 11.5\% |
| 2550 | \$175.91 | \$196.19 | \$20.27 | 11.5\% |
| 2600 | \$179.11 | \$199.72 | \$20.61 | 11.5\% |
| 2650 | \$182.30 | \$203.24 | \$20.95 | 11.5\% |
| 2700 | \$185.49 | \$206.77 | \$21.28 | 11.5\% |
| 2750 | \$188.68 | \$210.30 | \$21.62 | 11.5\% |
| 2800 | \$191.87 | \$213.83 | \$21.95 | 11.4\% |
| 2850 | \$195.07 | \$217.36 | \$22.29 | 11.4\% |
| 2900 | \$198.26 | \$220.89 | \$22.63 | 11.4\% |
| 2950 | \$201.45 | \$224.41 | \$22.96 | 11.4\% |
| 3000 | \$204.64 | \$227.94 | \$23.30 | 11.4\% |
| 3050 | \$207.83 | \$231.47 | \$23.64 | 11.4\% |
| 3100 | \$211.03 | \$235.00 | \$23.97 | 11.4\% |
| 3150 | \$214.22 | \$238.53 | \$24.31 | 11.3\% |
| 3200 | \$217.41 | \$242.05 | \$24.64 | 11.3\% |
| 3250 | \$220.60 | \$245.58 | \$24.98 | 11.3\% |
| 3300 | \$223.79 | \$249.11 | \$25.32 | 11.3\% |
| 3350 | \$226.99 | \$252.64 | \$25.65 | 11.3\% |
| 3400 | \$230.18 | \$256.17 | \$25.99 | 11.3\% |
| 3450 | \$233.37 | \$259.70 | \$26.33 | 11.3\% |
| 3500 | \$236.56 | \$263.22 | \$26.66 | 11.3\% |
| 3550 | \$239.75 | \$266.75 | \$27.00 | 11.3\% |
| 3600 | \$242.95 | \$270.28 | \$27.33 | 11.3\% |
| 3650 | \$246.14 | \$273.81 | \$27.67 | 11.2\% |
| 3700 | \$249.33 | \$277.34 | \$28.01 | 11.2\% |
| 3750 | \$252.52 | \$280.87 | \$28.34 | 11.2\% |
| 3800 | \$255.71 | \$284.39 | \$28.68 | 11.2\% |
| 3850 | \$258.91 | \$287.92 | \$29.02 | 11.2\% |
| 3900 | \$262.10 | \$291.45 | \$29.35 | 11.2\% |
| 3950 | \$265.29 | \$294.98 | \$29.69 | 11.2\% |
| 4000 | \$268.48 | \$298.51 | \$30.02 | 11.2\% |
| 4050 | \$271.67 | \$302.03 | \$30.36 | 11.2\% |
| 4100 | \$274.87 | \$305.56 | \$30.70 | 11.2\% |
| 4150 | \$278.06 | \$309.09 | \$31.03 | 11.2\% |
| 4200 | \$281.25 | \$312.62 | \$31.37 | 11.2\% |
| 4250 | \$284.44 | \$316.15 | \$31.71 | 11.1\% |
| 4300 | \$287.63 | \$319.68 | \$32.04 | 11.1\% |
| 4350 | \$290.83 | \$323.20 | \$32.38 | 11.1\% |
| 4400 | \$294.02 | \$326.73 | \$32.71 | 11.1\% |
| 4450 | \$297.21 | \$330.26 | \$33.05 | 11.1\% |
| 4500 | \$300.40 | \$333.79 | \$33.39 | 11.1\% |
| 4550 | \$303.59 | \$337.32 | \$33.72 | 11.1\% |

Duquesne Light Company
Residential Bill Comparison
Monthly Distribution Charges
Rate Schedule RH (Summer)

| A | B | C | D=B+C | E=D/B |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly Bill <br> Current | Monthly Bill <br> Proposed <br> Distribution <br> Distribution | \$ Difference | \% Difference |  |
| 4600 | $\$ 306.78$ | $\$ 340.84$ | $\$ 34.06$ | $11.1 \%$ |
| 4650 | $\$ 309.98$ | $\$ 344.37$ | $\$ 34.40$ | $11.1 \%$ |
| 4700 | $\$ 313.17$ | $\$ 347.90$ | $\$ 34.73$ | $11.1 \%$ |
| 4750 | $\$ 316.36$ | $\$ 351.43$ | $\$ 35.07$ | $11.1 \%$ |
| 4800 | $\$ 319.55$ | $\$ 354.96$ | $\$ 35.40$ | $11.1 \%$ |
| 4850 | $\$ 322.74$ | $\$ 358.49$ | $\$ 35.74$ | $11.1 \%$ |
| 4900 | $\$ 325.94$ | $\$ 362.01$ | $\$ 36.08$ | $11.1 \%$ |
| 4950 | $\$ 329.13$ | $\$ 365.54$ | $\$ 36.41$ | $11.1 \%$ |
| 5000 | $\$ 332.32$ | $\$ 369.07$ | $\$ 36.75$ | $11.1 \%$ |


|  | Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RH (Winter) |  |  | Attachment DFR IV-D-1 <br> Page 7 of 15 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 0 | \$13.13 | \$16.25 | \$3.13 | 23.8\% |
| 50 | \$15.55 | \$19.42 | \$3.87 | 24.9\% |
| 100 | \$17.98 | \$22.59 | \$4.61 | 25.6\% |
| 150 | \$20.41 | \$25.76 | \$5.35 | 26.2\% |
| 200 | \$22.84 | \$28.93 | \$6.10 | 26.7\% |
| 250 | \$25.26 | \$32.10 | \$6.84 | 27.1\% |
| 300 | \$27.69 | \$35.27 | \$7.58 | 27.4\% |
| 350 | \$30.12 | \$38.44 | \$8.32 | 27.6\% |
| 400 | \$32.55 | \$41.61 | \$9.07 | 27.9\% |
| 450 | \$34.97 | \$44.78 | \$9.81 | 28.0\% |
| 500 | \$37.40 | \$47.96 | \$10.55 | 28.2\% |
| 550 | \$39.83 | \$51.13 | \$11.30 | 28.4\% |
| 600 | \$42.26 | \$54.30 | \$12.04 | 28.5\% |
| 650 | \$44.69 | \$57.47 | \$12.78 | 28.6\% |
| 700 | \$47.11 | \$60.64 | \$13.52 | 28.7\% |
| 750 | \$49.54 | \$63.81 | \$14.27 | 28.8\% |
| 800 | \$51.97 | \$66.98 | \$15.01 | 28.9\% |
| 850 | \$54.40 | \$70.15 | \$15.75 | 29.0\% |
| 900 | \$56.82 | \$73.32 | \$16.49 | 29.0\% |
| 950 | \$59.25 | \$76.49 | \$17.24 | 29.1\% |
| 1000 | \$61.68 | \$79.66 | \$17.98 | 29.1\% |
| 1050 | \$64.11 | \$82.83 | \$18.72 | 29.2\% |
| 1100 | \$66.54 | \$86.00 | \$19.47 | 29.3\% |
| 1150 | \$68.96 | \$89.17 | \$20.21 | 29.3\% |
| 1200 | \$71.39 | \$92.34 | \$20.95 | 29.3\% |
| 1250 | \$73.82 | \$95.51 | \$21.69 | 29.4\% |
| 1300 | \$76.25 | \$98.68 | \$22.44 | 29.4\% |
| 1350 | \$78.67 | \$101.85 | \$23.18 | 29.5\% |
| 1400 | \$81.10 | \$105.02 | \$23.92 | 29.5\% |
| 1450 | \$83.53 | \$108.19 | \$24.66 | 29.5\% |
| 1500 | \$85.96 | \$111.37 | \$25.41 | 29.6\% |
| 1550 | \$88.39 | \$114.54 | \$26.15 | 29.6\% |
| 1600 | \$90.81 | \$117.71 | \$26.89 | 29.6\% |
| 1650 | \$93.24 | \$120.88 | \$27.64 | 29.6\% |
| 1700 | \$95.67 | \$124.05 | \$28.38 | 29.7\% |
| 1750 | \$98.10 | \$127.22 | \$29.12 | 29.7\% |
| 1800 | \$100.52 | \$130.39 | \$29.86 | 29.7\% |
| 1850 | \$102.95 | \$133.56 | \$30.61 | 29.7\% |
| 1900 | \$105.38 | \$136.73 | \$31.35 | 29.7\% |
| 1950 | \$107.81 | \$139.90 | \$32.09 | 29.8\% |
| 2000 | \$110.24 | \$143.07 | \$32.83 | 29.8\% |
| 2050 | \$112.66 | \$146.24 | \$33.58 | 29.8\% |
| 2100 | \$115.09 | \$149.41 | \$34.32 | 29.8\% |
| 2150 | \$117.52 | \$152.58 | \$35.06 | 29.8\% |
| 2200 | \$119.95 | \$155.75 | \$35.81 | 29.9\% |
| 2250 | \$122.37 | \$158.92 | \$36.55 | 29.9\% |


|  | Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RH (Winter) |  |  | Attachment DFR IV-D-1 <br> Page 8 of 15 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 2300 | \$124.80 | \$162.09 | \$37.29 | 29.9\% |
| 2350 | \$127.23 | \$165.26 | \$38.03 | 29.9\% |
| 2400 | \$129.66 | \$168.43 | \$38.78 | 29.9\% |
| 2450 | \$132.09 | \$171.60 | \$39.52 | 29.9\% |
| 2500 | \$134.51 | \$174.78 | \$40.26 | 29.9\% |
| 2550 | \$136.94 | \$177.95 | \$41.00 | 29.9\% |
| 2600 | \$139.37 | \$181.12 | \$41.75 | 30.0\% |
| 2650 | \$141.80 | \$184.29 | \$42.49 | 30.0\% |
| 2700 | \$144.22 | \$187.46 | \$43.23 | 30.0\% |
| 2750 | \$146.65 | \$190.63 | \$43.98 | 30.0\% |
| 2800 | \$149.08 | \$193.80 | \$44.72 | 30.0\% |
| 2850 | \$151.51 | \$196.97 | \$45.46 | 30.0\% |
| 2900 | \$153.94 | \$200.14 | \$46.20 | 30.0\% |
| 2950 | \$156.36 | \$203.31 | \$46.95 | 30.0\% |
| 3000 | \$158.79 | \$206.48 | \$47.69 | 30.0\% |
| 3050 | \$161.22 | \$209.65 | \$48.43 | 30.0\% |
| 3100 | \$163.65 | \$212.82 | \$49.17 | 30.0\% |
| 3150 | \$166.07 | \$215.99 | \$49.92 | 30.1\% |
| 3200 | \$168.50 | \$219.16 | \$50.66 | 30.1\% |
| 3250 | \$170.93 | \$222.33 | \$51.40 | 30.1\% |
| 3300 | \$173.36 | \$225.50 | \$52.15 | 30.1\% |
| 3350 | \$175.79 | \$228.67 | \$52.89 | 30.1\% |
| 3400 | \$178.21 | \$231.84 | \$53.63 | 30.1\% |
| 3450 | \$180.64 | \$235.01 | \$54.37 | 30.1\% |
| 3500 | \$183.07 | \$238.19 | \$55.12 | 30.1\% |
| 3550 | \$185.50 | \$241.36 | \$55.86 | 30.1\% |
| 3600 | \$187.92 | \$244.53 | \$56.60 | 30.1\% |
| 3650 | \$190.35 | \$247.70 | \$57.34 | 30.1\% |
| 3700 | \$192.78 | \$250.87 | \$58.09 | 30.1\% |
| 3750 | \$195.21 | \$254.04 | \$58.83 | 30.1\% |
| 3800 | \$197.64 | \$257.21 | \$59.57 | 30.1\% |
| 3850 | \$200.06 | \$260.38 | \$60.32 | 30.1\% |
| 3900 | \$202.49 | \$263.55 | \$61.06 | 30.2\% |
| 3950 | \$204.92 | \$266.72 | \$61.80 | 30.2\% |
| 4000 | \$207.35 | \$269.89 | \$62.54 | 30.2\% |
| 4050 | \$209.77 | \$273.06 | \$63.29 | 30.2\% |
| 4100 | \$212.20 | \$276.23 | \$64.03 | 30.2\% |
| 4150 | \$214.63 | \$279.40 | \$64.77 | 30.2\% |
| 4200 | \$217.06 | \$282.57 | \$65.51 | 30.2\% |
| 4250 | \$219.49 | \$285.74 | \$66.26 | 30.2\% |
| 4300 | \$221.91 | \$288.91 | \$67.00 | 30.2\% |
| 4350 | \$224.34 | \$292.08 | \$67.74 | 30.2\% |
| 4400 | \$226.77 | \$295.25 | \$68.49 | 30.2\% |
| 4450 | \$229.20 | \$298.42 | \$69.23 | 30.2\% |
| 4500 | \$231.62 | \$301.60 | \$69.97 | 30.2\% |
| 4550 | \$234.05 | \$304.77 | \$70.71 | 30.2\% |


| Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RH (Winter) |  |  |  | Attachment DFR IV-D-1 <br> Page 9 of 15 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 4600 | \$236.48 | \$307.94 | \$71.46 | 30.2\% |
| 4650 | \$238.91 | \$311.11 | \$72.20 | 30.2\% |
| 4700 | \$241.33 | \$314.28 | \$72.94 | 30.2\% |
| 4750 | \$243.76 | \$317.45 | \$73.68 | 30.2\% |
| 4800 | \$246.19 | \$320.62 | \$74.43 | 30.2\% |
| 4850 | \$248.62 | \$323.79 | \$75.17 | 30.2\% |
| 4900 | \$251.05 | \$326.96 | \$75.91 | 30.2\% |
| 4950 | \$253.47 | \$330.13 | \$76.66 | 30.2\% |
| 5000 | \$255.90 | \$333.30 | \$77.40 | 30.2\% |


|  | Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RA (Summer) |  |  | Attachment $\square$ <br> Pa <br> Sponsor: |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | E=D/B |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 0 | \$13.13 | \$16.25 | \$3.13 | 23.8\% |
| 50 | \$16.32 | \$19.78 | \$3.46 | 21.2\% |
| 100 | \$19.51 | \$23.31 | \$3.80 | 19.5\% |
| 150 | \$22.70 | \$26.83 | \$4.13 | 18.2\% |
| 200 | \$25.89 | \$30.36 | \$4.47 | 17.3\% |
| 250 | \$29.08 | \$33.89 | \$4.81 | 16.5\% |
| 300 | \$32.28 | \$37.42 | \$5.14 | 15.9\% |
| 350 | \$35.47 | \$40.95 | \$5.48 | 15.4\% |
| 400 | \$38.66 | \$44.48 | \$5.81 | 15.0\% |
| 450 | \$41.85 | \$48.00 | \$6.15 | 14.7\% |
| 500 | \$45.04 | \$51.53 | \$6.49 | 14.4\% |
| 550 | \$48.24 | \$55.06 | \$6.82 | 14.1\% |
| 600 | \$51.43 | \$58.59 | \$7.16 | 13.9\% |
| 650 | \$54.62 | \$62.12 | \$7.50 | 13.7\% |
| 700 | \$57.81 | \$65.64 | \$7.83 | 13.5\% |
| 750 | \$61.00 | \$69.17 | \$8.17 | 13.4\% |
| 800 | \$64.20 | \$72.70 | \$8.50 | 13.2\% |
| 850 | \$67.39 | \$76.23 | \$8.84 | 13.1\% |
| 900 | \$70.58 | \$79.76 | \$9.18 | 13.0\% |
| 950 | \$73.77 | \$83.29 | \$9.51 | 12.9\% |
| 1000 | \$76.96 | \$86.81 | \$9.85 | 12.8\% |
| 1050 | \$80.16 | \$90.34 | \$10.19 | 12.7\% |
| 1100 | \$83.35 | \$93.87 | \$10.52 | 12.6\% |
| 1150 | \$86.54 | \$97.40 | \$10.86 | 12.5\% |
| 1200 | \$89.73 | \$100.93 | \$11.19 | 12.5\% |
| 1250 | \$92.92 | \$104.46 | \$11.53 | 12.4\% |
| 1300 | \$96.12 | \$107.98 | \$11.87 | 12.3\% |
| 1350 | \$99.31 | \$111.51 | \$12.20 | 12.3\% |
| 1400 | \$102.50 | \$115.04 | \$12.54 | 12.2\% |
| 1450 | \$105.69 | \$118.57 | \$12.88 | 12.2\% |
| 1500 | \$108.88 | \$122.10 | \$13.21 | 12.1\% |
| 1550 | \$112.08 | \$125.62 | \$13.55 | 12.1\% |
| 1600 | \$115.27 | \$129.15 | \$13.88 | 12.0\% |
| 1650 | \$118.46 | \$132.68 | \$14.22 | 12.0\% |
| 1700 | \$121.65 | \$136.21 | \$14.56 | 12.0\% |
| 1750 | \$124.84 | \$139.74 | \$14.89 | 11.9\% |
| 1800 | \$128.04 | \$143.27 | \$15.23 | 11.9\% |
| 1850 | \$131.23 | \$146.79 | \$15.57 | 11.9\% |
| 1900 | \$134.42 | \$150.32 | \$15.90 | 11.8\% |
| 1950 | \$137.61 | \$153.85 | \$16.24 | 11.8\% |
| 2000 | \$140.80 | \$157.38 | \$16.57 | 11.8\% |
| 2050 | \$144.00 | \$160.91 | \$16.91 | 11.7\% |
| 2100 | \$147.19 | \$164.43 | \$17.25 | 11.7\% |
| 2150 | \$150.38 | \$167.96 | \$17.58 | 11.7\% |
| 2200 | \$153.57 | \$171.49 | \$17.92 | 11.7\% |
| 2250 | \$156.76 | \$175.02 | \$18.26 | 11.6\% |


| A | Duquesne Light Company Residential Bill Comparison Monthly Distribution Charges Rate Schedule RA (Summer) |  |  | Attachment Pa Sponsor: |
| :---: | :---: | :---: | :---: | :---: |
|  | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 2300 | \$159.95 | \$178.55 | \$18.59 | 11.6\% |
| 2350 | \$163.15 | \$182.08 | \$18.93 | 11.6\% |
| 2400 | \$166.34 | \$185.60 | \$19.26 | 11.6\% |
| 2450 | \$169.53 | \$189.13 | \$19.60 | 11.6\% |
| 2500 | \$172.72 | \$192.66 | \$19.94 | 11.5\% |
| 2550 | \$175.91 | \$196.19 | \$20.27 | 11.5\% |
| 2600 | \$179.11 | \$199.72 | \$20.61 | 11.5\% |
| 2650 | \$182.30 | \$203.24 | \$20.95 | 11.5\% |
| 2700 | \$185.49 | \$206.77 | \$21.28 | 11.5\% |
| 2750 | \$188.68 | \$210.30 | \$21.62 | 11.5\% |
| 2800 | \$191.87 | \$213.83 | \$21.95 | 11.4\% |
| 2850 | \$195.07 | \$217.36 | \$22.29 | 11.4\% |
| 2900 | \$198.26 | \$220.89 | \$22.63 | 11.4\% |
| 2950 | \$201.45 | \$224.41 | \$22.96 | 11.4\% |
| 3000 | \$204.64 | \$227.94 | \$23.30 | 11.4\% |
| 3050 | \$207.83 | \$231.47 | \$23.64 | 11.4\% |
| 3100 | \$211.03 | \$235.00 | \$23.97 | 11.4\% |
| 3150 | \$214.22 | \$238.53 | \$24.31 | 11.3\% |
| 3200 | \$217.41 | \$242.05 | \$24.64 | 11.3\% |
| 3250 | \$220.60 | \$245.58 | \$24.98 | 11.3\% |
| 3300 | \$223.79 | \$249.11 | \$25.32 | 11.3\% |
| 3350 | \$226.99 | \$252.64 | \$25.65 | 11.3\% |
| 3400 | \$230.18 | \$256.17 | \$25.99 | 11.3\% |
| 3450 | \$233.37 | \$259.70 | \$26.33 | 11.3\% |
| 3500 | \$236.56 | \$263.22 | \$26.66 | 11.3\% |
| 3550 | \$239.75 | \$266.75 | \$27.00 | 11.3\% |
| 3600 | \$242.95 | \$270.28 | \$27.33 | 11.3\% |
| 3650 | \$246.14 | \$273.81 | \$27.67 | 11.2\% |
| 3700 | \$249.33 | \$277.34 | \$28.01 | 11.2\% |
| 3750 | \$252.52 | \$280.87 | \$28.34 | 11.2\% |
| 3800 | \$255.71 | \$284.39 | \$28.68 | 11.2\% |
| 3850 | \$258.91 | \$287.92 | \$29.02 | 11.2\% |
| 3900 | \$262.10 | \$291.45 | \$29.35 | 11.2\% |
| 3950 | \$265.29 | \$294.98 | \$29.69 | 11.2\% |
| 4000 | \$268.48 | \$298.51 | \$30.02 | 11.2\% |
| 4050 | \$271.67 | \$302.03 | \$30.36 | 11.2\% |
| 4100 | \$274.87 | \$305.56 | \$30.70 | 11.2\% |
| 4150 | \$278.06 | \$309.09 | \$31.03 | 11.2\% |
| 4200 | \$281.25 | \$312.62 | \$31.37 | 11.2\% |
| 4250 | \$284.44 | \$316.15 | \$31.71 | 11.1\% |
| 4300 | \$287.63 | \$319.68 | \$32.04 | 11.1\% |
| 4350 | \$290.83 | \$323.20 | \$32.38 | 11.1\% |
| 4400 | \$294.02 | \$326.73 | \$32.71 | 11.1\% |
| 4450 | \$297.21 | \$330.26 | \$33.05 | 11.1\% |
| 4500 | \$300.40 | \$333.79 | \$33.39 | 11.1\% |
| 4550 | \$303.59 | \$337.32 | \$33.72 | 11.1\% |

Duquesne Light Company
Residential Bill Comparison
Monthly Distribution Charges
Rate Schedule RA (Summer)

| A | B | C | D=B+C | E=D/B |
| :---: | :---: | :---: | :---: | :---: |
|  | Monthly Bill <br> Current <br> Distribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |
|  |  |  |  |  |
| 4600 | $\$ 306.78$ | $\$ 340.84$ | $\$ 34.06$ | $11.1 \%$ |
| 4650 | $\$ 309.98$ | $\$ 344.37$ | $\$ 34.40$ | $11.1 \%$ |
| 4700 | $\$ 313.17$ | $\$ 347.90$ | $\$ 34.73$ | $11.1 \%$ |
| 4750 | $\$ 316.36$ | $\$ 351.43$ | $\$ 35.07$ | $11.1 \%$ |
| 4800 | $\$ 319.55$ | $\$ 354.96$ | $\$ 35.40$ | $11.1 \%$ |
| 4850 | $\$ 322.74$ | $\$ 358.49$ | $\$ 35.74$ | $11.1 \%$ |
| 4900 | $\$ 325.94$ | $\$ 362.01$ | $\$ 36.08$ | $11.1 \%$ |
| 4950 | $\$ 329.13$ | $\$ 365.54$ | $\$ 36.41$ | $11.1 \%$ |
| 5000 | $\$ 332.32$ | $\$ 369.07$ | $\$ 36.75$ | $11.1 \%$ |

Duquesne Light Company
Residential Bill Comparison Monthly Distribution Charges
Rate Schedule RA (Winter)

| A | B | C | $\mathrm{D}=\mathrm{B}+\mathrm{C}$ | $E=D / B$ |
| :---: | :---: | :---: | :---: | :---: |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 0 | \$13.13 | \$16.25 | \$3.13 | 23.8\% |
| 50 | \$14.02 | \$17.63 | \$3.62 | 25.8\% |
| 100 | \$14.91 | \$19.01 | \$4.11 | 27.6\% |
| 150 | \$15.80 | \$20.39 | \$4.60 | 29.1\% |
| 200 | \$16.69 | \$21.78 | \$5.09 | 30.5\% |
| 250 | \$17.58 | \$23.16 | \$5.58 | 31.8\% |
| 300 | \$18.47 | \$24.54 | \$6.07 | 32.9\% |
| 350 | \$19.36 | \$25.92 | \$6.56 | 33.9\% |
| 400 | \$20.25 | \$27.30 | \$7.05 | 34.8\% |
| 450 | \$21.14 | \$28.68 | \$7.55 | 35.7\% |
| 500 | \$22.03 | \$30.07 | \$8.04 | 36.5\% |
| 550 | \$22.92 | \$31.45 | \$8.53 | 37.2\% |
| 600 | \$23.81 | \$32.83 | \$9.02 | 37.9\% |
| 650 | \$24.70 | \$34.21 | \$9.51 | 38.5\% |
| 700 | \$25.59 | \$35.59 | \$10.00 | 39.1\% |
| 750 | \$26.48 | \$36.97 | \$10.49 | 39.6\% |
| 800 | \$27.37 | \$38.35 | \$10.98 | 40.1\% |
| 850 | \$28.26 | \$39.74 | \$11.47 | 40.6\% |
| 900 | \$29.15 | \$41.12 | \$11.97 | 41.0\% |
| 950 | \$30.04 | \$42.50 | \$12.46 | 41.5\% |
| 1000 | \$30.93 | \$43.88 | \$12.95 | 41.9\% |
| 1050 | \$31.82 | \$45.26 | \$13.44 | 42.2\% |
| 1100 | \$32.71 | \$46.64 | \$13.93 | 42.6\% |
| 1150 | \$33.60 | \$48.03 | \$14.42 | 42.9\% |
| 1200 | \$34.49 | \$49.41 | \$14.91 | 43.2\% |
| 1250 | \$35.39 | \$50.79 | \$15.40 | 43.5\% |
| 1300 | \$36.28 | \$52.17 | \$15.89 | 43.8\% |
| 1350 | \$37.17 | \$53.55 | \$16.39 | 44.1\% |
| 1400 | \$38.06 | \$54.93 | \$16.88 | 44.3\% |
| 1450 | \$38.95 | \$56.31 | \$17.37 | 44.6\% |
| 1500 | \$39.84 | \$57.70 | \$17.86 | 44.8\% |
| 1550 | \$40.73 | \$59.08 | \$18.35 | 45.1\% |
| 1600 | \$41.62 | \$60.46 | \$18.84 | 45.3\% |
| 1650 | \$42.51 | \$61.84 | \$19.33 | 45.5\% |
| 1700 | \$43.40 | \$63.22 | \$19.82 | 45.7\% |
| 1750 | \$44.29 | \$64.60 | \$20.31 | 45.9\% |
| 1800 | \$45.18 | \$65.99 | \$20.81 | 46.1\% |
| 1850 | \$46.07 | \$67.37 | \$21.30 | 46.2\% |
| 1900 | \$46.96 | \$68.75 | \$21.79 | 46.4\% |
| 1950 | \$47.85 | \$70.13 | \$22.28 | 46.6\% |
| 2000 | \$48.74 | \$71.51 | \$22.77 | 46.7\% |
| 2050 | \$49.63 | \$72.89 | \$23.26 | 46.9\% |
| 2100 | \$50.52 | \$74.28 | \$23.75 | 47.0\% |
| 2150 | \$51.41 | \$75.66 | \$24.24 | 47.2\% |
| 2200 | \$52.30 | \$77.04 | \$24.74 | 47.3\% |
| 2250 | \$53.19 | \$78.42 | \$25.23 | 47.4\% |

Duquesne Light Company
Residential Bill Comparison Monthly Distribution Charges
Rate Schedule RA (Winter)

| A | B | c | $D=B+C$ | $E=D / B$ |
| :---: | :---: | :---: | :---: | :---: |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 2300 | \$54.08 | \$79.80 | \$25.72 | 47.6\% |
| 2350 | \$54.97 | \$81.18 | \$26.21 | 47.7\% |
| 2400 | \$55.86 | \$82.56 | \$26.70 | 47.8\% |
| 2450 | \$56.75 | \$83.95 | \$27.19 | 47.9\% |
| 2500 | \$57.65 | \$85.33 | \$27.68 | 48.0\% |
| 2550 | \$58.54 | \$86.71 | \$28.17 | 48.1\% |
| 2600 | \$59.43 | \$88.09 | \$28.66 | 48.2\% |
| 2650 | \$60.32 | \$89.47 | \$29.16 | 48.3\% |
| 2700 | \$61.21 | \$90.85 | \$29.65 | 48.4\% |
| 2750 | \$62.10 | \$92.24 | \$30.14 | 48.5\% |
| 2800 | \$62.99 | \$93.62 | \$30.63 | 48.6\% |
| 2850 | \$63.88 | \$95.00 | \$31.12 | 48.7\% |
| 2900 | \$64.77 | \$96.38 | \$31.61 | 48.8\% |
| 2950 | \$65.66 | \$97.76 | \$32.10 | 48.9\% |
| 3000 | \$66.55 | \$99.14 | \$32.59 | 49.0\% |
| 3050 | \$67.44 | \$100.52 | \$33.08 | 49.1\% |
| 3100 | \$68.33 | \$101.91 | \$33.58 | 49.1\% |
| 3150 | \$69.22 | \$103.29 | \$34.07 | 49.2\% |
| 3200 | \$70.11 | \$104.67 | \$34.56 | 49.3\% |
| 3250 | \$71.00 | \$106.05 | \$35.05 | 49.4\% |
| 3300 | \$71.89 | \$107.43 | \$35.54 | 49.4\% |
| 3350 | \$72.78 | \$108.81 | \$36.03 | 49.5\% |
| 3400 | \$73.67 | \$110.20 | \$36.52 | 49.6\% |
| 3450 | \$74.56 | \$111.58 | \$37.01 | 49.6\% |
| 3500 | \$75.45 | \$112.96 | \$37.50 | 49.7\% |
| 3550 | \$76.34 | \$114.34 | \$38.00 | 49.8\% |
| 3600 | \$77.23 | \$115.72 | \$38.49 | 49.8\% |
| 3650 | \$78.12 | \$117.10 | \$38.98 | 49.9\% |
| 3700 | \$79.02 | \$118.48 | \$39.47 | 50.0\% |
| 3750 | \$79.91 | \$119.87 | \$39.96 | 50.0\% |
| 3800 | \$80.80 | \$121.25 | \$40.45 | 50.1\% |
| 3850 | \$81.69 | \$122.63 | \$40.94 | 50.1\% |
| 3900 | \$82.58 | \$124.01 | \$41.43 | 50.2\% |
| 3950 | \$83.47 | \$125.39 | \$41.93 | 50.2\% |
| 4000 | \$84.36 | \$126.77 | \$42.42 | 50.3\% |
| 4050 | \$85.25 | \$128.16 | \$42.91 | 50.3\% |
| 4100 | \$86.14 | \$129.54 | \$43.40 | 50.4\% |
| 4150 | \$87.03 | \$130.92 | \$43.89 | 50.4\% |
| 4200 | \$87.92 | \$132.30 | \$44.38 | 50.5\% |
| 4250 | \$88.81 | \$133.68 | \$44.87 | 50.5\% |
| 4300 | \$89.70 | \$135.06 | \$45.36 | 50.6\% |
| 4350 | \$90.59 | \$136.44 | \$45.85 | 50.6\% |
| 4400 | \$91.48 | \$137.83 | \$46.35 | 50.7\% |
| 4450 | \$92.37 | \$139.21 | \$46.84 | 50.7\% |
| 4500 | \$93.26 | \$140.59 | \$47.33 | 50.7\% |
| 4550 | \$94.15 | \$141.97 | \$47.82 | 50.8\% |

Duquesne Light Company
Residential Bill Comparison Monthly Distribution Charges Rate Schedule RA (Winter)

A KWH

Monthly Bill Current KWH Distribution 4600

C

Monthly Bill
Proposed
Distribution
$\$ 143.35$
\$144.73
\$146.12
\$147.50
\$148.88
\$150.26
\$151.64
\$153.02
\$154.41
\$ Difference
\$48.31
$\$ 48.80$ 50.9\%
$\$ 49.29 \quad 50.9 \%$
$\$ 49.78 \quad 50.9 \%$
\$50.27 51.0\%
\$50.77 51.0\%
$\$ 51.26$ 51.1\%
$\$ 51.75 \quad 51.1 \%$
\$52.24 51.1\%
Q.2. The effects of the proposed rates on monthly billing conditions should be provided as follows:

## General Bill Comparisons

For each rate that requires both a billing demand $(\mathrm{kW})$ and kWh 's as the billing determinants, provide a tabulation or graphical comparison showing the percentage effect of the proposed base rate on monthly bills using several representative demand ( $\mathrm{kW} \mathrm{)}$ levels, the monthly kWh for each demand selected to be in load factor increments of $10 \%$ starting at $0 \%$ and ending at $100 \%(730 \mathrm{H})$ or by hours' use increments that covers approximately $95 \%$ of the bills.
A.2. DFR-IV - Attachment D-2 provides the requested information in tabular format for each of the general service classes that include demand and energy billing determinants. Each general service class table shows the monthly distribution charges at current and proposed rates. Current rates include the forecasted January 15, 2022 surcharges that the Company is proposing to roll into base rates. For the heating rates, separate tables are provided showing the monthly billing at both winter and summer rates. The demand used for the calculations for each table is representative of customers on each of these rates schedules.

|  | Duquesne Light Company General Bill Comparison Monthly Distribution Charges Rate Schedule GS |  |  | Attachment DFR IV-D-2 <br> Page 1 of 30 <br> Sponsor: D. B. Ogden |
| :---: | :---: | :---: | :---: | :---: |
| A | B | C | $D=B+C$ | $E=D / B$ |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 0 | \$13.13 | \$16.25 | \$3.13 | 23.8\% |
| 50 | \$16.98 | \$20.46 | \$3.48 | 20.5\% |
| 100 | \$20.83 | \$24.67 | \$3.84 | 18.5\% |
| 150 | \$24.68 | \$28.89 | \$4.20 | 17.0\% |
| 200 | \$28.54 | \$33.10 | \$4.56 | 16.0\% |
| 250 | \$32.39 | \$37.31 | \$4.92 | 15.2\% |
| 300 | \$36.24 | \$41.52 | \$5.28 | 14.6\% |
| 350 | \$40.09 | \$45.73 | \$5.64 | 14.1\% |
| 400 | \$43.95 | \$49.95 | \$6.00 | 13.7\% |
| 450 | \$47.80 | \$54.16 | \$6.36 | 13.3\% |
| 500 | \$51.65 | \$58.37 | \$6.72 | 13.0\% |
| 550 | \$55.50 | \$62.58 | \$7.08 | 12.8\% |
| 600 | \$59.36 | \$66.79 | \$7.44 | 12.5\% |
| 650 | \$63.21 | \$71.01 | \$7.80 | 12.3\% |
| 700 | \$67.06 | \$75.22 | \$8.16 | 12.2\% |
| 750 | \$70.91 | \$79.43 | \$8.52 | 12.0\% |
| 800 | \$74.77 | \$83.64 | \$8.88 | 11.9\% |
| 850 | \$78.62 | \$87.85 | \$9.24 | 11.7\% |
| 900 | \$82.47 | \$92.07 | \$9.60 | 11.6\% |
| 950 | \$86.32 | \$96.28 | \$9.95 | 11.5\% |
| 1000 | \$90.18 | \$100.49 | \$10.31 | 11.4\% |
| 1050 | \$94.03 | \$104.70 | \$10.67 | 11.4\% |
| 1100 | \$97.88 | \$108.92 | \$11.03 | 11.3\% |
| 1150 | \$101.73 | \$113.13 | \$11.39 | 11.2\% |
| 1200 | \$105.59 | \$117.34 | \$11.75 | 11.1\% |
| 1250 | \$109.44 | \$121.55 | \$12.11 | 11.1\% |
| 1300 | \$113.29 | \$125.76 | \$12.47 | 11.0\% |
| 1350 | \$117.15 | \$129.98 | \$12.83 | 11.0\% |
| 1400 | \$121.00 | \$134.19 | \$13.19 | 10.9\% |
| 1450 | \$124.85 | \$138.40 | \$13.55 | 10.9\% |
| 1500 | \$128.70 | \$142.61 | \$13.91 | 10.8\% |
| 1550 | \$132.56 | \$146.82 | \$14.27 | 10.8\% |
| 1600 | \$136.41 | \$151.04 | \$14.63 | 10.7\% |
| 1650 | \$140.26 | \$155.25 | \$14.99 | 10.7\% |
| 1700 | \$144.11 | \$159.46 | \$15.35 | 10.6\% |
| 1750 | \$147.97 | \$163.67 | \$15.71 | 10.6\% |
| 1800 | \$151.82 | \$167.88 | \$16.07 | 10.6\% |
| 1850 | \$155.67 | \$172.10 | \$16.42 | 10.6\% |
| 1900 | \$159.52 | \$176.31 | \$16.78 | 10.5\% |
| 1950 | \$163.38 | \$180.52 | \$17.14 | 10.5\% |
| 2000 | \$167.23 | \$184.73 | \$17.50 | 10.5\% |
| 2050 | \$171.08 | \$188.94 | \$17.86 | 10.4\% |
| 2100 | \$174.93 | \$193.16 | \$18.22 | 10.4\% |
| 2150 | \$178.79 | \$197.37 | \$18.58 | 10.4\% |
| 2200 | \$182.64 | \$201.58 | \$18.94 | 10.4\% |
| 2250 | \$186.49 | \$205.79 | \$19.30 | 10.3\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges <br> Rate Schedule GS 

Page 2 of 30
$A \quad B \quad C \quad D=B+C \quad E=D / B$

| Monthly Bill <br> Current | Monthly Bill <br> Proposed |
| :---: | :---: |
| KWH |  |
| Distribution |  |
| Distribution |  |


|  |  |  |  | $10.3 \%$ |
| :--- | :--- | :--- | :--- | :--- |
| 2300 | $\$ 190.34$ | $\$ 210.00$ | $\$ 19.66$ | $10.3 \%$ |
| 2400 | $\$ 194.20$ | $\$ 214.22$ | $\$ 20.02$ | $10.3 \%$ |
| 2450 | $\$ 28.05$ | $\$ 218.43$ | $\$ 20.38$ | $10.3 \%$ |
| 2500 | $\$ 2225.75$ | $\$ 226.65$ | $\$ 20.74$ | $\$ 21.10$ |
| 2550 | $\$ 209.61$ | $\$ 231.06$ | $\$ 21.46$ | $10.3 \%$ |
| 2600 | $\$ 213.46$ | $\$ 235.28$ | $\$ 21.82$ | $10.2 \%$ |
| 2650 | $\$ 217.31$ | $\$ 239.49$ | $\$ 22.18$ | $10.2 \%$ |
| 2700 | $\$ 21.17$ | $\$ 243.70$ | $\$ 22.54$ | $10.2 \%$ |
| 2750 | $\$ 225.02$ | $\$ 247.91$ | $\$ 22.89$ | $10.2 \%$ |
| 2800 | $\$ 228.87$ | $\$ 252.12$ | $\$ 23.25$ | $10.2 \%$ |
| 2850 | $\$ 232.72$ | $\$ 256.34$ | $\$ 23.61$ | $10.1 \%$ |
| 2900 | $\$ 236.58$ | $\$ 260.55$ | $\$ 23.97$ | $10.1 \%$ |
| 2950 | $\$ 240.43$ | $\$ 264.76$ | $\$ 24.33$ | $10.1 \%$ |
| 3000 | $\$ 244.28$ | $\$ 268.97$ | $\$ 24.69$ | $10.1 \%$ |
| 3050 | $\$ 248.13$ | $\$ 273.19$ | $\$ 25.05$ | $10.1 \%$ |
| 3100 | $\$ 251.99$ | $\$ 277.40$ | $\$ 25.41$ | $10.1 \%$ |
| 3150 | $\$ 255.84$ | $\$ 281.61$ | $\$ 25.77$ | $10.1 \%$ |
| 3200 | $\$ 259.69$ | $\$ 285.82$ | $\$ 26.13$ | $10.1 \%$ |
| 3250 | $\$ 263.54$ | $\$ 290.03$ | $\$ 26.49$ | $10.1 \%$ |
| 3300 | $\$ 267.40$ | $\$ 294.25$ | $\$ 26.85$ | $10.0 \%$ |
| 3350 | $\$ 271.25$ | $\$ 298.46$ | $\$ 27.21$ | $10.0 \%$ |
| 3400 | $\$ 275.10$ | $\$ 302.67$ | $\$ 27.57$ | $10.0 \%$ |
| 3450 | $\$ 278.95$ | $\$ 306.88$ | $\$ 27.93$ | $10.0 \%$ |
| 3500 | $\$ 282.81$ | $\$ 311.09$ | $\$ 28.29$ | $10.0 \%$ |
| 3550 | $\$ 286.66$ | $\$ 315.31$ | $\$ 28.65$ | $10.0 \%$ |
| 3600 | $\$ 290.51$ | $\$ 319.52$ | $\$ 29.01$ | $10.0 \%$ |
| 3650 | $\$ 294.36$ | $\$ 323.73$ | $\$ 29.36$ | $10.0 \%$ |
| 3700 | $\$ 298.22$ | $\$ 327.94$ | $\$ 29.72$ | $10.0 \%$ |
| 3750 | $\$ 302.07$ | $\$ 332.15$ | $\$ 30.08$ | $10.0 \%$ |
| 3800 | $\$ 305.92$ | $\$ 336.37$ | $\$ 30.44$ | $10.0 \%$ |
| 3850 | $\$ 309.78$ | $\$ 340.58$ | $\$ 30.80$ | $9.9 \%$ |
| 3900 | $\$ 313.63$ | $\$ 344.79$ | $\$ 31.16$ | $9.9 \%$ |
| 3950 | $\$ 317.48$ | $\$ 349.00$ | $\$ 31.52$ | $9.9 \%$ |
| 4000 | $\$ 321.33$ | $\$ 353.21$ | $\$ 31.88$ | $9.9 \%$ |
| 4050 | $\$ 325.19$ | $\$ 357.43$ | $\$ 32.24$ | $9.9 \%$ |
| 4100 | $\$ 329.04$ | $\$ 361.64$ | $\$ 32.60$ | $9.9 \%$ |
| 4150 | $\$ 332.89$ | $\$ 365.85$ | $\$ 32.96$ | $9.9 \%$ |
| 4200 | $\$ 336.74$ | $\$ 370.06$ | $\$ 33.32$ | $9.9 \%$ |
| 4250 | $\$ 340.60$ | $\$ 374.27$ | $\$ 33.68$ | $9.9 \%$ |
| 4300 | $\$ 344.45$ | $\$ 378.49$ | $\$ 33.04$ | $9.9 \%$ |
| 4350 | $\$ 348.30$ | $\$ 382.70$ | $\$ 34.40$ | $9.9 \%$ |
| 4400 | $\$ 352.15$ | $\$ 386.91$ | $\$ 34.76$ | $9.9 \%$ |
| 4450 | $\$ 356.01$ | $\$ 391.12$ | $\$ 35.12$ | $9.9 \%$ |
| 4500 | $\$ 359.86$ | $\$ 395.33$ | $\$ 35.48$ | $9.9 \%$ |
| 4550 | $\$ 363.71$ | $\$ 399.55$ | $\$ 35.84$ | $9.9 \%$ |
|  |  |  |  |  |


| A | Duquesne Light Company General Bill Comparison Monthly Distribution Charges Rate Schedule GS |  |  | E=D/B |
| :---: | :---: | :---: | :---: | :---: |
|  | B | C | $D=B+C$ |  |
| KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 4600 | \$367.56 | \$403.76 | \$36.19 | 9.8\% |
| 4650 | \$371.42 | \$407.97 | \$36.55 | 9.8\% |
| 4700 | \$375.27 | \$412.18 | \$36.91 | 9.8\% |
| 4750 | \$379.12 | \$416.39 | \$37.27 | 9.8\% |
| 4800 | \$382.97 | \$420.61 | \$37.63 | 9.8\% |
| 4850 | \$386.83 | \$424.82 | \$37.99 | 9.8\% |
| 4900 | \$390.68 | \$429.03 | \$38.35 | 9.8\% |
| 4950 | \$394.53 | \$433.24 | \$38.71 | 9.8\% |
| 5000 | \$398.38 | \$437.46 | \$39.07 | 9.8\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GM<25

## Average Demand of $\mathbf{3} \mathbf{~ k W}$

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load |  | Monthly Bill Current | Monthly Bill Proposed |  |  |
| Use | Factor | KWH | Distribution | Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$57 | \$63 | \$6 | 10.1\% |
| 10 | 1.4\% | 30 | \$58 | \$64 | \$6 | 10.2\% |
| 20 | 2.7\% | 60 | \$58 | \$64 | \$6 | 10.3\% |
| 30 | 4.1\% | 90 | \$59 | \$65 | \$6 | 10.4\% |
| 40 | 5.5\% | 120 | \$59 | \$65 | \$6 | 10.5\% |
| 50 | 6.8\% | 150 | \$59 | \$66 | \$6 | 10.6\% |
| 60 | 8.2\% | 180 | \$60 | \$66 | \$6 | 10.7\% |
| 70 | 9.6\% | 210 | \$60 | \$67 | \$7 | 10.8\% |
| 80 | 11.0\% | 240 | \$61 | \$67 | \$7 | 10.9\% |
| 90 | 12.3\% | 270 | \$61 | \$68 | \$7 | 11.0\% |
| 100 | 13.7\% | 300 | \$62 | \$69 | \$7 | 11.1\% |
| 200 | 27.4\% | 600 | \$66 | \$74 | \$8 | 12.1\% |
| 300 | 41.1\% | 900 | \$70 | \$80 | \$9 | 12.9\% |
| 400 | 54.8\% | 1,200 | \$75 | \$85 | \$10 | 13.6\% |
| 500 | 68.5\% | 1,500 | \$79 | \$91 | \$11 | 14.2\% |
| 600 | 82.2\% | 1,800 | \$84 | \$96 | \$12 | 14.8\% |
| 700 | 95.9\% | 2,100 | \$88 | \$102 | \$13 | 15.3\% |
| 730 | 100.0\% | 2,190 | \$89 | \$103 | \$14 | 15.4\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GM<25

## Average Demand of 15 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed | \$ Difference | ifferen |
|  |  |  |  | Distribution |  | Differen |
| 0 | 0.0\% | 0 | \$126 | \$142 | \$16 | 12.7\% |
| 10 | 1.4\% | 150 | \$128 | \$145 | \$17 | 12.9\% |
| 20 | 2.7\% | 300 | \$130 | \$147 | \$17 | 13.1\% |
| 30 | 4.1\% | 450 | \$133 | \$150 | \$18 | 13.3\% |
| 40 | 5.5\% | 600 | \$135 | \$153 | \$18 | 13.5\% |
| 50 | 6.8\% | 750 | \$137 | \$156 | \$19 | 13.7\% |
| 60 | 8.2\% | 900 | \$139 | \$158 | \$19 | 13.9\% |
| 70 | 9.6\% | 1,050 | \$141 | \$161 | \$20 | 14.0\% |
| 80 | 11.0\% | 1,200 | \$144 | \$164 | \$20 | 14.2\% |
| 90 | 12.3\% | 1,350 | \$146 | \$167 | \$21 | 14.4\% |
| 100 | 13.7\% | 1,500 | \$148 | \$169 | \$21 | 14.5\% |
| 200 | 27.4\% | 3,000 | \$170 | \$197 | \$27 | 15.9\% |
| 300 | 41.1\% | 4,500 | \$192 | \$225 | \$32 | 16.9\% |
| 400 | 54.8\% | 6,000 | \$214 | \$252 | \$38 | 17.7\% |
| 500 | 68.5\% | 7,500 | \$236 | \$280 | \$43 | 18.4\% |
| 600 | 82.2\% | 9,000 | \$258 | \$307 | \$49 | 18.9\% |
| 700 | 95.9\% | 10,500 | \$281 | \$335 | \$54 | 19.4\% |
| 730 | 100.0\% | 10,950 | \$287 | \$343 | \$56 | 19.5\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GM>25

## Average Demand of $\mathbf{2 5} \mathbf{~ k W}$

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Differen |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$206 | \$234 | \$28 | 13.3\% |
| 10 | 1.4\% | 250 | \$209 | \$237 | \$28 | 13.5\% |
| 20 | 2.7\% | 500 | \$211 | \$240 | \$29 | 13.6\% |
| 30 | 4.1\% | 750 | \$214 | \$243 | \$29 | 13.7\% |
| 40 | 5.5\% | 1,000 | \$217 | \$246 | \$30 | 13.8\% |
| 50 | 6.8\% | 1,250 | \$219 | \$250 | \$31 | 13.9\% |
| 60 | 8.2\% | 1,500 | \$222 | \$253 | \$31 | 14.1\% |
| 70 | 9.6\% | 1,750 | \$224 | \$256 | \$32 | 14.2\% |
| 80 | 11.0\% | 2,000 | \$227 | \$259 | \$32 | 14.3\% |
| 90 | 12.3\% | 2,250 | \$229 | \$262 | \$33 | 14.4\% |
| 100 | 13.7\% | 2,500 | \$232 | \$265 | \$34 | 14.5\% |
| 200 | 27.4\% | 5,000 | \$257 | \$297 | \$40 | 15.4\% |
| 300 | 41.1\% | 7,500 | \$283 | \$329 | \$46 | 16.1\% |
| 400 | 54.8\% | 10,000 | \$309 | \$360 | \$52 | 16.8\% |
| 500 | 68.5\% | 12,500 | \$334 | \$392 | \$58 | 17.3\% |
| 600 | 82.2\% | 15,000 | \$360 | \$424 | \$64 | 17.7\% |
| 700 | 95.9\% | 17,500 | \$386 | \$455 | \$70 | 18.1\% |
| 730 | 100.0\% | 18,250 | \$393 | \$465 | \$72 | 18.2\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GM>25

## Average Demand of 100 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load |  | Monthly Bill Current | Monthly Bill <br> Proposed |  |  |
| Use | Factor | KWH | Distribution | Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$721 | \$826 | \$104 | 14.5\% |
| 10 | 1.4\% | 1,000 | \$732 | \$838 | \$107 | 14.6\% |
| 20 | 2.7\% | 2,000 | \$742 | \$851 | \$109 | 14.7\% |
| 30 | 4.1\% | 3,000 | \$752 | \$864 | \$112 | 14.8\% |
| 40 | 5.5\% | 4,000 | \$762 | \$876 | \$114 | 14.9\% |
| 50 | 6.8\% | 5,000 | \$773 | \$889 | \$116 | 15.1\% |
| 60 | 8.2\% | 6,000 | \$783 | \$902 | \$119 | 15.2\% |
| 70 | 9.6\% | 7,000 | \$793 | \$914 | \$121 | 15.3\% |
| 80 | 11.0\% | 8,000 | \$803 | \$927 | \$124 | 15.4\% |
| 90 | 12.3\% | 9,000 | \$813 | \$939 | \$126 | 15.5\% |
| 100 | 13.7\% | 10,000 | \$824 | \$952 | \$128 | 15.6\% |
| 200 | 27.4\% | 20,000 | \$926 | \$1,079 | \$153 | 16.5\% |
| 300 | 41.1\% | 30,000 | \$1,029 | \$1,205 | \$177 | 17.2\% |
| 400 | 54.8\% | 40,000 | \$1,131 | \$1,332 | \$201 | 17.8\% |
| 500 | 68.5\% | 50,000 | \$1,233 | \$1,459 | \$225 | 18.3\% |
| 600 | 82.2\% | 60,000 | \$1,336 | \$1,585 | \$249 | 18.7\% |
| 700 | 95.9\% | 70,000 | \$1,438 | \$1,712 | \$274 | 19.0\% |
| 730 | 100.0\% | 73,000 | \$1,469 | \$1,750 | \$281 | 19.1\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GMH<25 (Summer)

## Average Demand of $\mathbf{2 0}$ kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load |  | Monthly Bill Current | Monthly Bill <br> Proposed |  |  |
|  | Factor | KWH | Distribution | Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$160 | \$181 | \$21 | 13.2\% |
| 10 | 1.4\% | 200 | \$163 | \$185 | \$22 | 13.4\% |
| 20 | 2.7\% | 400 | \$166 | \$189 | \$23 | 13.6\% |
| 30 | 4.1\% | 600 | \$169 | \$192 | \$23 | 13.8\% |
| 40 | 5.5\% | 800 | \$172 | \$196 | \$24 | 14.0\% |
| 50 | 6.8\% | 1,000 | \$175 | \$200 | \$25 | 14.2\% |
| 60 | 8.2\% | 1,200 | \$178 | \$203 | \$26 | 14.3\% |
| 70 | 9.6\% | 1,400 | \$181 | \$207 | \$26 | 14.5\% |
| 80 | 11.0\% | 1,600 | \$184 | \$211 | \$27 | 14.7\% |
| 90 | 12.3\% | 1,800 | \$187 | \$214 | \$28 | 14.8\% |
| 100 | 13.7\% | 2,000 | \$190 | \$218 | \$28 | 15.0\% |
| 200 | 27.4\% | 4,000 | \$219 | \$255 | \$36 | 16.3\% |
| 300 | 41.1\% | 6,000 | \$249 | \$292 | \$43 | 17.3\% |
| 400 | 54.8\% | 8,000 | \$278 | \$328 | \$50 | 18.1\% |
| 500 | 68.5\% | 10,000 | \$308 | \$365 | \$58 | 18.8\% |
| 600 | 82.2\% | 12,000 | \$337 | \$402 | \$65 | 19.3\% |
| 700 | 95.9\% | 14,000 | \$366 | \$439 | \$72 | 19.7\% |
| 730 | 100.0\% | 14,600 | \$375 | \$450 | \$75 | 19.9\% |



> Duquesne Light Company
> General Bill Comparison
> Monthly Distribution Charges Rate Schedule GMH>25 (Summer)

## Average Demand of 50 kW

| A | B | C | D | E | $F=E-D$ | G=F/D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Differe |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$366 | \$418 | \$52 | 14.1\% |
| 10 | 1.4\% | 500 | \$374 | \$427 | \$54 | 14.4\% |
| 20 | 2.7\% | 1,000 | \$381 | \$436 | \$55 | 14.6\% |
| 30 | 4.1\% | 1,500 | \$388 | \$446 | \$57 | 14.8\% |
| 40 | 5.5\% | 2,000 | \$396 | \$455 | \$59 | 14.9\% |
| 50 | 6.8\% | 2,500 | \$403 | \$464 | \$61 | 15.1\% |
| 60 | 8.2\% | 3,000 | \$410 | \$473 | \$63 | 15.3\% |
| 70 | 9.6\% | 3,500 | \$418 | \$482 | \$65 | 15.5\% |
| 80 | 11.0\% | 4,000 | \$425 | \$492 | \$66 | 15.6\% |
| 90 | 12.3\% | 4,500 | \$433 | \$501 | \$68 | 15.8\% |
| 100 | 13.7\% | 5,000 | \$440 | \$510 | \$70 | 15.9\% |
| 200 | 27.4\% | 10,000 | \$514 | \$602 | \$88 | 17.2\% |
| 300 | 41.1\% | 15,000 | \$587 | \$694 | \$107 | 18.2\% |
| 400 | 54.8\% | 20,000 | \$661 | \$786 | \$125 | 18.9\% |
| 500 | 68.5\% | 25,000 | \$735 | \$878 | \$143 | 19.5\% |
| 600 | 82.2\% | 30,000 | \$808 | \$970 | \$162 | 20.0\% |
| 700 | 95.9\% | 35,000 | \$882 | \$1,062 | \$180 | 20.4\% |
| 730 | 100.0\% | 36,500 | \$904 | \$1,089 | \$185 | 20.5\% |


|  |  |  | quesne Ligh eneral Bill Co thly Distribut Rate Schedule (Winte | Company mparison ion Charges GMH>25 ) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | erage Deman | d of 50 kW |  |  |
| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference |  |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$57 | \$63 | \$6 | 10.1\% |
| 10 | 1.4\% | 500 | \$73 | \$82 | \$9 | 12.9\% |
| 20 | 2.7\% | 1,000 | \$88 | \$101 | \$13 | 14.7\% |
| 30 | 4.1\% | 1,500 | \$104 | \$121 | \$17 | 16.0\% |
| 40 | 5.5\% | 2,000 | \$120 | \$140 | \$20 | 16.9\% |
| 50 | 6.8\% | 2,500 | \$135 | \$159 | \$24 | 17.6\% |
| 60 | 8.2\% | 3,000 | \$151 | \$178 | \$27 | 18.2\% |
| 70 | 9.6\% | 3,500 | \$166 | \$197 | \$31 | 18.7\% |
| 80 | 11.0\% | 4,000 | \$182 | \$217 | \$35 | 19.1\% |
| 90 | 12.3\% | 4,500 | \$197 | \$236 | \$38 | 19.4\% |
| 100 | 13.7\% | 5,000 | \$213 | \$255 | \$42 | 19.7\% |
| 200 | 27.4\% | 10,000 | \$369 | \$447 | \$78 | 21.1\% |
| 300 | 41.1\% | 15,000 | \$525 | \$639 | \$114 | 21.7\% |
| 400 | 54.8\% | 20,000 | \$680 | \$831 | \$150 | 22.1\% |
| 500 | 68.5\% | 25,000 | \$836 | \$1,023 | \$186 | 22.3\% |
| 600 | 82.2\% | 30,000 | \$992 | \$1,214 | \$222 | 22.4\% |
| 700 | 95.9\% | 35,000 | \$1,148 | \$1,406 | \$258 | 22.5\% |
| 730 | 100.0\% | 36,500 | \$1,195 | \$1,464 | \$269 | 22.5\% |

> Duquesne Light Company
> General Bill Comparison Monthly Distribution Charges Rate Schedule GMH>25 (Summer)

## Average Demand of 150 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$1,053 | \$1,207 | \$154 | 14.6\% |
| 10 | 1.4\% | 1,500 | \$1,075 | \$1,235 | \$160 | 14.8\% |
| 20 | 2.7\% | 3,000 | \$1,097 | \$1,262 | \$165 | 15.0\% |
| 30 | 4.1\% | 4,500 | \$1,119 | \$1,290 | \$171 | 15.2\% |
| 40 | 5.5\% | 6,000 | \$1,141 | \$1,317 | \$176 | 15.4\% |
| 50 | 6.8\% | 7,500 | \$1,163 | \$1,345 | \$182 | 15.6\% |
| 60 | 8.2\% | 9,000 | \$1,186 | \$1,373 | \$187 | 15.8\% |
| 70 | 9.6\% | 10,500 | \$1,208 | \$1,400 | \$193 | 15.9\% |
| 80 | 11.0\% | 12,000 | \$1,230 | \$1,428 | \$198 | 16.1\% |
| 90 | 12.3\% | 13,500 | \$1,252 | \$1,455 | \$203 | 16.3\% |
| 100 | 13.7\% | 15,000 | \$1,274 | \$1,483 | \$209 | 16.4\% |
| 200 | 27.4\% | 30,000 | \$1,495 | \$1,759 | \$264 | 17.6\% |
| 300 | 41.1\% | 45,000 | \$1,716 | \$2,035 | \$319 | 18.6\% |
| 400 | 54.8\% | 60,000 | \$1,937 | \$2,310 | \$374 | 19.3\% |
| 500 | 68.5\% | 75,000 | \$2,158 | \$2,586 | \$428 | 19.9\% |
| 600 | 82.2\% | 90,000 | \$2,379 | \$2,862 | \$483 | 20.3\% |
| 700 | 95.9\% | 105,000 | \$2,600 | \$3,138 | \$538 | 20.7\% |
| 730 | 100.0\% | 109,500 | \$2,666 | \$3,221 | \$555 | 20.8\% |

## Duquesne Light Company <br> General Bill Comparison <br> Monthly Distribution Charges <br> Rate Schedule GMH>25 (Winter)

Average Demand of 150 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$57 | \$63 | \$6 | 10.1\% |
| 10 | 1.4\% | 1,500 | \$104 | \$121 | \$17 | 16.0\% |
| 20 | 2.7\% | 3,000 | \$151 | \$178 | \$27 | 18.2\% |
| 30 | 4.1\% | 4,500 | \$197 | \$236 | \$38 | 19.4\% |
| 40 | 5.5\% | 6,000 | \$244 | \$293 | \$49 | 20.1\% |
| 50 | 6.8\% | 7,500 | \$291 | \$351 | \$60 | 20.6\% |
| 60 | 8.2\% | 9,000 | \$338 | \$408 | \$71 | 21.0\% |
| 70 | 9.6\% | 10,500 | \$384 | \$466 | \$82 | 21.2\% |
| 80 | 11.0\% | 12,000 | \$431 | \$524 | \$92 | 21.4\% |
| 90 | 12.3\% | 13,500 | \$478 | \$581 | \$103 | 21.6\% |
| 100 | 13.7\% | 15,000 | \$525 | \$639 | \$114 | 21.7\% |
| 200 | 27.4\% | 30,000 | \$992 | \$1,214 | \$222 | 22.4\% |
| 300 | 41.1\% | 45,000 | \$1,460 | \$1,790 | \$331 | 22.7\% |
| 400 | 54.8\% | 60,000 | \$1,927 | \$2,366 | \$439 | 22.8\% |
| 500 | 68.5\% | 75,000 | \$2,394 | \$2,942 | \$547 | 22.9\% |
| 600 | 82.2\% | 90,000 | \$2,862 | \$3,517 | \$656 | 22.9\% |
| 700 | 95.9\% | 105,000 | \$3,329 | \$4,093 | \$764 | 22.9\% |
| 730 | 100.0\% | 109,500 | \$3,470 | \$4,266 | \$796 | 23.0\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GL

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | Differ |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 10 | 1.4\% | 4,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 20 | 2.7\% | 8,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 30 | 4.1\% | 12,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 40 | 5.5\% | 16,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 50 | 6.8\% | 20,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 60 | 8.2\% | 24,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 70 | 9.6\% | 28,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 80 | 11.0\% | 32,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 90 | 12.3\% | 36,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 100 | 13.7\% | 40,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 200 | 27.4\% | 80,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 300 | 41.1\% | 120,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 400 | 54.8\% | 160,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 500 | 68.5\% | 200,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 600 | 82.2\% | 240,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 700 | 95.9\% | 280,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |
| 730 | 100.0\% | 292,000 | \$4,250 | \$4,741 | \$491 | 11.6\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GL

## Average Demand of 700 kW

| A | B | C | D | E | $F=E-D$ | $\mathrm{G}=\mathrm{F} / \mathrm{D}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 10 | 1.4\% | 7,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 20 | 2.7\% | 14,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 30 | 4.1\% | 21,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 40 | 5.5\% | 28,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 50 | 6.8\% | 35,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 60 | 8.2\% | 42,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 70 | 9.6\% | 49,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 80 | 11.0\% | 56,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 90 | 12.3\% | 63,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 100 | 13.7\% | 70,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 200 | 27.4\% | 140,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 300 | 41.1\% | 210,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 400 | 54.8\% | 280,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 500 | 68.5\% | 350,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 600 | 82.2\% | 420,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 700 | 95.9\% | 490,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |
| 730 | 100.0\% | 511,000 | \$6,904 | \$7,939 | \$1,035 | 15.0\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GL

## Average Demand of 1300 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Differe |
|  |  |  |  |  |  | \% |
| 0 | 0.0\% | 0 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 10 | 1.4\% | 13,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 20 | 2.7\% | 26,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 30 | 4.1\% | 39,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 40 | 5.5\% | 52,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 50 | 6.8\% | 65,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 60 | 8.2\% | 78,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 70 | 9.6\% | 91,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 80 | 11.0\% | 104,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 90 | 12.3\% | 117,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 100 | 13.7\% | 130,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 200 | 27.4\% | 260,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 300 | 41.1\% | 390,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 400 | 54.8\% | 520,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 500 | 68.5\% | 650,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 600 | 82.2\% | 780,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 700 | 95.9\% | 910,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |
| 730 | 100.0\% | 949,000 | \$12,213 | \$14,335 | \$2,122 | 17.4\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GL

## Average Demand of 3400 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Differe |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 10 | 1.4\% | 34,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 20 | 2.7\% | 68,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 30 | 4.1\% | 102,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 40 | 5.5\% | 136,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 50 | 6.8\% | 170,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 60 | 8.2\% | 204,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 70 | 9.6\% | 238,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 80 | 11.0\% | 272,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 90 | 12.3\% | 306,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 100 | 13.7\% | 340,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 200 | 27.4\% | 680,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 300 | 41.1\% | 1,020,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 400 | 54.8\% | 1,360,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 500 | 68.5\% | 1,700,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 600 | 82.2\% | 2,040,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 700 | 95.9\% | 2,380,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |
| 730 | 100.0\% | 2,482,000 | \$30,795 | \$36,721 | \$5,926 | 19.2\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GLH (Summer) 

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 10 | 1.4\% | 4,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 20 | 2.7\% | 8,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 30 | 4.1\% | 12,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 40 | 5.5\% | 16,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 50 | 6.8\% | 20,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 60 | 8.2\% | 24,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 70 | 9.6\% | 28,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 80 | 11.0\% | 32,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 90 | 12.3\% | 36,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 100 | 13.7\% | 40,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 200 | 27.4\% | 80,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 300 | 41.1\% | 120,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 400 | 54.8\% | 160,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 500 | 68.5\% | 200,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 600 | 82.2\% | 240,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 700 | 95.9\% | 280,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |
| 730 | 100.0\% | 292,000 | \$4,247 | \$4,741 | \$494 | 11.6\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GLH (Winter)

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KW | Monthly Bill Current Distribution | Monthly Bill <br> Proposed | nce | iffer |
|  |  |  |  | Distribution | \$ Difference | Differen |
| 0 | 0.0\% | 0 | \$96 | \$78 | (\$18) | -19.0\% |
| 10 | 1.4\% | 4,000 | \$193 | \$198 | \$5 | 2.7\% |
| 20 | 2.7\% | 8,000 | \$290 | \$319 | \$29 | 9.9\% |
| 30 | 4.1\% | 12,000 | \$387 | \$439 | \$52 | 13.5\% |
| 40 | 5.5\% | 16,000 | \$484 | \$560 | \$76 | 15.6\% |
| 50 | 6.8\% | 20,000 | \$582 | \$681 | \$99 | 17.0\% |
| 60 | 8.2\% | 24,000 | \$679 | \$801 | \$122 | 18.0\% |
| 70 | 9.6\% | 28,000 | \$776 | \$922 | \$146 | 18.8\% |
| 80 | 11.0\% | 32,000 | \$873 | \$1,043 | \$169 | 19.4\% |
| 90 | 12.3\% | 36,000 | \$971 | \$1,163 | \$193 | 19.9\% |
| 100 | 13.7\% | 40,000 | \$1,068 | \$1,284 | \$216 | 20.3\% |
| 200 | 27.4\% | 80,000 | \$2,040 | \$2,490 | \$451 | 22.1\% |
| 300 | 41.1\% | 120,000 | \$3,012 | \$3,697 | \$685 | 22.7\% |
| 400 | 54.8\% | 160,000 | \$3,984 | \$4,903 | \$919 | 23.1\% |
| 500 | 68.5\% | 200,000 | \$4,956 | \$6,110 | \$1,154 | 23.3\% |
| 600 | 82.2\% | 240,000 | \$5,928 | \$7,316 | \$1,388 | 23.4\% |
| 700 | 95.9\% | 280,000 | \$6,900 | \$8,523 | \$1,623 | 23.5\% |
| 730 | 100.0\% | 292,000 | \$7,192 | \$8,885 | \$1,693 | 23.5\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GLH (Summer) 

## Average Demand of 700 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 10 | 1.4\% | 7,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 20 | 2.7\% | 14,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 30 | 4.1\% | 21,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 40 | 5.5\% | 28,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 50 | 6.8\% | 35,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 60 | 8.2\% | 42,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 70 | 9.6\% | 49,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 80 | 11.0\% | 56,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 90 | 12.3\% | 63,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 100 | 13.7\% | 70,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 200 | 27.4\% | 140,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 300 | 41.1\% | 210,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 400 | 54.8\% | 280,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 500 | 68.5\% | 350,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 600 | 82.2\% | 420,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 700 | 95.9\% | 490,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |
| 730 | 100.0\% | 511,000 | \$6,902 | \$7,939 | \$1,037 | 15.0\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GLH (Winter)

## Average Demand of 700 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load | KWH | Monthly Bill Current | Monthly Bill Proposed | \$ Difference |  |
|  |  |  |  | Distribution | s Difference | Differen |
| 0 | 0.0\% | 0 | \$101 | \$78 | (\$23) | -23.3\% |
| 10 | 1.4\% | 7,000 | \$271 | \$289 | \$18 | 6.5\% |
| 20 | 2.7\% | 14,000 | \$441 | \$500 | \$59 | 13.3\% |
| 30 | 4.1\% | 21,000 | \$611 | \$711 | \$100 | 16.3\% |
| 40 | 5.5\% | 28,000 | \$781 | \$922 | \$141 | 18.0\% |
| 50 | 6.8\% | 35,000 | \$952 | \$1,133 | \$182 | 19.1\% |
| 60 | 8.2\% | 42,000 | \$1,122 | \$1,344 | \$223 | 19.8\% |
| 70 | 9.6\% | 49,000 | \$1,292 | \$1,555 | \$264 | 20.4\% |
| 80 | 11.0\% | 56,000 | \$1,462 | \$1,767 | \$305 | 20.8\% |
| 90 | 12.3\% | 63,000 | \$1,632 | \$1,978 | \$346 | 21.2\% |
| 100 | 13.7\% | 70,000 | \$1,802 | \$2,189 | \$387 | 21.5\% |
| 200 | 27.4\% | 140,000 | \$3,503 | \$4,300 | \$797 | 22.7\% |
| 300 | 41.1\% | 210,000 | \$5,204 | \$6,412 | \$1,207 | 23.2\% |
| 400 | 54.8\% | 280,000 | \$6,906 | \$8,523 | \$1,617 | 23.4\% |
| 500 | 68.5\% | 350,000 | \$8,607 | \$10,634 | \$2,027 | 23.6\% |
| 600 | 82.2\% | 420,000 | \$10,308 | \$12,746 | \$2,438 | 23.6\% |
| 700 | 95.9\% | 490,000 | \$12,009 | \$14,857 | \$2,848 | 23.7\% |
| 730 | 100.0\% | 511,000 | \$12,519 | \$15,490 | \$2,971 | 23.7\% |

## Duquesne Light Company <br> General Bill Comparison <br> Monthly Distribution Charges <br> Rate Schedule GLH (Summer)

## Average Demand of $\mathbf{2 5 0 0}$ kW

| A | B | C | D | E | $F=E-D$ | G=F/D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load |  | Monthly Bill Current | Monthly Bill <br> Proposed |  |  |
| Use | Factor | KWH | Distribution | Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 10 | 1.4\% | 25,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 20 | 2.7\% | 50,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 30 | 4.1\% | 75,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 40 | 5.5\% | 100,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 50 | 6.8\% | 125,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 60 | 8.2\% | 150,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 70 | 9.6\% | 175,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 80 | 11.0\% | 200,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 90 | 12.3\% | 225,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 100 | 13.7\% | 250,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 200 | 27.4\% | 500,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 300 | 41.1\% | 750,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 400 | 54.8\% | 1,000,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 500 | 68.5\% | 1,250,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 600 | 82.2\% | 1,500,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 700 | 95.9\% | 1,750,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |
| 730 | 100.0\% | 1,825,000 | \$22,829 | \$27,127 | \$4,298 | 18.8\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule GLH (Winter)

## Average Demand of $\mathbf{2 5 0 0}$ kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Differe |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$133 | \$78 | (\$55) | -41.7\% |
| 10 | 1.4\% | 25,000 | \$741 | \$832 | \$91 | 12.3\% |
| 20 | 2.7\% | 50,000 | \$1,348 | \$1,586 | \$238 | 17.6\% |
| 30 | 4.1\% | 75,000 | \$1,956 | \$2,340 | \$384 | 19.6\% |
| 40 | 5.5\% | 100,000 | \$2,563 | \$3,094 | \$531 | 20.7\% |
| 50 | 6.8\% | 125,000 | \$3,171 | \$3,848 | \$677 | 21.4\% |
| 60 | 8.2\% | 150,000 | \$3,778 | \$4,602 | \$823 | 21.8\% |
| 70 | 9.6\% | 175,000 | \$4,386 | \$5,356 | \$970 | 22.1\% |
| 80 | 11.0\% | 200,000 | \$4,993 | \$6,110 | \$1,116 | 22.4\% |
| 90 | 12.3\% | 225,000 | \$5,601 | \$6,864 | \$1,263 | 22.5\% |
| 100 | 13.7\% | 250,000 | \$6,209 | \$7,618 | \$1,409 | 22.7\% |
| 200 | 27.4\% | 500,000 | \$12,284 | \$15,159 | \$2,874 | 23.4\% |
| 300 | 41.1\% | 750,000 | \$18,360 | \$22,699 | \$4,339 | 23.6\% |
| 400 | 54.8\% | 1,000,000 | \$24,435 | \$30,240 | \$5,804 | 23.8\% |
| 500 | 68.5\% | 1,250,000 | \$30,511 | \$37,780 | \$7,269 | 23.8\% |
| 600 | 82.2\% | 1,500,000 | \$36,586 | \$45,321 | \$8,734 | 23.9\% |
| 700 | 95.9\% | 1,750,000 | \$42,662 | \$52,861 | \$10,199 | 23.9\% |
| 730 | 100.0\% | 1,825,000 | \$44,485 | \$55,123 | \$10,639 | 23.9\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges <br> Rate Schedule L

## Average Demand of 7000 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Differen | \% Differen |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 10 | 1.4\% | 70,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 20 | 2.7\% | 140,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 30 | 4.1\% | 210,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 40 | 5.5\% | 280,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 50 | 6.8\% | 350,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 60 | 8.2\% | 420,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 70 | 9.6\% | 490,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 80 | 11.0\% | 560,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 90 | 12.3\% | 630,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 100 | 13.7\% | 700,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 200 | 27.4\% | 1,400,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 300 | 41.1\% | 2,100,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 400 | 54.8\% | 2,800,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 500 | 68.5\% | 3,500,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 600 | 82.2\% | 4,200,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 700 | 95.9\% | 4,900,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |
| 730 | 100.0\% | 5,110,000 | \$64,343 | \$75,060 | \$10,717 | 16.7\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges <br> Rate Schedule L

## Average Demand of 15000 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Difference | \% Difference |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 10 | 1.4\% | 150,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 20 | 2.7\% | 300,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 30 | 4.1\% | 450,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 40 | 5.5\% | 600,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 50 | 6.8\% | 750,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 60 | 8.2\% | 900,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 70 | 9.6\% | 1,050,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 80 | 11.0\% | 1,200,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 90 | 12.3\% | 1,350,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 100 | 13.7\% | 1,500,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 200 | 27.4\% | 3,000,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 300 | 41.1\% | 4,500,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 400 | 54.8\% | 6,000,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 500 | 68.5\% | 7,500,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 600 | 82.2\% | 9,000,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 700 | 95.9\% | 10,500,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |
| 730 | 100.0\% | 10,950,000 | \$174,694 | \$208,100 | \$33,406 | 19.1\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule HVPS 

## Average Demand of 5000 kW

| A | B | C | D | E | $F=E-D$ | G=F/D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill Proposed Distribution | \$ Differen | \% Differe |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 30 | 4.1\% | 150,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 40 | 5.5\% | 200,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 50 | 6.8\% | 250,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 60 | 8.2\% | 300,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 90 | 12.3\% | 450,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 100 | 13.7\% | 500,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 200 | 27.4\% | 1,000,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 300 | 41.1\% | 1,500,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 400 | 54.8\% | 2,000,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 500 | 68.5\% | 2,500,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 600 | 82.2\% | 3,000,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 700 | 95.9\% | 3,500,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |
| 730 | 100.0\% | 3,650,000 | \$2,282 | \$2,503 | \$221 | 9.7\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule HVPS

## Average Demand of 40000 kW

| A | B | C | D | E | $F=E-D$ | G=F/D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed Distribution | \$ Difference | \% Difference |
|  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 30 | 4.1\% | 1,200,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 40 | 5.5\% | 1,600,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 50 | 6.8\% | 2,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 60 | 8.2\% | 2,400,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 90 | 12.3\% | 3,600,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 100 | 13.7\% | 4,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 200 | 27.4\% | 8,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 300 | 41.1\% | 12,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 400 | 54.8\% | 16,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 500 | 68.5\% | 20,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 600 | 82.2\% | 24,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 700 | 95.9\% | 28,000,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |
| 730 | 100.0\% | 29,200,000 | \$2,954 | \$2,503 | (\$451) | -15.3\% |

## Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule HVPS

## Average Demand of 75000 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |
| 0 | 0.0\% | 0 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 30 | 4.1\% | 2,250,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 40 | 5.5\% | 3,000,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 50 | 6.8\% | 3,750,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 60 | 8.2\% | 4,500,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 90 | 12.3\% | 6,750,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 100 | 13.7\% | 7,500,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 200 | 27.4\% | 15,000,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 300 | 41.1\% | 22,500,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 400 | 54.8\% | 30,000,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 500 | 68.5\% | 37,500,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 600 | 82.2\% | 45,000,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 700 | 95.9\% | 52,500,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |
| 730 | 100.0\% | 54,750,000 | \$4,836 | \$3,910 | (\$926) | -19.1\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule HVPS 

## Average Demand of 150000 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load | KWH | Monthly Bill Current Distribution | Monthly Bill <br> Proposed <br> Distribution | \$ Difference | \% Difference |
|  |  |  |  |  | dilference |  |
| 0 | 0.0\% | 0 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 30 | 4.1\% | 4,500,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 40 | 5.5\% | 6,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 50 | 6.8\% | 7,500,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 60 | 8.2\% | 9,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 90 | 12.3\% | 13,500,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 100 | 13.7\% | 15,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 200 | 27.4\% | 30,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 300 | 41.1\% | 45,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 400 | 54.8\% | 60,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 500 | 68.5\% | 75,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 600 | 82.2\% | 90,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 700 | 95.9\% | 105,000,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |
| 730 | 100.0\% | 109,500,000 | \$7,683 | \$5,545 | $(\$ 2,137)$ | -27.8\% |

# Duquesne Light Company <br> General Bill Comparison Monthly Distribution Charges Rate Schedule AL 

## Average Demand of 10 kW

| A | B | C | D | E | $F=E-D$ | $G=F / D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours | Load |  | Monthly Bill Current | Monthly Bill Proposed |  |  |
|  | Factor | KWH | Distribution | Distribution | \$ Difference | \% Difference |
| 10 | 1.4\% | 100 | \$25.32 | \$26.54 | \$1.22 | 4.8\% |
| 20 | 2.7\% | 200 | \$25.54 | \$26.78 | \$1.24 | 4.9\% |
| 30 | 4.1\% | 300 | \$25.76 | \$27.02 | \$1.26 | 4.9\% |
| 40 | 5.5\% | 400 | \$25.98 | \$27.26 | \$1.28 | 4.9\% |
| 50 | 6.8\% | 500 | \$26.20 | \$27.50 | \$1.30 | 4.9\% |
| 60 | 8.2\% | 600 | \$26.42 | \$27.74 | \$1.31 | 5.0\% |
| 70 | 9.6\% | 700 | \$26.65 | \$27.98 | \$1.33 | 5.0\% |
| 80 | 11.0\% | 800 | \$26.87 | \$28.22 | \$1.35 | 5.0\% |
| 90 | 12.3\% | 900 | \$27.09 | \$28.46 | \$1.37 | 5.0\% |
| 100 | 13.7\% | 1,000 | \$27.31 | \$28.70 | \$1.39 | 5.1\% |
| 200 | 27.4\% | 2,000 | \$29.53 | \$31.09 | \$1.57 | 5.3\% |
| 300 | 41.1\% | 3,000 | \$31.74 | \$33.49 | \$1.75 | 5.5\% |
| 400 | 54.8\% | 4,000 | \$33.96 | \$35.88 | \$1.93 | 5.7\% |
| 500 | 68.5\% | 5,000 | \$36.17 | \$38.28 | \$2.11 | 5.8\% |
| 600 | 82.2\% | 6,000 | \$38.39 | \$40.68 | \$2.29 | 6.0\% |
| 700 | 95.9\% | 7,000 | \$40.60 | \$43.07 | \$2.47 | 6.1\% |
| 730 | 100.0\% | 7,300 | \$41.27 | \$43.79 | \$2.52 | 6.1\% |

Q.1. Provide a cost study which allocates the total cost of service to each proposed tariff rate schedule. Tariff rates schedules may be combined for this purpose provided that they are of a similar supply or end use nature. A statement describing which rates were combined and the reasons therefor should be submitted.

The rates of return for each tariff rate schedule as defined above should be determined at both the present and proposed rate levels. Base rate revenues should be used for this purpose unless there are good and sufficient reasons to include revenues derived from other sources. Should the latter be the case, an explanation of other revenue sources included and reasons therefor should accompany the cost allocation study.

The methods selected for use in allocating costs to rate classes should include cost analyses based on:
a. Peak responsibility.
b. Average and excess, on a non-coincident demand basis.
c. Company preferred method if different from the above-referenced methods, with rationale behind the selection.

This study should include a statement of the source and age of the load data used in the determination of demand responsibilities, a description of any special studies used to prepare the cost study, and the most recent overall system line loss study.

The cost data used in the allocation study may be based on the test year.
A.1. Please refer to DLC Exhibit 5, Statement No. 15, the direct testimony of Company witness Howard S. Gorman and DLC Exhibit 6 for the requested information.
Q.2. Provide comparisons in either graphical or tabular form showing cost, as defined in the cost of service study, and proposed base rate revenues and usage for all residential and demand/energy rate schedules. Demand shall be for representative loads for each demand/energy rate schedule.
A.2. DFR IV - Attachment E-2 provides a tabulation comparison for the general service rate classes that contain demand and energy charges. This attachment compares the monthly cost to the monthly distribution charges at current and proposed rates for the following size customers representative of customers on those rate classes. Current rates include the forecasted January 15, 2022 surcharges that the Company is proposing to roll into base rates.

| Rate | Representative <br> Demand (kW) | Monthly Cost <br> per Bill <br> (Exhibit 6-3) | Monthly Cost <br> per kW <br> (Exhibit 6-3) | Total <br> Cost |
| :--- | :--- | :--- | :--- | :--- |
| GM $<25$ | 3 | $\$ 61.80$ | $\$ 11.68$ | $\$ 97$ |
| GM $<25$ | 15 | $\$ 61.80$ | $\$ 11.68$ | $\$ 237$ |
| GM $>25$ | 25 | $\$ 213.28$ | $\$ 11.84$ | $\$ 509$ |
| GM $>25$ | 100 | $\$ 213.28$ | $\$ 11.84$ | $\$ 1,397$ |
| GMH $<25$ | 20 | $\$ 63.45$ | $\$ 11.70$ | $\$ 297$ |
| GMH $>25$ | 50 | $\$ 232.20$ | $\$ 11.89$ | $\$ 827$ |
| GMH $>25$ | 150 | $\$ 232.20$ | $\$ 11.89$ | $\$ 2,016$ |
| GL | 400 | $\$ 454.35$ | $\$ 12.07$ | $\$ 5,282$ |
| GL | 700 | $\$ 454.35$ | $\$ 12.07$ | $\$ 8,903$ |
| GL | 1,300 | $\$ 454.35$ | $\$ 12.07$ | $\$ 16,145$ |
| GL | 3,400 | $\$ 454.35$ | $\$ 12.07$ | $\$ 41,492$ |
| GLH | 400 | $\$ 629.96$ | $\$ 12.97$ | $\$ 5,818$ |
| GLH | 700 | $\$ 629.96$ | $\$ 12.97$ | $\$ 9,709$ |
| GLH | 2,500 | $\$ 629.96$ | $\$ 12.97$ | $\$ 33,055$ |
| L | 7,000 | $\$ 802.16$ | $\$ 11.55$ | $\$ 81,652$ |
| L | 15,000 | $\$ 802.16$ | $\$ 11.55$ | $\$ 174,052$ |
| HVPS | 5,000 | $\$ 165.49$ | - | $\$ 165$ |
| HVPS | 40,000 | $\$ 165.49$ | - | $\$ 165$ |
| HVPS | 75,000 | $\$ 165.49$ | - | $\$ 165$ |
| AL | 10 | $\$ 608.77$ | $\$ 11.61$ | $\$ 725$ |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GM<25

Average Demand of 3 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$97 | \$57 | (\$40) | \$63 | (\$34) |
| 10 | 1.4\% | 30 | \$97 | \$58 | (\$39) | \$64 | (\$33) |
| 20 | 2.7\% | 60 | \$97 | \$58 | (\$39) | \$64 | (\$33) |
| 30 | 4.1\% | 90 | \$97 | \$59 | (\$38) | \$65 | (\$32) |
| 40 | 5.5\% | 120 | \$97 | \$59 | (\$38) | \$65 | (\$32) |
| 50 | 6.8\% | 150 | \$97 | \$59 | (\$37) | \$66 | (\$31) |
| 60 | 8.2\% | 180 | \$97 | \$60 | (\$37) | \$66 | (\$31) |
| 70 | 9.6\% | 210 | \$97 | \$60 | (\$37) | \$67 | (\$30) |
| 80 | 11.0\% | 240 | \$97 | \$61 | (\$36) | \$67 | (\$29) |
| 90 | 12.3\% | 270 | \$97 | \$61 | (\$36) | \$68 | (\$29) |
| 100 | 13.7\% | 300 | \$97 | \$62 | (\$35) | \$69 | (\$28) |
| 200 | 27.4\% | 600 | \$97 | \$66 | (\$31) | \$74 | (\$23) |
| 300 | 41.1\% | 900 | \$97 | \$70 | (\$26) | \$80 | (\$17) |
| 400 | 54.8\% | 1,200 | \$97 | \$75 | (\$22) | \$85 | (\$12) |
| 500 | 68.5\% | 1,500 | \$97 | \$79 | (\$18) | \$91 | (\$6) |
| 600 | 82.2\% | 1,800 | \$97 | \$84 | (\$13) | \$96 | (\$1) |
| 700 | 95.9\% | 2,100 | \$97 | \$88 | (\$9) | \$102 | \$5 |
| 730 | 100.0\% | 2,190 | \$97 | \$89 | (\$7) | \$103 | \$6 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$54.50 |  | \$63.00 |  |
|  | First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Additional kW (\$/kW/mo.) |  |  | \$6.54 |  | \$7.89 |  |
|  | All kWh (cents/kWh) |  |  | \$0.013961 |  | \$0.018390 |  |

Duquesne Light Company
Monthly Distribution Revenue Versus Cost
Rate Schedule GM<25

## Average Demand of 15 kW



Duquesne Light Company
Monthly Distribution Revenue Versus Cost
Rate Schedule GM>25

Average Demand of $\mathbf{2 5} \mathbf{~ k W}$

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$509 | \$206 | (\$303) | \$234 | (\$275) |
| 10 | 1.4\% | 250 | \$509 | \$209 | (\$300) | \$237 | (\$272) |
| 20 | 2.7\% | 500 | \$509 | \$211 | (\$298) | \$240 | (\$269) |
| 30 | 4.1\% | 750 | \$509 | \$214 | (\$295) | \$243 | (\$266) |
| 40 | 5.5\% | 1,000 | \$509 | \$217 | (\$293) | \$246 | (\$263) |
| 50 | 6.8\% | 1,250 | \$509 | \$219 | (\$290) | \$250 | (\$260) |
| 60 | 8.2\% | 1,500 | \$509 | \$222 | (\$288) | \$253 | (\$256) |
| 70 | 9.6\% | 1,750 | \$509 | \$224 | (\$285) | \$256 | (\$253) |
| 80 | 11.0\% | 2,000 | \$509 | \$227 | (\$283) | \$259 | (\$250) |
| 90 | 12.3\% | 2,250 | \$509 | \$229 | (\$280) | \$262 | (\$247) |
| 100 | 13.7\% | 2,500 | \$509 | \$232 | (\$277) | \$265 | (\$244) |
| 200 | 27.4\% | 5,000 | \$509 | \$257 | (\$252) | \$297 | (\$212) |
| 300 | 41.1\% | 7,500 | \$509 | \$283 | (\$226) | \$329 | (\$181) |
| 400 | 54.8\% | 10,000 | \$509 | \$309 | (\$201) | \$360 | (\$149) |
| 500 | 68.5\% | 12,500 | \$509 | \$334 | (\$175) | \$392 | (\$117) |
| 600 | 82.2\% | 15,000 | \$509 | \$360 | (\$149) | \$424 | (\$86) |
| 700 | 95.9\% | 17,500 | \$509 | \$386 | (\$124) | \$455 | (\$54) |
| 730 | 100.0\% | 18,250 | \$509 | \$393 | (\$116) | \$465 | (\$44) |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$65.65 |  | \$76.00 |  |
|  | First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Additional kW (\$/kW/mo.)All kWh (cents/kWh) |  |  | \$6.54 |  | \$7.89 |  |
|  |  |  |  | \$0.009685 |  | \$0.012661 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost<br>Rate Schedule GM>25

## Average Demand of 100 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
|  |  |  |  |  |  |  |  |
| 0 | 0.0\% | 0 | \$1,397 | \$721 | (\$676) | \$826 | (\$572) |
| 10 | 1.4\% | 1,000 | \$1,397 | \$732 | (\$666) | \$838 | (\$559) |
| 20 | 2.7\% | 2,000 | \$1,397 | \$742 | (\$655) | \$851 | (\$546) |
| 30 | 4.1\% | 3,000 | \$1,397 | \$752 | (\$645) | \$864 | (\$534) |
| 40 | 5.5\% | 4,000 | \$1,397 | \$762 | (\$635) | \$876 | (\$521) |
| 50 | 6.8\% | 5,000 | \$1,397 | \$773 | (\$625) | \$889 | (\$508) |
| 60 | 8.2\% | 6,000 | \$1,397 | \$783 | (\$615) | \$902 | (\$496) |
| 70 | 9.6\% | 7,000 | \$1,397 | \$793 | (\$604) | \$914 | (\$483) |
| 80 | 11.0\% | 8,000 | \$1,397 | \$803 | (\$594) | \$927 | (\$470) |
| 90 | 12.3\% | 9,000 | \$1,397 | \$813 | (\$584) | \$939 | (\$458) |
| 100 | 13.7\% | 10,000 | \$1,397 | \$824 | (\$574) | \$952 | (\$445) |
| 200 | 27.4\% | 20,000 | \$1,397 | \$926 | (\$471) | \$1,079 | (\$319) |
| 300 | 41.1\% | 30,000 | \$1,397 | \$1,029 | (\$369) | \$1,205 | (\$192) |
| 400 | 54.8\% | 40,000 | \$1,397 | \$1,131 | (\$266) | \$1,332 | (\$65) |
| 500 | 68.5\% | 50,000 | \$1,397 | \$1,233 | (\$164) | \$1,459 | \$61 |
| 600 | 82.2\% | 60,000 | \$1,397 | \$1,336 | (\$61) | \$1,585 | \$188 |
| 700 | 95.9\% | 70,000 | \$1,397 | \$1,438 | \$41 | \$1,712 | \$315 |
| 730 | 100.0\% | 73,000 | \$1,397 | \$1,469 | \$72 | \$1,750 | \$353 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$65.65 |  | \$76.00 |  |
|  | First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Additional kW (\$/kW/mo.) |  |  | \$6.54 |  | \$7.89 |  |
|  | All kWh (cents/kWh) |  |  | \$0.009685 |  | \$0.012661 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GMH<25 (Summer)

## Average Demand of 20 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$297 | \$160 | (\$137) | \$181 | (\$116) |
| 10 | 1.4\% | 200 | \$297 | \$163 | (\$134) | \$185 | (\$112) |
| 20 | 2.7\% | 400 | \$297 | \$166 | (\$131) | \$189 | (\$109) |
| 30 | 4.1\% | 600 | \$297 | \$169 | (\$128) | \$192 | (\$105) |
| 40 | 5.5\% | 800 | \$297 | \$172 | (\$125) | \$196 | (\$101) |
| 50 | 6.8\% | 1,000 | \$297 | \$175 | (\$122) | \$200 | (\$98) |
| 60 | 8.2\% | 1,200 | \$297 | \$178 | (\$120) | \$203 | (\$94) |
| 70 | 9.6\% | 1,400 | \$297 | \$181 | (\$117) | \$207 | (\$90) |
| 80 | 11.0\% | 1,600 | \$297 | \$184 | (\$114) | \$211 | (\$87) |
| 90 | 12.3\% | 1,800 | \$297 | \$187 | (\$111) | \$214 | (\$83) |
| 100 | 13.7\% | 2,000 | \$297 | \$190 | (\$108) | \$218 | (\$79) |
| 200 | 27.4\% | 4,000 | \$297 | \$219 | (\$78) | \$255 | (\$43) |
| 300 | 41.1\% | 6,000 | \$297 | \$249 | (\$49) | \$292 | (\$6) |
| 400 | 54.8\% | 8,000 | \$297 | \$278 | (\$19) | \$328 | \$31 |
| 500 | 68.5\% | 10,000 | \$297 | \$308 | \$10 | \$365 | \$68 |
| 600 | 82.2\% | 12,000 | \$297 | \$337 | \$40 | \$402 | \$105 |
| 700 | 95.9\% | 14,000 | \$297 | \$366 | \$69 | \$439 | \$141 |
| 730 | 100.0\% | 14,600 | \$297 | \$375 | \$78 | \$450 | \$152 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$54.50 |  | \$63.00 |  |
|  | Demand First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Demand Additional kW \$/kW/mo.) |  |  | \$6.54 |  | \$7.89 |  |
|  | All kWh (cents/kWh) |  |  | \$0.013961 |  | \$0.018390 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GMH<25 (Winter)

## Average Demand of 20 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$297 | \$57 | (\$240) | \$63 | (\$234) |
| 10 | 1.4\% | 200 | \$297 | \$63 | (\$234) | \$71 | (\$227) |
| 20 | 2.7\% | 400 | \$297 | \$70 | (\$228) | \$78 | (\$219) |
| 30 | 4.1\% | 600 | \$297 | \$76 | (\$222) | \$86 | (\$211) |
| 40 | 5.5\% | 800 | \$297 | \$82 | (\$215) | \$94 | (\$204) |
| 50 | 6.8\% | 1,000 | \$297 | \$88 | (\$209) | \$101 | (\$196) |
| 60 | 8.2\% | 1,200 | \$297 | \$95 | (\$203) | \$109 | (\$188) |
| 70 | 9.6\% | 1,400 | \$297 | \$101 | (\$197) | \$117 | (\$181) |
| 80 | 11.0\% | 1,600 | \$297 | \$107 | (\$190) | \$124 | (\$173) |
| 90 | 12.3\% | 1,800 | \$297 | \$113 | (\$184) | \$132 | (\$165) |
| 100 | 13.7\% | 2,000 | \$297 | \$120 | (\$178) | \$140 | (\$158) |
| 200 | 27.4\% | 4,000 | \$297 | \$182 | (\$116) | \$217 | (\$81) |
| 300 | 41.1\% | 6,000 | \$297 | \$244 | (\$53) | \$293 | (\$4) |
| 400 | 54.8\% | 8,000 | \$297 | \$307 | \$9 | \$370 | \$73 |
| 500 | 68.5\% | 10,000 | \$297 | \$369 | \$71 | \$447 | \$149 |
| 600 | 82.2\% | 12,000 | \$297 | \$431 | \$134 | \$524 | \$226 |
| 700 | 95.9\% | 14,000 | \$297 | \$494 | \$196 | \$600 | \$303 |
| 730 | 100.0\% | 14,600 | \$297 | \$512 | \$215 | \$623 | \$326 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge All kWh (cents/kWh) |  |  | \$54.50 |  | \$63.00 |  |
|  |  |  |  | \$0.029609 |  | \$0.038382 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GMH>25 (Summer)

## Average Demand of 50 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$827 | \$366 | (\$460) | \$418 | (\$409) |
| 10 | 1.4\% | 500 | \$827 | \$374 | (\$453) | \$427 | (\$399) |
| 20 | 2.7\% | 1,000 | \$827 | \$381 | (\$446) | \$436 | (\$390) |
| 30 | 4.1\% | 1,500 | \$827 | \$388 | (\$438) | \$446 | (\$381) |
| 40 | 5.5\% | 2,000 | \$827 | \$396 | (\$431) | \$455 | (\$372) |
| 50 | 6.8\% | 2,500 | \$827 | \$403 | (\$424) | \$464 | (\$363) |
| 60 | 8.2\% | 3,000 | \$827 | \$410 | (\$416) | \$473 | (\$353) |
| 70 | 9.6\% | 3,500 | \$827 | \$418 | (\$409) | \$482 | (\$344) |
| 80 | 11.0\% | 4,000 | \$827 | \$425 | (\$402) | \$492 | (\$335) |
| 90 | 12.3\% | 4,500 | \$827 | \$433 | (\$394) | \$501 | (\$326) |
| 100 | 13.7\% | 5,000 | \$827 | \$440 | (\$387) | \$510 | (\$317) |
| 200 | 27.4\% | 10,000 | \$827 | \$514 | (\$313) | \$602 | (\$225) |
| 300 | 41.1\% | 15,000 | \$827 | \$587 | (\$239) | \$694 | (\$133) |
| 400 | 54.8\% | 20,000 | \$827 | \$661 | (\$166) | \$786 | (\$41) |
| 500 | 68.5\% | 25,000 | \$827 | \$735 | (\$92) | \$878 | \$51 |
| 600 | 82.2\% | 30,000 | \$827 | \$808 | (\$18) | \$970 | \$143 |
| 700 | 95.9\% | 35,000 | \$827 | \$882 | \$55 | \$1,062 | \$235 |
| 730 | 100.0\% | 36,500 | \$827 | \$904 | \$77 | \$1,089 | \$263 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$54.50 |  | \$63.00 |  |
|  | Demand First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Demand Additional kW \$/kW/mo.) |  |  | \$6.54 |  | \$7.89 |  |
|  | All kWh (cents/kWh) |  |  | \$0.013961 |  | \$0.018390 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GMH>25 (Winter)

## Average Demand of 50 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | $\begin{aligned} & \text { Current Bill } \\ & \text { Less Cost } \end{aligned}$ | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$827 | \$57 | (\$769) | \$63 | (\$764) |
| 10 | 1.4\% | 500 | \$827 | \$73 | (\$754) | \$82 | (\$745) |
| 20 | 2.7\% | 1,000 | \$827 | \$88 | (\$738) | \$101 | (\$725) |
| 30 | 4.1\% | 1,500 | \$827 | \$104 | (\$723) | \$121 | (\$706) |
| 40 | 5.5\% | 2,000 | \$827 | \$120 | (\$707) | \$140 | (\$687) |
| 50 | 6.8\% | 2,500 | \$827 | \$135 | (\$692) | \$159 | (\$668) |
| 60 | 8.2\% | 3,000 | \$827 | \$151 | (\$676) | \$178 | (\$649) |
| 70 | 9.6\% | 3,500 | \$827 | \$166 | (\$660) | \$197 | (\$629) |
| 80 | 11.0\% | 4,000 | \$827 | \$182 | (\$645) | \$217 | (\$610) |
| 90 | 12.3\% | 4,500 | \$827 | \$197 | (\$629) | \$236 | (\$591) |
| 100 | 13.7\% | 5,000 | \$827 | \$213 | (\$614) | \$255 | (\$572) |
| 200 | 27.4\% | 10,000 | \$827 | \$369 | (\$458) | \$447 | (\$380) |
| 300 | 41.1\% | 15,000 | \$827 | \$525 | (\$302) | \$639 | (\$188) |
| 400 | 54.8\% | 20,000 | \$827 | \$680 | (\$146) | \$831 | \$4 |
| 500 | 68.5\% | 25,000 | \$827 | \$836 | \$10 | \$1,023 | \$196 |
| 600 | 82.2\% | 30,000 | \$827 | \$992 | \$165 | \$1,214 | \$388 |
| 700 | 95.9\% | 35,000 | \$827 | \$1,148 | \$321 | \$1,406 | \$580 |
| 730 | 100.0\% | 36,500 | \$827 | \$1,195 | \$368 | \$1,464 | \$637 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge All kWh (cents/kWh) |  |  | \$54.50 |  | \$63.00 |  |
|  |  |  |  | \$0.029609 |  | \$0.038382 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost <br> Rate Schedule GMH>25 

(Summer)

## Average Demand of 150 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$2,016 | \$1,053 | (\$963) | \$1,207 | (\$809) |
| 10 | 1.4\% | 1,500 | \$2,016 | \$1,075 | (\$941) | \$1,235 | (\$781) |
| 20 | 2.7\% | 3,000 | \$2,016 | \$1,097 | (\$919) | \$1,262 | (\$753) |
| 30 | 4.1\% | 4,500 | \$2,016 | \$1,119 | (\$896) | \$1,290 | (\$726) |
| 40 | 5.5\% | 6,000 | \$2,016 | \$1,141 | (\$874) | \$1,317 | (\$698) |
| 50 | 6.8\% | 7,500 | \$2,016 | \$1,163 | (\$852) | \$1,345 | (\$671) |
| 60 | 8.2\% | 9,000 | \$2,016 | \$1,186 | (\$830) | \$1,373 | (\$643) |
| 70 | 9.6\% | 10,500 | \$2,016 | \$1,208 | (\$808) | \$1,400 | (\$616) |
| 80 | 11.0\% | 12,000 | \$2,016 | \$1,230 | (\$786) | \$1,428 | (\$588) |
| 90 | 12.3\% | 13,500 | \$2,016 | \$1,252 | (\$764) | \$1,455 | (\$560) |
| 100 | 13.7\% | 15,000 | \$2,016 | \$1,274 | (\$742) | \$1,483 | (\$533) |
| 200 | 27.4\% | 30,000 | \$2,016 | \$1,495 | (\$521) | \$1,759 | (\$257) |
| 300 | 41.1\% | 45,000 | \$2,016 | \$1,716 | (\$300) | \$2,035 | \$19 |
| 400 | 54.8\% | 60,000 | \$2,016 | \$1,937 | (\$79) | \$2,310 | \$295 |
| 500 | 68.5\% | 75,000 | \$2,016 | \$2,158 | \$142 | \$2,586 | \$571 |
| 600 | 82.2\% | 90,000 | \$2,016 | \$2,379 | \$363 | \$2,862 | \$846 |
| 700 | 95.9\% | 105,000 | \$2,016 | \$2,600 | \$584 | \$3,138 | \$1,122 |
| 730 | 100.0\% | 109,500 | \$2,016 | \$2,666 | \$650 | \$3,221 | \$1,205 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$54.50 |  | \$63.00 |  |
|  | Demand First 5 kW (\$/kW/mo.) |  |  | \$0.00 |  | \$0.00 |  |
|  | Demand Additional kW \$/kW/mo.) |  |  | \$6.54 |  | \$7.89 |  |
|  | All kWh (cents/kWh) |  |  | \$0.013961 |  | \$0.018390 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GMH>25 (Winter)

## Average Demand of 150 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$2,016 | \$57 | $(\$ 1,958)$ | \$63 | $(\$ 1,953)$ |
| 10 | 1.4\% | 1,500 | \$2,016 | \$104 | $(\$ 1,912)$ | \$121 | $(\$ 1,895)$ |
| 20 | 2.7\% | 3,000 | \$2,016 | \$151 | $(\$ 1,865)$ | \$178 | $(\$ 1,838)$ |
| 30 | 4.1\% | 4,500 | \$2,016 | \$197 | $(\$ 1,818)$ | \$236 | $(\$ 1,780)$ |
| 40 | 5.5\% | 6,000 | \$2,016 | \$244 | $(\$ 1,771)$ | \$293 | $(\$ 1,722)$ |
| 50 | 6.8\% | 7,500 | \$2,016 | \$291 | $(\$ 1,725)$ | \$351 | $(\$ 1,665)$ |
| 60 | 8.2\% | 9,000 | \$2,016 | \$338 | $(\$ 1,678)$ | \$408 | $(\$ 1,607)$ |
| 70 | 9.6\% | 10,500 | \$2,016 | \$384 | $(\$ 1,631)$ | \$466 | $(\$ 1,550)$ |
| 80 | 11.0\% | 12,000 | \$2,016 | \$431 | $(\$ 1,585)$ | \$524 | $(\$ 1,492)$ |
| 90 | 12.3\% | 13,500 | \$2,016 | \$478 | $(\$ 1,538)$ | \$581 | $(\$ 1,435)$ |
| 100 | 13.7\% | 15,000 | \$2,016 | \$525 | $(\$ 1,491)$ | \$639 | $(\$ 1,377)$ |
| 200 | 27.4\% | 30,000 | \$2,016 | \$992 | $(\$ 1,024)$ | \$1,214 | (\$801) |
| 300 | 41.1\% | 45,000 | \$2,016 | \$1,460 | (\$556) | \$1,790 | (\$226) |
| 400 | 54.8\% | 60,000 | \$2,016 | \$1,927 | (\$89) | \$2,366 | \$350 |
| 500 | 68.5\% | 75,000 | \$2,016 | \$2,394 | \$379 | \$2,942 | \$926 |
| 600 | 82.2\% | 90,000 | \$2,016 | \$2,862 | \$846 | \$3,517 | \$1,502 |
| 700 | 95.9\% | 105,000 | \$2,016 | \$3,329 | \$1,314 | \$4,093 | \$2,077 |
| 730 | 100.0\% | 109,500 | \$2,016 | \$3,470 | \$1,454 | \$4,266 | \$2,250 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge <br> All kWh (cents/kWh) |  |  | \$54.50 |  | \$63.00 |  |
|  |  |  |  | \$0.029609 |  | \$0.038382 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GL 

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 10 | 1.4\% | 4,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 20 | 2.7\% | 8,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 30 | 4.1\% | 12,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 40 | 5.5\% | 16,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 50 | 6.8\% | 20,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 60 | 8.2\% | 24,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 70 | 9.6\% | 28,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 80 | 11.0\% | 32,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 90 | 12.3\% | 36,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 100 | 13.7\% | 40,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 200 | 27.4\% | 80,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 300 | 41.1\% | 120,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 400 | 54.8\% | 160,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 500 | 68.5\% | 200,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 600 | 82.2\% | 240,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 700 | 95.9\% | 280,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
| 730 | 100.0\% | 292,000 | \$5,282 | \$4,250 | $(\$ 1,033)$ | \$4,741 | (\$541) |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  | All kWh (cents/kWh) |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GL 

## Average Demand of 700 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 10 | 1.4\% | 7,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 20 | 2.7\% | 14,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 30 | 4.1\% | 21,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 40 | 5.5\% | 28,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 50 | 6.8\% | 35,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 60 | 8.2\% | 42,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 70 | 9.6\% | 49,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 80 | 11.0\% | 56,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 90 | 12.3\% | 63,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 100 | 13.7\% | 70,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 200 | 27.4\% | 140,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 300 | 41.1\% | 210,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 400 | 54.8\% | 280,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 500 | 68.5\% | 350,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 600 | 82.2\% | 420,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 700 | 95.9\% | 490,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
| 730 | 100.0\% | 511,000 | \$8,903 | \$6,904 | $(\$ 1,999)$ | \$7,939 | (\$964) |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  | All kWh (cents/kWh) |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GL 

## Average Demand of 1300 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | (\$1,810) |
| 10 | 1.4\% | 13,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 20 | 2.7\% | 26,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 30 | 4.1\% | 39,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 40 | 5.5\% | 52,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 50 | 6.8\% | 65,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 60 | 8.2\% | 78,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 70 | 9.6\% | 91,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 80 | 11.0\% | 104,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 90 | 12.3\% | 117,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 100 | 13.7\% | 130,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 200 | 27.4\% | 260,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 300 | 41.1\% | 390,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 400 | 54.8\% | 520,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 500 | 68.5\% | 650,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 600 | 82.2\% | 780,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 700 | 95.9\% | 910,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
| 730 | 100.0\% | 949,000 | \$16,145 | \$12,213 | $(\$ 3,932)$ | \$14,335 | $(\$ 1,810)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  |  |  |  | \$0.000000 |  | \$0.000000 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GL

Attachment DFR IV-E-2
Page 14 of 26
Sponsor: D. B. Ogden

## Average Demand of 3400 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | (\$4,771) |
| 10 | 1.4\% | 34,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 20 | 2.7\% | 68,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 30 | 4.1\% | 102,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 40 | 5.5\% | 136,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 50 | 6.8\% | 170,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 60 | 8.2\% | 204,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 70 | 9.6\% | 238,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 80 | 11.0\% | 272,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 90 | 12.3\% | 306,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 100 | 13.7\% | 340,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 200 | 27.4\% | 680,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 300 | 41.1\% | 1,020,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 400 | 54.8\% | 1,360,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 500 | 68.5\% | 1,700,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 600 | 82.2\% | 2,040,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 700 | 95.9\% | 2,380,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
| 730 | 100.0\% | 2,482,000 | \$41,492 | \$30,795 | $(\$ 10,697)$ | \$36,721 | $(\$ 4,771)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  | All kWh (cents/kWh) |  |  | \$0.000000 |  | \$0.000000 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Summer)

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | $\begin{aligned} & \text { Current Bill } \\ & \text { Less Cost } \end{aligned}$ | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 10 | 1.4\% | 4,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 20 | 2.7\% | 8,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 30 | 4.1\% | 12,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 40 | 5.5\% | 16,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 50 | 6.8\% | 20,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 60 | 8.2\% | 24,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 70 | 9.6\% | 28,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 80 | 11.0\% | 32,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 90 | 12.3\% | 36,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 100 | 13.7\% | 40,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 200 | 27.4\% | 80,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 300 | 41.1\% | 120,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 400 | 54.8\% | 160,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 500 | 68.5\% | 200,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 600 | 82.2\% | 240,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 700 | 95.9\% | 280,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
| 730 | 100.0\% | 292,000 | \$5,818 | \$4,247 | $(\$ 1,571)$ | \$4,741 | $(\$ 1,077)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  | All kWh (cents/kWh) |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Winter) 

## Average Demand of 400 kW

| A | B | C | D | E | $F=E-D$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$5,818 | \$96 | $(\$ 5,722)$ | \$78 | $(\$ 5,740)$ |
| 10 | 1.4\% | 4,000 | \$5,818 | \$193 | $(\$ 5,625)$ | \$198 | $(\$ 5,620)$ |
| 20 | 2.7\% | 8,000 | \$5,818 | \$290 | $(\$ 5,528)$ | \$319 | $(\$ 5,499)$ |
| 30 | 4.1\% | 12,000 | \$5,818 | \$387 | $(\$ 5,431)$ | \$439 | $(\$ 5,379)$ |
| 40 | 5.5\% | 16,000 | \$5,818 | \$484 | $(\$ 5,333)$ | \$560 | $(\$ 5,258)$ |
| 50 | 6.8\% | 20,000 | \$5,818 | \$582 | $(\$ 5,236)$ | \$681 | $(\$ 5,137)$ |
| 60 | 8.2\% | 24,000 | \$5,818 | \$679 | $(\$ 5,139)$ | \$801 | $(\$ 5,017)$ |
| 70 | 9.6\% | 28,000 | \$5,818 | \$776 | $(\$ 5,042)$ | \$922 | $(\$ 4,896)$ |
| 80 | 11.0\% | 32,000 | \$5,818 | \$873 | $(\$ 4,945)$ | \$1,043 | $(\$ 4,775)$ |
| 90 | 12.3\% | 36,000 | \$5,818 | \$971 | $(\$ 4,847)$ | \$1,163 | $(\$ 4,655)$ |
| 100 | 13.7\% | 40,000 | \$5,818 | \$1,068 | $(\$ 4,750)$ | \$1,284 | $(\$ 4,534)$ |
| 200 | 27.4\% | 80,000 | \$5,818 | \$2,040 | $(\$ 3,778)$ | \$2,490 | $(\$ 3,328)$ |
| 300 | 41.1\% | 120,000 | \$5,818 | \$3,012 | $(\$ 2,806)$ | \$3,697 | $(\$ 2,121)$ |
| 400 | 54.8\% | 160,000 | \$5,818 | \$3,984 | $(\$ 1,834)$ | \$4,903 | (\$915) |
| 500 | 68.5\% | 200,000 | \$5,818 | \$4,956 | (\$862) | \$6,110 | \$292 |
| 600 | 82.2\% | 240,000 | \$5,818 | \$5,928 | \$110 | \$7,316 | \$1,498 |
| 700 | 95.9\% | 280,000 | \$5,818 | \$6,900 | \$1,082 | \$8,523 | \$2,705 |
| 730 | 100.0\% | 292,000 | \$5,818 | \$7,192 | \$1,374 | \$8,885 | \$3,067 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer |  |  | \$67.00 |  | \$77.50 |  |
|  | All kWh (cents/kWh) |  |  | \$0.023145 |  | \$0.030162 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Summer)

## Average Demand of 700 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | $\begin{aligned} & \text { Current Bill } \\ & \text { Less Cost } \end{aligned}$ | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 10 | 1.4\% | 7,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 20 | 2.7\% | 14,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 30 | 4.1\% | 21,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 40 | 5.5\% | 28,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 50 | 6.8\% | 35,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 60 | 8.2\% | 42,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 70 | 9.6\% | 49,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 80 | 11.0\% | 56,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 90 | 12.3\% | 63,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 100 | 13.7\% | 70,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 200 | 27.4\% | 140,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 300 | 41.1\% | 210,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 400 | 54.8\% | 280,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 500 | 68.5\% | 350,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 600 | 82.2\% | 420,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 700 | 95.9\% | 490,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
| 730 | 100.0\% | 511,000 | \$9,709 | \$6,902 | $(\$ 2,807)$ | \$7,939 | $(\$ 1,770)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Demand First 300 kW or less (\$/mo.) |  |  | \$3,180.00 |  | \$3,675.00 |  |
|  | Demand Additional kW (\$/kW) |  |  | \$8.41 |  | \$10.66 |  |
|  | All kWh (cents/kWh) |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Winter) 

## Average Demand of 700 kW

| A | B | C | D | E | $\mathrm{F}=\mathrm{E}-\mathrm{D}$ | G | H=G-D |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$9,709 | \$101 | $(\$ 9,608)$ | \$78 | $(\$ 9,631)$ |
| 10 | 1.4\% | 7,000 | \$9,709 | \$271 | $(\$ 9,438)$ | \$289 | $(\$ 9,420)$ |
| 20 | 2.7\% | 14,000 | \$9,709 | \$441 | $(\$ 9,268)$ | \$500 | $(\$ 9,209)$ |
| 30 | 4.1\% | 21,000 | \$9,709 | \$611 | $(\$ 9,098)$ | \$711 | $(\$ 8,998)$ |
| 40 | 5.5\% | 28,000 | \$9,709 | \$781 | $(\$ 8,928)$ | \$922 | $(\$ 8,787)$ |
| 50 | 6.8\% | 35,000 | \$9,709 | \$952 | $(\$ 8,757)$ | \$1,133 | $(\$ 8,576)$ |
| 60 | 8.2\% | 42,000 | \$9,709 | \$1,122 | $(\$ 8,587)$ | \$1,344 | $(\$ 8,365)$ |
| 70 | 9.6\% | 49,000 | \$9,709 | \$1,292 | $(\$ 8,417)$ | \$1,555 | $(\$ 8,154)$ |
| 80 | 11.0\% | 56,000 | \$9,709 | \$1,462 | $(\$ 8,247)$ | \$1,767 | $(\$ 7,942)$ |
| 90 | 12.3\% | 63,000 | \$9,709 | \$1,632 | $(\$ 8,077)$ | \$1,978 | $(\$ 7,731)$ |
| 100 | 13.7\% | 70,000 | \$9,709 | \$1,802 | $(\$ 7,907)$ | \$2,189 | $(\$ 7,520)$ |
| 200 | 27.4\% | 140,000 | \$9,709 | \$3,503 | $(\$ 6,206)$ | \$4,300 | $(\$ 5,409)$ |
| 300 | 41.1\% | 210,000 | \$9,709 | \$5,204 | $(\$ 4,504)$ | \$6,412 | $(\$ 3,297)$ |
| 400 | 54.8\% | 280,000 | \$9,709 | \$6,906 | $(\$ 2,803)$ | \$8,523 | $(\$ 1,186)$ |
| 500 | 68.5\% | 350,000 | \$9,709 | \$8,607 | $(\$ 1,102)$ | \$10,634 | \$925 |
| 600 | 82.2\% | 420,000 | \$9,709 | \$10,308 | \$599 | \$12,746 | \$3,037 |
| 700 | 95.9\% | 490,000 | \$9,709 | \$12,009 | \$2,300 | \$14,857 | \$5,148 |
| 730 | 100.0\% | 511,000 | \$9,709 | \$12,519 | \$2,810 | \$15,490 | \$5,781 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge <br> All kWh (cents/kWh) |  |  | \$67.00 |  | \$77.50 |  |
|  |  |  |  | \$0.023145 |  | \$0.030162 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Summer)

## Average Demand of $\mathbf{2 5 0 0} \mathbf{~ k W}$

| A | B | C | D | E | $F=E-D$ | G | $\mathrm{H}=\mathrm{G}-\mathrm{D}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill <br> Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 10 | 1.4\% | 25,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 20 | 2.7\% | 50,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 30 | 4.1\% | 75,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 40 | 5.5\% | 100,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 50 | 6.8\% | 125,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 60 | 8.2\% | 150,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 70 | 9.6\% | 175,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 80 | 11.0\% | 200,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 90 | 12.3\% | 225,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 100 | 13.7\% | 250,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 200 | 27.4\% | 500,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 300 | 41.1\% | 750,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 400 | 54.8\% | 1,000,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 500 | 68.5\% | 1,250,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 600 | 82.2\% | 1,500,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 700 | 95.9\% | 1,750,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
| 730 | 100.0\% | 1,825,000 | \$33,055 | \$22,829 | $(\$ 10,226)$ | \$27,127 | $(\$ 5,928)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| Demand First 300 kW or less (\$/mo.) |  |  |  | \$3,180.00 |  | \$3,675.00 |  |
| Demand Additional kW (\$/kW) |  |  |  | \$8.41 |  | \$10.66 |  |
| All kWh (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule GLH (Winter) 

## Average Demand of 2500 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$33,055 | \$133 | $(\$ 32,922)$ | \$78 | $(\$ 32,977)$ |
| 10 | 1.4\% | 25,000 | \$33,055 | \$741 | $(\$ 32,314)$ | \$832 | $(\$ 32,223)$ |
| 20 | 2.7\% | 50,000 | \$33,055 | \$1,348 | $(\$ 31,707)$ | \$1,586 | $(\$ 31,469)$ |
| 30 | 4.1\% | 75,000 | \$33,055 | \$1,956 | $(\$ 31,099)$ | \$2,340 | $(\$ 30,715)$ |
| 40 | 5.5\% | 100,000 | \$33,055 | \$2,563 | $(\$ 30,492)$ | \$3,094 | $(\$ 29,961)$ |
| 50 | 6.8\% | 125,000 | \$33,055 | \$3,171 | $(\$ 29,884)$ | \$3,848 | $(\$ 29,207)$ |
| 60 | 8.2\% | 150,000 | \$33,055 | \$3,778 | $(\$ 29,277)$ | \$4,602 | $(\$ 28,453)$ |
| 70 | 9.6\% | 175,000 | \$33,055 | \$4,386 | $(\$ 28,669)$ | \$5,356 | $(\$ 27,699)$ |
| 80 | 11.0\% | 200,000 | \$33,055 | \$4,993 | $(\$ 28,062)$ | \$6,110 | $(\$ 26,945)$ |
| 90 | 12.3\% | 225,000 | \$33,055 | \$5,601 | $(\$ 27,454)$ | \$6,864 | $(\$ 26,191)$ |
| 100 | 13.7\% | 250,000 | \$33,055 | \$6,209 | $(\$ 26,846)$ | \$7,618 | $(\$ 25,437)$ |
| 200 | 27.4\% | 500,000 | \$33,055 | \$12,284 | (\$20,771) | \$15,159 | $(\$ 17,896)$ |
| 300 | 41.1\% | 750,000 | \$33,055 | \$18,360 | (\$14,695) | \$22,699 | $(\$ 10,356)$ |
| 400 | 54.8\% | 1,000,000 | \$33,055 | \$24,435 | $(\$ 8,620)$ | \$30,240 | $(\$ 2,815)$ |
| 500 | 68.5\% | 1,250,000 | \$33,055 | \$30,511 | $(\$ 2,544)$ | \$37,780 | \$4,725 |
| 600 | 82.2\% | 1,500,000 | \$33,055 | \$36,586 | \$3,531 | \$45,321 | \$12,266 |
| 700 | 95.9\% | 1,750,000 | \$33,055 | \$42,662 | \$9,607 | \$52,861 | \$19,806 |
| 730 | 100.0\% | 1,825,000 | \$33,055 | \$44,485 | \$11,430 | \$55,123 | \$22,068 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
|  | Customer Charge |  |  | \$67.00 |  | \$77.50 |  |
|  | All kWh/kW (cents/kWh) |  |  | \$0.023145 |  | \$0.030162 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule L

Attachment DFR IV-E-2
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Sponsor: D. B. Ogden

Average Demand of 7000 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 10 | 1.4\% | 70,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 20 | 2.7\% | 140,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 30 | 4.1\% | 210,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 40 | 5.5\% | 280,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 50 | 6.8\% | 350,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 60 | 8.2\% | 420,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 70 | 9.6\% | 490,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 80 | 11.0\% | 560,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 90 | 12.3\% | 630,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 100 | 13.7\% | 700,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 200 | 27.4\% | 1,400,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 300 | 41.1\% | 2,100,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 400 | 54.8\% | 2,800,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 500 | 68.5\% | 3,500,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 600 | 82.2\% | 4,200,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 700 | 95.9\% | 4,900,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
| 730 | 100.0\% | 5,110,000 | \$81,652 | \$64,343 | $(\$ 17,310)$ | \$75,060 | $(\$ 6,592)$ |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| First 5,000 kW or less (\$/mo.) |  |  |  | \$34,900.00 |  | \$41,800.00 |  |
| Additional kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| Next 25,000 kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| Additional kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| First 750,000 kWh + $400 \mathrm{kWh} / \mathrm{kW}$ (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |
| Next 150 kWh per kW (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |
| All kWh (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule L

Attachment DFR IV-E-2
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Sponsor: D. B. Ogden

Average Demand of 15000 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed <br> Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 10 | 1.4\% | 150,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 20 | 2.7\% | 300,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 30 | 4.1\% | 450,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 40 | 5.5\% | 600,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 50 | 6.8\% | 750,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 60 | 8.2\% | 900,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 70 | 9.6\% | 1,050,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 80 | 11.0\% | 1,200,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 90 | 12.3\% | 1,350,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 100 | 13.7\% | 1,500,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 200 | 27.4\% | 3,000,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 300 | 41.1\% | 4,500,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 400 | 54.8\% | 6,000,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 500 | 68.5\% | 7,500,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 600 | 82.2\% | 9,000,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 700 | 95.9\% | 10,500,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
| 730 | 100.0\% | 10,950,000 | \$174,052 | \$174,694 | \$642 | \$208,100 | \$34,048 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| First 5,000 kW or less (\$/mo.) |  |  |  | \$34,900.00 |  | \$41,800.00 |  |
| Additional kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| Next 25,000 kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| Additional kW (\$/kW) |  |  |  | \$13.12 |  | \$16.63 |  |
| First 750,000 kWh + $400 \mathrm{kWh} / \mathrm{kW}$ (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |
| Next 150 kWh per kW (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |
| All kWh (cents/kWh) |  |  |  | \$0.000000 |  | \$0.000000 |  |

# Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule HVPS 

Average Demand of 5000 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 10 | 1.4\% | 50,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 20 | 2.7\% | 100,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 30 | 4.1\% | 150,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 40 | 5.5\% | 200,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 50 | 6.8\% | 250,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 60 | 8.2\% | 300,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 70 | 9.6\% | 350,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 80 | 11.0\% | 400,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 90 | 12.3\% | 450,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 100 | 13.7\% | 500,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 200 | 27.4\% | 1,000,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 300 | 41.1\% | 1,500,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 400 | 54.8\% | 2,000,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 500 | 68.5\% | 2,500,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 600 | 82.2\% | 3,000,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 700 | 95.9\% | 3,500,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
| 730 | 100.0\% | 3,650,000 | \$165 | \$2,282 | \$2,116 | \$2,503 | \$2,338 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| Demand First 50,000 kW or less (\$/mo.) |  |  |  | \$2,050.31 | \$2,503.20 |  |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule HVPS

Average Demand of 40000 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill <br> Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 10 | 1.4\% | 400,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 20 | 2.7\% | 800,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 30 | 4.1\% | 1,200,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 40 | 5.5\% | 1,600,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 50 | 6.8\% | 2,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 60 | 8.2\% | 2,400,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 70 | 9.6\% | 2,800,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 80 | 11.0\% | 3,200,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 90 | 12.3\% | 3,600,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 100 | 13.7\% | 4,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 200 | 27.4\% | 8,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 300 | 41.1\% | 12,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 400 | 54.8\% | 16,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 500 | 68.5\% | 20,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 600 | 82.2\% | 24,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 700 | 95.9\% | 28,000,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
| 730 | 100.0\% | 29,200,000 | \$165 | \$2,954 | \$2,788 | \$2,503 | \$2,338 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| Demand First 50,000 kW or less (\$/mo.) |  |  |  | \$2,050.31 | \$2,503.20 |  |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule HVPS

## Average Demand of 75000 kW

| A | B | c | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 0 | 0.0\% | 0 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 10 | 1.4\% | 750,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 20 | 2.7\% | 1,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 30 | 4.1\% | 2,250,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 40 | 5.5\% | 3,000,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 50 | 6.8\% | 3,750,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 60 | 8.2\% | 4,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 70 | 9.6\% | 5,250,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 80 | 11.0\% | 6,000,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 90 | 12.3\% | 6,750,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 100 | 13.7\% | 7,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 200 | 27.4\% | 15,000,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 300 | 41.1\% | 22,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 400 | 54.8\% | 30,000,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 500 | 68.5\% | 37,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 600 | 82.2\% | 45,000,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 700 | 95.9\% | 52,500,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
| 730 | 100.0\% | 54,750,000 | \$165 | \$4,836 | \$4,671 | \$3,910 | \$3,745 |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| Demand 50,001 to 100,000 kW (\$/mo.) |  |  |  | \$3,202.72 |  | \$3,910.17 |  |

Duquesne Light Company Monthly Distribution Revenue Versus Cost Rate Schedule AL

## Average Demand of 10 kW

| A | B | C | D | E | $F=E-D$ | G | $H=G-D$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hours Use | Load <br> Factor | KWH | Monthly Distribution Cost | Monthly Bill Current Distribution | Current Bill Less Cost | Monthly Bill Proposed Distribution | Proposed Bill Less Cost |
| 10 | 1.4\% | 100 | \$725 | \$25 | (\$700) | \$27 | (\$698) |
| 20 | 2.7\% | 200 | \$725 | \$26 | (\$699) | \$27 | (\$698) |
| 30 | 4.1\% | 300 | \$725 | \$26 | (\$699) | \$27 | (\$698) |
| 40 | 5.5\% | 400 | \$725 | \$26 | (\$699) | \$27 | (\$698) |
| 50 | 6.8\% | 500 | \$725 | \$26 | (\$699) | \$27 | (\$697) |
| 60 | 8.2\% | 600 | \$725 | \$26 | (\$698) | \$28 | (\$697) |
| 70 | 9.6\% | 700 | \$725 | \$27 | (\$698) | \$28 | (\$697) |
| 80 | 11.0\% | 800 | \$725 | \$27 | (\$698) | \$28 | (\$697) |
| 90 | 12.3\% | 900 | \$725 | \$27 | (\$698) | \$28 | (\$696) |
| 100 | 13.7\% | 1,000 | \$725 | \$27 | (\$698) | \$29 | (\$696) |
| 200 | 27.4\% | 2,000 | \$725 | \$30 | (\$695) | \$31 | (\$694) |
| 300 | 41.1\% | 3,000 | \$725 | \$32 | (\$693) | \$33 | (\$691) |
| 400 | 54.8\% | 4,000 | \$725 | \$34 | (\$691) | \$36 | (\$689) |
| 500 | 68.5\% | 5,000 | \$725 | \$36 | (\$689) | \$38 | (\$687) |
| 600 | 82.2\% | 6,000 | \$725 | \$38 | (\$686) | \$41 | (\$684) |
| 700 | 95.9\% | 7,000 | \$725 | \$41 | (\$684) | \$43 | (\$682) |
| 730 | 100.0\% | 7,300 | \$725 | \$41 | (\$684) | \$44 | (\$681) |
|  |  |  |  | Current Rate |  | Proposed Rate |  |
| Customer Charge |  |  |  | \$8.00 |  | \$8.00 |  |
| Demand kW (\$/kW/mo.) |  |  |  | \$1.59 |  | \$1.83 |  |
| All kWh (cents/kWh) |  |  |  | \$0.002110 |  | \$0.002396 |  |

Duquesne Light Company Docket No. R-2021-3024750

## DLC Exhibit 1

Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheets
\& Operating Income Statements

## BOOK 4

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

## Book 1

Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation

## Book 4

Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

## Book 5

Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022) Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021)
Book 7
Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

## Book 8

Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6 - Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 - Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13 - Paul R. Moul
Statement 14 - James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10
Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies
Book 11
Exhibit 7 - Depreciation Studies
Book 12
Confidential Testimony and Exhibits
Q.1. Provide schedules supporting claimed amounts for Electric Plant in Service by function and by account if available.
A.1. Attachment V-A-1a provides Duquesne Light Company's plant in service by account for the year ending December 31, 2021.

Attachment V-A-1b provides Duquesne Light Company's plant in service by account for the year ending December 31, 2022.

## DUQUESNE LIGHT COMPANY

Electric Plant in Service
December 31, 2021
(Thousands of Dollars)

|  | Amount |  |
| :---: | :---: | :---: |
| INTANGIBLE |  |  |
| 301.0 Organization | \$ | 100 |
| 302.0 Franchises and Consents |  | 7 |
| 303.0 Miscellaneous Intangible Plant |  | 388,778 |
| Subtotal - Intangible |  | 388,885 |
| TRANSMISSION |  |  |
| 350.0 Land and Land Rights |  | 15,821 |
| 352.0 Structures and Improvements |  | 35,315 |
| 353.0 Station Equipment |  | 488,829 |
| 354.0 Towers and Fixtures |  | 76,590 |
| 355.0 Poles and Fixtures |  | 57,017 |
| 356.0 Overhead Conductors and Devices |  | 129,659 |
| 357.0 Underground Conduit |  | 83,002 |
| 358.0 Underground Conductors and Devices |  | 150,359 |
| 359.0 Roads and Trails |  | 10,186 |
| Subtotal - Transmission |  | 1,046,778 |
| DISTRIBUTION |  |  |
| 360.0 Land and Land Rights |  | 23,190 |
| 361.0 Structures and Improvements |  | 71,091 |
| 362.0 Station Equipment |  | 530,048 |
| 364.0 Poles, Towers and Fixtures |  | 597,387 |
| 365.0 Overhead Conductors and Devices |  | 603,286 |
| 366.0 Underground Conduit |  | 197,042 |
| 367.0 Underground Conductors and Devices |  | 444,270 |
| 368.0 Line Transformers |  | 468,538 |
| 369.0 Services |  | 111,371 |
| 370.0 Meters |  | 146,003 |
| 370.1 Meter Communication Devices |  | -20 |
| 373.0 Street Lighting and Signal Systems |  | 43,887 |
| Subtotal - Distribution |  | 3,236,093 |
| GENERAL PLANT |  |  |
| 389.1 Land and Land Rights |  | 6,145 |
| 390.1 Structures and Improvements |  | 167,681 |
| 391.0 Office Furniture and Equipment |  | 43,320 |
| 392.0 Transportation Equipment |  | 63,481 |
| 393.0 Stores Equipment |  | 1,379 |
| 394.0 Tools, Shop and Garage Equipment |  | 28,490 |
| 395.0 Laboratory Equipment |  | 1,854 |
| 396.0 Power Operated Equipment |  | 3,694 |
| 397.0 Communication Equipment |  | 71,134 |
| 398.0 Miscellaneous Equipment |  | 230 |
| Subtotal - General Plant |  | 387,408 |

# GENERAL PLANT - LEASEHOLD IMPROVEMENTS 

$$
\begin{array}{lr}
\text { 390.2 Improvements Leased Property } & 20,500 \\
\text { - Electric Plant in Service } & \$ \quad 5,079,664 \\
\hline \hline
\end{array}
$$

## RECAP - Electric Plant in Service

| Intangible |  | 388,885 |
| :--- | ---: | ---: |
| Transmission |  | $1,046,778$ |
| Distribution | $3,236,093$ |  |
| General Plant |  | 407,908 |
|  | Total - Electric Plant in Service | $\$, 079,664$ |

## DUQUESNE LIGHT COMPANY

Electric Plant in Service
December 31, 2022
(Thousands of Dollars)

|  | Amount |
| :---: | :---: |
| INTANGIBLE |  |
| 301.0 Organization | \$ 100 |
| 302.0 Franchises and Consents | 7 |
| 303.0 Miscellaneous Intangible Plant | 384,406 |
| Subtotal - Intangible | 384,513 |
| TRANSMISSION |  |
| 350.0 Land and Land Rights | 15,821 |
| 352.0 Structures and Improvements | 35,315 |
| 353.0 Station Equipment | 507,572 |
| 354.0 Towers and Fixtures | 80,466 |
| 355.0 Poles and Fixtures | 68,214 |
| 356.0 Overhead Conductors and Devices | 160,803 |
| 357.0 Underground Conduit | 83,002 |
| 358.0 Underground Conductors and Devices | 161,447 |
| 359.0 Roads and Trails | 10,186 |
| Subtotal - Transmission | 1,122,826 |
| DISTRIBUTION |  |
| 360.0 Land and Land Rights | 23,190 |
| 361.0 Structures and Improvements | 72,288 |
| 362.0 Station Equipment | 536,936 |
| 364.0 Poles, Towers and Fixtures | 624,016 |
| 365.0 Overhead Conductors and Devices | 629,457 |
| 366.0 Underground Conduit | 219,375 |
| 367.0 Underground Conductors and Devices | 460,253 |
| 368.0 Line Transformers | 490,788 |
| 369.0 Services | 114,962 |
| 370.0 Meters | 151,189 |
| 370.1 Meter Communication Devices | -20 |
| 373.0 Street Lighting and Signal Systems | 44,730 |
| Subtotal - Distribution | 3,367,164 |
| GENERAL PLANT |  |
| 389.1 Land and Land Rights | 6,145 |
| 390.1 Structures and Improvements | 177,314 |
| 391.0 Office Furniture and Equipment | 48,500 |
| 392.0 Transportation Equipment | 65,323 |
| 393.0 Stores Equipment | 1,379 |
| 394.0 Tools, Shop and Garage Equipment | 29,795 |
| 395.0 Laboratory Equipment | 1,774 |
| 396.0 Power Operated Equipment | 3,694 |
| 397.0 Communication Equipment | 71,337 |
| 398.0 Miscellaneous Equipment | 175 |
| Subtotal - General Plant | 405,436 |

# GENERAL PLANT - LEASEHOLD IMPROVEMENTS 

390.2 Improvements Leased Property

Total - Electric Plant in Service

## RECAP - Electric Plant in Service

Intangible
Transmission
Distribution
General Plant
Total - Electric Plant in Service
\$ 5,300,439
5,300,439

| $\$$ | 384,513 |
| :--- | ---: |
|  | $1,122,826$ |
|  | $3,367,164$ |
|  | 425,936 |
| $\$$ | $5,300,439$ |

Q. Provide a comparison of calculated depreciation reserve versus book reserve at the end of the test year. Provide this comparison by functional group and by account if available.
A. Attachment V-A-2, pages 2 through 7, provide Duquesne Light Company's calculated depreciation reserve versus book reserve by account for the historic test year ending December 31, 2020, future test year ending December 31, 2021 and fully projected future test year ending December 31, 2022.

## DUQUESNE LIGHT COMPANY

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION AND BOOK RESERVE AS OF DECEMBER 31, 2020



## DUQUESNE LIGHT COMPANY

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION

 AND BOOK RESERVE AS OF DECEMBER 31, 2020|  | DEPRECIABLE GROUP | CALCULATED ACCRUED DEPRECIATION | BOOK DEPRECIATION RESERVE |
| :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) |
|  | GENERAL PLANT |  |  |
| 390 | STRUCTURES AND IMPROVEMENTS |  |  |
|  | MAJOR STRUCTURES | 45,349,798 | 45,768,902 |
|  | OTHER SMALL STRUCTURES | 1,525,463.00 | 1,539,743 |
|  | TOTAL ACCOUNT 390 | 46,875,261 | 47,308,645 |
| 391 | OFFICE FURNITURE AND EQUIPMENT |  |  |
|  | OFFICE FURNITURE | 2,492,593 | 2,530,434 |
|  | E.D.P EQUIPMENT | 13,292,083 | 13,081,629 |
|  | TOTAL ACCOUNT 391 | 15,784,676 | 15,612,063 |
| 392 | TRANSPORTATION EQUIPMENT | 39,147,979 | 39,147,979 |
| 393 | STORES EQUIPMENT | 819,440 | 821,084 |
| 394 | TOOLS, SHOP AND GARAGE EQUIPMENT | 8,981,592 | 8,828,926 |
| 395 | LABORATORY EQUIPMENT | 888,695 | 885,240 |
| 396 | POWER OPERATED EQUIPMENT | 1,618,216 | 1,618,216 |
| 397 | COMMUNICATION EQUIPMENT | 35,391,659 | 35,237,700 |
| 398 | MISCELLANEOUS EQUIPMENT | 185,750 | 181,979 |
|  | TOTAL GENERAL PLANT | 149,693,269 | 149,641,834 |
|  | TOTAL DEPRECIABLE PLANT | 1,407,467,215 | 1,395,860,706 |

## DUQUESNE LIGHT COMPANY

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION AND BOOK RESERVE AS OF DECEMBER 31, 2021

| DEPRECIABLE GROUP | CALCULATED ACCRUED DEPRECIATION | $\qquad$ |
| :---: | :---: | :---: |
| (1) | (2) | (3) |
| DEPRECIABLE PLANT |  |  |
| TRANSMISSION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES | 8,965,882 | 9,187,426 |
| OTHER SMALL STRUCTURES | 1,906,356 | 1,953,462 |
| TOTAL ACCOUNT 352 | 10,872,238 | 11,140,888 |
| STATION EQUIPMENT | 152,587,077 | 147,896,593 |
| TOWERS AND FIXTURES | 31,085,905 | 34,344,628 |
| POLES AND FIXTURES | 14,522,344 | 16,066,223 |
| OVERHEAD CONDUCTORS AND DEVICES | 34,102,461 | 39,896,574 |
| UNDERGROUND CONDUIT | 33,596,360 | 33,558,486 |
| UNDERGROUND CONDUCTORS AND DEVICES | 33,502,814 | 34,449,376 |
| ROADS AND TRAILS | 1,524,504 | 1,536,203 |
| TOTAL TRANSMISSION PLANT | 311,793,703 | 318,888,971 |
| DISTRIBUTION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES | 26,899,808 | 27,596,037 |
| OTHER SMALL STRUCTURES | 14,710,422 | 15,116,326 |
| TOTAL ACCOUNT 361 | 41,610,230 | 42,712,363 |
| STATION EQUIPMENT |  |  |
| COMPANY STATIONS | 152,725,133 | 160,860,709 |
| CUSTOMER HIGH TENSION | 16,103,533 | 16,961,358 |
| PORTABLE SUBSTATIONS | 1,273,283 | 1,341,110 |
| TOTAL ACCOUNT 362 | 170,101,949 | 179,163,177 |
| POLES, TOWERS AND FIXTURES | 171,432,408 | 183,776,316 |
| OVERHEAD CONDUCTORS AND DEVICES | 172,757,298 | 175,283,463 |
| UNDERGROUND CONDUIT | 51,884,831 | 51,776,325 |
| UNDERGROUND CONDUCTORS AND DEVICES | 140,793,491 | 127,613,516 |
| LINE TRANSFORMERS |  |  |
| OVERHEAD | 98,126,306 | 83,005,943 |
| CONVENTIONAL DISTRIBUTION | 24,816,968 | 20,992,901 |
| NETWORK | 19,609,049 | 16,587,474 |
| UNDERGROUND RESISTORS DISTRIBUTION | 13,039,899 | 11,030,571 |
| TOTAL ACCOUNT 368 | 155,592,222 | 131,616,889 |
| SERVICES | 37,658,178 | 33,144,726 |
| METERS AND SMART METERS | 43,443,344 | 31,973,678 |
| STREET LIGHTING EQUIPMENT | 21,916,586 | 25,364,102 |
| TOTAL DISTRIBUTION PLANT | 1,007,190,537 | 982,424,555 |

## DUQUESNE LIGHT COMPANY

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION

 AND BOOK RESERVE AS OF DECEMBER 31, 2021|  | DEPRECIABLE GROUP | CALCULATED ACCRUED DEPRECIATION | BOOK DEPRECIATION RESERVE |
| :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) |
|  | GENERAL PLANT |  |  |
| 390 | STRUCTURES AND IMPROVEMENTS |  |  |
|  | MAJOR STRUCTURES | 49,428,194 | 49,999,341 |
|  | EV CHARGING STATIONS | 78,532 | 0 |
|  | OTHER SMALL STRUCTURES | 1,671,163.00 | 1,690,754 |
|  | TOTAL ACCOUNT 390 | 51,177,889 | 51,690,095 |
| 391 | OFFICE FURNITURE AND EQUIPMENT |  |  |
|  | OFFICE FURNITURE | 2,156,249 | 2,156,500 |
|  | E.D.P EQUIPMENT | 13,075,749 | 12,210,000 |
|  | TOTAL ACCOUNT 391 | 15,231,998 | 14,366,500 |
| 392 | TRANSPORTATION EQUIPMENT | 38,969,342 | 38,969,342 |
| 393 | STORES EQUIPMENT | 828,427 | 828,500 |
| 394 | TOOLS, SHOP AND GARAGE EQUIPMENT | 9,655,239 | 9,625,000 |
| 395 | LABORATORY EQUIPMENT | 941,128 | 931,500 |
| 396 | POWER OPERATED EQUIPMENT | 1,774,894 | 1,774,894 |
| 397 | COMMUNICATION EQUIPMENT | 33,706,665 | 33,500,000 |
| 398 | MISCELLANEOUS EQUIPMENT | 197,252 | 193,902 |
|  | TOTAL GENERAL PLANT | 152,482,835 | 151,879,734 |
|  | TOTAL DEPRECIABLE PLANT | 1,471,467,075 | 1,453,193,259 |

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION

 AND BOOK RESERVE AS OF DECEMBER 31, 2022| DEPRECIABLE GROUP | CALCULATED ACCRUED DEPRECIATION | ```DEPRECIATION RESERVE``` |
| :---: | :---: | :---: |
| (1) | (2) | (3) |
| DEPRECIABLE PLANT |  |  |
| TRANSMISSION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES | 9,842,334 | 10,104,522 |
| OTHER SMALL STRUCTURES | 2,076,006 | 2,131,308 |
| TOTAL ACCOUNT 352 | 11,918,340 | 12,235,830 |
| STATION EQUIPMENT | 162,556,929 | 158,591,302 |
| TOWERS AND FIXTURES | 31,380,692 | 34,399,873 |
| POLES AND FIXTURES | 15,684,465 | 17,199,469 |
| OVERHEAD CONDUCTORS AND DEVICES | 35,660,397 | 39,049,662 |
| UNDERGROUND CONDUIT | 34,807,767 | 35,003,214 |
| UNDERGROUND CONDUCTORS AND DEVICES | 36,056,930 | 37,024,095 |
| ROADS AND TRAILS | 1,705,211 | 1,716,041 |
| TOTAL TRANSMISSION PLANT | 329,770,731 | 335,219,485 |
| DISTRIBUTION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES | 27,909,277 | 28,449,411 |
| OTHER SMALL STRUCTURES | 15,243,791 | 15,577,876 |
| TOTAL ACCOUNT 361 | 43,153,068 | 44,027,287 |
| STATION EQUIPMENT |  |  |
| COMPANY STATIONS | 160,242,845 | 170,443,153 |
| CUSTOMER HIGH TENSION | 16,692,302 | 17,754,856 |
| PORTABLE SUBSTATIONS | 1,414,700 | 1,504,753 |
| TOTAL ACCOUNT 362 | 178,349,847 | 189,702,762 |
| POLES, TOWERS AND FIXTURES | 179,884,978 | 192,714,514 |
| OVERHEAD CONDUCTORS AND DEVICES | 182,212,050 | 184,534,010 |
| UNDERGROUND CONDUIT | 53,364,559 | 53,228,914 |
| UNDERGROUND CONDUCTORS AND DEVICES | 148,396,378 | 136,277,079 |
| LINE TRANSFORMERS |  |  |
| OVERHEAD | 102,936,690 | 88,701,146 |
| CONVENTIONAL DISTRIBUTION | 25,892,977 | 22,312,130 |
| NETWORK | 20,880,643 | 17,992,972 |
| UNDERGROUND RESISTORS DISTRIBUTION | 13,650,811 | 11,762,983 |
| TOTAL ACCOUNT 368 | 163,361,121 | 140,769,231 |
| SERVICES | 37,975,557 | 28,629,334 |
| METERS AND SMART METERS | 50,888,804 | 42,907,740 |
| STREET LIGHTING EQUIPMENT | 22,311,823 | 25,853,255 |
| TOTAL DISTRIBUTION PLANT | 1,059,898,185 | 1,038,644,126 |

## COMPARISON OF CALCULATED ACCRUED DEPRECIATION

 AND BOOK RESERVE AS OF DECEMBER 31, 2022

* Calculated accrued set equal to book reserve since these are handled as clearing accounts
Q.3. Provide supporting schedules which indicate the procedures and calculations employed to develop the original cost plant and applicable reserves to the test year end as submitted in the current proceeding.
A.3. Attachment V-A-3a provides Duquesne Light Company's plant in service and applicable reserves by account as of December 31, 2020 and as of December 31, 2021.

Attachment V-A-3b provides Duquesne Light Company's plant in service and applicable reserves by account as of December 31, 2022.

| DUQUESNE UGHT COMPANY Orginal Plant Costs <br> Balances As of December 31, 2021 (Thousands of Dollars) |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \text { Original Cost } \\ 12 / 31 / 2020 \\ \hline \end{gathered}$ |  | Additions |  | Retirements |  | Transfers \& Adjustments |  | $\begin{gathered} \text { Original Cost } \\ 12 / 31 / 2021 \\ \hline \end{gathered}$ |  |
| INTANGIBLE |  |  |  |  |  |  |  |  |  |  |
| 301.0 Organization | \$ | 100 | \$ | - | \$ | - | \$ | - | \$ | 100 |
| 302.0 Franchises and Consents |  | 7 |  | - |  | - |  | - |  | 7 |
| 303.0 Miscellaneous Intangible Plant |  | 326,128 |  | 29,647 |  | $(36,736)$ |  | 69,739 |  | 388,778 |
| Subtotal- Intangible |  | 326,235 |  | 29,647 |  | $(36,736)$ |  | 69,739 |  | 388,885 |
| TRANSMISSION |  |  |  |  |  |  |  |  |  |  |
| 350.0 Land and Land Rights |  | 14,384 |  | - |  | - |  | 1,437 |  | 15,821 |
| 352.0 Structures and Improvements |  | 33,109 |  | 1,451 |  | (17) |  | 772 |  | 35,315 |
| 353.0 Station Equipment |  | 432,945 |  | 34,418 |  | $(7,615)$ |  | 29,081 |  | 488,829 |
| 354.0 Towers and Fixtures |  | 78,247 |  | 5,707 |  | $(1,033)$ |  | $(6,331)$ |  | 76,590 |
| 355.0 Poles and Fixtures |  | 59,118 |  | - |  | - |  | $(2,101)$ |  | 57,017 |
| 356.0 Overhead Conductors and Devices |  | 139,592 |  | 6,911 |  | (236) |  | $(16,608)$ |  | 129,659 |
| 357.0 Underground Conduit |  | 80,849 |  | - |  | - |  | 2,153 |  | 83,002 |
| 358.0 Underground Conductors and Devices |  | 147,799 |  | - |  | - |  | 2,560 |  | 150,359 |
| 359.0 Roads and Trails |  | 10,186 |  | - |  | - |  | - |  | 10,186 |
| Subtotal - Transmission |  | 996,229 |  | 48,487 |  | (8,901) |  | 10,963 |  | 1,046,778 |
| DISTRIBUTION |  |  |  |  |  |  |  |  |  |  |
| 360.0 Land and Land Rights |  | 23,190 | \$ | - |  | - |  | - |  | 23,190 |
| 361.0 Structures and Improvements |  | 70,294 |  | 973 |  | (98) |  | (78) |  | 71,091 |
| 362.0 Station Equipment |  | 504,801 |  | 27,022 |  | $(5,408)$ |  | 3,633 |  | 530,048 |
| 364.0 Poles, Towers and Fixtures |  | 596,620 |  | 35,412 |  | $(5,250)$ |  | $(29,395)$ |  | 597,387 |
| 365.0 Overhead Conductors and Devices |  | 576,573 |  | 38,308 |  | $(8,063)$ |  | $(3,532)$ |  | 603,286 |
| 366.0 Underground Conduit |  | 146,553 |  | 43,871 |  | $(2,751)$ |  | 9,369 |  | 197,042 |
| 367.0 Underground Conductors and Devices |  | 437,017 |  | 15,559 |  | $(2,964)$ |  | $(5,342)$ |  | 444,270 |
| 368.0 Line Transformers |  | 432,109 |  | 35,470 |  | $(9,134)$ |  | 10,093 |  | 468,538 |
| 369.0 Services |  | 102,586 |  | 6,352 |  | $(2,551)$ |  | 4,984 |  | 111,371 |
| 370. 0 Meters |  | 142,524 |  | 5,434 |  | (278) |  | $(1,697)$ |  | 145,983 |
| 373.0 Street Lighting and Signal Systems |  | 43,252 |  | 1,613 |  | (776) |  | (202) |  | 43,887 |
| Subtotal - Distribution |  | 3,075,519 |  | 210,014 |  | $(37,273)$ |  | $(12,167)$ |  | 3,236,093 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 389.0 Land and Land Rights |  | 6,145 |  | - |  | - |  | - |  | 6,145 |
| 390.1 Structures and Improvements |  | 144,185 |  | 14,021 |  | - |  | 9,475 |  | 167,681 |
| 391.0 Office Furniture and Equipment |  | 31,769 |  | 8,132 |  | $(7,022)$ |  | 10,441 |  | 43,320 |
| 392.0 Transportation Equipment |  | 66,957 |  | 6,000 |  | $(4,158)$ |  | $(5,318)$ |  | 63,481 |
| 393.0 Stores Equipment |  | 1,621 |  | - |  | (34) |  | (208) |  | 1,379 |
| 394.0 Tools, Shop and Garage Equipment |  | 27,833 |  | 1,578 |  | (445) |  | (476) |  | 28,490 |
| 395.0 Laboratory Equipment |  | 1,896 |  | - |  | (42) |  | - |  | 1,854 |
| 396.0 Power Operated Equipment |  | 3,582 |  | - |  | - |  | 112 |  | 3,694 |
| 397.0 Communication Equipment |  | 74,175 |  | 1,933 |  | $(6,528)$ |  | 1,554 |  | 71,134 |
| 398.0 Miscellaneous Equipment |  | 230 |  | - |  | - |  | - |  | 230 |
| Subtotal - General Plant |  | 358,393 |  | 31,664 |  | $(18,229)$ |  | 15,580 |  | 387,408 |
| GENERAL PLANT - LEASEHOLD IMPROVEMENTS |  |  |  |  |  |  |  |  |  |  |
| 390.2 Improvements Leased Property |  | 20,986 |  | - |  | - |  | (486) |  | 20,500 |
| Total - Electric Plant In Service | \$ | 4,777,362 | \$ | 319,812 | \$ | $(101,139)$ | \$ | 83,629 | \$ | 5,079,664 |
| RECAP | $\begin{gathered} \text { Original Cost } \\ 12 / 31 / 2020 \\ \hline \end{gathered}$ |  | Additions |  | Retirements |  | Transfers \& Adjustments |  | $\begin{gathered} \text { Original Cost } \\ 12 / 31 / 2021 \\ \hline \end{gathered}$ |  |
| Intangible | \$ | 326,235 | \$ | 29,647 | \$ | $(36,736)$ | \$ | 69,739 | \$ | 388,885 |
| Transmission |  | 996,229 |  | 48,487 |  | $(8,901)$ |  | 10,963 |  | 1,046,778 |
| Distribution |  | 3,075,519 |  | 210,014 |  | $(37,273)$ |  | $(12,167)$ |  | 3,236,093 |
| General Plant |  | 379,379 |  | 31,664 |  | $(18,229)$ |  | 15,094 |  | 407,908 |
| Total YTD ${ }^{\circ}$ Electric Plant in Service | \$ | 4,777,362 | \$ | 319,812 | \$ | $(101,139)$ | \$ | 83,629 | \$ | 5,079,664 |



| DUQUESNE UGHT COMPANY Orginal Plant Costs Balances As of December 31, 2022 (Thousands of Dollars) |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \text { Original Cost } \\ 12 / 31 / 2021 \\ \hline \end{gathered}$ |  | Additions |  | Retirements |  | Transfers \& Adjustments |  | Original Cost12/31/2022 |  |
| INTANGIBLE |  |  |  |  |  |  |  |  |  |  |
| 301.0 Organization | \$ | 100 | \$ | - | \$ | - | \$ | - | \$ | 100 |
| 302.0 Franchises and Consents |  | 7 |  | - |  | - |  | - |  | 7 |
| 303.0 Miscellaneous Intangible Plant |  | 388,778 |  | 27,232 |  | $(31,604)$ |  | - |  | 384,406 |
| Subtotal- Intangible |  | 388,885 |  | 27,232 |  | $(31,604)$ |  | - |  | 384,513 |
| TRANSMISSION |  |  |  |  |  |  |  |  |  |  |
| 350.0 Land and Land Rights | \$ | 15,821 | \$ | - | \$ | - | \$ | - | \$ | 15,821 |
| 352.0 Structures and Improvements |  | 35,315 |  | - |  | - |  | - |  | 35,315 |
| 353.0 Station Equipment |  | 488,829 |  | 24,068 |  | $(5,325)$ |  | - |  | 507,572 |
| 354.0 Towers and Fixtures |  | 76,590 |  | 4,733 |  | (857) |  | - |  | 80,466 |
| 355.0 Poles and Fixtures |  | 57,017 |  | 11,241 |  | (44) |  | - |  | 68,214 |
| 356.0 Overhead Conductors and Devices |  | 129,659 |  | 32,243 |  | $(1,099)$ |  | - |  | 160,803 |
| 357.0 Underground Conduit |  | 83,002 |  | - |  | - |  | - |  | 83,002 |
| 358.0 Underground Conductors and Devices |  | 150,359 |  | 11,355 |  | (267) |  | - |  | 161,447 |
| 359.0 Roads and Trails |  | 10,186 |  | - |  | - |  | - |  | 10,186 |
| Subtotal - Transmission |  | 1,046,778 |  | 83,640 |  | (7,592) |  | - |  | 1,122,826 |
| DISTRIBUTION |  |  |  |  |  |  |  |  |  |  |
| 360.0 Land and Land Rights | \$ | 23,190 | \$ | - | \$ | - | \$ | - | \$ | 23,190 |
| 361,0 Structures and Improvements |  | 71,091 |  | 1,331 |  | (134) |  | - |  | 72,288 |
| 362.0 Station Equipment |  | 530,048 |  | 8,611 |  | $(1,723)$ |  | - |  | 536,936 |
| 364.0 Poles, Towers and Fixtures |  | 597,387 |  | 31,265 |  | $(4,636)$ |  | - |  | 624,016 |
| 365.0 Overhead Conductors and Devices |  | 603,286 |  | 33,148 |  | $(6,977)$ |  | - |  | 629,457 |
| 366.0 Underground Conduit |  | 197,042 |  | 23,827 |  | $(1,494)$ |  | - |  | 219,375 |
| 367.0 Underground Conductors and Devices |  | 444,270 |  | 19,745 |  | $(3,762)$ |  | - |  | 460,253 |
| 368.0 Line Transformers |  | 468,538 |  | 29,967 |  | $(7,717)$ |  | - |  | 490,788 |
| 369.0 Services |  | 111,371 |  | 6,001 |  | $(2,410)$ |  | - |  | 114,962 |
| 370. 0 Meters |  | 145,983 |  | 5,466 |  | (280) |  | - |  | 151,169 |
| 373.0 Street Lighting and Signal Systems |  | 43,887 |  | 1,622 |  | (779) |  | - |  | 44,730 |
| Subtotal - Distribution |  | 3,236,093 |  | 160,983 |  | $(29,912)$ |  | - |  | 3,367,164 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 389.0 Land and Land Rights |  | 6,145 |  | - |  | - |  | - |  | 6,145 |
| 390.1 Structures and Improvements |  | 167,681 |  | 9,633 |  | - |  | - |  | 177,314 |
| 391.0 Office Furniture and Equipment |  | 43,320 |  | 10,822 |  | $(5,642)$ |  | - |  | 48,500 |
| 392.0 Transportation Equipment |  | 63,481 |  | 6,000 |  | $(4,158)$ |  | - |  | 65,323 |
| 393.0 Stores Equipment |  | 1,379 |  | - |  | - |  | - |  | 1,379 |
| 394.0 Tools, Shop and Garage Equipment |  | 28,490 |  | 1,578 |  | (273) |  | - |  | 29,795 |
| 395.0 Laboratory Equipment |  | 1,854 |  | - |  | (80) |  | - |  | 1,774 |
| 396.0 Power Operated Equipment |  | 3,694 |  | - |  | - |  | - |  | 3,694 |
| 397.0 Communication Equipment |  | 71,134 |  | 1,906 |  | $(1,703)$ |  | - |  | 71,337 |
| 398.0 Miscellaneous Equipment |  | 230 |  | - |  | (55) |  | - |  | 175 |
| Subtotal - General Plant |  | 387,408 |  | 29,939 |  | $(11,911)$ |  | - |  | 405,436 |
| GENERAL PLANT - LEASEHOLD IMPROVEMENTS |  |  |  |  |  |  |  |  |  |  |
| 390.2 Improvements Leased Property |  | 20,500 |  | - |  | - |  | - |  | 20,500 |
| Total - Electric Plant In Service | \$ | 5,079,664 |  | 301,794 |  | $(81,019)$ |  | - | \$ | 5,300,439 |
| RECAP |  | $\begin{aligned} & \text { inal Cost } \\ & 31 / 2021 \\ & \hline \end{aligned}$ |  | tions |  | ments |  |  |  | $\begin{aligned} & \text { nal Cost } \\ & 31 / 2022 \\ & \hline \end{aligned}$ |
| Intangible | \$ | 388,885 | \$ | 27,232 | \$ | $(31,604)$ | \$ | - | \$ | 384,513 |
| Transmission |  | 1,046,778 |  | 83,640 |  | $(7,592)$ |  | - |  | 1,122,826 |
| Distribution |  | 3,236,093 |  | 160,983 |  | $(29,912)$ |  | - |  | 3,367,164 |
| General Plant |  | 407,908 |  | 29,939 |  | $(11,911)$ |  | - |  | 425,936 |
| Total YTD ${ }^{\circ}$ Electric Plant in Service | \$ | 5,079,664 | \$ | 301,794 | \$ | $(81,019)$ | \$ | - | \$ | 5,300,439 |


Q. 4 Provide a schedule showing details of rate case adjustments.
A.4. Schedules of rate adjustments are set forth in Schedules C and D of DLC Exhibit 2 (Fully Projected Future Test Year) and DLC Exhibit 3 (Future Test Year). Schedules C-2 and D-3 provide a summary of the adjustments.
Q. Provide a comparison of calculated depreciation accruals versus book accruals by function and by account if available.
A. Attachment V-B-1, pages 2 through 7, provide Duquesne Light Company's calculated and book accruals by function and by account for the historic test year ending December 31, 2020, future test year ending December 31, 2021 and fully projected future test year ending December 31, 2022.

|  | DEPRECIABLE GROUP | CALCULATED DEPRECIATION ACCRUALS | BOOK DEPRECIATION ACCRUALS |
| :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) |
|  | DEPRECIABLE PLANT |  |  |
|  | TRANSMISSION PLANT |  |  |
| 352 | STRUCTURES AND IMPROVEMENTS |  |  |
|  | MAJOR STRUCTURES |  | 765,786 |
|  | OTHER SMALL STRUCTURES |  | 178,364 |
|  | TOTAL ACCOUNT 352 | 939,025 | 944,150 |
| 353 | STATION EQUIPMENT | 14,691,516 | 13,880,536 |
| 354 | TOWERS AND FIXTURES | 936,862 | 918,720 |
| 355 | POLES AND FIXTURES | 1,261,924 | 1,136,124 |
| 356 | OVERHEAD CONDUCTORS AND DEVICES | 2,318,284 | 2,162,517 |
| 357 | UNDERGROUND CONDUIT | 1,488,616 | 1,417,497 |
| 358 | UNDERGROUND CONDUCTORS AND DEVICES | 2,868,165 | 2,704,095 |
| 359 | ROADS AND TRAILS | 179,274 | 180,127 |
|  | TOTAL TRANSMISSION PLANT | 24,683,665 | 23,343,766 |
|  | DISTRIBUTION PLANT |  |  |
| 361 | STRUCTURES AND IMPROVEMENTS |  |  |
|  | MAJOR STRUCTURES |  | 861,893 |
|  | OTHER SMALL STRUCTURES |  | 629,577 |
|  | TOTAL ACCOUNT 361 | 1,508,425 | 1,491,470 |
| 362 | STATION EQUIPMENT |  |  |
|  | COMPANY STATIONS |  | 9,797,162 |
|  | CUSTOMER HIGH TENSION |  | 873,036 |
|  | PORTABLE SUBSTATIONS |  | 117,274 |
|  | TOTAL ACCOUNT 362 | 12,411,765 | 10,787,472 |
| 364.1 | POLES, TOWERS AND FIXTURES | 14,839,015 | 13,216,858 |
| 365 | OVERHEAD CONDUCTORS AND DEVICES | 15,291,278 | 15,654,534 |
| 366 | UNDERGROUND CONDUIT | 2,042,629 | 2,025,845 |
| 367 | UNDERGROUND CONDUCTORS AND DEVICES | 11,027,633 | 12,215,533 |
| 368 | LINE TRANSFORMERS |  |  |
|  | OVERHEAD |  | 8,685,400 |
|  | CONVENTIONAL DISTRIBUTION |  | 2,399,964 |
|  | NETWORK |  | 2,650,171 |
|  | UNDERGROUND RESISTORS DISTRIBUTION |  | 1,229,257 |
|  | TOTAL ACCOUNT 368 | 13,636,212 | 14,964,792 |
| 369.2 | SERVICES | 3,063,041 | 1,716,372 |
| 370 | METERS AND SMART METERS | 12,087,344 | 11,521,346 |
| 370.1 | METERS - COMMUNICATION EQUIPMENT | 1,844 | 1,703 |
| 373 | STREET LIGHTING EQUIPMENT | 1,141,908 | 1,246,073 |
|  | TOTAL DISTRIBUTION PLANT | 87,051,094 | 84,841,998 |

$\frac{\text { DEPRECIABLE GROUP }}{(1)}$

## CALCULATED DEPRECIATION ACCRUALS

(2)

GENERAL PLANT
STRUCTURES AND IMPROVEMENTS

| MAJOR STRUCTURES | $3,846,897$ |
| :--- | ---: |
| OTHER SMALL STRUCTURES | 154,950 |

MALL STRUC
TOTAL ACCOUNT 390
OFFICE FURNITURE AND EQUIPMENT
OFFICE FURNITURE
E.D.P EQUIPMENT

TOTAL ACCOUNT 391

TRANSPORTATION EQUIPMENT STORES EQUIPMENT

59,697
TOOLS, SHOP AND GARAGE EQUIPMENT
LABORATORY EQUIPMENT
POWER OPERATED EQUIPMENT
COMMUNICATION EQUIPMENT
MISCELLANEOUS EQUIPMENT

TOTAL GENERAL PLANT

| 4,276,635 | 4,001,847 |
| :---: | :---: |
| 308,441 | 285,804 |
| 4,718,194 | 4,578,516 |
| 5,026,634 | 4,864,320 |
| * |  |
| 59,697 | 53,169 |
| 1,041,522 | 1,112,530 |
| 106,308 | 94,309 |
| * | * |
| 5,546,561 | 4,780,374 |
| 11,478 | 13,018 |
| 16,068,836 | 14,919,567 |
| 127,803,594 | 123,105,331 |

*Annual Accrual is charged on a vehicle by vehicle basis.

## COMPARISON OF CALCULATED AND BOOK

 DEPRECIATION ACCRUALS AS OF DECEMBER 31, 2021| DEPRECIABLE GROUP | CALCULATED DEPRECIATION ACCRUALS | BOOK DEPRECIATION ACCRUALS |
| :---: | :---: | :---: |
| (1) | (2) | (3) |
| DEPRECIABLE PLANT |  |  |
| TRANSMISSION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES |  | 888,814 |
| OTHER SMALL STRUCTURES |  | 182,860 |
| TOTAL ACCOUNT 352 | 975,139 | 1,071,674 |
| STATION EQUIPMENT | 14,794,479 | 16,122,157 |
| TOWERS AND FIXTURES | 905,798 | 902,499 |
| POLES AND FIXTURES | 1,114,898 | 1,082,208 |
| OVERHEAD CONDUCTORS AND DEVICES | 2,086,701 | 1,974,575 |
| UNDERGROUND CONDUIT | 1,433,695 | 1,444,059 |
| UNDERGROUND CONDUCTORS AND DEVICES | 2,728,147 | 2,740,408 |
| ROADS AND TRAILS | 180,292 | 179,838 |
| TOTAL TRANSMISSION PLANT | 24,219,149 | 25,517,418 |
| DISTRIBUTION PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES |  | 870,449 |
| OTHER SMALL STRUCTURES |  | 627,354 |
| TOTAL ACCOUNT 361 | 1,499,427 | 1,497,803 |
| STATION EQUIPMENT |  |  |
| COMPANY STATIONS |  | 10,454,411 |
| CUSTOMER HIGH TENSION |  | 998,015 |
| PORTABLE SUBSTATIONS |  | 195,531 |
| TOTAL ACCOUNT 362 | 11,072,872 | 11,647,957 |
| POLES, TOWERS AND FIXTURES | 13,253,478 | 12,630,413 |
| OVERHEAD CONDUCTORS AND DEVICES | 16,046,077 | 16,162,272 |
| UNDERGROUND CONDUIT | 2,370,810 | 2,752,492 |
| UNDERGROUND CONDUCTORS AND DEVICES | 12,338,017 | 12,152,207 |
| LINE TRANSFORMERS |  |  |
| OVERHEAD |  | 9,493,381 |
| CONVENTIONAL DISTRIBUTION |  | 2,596,004 |
| NETWORK |  | 2,930,097 |
| UNDERGROUND RESISTORS DISTRIBUTION |  | 1,367,218 |
| TOTAL ACCOUNT 368 | 15,583,995 | 16,386,700 |
| SERVICES | 1,786,553 | 2,179,865 |
| METERS AND SMART METERS | 11,654,869 | 10,962,876 |
| METERS - COMMUNICATION EQUIPMENT | 852 | 0 |
| STREET LIGHTING EQUIPMENT | 1,254,804 | 1,255,027 |
| TOTAL DISTRIBUTION PLANT | 86,861,754 | 87,627,612 |

DUQUESNE LIGHT COMPANY
COMPARISON OF CALCULATED AND BOOK DEPRECIATION ACCRUALS AS OF DECEMBER 31, 2021

| DEPRECIABLE GROUP | CALCULATED DEPRECIATION ACCRUALS | BOOK DEPRECIATION ACCRUALS |
| :---: | :---: | :---: |
| (1) | (2) | (3) |
| GENERAL PLANT |  |  |
| STRUCTURES AND IMPROVEMENTS |  |  |
| MAJOR STRUCTURES |  | 4,856,963 |
| EV CHARGING STATIONS |  | 166,567 |
| OTHER SMALL STRUCTURES |  | 156,569 |
| TOTAL ACCOUNT 390 | 4,302,115 | 5,180,099 |
| OFFICE FURNITURE AND EQUIPMENT |  |  |
| OFFICE FURNITURE | 261,880 | 266,283 |
| E.D.P EQUIPMENT | 5,612,177 | 7,360,249 |
| TOTAL ACCOUNT 391 | 5,874,057 | 7,626,532 |
| TRANSPORTATION EQUIPMENT | * | * |
| STORES EQUIPMENT | 49,201 | 45,966 |
| TOOLS, SHOP AND GARAGE EQUIPMENT | 1,126,457 | 1,139,222 |
| LABORATORY EQUIPMENT | 93,369 | 92,680 |
| POWER OPERATED EQUIPMENT | * | * |
| COMMUNICATION EQUIPMENT | 4,678,951 | 4,741,288 |
| MISCELLANEOUS EQUIPMENT | 13,019 | 11,496 |
| TOTAL GENERAL PLANT | 16,137,169 | 18,837,283 |
| TOTAL DEPRECIABLE PLANT | 127,218,072 | 131,982,313 |

*Annual Accrual is charged on a vehicle by vehicle basis.

## COMPARISON OF CALCULATED AND BOOK

 DEPRECIATION ACCRUALS AS OF DECEMBER 31, 2022

## DUQUESNE LIGHT COMPANY

## COMPARISON OF CALCULATED AND BOOK

## DEPRECIATION ACCRUALS AS OF DECEMBER 31, 2022

## DEPRECIABLE GROUP

(1)

CALCULATED DEPRECIATION ACCRUALS
(2)

BOOK
DEPRECIATION ACCRUALS
(3)
GENERAL PLANT
STRUCTURES AND IMPROVEMENTS
MAJOR STRUCTURES ..... 5,093,958
EV CHARGING STATIONS ..... 323,128
OTHER SMALL STRUCTURES ..... 160,527TOTAL ACCOUNT 3905,362,2635,577,613
OFFICE FURNITURE AND EQUIPMENTOFFICE FURNITURE 266,196
E.D.P EQUIPMENTTOTAL ACCOUNT 3917,817,3286,1968,083,464 8,539,273
TRANSPORTATION EQUIPMENTSTORES EQUIPMENT45,96645,981
TOOLS, SHOP AND GARAGE EQUIPMENT 1,167,091LABORATORY EQUIPMENT90,681POWER OPERATED EQUIPMENT-90,6814,748,0464,755,743
MISCELLANEOUS EQUIPMENT 9,559 ..... 7,625
TOTAL GENERAL PLANT19,507,07020,210,462
TOTAL DEPRECIABLE PLANT135,154,431136,975,478

[^13]Q. Supply a schedule by account or by depreciable group showing the survivor curve or interim survivor curve and annual accrual rate estimated to be appropriate:
a) For the purpose of this filing.
b) For the purpose of the most recent rate filing prior to the current proceeding.
c) Supply an explanation for any major change in annual accrual rate by account or by depreciable group.
d) Supply a comprehensive statement of major changes made in depreciation methods, procedures and techniques and the effect of the changes upon accumulated and annual depreciation, if any.
A. a) Attachment V-B-2, columns 4 \& 5, provides Duquesne Light Company's survivor curve and annual estimated accrual rate for the future and fully projected future test years.
b) Attachment V-B-2, columns 2 \& 3, provides Duquesne Light Company's survivor curve and annual estimated accrual rate for the most recent filing with the Commission.
c) Attachment V-B-2, column 6, provides an explanation for any change in annual accrual rate by account. Changes reflect plant and reserve activity, life characteristics and amortization of certain accounts.
d) The depreciation methods and procedures used in this filing are the same as those used in the previous filing. The survivor curve estimates are based on a service life study as described in Exhibit JJS 2 in the section titled, "Service Life Statistics," beginning on page VI-2.

DUQUESNE LIGHT COMPANY
COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE AS OF DECEMBER 31, 2021

|  | DEPRECIABLE GROUP | MOST RECENT FILING |  | CURRENT FILING |  | REASON FOR ACTUAL CHANGE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) | (6) |
|  | DEPRECIABLE PLANT |  |  |  |  |  |
|  | TRANSMISSION PLANT |  |  |  |  |  |
| 352 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 60-R3 | 3.19 | 65-R3 | 3.21 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.44 | 45-R3 | 2.40 | c |
| 353 | STATION EQUIPMENT | 39-S0 | 3.23 | 38-S0 | 3.30 | a |
| 354 | TOWERS AND FIXTURES | 75-R3 | 1.32 | 80-R3 | 1.18 | a |
| 355 | POLES AND FIXTURES | 52-R2.5 | 2.17 | 55-R3 | 1.90 | a |
| 356 | OVERHEAD CONDUCTORS AND DEVICES | 60-R3 | 1.75 | 65-R3 | 1.52 | a |
| 357 | UNDERGROUND CONDUIT | 60-S3 | 1.79 | 60-S3 | 1.74 | c |
| 358 | UNDERGROUND CONDUCTORS AND DEVICES | 58-R3 | 1.94 | 60-R3 | 1.82 | a |
| 359 | ROADS AND TRAILS | 60-R4 | 1.76 | 60-R4 | 1.77 | c |
|  | DISTRIBUTION PLANT |  |  |  |  |  |
| 361 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 70-R2.5 | 2.83 | 70-R3 | 2.15 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.13 | 45-R3 | 2.05 | c |
| 362 | STATION EQUIPMENT |  |  |  |  |  |
|  | COMPANY STATIONS | 52-R1 | 2.25 | 55-R1 | 2.16 | a |
|  | CUSTOMER HIGH TENSION | 42-R0.5 | 2.67 | 45-R0.5 | 2.53 | a |
|  | PORTABLE SUBSTATIONS | 42-R0.5 | 3.04 | 45-R0.5 | 3.29 | a |
| 364.1 | POLES, TOWERS AND FIXTURES | 54-S0 | 2.15 | 58-R1 | 2.11 | a |
| 365 | OVERHEAD CONDUCTORS AND DEVICES | 48-R1 | 2.61 | 50-R0.5 | 2.68 | a |
| 366 | UNDERGROUND CONDUIT | 75-R4 | 1.40 | 75-R4 | 1.40 | c |
| 367 | UNDERGROUND CONDUCTORS AND DEVICES | 48-R1.5 | 2.53 | 45-R1.5 | 2.74 | a |

DUQUESNE LIGHT COMPANY
COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE AS OF DECEMBER 31, 2021

|  | DEPRECIABLE GROUP | MOST RECENT FILING CURVE RATE |  | CURRENT FILING CURVE <br> RATE |  | REASON FORACTUAL CHANGE$(6)$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) |  |
| 368 | LINE TRANSFORMERS |  |  |  |  |  |
|  | OVERHEAD | 40-S0 | 3.15 | 39-S0 | 3.35 | a |
|  | CONVENTIONAL DISTRIBUTION | 46-R0.5 | 3.12 | 45-R0.5 | 3.15 | a |
|  | NETWORK | 44-R1 | 3.14 | 30-L0 | 4.81 | a |
|  | UNDERGROUND RESISTORS DISTRIBUTION | 40-R1.5 | 3.22 | 40-R1.5 | 3.26 | c |
| 369.2 | SERVICES | 65-R1.5 | 1.85 | 65-R1.5 | 1.96 | c |
| 370 | METERS | 30-R2.5 | ** |  |  | a |
| 370.1 | METERS - COMMUNICATION EQUIPMENT | 10-S3 | 5.19 | 10-S4 |  | a |
| 370.2 | SMART METERS | 15-S2.5 | 7.69 | 18-S0 | 7.51 | a |
| 370.3 | SMART METERS - POLYPHASE | 15-S2.5 | 7.77 | 18-S0 | 7.51 | a |
| 373 | STREET LIGHTING EQUIPMENT | 31-L0 | 2.40 | 30-L0 | 2.86 | a |
|  | GENERAL PLANT |  |  |  |  |  |
| 390 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 55-S0.5 | 3.25 | 58-R2 | 3.05 | a |
|  | EV CHARGING STATIONS |  |  | 10-L3 | 12.00 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.59 | 45-R3 | 2.41 | c |
| 391 | OFFICE FURNITURE AND EQUIPMENT |  |  |  |  |  |
|  | OFFICE FURNITURE | 20-SQ | 5.01 | 20-SQ | 5.00 | b |
|  | E.D.P EQUIPMENT | 5-SQ | 19.17 | 5-SQ | 20.00 | b |

DUQUESNE LIGHT COMPANY
COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE
AS OF DECEMBER 31, 2021

|  | DEPRECIABLE GROUP | MOST RECENT FILING CURVE RATE |  | CURRENT FILING CURVE RATE |  | REASON FOR ACTUAL CHANGE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) | (6) |
| 392 | TRANSPORTATION EQUIPMENT |  | * |  | * |  |
| 393 | STORES EQUIPMENT | 30-SQ | 3.36 | 30-SQ | 3.33 | b |
| 394 | TOOLS, SHOP AND GARAGE EQUIPMENT | 25-SQ | 4.00 | 25-SQ | 4.00 | b |
| 395 | LABORATORY EQUIPMENT | 20-SQ | 4.56 | 20-SQ | 5.00 | b |
| 396 | POWER OPERATED EQUIPMENT |  | * |  | * |  |
| 397 | COMMUNICATION EQUIPMENT | 15-SQ | 6.57 | 15-SQ | 6.67 | b |
| 398 | MISCELLANEOUS EQUIPMENT | 20-SQ | 4.99 | 20-SQ | 5.00 | b |
|  | *Annual Accrual is charged on a vehicle by vehicle basis. <br> ** No rate established. Expense based on remaining life of meter program. |  |  |  |  |  |
|  | LEGEND: <br> a - NEW LIFE STUDY CHARACTERISTICS <br> b - AMORTIZATION ACCOUNT <br> c - PLANT AND RESERVE ACTIVITY |  |  |  |  |  |

## DUQUESNE LIGHT COMPANY

COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE AS OF DECEMBER 31, 2022

|  | DEPRECIABLE GROUP | MOST RECENT FILING |  | CURRENT FILING |  | REASON FOR ACTUAL CHANGE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) | (6) |
|  | DEPRECIABLE PLANT |  |  |  |  |  |
|  | TRANSMISSION PLANT |  |  |  |  |  |
| 352 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 60-R3 | 3.27 | 65-R3 | 3.18 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.46 | 45-R3 | 2.38 | c |
| 353 | STATION EQUIPMENT | 39-S0 | 3.16 | 38-S0 | 3.26 | a |
| 354 | TOWERS AND FIXTURES | 75-R3 | 1.32 | 80-R3 | 1.20 | a |
| 355 | POLES AND FIXTURES | 52-R2.5 | 2.14 | 55-R3 | 1.93 | a |
| 356 | OVERHEAD CONDUCTORS AND DEVICES | 60-R3 | 1.74 | 65-R3 | 1.63 | a |
| 357 | UNDERGROUND CONDUIT | 60-S3 | 1.77 | 60-S3 | 1.73 | c |
| 358 | UNDERGROUND CONDUCTORS AND DEVICES | 58-R3 | 1.92 | 60-R3 | 1.83 | a |
| 359 | ROADS AND TRAILS | 60-R4 | 1.76 | 60-R4 | 1.77 | c |
|  | DISTRIBUTION PLANT |  |  |  |  |  |
| 361 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 70-R2.5 | 2.82 | 70-R3 | 2.37 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.10 | 45-R3 | 2.06 | c |
| 362 | STATION EQUIPMENT |  |  |  |  |  |
|  | COMPANY STATIONS | 52-R1 | 2.32 | 55-R1 | 2.09 | a |
|  | CUSTOMER HIGH TENSION | 42-R0.5 | 2.95 | 45-R0.5 | 2.46 | a |
|  | PORTABLE SUBSTATIONS | 42-R0.5 | 2.96 | 45-R0.5 | 2.95 | a |
| 364.1 | POLES, TOWERS AND FIXTURES | 54-S0 | 2.20 | 58-R1 | 2.12 | a |
| 365 | OVERHEAD CONDUCTORS AND DEVICES | 48-R1 | 2.59 | 50-R0.5 | 2.65 | a |
| 366 | UNDERGROUND CONDUIT | 75-R4 | 1.40 | 75-R4 | 1.40 | c |
| 367 | UNDERGROUND CONDUCTORS AND DEVICES | 48-R1.5 | 2.50 | 45-R1.5 | 2.72 | a |

DUQUESNE LIGHT COMPANY
COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE AS OF DECEMBER 31, 2022

|  | DEPRECIABLE GROUP | MOST RECENT FILING CURVE RATE |  | CURRENT FILING CURVE <br> RATE |  | REASON FOR ACTUAL CHANGE (6) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) |  |
| 368 | LINE TRANSFORMERS |  |  |  |  |  |
|  | OVERHEAD | 40-S0 | 3.16 | 39-S0 | 3.32 | a |
|  | CONVENTIONAL DISTRIBUTION | 46-R0.5 | 3.17 | 45-R0.5 | 3.09 | a |
|  | NETWORK | 44-R1 | 3.17 | 30-L0 | 4.72 | a |
|  | UNDERGROUND RESISTORS DISTRIBUTION | 40-R1.5 | 3.26 | 40-R1.5 | 3.22 | c |
| 369.2 | SERVICES | 65-R1.5 | 1.99 | 65-R1.5 | 2.09 | c |
| 370 | METERS | 30-R2.5 | ** |  |  | a |
| 370.1 | METERS - COMMUNICATION EQUIPMENT | 10-S3 | 4.05 | 10-S4 |  | a |
| 370.2 | SMART METERS | 15-S2.5 | 7.61 | 18-S0 | 7.02 | a |
| 370.3 | SMART METERS - POLYPHASE | 15-S2.5 | 7.75 | 18-S0 | 7.02 | a |
| 373 | STREET LIGHTING EQUIPMENT | 31-L0 | 2.32 | 30-L0 | 2.86 | a |
|  | GENERAL PLANT |  |  |  |  |  |
| 390 | STRUCTURES AND IMPROVEMENTS |  |  |  |  |  |
|  | MAJOR STRUCTURES | 55-S0.5 | 3.28 | 58-R2 | 3.07 | a |
|  | EV CHARGING STATIONS |  |  | 10-L3 | 11.64 | a |
|  | OTHER SMALL STRUCTURES | 45-R3 | 2.56 | 45-R3 | 2.39 | c |
| 391 | OFFICE FURNITURE AND EQUIPMENT |  |  |  |  |  |
|  | OFFICE FURNITURE | 20-SQ | 4.73 | 20-SQ | 5.00 | b |
|  | E.D.P EQUIPMENT | 5-SQ | 19.40 | 5-SQ | 20.00 | b |

DUQUESNE LIGHT COMPANY

## COMPARISON OF EXISTING SURVIVOR CURVE AND DEPRECIATION RATE

 AS OF DECEMBER 31, 2022|  | DEPRECIABLE GROUP | MOST RECENT FILING CURVE RATE |  | CURRENT FILING CURVE RATE |  | REASON FOR ACTUAL CHANGE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | (1) | (2) | (3) | (4) | (5) | (6) |
| 392 | TRANSPORTATION EQUIPMENT |  | * |  | * |  |
| 393 | STORES EQUIPMENT | 30-SQ | 3.29 | 30-SQ | 3.33 | b |
| 394 | TOOLS, SHOP AND GARAGE EQUIPMENT | 25-SQ | 4.02 | 25-SQ | 4.00 | b |
| 395 | LABORATORY EQUIPMENT | 20-SQ | 4.77 | 20-SQ | 5.00 | b |
| 396 | POWER OPERATED EQUIPMENT |  | * |  | * |  |
| 397 | COMMUNICATION EQUIPMENT | 15-SQ | 6.29 | 15-SQ | 6.67 | b |
| 398 | MISCELLANEOUS EQUIPMENT | 20-SQ | 4.05 | 20-SQ | 5.00 | b |
| *Annual Accrual is charged on a vehicle by vehicle basis. <br> ${ }^{* *}$ No rate established. Expense based on remaining life of meter program. |  |  |  |  |  |  |
|  | LEGEND: <br> a - NEW LIFE STUDY CHARACTERISTICS <br> b - AMORTIZATION ACCOUNT <br> c - PLANT AND RESERVE ACTIVITY |  |  |  |  |  |

Q. Where the retirement rate actuarial method of mortality analysis is utilized, set forth representative examples including charts depicting the observed and estimated survivor curves and a tabular presentation of the observed and estimated life tables plotted on the chart. Other analysis results shall be subject to request.
A. Exhibit JJS-2 provides the observed and estimated survivor curves and life tables for all accounts analyzed by the actuarial method in Part VI of Exhibit JJS-2.
Q. Provide the surviving original cost plant at the appropriate test year date or dates by account or functional property group and include claimed depreciation reserves. Provide annual depreciation accruals where appropriate. These calculations should be provided for plant in service as well as other categories of plant, including but not limited to, contributions in aid of construction, customers' advances for construction, and anticipated retirements associated with construction work in progress claims, if applicable.
A. Exhibit JJS-1, Exhibit JJS-2 and Exhibit JJS-3 provides Duquesne Light Company's surviving original cost electric plant in service, accumulated book depreciation reserve, annual depreciation expense accruals, survivor curve, future depreciation accruals, and composite remaining life by test year date. No claim is being made in this rate case filing for contributions in aid of construction. No claim is being made in this rate case for customer advances for construction. No claim is being made in this rate case filing for construction work in progress.
Q. Provide representative examples of detail calculations by vintage at account or at a more detailed level, as performed for these purposes. Other vintage detail calculations shall be subject to request.
A. Examples of detailed depreciation calculations by vintage within account as of December 31, 2020 are set forth on pages II-7 through II-94 of Exhibit JJS 1; as of December 31, 2021 are set forth on pages VII-7 through VII-91 of Exhibit JJS 2; and as of December 31, 2022 are set forth on pages II-7 through II-92 of Exhibit JJS 3.
Q. Provide a description of the depreciation methods utilized in calculating annual depreciation amounts and depreciation reserves, together with a discussion of the significant factors which were considered in arriving at estimates of service life and forecast retirements by facilities, accounts or sub-accounts, as applicable.
A. The depreciation methods utilized in calculating annual and accrued depreciation are discussed in the section titled, "Calculation of Annual and Accrued Depreciation," beginning on page IV-2 of Exhibit JJS 2.
Q.1. Provide the following unadjusted detailed schedules by function and by FERC account for the claimed test year and for each of the 3 preceding comparable years:
a. Balance sheet, in the form available.
b. Statement of income.
c. Plant in service.
d. Accumulated depreciation.
A.1. See below:
a. Attachment VI-A provides Duquesne Light Company's fully projected balance sheet by FERC account as of December 31, 2022, Duquesne Light Company's projected balance sheet by FERC account as of December 31, 2021, and actual balance sheets by FERC account as of December 31, 2020, 2019 and 2018.
b. Attachment VI-B provides Duquesne Light Company's fully projected income statement by FERC account for the year ending December 31, 2022, Duquesne Light Company's projected income statement by FERC account for the year ending December 31, 2021 and actual income statements by FERC account for the years ended March 31, 2020, 2019, and 2018.
c. Attachment VI-C provides Duquesne Light Company's fully projected plant in service balances by FERC account for the year ending December 31, 2022, Duquesne Light Company's projected plant in service balances by FERC account for the year ending December 31, 2021 and actual plant in service balances by FERC account for the years ended December 31, 2020, 2019 and 2018.
d. Attachment VI-D provides Duquesne Light Company's fully projected accumulated depreciation and accumulated amortization by FERC account as of December 31, 2022, Duquesne Light Company's projected accumulated depreciation and accumulated amortization by FERC account as of December 31, 2021 and actual accumulated depreciation and accumulated amortization by FERC account as of December 31, 2020, 2019 and 2018.

|  | DUQUESNE LIGHT COMPANY <br> BALANCE SHEET <br> As of December 31, |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2018 |  | 2019 |  | 2020 |  | $\begin{gathered} \text { Projected } \\ 2021 \\ \hline \end{gathered}$ |  | $\begin{gathered} \text { Fully Projected } \\ 2022 \\ \hline \end{gathered}$ |  |
| ASSETS AND OTHER DEBITS |  |  |  |  |  |  |  |  |  |  |
| UTILITY PLANT |  |  |  |  |  |  |  |  |  |  |
| Utility Plant (101-106) | \$ | 4,350,110,340 | \$ | 4,568,556,308 | \$ | 4,788,761,824 | \$ | 5,079,664,000 | \$ | 5,300,439,000 |
| Construction Work In Progress (107) |  | 153,933,731 |  | 209,342,295 |  | 273,189,584 |  | 339,859,000 |  | 398,348,000 |
| Total Utility Plant |  | 4,504,044,071 |  | 4,777,898,603 |  | 5,061,951,408 |  | 5,419,523,000 |  | 5,698,787,000 |
| Accum. Prov. For Depr. Amort. Depl (108, 110, 111, 115) |  | $(1,370,097,577)$ |  | $(1,458,074,185)$ |  | $(1,561,803,649)$ |  | $(1,687,490,000)$ |  | $(1,802,328,000)$ |
| Net Utility Plant |  | 3,133,946,494 |  | 3,319,824,418 |  | 3,500,147,759 |  | 3,732,033,000 |  | 3,896,459,000 |
| OTHER PROPERTY AND INVESTMENTS |  |  |  |  |  |  |  |  |  |  |
| Nonutility Property (121) |  | 5,314,068 |  | 6,597,860 |  | 8,974,678 |  | 8,974,678 |  | 10,374,678 |
| Accum. Prov. For Depr. And Amort. (122) |  | $(599,946)$ |  | $(1,066,586)$ |  | $(2,165,142)$ |  | $(3,617,678)$ |  | $(4,617,678)$ |
| Investments in Subsidiary Company (123.1) |  | - |  | - |  | - |  | - |  | - |
| Other Investments (124) |  | 249,679 |  | 249,586 |  | 248,313 |  | 247,000 |  | 247,000 |
| Other Special Funds (128) |  | 454,000 |  | - |  | - |  | - |  | - |
| Special Funds (129) |  | - |  | - |  | - |  | - |  | - |
| Long-Term Portion of Derivative Assets (175.1) |  | - |  | - |  | - |  | - |  | - |
| Total Other Property and Investments |  | 5,417,801 |  | 5,780,860 |  | 7,057,849 |  | 5,604,000 |  | 6,004,000 |
| CURRENT AND ACCRUED ASSETS |  |  |  |  |  |  |  |  |  |  |
| Cash (131) |  | 3,463,823 |  | 2,781,400 |  | 6,146,072 |  | 9,400,000 |  | 6,100,000 |
| Special Deposits (132-134) |  | - |  | - |  | - |  | - |  | - |
| Working Funds (135) |  | 10,000 |  | 10,000 |  | 10,000 |  | 10,000 |  | 10,000 |
| Temporary Cash Investments (136) |  | 11,100,000 |  | 3,900,000 |  | 3,000,000 |  | - |  | - |
| Customer Accounts Receivable (142) |  | 141,716,614 |  | 144,703,084 |  | 173,360,024 |  | 155,470,146 |  | 156,547,998 |
| Other Accounts Receivable (143) |  | 11,167,528 |  | 5,526,726 |  | 12,796,628 |  | 9,862,676 |  | 9,931,052 |
| Accum. Prov. For Uncollectible Acct. - Credit (144) |  | $(16,934,568)$ |  | $(17,768,234)$ |  | $(29,692,266)$ |  | $(21,500,599)$ |  | (21,649,659) |
| Accounts Receivable Assoc. Comp. (146) |  | 309,088 |  | 700,044 |  | 622,060 |  | 552,777 |  | 556,609 |
| Plant Materials \& Operating Supplies (154) |  | 28,091,522 |  | 32,114,687 |  | 34,246,080 |  | 25,810,580 |  | 25,050,161 |
| Stores Expense Undistributed (163) |  | - |  | 255 |  | - |  | - |  | - |
| Prepayments (165) |  | 15,339,167 |  | 18,740,049 |  | 19,984,437 |  | 20,094,859 |  | 20,377,049 |
| Interest \& Dividends Receivable (171) |  | 21,304 |  | 12,415 |  | 281 |  | - |  | - |
| Miscellaneous Current and Accrued Assets (174) |  | - |  | - |  | - |  | - |  | - |
| Derivative Instrument Assets (175) |  | - |  | - |  | - |  | - |  | - |
| (Less) Long-Term Portion of Derivative Assets (175.1) |  | - |  | - |  | - |  | - |  | - |
| Total Current and Accrued Assets |  | 194,284,478 |  | 190,720,426 |  | 220,473,316 |  | 199,700,439 |  | 196,923,210 |
| DEFERRED DEBITS |  |  |  |  |  |  |  |  |  |  |
| Unamortized Debt Expense (181) |  | 6,643,508 |  | 7,050,179 |  | 7,720,013 |  | 7,122,149 |  | 6,553,393 |
| Other Regulatory Assets (182.3) |  | 239,515,108 |  | 222,043,872 |  | 198,833,920 |  | 255,000,000 |  | 252,804,000 |
| Clearing Accounts (184) |  | - |  | - |  | - |  | - |  | - |
| Miscellaneous Deferred Debits (186) |  | 1,697,332 |  | 2,218,689 |  | 1,292,977 |  | 1,736,333 |  | 1,749,350 |
| Unamortized Loss on Reacquired Debt (189) |  | 21,299,541 |  | 19,261,949 |  | 17,228,393 |  | 15,188,307 |  | 13,150,715 |
| Accumulated Deferred Income Taxes (190) |  | 226,071,629 |  | 205,397,659 |  | 171,930,555 |  | 153,204,047 |  | 139,250,897 |
| Total Deferred Debits |  | 495,227,118 |  | 455,972,348 |  | 397,005,858 |  | 432,250,836 |  | 413,508,355 |
| TOTAL ASSETS | \$ | 3,828,875,891 | \$ | 3,972,298,052 | \$ | 4,124,684,782 | \$ | 4,369,588,275 | \$ | 4,512,894,565 |

## DUQUESNE LIGHT COMPANY <br> BALANCE SHEET <br> As of December 31

|  |  | Projected | Fully Projected |  |
| :---: | :---: | :---: | :---: | :---: |
| 2018 | 2019 | 2020 | 2021 | 2022 |

## LIABILITIES AND OTHER CREIDTS

PROPRIETY CAPITAL
Common Stock Issued (201)
Preferred Stock Issued (204)
Premium on Capital Stock (207)
Other Paid-in-Capital (208-211)
Capital Stock Expense (214)
Retained Earnings ( $215,215.2,216$ )
Unappropriated Undistributed Subsidiary Earnings (216.1)
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Total Propriety Capital

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Advances from Associated Companies (223)
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Unamortized Discount on Long-Term Debt-Debit (226) Total Long-term Debt

OTHER NON-CURRENT LIABILITIES
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Accumulated Provision for Pensions and Benefits (228.3)
Accumulated Miscellaneous Operating Provisions (228.4)
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Accounts Payable (232)
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Accounts Payable to Associated Companies (234)
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Taxes Accrued (236)
Interest Accrued (237)
Dividends Declared (238)
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(Less) Long-Term Portion Of Derivative (244.1)
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Customer Advances for Construction (252)
Other Deferred Credits (253)
Other Regulatory Liabilities (254)
Accumulated Deferred Investment Tax Credit (255)
Unamortized Gain on Reacquired Debt (257)
Accum. Deferred Income Taxes-Other Property (282)
Accum. Deferred Income Taxes-Other (283) Total Other Deferred Credits

TOTAL LIABILITIES AND STOCKHOLDER EQUITY


|  | 15,923 |  | - |  | - - |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 117,728,314 |  | 108,548,018 |  | 86,318,788 |  | 72,116,821 |  | 58,326,566 |
|  | 178,781,762 |  | 129,683,321 |  | 102,228,509 |  | 99,653,290 |  | 92,201,276 |
|  | - |  | - |  | - |  | - |  | - |
|  | - |  | - |  | - |  | - |  | - |
|  | 666,506,988 |  | 674,111,257 |  | 679,684,837 |  | 675,431,641 |  | 671,093,350 |
|  | 99,448,306 |  | 108,326,415 |  | 98,936,614 |  | 98,936,614 |  | 98,936,614 |
|  | 1,062,481,293 |  | 1,020,669,011 |  | 967,168,748 |  | 946,138,366 |  | 920,557,806 |
|  |  |  |  |  |  |  |  |  |  |
| \$ | 3,828,875,891 | \$ | 3,972,298,052 | \$ | 4,124,684,782 | \$ | 4,369,588,275 | \$ | 4,512,894,565 |


DUQUESNE LIGHT COMPANY
Electric Plant in Service
As of December 31,

Description
Intangible Plant
301.0 Organizations
302.0 Franchises
303.0 Miscellaneous Intangible Plant
Subtotal Intangible
Transmission Plant:
350.0 Land and Land Rights
352.0 Structures and Improvements
353.0 Station Equipment
354.0 Towers and Fixtures
355.0 Poles and Fixtures
356.0 Overhead Conductors \& Devices
357.0 Underground Conduit
358.0 Underground Conduit \& Devices
359.0 Roads and Trails
Subtotal Transmission
Distribution Plant:
360.0 Land and Land Rights
361.0 Structures and Improvements
362.0 Station Equipment
364.0 Poles, Towers and Fixtures
365.0 Overhead Conductors and Devices
366.0 Underground Conduit
367.0 Underground Conductors and Devices
368.0 Line Transformers
369.0 OH \& UND Services
370.0 Meters \& Appurtences
373.0 Street Lighting
374.0 Asset Retirement Costs for Distribution Plant
Subtotal Distribution Plant
I

General Plant:
389.0 Land and Land Rights
390.1 Structures and Improvements
391.0 Office Furniture \& Equipment
392.0 Transportation Equipment
393.0 Stores Equipment
394.0 Tools, Shop and Garage Equipment
395.0 Laboratory Equipment
396.0 Power Operated Equipment
397.0 Communication Equipment
398.0 Miscellaneous Equipment

Subtotal General Plant
399.1 Asset Retirement Costs for General Plant

Total Electric Plant in Service
General Plant - Leasehold Improvements
390.2 Improvements Leased Property

Subtotal - General Plant - Leasehold Improvements
Total - Electric Plant in Service - Leasehold Improvements

|  |  | Projected | Fully Projected |  |
| :---: | :---: | :---: | :---: | :---: |
| 2018 | 2019 | 2020 | 2021 | 2022 |


| $\$$ | 103,416 | $\$$ | 100,275 | $\$$ | 100,275 | $\$$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 6,830 | 6,830 | 100,000 | $\$$ | 100,000 |  |  |
| $292,595,252$ | $325,545,117$ | 3,830 | 7,000 | 7,000 |  |  |
| $292,705,498$ | $325,652,222$ | $336,397,054$ | $388,778,000$ | $384,406,000$ |  |  |
|  |  |  | $388,885,000$ | $384,513,000$ |  |  |
|  |  |  |  |  |  |  |
|  | $14,131,170$ | $14,346,916$ | $14,383,936$ | $15,821,000$ | $15,821,000$ |  |
| $30,434,903$ | $33,363,560$ | $33,108,914$ | $35,315,000$ | $35,315,000$ |  |  |
| $405,705,669$ | $413,285,535$ | $432,945,261$ | $488,829,000$ | $507,572,000$ |  |  |
| $70,779,077$ | $70,427,761$ | $78,247,472$ | $76,590,000$ | $80,466,000$ |  |  |
| $54,883,248$ | $57,009,139$ | $59,118,434$ | $57,017,000$ | $68,214,000$ |  |  |
| $117,916,699$ | $119,654,883$ | $139,592,331$ | $129,659,000$ | $160,803,000$ |  |  |
| $80,764,819$ | $80,748,182$ | $80,848,763$ | $83,002,000$ | $83,002,000$ |  |  |
| $147,897,750$ | $147,899,602$ | $147,799,021$ | $150,359,000$ | $161,447,000$ |  |  |
| $9,278,115$ | $10,185,994$ | $10,185,994$ | $10,186,000$ | $10,186,000$ |  |  |
| $931,791,450$ | $946,921,572$ | $996,230,126$ | $1,046,778,000$ | $1,122,826,000$ |  |  |


|  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: |
| $21,456,750$ | $23,189,758$ | $23,189,758$ | $23,190,000$ | $23,190,000$ |
| $67,249,099$ | $70,053,677$ | $70,294,441$ | $71,091,000$ | $72,288,000$ |
| $469,758,019$ | $491,113,634$ | $504,800,450$ | $530,048,000$ | $536,936,000$ |
| $485,352,645$ | $532,980,731$ | $596,619,728$ | $597,387,000$ | $624,016,000$ |
| $510,731,431$ | $540,188,166$ | $576,572,529$ | $603,286,000$ | $629,457,000$ |
| $149,049,091$ | $145,979,445$ | $146,553,442$ | $197,042,000$ | $219,375,000$ |
| $401,241,803$ | $424,530,648$ | $437,016,514$ | $444,270,000$ | $460,253,000$ |
| $397,280,190$ | $412,053,244$ | $432,109,288$ | $468,538,000$ | $490,788,000$ |
| $98,590,117$ | $100,047,492$ | $102,586,464$ | $111,371,000$ | $114,962,000$ |
| $128,033,243$ | $135,504,897$ | $142,523,769$ | $145,983,000$ | $151,169,000$ |
| $42,160,468$ | $42,622,163$ | $43,252,189$ | $43,887,000$ | $44,730,000$ |
| 636,018 | 636,018 | $1,166,529$ | - | - |
| $2,771,538,874$ | $2,918,899,873$ | $3,076,685,101$ | $3,236,093,000$ | $3,367,164,000$ |


|  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: |
| $6,144,796$ | $6,144,796$ | $6,144,796$ | $6,145,000$ | $6,145,000$ |
| $132,804,001$ | $141,766,576$ | $144,184,325$ | $167,681,000$ | $177,314,000$ |
| $25,883,090$ | $29,118,743$ | $31,769,149$ | $43,320,000$ | $48,500,000$ |
| $60,364,590$ | $61,529,539$ | $66,957,578$ | $63,481,000$ | $65,323,000$ |
| $1,910,749$ | $1,676,780$ | $1,620,656$ | $1,379,000$ | $1,379,000$ |
| $22,187,853$ | $25,848,997$ | $27,832,805$ | $28,490,000$ | $29,795,000$ |
| $2,481,836$ | $2,158,596$ | $1,895,475$ | $1,854,000$ | $1,774,000$ |
| $3,684,681$ | $3,694,309$ | $3,582,341$ | $3,694,000$ | $3,694,000$ |
| $83,396,078$ | $83,854,531$ | $74,175,048$ | $71,134,000$ | $71,337,000$ |
| 370,175 | 230,016 | 230,016 | 230,000 | 175,000 |
| $339,227,849$ | $356,022,883$ | $358,392,189$ | $387,408,000$ | $405,436,000$ |


|  | 74,249 | 74,249 |  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  |  |  |  |  |  |  |  |


| $14,772,420$ | $20,985,509$ | $20,986,000$ | $20,500,000$ | $20,500,000$ |
| ---: | ---: | ---: | ---: | ---: |
| $14,772,420$ | $20,985,509$ | $20,986,000$ | $20,500,000$ | $20,500,000$ |
|  |  |  |  |  |
| $14,772,420$ | $20,985,509$ | $20,986,000$ | $20,500,000$ | $20,500,000$ |

## RECAP - Electric Plant in Service

## Intangible

Transmission
Distribution
Steam Production Plant
General Plant
Total - Electric Plant in Service

| $\$$ | $292,705,498$ | $\$$ | $325,652,222$ | $\$$ | $336,394,159$ | $\$$ | $388,885,000$ | $\$$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  | $931,791,450$ | $946,921,572$ |  | $996,230,126$ |  | $1,046,778,000$ | $1,122,826,000$ |  |
|  | $2,771,538,874$ |  | $2,918,899,873$ |  | $3,076,685,101$ |  | $3,236,093,000$ | $3,367,164,000$ |
|  | - | - | 74,249 | - | - |  |  |  |
|  | $354,074,518$ | $377,082,641$ |  | $379,378,189$ |  | $407,908,000$ | $425,936,000$ |  |
| $\$$ | $4,350,110,340$ | $\$$ | $4,568,556,308$ | $\$$ | $4,788,761,824$ | $\$$ | $5,079,664,000$ | $\$$ |


| DUQUESNE LIGHT COMPANY <br> Accumulated Depreciation As of December 31, |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2018 | 2019 | 2020 | $\begin{gathered} \text { Projected } \\ 2021 \\ \hline \end{gathered}$ | Fully Projected 2022 |
| Transmission Plant: |  |  |  |  |  |
| 350.0 Land and Land Rights | - | - | - | - | - |
| 352.0 Structures and Improvements | 8,403,344 | 9,288,842 | 10,163,660 | 11,135,000 | 12,223,000 |
| 353.0 Station Equipment | 119,918,236 | 131,746,360 | 141,953,715 | 147,896,000 | 158,590,000 |
| 354.0 Towers and Fixtures | 34,063,006 | 34,306,191 | 34,496,411 | 34,345,000 | 34,400,000 |
| 355.0 Poles and Fixtures | 12,493,854 | 13,712,046 | 14,950,006 | 16,066,000 | 17,199,000 |
| 356.0 Overhead Conductors \& Devices | 34,614,159 | 36,463,131 | 38,403,704 | 39,897,000 | 39,050,000 |
| 357.0 Underground Conduit | 29,099,172 | 30,586,145 | 32,075,461 | 33,558,000 | 35,003,000 |
| 358.0 Underground Conduit \& Devices | 26,082,176 | 28,853,063 | 31,721,229 | 34,449,000 | 37,024,000 |
| 359.0 Roads and Trails | 1,008,067 | 1,176,637 | 1,355,911 | 1,536,000 | 1,716,000 |
| Subtotal Transmission | 265,682,013 | 286,132,415 | 305,120,096 | 318,882,000 | 335,205,000 |
| Distribution Plant: |  |  |  |  |  |
| 360.0 Land and Land Rights | - | - | - | - | - |
| 361.0 Structures and Improvements | 38,590,714 | 39,953,030 | 41,357,320 | 42,712,000 | 44,027,000 |
| 362.0 Station Equipment | 160,329,570 | 168,825,734 | 175,564,193 | 179,163,000 | 189,703,000 |
| 364.0 Poles, Towers and Fixtures | 163,290,416 | 166,446,849 | 175,713,485 | 183,777,000 | 192,716,000 |
| 365.0 Overhead Conductors and Devices | 152,593,279 | 157,418,328 | 167,483,743 | 175,283,000 | 184,533,000 |
| 366.0 Underground Conduit | 48,435,415 | 50,354,370 | 52,161,554 | 51,775,000 | 53,228,000 |
| 367.0 Underground Conductors and Devices | 108,624,028 | 112,221,874 | 118,211,054 | 127,615,000 | 136,278,000 |
| 368.0 Line Transformers | 115,233,648 | 117,661,420 | 125,297,298 | 131,617,000 | 140,769,000 |
| 369.0 OH \& UND Services | 37,011,184 | 38,072,981 | 39,908,186 | 33,146,000 | 28,630,000 |
| 370.0 Meters \& Appurtences | $(295,390)$ | 8,490,145 | 20,532,435 | 31,971,000 | 42,906,000 |
| 373.0 Street Lighting | 25,667,401 | 25,034,921 | 24,870,208 | 25,364,000 | 25,853,000 |
| Subtotal Distribution Plant | 849,480,264 | 884,479,652 | 941,099,477 | 982,423,000 | 1,038,643,000 |
| General Plant: |  |  |  |  |  |
| 389.0 Land and Land Rights | - | - | - | - | - |
| 390.1 Structures and Improvements | 39,205,742 | 43,494,484 | 47,731,757 | 53,143,000 | 58,204,000 |
| 391.0 Office Furniture \& Equipment | 11,450,849 | 13,854,137 | 15,452,629 | 16,165,000 | 19,401,000 |
| 392.0 Transportation Equipment | 35,568,133 | 37,572,461 | 39,147,979 | 38,969,000 | 38,925,000 |
| 393.0 Stores Equipment | 1,205,923 | 1,035,320 | 831,767 | 839,000 | 879,000 |
| 394.0 Tools, Shop and Garage Equipment | 7,340,829 | 7,892,531 | 8,828,926 | 9,626,000 | 10,550,000 |
| 395.0 Laboratory Equipment | 1,221,096 | 1,020,162 | 863,348 | 910,000 | 930,000 |
| 396.0 Power Operated Equipment | 1,460,710 | 1,525,540 | 1,618,216 | 1,775,000 | 1,931,000 |
| 397.0 Communication Equipment | 40,097,027 | 39,760,027 | 35,030,129 | 33,292,000 | 36,089,000 |
| 398.0 Miscellaneous Equipment | 292,444 | 170,502 | 181,979 | 194,000 | 151,000 |
| Subtotal General Plant | 137,842,753 | 146,325,164 | 149,686,732 | 154,913,000 | 167,060,000 |
| Total Electric Plant in Service | 1,253,005,029 | 1,316,937,231 | 1,395,906,304 | 1,456,218,000 | 1,540,908,000 |
| Intangible Plant |  |  |  |  |  |
| 301.0 Organizations | Non-Depreciable | Non-Depreciable | Non-Depreciable | Non-Depreciable | Non-Depreciable |
| 302.0 Franchises | Non-Depreciable | Non-Depreciable | Non-Depreciable | Non-Depreciable | Non-Depreciable |
| 303.0 Miscellaneous Intangible Plant | 122,208,783 | 150,909,581 | 197,011,331 | 221,087,000 | 249,977,000 |
| Subtotal Intangible | 122,208,783 | 150,909,581 | 197,011,331 | 221,087,000 | 249,977,000 |
| General Plant - Leasehold Improvements |  |  |  |  |  |
| 390.2 Improvements Leased Property | 8,396,515 | 9,171,776 | 10,202,201 | 10,185,000 | 11,443,000 |
| Subtotal - General Plant - Leasehold Improvements | 8,396,515 | 9,171,776 | 10,202,201 | 10,185,000 | 11,443,000 |
| Total - Electric Plant in Service - Leasehold Improvements | 8,396,515 | 9,171,776 | 10,202,201 | 10,185,000 | 11,443,000 |
| RECAP - Electric Plant in Service |  |  |  |  |  |
| Intangible | 122,208,783 | 150,909,581 | 197,011,331 | 221,087,000 | 249,977,000 |
| Transmission | 265,682,013 | 286,132,415 | 305,120,096 | 318,882,000 | 335,205,000 |
| Distribution | 849,480,264 | 884,479,652 | 941,099,477 | 982,423,000 | 1,038,643,000 |
| General Plant | 146,239,268 | 155,496,941 | 159,888,933 | 165,098,000 | 178,503,000 |
| Total Accumulated Depreciation and Amortization | 1,383,610,327 | 1,477,018,588 | 1,603,119,836 | 1,687,490,000 | 1,802,328,000 |

Duquesne Light Company Docket No. R-2021-3024750

DLC Exhibit 2 - Fully Projected Future Test Year
(January 1, 2022 through December 31, 2022)
Summary of Measures of Value
\& Rate of Return
BOOK 5

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

Book 1
Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation
Book 4
Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

Book 5
Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022)

## Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021) Book 7

Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

Book 8
Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6-Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 - Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13-Paul R. Moul
Statement 14-James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
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Book 10

## Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies

Book 11

## Exhibit 7 - Depreciation Studies

Book 12

## Confidential Testimony and Exhibits


Exhibit 2 FPFTY 2022 4-8.21
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D_- (A151.L205)
D_3_P1 (A1..AB60)
D_5_P1 (A1..V60)
D-1, S-5, S-6isection D-1 Schedule 5A (A61..V120)
D-1, S-5, S.6.6ection D-1 Schedule 5A (A61..V120)
D_5B (A121..V180) D_58(A121..V180)
D_5 (A181..2230)
Separate File to be Added
D_6_p1 (A231..V290) _6_p2 (A291..V340)
-81. (A1.N45)
(A46. N900)


D 13 (A236 to. P280)
D 14 (A281..P315)
D15 (A316. P365)




 Duquesne Light Company Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER

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SCHEDULE
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# STATEMENT OF REASONS 

52 Pa . Code § 53.52(a)(1)

## INTRODUCTION

Duquesne Light Company ("Duquesne Light" or the "Company") is responsible for providing adequate, efficient, safe, and reliable electric service to its customers and must have the ability to raise capital to meet such requirements. The Company is allowed to charge just and reasonable rates as established by the Pennsylvania Public Utility Commission ("Commission") that provide the Company with a fair opportunity to recover its operating costs and earn a fair return on its investment. This is accomplished through a rate case process.

In this filing, Duquesne Light is requesting that the Commission approve an overall annual increase in distribution revenue of approximately $\$ 115.0$ million. Included in the requested increase is approximately $\$ 29.2$ million in revenue currently collected through one existing Commission approved surcharge, resulting in a net increase in distribution revenue of approximately $\$ 85.8$ million. If granted by the Commission as filed, this request would produce a system average increase in distribution rates of approximately 15.6 percent and an increase in total rates (distribution, transmission, and generation charges) of approximately 7.72 percent for a typical residential using 600 kilowatt-hours per month and taking default power service from the Company. The percentage increase in rates differs for each individual rate class.

## DUQUESNE LIGHT COMPANY'S COSTS

Duquesne Light has controlled its operation and maintenance expenses by implementing process improvements and deploying cost saving measures. Nevertheless, the cost of providing electric distribution service has increased since the last distribution rate increase in December 2018. Significant cost increases have occurred in many areas, including increased investment in facilities to maintain high levels of service and reliability, increased investment in information technology, increased operation and maintenance expenses to maintain safe and reliable service, including expenses associated with the Distribution System Improvement Charge Rider included in base rates, and the expenses associated with the development of an electrical model. In addition, the Company's estimated rate base at December 31, 2022 has increased by approximately $\$ 337$ million since the 2018 base rate proceeding.

## DUQUESNE LIGHT'S FINANCIAL CONDITION

Absent increases in rates, Duquesne Light's financial condition would continue to decline in the fully projected future test year due to continued capital expenditures, increased operating expenses, and a significant decline in customer sales. On a pro forma basis for the fully projected future test year, Duquesne Light anticipates an overall return on rate base of only $5.36 \%$ absent rate relief. These financial results do not provide a return that will permit the Company to attract new capital on reasonable terms. Revenues at present rates do not provide the Company the
opportunity to earn a fair return and simply do not provide sufficient funds for Duquesne Light to adequately operate its business, abide by federal and state requirements, and provide reliable electric service to its customers.

## RELIABLE ELECTRIC SERVICE

Duquesne Light has consistently provided its customers with service at reliability levels as measured by SAIDI and SAIFI that are at or near the top of the levels provided by all the major Pennsylvania electric distribution companies. Duquesne Light has increased efficiency and reliability through the use of technology, such as automated meter reading systems and automated control systems that continuously monitor remote switches that can be operated to reroute power during storms and other outages to quickly restore service to large blocks of customers. The Company also implemented a Long Term Infrastructure Improvement plan to address is ageing infrastructure and improve its reliability.

## CUSTOMER SERVICE

Duquesne Light has consistently provided high levels of customer service. The Company has implemented a series of programs, supported by technology and process improvements, to enhance the customer experience, including a payment arrangement portal, CAP ("Customer Assistance Program") redesign to a percentage of income payment, CAP enrollment automation, and a high bill advisory tool. In 2020, the Company was second lowest for needs further investigation (NFI) residential consumer complaints and in first contact resolution (FCR) statistics for residential and commercial segments compared to the other PA Electric Distribution Companies. Also, in 2020, the J.D. Power Business Electric Utility Customer Satisfaction survey indicated that Duquesne Light ranked third in its peer group (East Mid-size) with a score of 791, only 7 points out of first place.


Duquesne Light Company<br>Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022<br>(\$ in Thousands)

Balance Sheet


Line

PROPRIETARY CAPITAL
Common Stock Issued (201)
Preferred Stock Issued (204)
Premium on Capital Stock (207)
Other Paid-in-Capital (208-211)
Capital Stock Expense (214)
Retained Earnings (215, 215.2, 216, 261.1)
Accum Other Comprehensive Income (219)
Total Propriety Capital \& Margins
LONG TERM DEBT
Bonds (221)
Advances from Associated Companies (223)
Other Long-Term Debt (224)
Unamortized Premium on LTD (225)
Unamortized Discount on LTD (226)
Total Long-term Debt
OTHER NON-CURRENT LIABILITIES
Obligations under Capital Leases (227)
$\begin{array}{ll}\text { Accum. Prov for Injuries \& Damages (228.2) } & 4,580\end{array}$
Accum. Prov for Pensions \& Benefits (228.3) 68,657
Accum. Miscellaneous Operating Prov (228.4) 1,300
Long-Term Portion of Derivative Instrument Liabilities $\quad 1,433$
Total Long-term Debt
CURRENT \& ACCRUED LIABILITIES
Notes Payable (231)
Accounts Payable (232)
131,135
Notes Payable to Assoc. Companies (233) 10,997
Accounts Payable to Assoc. Cos (234)
Customer Deposits (235)
9,452
Taxes Accrued (236) 5,340
Interest Accrued (237) 19,206
Dividends Declared (238)
Tax Collections Payable (241) 858
Misc Current \& Accrued Liabilities (242) 45,183
Derivative Instrument Liabilities (244)
Less: Long Term Portion of Derivative Inst. Liab. Hedge Total Current \& Accrued Liabilities

OTHER DEFERRED CREDITS
Customer Advances for Construction (252)
Other Deferred Credits (253)
123,967
Other Regulatory Liabilities (254)
92,202
Deferred Investment Tax Credit (255)
Unamortized Gain on Reacquired Debt (257)
Accumulated Deferred Income Taxes (282)
Accumulated Deferred Income Taxes (283)
Total Other Deferred Credits
TOTAL LIABILITIES \& OTHER CREDITS

# Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 <br> (\$ in Thousands) 

| Schedule | B-2 |  |
| :---: | :---: | :---: |
| Witness: | Bachota |  |
| Page | 1 | of 1 |

Statement of Net Utility Operating Income
[1]
[2]

| $\begin{gathered} \text { Line } \\ \text { No } \\ \hline \end{gathered}$ | Description | Reference | Forecast FPFTY |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Total Operating Revenues |  |  |  |
| 1 | Total Sales Revenues | B-3 | \$ | 884,411 |
| 2 | Sales for Resale | B-3 |  | 1,560 |
| 3 | Other Operating Revenues | B-3 |  | 113,268 |
| 4 | Total Revenues | $L 1+L 2+L 3$ |  | 999,239 |
| Total Operating Expenses |  |  |  |  |
| 5 | Operation \& Maintenance Expenses | B-4 |  | 473,378 |
| 6 | Depreciation Expense | D-21 |  | 198,544 |
| 7 | Other Amortization | D-21 |  | 16,850 |
| 8 | Amortization of Regulatory Assets |  |  | - |
| 9 | Taxes Other Than Income Taxes | B-5 |  | 64,589 |
| 10 | Total Operating Expenses | Sum L 5 to L 9 |  | 753,361 |
| 11 | Operating Income Before Income Taxes (OIBIT) | L 4-L 10 |  | 245,878 |
| Income Taxes: |  |  |  |  |
| 12 | State | B-5 |  | 16,459 |
| 13 | Federal | B-5 |  | 28,091 |
| 14 | Total Income Taxes |  |  | 44,550 |
| 15 | Net Utility Operating Income | L 11 - L 14 | \$ | 201,328 |


| Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 <br> (\$ in Thousands) | Schedule <br> Witness: | B-3 <br> Bachota |
| :---: | :---: | :---: |
|  | Page | 1 |
| of 1 |  |  |


| Line <br> No | Description |  | Forecast FPFTY |  |
| :---: | :---: | :---: | :---: | :---: |
| Electric Operating Revenues |  |  |  |  |
| Sales of Electricity: |  |  |  |  |
| 1 | Distribution Revenue |  | \$ | 590,453 |
| 2 | Generation Revenue |  |  | 227,343 |
| 3 | Transmission Revenue |  |  | 66,615 |
| 4 | Total Sales to Ultimate Customers | $L 1+L 2+L 3$ |  | 884,411 |
| 5 | Sales for Resale/Account 447 |  |  | 1,560 |
| 6 | Total Sales Revenue | L $4+\mathrm{L} 5$ |  | 885,971 |
| Other Operating Revenues |  |  |  |  |
| Forfeited Discounts/Account 450: |  |  |  |  |
| 7 | Late Payment Charges |  |  | 3,916 |
| 8 | Returned Check Charges |  |  | - |
| 9 | Reconnect Fees |  |  | 707 |
| 10 | Total Account 450 | $L 7+L 8+L 9$ |  | 4,623 |
| 11 | Miscellaneous Service |  |  | 908 |
| 12 | DL Transmission Dispatch |  |  | 700 |
| Rent from Electric Property/Account 454: |  |  |  |  |
| 13 | Rent - Electric Property |  |  | 11,788 |
| 14 | Customer Work - |  |  | 319 |
| 15 | Pole Attachment |  |  | - |
| 16 | Total Account 454 | $L 13+L 14+L 15$ |  | 12,107 |
| Other Electric Revenues/Account 456: |  |  |  |  |
| 17 | Other Electric Revenues (456.01) |  |  | 684 |
| 18 | AES BV Partners - Transmission |  |  | - |
| 19 | Dominion Marketing Revenue |  |  | - |
| 20 | PHM DLCO Firm |  |  | - |
| 21 | Transmission-EGS |  |  | 89,713 |
| 22 | Transmission - Wholesale |  |  | 3,145 |
| 23 | Transmission - Tax Norm |  |  | 1,388 |
| 24 | Total Account 456 | Sum L 17 to L 23 |  | 94,930 |
| 25 | Total Other Operating Revenues | $L 10+L 11+: L 12+L 16+L 24$ |  | 113,268 |
| 26 | Total Operating Revenues | L6 + $\mathrm{L}^{2} 5$ | \$ | 999,239 |

# Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 <br> (\$ in Thousands) <br> Operation and Maintenance Expenses 

| Line No | Description | $\begin{aligned} & \text { Account } \\ & \text { No } \\ & \hline \end{aligned}$ | Forecast FPFTY |
| :---: | :---: | :---: | :---: |
| Purchased Power Expenses: |  |  |  |
| 1 | Purchased power | 555 | \$ |
| 2 | Other Power Supply Expense | 556 | 215,490 |
| 3 | Total Purchased Power Expenses | L1 + L 2 | 215,490 |
| Transmission Expense: |  |  |  |
| 4 | Operation Supervision \& Engineering | 560 | 1,202 |
| 5 | Load Dispatching | 561 | 678 |
| 6 | Station Expenses | 562 | 122 |
| 7 | Overhead Line Expenses | 563 | 492 |
| 8 | Underground Line Expenses | 564 | 211 |
| 9 | Transmission of Electricity by Others | 565 | - |
| 10 | Miscellaneous Transmission Expenses | 566 | 4,815 |
| 11 | Rents | 567 | - |
| 12 | Maintenance Supervision \& Engineering | 568 | 892 |
| 13 | Maintenance of Structures | 569 | 773 |
| 14 | Maintenance of Station Equipment | 570 | 1,889 |
| 15 | Overhead Lines | 571 | 860 |
| 16 | Underground Lines | 572 | 1 |
| 17 | Miscellaneous Maintenance \& Repair | 573 | 504 |
| 18 | Total Transmission Expenses | SumL 4 to L 17 | 12,439 |
| Distribution Expense: |  |  |  |
| 19 | Operation Supervision \& Engineering | 580 | 9,172 |
| 20 | Load Dispatching | 581 | 1,026 |
| 21 | Station Expenses | 582 | 345 |
| 22 | Overhead Line Expense | 583 | 532 |
| 23 | Underground Line Expense | 584 | 593 |
| 24 | Street Lighting \& Signal Systems | 585 | - |
| 25 | Meter Expenses | 586 | 3,958 |
| 26 | Customer Installations Expense | 587 | 2 |
| 27 | Miscellaneous Expenses | 588 | 10,146 |
| 28 | Rents | 589 | - |
| 29 | Total Distribution Operation Expenses | Sum L 19 to L 28 | 25,774 |
| 30 | Maintenance Supervision \& Engineering | 590 | (193) |
| 31 | Maintenance of Structures | 591 | 97 |
| 32 | Maintenance of Station Equipment | 592 | 2,609 |
| 33 | Maintenance of OH lines | 593 | 23,504 |
| 34 | Maintenance of Underground lines | 594 | 2,206 |
| 35 | Maintenance of Line Transformers | 595 | 28 |
| 36 | Maintenance of Street Lighting \& Signals | 596 | 543 |
| 37 | Maintenance of Meters | 597 | 382 |
| 38 | Maintenance of Miscellaneous Plant | 598 | 74 |
| 39 | Total Distribution Maintenance Expenses | Sum L 30 to L 38 | 29,250 |
| 40 | Total Distribution Expenses | L29 + L 39 | 55,023 |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
( $\$$ in Thousands)
Operation and Maintenance Expenses

| Schedule | B-4 |  |
| :---: | :--- | :--- |
| Witness: | Bachota |  |
| Page | 2 | of 2 |

[1]

| Line No | Description | $\begin{aligned} & \text { Account } \\ & \text { No } \\ & \hline \end{aligned}$ | Forecast FPFTY |
| :---: | :---: | :---: | :---: |
|  | Customer Accounting Expense: |  |  |
| 41 | Supervision | 901 | 12,806 |
| 42 | Customer Assistance | 902 | 335 |
| 43 | Records \& Collections | 903 | 681 |
| 44 | Uncollectible Accounts | 904 | 7,455 |
| 45 | Miscellaneous Expenses | 905 | - |
| 46 | Total Customer Accounts Expense | Sum L 41 to L 45 | 21,277 |
|  | Customer Services Expense: |  |  |
| 47 | Customer Service-Supervision | 907 | - |
| 48 | Customer Service-Customer Assistance | 908 | 30,509 |
| 49 | Customer Service-Information and Instruction | 909 | - |
| 50 | Customer Service-Miscellaneous Service \& Info | 910 | - |
| 51 | Total Customer Service \& Informational Expenses | Sum L 47 to L 50 | 30,509 |
|  | Sales Expense: |  |  |
| 52 | Supervision | 911 | - |
| 53 | Demonstration and Selling Expenses | 912 | - |
| 54 | Advertising Expenses | 913 | - |
| 55 | Miscellaneous Sales Expenses | 916 | - |
| 56 | Total Sales Expense | Sum L 52 to L 55 | - |
|  | Administrative \& General Expenses: |  |  |
| 57 | Administrative and General Salaries | 920 | 62,152 |
| 58 | Office Supplies and Expenses | 921 | 8,444 |
| 59 | Administrative Expenses Transferred - Credit | 922 | - |
| 60 | Outside Services Employed | 923 | 30,369 |
| 61 | Property Insurance | 924 | 6,676 |
| 62 | Injuries and Damages | 925 | 230 |
| 63 | Employee Pensions and Benefits | 926 | 6,004 |
| 64 | Regulatory Commission Expenses | 928 | 785 |
| 65 | Duplicate Charges - Credit Electric | 929 | - |
| 66 | General Advertising Expenses | 930.1 | - |
| 67 | Miscellaneous General Expenses | 930.2 | 7,837 |
| 68 | Rents | 931 | 3,925 |
| 69 | Total Operation | Sum L 57 to L 68 | 126,422 |
| 70 | Maintenance of General Plant | 935 | 12,217 |
| 71 | Total Administrative and General Expenses | L69 + L 70 | 138,639 |
| 72 | Total Operation \& Maintenance Expenses- | $\mathrm{L} 3+\mathrm{L} 18+\mathrm{L} 40+\mathrm{L} 46+\mathrm{L} 51+\mathrm{L} 56+\mathrm{L} 71$ | \$ 473,378 |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
(\$ in Thousands)
Detail of Taxes

Schedule B-5 Witness: Simpson Page 1 of 1

## Taxes Other Than Income Taxes

## Non-revenue related:

PA Real Estate Tax
\$ 665
Pennsylvania - PURTA 999
Capital Stock
Insurance Premiums
Miscellaneous Taxes
Subtotal
Sum L 1 to L 5
Payroll Taxes
FICA 7,066
SUTA 368
FUTA 61
City of Pittsburgh Subtotal $\quad$ SumL 7 to L $10 \quad 655$

## Revenue Related:

State Gross Receipts:
Pennsylvania
54,775
Total Taxes Other Than Income Taxe
Income Taxes
State
Federal
Total Income Taxes
$L 6+L 11+L 12$

| \$ 64,589 |
| :--- |


| $\$$ | 16,459 |
| :--- | ---: |
|  | 28,091 |
| $\$$ | 44,550 |



Schedule
Witness:
Page

| $\stackrel{\rightharpoonup}{\sim} \underset{\sim}{\sim}$ |  | $\begin{aligned} & \frac{t}{\infty} \\ & \stackrel{y}{0} \\ & \stackrel{N}{\sim} \\ & \infty \end{aligned}$ |  | N/ |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |
|  |  | m |  |  |


$\begin{array}{r}{[1]} \\ \quad \mathrm{Dec} \\ \hline 2021\end{array}$




|  | Capitalization Ratios |
| :--- | :--- |
| 5 | Long-Term Debt |
| 6 | Preferred Stock |
| 7 | Common Equity |
| 8 | Total |

[^14]| B-8 |
| :---: |
| Milligan/Moul |
| of 1 |
|  |
| [4] |
| Average |
| Weighted |
| Cost Rate |
|  |
|  |
| $0.62 \%$ |
| $0.52 \%$ |
| $0.15 \%$ |
| $0.28 \%$ |
| $0.25 \%$ |
| $0.51 \%$ |
| $0.41 \%$ |
| $0.15 \%$ |
| $0.15 \%$ |
| $0.33 \%$ |
| $0.41 \%$ |
| $0.34 \%$ |

 Duquesne Light Company
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
Measures of Value and Rate of Return





Duquesne Light Company
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
(\$ in Thousands)
Pro Forma Plant BY FERC Account

| Schedule |  | C-2 |
| :---: | :--- | :--- |
| Witness: |  | Bachota/O'Brien |
| Page | 2 | of 4 |

[1]

| Line |
| :--- |
| No Description |

Intangible Plant
Organizations
Franchises \& Consents
302
Software
Total Intangible Plant
303

Transmission Plant:
Land and Land Rights

| Reference |  |
| :---: | :---: |
| Or | Account |
| Factor | No |

Land and Land Rights
389
Structures and Improvements (1) 390
Office Equipment \& Equipment
391
Transportation Equipment 392
Stores Equipment 393
394
Power Operated Equipment 396
$\begin{array}{lll}38 & \text { Communication Equipment } & 397 \\ 39 & \text { Miscellaneous Equipment } & 398\end{array}$
Other General Plant
Total General Plant
Sum L 30 to L 40


$\begin{array}{cll}\text { Schedule } & \text { C-3 } \\ \text { Witness: } & \text { Bachota/O'Brien } \\ \text { Page } & 1 & \text { of } 4\end{array}$

| Ј | N |  | $\stackrel{\text { ल }}{\substack{\text { }}}$ |  | $\begin{aligned} & \text { O} \\ & \text { N- } \\ & \text { N- } \end{aligned}$ | $\begin{aligned} & \text { ? } \\ & \text { O} \\ & 0 \\ & 0 \\ & \hline \end{aligned}$ | $\begin{aligned} & \infty \\ & \infty \\ & \infty \\ & \infty \\ & \stackrel{\infty}{\sim} \end{aligned}$ | N N - - | , |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ¢ |  |  |  | $\begin{aligned} & N \\ & \underset{\sim}{N} \\ & \infty \end{aligned}$ | ' | , | $\underset{\sim}{\infty}$ | ¢ |  | $\stackrel{\oplus}{¢}$ |
| N | 은 | 芴 |  | N N N N <br> $\leftrightarrow$ | $\begin{aligned} & \text { N} \\ & \text { N్ } \\ & \text { N్ల } \end{aligned}$ | $\begin{aligned} & \text { M } \\ & \text { O- } \\ & \text { O/ } \\ & \text { O- } \end{aligned}$ | $\begin{aligned} & \infty \\ & \stackrel{0}{\infty} \\ & \stackrel{\infty}{\sim} \end{aligned}$ | N N $\sim$ - $\sim$ | ' | ¢0\|- |


Summary of Accumulated Depreciation
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (spuesnoul u! \$)

| Line <br> $\#$ |  |
| :--- | :--- |
|  |  |
| 1 | Description |
| 2 | Transmission Plant |
| 3 | Distribution Plant: |
| 4 | General Plant |

## Duquesne Light Company

Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
(\$ in Thousands)
Accumulated Provision for Depreciation


Schedule C-3
Witness: Bachota/O'Brien
Page 2 of 4
[1]

Account

301
302
303

350
352

355
356

358
359360

Structures and Improvements 361
Station Equipment
Poles, Towers and Fixtures
Overhead Conductors and Devices
Underground Conduit
Underground Conductors and Devices
Line Transformers
OH \& UND Services
Meters \& Appurtencies

Street Lighting
Other Distribution
Total Distribution Plant
L 16 to L 28

+ L 15 +L 29 + L 40
[2]
Pro Forma
FPFTY Ended 12/31/22

```
-
249,977
```

(12)

12,235
158,590
34,400
17,199
39,050
35,003
37,024
1,716

44,027
189,703
192,716
184,533
53,228
136,278
140,769
28,630
42,906
25,853
1,038,643

69,670
19,378
38,925
879
10,550
931
36,089
178,503
\$ 1,802,328



| Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission | Schedule <br> Witness: | C-4 <br> O'Brien |
| :---: | :---: | :---: |
| FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 | Page | 1 of 10 |
| (\$ in Thousands) |  |  |
| Working Capital |  |  |


| Line |
| :--- | :--- |
| No $\quad$ Description |

1 Operation \& Maintenance Expenses
2 Supply Expense
3 Tax Expense
4 Interest Payments
5 Average Prepayments

6 Total Cash Working Capital Requirements
[1]

Sum L 1 to L 5
[2]
FPFTY
Ended
12/31/22
Reference

C-4, P 2, L 1 to L 11

C-4, P 2, L 18

C-4, P 7, L 10
23,632

18,260
\$ 68,330


[^15]

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 

| Schedule |  | C-4 |
| :---: | :---: | :---: |
| Witness: |  | O'Brien |
| Page | 4 | of 10 | (\$ in Thousands)

Revenue By Class of Service


[^16]C_4_p4 (A171..N230)

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 <br> (\$ in Thousands) <br> <br> Summary of Expense Lag Calculations 

 <br> <br> Summary of Expense Lag Calculations}

|  |  | [1] | [2] |  | [3] | [4] |  | [5] |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line No. | Description | Reference Or Factor | Amount |  | $\begin{gathered} (\text { Lead) / Lag } \\ \text { Days } \end{gathered}$ | Weighted Dollar Value |  | $\begin{gathered} \text { (Lead) / Lag } \\ \text { Days } \end{gathered}$ |
|  |  |  |  |  |  |  | ]* 3 ] | [4]/[2] |
| PAYROLL |  |  |  |  |  |  |  |  |
| 1 | Union |  | \$ | 48,400 | 17.00 | \$ | 822,793 |  |
| 2 | Paid Bi-Weekly with ten-day lag (14 days / $2+10$ days) |  |  |  |  |  |  |  |
| 3 | Non-Union |  |  | 45,262 | 7.60 |  | 343,994 |  |
| 4 | Paid Twice Monthly (365 days / 24 / 2) |  |  |  |  |  |  |  |
| 5 | Payroll Lag | Sum L 1 to L 4 | \$ | 93,662 |  | \$ | 1,166,787 | 12.46 |

## PENSION EXPENSE

6 Payment \# 1
$7 \quad$ Mid-point of Service Period

8
Totals \& (Lead) Lag Days

15-Mar
10,000
(108.00)
\$ $(1,080,000)$

1-Jul
$\mathrm { L } 6 + \mathrm { L } 7 \longdiv { 1 0 , 0 0 0 }$
$\overline{(1,080,000)}$
$\qquad$

## PURCHASED ELECTRICITY

9 Contract Payment Lag

OTHER O \& M EXPENSES

| 10 | FEBRUARY, 2020 |
| :--- | :--- |
| 11 | MAY, 2020 |
| 12 | AUGUST, 2020 |
| 13 | NOVEMBER, 2020 |
|  |  |
| 14 |  |


| Sch C-4, Pg 6 | \$ | 5,894 | \$ | 255,175 |
| :---: | :---: | :---: | :---: | :---: |
| Sch C-4, Pg 6 |  | 11,658 |  | 548,156 |
| Sch C-4, Pg 6 |  | 2,755 |  | 114,872 |
| Sch C-4, Pg 6 |  | 6,699 |  | 294,376 |
| Sum L 10 to L 13 |  | 27,007 |  | 1,212,579 |

$\xlongequal{\$ 214,471} \xlongequal{33.88} \xlongequal{\$ \quad 7,266,277} \xlongequal{33.88}$ TOTAL

Sum L 10 to L $13 \xlongequal{27,007}$

| $1,212,579$ |
| :--- |

## Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 <br> (\$ in Thousands)

| Schedule | C-4 |  |
| :---: | :---: | :---: |
| Witness: | O'Brien |  |
| Page | 6 | of 10 |

## General Disbursements Lag



| Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 | Schedule | C-4 |
| :---: | :---: | :---: |
| Oitness: | O'Brien |  |
| Page | 7 | of 10 |

## (\$ in Thousands)

## Tax Expense Lag Days



## Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands) <br> Interest Payments



Duquesne Light Company FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022

$$
\begin{aligned}
& \text { PREPAID EXPENSES } \\
& \text { [1] } \begin{array}{c}
{[2]} \\
\text { Total For }
\end{array} \\
& \text { [3] }
\end{aligned}
$$










C-8
Bachota/O'Brien
of 1



of Schedule
Witness:
Page

|  | Before The FULLY PROJECTE <br> Jurisdictional Rate | Company blic Utility EAR ENDED D ands) <br> In Income <br> Table of Jurisdictio | eve | 2022 <br> Increas <br> Deficiency |  | dule ness: ge | D-1 <br> O'Brien/Gorman <br> 2 of 3 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line <br> No | Description | Reference |  | (1) otal mpany |  | 2) <br> al PA <br> diction | (3) <br> PA JSS <br> Reference |
| 1 | Total Electric Rate Base | Table No 1 | \$ | 2,998,379 | \$ | 2,276,464 | Table No 1 |
| Total Operating Revenues: |  |  |  |  |  |  |  |
| 2 | Total Sales Revenues | D-3 |  | 939,602 |  | 550,379 | Table No 5 |
| 3 | Other Revenues - Off System Sales | D-3 |  | 1,560 |  | - | Table No 5 |
| 4 | Other Operating Revenues | D-3 |  | 18,003 |  | 18,003 | Table No 5 |
| 5 | Total Revenues |  |  | 959,165 |  | 568,382 |  |
| Total Operating Expenses: |  |  |  |  |  |  |  |
| 6 | Operation \& Maintenance Expenses | D-2 |  | 455,804 |  | 205,286 | Table No 6 |
| 7 | Depreciation \& Amortization Expense | D-21 |  | 221,275 |  | 181,309 | Table No 7 |
| 8 | Taxes Other Than Income Taxes | D-20 |  | 60,288 |  | 41,102 | Table No 8 |
| 9 | Total Operating Expenses |  |  | 737,367 |  | 427,697 |  |
| 10 | Utility Operating Income Before Taxes |  |  | 221,798 |  | 140,685 |  |
|  | Income Taxes: |  |  |  |  |  |  |
| 11 | Federal | D-22 |  | 23,540 |  | 12,470 | Table No 9 |
| 12 | State | D-22 |  | 14,054 |  | 6,290 | Table No 9 |
| 13 | Total Operating Expenses |  |  | 774,960 |  | 446,456 |  |
| 14 | Total Operating Income |  | \$ | 184,205 | \$ | 121,926 |  |
| Return Before Adjustments |  |  |  |  |  |  |  |
| 15 | Earned Rate of Return - \% |  |  |  |  | 5.3559\% |  |
| 16 | Required Rate of Return - \% | B-9 |  |  |  | 7.8400\% |  |
| 17 | Return at Required Rate of Return |  |  |  | \$ | 178,475 |  |
| 18 | Income Deficiency - \$ |  |  |  |  | 56,549 |  |
| 19 | Revenue Deficiency - Tax Multiplier | D-22, Page 4 |  |  |  | 1.51656 |  |
| 20 | Revenue Deficiency-\$ |  |  |  | \$ | 85,759 |  |

[^17]D-1
$\left.\begin{array}{l}\text { O'Brien/Gorman } \\ 3\end{array}\right)$ of 3 Schedule
Witness:
Page Duquesne Light Company
Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
(\$ in Thousands)




Table No 3
Electric Rate Base - Pennsylvania



Exhibit 2 FPFTY 2022 4-8-21
D_1_p3 (A101..L150)

|  | $\bar{m}$ |  |  | $\left\|\begin{array}{l} 10 \\ \frac{0}{0} \\ 90 \\ 0 \end{array}\right\|$ | $\cdot \underset{\stackrel{J}{J}}{\stackrel{J}{N}}$ |  |  | ｜r｜ | $\stackrel{\text { \％}}{\text { N }}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |



Adjustments to Net Operating Income


[^18]Exhibit 2 FPFTY 2022 4-8-21
D_5_p1 (A1..V60)

## D-5A O'Brien 1 of 1 음 芯 in Witness: Page

D-5C
O'Brien
1 of 1 Schedule :ssouł! M

Page

$[3]$
Medium C\&


| [2] |
| :---: |
| Small C\&1 |
| \$ $\quad 71,074$ |
|  |

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\begin{gathered}
{[1]} \\
\text { Residential } \\
\hline \$ \quad 469,828 \\
\$ \\
\hline
\end{gathered}
$$

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| :--- |
| 298 |

$$
\begin{array}{rr}
\$ & 71,861 \\
\hline \hline & \\
& 7,414 \\
\hline \hline
\end{array}
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| $\$ \quad 103.784$ |
| :--- |

$\$ \quad 9.693$


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Revenue Annualization

(\$ in Thousands)

$$
\xlongequal{\$ \quad 310,676}
$$



| $\mathrm{S} \quad 0.573$ |
| :--- |




$\begin{gathered}\text { Duquesne Light Company }\end{gathered}$
Adjusted Fully Projected Future Test Year Reve
Adjusted Fully Projected Future Test Year Revenue at Present Rates
12 Month Period Ending December 31， 2022 at Customer Shopping Levels




12 Month Period Ending December 31， 2022 Assuming No Customer Shopping（i．e．100\％Default Service Load）

12 Month Period Ending December 31, 2022 Assuming No Customer Shopping (i.e. 100\% Default Service Load)

| $\checkmark$ |  |  <br>  |  | $\stackrel{\circ}{\circ}$ |
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| - |  |  | $\begin{array}{ll}\circ & 8 \\ 0 & 8 \\ 0 & 0 \\ 0 & \infty \\ \infty & \infty \\ \infty & 0\end{array}$ | ¢ |
| 0 |  |  |  |  |
| $\infty$ |  |  |  | (1) |
| $\varangle$ | $\stackrel{\otimes}{\triangle}$ |  |  |  |


$\begin{array}{cc}\text { Schedule } & \text { D-6 A } \\ \text { Witness: } & \text { O'Brien } \\ \text { Page } & 1\end{array}$ of 1






 $\begin{array}{ll}14 & \text { Distribution Supervision } \\ 15 & \text { Customer Records \& Collection Expense } \\ 16 & \text { Customer Assistance } \\ 17 & \text { Administrative and General Salaries } \\ 18 & \text { Office Supplies and Expense } \\ 19 & \text { Outside Services Employed } \\ 20 & \text { Miscellaneous General Expense } \\ 21 & \\ & \\ & \text { TOTAL }\end{array}$
Exhibit 2 FPFTY 2022 4-8-21
D_6_p1 (A231..V290)

| Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission | Schedule <br> Witness: | D-6 B <br> O'Brien |
| :---: | :---: | :---: |
| FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 |  |  |
| ( $\$$ in Thousands) | Page | 1 of 1 |








 $\left.\begin{array}{cc}\$ & 43,250 \\ 801\end{array}\right]$ $\stackrel{\underset{\sim}{\infty}}{\stackrel{\infty}{\sim}} \quad$ | \$ 93,662

 $\begin{array}{ll}\text { n } & \text { 苂 } \\ \stackrel{0}{6} & \frac{5}{4} \\ & \end{array}$


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Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands)

Adjustment for Salaries 8 | [3] |
| :---: |
| Non-Union |

 \begin{tabular}{c}
Adjustment \# 7 <br>
{$[1]$} <br>
Reference <br>
Or <br>
Function <br>
\hline

 

$\begin{array}{c}\text { Line } \\
\#\end{array}$ \& \& \multicolumn{1}{c}{ Description } <br>
\cline { 1 - 1 } \& \& <br>
2 \& \& Budget O\&M Base PR Expense for FPFTY <br>
2 \& \& $\begin{array}{l}\text { Budget O\&M Overtime PR Expense for FPFTY } \\
3\end{array}$ <br>
\& Total O\&M Budget PR Expense <br>
4 \& Pro Forma Rate Increase 10/1/22 <br>
5 \& Pro Forma Rate Increase 1/1/23 <br>
6 \& Number of Months for Annualization <br>
7 \& Pro Forma During FPFTY <br>
8 \& Pro Forma Rate Increase 10/1/23 <br>
9 \& Number of Months <br>
10 \& Annualization Adjustment <br>
11 \& Total Pro Forma - Existing Employees
\end{tabular} $\xrightarrow[\text { Pro Forma For New Employees }]{\text { Changes to Employee Numbers }}$

 Total New Employees
Increase for Overtime Sub-Total -- Total Pay at Present Rates
Increase for Pay Rates
Pro Forma Increase for Change in Employees
Total Pro Forma Payroll
Total O\&M Budget PR Expense
Payroll Increase $\stackrel{N}{\rightleftharpoons}$
$\downarrow \leftarrow$ $\qquad$

 $L 12+L 13$
$L 2 / L 1^{*}+12$
Sum L 12 to $L 15$
$L 4$ or L $5 * L 16$


1

 \begin{tabular}{|c|}
$n$ <br>
$\stackrel{n}{-}$ <br>
- <br>

 

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$\infty$ \& \& <br>
\&
\end{tabular}





$\begin{aligned} & (L 3+L 7) / 12^{*} L 8^{*} L 12 \\ & {[4] L 3+L 7+L 10}\end{aligned}$

## Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands) <br> ADJUSTMENT---EMPLOYEE BENEFITS AND PENSION <br> Adjustment \# 9

|  |  | [1] | [2] | [3] | [4] | [5] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { Line } \\ \# \\ \hline \end{gathered}$ | Description | Reference | Annual Contribution | Pension Contribution Payments To Capital | Pension Contribution Payments To Expense | Total |  |
| PENSION COSTS |  |  |  |  |  |  |  |
| 1 | Contribution - Year Ended 12/31/22 |  | \$ 10,000 |  |  |  |  |
| 2 | Contribution - Year Ended 12/31/23 |  | 10,000 |  |  |  |  |
| 3 | Contribution - Year Ended 12/31/24 |  | 10,000 |  |  |  |  |
| 4 | Total | L1 to L 3 | \$ 30,000 |  |  |  |  |
| 5 | Number of Years for FPFTY Average | 3 |  |  |  |  |  |
| 6 | Average for FPFTY |  | \$ 10,000 |  |  |  |  |
| 7 | Pension Capitalization / Expense Factor |  |  | 50.0\% | 50.0\% |  |  |
| 8 | Pension Payment To Be Capitalized | L1*L7 |  | 5,000 |  |  |  |
| 9 | Pension Payment To Be Expensed | L6*L7 |  |  | \$ 5,000 |  |  |
| 10 | FAS 87 Pension in Capital Additions |  |  | 2,321 |  |  |  |
| 11 | FAS 87 Pension Expense in FPFTY |  |  |  | 6,004 |  |  |
| 12 | Pension Adjustment to Plant | L 8-L 10 |  | \$ 2,679 |  |  |  |
| 13 | Pro Forma Pension Adjustment | L9-L11 |  |  |  | \$ | $(1,004)$ |

[^19]

Exhibit 2 FPFTY 2022 4-8-21
D_10 (A91..N138)


[^20]D_11 (A139..N183)

$\begin{array}{cl}\text { SCHEDULE } & \text { D-13 } \\ \text { Witness: } & \text { O'Brien } \\ \text { PAGE } & 1 \\ \text { of } 1\end{array}$
$\begin{array}{cl}\text { SCHEDULE } & \text { D-14 } \\ \text { Witness: } & \text { O'Brien } \\ \text { PAGE } & 1 \\ \text { of } 1\end{array}$
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\end{gathered}
$$

$\frac{\text { ADJUSTMENT - EV NET RECOVERY PRIOR CASE COSTS }}{\text { Adjustment } \# 14}$

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\begin{gathered}
{[4]} \\
\text { Amount } \\
\hline \\
\$ \quad 414
\end{gathered}
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& m
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\begin{aligned}
& \text { D-16 } \\
& \text { O'Brien } \\
& 1 \text { of } 1
\end{aligned}
$$
\]

Duquesne Light Company
Before The PennsyIvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands)

## Taxes Other Than Income Taxes



## GROSS RECEIPT TAX PRO FORMA AT PRESENT RATES

| 11 | Revenue From Sales to Customers |  |  | 891,502 |
| :---: | :---: | :---: | :---: | :---: |
| 12 | Uncollectibles |  |  | $(7,455)$ |
| 13 | Surcharge Revenue Removed |  |  | $(31,881)$ |
| 14 | Net Taxable | L 11 to L 13 |  | 852,166 |
| 15 | Tax Rate |  |  | 5.90\% |
| 16 | Gross Receipts Taxes at Present Rates | L 14 *L 15 |  | 50,278 |
| 17 | Budget Amount |  |  | 54,775 |
| 18 | Adjustment | L 16-L 17 | \$ | $(4,497)$ |


| Duquesne Light Company Schedule | D-20 <br> Before The Pennsylvania Public Utility Commission <br> FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 | Witness: |
| :---: | :---: | :---: |
| (\$ in Thousands) | Page | 2 of 2 |

Taxes Other Than Income Taxes

|  | Description | [1]Account | [2] | [3] |  | [4] |  | [5] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { Line } \\ \# \\ \hline \end{gathered}$ |  |  |  |  | PFFTY |  | $\begin{aligned} & \text { \&W } \\ & \text { stment } \end{aligned}$ | $\begin{gathered} \text { Increase } \\ \text { in Payroll } \\ \text { Taxes } \\ \hline \end{gathered}$ |  |
| 1 | Total Payroll Charged to Expense |  |  | \$ | 91,473 | \$ | 2,189 |  |  |
| 2 | FICA Expense |  |  | \$ | 7,066 |  |  |  |  |
| 3 | FICA Expense - Percent | L2/L1 |  |  | 7.72\% |  | 7.72\% |  |  |
| 4 | Pro Forma FICA Expense on Pro Forma S\&W | [4]L1*L3 |  |  |  |  |  | \$ | 169 |
| 5 | FUTA Expense |  |  | \$ | 61 |  |  |  |  |
| 6 | FUTA Expense - Percent | L5/L 1 |  |  | 0.07\% |  | 0.07\% |  |  |
| 7 | Pro Forma FUTA Expense on Pro Forma S\&W | [4]L1*L6 |  |  |  |  |  |  | 2 |
| 8 | SUTA Expense |  |  | \$ | 368 |  |  |  |  |
| 9 | SUTA Expense - Percent | L8/L1 |  |  | 0.40\% |  | 0.40\% |  |  |
| 10 | Pro Forma SUTA Expense on Pro Forma S\&W | [4]L1*L9 |  |  |  |  |  |  | 9 |
| 11 | City of Pittsburgh Payroll Tax Expense |  |  | \$ | 655 |  |  |  |  |
| 12 | SUI Expense - Percent | L11/L 1 |  |  | 0.72\% |  | 0.72\% |  |  |
| 13 | Pro Forma SUI Expense on Pro Forma S\&W | [4]L1*L12 |  |  |  |  |  |  | 16 |
| 14 | Pro Forma Adjustment | L 4 to L 13 |  |  |  |  |  | \$ | 196 |

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands) 

Schedule D-21<br>Witness: O'Brien<br>Page 1 of 3

## Depreciation and Annualization Expense Adjustment



## Duquesne Light Company Before The Pennsylvania Public Utility Commission <br> FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022

Schedule D-21
Witness: O'Brien
Page 2 of 3
(\$ in Thousands)

## Depreciation and Annualization Expense Adjustment

| Line \# | Description | [1] <br> Account <br> Number | [2] | [3] |  | [4] |  | [5] |  | [6] |  | [7] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Current | Plant Balance At |  |  |  | Other |  | Depreciation Expense |  |  |  |
|  |  |  | Rate |  |  |  |  |  |  |  | ear |  | ualized |
| INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization | 301 |  |  |  |  |  |  |  | \$ | - | \$ | - |
| 2 | Franchise \& Consent | 302 |  |  |  |  |  |  |  |  | - |  | - |
| 3 | Miscellaneous Intangible Plant | 303 |  |  |  |  |  |  |  |  | - |  | - |
| 4 | TOTAL INTANGIBLE | SumL 1 to L3 |  |  |  |  |  |  |  |  | - |  | - |
| TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5 | Land \& Land Rights | 350 |  |  |  |  |  |  |  |  | - |  | - |
| 6 | Structures \& Improvements | 352 |  |  |  |  |  |  |  |  | 14 |  | 14 |
| 7 | Station Equipment | 353 |  |  |  |  |  |  |  |  | 1,701 |  | 1,701 |
| 8 | Towers and Fixtures | 354 |  |  |  |  |  |  |  |  | 1,648 |  | 1,648 |
| 9 | Poles and Fixtures | 355 |  |  |  |  |  |  |  |  | 48 |  | 48 |
| 10 | Overhead Conductors \& Devices | 356 |  |  |  |  |  |  |  |  | 845 |  | 845 |
| 11 | Underground Conduit | 357 |  |  |  |  |  |  |  |  | 28 |  | 28 |
| 12 | Underground Conductors \& Devices | 358 |  |  |  |  |  |  |  |  | 2 |  | 2 |
| 13 | Road and Trails | 359 |  |  |  |  |  |  |  |  | - |  | - |
| 14 | Regional Trans - Computer Hardware | 382 |  |  |  |  |  |  |  |  | - |  | - |
| 15 | Regional Trans - Computer Software | 383 |  |  |  |  |  |  |  |  | - |  | - |
| 16 | TOTAL TRANSMISSION PLANT | Sum L 5 to L 15 |  |  |  |  |  |  |  |  | 4,286 |  | 4,286 |
| DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 17 | Land \& Land Rights | 360 |  |  |  |  |  |  |  |  | - |  | - |
| 18 | Structures \& Improvements | 361 |  |  |  |  |  |  |  |  | 30 |  | 30 |
| 19 | Station Equipment | 362 |  |  |  |  |  |  |  |  | 1,097 |  | 1,097 |
| 20 | Storage Battery Equipment | 363 |  |  |  |  |  |  |  |  | - |  | - |
| 21 | Poles, Towers and Fixtures | 364 |  |  |  |  |  |  |  |  | 4,926 |  | 4,926 |
| 22 | Overhead Conductors and Devices | 365 |  |  |  |  |  |  |  |  | 240 |  | 240 |
| 23 | Underground Conduit | 366 |  |  |  |  |  |  |  |  | 138 |  | 138 |
| 24 | Underground Conductors and Devices | 367 |  |  |  |  |  |  |  |  | (317) |  | (317) |
| 25 | Line Transformers | 368 |  |  |  |  |  |  |  |  | 979 |  | 979 |
| 26 | Services | 369 |  |  |  |  |  |  |  |  | 4,968 |  | 4,968 |
| 27 | Meters | 370 |  |  |  |  |  |  |  |  | 156 |  | 156 |
| 28 | Meter Communications Equipment | 370.1 |  |  |  |  |  |  |  |  | - |  | - |
| 29 | Leased Property On Customers Premises | 372 |  |  |  |  |  |  |  |  | - |  | - |
| 30 | Street Lighting and Signaling Systems | 373 |  |  |  |  |  |  |  |  | 77 |  | 77 |
| 31 | 0 | 0 |  |  |  |  |  |  |  |  | - |  | - |
| 32 | TOTAL DISTRIBUTION PLANT | Sum L 17 to L31 |  |  |  |  |  |  |  |  | 12,294 |  | 12,294 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 33 | Land \& Land Rights | 389 |  |  |  |  |  |  |  |  | 309 |  | 309 |
| 34 | Structures \& Improvements | 390 |  |  |  |  |  |  |  |  | - |  | - |
| 35 | Leasehold Improvements | 390.2 |  |  |  |  |  |  |  |  | - |  | - |
| 36 | Office furniture | 391.1 |  |  |  |  |  |  |  |  | - |  | - |
| 37 | Office equipment | 391.2 |  |  |  |  |  |  |  |  | - |  | - |
| 38 | Transportation equipment | 392 |  |  |  |  |  |  |  |  | (39) |  | (39) |
| 39 | Store equipment | 393 |  |  |  |  |  |  |  |  | - |  | - |
| 40 | Tools, shop and garage equipment | 394 |  |  |  |  |  |  |  |  | - |  | - |
| 41 | Laboratory equipment | 395 |  |  |  |  |  |  |  |  | - |  | - |
| 42 | Power operated equipment | 396 |  |  |  |  |  |  |  |  | - |  | - |
| 43 | Electric communications equipment | 397 |  |  |  |  |  |  |  |  | - |  | - |
| 44 | Miscellaneous equipment | 398 |  |  |  |  |  |  |  |  | - |  | - |
| 45 | 0 | 0 |  |  |  |  |  |  |  |  | - |  | - |
| 46 | TOTAL GENERAL | Sum L 33 to L45 |  |  |  |  |  |  |  |  | 270 |  | 270 |
| 47 | $\begin{gathered} \text { SUB-TOTAL } \\ (L 4+L 16+L 32 L 46) \end{gathered}$ |  |  |  |  |  |  |  |  |  | 16,850 |  | 16,850 |
| 48 | EV Depreciation Adjustment |  |  |  |  |  |  |  |  |  | - |  | - |
| 49 | Cloud Amortization Adjustment |  |  |  |  |  |  |  |  |  | - |  | - |
| 50 |  |  |  |  |  |  |  |  |  |  | - |  | - |
| 51 | TOTAL PLANT IN SERVICE | L 47 to L 50 |  | \$ | - | \$ | - | \$ | - | \$ | 16,850 | \$ | 16,850 |

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022 (\$ in Thousands) 

Schedule D-21
Witness: O'Brien
Page 3 of 3

## Depreciation and Annualization Expense Adjustment

| $\begin{gathered} \text { Line } \\ \underset{\#}{2} \end{gathered}$ | Description | [1] | [2] <br> Current Depreciation Rate | [3] | [4] | [5] <br> Other | [6] |  | [7] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Account Number | Current Depreciation Rate | Plant Balance At |  | Other | Depreciation Expense |  |  |  |
|  |  |  |  | 12/31/21 | 12/31/22 |  | For Year |  | Annualized |  |
|  |  |  |  |  |  |  |  | + Pg 2 |  | +Pg 2 |
| INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization | 301 |  | 100 | 100 | \$ - | \$ | - | \$ | - |
| 2 | Franchise \& Consent | 302 |  | 7 | 7 | - |  | $\cdot$ |  | - |
| 3 | Miscellaneous Intangible Plant | 303 |  | 388,778 | 384,406 | - |  | 59,973 |  | 59,633 |
| 4 | TOTAL INTANGIBLE | SumL1toL3 |  | 388,885 | 384,513 | - |  | 59,973 |  | 59,633 |
| TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| 5 | Land \& Land Rights | 350 |  | 15,821 | 15,821 | - |  | - |  | - |
| 6 | Structures \& Improvements | 352 |  | 35,315 | 35,315 | - |  | 1,077 |  | 1,077 |
| 7 | Station Equipment | 353 |  | 488,829 | 507,572 | - |  | 17,942 |  | 18,248 |
| 8 | Towers and Fixtures | 354 |  | 76,590 | 80,466 | - |  | 2,590 |  | 2,614 |
| 9 | Poles and Fixtures | 355 |  | 57,017 | 68,214 | - |  | 1,256 |  | 1,365 |
| 10 | Overhead Conductors \& Devices | 356 |  | 129,659 | 160,803 | - |  | 3,212 |  | 3,466 |
| 11 | Underground Conduit | 357 |  | 83,002 | 83,002 | - |  | 1,464 |  | 1,464 |
| 12 | Underground Conductors \& Devices | 358 |  | 150,359 | 161,447 | - |  | 2,855 |  | 2,956 |
| 13 | Road and Trails | 359 |  | 10,186 | 10,186 | - |  | 180 |  | 180 |
| 14 | Regional Trans - Computer Hardware | 382 |  | - | - | - |  | - |  | - |
| 15 | Regional Trans - Computer Software | 383 |  | - | - | - |  | - |  | - |
| 16 | TOTAL TRANSMISSION PLANT | SumL5 toL 15 |  | 1,046,778 | 1,122,826 | - |  | 30,576 |  | 31,370 |
| DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| 17 | Land \& Land Rights | 360 |  | 23,190 | 23,190 | - |  | - |  | - |
| 18 | Structures \& Improvements | 361 |  | 71,091 | 72,288 | - |  | 1,636 |  | 1,649 |
| 19 | Station Equipment | 362 |  | 530,048 | 536,936 | - |  | 12,407 |  | 12,480 |
| 20 | Storage Battery Equipment | 363 |  | - | - | - |  | - |  | - |
| 21 | Poles, Towers and Fixtures | 364 |  | 597,387 | 624,016 | - |  | 17,873 |  | 18,155 |
| 22 | Overhead Conductors and Devices | 365 |  | 603,286 | 629,457 | - |  | 16,574 |  | 16,921 |
| 23 | Underground Conduit | 366 |  | 197,042 | 219,375 | - |  | 3,053 |  | 3,209 |
| 24 | Underground Conductors and Devices | 367 |  | 444,270 | 460,253 | - |  | 11,985 |  | 12,202 |
| 25 | Line Transformers | 368 |  | 468,538 | 490,788 | - |  | 17,527 |  | 17,911 |
| 26 | Services | 369 |  | 111,371 | 114,962 | - |  | 7,333 |  | 7,371 |
| 27 | Meters | 370 |  | 146,003 | 151,189 | - |  | 10,587 |  | 10,769 |
| 28 | Meter Communications Equipment | 370.1 |  | (20) | - (20) | $\ldots$ |  | - |  | - |
| 29 | Leased Property On Customers Premises | 372 |  | - | - | - |  | - |  | - |
| 30 | Street Lighting and Signaling Systems | 373 |  | 43,887 | 44,730 | - |  | 1,344 |  | 1,356 |
| 31 | 0 | 0 |  |  |  |  |  |  |  |  |
| 32 | TOTAL DISTRIBUTION PLANT | Sum L 17 to L31 |  | 3,236,093 | 3,367,164 | - |  | 100,319 |  | 102,024 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 33 | Land \& Land Rights | 389 |  | 6,145 | 6,145 | - |  | 309 |  | 309 |
| 34 | Structures \& Improvements | 390 |  | 167,681 | 177,314 | - |  | 5,485 |  | 5,639 |
| 35 | Leasehold Improvements | 390.2 |  | 20,500 | 20,500 | - |  | 137 |  | 137 |
| 36 | Office furniture | 391.1 |  | 5,329 | 5,116 | - |  | 261 |  | 256 |
| 37 | Office equipment | 391.2 |  | 37,991 | 43,384 | - |  | 8,138 |  | 8,677 |
| 38 | Transportation equipment | 392 |  | 63,481 | 65,323 | - |  | 3,973 |  | 4,031 |
| 39 | Store equipment | 393 |  | 1,379 | 1,379 | - |  | 46 |  | 46 |
| 40 | Tools, shop and garage equipment | 394 |  | 28,490 | 29,795 | - |  | 1,166 |  | 1,192 |
| 41 | Laboratory equipment | 395 |  | 1,854 | 1,774 | - |  | 91 |  | 89 |
| 42 | Power operated equipment | 396 |  | 3,694 | 3,694 | - |  | 159 |  | 159 |
| 43 | Electric communications equipment | 397 |  | 71,134 | 71,337 | - |  | 4,751 |  | 4,758 |
| 44 | Miscellaneous equipment | 398 |  | 230 | 175 | - |  | 10 |  | 9 |
| 45 | 0 | 0 |  | - | - | $\checkmark$ |  | - |  | - |
| 46 | TOTAL GENERAL | Sum L 33 to L45 |  | 407,908 | 425,936 | - |  | 24,526 |  | 25,300 |
| 47 | SUB-TOTAL |  |  | 5,079,664 | 5,300,439 | - |  | 215,394 |  | 218,327 |
|  | (L4+L $16+\mathrm{L} 32 \mathrm{~L} 46$ ) |  |  |  |  |  |  |  |  |  |
| 48 | EV Depreciation Adjustment |  |  | - | - | - |  | - |  | 437 |
| 49 | Cloud Amortization Adjustment |  |  | - | - | - |  | - |  | 2,511 |
| 50 |  |  |  | - | - | - |  | - |  | - |
| 51 | TOTAL PLANT IN SERVICE | L47 toL 50 |  | \$ 5,079,664 | \$ 5,300,439 | \$ | \$ | 215,394 | \$ | 21,275 |


Duquesne Light Company
Before The Pennsylvania Public Utility

$\begin{array}{ccc}\text { Schedule } & & \text { D-22 } \\ \text { Witness: } & & \text { Simpson/O'Brien/Gorman } \\ \text { Page } & 2 & \text { of } 4\end{array}$








$\begin{array}{ccc}\begin{array}{c}\text { Schedule } \\ \text { Witness: } \\ \text { Page }\end{array} & \begin{array}{l}\text { D-22 } \\ \text { Simpson/O'Brien/Gorman } \\ \text { of } 4\end{array}\end{array}$  ..... Schedule
Witness:
Page


| $[3]$ |
| :--- |
| Factor |
|  |
| 1.000000 <br> $(0.013000)$ <br> 0.987000 <br> $(0.058233)$ <br> $(0.001461)$ <br> 0.927306 <br> $(0.092638)$ <br> 0.834668 <br> $(0.175280)$ | $\begin{array}{r}0.659388 \\ \hline \hline 1.516558 \\ \hline\end{array}$ $\begin{array}{r}1.000000 \\ (0.099900) \\ \hline\end{array}$ Duquesne Light Company

Before The Pennsylvania Public Utility Commission
FULLY PROJECTED FUTURE TEST YEAR ENDED DECEMBER 31, 2022
GROSS REVENUE CONVERSION FACTOR

| FACTOR |
| :---: |
| [1] |
| Reference |
| Or |
| Factor |-L14-L16

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

Book 1
Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation
Book 4
Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

Book 5
Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022)

## Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021) Book 7

Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

Book 8
Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6-Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 - Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13-Paul R. Moul
Statement 14-James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10

## Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies

Book 11

## Exhibit 7 - Depreciation Studies

Book 12

## Confidential Testimony and Exhibits

| Witness: Page | Davis 1 of 2 |  |
| :---: | :---: | :---: |
| [1] | [2] | [3] |
| Witness: | \# of Pages | Schedule / Exhibit / Workpaper Location |
| Various | 3 pages | Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Fully Projected Future Test Year - 12 Months Ended December 31, 2022 Future Test Year - 12 Months Ended December 31, 2021 Historic Year - 12 Months Ended December 31, 2020 (\$ in Thousands) |
| Bachota | 2 pages | B_1_p1 (A1..J65) |
| Bachota | 1 page | B_2 (A131..J195) |
| Bachota | 1 page | B_3 (A196..J260) |
| Bachota | 2 pages | B_4_p1 (A261..J325) |
| Simpson | 1 page | B_5 (A391..J455) |
| Milligan/Moul | 1 page | B-6 (A1...Q40) |
| Milligan/Moul | 1 page | B-7 (A41..Q80) |
| Milligan/Moul | 1 page | B-8 (A81..Q120) |
| O'Brien/Gorman | 1 page | C_1_to_C_2 (A1..L50) |
| Bachota/O'Brien | 1 page | C_1_to_C_2 (A51..L100) |
| Bachota/O'Brien | 1 page | C2 P2 A1..J60 |
| Bachota/O'Brien | 1 page | C-2 2 3 to 4 (A1..O80) |
| O'Brien | 1 page | C-2 2 3 to 4 (A81..O160) |
| Bachota/O'Brien | 1 page | C_3_P2 (A1..L50) |
| Bachota/O'Brien | 1 page | C_3_P_1 (A51..L110) |
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| O'Brien | 2 pages | C_4_P3 (A111..N170) |
| O'Brien | 2 pages | C_4_P5 (A231..N290) |
| O'Brien | 1 page | C_4_p7 (A351..N410) |
| O'Brien | 1 page | C_4_p8 (A411..N470) |
| O'Brien | 1 page | C_4_p9 (A1..T75) |
| O'Brien | 1 page | C_4_p10 (A1..AL60) |
| Bachota/O'Brien | 1 page | C_5 (A1.L60) |
| Simpson | 1 page | C_6 (A61..L110) |
| Bachota/O'Brien | 1 page | C_7 (A111..L160) |
| Bachota/O'Brien | 1 page | C_8 (A161..L220) |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021

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SECTION B


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Operation and Maintenance Expenses
Detail of Taxes

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B-8
Rate of Return
Capital Structure
Composite Cost
Capital Structure - Year End 12-31-21 and 12-31-22
Composite Cost of Long-Term Debt at 12-31-22
SECTION C

## Measures of Value and Rate of Return

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##  <br> Pro Forma Plant Summary Pro Forma Plant by FERC Account Pro Forma FTY End 12-31-18 Plant Balances

## Pro Forma FTY End 12-31-18 Plant Balances Pro Forma Adjustments to Plant

## 

Accumulated Depreciation by FERC Account
 3

## J





# STATEMENT OF REASONS 52 Pa. Code § 53.52(a)(1) 

## INTRODUCTION

Duquesne Light Company ("Duquesne Light" or the "Company") is responsible for providing adequate, efficient, safe, and reliable electric service to its customers and must have the ability to raise capital to meet such requirements. The Company is allowed to charge just and reasonable rates as established by the Pennsylvania Public Utility Commission ("Commission") that provide the Company with a fair opportunity to recover its operating costs and earn a fair return on its investment. This is accomplished through a rate case process.

In this filing, Duquesne Light is requesting that the Commission approve an overall annual increase in distribution revenue of approximately $\$ 115.0$ million. Included in the requested increase is approximately $\$ 29.2$ million in revenue currently collected through one existing Commission approved surcharge, resulting in a net increase in distribution revenue of approximately $\$ 85.8$ million. If granted by the Commission as filed, this request would produce a system average increase in distribution rates of approximately 15.6 percent and an increase in total rates (distribution, transmission, and generation charges) of approximately 7.72 percent for a typical residential using 600 kilowatt-hours per month and taking default power service from the Company. The percentage increase in rates differs for each individual rate class.

## DUQUESNE LIGHT COMPANY'S COSTS

Duquesne Light has controlled its operation and maintenance expenses by implementing process improvements and deploying cost saving measures. Nevertheless, the cost of providing electric distribution service has increased since the last distribution rate increase in December 2018. Significant cost increases have occurred in many areas, including increased investment in facilities to maintain high levels of service and reliability, increased investment in information technology, increased operation and maintenance expenses to maintain safe and reliable service, including expenses associated with the Distribution System Improvement Charge Rider included in base rates, and the expenses associated with the development of an electrical model. In addition, the Company's estimated rate base at December 31, 2022 has increased by approximately $\$ 337$ million since the 2018 base rate proceeding.

## DUQUESNE LIGHT'S FINANCIAL CONDITION

Absent increases in rates, Duquesne Light's financial condition would continue to decline in the fully projected future test year due to continued capital expenditures, increased operating expenses, and a significant decline in customer sales. On a pro forma basis for the fully projected future test year, Duquesne Light anticipates an overall return on rate base of only $5.36 \%$ absent rate relief. These financial results do not provide a return that will permit the Company to attract new capital on reasonable terms. Revenues at present rates do not provide the Company the
opportunity to earn a fair return and simply do not provide sufficient funds for Duquesne Light to adequately operate its business, abide by federal and state requirements, and provide reliable electric service to its customers.

## RELIABLE ELECTRIC SERVICE

Duquesne Light has consistently provided its customers with service at reliability levels as measured by SAIDI and SAIFI that are at or near the top of the levels provided by all the major Pennsylvania electric distribution companies. Duquesne Light has increased efficiency and reliability through the use of technology, such as automated meter reading systems and automated control systems that continuously monitor remote switches that can be operated to reroute power during storms and other outages to quickly restore service to large blocks of customers. The Company also implemented a Long Term Infrastructure Improvement plan to address is ageing infrastructure and improve its reliability.

## CUSTOMER SERVICE

Duquesne Light has consistently provided high levels of customer service. The Company has implemented a series of programs, supported by technology and process improvements, to enhance the customer experience, including a payment arrangement portal, CAP ("Customer Assistance Program") redesign to a percentage of income payment, CAP enrollment automation, and a high bill advisory tool. In 2020, the Company was second lowest for needs further investigation (NFI) residential consumer complaints and in first contact resolution (FCR) statistics for residential and commercial segments compared to the other PA Electric Distribution Companies. Also, in 2020, the J.D. Power Business Electric Utility Customer Satisfaction survey indicated that Duquesne Light ranked third in its peer group (East Mid-size) with a score of 791, only 7 points out of first place.

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands)

Balance Sheet
Line
No

UTILITY PLANT
Utility Plant (101-106, 108)
Other Utility Plant
Total Plant In Service
Construction Work In Progress (107)
Total Utility Plant
Accumulated Provision for Depreciation
Net Utility Plant
OTHER PROPERTY INVESTMENTS
Non-utility Property (121)
8,975
Accumulated Depreciation on NUP (122)
Invest in Subsidiary Company (123.1)
Other Investments (124)
$(3,618)$

Other Special Funds (128)
Special Funds - Non Major Only (129)
Long Term Portion of Derivative Assets (175.1)
Total Other Property and Investments
CURRENT AND ACCRUED ASSETS
Cash \& Other Temporary Investments(131-136)
9,410
Customer Accounts Receivable (142) 155,470
Other Accounts Receivable (143) 9,863
Accum Provision for Uncollectible (144)
$(21,501)$
Accounts Receivable Assoc. Comp. (146)
553
$\begin{array}{ll}\text { Plant Materials \& Supplies (154) } & 25,811\end{array}$
Stores Expense - Undistributed (163)
Prepayments (165)
Interest \& Dividends Receivable (171)
Miscellaneous Current \& Accrued Assets (174)
Derivative Instrument Assets (175)
(Less) Long Term Portion of Derivative Assets (175.1)
Total Current and Accrued Assets
DEFERRED DEBITS
Unamortized Debt Expense (181)
Other Regulatory Assets (182.3)
Clearing Accounts (184)
Temporary Facilities(185)
Miscellaneous Deferred Debits (186)
Unamortized Loss on Reacquired Debt (189)
Accumulated Deferred Income Taxes (190)
Total Deferred Debits
7,122
255,000
-
1,736
15,188
33

35

Schedule
Witness:
Page

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Bachota
of 2
[1]
Forecast FTY

| \$ 5,079,664 |  |
| :---: | :---: |
|  |  |
| 5,079,664 |  |
| 339,859 |  |
| 5,419,523 |  |
|  | $(1,687,490)$ |
|  | 3,732,033 |


| 8,975 |
| :---: |
| $(3,618)$ |
| - |
| 247 |
| - |
| - |
| - |
| 5,604 |

$$
20,095
$$

- 
- 
- 

199,701
Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021
(\$ in Thousands)

```
Schedule B-1 Witness: Bachota Page 2 of 2
```


## Balance Sheet

| Line No | Description/(Account No) |  | Forecast FTY |
| :---: | :---: | :---: | :---: |
| PROPRIETARY CAPITAL |  |  |  |
| 1 | Common Stock Issued (201) | \$ | - |
| 2 | Preferred Stock Issued (204) |  | - |
| 3 | Premium on Capital Stock (207) |  | - |
| 4 | Other Paid-in-Capital (208-211) |  | 985,348 |
| 5 | Capital Stock Expense (214) |  | - |
| 6 | Retained Earnings (215, 215.2, 216, 261.1) |  | 657,147 |
| 7 | Accum Other Comprehensive Income (219) |  | $(2,700)$ |
| 8 | Total Propriety Capital \& Margins |  | 1,639,795 |
| LONG TERM DEBT |  |  |  |
| 9 | Bonds (221) |  | 1,395,000 |
| 10 | Advances from Associated Companies (223) |  | - |
| 11 | Other Long-Term Debt (224) |  | - |
| 12 | Unamortized Premium on LTD (225) |  | - |
| 13 | Unamortized Discount on LTD (226) |  | - |
| 14 | Total Long-term Debt |  | 1,395,000 |
| OTHER NON-CURRENT LIABILITIES |  |  |  |
| 15 | Obligations under Capital Leases (227) |  | - |
| 16 | Accum. Prov for Injuries \& Damages (228.2) |  | 4,580 |
| 17 | Accum. Prov for Pensions \& Benefits (228.3) |  | 71,988 |
| 18 | Accum. Miscellaneous Operating Prov (228.4) |  | 1,300 |
| 19 | Long-Term Portion of Derivative Instrument Liabilities |  | 1,683 |
| 20 | Total Long-term Debt |  | 79,551 |
| CURRENT \& ACCRUED LIABILITIES |  |  |  |
| 21 | Notes Payable (231) |  | - |
| 22 | Accounts Payable (232) |  | 132,561 |
| 23 | Notes Payable to Assoc. Companies (233) |  | 93,612 |
| 24 | Accounts Payable to Assoc. Cos (234) |  | - |
| 25 | Customer Deposits (235) |  | 8,798 |
| 26 | Taxes Accrued (236) |  | 8,991 |
| 27 | Interest Accrued (237) |  | 19,206 |
| 28 | Dividends Declared (238) |  | - |
| 29 | Tax Collections Payable (241) |  | 843 |
| 30 | Misc Current \& Accrued Liabilities (242) |  | 45,093 |
| 31 | Derivative Instrument Liabilities (244) |  | - |
| 32 | Less: Long Term Portion of Derivative Inst. Liab. Hedge |  | - |
| 33 | Total Current \& Accrued Liabilities |  | 309,104 |
| OTHER DEFERRED CREDITS |  |  |  |
| 34 | Customer Advances for Construction (252) |  | - |
| 35 | Other Deferred Credits (253) |  | 121,633 |
| 36 | Other Regulatory Liabilities (254) |  | 99,653 |
| 37 | Deferred Investment Tax Credit (255) |  | - |
| 38 | Unamortized Gain on Reacquired Debt (257) |  | - |
| 39 | Accumulated Deferred Income Taxes (282) |  | 623,728 |
| 40 | Accumulated Deferred Income Taxes (283) |  | 88,436 |
| 41 | Total Other Deferred Credits |  | 933,450 |
| 42 | TOTAL LIABILITIES \& OTHER CREDITS | \$ | 4,356,900 |


| Duquesne Light Company | Schedule | B-2 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | Bachota |
| Future Test Year - 12 Months Ended December 31, 2021 | Page | 1 |
| (\$ in Thousands) 1 |  |  |

[1]

Description

| Line No | Description | Reference | Forecast FTY |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Total Operating Revenues |  |  |  |
| 1 | Total Sales Revenues | B-3 | \$ | 869,849 |
| 2 | Sales for Resale | B-3 |  | 1,560 |
| 3 | Other Operating Revenues | B-3 |  | 104,262 |
| 4 | Total Revenues | $\mathrm{L} 1+\mathrm{L} 2+\mathrm{L} 3$ |  | 975,671 |
| Total Operating Expenses |  |  |  |  |
| 5 | Operation \& Maintenance Expenses | B-4 |  | 452,318 |
| 6 | Depreciation Expense | D-21 |  | 193,360 |
| 7 | Other Amortization | D-21 |  | 12,495 |
| 8 | Amortization of Regulatory Assets |  |  | - |
| 9 | Taxes Other Than Income Taxes | B-5 |  | 61,851 |
| 10 | Total Operating Expenses | Sum L 5 to L 9 |  | 720,024 |
| 11 | Operating Income Before Income Taxes (OIBIT) | L 4-L 10 |  | 255,647 |
| Income Taxes: |  |  |  |  |
| 12 | State | B-5 |  | 15,269 |
| 13 | Federal | B-5 |  | 29,419 |
| 14 | Total Income Taxes | L $12+\mathrm{L} 13$ |  | 44,688 |
| 15 | Net Utility Operating Income | L 11-L 14 | \$ | 210,959 |


| Duquesne Light Company | Schedule <br> Before The Pennsylvania Public Utility Commission | B-3 |
| :---: | :---: | :---: |
| Future Test Year - 12 Months Ended December 31, 2021 | Witness: | Page |
| (\$ in Thousands) |  |  |
| Bachota 1 |  |  |


| Line <br> No | Description | Reference | Forecast FTY |  |
| :---: | :---: | :---: | :---: | :---: |
| Electric Operating Revenues |  |  |  |  |
| Sales of Electricity: |  |  |  |  |
| 1 | Total Distribution |  | \$ | 586,233 |
| 2 | Total Generation |  |  | 217,302 |
| 3 | Transmission Revenue |  |  | 66,314 |
| 4 | Total Sales to Ultimate Customers |  |  | 869,849 |
| 5 | Sales for Resale (Off System) |  |  | 1,560 |
| 6 | Total Sales Revenue |  |  | 871,409 |
| Other Operating Revenues |  |  |  |  |
| Forfeited Discounts/Account 450: |  |  |  |  |
| 7 | Late Payment Charges |  |  | 3,750 |
| 8 | Returned Check Charges |  |  | - |
| 9 | Reconnect Fees |  |  | 717 |
| 10 | Total Account 450 |  |  | 4,467 |
| 11 | Miscellaneous Service |  |  | 620 |
| 12 | DL Transmission Dispatch |  |  | 700 |
| Rent from Electric Property/Account 454: |  |  |  |  |
| 13 | Rent - Electric Property |  |  | 11,650 |
| 14 | Customer Work - Reimburse \& O\&M |  |  | 319 |
| 15 | - Pole Attachment |  |  | - |
| 16 | Total Account 454 |  |  | 11,969 |
| 17 | Other Electric Revenues/Account 456: |  |  |  |
| 18 | Other Electric Revenues (456.01) |  |  | 670 |
| 19 | AES BV Partners - Transmission |  |  | - |
| 20 | Dominion Marketing Revenue |  |  | - |
| 21 | PHM DLCO Firm |  |  | - |
| 22 | Transmission-EGS |  |  | 84,705 |
| 23 | Transmission - Wholesale |  |  | (257) |
| 24 | Transmission - Tax Norm |  |  | 1,388 |
| 25 | Total Account 456 |  |  | 86,506 |
| Total Other Revenue |  |  |  |  |
| 26 |  |  |  |  |
|  | Total Other Operating Revenues |  |  | 104,262 |
| 27 |  |  |  |  |
|  | Total Operating Revenues |  | \$ | 975,671 |

# Duquesne Light Company Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 <br> (\$ in Thousands) <br> Operation and Maintenance Expenses 

Schedule B-4

| $\begin{gathered} \text { Line } \\ \text { No } \\ \hline \end{gathered}$ | Description | $\begin{gathered} \text { Account } \\ \text { No } \\ \hline \end{gathered}$ | Forecast FTY |  |
| :---: | :---: | :---: | :---: | :---: |
| Purchased Power Expenses: |  |  |  |  |
| 1 | Purchased power | 555 | \$ | 206,041 |
| 2 | Other Power Supply Expense | 556 |  | - |
| 3 | Total Purchased Power Expenses |  |  | 206,041 |
| Transmission Expense: |  |  |  |  |
| 4 | Operation Supervision \& Engineering | 560 |  | 1,179 |
| 5 | Load Dispatching | 561 |  | 665 |
| 6 | Station Expenses | 562 |  | 127 |
| 7 | Overhead Line Expenses | 563 |  | 497 |
| 8 | Underground Line Expenses | 564 |  | 224 |
| 9 | Transmission of Electricity by Others | 565 |  | - |
| 10 | Miscellaneous Transmission Expenses | 566 |  | 4,845 |
| 11 | Rents | 567 |  | - |
| 12 | Maintenance Supervision \& Engineering | 568 |  | 875 |
| 13 | Maintenance of Structures | 569 |  | 808 |
| 14 | Maintenance of Station Equipment | 570 |  | 1,889 |
| 15 | Overhead Lines | 571 |  | 922 |
| 16 | Underground Lines | 572 |  | 0 |
| 17 | Miscellaneous Maintenance \& Repair | 573 |  | 515 |
| 18 | Total Transmission Expenses |  |  | 12,546 |
| Distribution Expense: |  |  |  |  |
| 19 | Operation Supervision \& Engineering | 580 |  | 9,207 |
| 20 | Load Dispatching | 581 |  | 1,009 |
| 21 | Station Expenses | 582 |  | 347 |
| 22 | Overhead Line Expense | 583 |  | 524 |
| 23 | Underground Line Expense | 584 |  | 581 |
| 24 | Street Lighting \& Signal Systems | 585 |  | - |
| 25 | Meter Expenses | 586 |  | 3,894 |
| 26 | Customer Installations Expense | 587 |  | 2 |
| 27 | Miscellaneous Expenses | 588 |  | 10,235 |
| 28 | Rents | 589 |  | - |
| 29 | Total Distribution Operation Expenses |  |  | 25,798 |
| 30 | Maintenance Supervision \& Engineering | 590 |  | (191) |
| 31 | Maintenance of Structures | 591 |  | 95 |
| 32 | Maintenance of Station Equipment | 592 |  | 2,604 |
| 33 | Maintenance of OH lines | 593 |  | 24,733 |
| 34 | Maintenance of Underground lines | 594 |  | 2,242 |
| 35 | Maintenance of Line Transformers | 595 |  | 29 |
| 36 | Maintenance of Street Lighting \& Signals | 596 |  | 533 |
| 37 | Maintenance of Meters | 597 |  | 374 |
| 38 | Maintenance of Miscellaneous Plant | 598 |  | 76 |
| 39 | Total Distribution Maintenance Expenses |  |  | 30,496 |
| 40 | Total Distribution Expenses |  |  | 56,294 |


| Duquesne Light Company | Schedule <br> Before The Pennsylvania Public Utility Commission | B-4 <br> Bachota |  |
| :---: | :---: | :---: | :---: |
| Future Test Year -12 Months Ended December 31, 2021 | Page | 2 | of 2 |
| (\$ in Thousands) |  |  |  |
| Operation and Maintenance Expenses |  |  |  |


| Line No | Description | $\begin{gathered} \text { Account } \\ \text { No } \\ \hline \end{gathered}$ | Forecast FTY |
| :---: | :---: | :---: | :---: |
|  | Customer Accounting Expense: |  |  |
| 41 | Supervision | 901 | 12,783 |
| 42 | Customer Assistance | 902 | 335 |
| 43 | Records \& Collections | 903 | 749 |
| 44 | Uncollectible Accounts | 904 | 7,109 |
| 45 | Miscellaneous Expenses | 905 | - |
| 46 | Total Customer Accounts Expense |  | 20,976 |
|  | Customer Services Expense: |  |  |
| 47 | Customer Service-Supervision | 907 | - |
| 48 | Customer Service-Customer Assistance | 908 | 22,202 |
| 49 | Customer Service-Information and Instruction | 909 | - |
| 50 | Customer Service-Miscellaneous Service \& Info | 910 | - |
| 51 | Total Customer Service \& Informational Expenses |  | 22,202 |
|  | Sales Expense: |  |  |
| 52 | Supervision | 911 | - |
| 53 | Demonstration and Selling Expenses | 912 | - |
| 54 | Advertising Expenses | 913 | - |
| 55 | Miscellaneous Sales Expenses | 916 | - |
| 56 | Total Sales Expense |  | - |
|  | Administrative \& General Expenses: |  |  |
| 57 | Administrative and General Salaries | 920 | 58,900 |
| 58 | Office Supplies and Expenses | 921 | 8,657 |
| 59 | Administrative Expenses Transferred - Credit | 922 | - |
| 60 | Outside Services Employed | 923 | 32,219 |
| 61 | Property Insurance | 924 | 6,394 |
| 62 | Injuries and Damages | 925 | 256 |
| 63 | Employee Pensions and Benefits | 926 | 3,374 |
| 64 | Regulatory Commission Expenses | 928 | 782 |
| 65 | General Advertising Expenses | 930.1 | - |
| 66 | Miscellaneous General Expenses | 930.2 | 7,216 |
| 67 | Rents | 931 | 3,955 |
| 68 | Total Operation |  | 121,753 |
| 69 | Maintenance of General Plant | 935 | 12,506 |
| 70 | Total Administrative and General Expenses |  | 134,259 |
| 71 | Total Operation \& Maintenance Expenses- |  | \$ 452,318 |

[^22]| Duquesne Light Company | Schedule <br> Before The Pennsylvania Public Utility Commission | B-5 <br> Sitness: |
| :---: | :---: | :---: |
| Suture Test Year - $\mathbf{1 2}$ Months Ended December 31, 2021 |  |  |
| (\$ in Thousands) | Page | 1 |
| of 1 |  |  |




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| Capitalization |  |
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| $\$$ | $1,531,814$ |
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Description

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Exhibit 3 FTY 2021 4-8-21
B-7 (A41..Q80)

C-2
Bachota/O'Brien
1 of 4


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 G/L a/c \# 106
L $5+L 6$

| Duquesne Light Company | Schedule | C-2 |  |
| :---: | :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | Bachota/O'Brien |  |
| Future Test Year - 12 Months Ended December 31, 2021 | Page | 2 | of 4 |

(\$ in Thousands)
Pro Forma Plant Summary


```
Exhibit 3 FTY 2021 4-8-21
```

C2 P2 A1..J60

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) <br> SCHEDULE C-2 <br> Witness: Bachota/O'Brien <br> Page 3 of 4 

## SUMMARY PLANT IN SERVICE

 1/1/21 to 12/31/21

[^23]C-2 2 3 to 4 (A1..O80)

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 <br> SCHEDULE C-2 <br> Witness: O'Brien <br> Page 4 of 4 

(\$ in Thousands)
PLANT ADJUSTMENTS
1/1/21 to $12 / 31 / 21$


| Duquesne Light Company | Schedule | C-3 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | Page Bachota/O'Brien |
| Future Test Year - 12 Months Ended December 31, 2021 | 1 |  |
| (\$ in Thousands) |  |  |
| Summary of Accumulated Depreciation |  |  |

[1]
[2]
[3]
[4]

| Line <br> \# | Description | [1] | [2] |  | [3] |  | [4] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | FTY Ended December 31, 2021 |  |  |  |  |  |
|  |  | Account <br> Number |  | $\begin{aligned} & \hline \text { Forecast } \\ & 12 / 31 / 21 \\ & \hline \end{aligned}$ | Pro Forma Adjustments |  | $\begin{gathered} \hline \text { Pro Forma } \\ 12 / 31 / 21 \\ \hline \end{gathered}$ |  |
| 1 | Total Intangible Plant |  | \$ | 221,087 | \$ | 5,495 | \$ | 226,582 |
| 2 | Land and Land Rights |  |  | 318,882 |  | - |  | 318,882 |
| 3 | Station Equipment |  |  | 982,423 |  | - |  | 982,423 |
| 4 | Poles and Fixtures |  |  | 165,098 |  | 113 |  | 165,211 |
| 5 | ACCUMULATED DEPRECIATION | Sum L 1 to L 4 |  | 1,687,490 |  | 5,608 |  | 1,693,098 |
| 6 | ACCUMULATED AMORTIZATION |  |  |  |  |  |  |  |
| 7 | TOTAL ACC DEPR \& AMORTIZATION | L $5+\mathrm{L} 6$ |  | 1,687,490 | \$ | 5,608 | \$ | 1,693,098 |

## Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission Future Test Year-12 Months Ended December 31, 2021 (\$ in Thousands)

Accumulated Provision for Depreciation

| $\begin{gathered} \text { Line } \\ \text { No } \\ \hline \end{gathered}$ | Description | Reference Or Factor | $\qquad$ |  | $\begin{gathered} \text { [2] } \\ \text { Forecast } \\ 12 / 31 / 21 \\ \hline \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Intangible Plant |  |  |  |  |  |
| 1 | Organizations |  | 301 | \$ | - |
| 2 | Franchises \& Consents |  | 302 |  | - |
| 3 | Software |  | 303 |  | 221,087 |
| 4 | Total Intangible Plant | SumL1 to L3 |  |  | 221,087 |
| Transmission Plant: |  |  |  |  |  |
| 5 | Land and Land Rights |  | 350 |  | (6) |
| 6 | Structures and Improvements |  | 352 |  | 11,141 |
| 7 | Station Equipment |  | 353 |  | 147,896 |
| 8 | Towers and Fixtures |  | 354 |  | 34,345 |
| 9 | Poles and Fixtures |  | 355 |  | 16,066 |
| 10 | Overhead Conductors \& Devices |  | 356 |  | 39,897 |
| 11 | Underground Conduit |  | 357 |  | 33,558 |
| 12 | Underground Conduit \& Devices |  | 358 |  | 34,449 |
| 13 | Roads and Trails |  | 359 |  | 1,536 |
| 14 | Other Transmission Plant |  |  |  | - |
| 15 | Total Transmission Plant | Sum L 5 to L 14 |  |  | 318,882 |
| Distribution Plant: |  |  |  |  |  |
| 16 | Land and Land Rights |  | 360 |  | - |
| 17 | Structures and Improvements |  | 361 |  | 42,712 |
| 18 | Station Equipment |  | 362 |  | 179,163 |
| 19 | Poles, Towers and Fixtures |  | 364 |  | 183,777 |
| 20 | Overhead Conductors and Devices |  | 365 |  | 175,283 |
| 21 | Underground Conduit |  | 366 |  | 51,775 |
| 22 | Underground Conductors and Devices |  | 367 |  | 127,615 |
| 23 | Line Transformers |  | 368 |  | 131,617 |
| 24 | OH \& UND Services |  | 369 |  | 33,146 |
| 25 | Meters \& Appurtencies |  | 370 |  | 31,971 |
| 26 | Meter Communication Equipment |  | 370.1 |  | - |
| 27 | Street Lighting |  | 373 |  | 25,364 |
| 28 | Other Distribution Plant |  |  |  | - |
| 29 | Total Distribution Plant | Sum L 16 to L 28 |  |  | 982,423 |
| General Plant: |  |  |  |  |  |
| 30 | Land and Land Rights |  | 389 |  | - |
| 31 | Structures and Improvements |  | 390 |  | 63,328 |
| 32 | Office Equipment \& Equipment |  | 391 |  | 966 |
| 33 | Transportation Equipment |  | 392 |  | 54,168 |
| 34 | Stores Equipment |  | 393 |  | 839 |
| 35 | Tools, Shop and Garage Equipment |  | 394 |  | 9,626 |
| 36 | Laboratory Equipment |  | 395 |  | 910 |
| 37 | Power Operated Equipment |  | 396 |  | 1,775 |
| 38 | Communication Equipment |  | 397 |  | 33,292 |
| 39 | Miscellaneous Equipment |  | 398 |  | 194 |
| 40 | Total General Plant | Sum L 30 to L 39 |  |  | 165,098 |
| 41 | Total Accumulated Depreciation-Accounts 101 \& 106 | L4+L15+L29+ |  | \$ | 1,687,490 |

Duquesne Light Company Future Test Year－ 12 Months Ended December 31， 2021 （\＄in Thousands）


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Account
Number $\begin{gathered}\text { Balance } \\ 12 / 31 / 20\end{gathered}$




0 TOTAL DISTRIBUTION PLANT 32 TOTAL DISTRIBUTION PLANT




 Power operated equipment
Eliectricomuminactions equipment
Miscellaneoous equipment
total general




Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021
(\$ in Thousands)
Working Capital
[1]
Line
No Description

Reference

| 1 | Operation \& Maintenance Expenses | C-4, P 2, L 11 | \$ | 17,648 |
| :---: | :---: | :---: | :---: | :---: |
| 2 | Tax Expense | C-4, P 7, L 12 |  | 22,243 |
| 3 | Interest Payments | C-4, P 8, L 9 |  | $(5,361)$ |
| 4 | Supply | C-4, P 2 Ls 16-18 |  | 13,189 |
| 5 | Average Prepayments | C-4, P 11, L 24 |  | 18,260 |
| 6 | Total Cash Working Capital Requirements | Sum Ls 1 to 5 | \$ | 65,978 |




\section*{Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) <br> | Schedule |  |
| :---: | :---: |
| C-4 |  |
| Witness: |  |
| Page | 4 |
| O'Brien |  |
| of 10 |  |}

Revenue By Class of Service

| Line <br> \# |  | [1] |  | [2] |  | [3] |  | [4] |  | [5] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Description |  | Residential | Commercial |  | Industrial |  | Lighting |  | TOTAL |  |
|  |  |  |  |  |  |  |  |  |  |  | 1] to [4] |
| 1 | January, 2018 |  | 51,267 |  | 21,829 |  | 4,274 |  | 1,038 |  | 78,407 |
| 2 | February |  | 41,493 |  | 20,339 |  | 2,974 |  | 1,050 |  | 65,856 |
| 3 | March |  | 43,899 |  | 22,225 |  | 3,675 |  | 1,060 |  | 70,859 |
| 4 | April |  | 37,271 |  | 19,105 |  | 3,453 |  | 1,072 |  | 60,901 |
| 5 | May |  | 44,876 |  | 23,269 |  | 4,051 |  | 1,004 |  | 73,199 |
| 6 | June |  | 49,075 |  | 21,928 |  | 4,084 |  | 978 |  | 76,065 |
| 7 | July |  | 62,977 |  | 23,714 |  | 3,191 |  | 1,114 |  | 90,997 |
| 8 | August |  | 55,709 |  | 23,764 |  | 3,872 |  | 993 |  | 84,338 |
| 9 | September |  | 38,148 |  | 13,851 |  | 2,028 |  | 501 |  | 54,529 |
| 10 | October |  | 42,632 |  | 22,290 |  | 3,793 |  | 1,209 |  | 69,925 |
| 11 | November |  | 41,073 |  | 21,825 |  | 3,614 |  | 913 |  | 67,426 |
| 12 | December, 2018 |  | 43,782 |  | 20,275 |  | 3,459 |  | 1,031 |  | 68,548 |
| 13 | TOTAL | \$ 552,204 |  | \$ | 254,414 | \$ | 42,468 | \$ | 11,964 | \$ | 861,050 |
| 14 | January, 2019 |  | 50,477 |  | 22,474 |  | 3,959 |  | 1,046 |  | 77,955 |
| 15 | February |  | 43,351 |  | 20,960 |  | 3,419 |  | 1,136 |  | 68,866 |
| 16 | March |  | 43,950 |  | 22,648 |  | 3,941 |  | 1,112 |  | 71,652 |
| 17 | April |  | 36,272 |  | 19,836 |  | 3,411 |  | 1,059 |  | 60,578 |
| 18 | May |  | 39,417 |  | 22,928 |  | 3,749 |  | 936 |  | 67,030 |
| 19 | June |  | 45,815 |  | 21,567 |  | 3,693 |  | 1,200 |  | 72,276 |
| 20 | July |  | 68,521 |  | 25,326 |  | 3,675 |  | 1,048 |  | 98,569 |
| 21 | August |  | 56,395 |  | 23,000 |  | 4,017 |  | 968 |  | 84,380 |
| 22 | September |  | 49,506 |  | 22,281 |  | 3,401 |  | 1,196 |  | 76,384 |
| 23 | October |  | 38,423 |  | 21,222 |  | 4,046 |  | 947 |  | 64,639 |
| 24 | November |  | 43,034 |  | 20,668 |  | 3,619 |  | 1,074 |  | 68,394 |
| 25 | December, 2019 |  | 48,043 |  | 20,909 |  | 3,816 |  | 1,099 |  | 73,867 |
| 26 | TOTAL | \$ | 563,205 | \$ | 263,819 | \$ | 44,747 | \$ | 12,821 | \$ | 884,592 |
| 27 | January, 2020 |  | 46,336 |  | 21,109 |  | 4,651 |  | 1,121 |  | 73,218 |
| 28 | February |  | 43,284 |  | 20,057 |  | 4,328 |  | 989 |  | 68,658 |
| 29 | March |  | 41,684 |  | 19,274 |  | 3,950 |  | 1,220 |  | 66,128 |
| 30 | April |  | 38,817 |  | 17,374 |  | 3,829 |  | 965 |  | 60,985 |
| 31 | May |  | 43,797 |  | 17,415 |  | 3,865 |  | 1,211 |  | 66,288 |
| 32 | June |  | 54,651 |  | 19,805 |  | 3,983 |  | 1,078 |  | 79,517 |
| 33 | July |  | 78,187 |  | 22,583 |  | 3,987 |  | 926 |  | 105,684 |
| 34 | August |  | 64,931 |  | 21,608 |  | 4,135 |  | 1,172 |  | 91,846 |
| 35 | September |  | 45,859 |  | 20,411 |  | 3,623 |  | 1,058 |  | 70,951 |
| 36 | October |  | 39,495 |  | 19,488 |  | 3,807 |  | 1,041 |  | 63,831 |
| 37 | November |  | 41,739 |  | 18,459 |  | 3,455 |  | 1,252 |  | 64,904 |
| 38 | December, 2020 |  | 53,236 |  | 19,580 |  | 3,847 |  | 895 |  | 77,559 |
| 39 | TOTAL | \$ | 592,017 | \$ | 237,163 | \$ | 47,459 | \$ | 12,929 | \$ | 889,568 |


| Duquesne Light Company | Schedule | C-4 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | O'Brien |
| Future Test Year -12 Months Ended December 31, 2021 | Page | 5 |
| (\$ in Thousands) |  |  |

## Summary of Expense Lag Calculations



## PENSION EXPENSE

6 Payment \#

7 Mid-point of Service Period

8 Totals \& (Lead) Lag Days
$\mathrm{L} 6+\mathrm{L} 7$

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| :--- |

7/1/21

## PURCHASED ELECTRICITY

9 Contract Payment Lag

OTHER O \& M EXPENSES

| 10 | FEBRUARY, 2020 |
| :--- | :--- |
| 11 | MAY, 2020 |
| 12 | AUGUST, 2020 |
| 13 | NOVEMBER, 2020 |
|  |  |
| 14 |  |
|  |  |

Sch C-4, Pg 6
Sch C-4, Pg 6
Sch C-4, Pg 6
Sch C-4, Pg 6
Sum L 10 to L $13 \xlongequal{27,006,816}$
\$ 255,174,655 548,155,768 114,871,741 294,376,437

| $1,212,578,601$ |
| :--- |

# Duquesne Light Company Before The PennsyIvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) 

## General Disbursements Lag

|  |  | [1] |  | [2] |  | [3] | [4] |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line \# | Description | Number of CDs |  | Cash isbursements |  | Dollar-Days | Expense <br> Lag-Days |
|  |  |  |  |  |  |  | [3]/[2] |
| FEBRUARY, 2020 |  |  |  |  |  |  |  |
| 1 | Total Monthly Disbursements | 3887 | \$ | 46,788,654 | \$ | 2,083,161,749 | 44.52 |
| 2 | Total Excl Non-Expense \& Under \$1,000 | 398 | \$ | 6,607,592 | \$ | 288,057,124 | 43.59 |
| 3 | Total O \& M Only L $1+\mathrm{L} 2$ | 362 | \$ | 5,894,261 | \$ | 255,174,655 | 43.29 |
| MAY, 2020 |  |  |  |  |  |  |  |
| 4 | Total Monthly Disbursements | 5079 | \$ | 293,381,003 | \$ | 3,007,477,030 | 10.25 |
| 5 | Total Excl Non-Expense \& Under \$1,000 | 488 | \$ | 38,038,452 | \$ | 786,542,849 | 20.68 |
| 6 | Total O \& M Only L 4 + 5 | 449 | \$ | 11,657,694 | \$ | 548,155,768 | 47.02 |
| AUGUST, 2020 |  |  |  |  |  |  |  |
| 7 | Total Monthly Disbursements | 4819 | \$ | 156,815,034 | \$ | 2,312,235,813 | 14.74 |
| 8 | Total Excl Non-Expense \& Under \$1,000 | 153 | \$ | 11,163,082 | \$ | 346,943,342 | 31.08 |
| 9 | Total O \& M Only L7 + 8 | 138 | \$ | 2,755,418 | \$ | 114,871,741 | 41.69 |
| NOVEMBER, 2020 |  |  |  |  |  |  |  |
| 10 | Total Monthly Disbursements | 4303 | \$ | 86,656,631 | \$ | 1,565,740,748 | 18.07 |
| 11 | Total Excl Non-Expense \& Under \$1,000 | 395 | \$ | 24,178,872 | \$ | 453,555,747 | 18.76 |
| 12 | Total O \& M Only L $10+\mathrm{L} 11$ | 358 | \$ | 6,699,443 | \$ | 294,376,437 | 43.94 |
| TOTAL FOUR TEST MONTHS |  |  |  |  |  |  |  |
| 13 | Total Monthly Disbursements $\mathrm{L} 1+\mathrm{L} 4+\mathrm{L} 7+\mathrm{L} 10$ | 18088 | \$ | 583,641,321 | \$ | 8,968,615,341 | 15.37 |
| 14 | Total Excl Non-Expense \& Under \$1, C 2 + L $5+\mathrm{L} 8+\mathrm{L} 11$ | 1434 | \$ | 79,987,999 | \$ | 1,875,099,061 | 23.44 |
| 15 | Total O \& M Only L L + L 6 + L 9 + L 12 | 2243 | \$ | 27,006,816 | \$ | 1,212,578,601 | 44.90 |
| Exhibit 3 FTY 2021 4-8-21 <br> C_4_p6 (A291..N350) |  |  |  |  |  |  |  |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021
(\$ in Thousands)
Tax Expense Lag Days

| Schedule |  | C-4 |
| :---: | :---: | :---: |
| Witness: |  | O'Brien |
| Page | 7 | of 10 |

[1]
[2]
[3]


# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Future Test Year - 12 Months Ended December 31, 2021 <br> (\$ in Thousands) <br> Interest Payments 




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{[4]} \\
\text { TOTAL }
\end{gathered}
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$$


PREPAID EXPENSES

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - $\mathbf{1 2}$ Months Ended December 31, 2021
( $\$$ in Thousands)
Plant Materials and Operating Supplies

$\begin{array}{ll}\text { Schedule } \\ \text { Witness: } \\ \text { Page } & \end{array} \quad \begin{aligned} & \text { C-6 } \\ & \text { Simpson } \\ & \text { of } 1\end{aligned}$


Customer Deposits and Interest


| Schedule Witness: Page |  | $\begin{aligned} & \text { C-8 } \\ & \text { Bachota/O'Brien } \\ & 1 \text { of } 1 \end{aligned}$ |  |
| :---: | :---: | :---: | :---: |
|  | [2] |  |  |
|  | SFAS - 87 Pension Capitalized |  | sion <br> bution <br> Under) <br> - 87 <br> alized |
| \$ | 82,824 | \$ | 48,567 |
| \$ | 7,715 | \$ | 12,285 |
| \$ | 10,909 | \$ | 41,591 |
| \$ | 11,210 | \$ | 290 |
| \$ | 7,636 | \$ | $(2,636)$ |
| \$ | 9,275 | \$ | $(4,275)$ |
| \$ | 6,814 | \$ | $(1,814)$ |
| \$ | 136,383 | \$ | 94,008 |

 Duquesne Light Company
Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands)
Jurisdictional Rate Base, Net Operating Income and Revenue Increase
Table No 1
Earned Rate of Return with Additional Proposed Revenues - PA Jurisdiction

| Reference | (1) <br> ROR Before Additional Revenues |  | (2) <br> Proposed <br> Additional <br> Revenues |  | (3) <br> ROR With <br> Additional <br> Revenues |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| D-1, P 3 | \$ | 2,222,251 | \$ | - | \$ | 2,222,251 |
| D-2, P 2 | \$ | 552,301 | \$ | 56,199 | \$ | 608,500 |
| D-2, P 2 |  | - |  | - |  | - |
| D-2, P 2 |  | 13,658 |  | - |  | 13,658 |
| L 2 to L 4 |  | 565,959 |  | 56,199 |  | 622,158 |
| D-2, P 2 |  | 192,755 |  | 813 |  | 193,568 |
| D-2, P 2 |  | 181,080 |  | - |  | 181,080 |
| D-2, P 2 |  | 35,551 |  | 3,273 |  | 38,824 |
| L 6 to L 8 |  | 409,387 |  | 4,085 |  | 413,472 |
| L 5-L9 | \$ | 156,572 | \$ | 52,114 | \$ | 208,686 |
| D-22 Dist |  | 14,093 |  | 9,851 |  | 23,944 |
| D-22 Dist |  | 5,311 |  | 5,206 |  | 10,517 |
| L 11 + L 12 |  | 19,405 |  | 15,057 |  | 34,462 |
| L $9+\mathrm{L} 13$ |  | 428,792 |  | 19,143 |  | 447,934 |
| L 5-L 14 | \$ | 137,167 | \$ | 37,057 | \$ | 174,224 |
| L 15 / L 1 |  | 6.17\% |  |  |  | 7.84\% |

Exhibit 3 FTY 2021 4-8-21
D_1_P1 (A1. L50)
$\begin{array}{ll}\text { Schedule } & \text { D-1 } \\ \text { Witness: } & \text { O'Brien/Gorman } \\ \text { Page } & 2 \quad \text { of } 3\end{array}$ Before The Pennsylvania Public Utility Commission
Future Test Year - $\mathbf{1 2}$ Months Ended December 31, 2021
(\$ in Thousands)
Jurisdictional Rate Base, Net Operating Income and Revenue Increase
Table No 2

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\text { Total } \\
\text { Company }
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\text { Reference } \\
\text { Table No } 1
\end{array}
\end{array}
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Exibit 3 3 FTY 2021 4-8-21
D_5_p1 (A1..V60)

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\begin{array}{c}
\text { Schedule }
\end{array} & \text { D-5A } \\
\text { Witness: } & \text { O'Brien } \\
\text { Page } & 1 \\
\text { of } 1
\end{array}
$$

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Exhibit 3 FTY 2021 4－8－21
$\begin{array}{ccc}\begin{array}{c}\text { Duquesne Light Company } \\ \text { Before The Pennsylvania Public Utility Commission }\end{array} & \begin{array}{c}\text { Schedule } \\ \text { Witness：}\end{array} & \begin{array}{c}\text { D－5B } \\ \text { O＇Brien }\end{array} \\ \text { Future Test Year－12 Months Ended December 31，2021 } & \text { Page } & 1 \\ \text { of } 1\end{array}$
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－－－－Street Lighting \＆UMS
10 Total
L 8 to L 13

L1 to L6

Target Revenue Loss in 2023
－－Residential

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－－－－Street Lighting \＆UMS
Total


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Schedule D-5C

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Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021
(\$ in Thousands)
Revenue Annualization

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\begin{gathered}
{[3]} \\
\text { Medium C\&I } \\
\hline \$ \quad 98,992 \\
\hline
\end{gathered}
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\begin{gathered}
{[2]} \\
\text { Small C\&1 } \\
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| 541,894 |
| :--- |


| $[1]$ |  |
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|  | Residential |
| $\$$ | 473,396 |
|  | 155,183 |

$\stackrel{\text { U. }}{\substack{~}}$
$\xlongequal{\$ 318,213} \xlongequal{\$} \quad 45,357$
$\begin{array}{r} \\ \hline \\ \hline\end{array}$
Revenues net of Commodity - Margin
$(\mathrm{L} 1-\mathrm{L} 2)$
(L1-L2)
4 Average Monthly Customers in TY
$\stackrel{\oplus}{\leftrightharpoons}$ ㅇ

Exhibit 3 FTY 2021 4-8-21
D_5C (A181..V240)


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Duquesne Light Company Future Test Year at Proposed Distribution Rates
12 Month Period Ending December 31, 2021 at Customer Shopping Levels

| A | B | C | D | E | F | G | H | 1 | J |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate Class | Distribution Revenue at Proposed Rates | Transmission Present Rate Revenue (w/shopping) | Generation Present Rate Revenue (w/shopping) | Total Proposed Rate Revenue (Sum Col. C - E) | Total Revenue Change | Total Percent Change | Distribution Revenue Change | Distribution Percent Change |
| 1 | RS | \$339,210,747 | \$47,754,661 | \$134,793,383 | \$521,758,791 | \$37,524,757 | 7.7\% | \$37,524,757 | 12.4\% |
| 2 | RH | \$34,060,890 | \$2,982,411 | \$17,916,532 | \$54,959,832 | \$6,761,124 | 14.0\% | \$6,761,124 | 24.8\% |
| 3 | RA | \$4,001,551 | \$678,963 | \$2,472,748 | \$7,153,262 | \$749,984 | 11.7\% | \$749,984 | 23.1\% |
| 4 | GS | \$13,326,105 | \$780,236 | \$3,753,493 | \$17,859,835 | \$1,996,491 | 12.6\% | \$1,996,491 | 17.6\% |
| 5 | GM<25 | \$38,806,759 | \$4,877,572 | \$17,018,018 | \$60,702,348 | \$6,423,012 | 11.8\% | \$6,423,012 | 19.8\% |
| 6 | GM>25 | \$81,442,360 | \$6,565,203 | \$27,387,570 | \$115,395,134 | \$15,534,618 | 15.6\% | \$15,534,618 | 23.6\% |
| 7 | $\mathrm{GMH}<25$ | \$4,051,966 | \$312,241 | \$1,772,375 | \$6,136,583 | \$596,342 | 10.8\% | \$596,342 | 17.3\% |
| 8 | $\mathrm{GMH} \times 25$ | \$7,614,757 | \$408,463 | \$2,298,049 | \$10,321,269 | \$1,388,724 | 15.5\% | \$1,388,724 | 22.3\% |
| 9 | GL | \$76,068,846 | \$1,330,129 | \$6,198,206 | \$83,597,181 | \$11,806,456 | 16.4\% | \$11,806,456 | 18.4\% |
| 10 | GLH | \$9,390,217 | \$325,530 | \$1,730,029 | \$11,445,775 | \$1,514,424 | 15.2\% | \$1,514,424 | 19.2\% |
| 11 | L | \$22,633,390 | \$0 | \$0 | \$22,633,390 | \$3,232,962 | 16.7\% | \$3,232,962 | 16.7\% |
| 12 | HVPS | \$323,743 | \$271,055 | \$1,468,304 | \$2,063,103 | \$1,257 | 0.1\% | \$1,257 | 0.4\% |
| 13 | AL | \$1,166 | \$119 | \$302 | \$1,587 | \$71 | 4.7\% | \$71 | 6.5\% |
| 14 | SE | \$1,571,485 | \$0 | \$0 | \$1,571,485 | \$95,371 | 6.5\% | \$95,371 | 6.5\% |
| 15 | SM | \$9,907,082 | \$1,220 | \$254,696 | \$10,162,999 | \$582,475 | 6.1\% | \$582,475 | 6.2\% |
| 16 | SH | \$123,255 | \$86 | \$7,591 | \$130,931 | \$9,624 | 7.9\% | \$9,624 | 8.5\% |
| 17 | UMS | \$1,363,469 | \$25,807 | \$170,878 | \$1,560,154 | \$261,031 | 20.1\% | \$261,031 | 23.7\% |
| 18 | PAL | \$464,238 | \$310 | \$59,343 | \$523,891 | \$32,647 | 6.6\% | \$32,647 | 7.6\% |
| 19 | Total | \$644,362,027 | \$66,314,006 | \$217,301,517 | \$927,977,549 | \$88,511,370 | 10.5\% | \$88,511,370 | 15.9\% |
| 20 | Other Electric Revenue: |  |  |  |  |  |  |  |  |
| 21 | Sales for Resale (Acct. 447) |  |  | \$1,560,000 | \$1,560,000 | \$0 |  | \$0 |  |
| 22 | Late Payment/Returned Check Charges (Acct. 450) | \$3,750,277 |  |  | \$3,750,277 | \$0 |  | \$0 |  |
| 23 | Reconnect Fees/PJM Office (Acct. 451) | \$716,666 | \$700,000 |  | \$1,416,666 | \$0 |  | \$0 |  |
| 24 | Rent Electric Property (Acct. 454) | \$11,649,888 |  |  | \$11,649,888 | \$0 |  | \$0 |  |
| 25 | Rent Electric Property (Acct. 454) |  | \$318,500 |  | \$318,500 | \$0 |  | \$0 |  |
| 26 | Other Revenue (Acct. 456) | \$670,292 |  |  | \$670,292 | \$0 |  | \$0 |  |
| 27 | Utility Operations (Acct. 417) | \$619,933 |  |  | \$619,933 | \$0 |  | \$0 |  |
| 28 | Revenue Annualization | \$1,160,626 |  |  | \$1,160,626 | \$0 |  | \$0 |  |
| 29 | Revenue Loss Adjustment | (\$8,449,647) |  |  | $(\$ 8,449,647)$ | \$0 |  | \$0 |  |
| 30 | Transmission - EGS (Acct. 456) |  | \$84,704,991 |  | \$84,704,991 | \$0 |  | \$0 |  |
| 31 | Transmission - Wholesale (Acct. 456) |  | $(\$ 256,794)$ |  | $(\$ 256,794)$ | \$0 |  | \$0 |  |
| 32 | Transmission - Tax Norm |  | \$1,388,209 |  | \$1,388,209 | \$0 |  | \$0 |  |
| 33 | Subtotal Other Revenue | \$10,118,034 | \$86,854,906 | \$1,560,000 | \$98,532,940 | \$0 |  | \$0 |  |
| 34 | Total Operating Revenue | \$654,480,061 | \$153,168,912 | \$218,861,517 | \$1,026,510,490 | \$88,511,370 | 9.4\% | \$88,511,370 | 15.6\% |

12 Month Period Ending December 31, $\begin{gathered}\text { Duqueste Lest Asear Revent Compant at Present Rates } \\ \text { Futing No Customer Shopping (i.e. } 100 \% \text { Default Service Load) }\end{gathered}$


Duquesne Light Company



I
Distribution
Revenue
Change

Total
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Change
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Transmission
Present Rate
Revenue
(w/o shopping)
-

C
Distribution
Revenue at
Proposed Rates
or
$\$ 188,053,328$
$\$ 21,084,611$
$\$ 3,221,296$





$\$ 3,459$
781,866
$\$ 781,866$
$\$ 814,684$
$\$ 26,706$

1,710


| $\$ 1,560,000$ | $\$ 1,560,000$ |
| :--- | :--- |
| $\$ 3,750,277$ |  |






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 Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year -12 Months Ended December 31, 2021
( $\$$ in Thousands)

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Update Purchased Energy Expenses

[^25]CWC Revenue Allowance
Adjustment for Generation Revenue

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& L 7+L 8 \\
& {[4]-[3]}
\end{aligned}
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Generation Expense
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12






| $\begin{gathered} \text { Line } \\ \# \\ \hline \end{gathered}$ | Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Description | [1] <br> Account Number |  |  |  |  |
| OPERATIONS |  |  |  |  |  |  |
| 1 | Production | 500.509 | \$ | - |  |  |
| 2 | Generation | 546-550 |  | - |  |  |
| 3 | Transmission | 560.567 |  | 5,454 |  |  |
| 4 | Distribution | 580.589 |  | 15,303 |  |  |
| 5 | Customer Accounts | 901-905 |  | 10,062 |  |  |
| 6 | Customer service and information | 907-910 |  | 65 |  |  |
| 7 | Sales | 911-916 |  | - |  |  |
| 8 | Administration and general | 920.931 |  | 39,562 |  |  |
| 9 | Total Operations | SumLitoLs |  | 70,446 |  | - |
| MAINTENANCE |  |  |  |  |  |  |
| 10 | Production | 510.514 |  | - |  |  |
| 11 | Generation | 551-557 |  | - |  |  |
| 12 | Transmission | 568.573 |  | 2,806 |  |  |
| 13 | Distribution | 590.598 |  | 13,927 |  |  |
| 14 | Administration and general | 935 |  | 2,678 |  |  |
| 15 | Total Maintenance | SumL10 to L 14 |  | 19,412 |  | - |
| 16 | Total Direct Payroll | L9+L 15 |  | 89,858 |  | - |
| 17 | Percent Increase | L16, C $5 / \mathrm{C} 4$ |  |  |  |  |
| OTHER |  |  |  |  |  |  |
| 18 | Construction | 107 |  |  |  |  |
| 19 | Plant removal | 108 |  | - |  |  |
| 20 | Stores Accounts | 163 |  | - |  |  |
| 21 | Accrued Utility Revenue | 173 |  | - |  |  |
| 22 | Misc. Current \& Accrued Assets | 174 |  | - |  |  |
| 23 | Deferred Debits | 186 |  | - |  |  |
| 24 | Misc Current \& Acrrued Liabilities | 242 |  | - |  |  |
| 25 | Donations | 426 |  | - |  |  |
| 26 | Total To "Clearing" |  |  |  |  |  |
| 27 | TOTAL PAYROLL | Sum L 16 to 26 | S | \$ 89,858 | \$ | . |

[^26]| Line $\qquad$ | Duques <br> Before The Pennsyl Future Test Year - 12 <br> ADJUSTM | ne Light Co vania Public Months End in Thousand <br> ENT---SALARY $\&$ <br> Adjustment \# 7 <br> [1] <br> Reference Or <br> Function | Uti | Comm mber <br> ] <br> ion | 1, | 21 |  | 4] <br> alized <br> ounts |  | [ 5] <br> Amount |  | DULE ess: PAGE ] <br> ount | 2 | D- | n <br> ] <br> orma <br> tal <br> roll |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{aligned} & 1 \\ & 2 \\ & 3 \end{aligned}$ | Budget O\&M Base PR Expense for FTY Budget O\&M Overtime PR Expense for FTY Total O\&M Budget PR Expense | $\begin{gathered} 52 / 48 \\ 80 / 20 \\ \mathrm{~L} 1+\mathrm{L} 2 \end{gathered}$ | \$ | $\begin{array}{r} 41,516 \\ 5,086 \\ \hline 46,602 \end{array}$ | \$ | $\begin{array}{r} 42,462 \\ 794 \\ \hline 43,256 \end{array}$ | \$ | $\begin{array}{r} 83,978 \\ 5,880 \\ \hline 89,858 \end{array}$ |  |  |  |  |  |  |  |
| 4 5 6 | Pro Forma Rate Increase 10/1/18 Pro Forma Rate Increase 1/1/19 Number of Months for Annualization |  |  | 0\% |  | 120 |  |  |  |  |  |  |  |  |  |
| 7 | Pro Forma During FTY | L3* ${ }^{*}$ L4 or 5)** $6 / 12$ | \$ | 1,049 | \$ | 1,298 |  | 2,347 |  |  |  |  |  |  |  |
| 8 | Pro Forma Rate Increase 10/1/21 |  |  | 0\% |  |  |  |  |  |  |  |  |  |  |  |
| 9 | Number of Months |  |  | 0 |  |  |  |  |  |  |  |  |  |  |  |
| 10 | Annualization Adjustment | (L3+L7)*L8*L12/12 | \$ | - |  |  |  | - |  |  |  |  |  |  |  |
| 11 | Total Pro Forma - Existing Employees | [4]L3+L8 |  |  |  |  |  |  |  |  | \$ | 92,205 |  |  |  |
|  | Pro Forma For New Employees |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 12 | Changes to Employee Numbers |  |  | - |  |  |  |  |  |  |  |  |  |  |  |
| 13 | Changes to Employee Numbers |  |  |  |  | - |  |  |  |  |  |  |  |  |  |
| 14 | Total New Employees - On Company List | $\mathrm{L} 10+\mathrm{L} 11$ |  |  |  |  |  |  | \$ | - |  |  |  |  |  |
| 15 | Increase for Overtime | L2/L1*L10 |  | - |  |  |  |  |  | - |  |  |  |  |  |
| 16 | Sub-Total -- Total Pay at Present Rates | Sum L 10 to L 13 |  | - |  | - |  |  |  | - |  |  |  |  |  |
| 17 | Increase for Pay Rates | L 4 or L 5 * L 14 |  | - |  | - |  |  |  | - |  |  |  |  |  |
| 18 | Pro Forma Increase for Change in Employees | L 14 +L 15 |  | - |  | - |  |  |  |  |  | - |  |  |  |
| 19 | Total Pro Forma Payroll | $L 7+L 16$ | \$ | 1,049 | \$ | 1,298 |  |  |  |  | \$ | 92,205 |  |  |  |
| 20 | Total O\&M Budget PR Expense | [3]L 3 |  |  |  |  |  |  |  |  |  | 89,858 |  |  |  |
| 21 | Payroll Increase | [6]L 17-L 18 |  |  |  |  |  |  |  |  |  |  |  | \$ | 2,347 |
| 22 | Percent Increase | L 19/L 18 |  |  |  |  |  |  |  |  |  |  |  |  | 2.612\% |
| Exhibit 3 FTY 2021 4-8-21 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| D_7_p2 (A56..R110) |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |


[A] Time between rate cases - Next Case planned for April 2024 with rates effective 1-1-25


| Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) |  |  |  |  | SCHEDULE Witness: PAGE | D-9 O'Brien of 1 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ADJUSTMENT---EMPLOYEE BENEFITS AND PENSION Adjustment \# 9 |  |  |  |  |  |  |  |
|  |  | [1] | [2] | [3] | [4] |  | [5] |
| $\begin{gathered} \text { Line } \\ \# \\ \hline \end{gathered}$ | Description | Reference | Pension Contribution Payments To Capital | Pension Contribution Payments To Expense | Amount |  | Total |
| PENSION COSTS |  |  |  |  |  |  |  |
| 1 | Contribution - Year Ended 12/31/20 |  | \$ 10,000 |  |  |  |  |
| 2 | Contribution - Year Ended 12/31/21 |  | 10,000 |  |  |  |  |
| 3 | Contribution - Year Ended 12/31/22 |  | 10,000 |  |  |  |  |
| 4 | Total | L 1 to L 3 | \$ 30,000 |  |  |  |  |
| 5 | Number of Years for FTY Average | 3 |  |  |  |  |  |
| 6 | Average for FTY |  | $\xlongequal{\$ 10,000}$ |  |  |  |  |
| 7 | Pension Capitalization / Expense Fac |  |  | 50.0\% | 50.0\% |  |  |
| 8 | Pension Payment To Be Capitalized | L1*L7 |  | \$ 5,000 |  |  |  |
| 9 | Pension Payment To Be Expensed | L6*L7 |  |  | \$ 5,000 |  |  |
| 10 | FAS 87 Pension in FTY Capital Addit |  |  | 6,814 |  |  |  |
| 11 | FAS 87 Pension Expense in FTY |  |  |  | 3,374 |  |  |
| 12 | Pension Adjustment to Rate Base | L8-L 10 |  | $\xlongequal{\$(1,814)}$ |  |  |  |
| 13 | Pro Forma Pension Adjustment | L9-L 11 |  |  |  | \$ | 1,626 |
| Exhibit 3 FTY 2021 4-8-21 |  |  |  |  |  |  |  |


Exhibit 3 FTY 2021 4-8-21
D_11 (A181..N230)




Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands)

Schedule D-20
Witness: Simpson/O'Brien
Page 1 of 2

Taxes Other Than Income Taxes


## GROSS RECEIPT TAX PRO FORMA AT PRESENT RATES

\$ 876,496
$(7,109)$
$(30,392)$
-
838,995
5.90\%

49,501
52,175
$\$ \quad(2,674)$

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Future Test Year - 12 Months Ended December 31, 2021 <br> (\$ in Thousands) 

## Schedule D-20 <br> Witness: O'Brien <br> Page 2 of 2

## Taxes Other Than Income Taxes

| Line$\#$ Description |  | [1] | [2] |  | [3] |  | 4] | [5] <br> Increase <br> in Payroll <br> Taxes |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Account Number |  | FTY |  | S\&W <br> Adjustment |  |  |  |
| 1 | Total Payroll Charged to Expense |  |  | \$ | 89,858 | \$ | 2,347 |  |  |
| 2 | FICA Expense |  |  | \$ | 6,995 |  |  |  |  |
| 3 | FICA Expense - Percent | L2/L1 |  |  | 7.78\% |  | 7.78\% |  |  |
| 4 | Pro Forma FICA Expense on Pro Forma | [4]L1*L3 |  |  |  |  |  | \$ | 183 |
| 5 | FUTA Expense |  |  | \$ | 60 |  |  |  |  |
| 6 | FUTA Expense - Percent | L5/L1 |  |  | 0.07\% |  | 0.07\% |  |  |
| 7 | Pro Forma FUTA Expense on Pro Forn | [4]L1*L6 |  |  |  |  |  |  | 2 |
| 8 | SUTA Expense |  |  | \$ | 364 |  |  |  |  |
| 9 | SUTA Expense - Percent | L8/L1 |  |  | 0.41\% |  | 0.41\% |  |  |
| 10 | Pro Forma SUTA Expense on Pro Form | [4]L1*L9 |  |  |  |  |  |  | 10 |
| 11 | City of Pittsburgh Payroll Tax Expense |  |  | \$ | 650 |  |  |  |  |
| 12 | SUI Expense - Percent | L11/L 1 |  |  | 0.72\% |  | 0.72\% |  |  |
| 13 | Pro Forma SUI Expense on Pro Forma | [4]L1*L12 |  |  |  |  |  |  | 17 |
| 14 | Pro Forma Adjustment | L4 to L 13 |  |  |  |  |  | \$ | 212 |

## Duquesne Light Company Before The PennsyIvania Public Utility Commission Future Test Year-12 Months Ended December 31, 2021 (\$ in Thousands)

Schedule D-21

## Depreciation and Annualization Expense Adjustment



## Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands)

Schedule D-21

## Depreciation and Annualization Expense Adjustment



# Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission Future Test Year - 12 Months Ended December 31, 2021 (\$ in Thousands) 

## Depreciation and Annualization Expense Adjustment

| Line <br> \# | Description |  |  | [2] <br> Current Depreciation Rate $\qquad$ | [ 3] |  | [ 4 ] |  | [5] |  | [6] |  | [7] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Plant Balance At |  |  |  | Other |  | Year |  | Annualized |  |
|  |  |  |  |  |  | Dec-20 |  | Dec-21 |  |  |  |  |  |  |
| 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization |  | 301 |  | \$ | 100 | \$ | 100 | \$ | - | \$ | - | \$ | - |
| 2 | Franchise \& Consent |  | 302 |  |  | 7 |  | 7 |  | - |  | - |  | - |
| 3 | Miscellaneous Intangible Plant |  | 303 |  |  | 326,128 |  | 388,778 |  | - |  | 60,738 |  | 66,061 |
| 4 | TOTAL INTANGIBLE |  | Sum L 1 to L3 |  |  | 326,235 |  | 388,885 |  | - |  | 60,738 |  | 66,061 |
| TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5 | Land \& Land Rights |  | 350 |  |  | 14,384 |  | 15,821 |  | - |  | - |  | - |
| 6 | Structures \& Improvements |  | 352 |  |  | 33,109 |  | 35,315 |  | - |  | 1,061 |  | 1,094 |
| 7 | Station Equipment |  | 353 |  |  | 432,945 |  | 488,829 |  | - |  | 16,516 |  | 17,438 |
| 8 | Towers and Fixtures |  | 354 |  |  | 78,247 |  | 76,590 |  | - |  | 1,603 |  | 1,593 |
| 9 | Poles and Fixtures |  | 355 |  |  | 59,118 |  | 57,017 |  | - |  | 1,105 |  | 1,085 |
| 10 | Overhead Conductors \& Devices |  | 356 |  |  | 139,592 |  | 129,659 |  | - |  | 2,409 |  | 2,334 |
| 11 | Underground Conduit |  | 357 |  |  | 80,849 |  | 83,002 |  | - |  | 1,479 |  | 1,497 |
| 12 | Underground Conductors \& Devices |  | 358 |  |  | 147,799 |  | 150,359 |  | - |  | 2,714 |  | 2,738 |
| 13 | Road and Trails |  | 359 |  |  | 10,186 |  | 10,186 |  | - |  | 180 |  | 180 |
| 14 | Regional Trans - Computer Hardware |  | 382 |  |  | - |  | - |  | - |  | - |  | - |
| 15 | Regional Trans - Computer Software |  | 383 |  |  | - |  | - |  | - |  | - |  | - |
| 16 | TOTAL TRANSMISSION PLANT |  | Sum L 5 to L 15 |  |  | 996,229 |  | 1,046,778 |  | - |  | 27,067 |  | 27,959 |
| DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 17 | Land \& Land Rights |  | 360 |  |  | 23,190 |  | 23,190 |  | - |  | - |  | - |
| 18 | Structures \& Improvements |  | 361 |  |  | 70,294 |  | 71,091 |  | - |  | 1,508 |  | 1,516 |
| 19 | Station Equipment |  | 362 |  |  | 504,801 |  | 530,048 |  | - |  | 12,529 |  | 12,807 |
| 20 | Storage Battery Equipment |  | 363 |  |  | - |  | - |  | - |  | - |  | - |
| 21 | Poles, Towers and Fixtures |  | 364 |  |  | 596,620 |  | 597,387 |  | - |  | 16,737 |  | 16,745 |
| 22 | Overhead Conductors and Devices |  | 365 |  |  | 576,573 |  | 603,286 |  | - |  | 16,010 |  | 16,368 |
| 23 | Underground Conduit |  | 366 |  |  | 146,553 |  | 197,042 |  | - |  | 2,476 |  | 2,830 |
| 24 | Underground Conductors and Devices |  | 367 |  |  | 437,017 |  | 444,270 |  | - |  | 11,766 |  | 11,865 |
| 25 | Line Transformers |  | 368 |  |  | 432,109 |  | 468,538 |  | - |  | 16,494 |  | 17,132 |
| 26 | Services |  | 369 |  |  | 102,586 |  | 111,371 |  | - |  | 5,817 |  | 5,904 |
| 27 | Meters |  | 370 |  |  | 142,524 |  | 146,003 |  | - |  | 10,953 |  | 11,084 |
| 28 | Meter Communications Equipment |  | 370.1 |  |  | - |  | (20) |  | - |  | - |  | - |
| 29 | Leased Property On Customers Premises |  | 372 |  |  | - |  | - |  | - |  | - |  | - |
| 30 | Street Lighting and Signaling Systems |  | 373 |  |  | 43,252 |  | 43,887 |  | - |  | 1,317 |  | 1,326 |
| 31 |  | 0 | 0 |  |  | - |  | - |  | - |  | - |  | - |
| 32 | TOTAL DISTRIBUTION PLANT |  | Sum L 17 to L31 |  |  | 3,075,519 |  | 3,236,093 |  | - |  | 95,607 |  | 97,577 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 33 | Land \& Land Rights |  | 389 |  |  | 6,145 |  | 6,145 |  | - |  | - |  | - |
| 34 | Structures \& Improvements |  | 390 |  |  | 144,185 |  | 167,681 |  | - |  | 5,098 |  | 5,462 |
| 35 | Leasehold Improvements |  | LH |  |  | 20,986 |  | 20,500 |  | - |  | 463 |  | 463 |
| 36 | Office furniture |  | 391.1 |  |  | 6,414 |  | 5,329 |  | - |  | 294 |  | 266 |
| 37 | Office equipment |  | 391.2 |  |  | 25,355 |  | 37,991 |  | - |  | 6,335 |  | 7,598 |
| 38 | Transportation equipment |  | 392 |  |  | 66,957 |  | 63,481 |  | - |  | 3,968 |  | 3,860 |
| 39 | Store equipment |  | 393 |  |  | 1,621 |  | 1,379 |  | - |  | 50 |  | 46 |
| 40 | Tools, shop and garage equipment |  | 394 |  |  | 27,833 |  | 28,490 |  | - |  | 1,126 |  | 1,140 |
| 41 | Laboratory equipment |  | 395 |  |  | 1,896 |  | 1,854 |  | - |  | 94 |  | 93 |
| 42 | Power operated equipment |  | 396 |  |  | 3,582 |  | 3,694 |  | - |  | 157 |  | 159 |
| 43 | Electric communications equipment |  | 397 |  |  | 74,175 |  | 71,134 |  | - |  | 4,846 |  | 4,745 |
| 44 | Miscellaneous equipment |  | 398 |  |  | 230 |  | 230 |  | - |  | 12 |  | 12 |
| 45 |  | 0 | 0 |  |  | - |  | - |  | - |  | - |  | - |
| 46 | TOTAL GENERAL |  | Sum L 33 to L45 |  |  | 379,379 |  | 407,908 |  | - |  | 22,443 |  | 23,844 |
| 47 | $\begin{gathered} \text { SUB-TOTAL } \\ (L 4+L 16+L 32 L 46) \end{gathered}$ |  |  |  |  | 4,777,362 |  | 5,079,664 |  | - |  | 205,855 |  | 215,441 |
| 48 | EV Depreciation Adjustment |  | 0 |  |  | - |  | - |  | - |  | - |  | 178 |
| 49 | Cloud Amortization |  |  |  |  | - |  | - |  | - |  | - |  | 178 |
| 50 |  | 0 |  |  |  | - |  | - |  | - |  | - |  | - |
| 51 | TOTAL PLANT IN SERVICE |  | L 47 to L 50 |  | \$ | 4,777,362 | \$ | 5,079,664 | \$ | - | \$ | 205,855 | \$ | 215,797 |



D-22
2 of 4
Schedule
Witness:
Page


D-22
3 of 4 Schedule
Witness:
Page


$\begin{aligned} & \text { Exhibit } 3 \text { FTY 2021 4-8-21 } \\ & \text { D_18_p2 (A63..N126) }\end{aligned}$
$\begin{gathered}\text { Duquesne Light Company } \\ \text { Before The Pennsylvania Public Utility Commission }\end{gathered}$

| Before The Pennsylvania Public Utility Commission |  |  |  | Schedule Witness: | D-22 <br> Simpson/O'Brien 4 of 4 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | y Projected Future Test Year - 12 Mo (\$ in Thousa | ded Decem | $31,2022$ | Page |  |
|  | GROSS REVENUE CONV | FACTOR <br> [1] | [2] | [3] |  |
| $\begin{gathered} \text { Line } \\ \# \end{gathered}$ | Description | Reference Or Factor | Tax Rate | Factor |  |
| GROSS REVENUE CONVERSION FACTOR |  |  |  |  |  |
| 1 | GROSS REVENUE FACTOR |  |  | 1.000000 |  |
| 2 | UNCOLLECTIBLE EXPENSES |  |  | (0.013000) |  |
| 3 | NET AFTER UNCOLLECTIBLE COMPONENT | L1+L2 |  | 0.987000 |  |
| 4 | GROSS RECEIPTS TAXES | [3]L3• Rate [2] | (0.059000) | (0.058233) |  |
| 5 | PUC / OCA \& SBA Assessment as a \% of Revenue |  |  | (0.001461) |  |
| 6 | net revenues | SumL3toLs |  | 0.927306 |  |
| 7 | STATE INCOME TAXES | [3]L6. Rate [2] | 0.099900 | (0.092638) |  |
| 8 | FACTOR AFTER STATE TAXES | L6+L7 |  | 0.834668 |  |
| 9 | FEDERAL INCOME TAXES | [3]L8•Rate [2] | 0.210000 | (0.175280) |  |
| 10 | NET OPERATING INCOME FACTOR | L8+L9 |  | 0.659388 |  |
| 11 | GROSS REVENUE CONVERSION FACTOR | 1/L10 |  | 1.516558 |  |
| 12 | INCOME TAX FACTOR FOR GROSS REVENUE | -L7-L9 |  | 26.792\% |  |
| GROSS REVENUE CONVERSION FACTOR |  |  |  |  |  |
| 13 | GROSS REVENUE FACTOR |  |  | 1.000000 |  |
| 14 | STATE INCOME TAXES | [311 13- Rate [2] | 0.099900 | (0.099900) |  |
| 15 | FACTOR AFTER STATE TAXES | L $13+$ L 14 |  | 0.900100 |  |
| 16 | FEDERAL INCOME TAXES | [3] 15 - Rate [2] | 0.210000 | (0.189021) |  |
| 17 | NET OPERATING INCOME FACTOR | L15+L16 |  | 0.711079 |  |
| 18 | GROSS REVENUE CONVERSION FACTOR | 1/L17 |  | 1.406314 |  |
| 19 | Combined Income Tax Factor On Taxable Income | -L 14 -L 16 |  | 28.892\% |  |

Exhibit 3 FTY 2021 4-8-21
D_18_p3 (A130..N189)

# Duquesne Light Company 

Docket No. R-2021-3024750

DLC Exhibit 4 - Historic Test Year<br>(January 1, 2020 through December 31, 2020)<br>Summary of Measures of Value<br>\& Rate of Return

## BOOK 7

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

Book 1
Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation
Book 4
Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

Book 5
Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022)

## Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021) Book 7

Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

Book 8
Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
Statement 4 - Benjamin B. Morris
Statement 5 - Krysia Kubiak
Statement 6-Yvonne Phillips
Statement 7 - Katherine M. Scholl
Statement 8 - Sarah Olexsak
Statement 9 - Jennifer Neiswonger
Book 9
Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
Statement 13-Paul R. Moul
Statement 14-James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10

## Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies

Book 11

## Exhibit 7 - Depreciation Studies

Book 12

## Confidential Testimony and Exhibits

| Witness: Page | Davis 1 of 2 |  |
| :---: | :---: | :---: |
| [1] | [2] | [3] |
| Witness: | \# of Pages | Schedule / Exhibit / Workpaper Location |
| Various | 3 pages | Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Fully Projected Future Test Year - 12 Months Ended December 31, 2022 <br> Future Test Year - 12 Months Ended December 31, 2021 <br> Historic Test Year - 12 Months Ended December 31, 2020 <br> (\$ in Thousands) |
| Bachota | 2 pages | B_1_p1 (A1..J65) |
| Bachota | 1 page | B_2 (A131..J195) |
| Bachota | 1 page | B_3 (A196..J260) |
| Bachota | 2 pages | B_4_p1 (A261..J325) |
| Simpson | 1 page | B_5 (A391..J455) |
| Milligan/Moul | 1 page | B-6 (A1...Q40) |
| Milligan/Moul | 1 page | B-7 (A41...Q80) |
| Milligan/Moul | 1 page | B-8 (A81..Q120) |
| O'Brien/Gorman | 1 page | C_1_to_C_2 (A1..L50) |
| Bachota/O'Brien | 1 page | C_1_to_C_2 (A61..L100) |
| Bachota/O'Brien | 1 page | C2_P2 (A1..J60) |
| Bachota/O'Brien | 1 page | C-2!Page 3 (A1..P80) |
| O'Brien | 1 page | C-2IPage 4 (A81..P160) |
| Bachota/O'Brien | 1 page | C_3_P_1 (A1..L60) |
| Bachota/O'Brien | 1 page | C2_P2 (A1..J60) |
| Bachota/O'Brien | 1 page | C-21Page 3 (A1..P80) |
| O'Brien | 1 page | C-21Page 4 (A81..P160) |
| O'Brien | 1 page | C_4_P_1 (A1..L50) |
| O'Brien | 1 page | C_4_P2 (A51..N110) |
| O'Brien | 2 pages | C_4_P3 (A111..N170) |
| O'Brien | 2 pages | C_4_p5 (A231..N290) |
| O'Brien | 1 page | C_4_p7 (A351..N410) |
| O'Brien | 1 page | C_4_p8 (A411..N470) |
| O'Brien | 1 page | C_4_p10 (A1.,T75) |
| O'Brien | 1 page | C_4_p11 (A1..AL60) |
| Bachota/O'Brien | 1 page | C_5 (A1.L58) |
| Simpson | 1 page | C_6 (A59..L105) |
| Bachota/O'Brien | 1 page | C_7 (A106..L153) |
| Bachota/O'Brien | 1 page | C_8 (A154..L212) |


Duquesne Light Company
Before The PennsyIvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
 Description


# STATEMENT OF REASONS 52 Pa. Code § 53.52(a)(1) 

## INTRODUCTION

Duquesne Light Company ("Duquesne Light" or the "Company") is responsible for providing adequate, efficient, safe, and reliable electric service to its customers and must have the ability to raise capital to meet such requirements. The Company is allowed to charge just and reasonable rates as established by the Pennsylvania Public Utility Commission ("Commission") that provide the Company with a fair opportunity to recover its operating costs and earn a fair return on its investment. This is accomplished through a rate case process.

In this filing, Duquesne Light is requesting that the Commission approve an overall annual increase in distribution revenue of approximately $\$ 115.0$ million. Included in the requested increase is approximately $\$ 29.2$ million in revenue currently collected through one existing Commission approved surcharge, resulting in a net increase in distribution revenue of approximately $\$ 85.8$ million. If granted by the Commission as filed, this request would produce a system average increase in distribution rates of approximately 15.6 percent and an increase in total rates (distribution, transmission, and generation charges) of approximately 7.72 percent for a typical residential using 600 kilowatt-hours per month and taking default power service from the Company. The percentage increase in rates differs for each individual rate class.

## DUQUESNE LIGHT COMPANY'S COSTS

Duquesne Light has controlled its operation and maintenance expenses by implementing process improvements and deploying cost saving measures. Nevertheless, the cost of providing electric distribution service has increased since the last distribution rate increase in December 2018. Significant cost increases have occurred in many areas, including increased investment in facilities to maintain high levels of service and reliability, increased investment in information technology, increased operation and maintenance expenses to maintain safe and reliable service, including expenses associated with the Distribution System Improvement Charge Rider included in base rates, and the expenses associated with the development of an electrical model. In addition, the Company's estimated rate base at December 31, 2022 has increased by approximately $\$ 337$ million since the 2018 base rate proceeding.

## DUQUESNE LIGHT'S FINANCIAL CONDITION

Absent increases in rates, Duquesne Light's financial condition would continue to decline in the fully projected future test year due to continued capital expenditures, increased operating expenses, and a significant decline in customer sales. On a pro forma basis for the fully projected future test year, Duquesne Light anticipates an overall return on rate base of only $5.36 \%$ absent rate relief. These financial results do not provide a return that will permit the Company to attract new capital on reasonable terms. Revenues at present rates do not provide the Company the
opportunity to earn a fair return and simply do not provide sufficient funds for Duquesne Light to adequately operate its business, abide by federal and state requirements, and provide reliable electric service to its customers.

## RELIABLE ELECTRIC SERVICE

Duquesne Light has consistently provided its customers with service at reliability levels as measured by SAIDI and SAIFI that are at or near the top of the levels provided by all the major Pennsylvania electric distribution companies. Duquesne Light has increased efficiency and reliability through the use of technology, such as automated meter reading systems and automated control systems that continuously monitor remote switches that can be operated to reroute power during storms and other outages to quickly restore service to large blocks of customers. The Company also implemented a Long Term Infrastructure Improvement plan to address is ageing infrastructure and improve its reliability.

## CUSTOMER SERVICE

Duquesne Light has consistently provided high levels of customer service. The Company has implemented a series of programs, supported by technology and process improvements, to enhance the customer experience, including a payment arrangement portal, CAP ("Customer Assistance Program") redesign to a percentage of income payment, CAP enrollment automation, and a high bill advisory tool. In 2020, the Company was second lowest for needs further investigation (NFI) residential consumer complaints and in first contact resolution (FCR) statistics for residential and commercial segments compared to the other PA Electric Distribution Companies. Also, in 2020, the J.D. Power Business Electric Utility Customer Satisfaction survey indicated that Duquesne Light ranked third in its peer group (East Mid-size) with a score of 791, only 7 points out of first place.

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020 

| Schedule |  | B-1 |
| :---: | :---: | :--- |
| Witness: |  | Bachota |
| Page | 1 | of 2 |

(\$ in Thousands)
Balance Sheet
Line
No

UTILITY PLANT
Utility Plant (101-106, 108)
Other Utility Plant
Total Plant In Service
Construction Work In Progress (107)
Total Utility Plant
Accumulated Provision for Depreciation
Net Utility Plant
OTHER PROPERTY INVESTMENTS
Non-utility Property (121)
Accumulated Depreciation on NUP (122)
Invest in Subsidiary Company (123.1)
Other Investments (124)
$(2,165)$

Other Special Funds (128)
Special Funds - Non Major Only (129)
Long Term Portion of Derivative Assets (175.1)
Total Other Property and Investments
CURRENT AND ACCRUED ASSETS
Cash \& Other Temporary Investments(131-136) 9,156
Customer Accounts Receivable (142) 173,360
Other Accounts Receivable (143) 12,797
Accum Provision for Uncollectible (144) $\quad(29,692)$
Accounts Receivable Assoc. Comp. (146)
622
Plant Materials \& Supplies (154)
34,246
Stores Expense - Undistributed (163)
Prepayments (165)
Interest \& Dividends Receivable (171)
Miscellaneous Current \& Accrued Assets (174)
Derivative Instrument Assets (175)
(Less) Long Term Portion of Derivative Assets (175.1)
Total Current and Accrued Assets

## DEFERRED DEBITS

Unamortized Debt Expense (181) 7,720

| Other Regulatory Assets (182.3) 198,834 |
| :--- | :--- |

Clearing Accounts (184)
Temporary Facilities(185)
Miscellaneous Deferred Debits (186)
-
Unamortized Loss on Reacquired Debt (189) 17,228
Accumulated Deferred Income Taxes (190)
Total Deferred Debits
171,931

|  | Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) | Schedule Witness: Page | 2 | B-1 <br> Bachota of 2 |
| :---: | :---: | :---: | :---: | :---: |
|  | Balance Sheet |  |  |  |
| $\begin{aligned} & \text { Line } \\ & \text { No } \end{aligned}$ | Description/(Account No) |  |  | [1] <br> HTY <br> Ended 12-31-20 |
|  | PROPRIETARY CAPITAL |  |  |  |
| 1 | Common Stock Issued (201) |  |  | \$ |
| 2 | Preferred Stock Issued (204) |  |  | - |
| 3 | Premium on Capital Stock (207) |  |  | - |
| 4 | Other Paid-in-Capital (208-211) |  |  | 985,348 |
| 5 | Capital Stock Expense (214) |  |  | - |
| 6 | Retained Earnings ( $215,215.2,216,261.1)$ |  |  | 525,347 |
| 7 | Accum Other Comprehensive Income (219) |  |  | $(2,748)$ |
| 8 | Total Propriety Capital \& Margins |  |  | 1,507,947 |
|  | LONG TERM DEBT |  |  |  |
| 9 | Bonds (221) |  |  | 1,395,000 |
| 10 | Advances from Associated Companies (223) |  |  | - |
| 11 | Other Long-Term Debt (224) |  |  | - |
| 12 | Unamortized Premium on LTD (225) |  |  | - |
| 13 | Unamortized Discount on LTD (226) |  |  | - |
| 14 | Total Long-term Debt |  |  | 1,395,000 |
|  | OTHER NON-CURRENT LIABILITIES |  |  |  |
| 15 | Obligations under Capital Leases (227) |  |  | - |
| 16 | Accum. Prov for Injuries \& Damages (228.2) |  |  | 4,547 |
| 17 | Accum. Prov for Pensions \& Benefits (228.3) |  |  | 26,449 |
| 18 | Accum. Miscellaneous Operating Prov (228.4) |  |  | 1,400 |
| 19 | Long-Term Portion of Derivative Instrument Liabilities |  |  | 1,738 |
| 20 | Total Long-term Debt |  |  | 34,134 |
|  | CURRENT \& ACCRUED LIABILITIES |  |  |  |
| 21 | Notes Payable (231) |  |  | - |
| 22 | Accounts Payable (232) |  |  | 130,296 |
| 23 | Notes Payable to Assoc. Companies (233) |  |  | 10,000 |
| 24 | Accounts Payable to Assoc. Cos (234) |  |  | 345 |
| 25 | Customer Deposits (235) |  |  | 7,781 |
| 26 | Taxes Accrued (236) |  |  | 21,492 |
| 27 | Interest Accrued (237) |  |  | 19,206 |
| 28 | Dividends Declared (238) |  |  | - |
| 29 | Tax Collections Payable (241) |  |  | 635 |
| 30 | Misc Current \& Accrued Liabilities (242) |  |  | 30,679 |
| 31 | Derivative Instrument Liabilities (244) |  |  | - |
| 32 | Less: Long Term Portion of Derivative Inst. Liab. Hedge |  |  | - |
| 33 | Total Current \& Accrued Liabilities |  |  | 220,434 |
|  | OTHER DEFERRED CREDITS |  |  |  |
| 34 | Customer Advances for Construction (252) |  |  | - |
| 35 | Other Deferred Credits (253) |  |  | 86,319 |
| 36 | Other Regulatory Liabilities (254) |  |  | 102,229 |
| 37 | Deferred Investment Tax Credit (255) |  |  | - |
| 38 | Unamortized Gain on Reacquired Debt (257) |  |  | - |
| 39 | Accumulated Deferred Income Taxes (282) |  |  | 679,685 |
| 40 | Accumulated Deferred Income Taxes (283) |  |  | 98,937 |
| 41 | Total Other Deferred Credits |  |  | 967,170 |
| 42 | TOTAL LIABILITIES \& OTHER CREDITS |  |  | \$ 4,124,685 |

Duquesne Light Company
Before The PennsyIvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)
Statement of Net Utility Operating Income

| Schedule |  | B-2 |
| :---: | :---: | :--- |
| Witness: |  | Bachota |
| Page | 1 | of 1 |

[1] [2]
HTY
Reference Ended 12-31-20

| Total Operating Revenues |  |  |  |
| :---: | :---: | :---: | :---: |
| Total Sales Revenues | B-3 | \$ | 866,890 |
| Sales for Resale | B-3 |  | 1,575 |
| Other Operating Revenues | B-3 |  | 91,882 |
| Total Revenues |  |  | 960,347 |
| Total Operating Expenses |  |  |  |
| Operation \& Maintenance Expenses | B-4 |  | 451,419 |
| Depreciation Expense |  |  | 131,743 |
| Other Amortization |  |  | 53,458 |
| Amortization of Regulatory Assets |  |  | - |
| Taxes Other Than Income Taxes | B-5 |  | 59,083 |
| Total Operating Expenses |  |  | 695,703 |
| Operating Income Before Income Taxes (OIBIT) |  |  | 264,644 |
| Income Taxes: |  |  |  |
| State | B-5 |  | 12,131 |
| Federal | B-5 |  | 29,456 |
| Total Income Taxes |  |  | 41,587 |
| Net Utility Operating Income |  | \$ | 223,057 |


| Duquesne Light Company | Schedule | B-3 |  |
| :---: | :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | Bachota <br> Historic Test Year - 12 Months Ended December 31, 2020 <br> (\$ in Thousands) | Page |
|  |  |  |  |
| of 1 |  |  |  |

Line
No

## Other Operating Revenues

Forfeited Discounts/Account 450:
Late Payment Charges 816

Returned Check Charges
Total Account 450
Miscellaneous Service Revenues
192

DL Transmission Dispatch

717

Rent from Electric Property/Account 454:
Rent - Electric Property
10,344
Tower Attachment Revenue 319
Customer Work - Reimb O\&M Fixed / Pole Attach
Total Account 454
Other Electric Revenues/Account 456:
Other Electric Revenues (456.01)
191
AES BV Partners - Transmission 288
Dominion Marketing Revenue $\quad 749$
PHM DLCO Firm 1,885
Transmission - EGS 80,317
Transmission - Wholesale $\quad(6,354)$
Transmission - Tax Norm Total Other Revenue

Total Other Operating Revenues
Total Operating Revenues
HTY
Ended 12-31-20
\$ 585,897
215,729
65,264
866,890
$\begin{array}{r}1,575 \\ \hline 868,465\end{array}$

234
1,050

## Electric Operating Revenues

Sales of Electricity:
Total Distribution
Total Generation
Transmission Revenue
Total Sales to Ultimate Customers
Sales for Resale/Account 447
Total Sales Revenue

1,430

78,506
$\qquad$
$\$ \quad 960,347$


Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

Operation and Maintenance Expenses

| Line No | Description | Account No |  | $\begin{aligned} & \text { HTY } \\ & 1 \text { 12-31-20 } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: |
| Purchased Power Expenses: |  |  |  |  |
| 1 | Purchased power | 555 | \$ | 204,370 |
| 2 | Other Power Supply Expense | 557 |  | - |
| 3 | Total Purchased Power Expenses |  |  | 204,370 |
| Transmission Expense: |  |  |  |  |
| 4 | Operation Supervision \& Engineering | 560 |  | 952 |
| 5 | Load Dispatching | 561 |  | 643 |
| 6 | Station Expenses | 562 |  | 100 |
| 7 | Overhead Line Expenses | 563 |  | 445 |
| 8 | Underground Line Expenses | 564 |  | 200 |
| 9 | Transmission of Electricity by Others | 565 |  | - |
| 10 | Miscellaneous Transmission Expenses | 566 |  | 4,534 |
| 11 | Rents | 567 |  | - |
| 12 | Maintenance Supervision \& Engineering | 568 |  | 787 |
| 13 | Maintenance of Structures | 569 |  | 739 |
| 14 | Maintenance of Station Equipment | 570 |  | 2,079 |
| 15 | Overhead Lines | 571 |  | 779 |
| 16 | Underground Lines | 572 |  | - |
| 17 | Miscellaneous Maintenance \& Repair | 573 |  | 480 |
| 18 | Total Transmission Expenses |  |  | 11,738 |
| Distribution Expense: |  |  |  |  |
| 19 | Operation Supervision \& Engineering | 580 |  | 8,322 |
| 20 | Load Dispatching | 581 |  | 1,056 |
| 21 | Station Expenses | 582 |  | 362 |
| 22 | Overhead Line Expense | 583 |  | 489 |
| 23 | Underground Line Expense | 584 |  | 495 |
| 24 | Street Lighting \& Signal Systems | 585 |  | - |
| 25 | Meter Expenses | 586 |  | 3,937 |
| 26 | Customer Installations Expense | 587 |  | 2 |
| 27 | Miscellaneous Expenses | 588 |  | 9,692 |
| 28 | Rents | 589 |  | - |
| 29 | Total Distribution Operation Expenses |  |  | 24,355 |
| 30 | Maintenance Supervision \& Engineering | 590 |  | (371) |
| 31 | Maintenance of Structures | 591 |  | 91 |
| 32 | Maintenance of Station Equipment | 592 |  | 3,096 |
| 33 | Maintenance of OH lines | 593 |  | 25,290 |
| 34 | Maintenance of Underground lines | 594 |  | 2,670 |
| 35 | Maintenance of Line Transformers | 595 |  | 26 |
| 36 | Maintenance of Street Lighting \& Signals | 596 |  | 612 |
| 37 | Maintenance of Meters | 597 |  | 336 |
| 38 | Maintenance of Miscellaneous Plant | 598 |  | 81 |
| 39 | Total Distribution Maintenance Expenses |  |  | 31,831 |
| 40 | Total Distribution Expenses |  |  | 56,186 |

## Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020

(\$ in Thousands)
Operation and Maintenance Expenses

| Line No | Description | Account No | HTY <br> Ended 12-31-20 |
| :---: | :---: | :---: | :---: |
|  | Customer Accounting Expense: |  |  |
| 41 | Supervision | 901 | 13,466 |
| 42 | Customer Assistance | 902 | 384 |
| 43 | Records \& Collections | 903 | 673 |
| 44 | Uncollectible Accounts | 904 | 10,471 |
| 45 | Miscellaneous Expenses | 905 | - |
| 46 | Total Customer Accounts Expense |  | 24,994 |
|  | Customer Services Expense: |  |  |
| 47 | Customer Service-Supervision | 907 | - |
| 48 | Customer Service-Customer Assistance | 908 | 29,610 |
| 49 | Customer Service-Information and Instruction | 909 | - |
| 50 | Customer Service-Miscellaneous Service \& Info | 910 | - |
| 51 | Total Customer Service \& Informational Expenses |  | 29,610 |
|  | Sales Expense: |  |  |
| 52 | Supervision | 911 | - |
| 53 | Demonstration and Selling Expenses | 912 | - |
| 54 | Advertising Expenses | 913 | - |
| 55 | Miscellaneous Sales Expenses | 916 | - |
| 56 | Total Sales Expense |  | - |
|  | Administrative \& General Expenses: |  |  |
| 57 | Administrative and General Salaries | 920 | 41,405 |
| 58 | Office Supplies and Expenses | 921 | 5,064 |
| 59 | Administrative Expenses Transferred - Credit | 922 | - |
| 60 | Outside Services Employed | 923 | 32,251 |
| 61 | Property Insurance | 924 | 5,597 |
| 62 | Injuries and Damages | 925 | 915 |
| 63 | Employee Pensions and Benefits | 926 | 14,905 |
| 64 | Regulatory Commission Expenses | 928 | 782 |
| 65 | Regulatory Commission Expenses | 929 | - |
| 66 | General Advertising Expenses | 930.1 | 715 |
| 67 | Miscellaneous General Expenses | 930.2 | 7,266 |
| 68 | Rents | 931 | 3,886 |
| 69 | Total Operation |  | 112,786 |
| 70 | Maintenance of General Plant | 935 | 11,735 |
| 71 | Total Administrative and General Expenses |  | 124,521 |
| 72 | Total Operation \& Maintenance Expenses- |  | \$ 451,419 |


| Duquesne Light Company | Schedule |  | B-5 |
| :---: | :---: | :---: | :---: |
| Before The PennsyIvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) | Witness: Page | 1 | Simpson of 1 |
| Detail of Taxes |  |  |  |

## Taxes Other Than Income Taxes

Non-revenue related:
PA Real Estate Tax ..... \$ 650
Pennsylvania - PURTA ..... 889
Capital Stock ..... -
Insurance Premiums ..... -
Miscellaneous Taxes ..... (68)
Payroll Taxes
FICA ..... 6,340
SUTA ..... 298
FUTA ..... 35
City of Pittsburgh
Sum L 7 to L 10 ..... 253
Revenue Related:
State Gross Receipts:Pennsylvania50,686

| $\mathrm{L} 6+\mathrm{L} 11+\mathrm{L} 12$ | $\$$ | 59,083 |
| :---: | :---: | ---: |
|  |  |  |
| D-22 | $\$$ | 12,131 |
| $\mathrm{D}-22$ |  | 29,456 |
| $\mathrm{~L} 14+\mathrm{L} 15$ | $\$$ | 41,587 |



Schedule
Witness:
Page

| N | N ¢ | $\begin{aligned} & \underset{\sim}{\infty} \\ & \stackrel{\rightharpoonup}{\infty} \\ & \stackrel{\sim}{\infty} \\ & \underset{\infty}{-} \end{aligned}$ |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | $\begin{aligned} & \underset{N}{N} \\ & \underset{N}{\prime} \end{aligned}$ | $\circ$ <br> 0 <br> 0 <br> 0 <br> 0 <br>  | $1,642,438$ | ¢ |


| \%00.001 | \%00'001 |
| :---: | :---: |
| \%¢\&๕¢ |  |
| \%00'0 | \%00'0 |
| \%s9 97 | \% 99 ¢ $\dagger$ |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

Capital Structure -- 12-31-21 and 12-31-22 | $\begin{array}{c}\text { Line } \\ \text { No }\end{array}$ |  |
| :--- | :--- |
|  | Description |
| Capitalization |  |
| 1 | Long-Term Debt |
| 2 | Preferred Stock |
| 3 | Common Equity |
| 4 | Total |.

$\begin{array}{ll} & \text { Capitalization Ratios } \\ 5 & \text { Long-Term Debt } \\ 6 & \text { Preferred Stock } \\ 7 & \text { Common Equity } \\ 8 & \text { Total }\end{array}$

[^27]


$\xlongequal{\$ 2,664,788} \xlongequal{\$ 2,044,385}$

D-1, Page 1
L $4 /$ L 1

Measures of Value and Rate of Return
1 Total Measure of Value/Rate Base - Net Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

Pro Forma Return at Present rates 2 Amount
3 Percent Amount

Pro Forma Return at Proposed Rates
4






Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
( $\$$ in Thousands)
Year - 12 Months Ended Decemb
( $\$$ in Thousands)
Pro Forma Plant Summary
Sch. C-2, Page 3
Sch. C-2, Page 3
Sch. C-2, Page 3
Sch. C-2, Page 3
Sum (L 1 to L4)
G/L a/c \# 106
$L 5+L 6$
Schedule
Witness:
Page



| Duquesne Light Company | Schedule <br> Wefore The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 <br> (\$ in Thousands) | C-2 <br> Wachota/O'Brien |
| :---: | :---: | :---: |
| Pro Forma Plant by FERC Account | Page | Bach 4 <br> of |

[2]
Pro Forma HTY Ended 12/31/20

| $\begin{aligned} & \text { Line } \\ & \text { No } \end{aligned}$ | Description | Reference <br> Or <br> Factor | Account No | HTY Ended 12/31/20 |
| :---: | :---: | :---: | :---: | :---: |
| Intangible Plant |  |  |  |  |
| 1 | Organizations |  | 301 | 100 |
| 2 | Franchises \& Consents |  | 302 | 7 |
| 3 | Software |  | 303 | 326,128 |
| 4 | Total Intangible Plant | Sum L1 to L3 |  | 326,235 |
| Transmission Plant: |  |  |  |  |
| 5 | Land and Land Rights |  | 350 | 14,384 |
| 6 | Structures and Improvements |  | 352 | 33,109 |
| 7 | Station Equipment |  | 353 | 432,945 |
| 8 | Towers and Fixtures |  | 354 | 78,247 |
| 9 | Poles and Fixtures |  | 355 | 59,118 |
| 10 | Overhead Conductors \& Devices |  | 356 | 139,592 |
| 11 | Underground Conduit |  | 357 | 80,849 |
| 12 | Underground Conduit \& Devices |  | 358 | 147,799 |
| 13 | Roads and Trails |  | 359 | 10,186 |
| 14 | Other Transmission Plant |  |  | - |
| 15 | Subtotal Transmission Plant Distribution Plant: | Sum L 5 to L 15 |  | 996,229 |
| 16 | Land and Land Rights |  | 360 | 23,190 |
| 17 | Structures and Improvements |  | 361 | 70,294 |
| 18 | Station Equipment |  | 362 | 504,801 |
| 19 | Poles, Towers and Fixtures |  | 364 | 596,620 |
| 20 | Overhead Conductors and Devices |  | 365 | 576,573 |
| 21 | Underground Conduit |  | 366 | 146,553 |
| 22 | Underground Conductors and Devices |  | 367 | 437,017 |
| 23 | Line Transformers |  | 368 | 432,109 |
| 24 | OH \& UND Services |  | 369 | 102,586 |
| 25 | Meters \& Appurtencies |  | 370 | 142,524 |
| 26 | Meter Communication Equipment |  | 370.1 | - |
| 27 | Street Lighting |  | 373 | 43,252 |
| 28 | Other Distribution Plant |  |  | - |
| 29 | Total Distribution Plant | Sum L 16 to L 28 |  | 3,075,519 |
| General Plant: |  |  |  |  |
| 30 | Land and Land Rights |  | 389 | 6,145 |
| 31 | Structures and Improvements |  | 390 | 165,171 |
| 32 | Office Equipment \& Equipment |  | 391 | 31,769 |
| 33 | Transportation Equipment |  | 392 | 66,957 |
| 34 | Stores Equipment |  | 393 | 1,621 |
| 35 | Tools, Shop and Garage Equipment |  | 394 | 27,833 |
| 36 | Laboratory Equipment |  | 395 | 1,896 |
| 37 | Power Operated Equipment |  | 396 | 3,582 |
| 38 | Communication Equipment |  | 397 | 74,175 |
| 39 | Miscellaneous Equipment |  | 398 | 230 |
| 40 | Other General Plant |  |  | - |
| 41 | Total General Plant | Sum L 30 to L 39 |  | 379,379 |

165,171
31,769
66,957
27,833
1,896
3,582
74,175
230
379,379

42 Total Electric Plant in Service - Accounts 101 \& 106
$L 4+L 15+L 29+L 40$
$\$ \quad 4,777,362$

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 <br> SCHEDULE C-2 <br> Witness: Bachota/O'Brien <br> Page 3 of 4 (\$ in Thousands) 

## SUMMARY PLANT IN SERVICE

 1/1/20 to 12/31/20[1] [2]
[2]
[3]
[4]
[5]
[6]
[7]

| Line \# | Description | Account Number | Balance$12 / 31 / 19$ |  | Plant <br> Additions |  | Plant Retirements |  | Plant <br> Transfers |  | Reclass \& Adjustments |  | $\begin{aligned} & \text { Balance } \\ & 12 / 31 / 20 \\ & \hline \end{aligned}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization | 301 | \$ | 100 | \$ | - | \$ | - | \$ | - | \$ | - | \$ | 100 |
| 2 | Franchise \& Consent | 302 |  | 7 |  | - |  | - |  | - |  | - |  | 7 |
| 3 | Miscellaneous Intangible Plant | 303 |  | 317,776 |  | 12,703 |  | $(4,351)$ |  | - |  | - |  | 326,128 |
| 4 | TOTAL INTANGIBLE | SumL 1 to L3 |  | 317,883 |  | 12,703 |  | $(4,351)$ |  | - |  | - |  | 326,235 |
| TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5 | Land \& Land Rights | 360 |  | 14,347 |  | 37 |  | - |  | - |  | - |  | 14,384 |
| 6 | Structures \& Improvements | 352 |  | 33,364 |  | (230) |  | (24) |  | - |  | (1) |  | 33,109 |
| 7 | Station Equipment | 353 |  | 413,285 |  | 23,331 |  | $(3,672)$ |  | - |  | 1 |  | 432,945 |
| 8 | Towers and Fixtures | 354 |  | 70,428 |  | 8,528 |  | (709) |  | - |  | - |  | 78,247 |
| 9 | Poles and Fixtures | 355 |  | 57,009 |  | 2,129 |  | (20) |  | - |  | - |  | 59,118 |
| 10 | Overhead Conductors \& Devices | 356 |  | 119,655 |  | 20,086 |  | (149) |  | - |  | - |  | 139,592 |
| 11 | Underground Conduit | 357 |  | 80,748 |  | 101 |  | - |  | - |  | - |  | 80,849 |
| 12 | Underground Conductors \& Devices | - 358 |  | 147,900 |  | (101) |  | - |  | - |  | - |  | 147,799 |
| 13 | Road and Trails | 359 |  | 10,186 |  | - |  | - |  | - |  | - |  | 10,186 |
| 14 | Regional Trans - Computer Hardwar | r 382 |  | - |  | - |  | - |  | - |  | - |  | - |
| 15 | Regional Trans - Computer Software | є 383 |  | - |  | - |  | - |  | - |  | - |  | - |
|  | Meter Communications Equipment | 370.1 |  |  |  |  |  |  |  |  |  |  |  |  |
| 16 | TOTAL TRANSMISSION PLANT | Sum L 5 to L 15 |  | 946,922 |  | 53,881 |  | $(4,574)$ |  | - |  | - |  | 996,229 |
| DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 17 | Land \& Land Rights | 360 |  | 23,190 |  | - |  | - |  | - |  | - |  | 23,190 |
| 18 | Structures \& Improvements | 361 |  | 70,054 |  | 312 |  | (72) |  | - |  | - |  | 70,294 |
| 19 | Station Equipment | 362 |  | 491,114 |  | 17,912 |  | $(4,274)$ |  | 49 |  | - |  | 504,801 |
| 20 | Storage Battery Equipment | 363 |  | - |  | - |  | - |  | - |  | - |  | - |
| 21 | Poles, Towers and Fixtures | 364 |  | 532,981 |  | 65,826 |  | $(2,187)$ |  | - |  | - |  | 596,620 |
| 22 | Overhead Conductors and Devices | 365 |  | 540, 188 |  | 40,568 |  | $(4,183)$ |  | - |  | - |  | 576,573 |
| 23 | Underground Conduit | 366 |  | 145,979 |  | 747 |  | (173) |  | - |  | - |  | 146,553 |
| 24 | Underground Conductors and Devict | - 367 |  | 424,531 |  | 16,810 |  | $(4,324)$ |  | - |  | - |  | 437,017 |
| 25 | Line Transformers | 368 |  | 412,053 |  | 24,944 |  | $(4,839)$ |  | (49) | 1 |  |  | 432,109 |
| 26 | Services | 369 |  | 100,047 |  | 2,762 |  | (223) |  | - |  | - |  | 102,586 |
| 27 | Meters | 370 |  | 135,505 |  | 7,065 |  | (46) |  | - |  | - |  | 142,524 |
| 28 | Meter Communications Equipment | 370.1 |  | - |  | - |  | - |  | - |  | - |  | - |
| 29 | Leased Property On Customers Prer | r 372 |  | - |  | - |  | - |  | - |  | - |  | - |
| 30 | Street Lighting and Signaling Syster | - 373 |  | 42,622 |  | 1,918 |  | $(1,288)$ |  | - |  | - |  | 43,252 |
| 31 | 0 | 0 |  | - |  | - |  | - |  | - |  | - |  | - |
| 32 | TOTAL DISTRIBUTION PLANT | Sum L 17 to L31 |  | 2,918,264 |  | 178,864 |  | $(21,609)$ |  | - |  | - |  | 3,075,519 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 33 | Land \& Land Rights | 389 |  | 6,145 |  | - |  | - |  | - |  | - |  | 6,145 |
| 34 | Structures \& Improvements | 390 |  | 141,766 |  | 2,436 |  | (17) |  | - |  | - |  | 144,185 |
| 35 | Leasehold Improvements | LH |  | 20,986 |  | - |  | - |  | - |  | - |  | 20,986 |
| 36 | Office furniture | 391.1 |  | 6,414 |  | - |  | - |  | - |  | - |  | 6,414 |
| 37 | Office equipment | 391.2 |  | 31,606 |  | $(2,823)$ |  | $(3,428)$ |  | - |  | - |  | 25,355 |
| 38 | Transportation equipment | 392 |  | 61,529 |  | 7,726 |  | $(2,298)$ |  | - |  | - |  | 66,957 |
| 39 | Store equipment | 393 |  | 1,677 |  | 207 |  | (263) |  | - |  | - |  | 1,621 |
| 40 | Tools, shop and garage equipment | 394 |  | 25,849 |  | 2,089 |  | (105) |  | - |  | - |  | 27,833 |
| 41 | Laboratory equipment | 395 |  | 2,159 |  | - |  | (263) |  | - |  | - |  | 1,896 |
| 42 | Power operated equipment | 396 |  | 3,694 |  | - |  | (112) |  | - |  | - |  | 3,582 |
| 43 | Electric communications equipment | 397 |  | 83,854 |  | 597 |  | $(10,276)$ |  | - |  | - |  | 74,175 |
| 44 | Miscellaneous equipment | 398 |  | 230 |  | - |  | - |  | - |  | - |  | 230 |
| 45 | 0 | 0 |  | - |  | - |  | - |  | - |  | - |  | - |
| 46 | TOTAL GENERAL | Sum L 33 to L45 |  | 385,909 |  | 10,232 |  | $(16,762)$ |  | - |  | - |  | 379,379 |
| 47 | $\begin{gathered} \text { SUB-TOTAL } \\ (\mathrm{L} 4+\mathrm{L} 16+\mathrm{L} 32 \mathrm{~L} 46) \end{gathered}$ |  |  | 4,568,978 |  | 255,680 |  | $(47,296)$ |  | - |  | - |  | 4,777,362 |
| 48 | AMI - 303 |  |  | - |  | - |  | - |  | - |  | - |  | - |
| 49 | AMI - 370 |  |  | - |  | - |  | - |  | - |  | - |  | - |
| 50 | AMI - 397 |  |  | - |  | - |  | - |  | - |  | - |  | - |
| 51 | TOTAL PLANT IN SERVICE | L 47 to L 50 | \$ | 4,568,978 | \$ | 255,680 | \$ | $(47,296)$ | \$ | - | \$ | - | \$ | 4,777,362 |


| Duquesne Light Company | SCHEDULE | C-2 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | Bachota/O'Brien <br> Historic Test Year - $\mathbf{1 2}$ Months Ended December 31, 2020 <br> (\$ in Thousands) |
| Page | 4 | of 4 |

Pro Forma Adjustments to Plant

| Line$\#$ |  | [1] | [2] |  | [3] [4]Pro Forma Adjustments to Plant |  |  |  | [5] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Account Number | Cloud Adjustment |  | EV Depreciat Expense Correction |  |  |  |  |  |
| A | Total Amount of Adjustment |  | \$ | 10,158 | \$ | - | \$ | - |  |  |
| INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization | 301 | \$ | - | \$ | - | \$ | - | \$ | - |
| 2 | Franchise \& Consent | 302 |  | - |  | - |  | - |  | - |
| 3 | Miscellaneous Intangible Plant | 303 |  | 10,158 |  | - |  | - |  | 10,158 |
| 4 | TOTAL INTANGIBLE | Sum L 1 to L3 |  | 10,158 |  | - |  | - |  | 10,158 |


| TRANSMISSION PLANT |  |  |
| :---: | :--- | :---: |
| 5 | Land \& Land Rights | 350 |
| 6 | Structures \& Improvements | 352 |
| 7 | Station Equipment | 353 |
| 8 | Towers and Fixtures | 354 |
| 9 | Poles and Fixtures | 355 |
| 10 | Overhead Conductors \& Devices | 356 |
| 11 | Underground Conduit | 357 |
| 12 | Underground Conductors \& Devices | 358 |
| 13 | Road and Trails | 359 |
| 14 | Regional Trans - Computer Hardwar | 382 |
| 15 | Regional Trans - Computer Software | 0 |



## GENERAL PLANT

| 33 | Land \& Land Rights | 389 |  | - |  | - |  | - |  | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 34 | Structures \& Improvements | 390 |  | - |  | - |  | - |  | - |
| 35 | Leasehold Improvements | LH |  | - |  | - |  | - |  | - |
| 36 | Office furniture | 391.1 |  | - |  | - |  | - |  | - |
| 37 | Office equipment | 391.2 |  | - |  | - |  | - |  | - |
| 38 | Transportation equipment | 392 |  | - |  | - |  | - |  | - |
| 39 | Store equipment | 393 |  | - |  | - |  | - |  | - |
| 40 | Tools, shop and garage equipment | 394 |  | - |  | - |  | - |  | - |
| 41 | Laboratory equipment | 395 |  | - |  | - |  | - |  | - |
| 42 | Power operated equipment | 396 |  | - |  | - |  | - |  | - |
| 43 | Electric communications equipment | 397 |  | - |  | - |  | - |  | - |
| 44 | Miscellaneous equipment | 398 |  | - |  | - |  | - |  | - |
| 45 | 0 | 0 |  | - |  | - |  | - |  | - |
| 46 | TOTAL GENERAL | Sum L 33 to L45 |  | - |  | - |  | - |  | - |
| 47 | SUB-TOTAL |  |  | 10,158 |  | - |  | - |  | 10,158 |
|  | ( L 4 + L 16+L 32 L 46) |  |  |  |  |  |  |  |  |  |
| 48 | AMI - 303 |  |  | - |  | - |  | - |  |  |
| 49 | AMI - 370 |  |  | - |  | - |  | - |  |  |
| 50 | AMI - 397 |  |  | - |  | - |  | - |  |  |
| 51 | TOTAL PLANT IN SERVICE | L 47 to L 50 | \$ | 10,158 | \$ | - | \$ | - | \$ | 10,158 |

Exhibit 4 HTY 2020 4-8-21
C-2!Page 4 (A81..P160)


[^28]Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

| Schedule | $\mathrm{C}-3$ |
| :---: | :--- |
| Witness: | Bachota/O'Brien |
| Page | 2 of 4 | Page 2 of 4

(\$ in Thousands)

Accumulated Depreciation by FERC Account

| Line No | Reference |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |
|  | Description | Or <br> Factor | Account No | Pro Forma 12/31/20 |
|  |  |  |  |  |
| Intangible Plant |  |  |  |  |
| 1 | Organizations |  | 301 | \$ |
| 2 | Franchises \& Consents |  | 302 | - |
| 3 | Software |  | 303 | 197,012 |
| 4 | Total Intangible Plant | Sum L 1 to L 3 |  | 197,012 |
| Transmission Plant: |  |  |  |  |
| 5 | Land and Land Rights |  | 350 | - |
| 6 | Structures and Improvements |  | 352 | 10,164 |
| 7 | Station Equipment |  | 353 | 141,953 |
| 8 | Towers and Fixtures |  | 354 | 34,496 |
| 9 | Poles and Fixtures |  | 355 | 14,950 |
| 10 | Overhead Conductors \& Devices |  | 356 | 38,404 |
| 11 | Underground Conduit |  | 357 | 32,075 |
| 12 | Underground Conduit \& Devices |  | 358 | 31,721 |
| 13 | Roads and Trails |  | 359 | 1,356 |
| 14 | Other Transmission Plant |  |  | - |
| 15 | Total Transmission Plant | Sum L 5 to L 14 |  | 305,119 |
| Distribution Plant: |  |  |  |  |
| 16 | Land and Land Rights |  | 360 | - |
| 17 | Structures and Improvements |  | 361 | 41,357 |
| 18 | Station Equipment |  | 362 | 175,564 |
| 19 | Poles, Towers and Fixtures |  | 364 | 175,714 |
| 20 | Overhead Conductors and Devices |  | 365 | 167,483 |
| 21 | Underground Conduit |  | 366 | 52,161 |
| 22 | Underground Conductors and Devices |  | 367 | 118,212 |
| 23 | Line Transformers |  | 368 | 125,297 |
| 24 | OH \& UND Services |  | 369 | 39,909 |
| 25 | Meters \& Appurtencies |  | 370 | 20,532 |
| 26 | Meter Communication Equipment |  | 370.1 | - |
| 27 | Street Lighting |  | 373 | 24,870 |
| 28 | Other Distribution Plant |  |  | - |
| 29 | Total Distribution Plant | Sum L 16 to L 28 |  | 941,099 |
| General Plant: |  |  |  |  |
| 30 | Land and Land Rights |  | 389 | - |
| 31 | Structures and Improvements (1) |  | 390 | 57,934 |
| 32 | Office Equipment \& Equipment |  | 391 | 15,453 |
| 33 | Transportation Equipment |  | 392 | 39,147 |
| 34 | Stores Equipment |  | 393 | 832 |
| 35 | Tools, Shop and Garage Equipment |  | 394 | 8,830 |
| 36 | Laboratory Equipment |  | 395 | 863 |
| 37 | Power Operated Equipment |  | 396 | 1,618 |
| 38 | Communication Equipment |  | 397 | 35,030 |
| 39 | Miscellaneous Equipment |  | 398 | 182 |
| 40 | Total General Plant | Sum L 30 to L 39 |  | 159,889 |
| 41 | Total Accumulated Depreciation - Accounts 101 \& 106 | L $4+\mathrm{L} 15+\mathrm{L} 29+$ |  | \$ 1,603,119 |



 $|\ldots \ldots . . . . . .|\cdot| \cdot \ldots| .| |$
Schedule C－3
Witness：
Page
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 ${ }_{\substack {[4] \\ \begin{subarray}{c}{\text { Plant } \\ \text { Retirements }{ [ 4 ] \\ \begin{subarray} { c } { \text { Plant } \\ \text { Retirements } } }\end{subarray}}$ | s $\quad \vdots$ |
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Before The Pennsylvania Public Utility Commission
Historic Test Year－ 12 Months Ended December 31， 2020





## Duquesne Light Company

## DETAIL ACCUMULATED DE <br> L1］ 0 0





##  <br>  <br> 

$\begin{array}{ll}13 & \text { Road and Tralls } \\ 14 & \text { Regional Trans } \\ 15 & \text { Reomputer Hartwaral Trans－Computer Soltware }\end{array}$ 16 TOTAL TRANSMISSION PLANT 16 DISTRIBUTION PLANT 17 Land \＆Ladd Rights
Structures \＆improvements




32 TOTAL DISTRIBUTION PLANT general plant

Structures 8 Improvements
Leasenol IImpovements
Oftice furniture

| 38 | Transporation equipment |
| :--- | :--- |
| 39 | Store |
| 40 | Tools suipment shon and garage equipment |


total general





## Duquesne Light Company

Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

## Working Capital

| $\begin{aligned} & \text { Line } \\ & \text { No } \end{aligned}$ | Description | [1] Reference | $\begin{gathered} {[2]} \\ \text { Test Year } \\ \text { Ended } \\ 12 / 31 / 20 \\ \hline \end{gathered}$ |
| :---: | :---: | :---: | :---: |
|  |  |  | 1 |
| 1 | Operation \& Maintenance Expenses | C-4, P 2, L 11 | \$ 17,140 |
| 2 | Tax Expense | C-4, P 7, L 12 | 19,924 |
| 3 | Interest Payments | C-4, P 8, L 9 | $(4,952)$ |
| 4 | Supply | C-4, P 2, L 18 | 13,081 |
| 5 | Average Prepayments | C-4, P 10, L 25 | 18,260 |
| 6 | Total Cash Working Capital Requirements | Sum L 1 to L5 | \$ 63,453 |



| Duquesne Light Company | Schedule | C-4 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: <br> Page | O'Brien <br> of 10 |
| Historic Test Year -12 Months Ended December 31, 2020 |  |  |
| $(\$$ in Thousands) |  |  |

## Revenue Lag



## Duquesne Light Company Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020 Schedule <br> Witness: <br> C-4 <br> Page O'Brien (\$ in Thousands)

Revenue By Class of Service

| Line \# | Description | Revenue By Class of Service [4] |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Residential |  | Commercial |  | Industrial |  | Lighting |  | TOTAL |  |
|  |  |  |  |  |  |  |  |  |  |  | 1] to [ 4] |
| 1 | January, 2018 |  | 51,267 |  | 21,829 |  | 4,274 |  | 1,038 |  | 78,407 |
| 2 | February |  | 41,493 |  | 20,339 |  | 2,974 |  | 1,050 |  | 65,856 |
| 3 | March |  | 43,899 |  | 22,225 |  | 3,675 |  | 1,060 |  | 70,859 |
| 4 | April |  | 37,271 |  | 19,105 |  | 3,453 |  | 1,072 |  | 60,901 |
| 5 | May |  | 44,876 |  | 23,269 |  | 4,051 |  | 1,004 |  | 73,199 |
| 6 | June |  | 49,075 |  | 21,928 |  | 4,084 |  | 978 |  | 76,065 |
| 7 | July |  | 62,977 |  | 23,714 |  | 3,191 |  | 1,114 |  | 90,997 |
| 8 | August |  | 55,709 |  | 23,764 |  | 3,872 |  | 993 |  | 84,338 |
| 9 | September |  | 38,148 |  | 13,851 |  | 2,028 |  | 501 |  | 54,529 |
| 10 | October |  | 42,632 |  | 22,290 |  | 3,793 |  | 1,209 |  | 69,925 |
| 11 | November |  | 41,073 |  | 21,825 |  | 3,614 |  | 913 |  | 67,426 |
| 12 | December, 2018 |  | 43,782 |  | 20,275 |  | 3,459 |  | 1,031 |  | 68,548 |
| 13 | TOTAL | \$ | 552,204 | \$ | 254,414 | \$ | 42,468 | \$ | 11,964 | \$ | 861,050 |
| 14 | January, 2019 |  | 50,477 |  | 22,474 |  | 3,959 |  | 1,046 |  | 77,955 |
| 15 | February |  | 43,351 |  | 20,960 |  | 3,419 |  | 1,136 |  | 68,866 |
| 16 | March |  | 43,950 |  | 22,648 |  | 3,941 |  | 1,112 |  | 71,652 |
| 17 | April |  | 36,272 |  | 19,836 |  | 3,411 |  | 1,059 |  | 60,578 |
| 18 | May |  | 39,417 |  | 22,928 |  | 3,749 |  | 936 |  | 67,030 |
| 19 | June |  | 45,815 |  | 21,567 |  | 3,693 |  | 1,200 |  | 72,276 |
| 20 | July |  | 68,521 |  | 25,326 |  | 3,675 |  | 1,048 |  | 98,569 |
| 21 | August |  | 56,395 |  | 23,000 |  | 4,017 |  | 968 |  | 84,380 |
| 22 | September |  | 49,506 |  | 22,281 |  | 3,401 |  | 1,196 |  | 76,384 |
| 23 | October |  | 38,423 |  | 21,222 |  | 4,046 |  | 947 |  | 64,639 |
| 24 | November |  | 43,034 |  | 20,668 |  | 3,619 |  | 1,074 |  | 68,394 |
| 25 | December, 2019 |  | 48,043 |  | 20,909 |  | 3,816 |  | 1,099 |  | 73,867 |
| 26 | TOTAL | \$ | 563,205 | \$ | 263,819 | \$ | 44,747 | \$ | 12,821 | \$ | 884,592 |
| 27 | January, 2020 |  | 46,336 |  | 21,109 |  | 4,651 |  | 1,121 |  | 73,218 |
| 28 | February |  | 43,284 |  | 20,057 |  | 4,328 |  | 989 |  | 68,658 |
| 29 | March |  | 41,684 |  | 19,274 |  | 3,950 |  | 1,220 |  | 66,128 |
| 30 | April |  | 38,817 |  | 17,374 |  | 3,829 |  | 965 |  | 60,985 |
| 31 | May |  | 43,797 |  | 17,415 |  | 3,865 |  | 1,211 |  | 66,288 |
| 32 | June |  | 54,651 |  | 19,805 |  | 3,983 |  | 1,078 |  | 79,517 |
| 33 | July |  | 78,187 |  | 22,583 |  | 3,987 |  | 926 |  | 105,684 |
| 34 | August |  | 64,931 |  | 21,608 |  | 4,135 |  | 1,172 |  | 91,846 |
| 35 | September |  | 45,859 |  | 20,411 |  | 3,623 |  | 1,058 |  | 70,951 |
| 36 | October |  | 39,495 |  | 19,488 |  | 3,807 |  | 1,041 |  | 63,831 |
| 37 | November |  | 41,739 |  | 18,459 |  | 3,455 |  | 1,252 |  | 64,904 |
| 38 | December, 2020 |  | 53,236 |  | 19,580 |  | 3,847 |  | 895 |  | 77,559 |
| 39 | TOTAL | \$ | 592,017 | \$ | 237,163 | \$ | 47,459 | \$ | 12,929 | \$ | 889,568 |

Exhibit 4 HTY 2020 4-8-21
C_4_p4 (A171..N230)

# Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) <br> Summary of Expense Lag Calculations 



## Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) <br> General Disbursements Lag

| Schedule | C-4 |  |
| :---: | :---: | :---: |
| Witness: |  | O'Brien |
| Page | 6 | of 10 |


| Line <br> \# | Description | Number of CDs | Cash <br> Disbursements |  | Dollar-Days |  | Expense <br> Lag-Days |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  | [3]/[2] |
| FEBRUARY, 2020 ( |  |  |  |  |  |  |  |
| 1 | Total Monthly Disbursements | 3887 | \$ | 46,788,654 | \$ | 2,083,161,749 | 44.52 |
| 2 | Total Excl Non-Expense \& Under \$1,000 | 398 | \$ | 6,607,592 | \$ | 288,057,124 | 43.59 |
| 3 | Total O \& M Only | 362 | \$ | 5,894,261 | \$ | 255,174,655 | 43.29 |
| MAY, 2020 |  |  |  |  |  |  |  |
| 4 | Total Monthly Disbursements | 5079 | \$ | 293,381,003 | \$ | 3,007,477,030 | 10.25 |
| 5 | Total Excl Non-Expense \& Under \$1,000 | 488 | \$ | 38,038,452 | \$ | 786,542,849 | 20.68 |
| 6 | Total O \& M Only | 449 | \$ | 11,657,694 | \$ | 548,155,768 | 47.02 |
| AUGUST, 2020 |  |  |  |  |  |  |  |
| 7 | Total Monthly Disbursements | 4819 | \$ | 156,815,034 | \$ | 2,312,235,813 | 14.74 |
| 8 | Total Excl Non-Expense \& Under \$1,000 | 153 | \$ | 11,163,082 | \$ | 346,943,342 | 31.08 |
| 9 | Total O \& M Only | 138 | \$ | 2,755,418 | \$ | 114,871,741 | 41.69 |
| NOVEMBER, 2020 |  |  |  |  |  |  |  |
| 10 | Total Monthly Disbursements | 4303 | \$ | 86,656,631 | \$ | 1,565,740,748 | 18.07 |
| 11 | Total Excl Non-Expense \& Under \$1,000 | 395 | \$ | 24,178,872 | \$ | 453,555,747 | 18.76 |
| 12 | Total O \& M Only | 358 | \$ | 6,699,443 | \$ | 294,376,437 | 43.94 |
| TOTAL FOUR TEST MONTHS |  |  |  |  |  |  |  |
| 13 | Total Monthly Disbursements | 18088 | \$ | 583,641,321 | \$ | $8,968,615,341$ | 15.37 |
| 14 | Total Excl Non-Expense \& Under \$1,000 | 1434 | \$ | 79,987,999 | \$ | 1,875,099,061 | 23.44 |
| 15 | Total O \& M Only | 2243 | \$ | 27,006,816 | \$ | 1,212,578,601 | 44.90 |

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

Tax Expense Lag Days


|  | Duquesne Light Company <br> Before The Pennsylvania Public Utility Commission <br> Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) <br> Interest Payments |  | [2] | Schedule <br> Witness: Page | C-4 <br> O'Brien <br> 8 of 10 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |  |
|  |  | [1] |  | [3] | [4] |  |  |
| Line <br> No. | Description | Reference Or Factor | \# of Days | \# of <br> Days | \$ |  | Total |
| 1 | Measures of Value at December 31, 2020 |  |  |  |  |  | 2,664,788 |
| 2 | Long-term Debt Ratio |  |  |  |  |  | 46.65\% |
| 3 | Embedded Cost of Long-term Debt |  |  |  |  |  | 4.29\% |
| 4 | Pro forma Interest Expense | L 1 * L 2 ${ }^{\text {L }} 3$ |  |  |  | \$ | 53,330 |
| 5 | Daily Amount | L4/L5 5 [ $]$ | 365 |  |  | \$ | 146 |
| 6 | Days to mid-point of interest payments |  |  | 91.2 |  |  |  |
| 7 | Less: Revenue Lag Days |  |  | 57.3 |  |  |  |
| 8 | Interest Payment lag days | L 7 -L6 |  |  |  |  | (33.89) |
| 9 | Total Interest for Working Capital | L 5 * L 8 |  |  |  | \$ | $(4,952)$ |


Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
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\end{aligned}
$$


Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)

## Plant Materials and Operating Supplies

$$
\begin{aligned}
& \begin{array}{l}
\text { Amounts Assigned by Function: } \\
\text { Transmission Plant } \\
\text { Distribution Plant } \\
\text { General Plant } \\
\text { Intangible Plant } \\
\text { Construction Category } \\
\text { Total }
\end{array}
\end{aligned}
$$

Exhibit 4 HTY 2020 4-6-21
C_5 (A1.L58)
C-6
Simpson
of 1



 Duquesne Light Company
Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020
( $\$$ in Thousands)


C-8
1 of 1




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Duquesne Light Company
Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020

Capitalized Pension Adjustment

$\begin{array}{cl}\text { Schedule } & \text { D-1 } \\ \text { Witness: } & \text { O'Brien/Gorman } \\ \text { Page } & 1 \quad \text { of } 3\end{array}$
Jurisdictional Rate Base, Net Operating Income and Revenue Increase
Table No 1 Earned Rate of Return with Additional Proposed Revenues - PA Jurisdiction

| $\begin{gathered} \text { Line } \\ \text { No } \\ \hline \end{gathered}$ | Description |  | Reference | (1) ROR Before Additional Revenues |  | (2) <br> Proposed <br> Additional <br> Revenues |  | (3) <br> ROR With <br> Additional <br> Revenues |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Total Electric Rate Base |  | D-1, P 3 | \$ | 2,044,385 | \$ | - | \$ | 2,044,385 |
|  | Total Operating Revenues: |  |  |  |  |  |  |  |  |
| 2 | Total Sales Revenues |  |  | \$ | 546,456 | \$ | 8,781 | \$ | 555,237 |
| 3 | Other Revenues - Off System Sales |  |  |  | - |  | - |  | - |
| 4 | Other Operating Revenues |  |  |  | 12,646 |  | - |  | 12,646 |
| 5 | Total Revenues |  | L 2 to L 4 |  | 559,102 |  | 8,781 |  | 567,883 |
| Total Operating Expenses: |  |  |  |  |  |  |  |  |  |
| 6 | Operation \& Maintenance Expenses |  |  |  | 187,409 |  | 127 |  | 187,536 |
| 7 | Depreciation \& Amortization Expense |  |  |  | 163,429 |  | - |  | 163,429 |
| 8 | Taxes Other Than Income Taxes |  |  |  | 34,595 |  | 518 |  | 35,113 |
| 9 | Total Operating Expenses |  | L 6 to L 8 |  | 385,433 |  | 645 |  | 386,078 |
| 10 | Utility Operating Income Before Taxes |  | L 5-L9 | \$ | 173,669 | \$ | 8,136 | \$ | 181,805 |
| Income Taxes: |  |  |  |  |  |  |  |  |  |
| 11 | Federal |  |  |  | 15,972 |  | 1,538 |  | 17,510 |
| 12 | State |  |  |  | 3,207 |  | 813 |  | 4,020 |
| 13 | Total Income Taxes |  | L 11 + L: 12 |  | 19,179 |  | 2,351 |  | 21,530 |
| 14 | Total Operating Expenses |  | L $9+\mathrm{L} 13$ |  | 404,612 |  | 2,996 |  | 407,608 |
| 15 | Total Operating Income |  | L 5-L 14 | \$ | 154,490 | \$ | 5,785 | \$ | 160,275 |
| 16 | Rate of Return - \% |  | L 15/L 1 |  | 7.56\% |  |  |  | 7.84\% |

[^29]Duquesne Light Company
Before The Pennsylvania Public Utility Commission Before The Pennsylvania Public Utility Commission
Historic Test Year-12 Months Ended December 31, 2020

[^30]| $\begin{gathered} \text { Line } \\ \text { No } \\ \hline \end{gathered}$ | Description |  | Reference | (1) <br> Total <br> Company |  | (2) <br> Total PA Jurisdiction |  | (3) <br> PA JSS <br> Reference |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Total Electric Rate Base |  | Table No 1 | \$ | 2,664,788 | \$ | 2,044,385 | Table No 1 |
|  | Total Operating Revenues: |  |  |  |  |  |  |  |
| 2 | Total Sales Revenues |  | D-3 |  | 902,693 |  | 546,456 | Table No 5 |
| 3 | Other Revenues - Off System Sales |  | D-3 |  | 1,393 |  | - | Table No 5 |
| 4 | Other Operating Revenues |  | D-3 |  | 14,731 |  | 12,646 | Table No 5 |
| 5 | Total Revenues |  |  |  | 918,817 |  | 559,102 |  |
| Total Operating Expenses: |  |  |  |  |  |  |  |  |
| 6 | Operation \& Maintenance Expenses |  | D-4 |  | 423,364 |  | 187,409 | Table No 6 |
| 7 | Depreciation \& Amortization Expense |  | D-21 |  | 907 |  | 163,429 | Table No 7 |
| 8 | Taxes Other Than Income Taxes |  | D-20 |  | 57,438 |  | 34,595 | Table No 8 |
| 9 | Total Operating Expenses |  |  |  | 481,708 |  | 385,433 |  |
| 10 | Utility Operating Income Before Taxes |  |  |  | 437,108 |  | 173,669 |  |
| Income Taxes: |  |  |  |  |  |  |  |  |
| 11 | Federal | - | D-22 |  | 25,270 |  | 15,972 | Table No 9 |
| 12 | State |  | D-22 |  | 9,919 |  | 3,207 | Table No 9 |
| 13 | Total Operating Expenses |  |  |  | 516,897 |  | 404,612 |  |
| 14 | Total Operating Income |  |  | \$ | 401,920 | \$ | 154,490 |  |
| Return Before Adjustments |  |  |  |  |  |  |  |  |
| 15 | Earned Rate of Return - \% |  |  |  |  |  | 7.5568\% |  |
| 16 | Required Rate of Return - \% |  | B-9 |  |  |  | 7.8400\% |  |
| 17 | Return at Required Rate of Return |  |  |  |  | \$ | 160,280 |  |
| 18 | Income Deficiency - \$ |  |  |  |  |  | 5,790 |  |
| 19 | Revenue Deficiency - Tax Multiplier |  | D-22, Page 2 |  |  |  | 1.51656 |  |
| 20 | Revenue Deficiency-\$ |  |  |  |  | \$ | 8,781 |  |

[^31] Schedule
Witness:
Page

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020
(\$ in Thousands)


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|  |  |  |  |
| :---: | :---: | :---: | :---: |

Exhibit 4 HTY 2020 4-8-21
$\mathrm{D}_{-} 2$ (A151. L210)
Before The Pennsylvania Public Utility Commission (\$ in Thousands)
Adjustments to Net Operating Income

Exhibit 4 HTY 2020 4-8-21
D_5_p1 (A1..V60)
$\begin{array}{cc}\text { Schedule } & \text { D-5A } \\ \text { Witness: } & \text { O'Brien } \\ \text { Page } 1 & \text { of } 1\end{array}$


Equivalent from Expense Summary | 26 | RESIDENTIAL |  |
| :--- | :--- | :---: |
| 27 | COMMERCIAL - Small C\&I |  |
| 28 | COMMERCIIL - Medium C\&I |  |
| 29 | COMMERCIAL - Large C\&\& |  |
| 30 | STREET LIGHTING |  |
| 31 | Sub-Total |  |
| 32 | Total Revenue - Roll Into Base Rates | L 10 to L 31 |
| 33 | Total Revenue - Adjustment to Revenue | L 1 to L 9 |
| 34 | Gross Receipts Tax |  |
| 35 | Net Revenue after GRT offset | $\mathrm{L} 33+\mathrm{L} 34$ |
| 36 | (Reflected on Taxes - Other Than Income Sch. D-3, S-1) |  |

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 \begin{tabular}{llc}
26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)

 

26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)

 

26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)
\end{tabular}

ETAIL MARKET ENHANCEMENT
RESIDENTIAL
COMMERIAL-Small C 1
COMMERCIAL - Small C\&I
COMMERCIAL - Medium C\&I
STREET LIGHTING
Sub-Total

STAS \begin{tabular}{llc}
26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIAL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&I \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. $\mathrm{D}-3, \mathrm{~S}-1$ )

 

26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)

 

26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)

 

26 \& RESIDENTIAL \& <br>
27 \& COMMERCIAL - Small C\&I \& <br>
28 \& COMMERCIIL - Medium C\&I \& <br>
29 \& COMMERCIAL - Large C\&\& \& <br>
30 \& STREET LIGHTING \& <br>
31 \& \multicolumn{1}{c}{ Sub-Total } \& <br>
32 \& Total Revenue - Roll Into Base Rates \& L 10 to L 31 <br>
33 \& Total Revenue - Adjustment to Revenue \& L 1 to L 9 <br>
34 \& Gross Receipts Tax \& <br>
35 \& Net Revenue after GRT offset \& $\mathrm{L} 33+\mathrm{L} 34$ <br>
36 \& (Reflected on Taxes - Other Than Income Sch. D-3, S-1)
\end{tabular}


$38 \quad$ Difference
Exibit 4 HTY 2020 $4.8-21$
D_5A (A61..V120)



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$\Leftrightarrow$

## Schedule D-5B <br> ssout! M

 Kueduos $\ddagger$ 亿!! әusenbna Historic Test Year - 12 Months Ended| Line | Revenue Loss Adjustment |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Description | [1] | [2] |  | [3] |  | [4] |  | [5] |  | [6] |  |
|  |  |  | Variable revenue |  |  |  |  |  |  |  | Pro Forma Adjustment |  |
|  |  | Reference |  | 2019 |  | 2020 |  | 2021 |  | 2022 |  |  |
| Total Pro Forma Variable Revenue |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | ---Residential |  | \$ | 229,398 | \$ | 225,709 | \$ | 222,542 | \$ | 218,934 |  |  |
| 2 | ---Commercial |  |  | 150,716 |  | 149,150 |  | 147,631 |  | 146,107 |  |  |
| 3 | --Industrial |  |  | 31,361 |  | 30,712 |  | 30,187 |  | 29,643 |  |  |
| 4 | ---Street Lighting \& UMS |  |  | 385 |  | 386 |  | 387 |  | 389 |  |  |
| 5 | Total | L 1 to L6 | \$ | 411,860 | s | 405,957 | \$ | 400,747 | \$ | 395,073 |  |  |
| Target Revenue Loss in 2023 |  |  |  |  |  |  |  |  |  |  |  |  |
| 6 | ---Residential |  |  |  | \$ | $(3,689)$ |  |  |  |  |  |  |
| 7 | ---Commercial |  |  |  |  | $(1,566)$ |  |  |  |  |  |  |
| 8 | --Industrial |  |  |  |  | (649) |  |  |  |  |  |  |
| 9 | ---Street Lighting \& UMS |  |  |  |  | 1 |  |  |  |  |  |  |
| 10 | Total | L 8 to L 13 |  |  |  |  |  |  |  |  | \$ | $(5,903)$ |
| Target Revenue Loss in 2024 |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | ---Residential |  |  |  |  |  | \$ | $(6,856)$ |  |  |  |  |
| 12 | ---Commercial |  |  |  |  |  |  | $(3,085)$ |  |  |  |  |
| 13 | ---Industrial |  |  |  |  |  |  | $(1,174)$ |  |  |  |  |
| 14 | ---Street Lighting \& UMS |  |  |  |  |  |  | 2 |  |  |  |  |
| 15 | Total | L 15 to L 20 |  |  |  |  |  |  |  |  |  | (11,113) |
| Target Revenue Loss in 2025 |  |  |  |  |  |  |  |  |  |  |  |  |
| 16 | ---Residential |  |  |  |  |  |  |  | \$ | $(10,464)$ |  |  |
| 17 | ---Commercial |  |  |  |  |  |  |  |  | $(4,609)$ |  |  |
| 18 | ---Industrial |  |  |  |  |  |  |  |  | $(1,718)$ |  |  |
| 19 | ---Street Lighting \& UMS |  |  |  |  |  |  |  |  | 4 |  |  |
| 20 | Total | L 16 to L 19 |  |  |  |  |  |  |  |  |  | $(16,787)$ |
| 21 | Total Revenue Loss 2020 to 2022 |  |  |  |  |  |  |  |  |  | \$ | $(33,803)$ |
| 22 | Average for Pro Forma Adjustment |  |  |  |  |  |  | 4 |  |  | \$ | (8,451) |

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Schedule
Witness:
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 Duquesne Light Company Before The Pennsylvania Public Utility Commission
Historic Test Year-12 Months Ended December 31, 2020 (\$ in Thousands)
Revenue Annualization

| $\$ \quad 330,399$ |
| :--- |


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(L3/L4)

7 Increase in Customers during TY
(L6-L4)
Annualization of Revenue
Exhibit 4 HTY 2020 4-8-21
D_5C (A181..V230)

$$
\begin{array}{cc}
{[1]} \\
& \text { Residential } \\
\hline & \\
\$ \$ & 492,023 \\
& 161,624 \\
\hline
\end{array}
$$


Kueduoว $746!7$ əusanbna
12 Month Period Ended December 31, 2020 at Customer Shopping Levels

| A | B | C | D | E | F | G | H | 1 | $J$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate Class | Distribution Present Rate Revenue | State Tax Adj. Surcharge (STAS) | Distribution (Sum Col. C - D) | System Improvement Charge (DSIC) | Surcharge Adjusted Distribution (Sum Col. E-F) | Transmission Present Rate Revenue (w/shopping) | Generation Present Rate Revenue (w/shopping) | Adjusted Present Rate Revenue (Sum Col. G-I) |
| 1 | RS | \$301,761,883 | \$8,936 | \$301,770,819 | \$4,821,984 | \$306,592,803 | \$46,293,538 | \$141,582,418 | \$494,468,758 |
| 2 | RH | \$25,389,026 | \$949 | \$25,389,975 | \$398,787 | \$25,788,762 | \$2,670,015 | \$17,479,718 | \$45,938,495 |
| 3 | RA | \$3,247,573 | \$119 | \$3,247,692 | \$59,436 | \$3,307,128 | \$653,932 | \$2,562,264 | \$6,523,324 |
| 4 | GS | \$10,407,423 | \$151 | \$10,407,574 | \$149,535 | \$10,557,110 | \$736,560 | \$3,479,014 | \$14,772,683 |
| 5 | GM<25 | \$31,739,553 | \$1,738 | \$31,741,291 | \$462,264 | \$32,203,555 | \$4,873,051 | \$17,370,002 | \$54,446,609 |
| 6 | GM>25 | \$60,253,326 | \$3,620 | \$60,256,945 | \$865,946 | \$61,122,892 | \$5,934,427 | \$20,049,249 | \$87,106,568 |
| 7 | GMH <25 | \$3,200,281 | \$191 | \$3,200,472 | \$50,206 | \$3,250,679 | \$254,625 | \$1,583,231 | \$5,088,535 |
| 8 | $\mathrm{GMH} \times 25$ | \$5,942,858 | \$364 | \$5,943,222 | \$85,256 | \$6,028,478 | \$428,607 | \$2,162,508 | \$8,619,593 |
| 9 | GL | \$60,646,508 | \$3,812 | \$60,650,320 | \$918,287 | \$61,568,607 | \$1,385,607 | \$5,175,701 | \$68,129,915 |
| 10 | GLH | \$7,713,845 | \$505 | \$7,714,349 | \$117,034 | \$7,831,384 | \$340,331 | \$1,359,894 | \$9,531,609 |
| 11 | L | \$20,573,937 | \$1,206 | \$20,575,142 | \$288,391 | \$20,863,533 | \$16,151 | \$3,116,031 | \$23,995,716 |
| 12 | HVPS | \$273,695 | \$64 | \$273,759 | \$13,564 | \$287,323 | \$989,658 | \$187,969 | \$1,464,950 |
| 13 | AL | \$1,031 | \$0 | \$1,031 | \$14 | \$1,045 | \$10 | \$281 | \$1,336 |
| 14 | SE | \$1,420,662 | \$82 | \$1,420,743 | \$21,049 | \$1,441,792 | \$0 | \$0 | \$1,441,792 |
| 15 | SM | \$9,150,401 | \$434 | \$9,150,835 | \$138,003 | \$9,288,838 | \$3,255 | \$334,970 | \$9,627,063 |
| 16 | SH | \$109,362 | \$6 | \$109,368 | \$1,890 | \$111,258 | \$57 | \$5,951 | \$117,266 |
| 17 | UMS | \$1,053,788 | (\$3) | \$1,053,785 | \$15,181 | \$1,068,965 | \$30,736 | \$216,073 | \$1,315,775 |
| 18 | PAL | \$415,378 | \$13 | \$415,390 | \$7,208 | \$422,599 | \$581 | \$69,561 | \$492,741 |
| 19 | Total | \$543,300,530 | \$22,185 | \$543,322,715 | \$8,414,035 | \$551,736,751 | \$64,611,143 | \$216,734,834 | \$833,082,727 |
| 20 | Other Electric Revenue: |  |  |  |  |  |  |  |  |
| 21 | Sales for Resale (Acct. 447) |  |  |  |  |  |  | \$1,393,033 | \$1,393,033 |
| 22 | Late Payment/Retumed Check Charges (Acct. 450) | \$1,050,445 |  | \$1,050,445 |  | \$1,050,445 |  |  | \$1,050,445 |
| 23 | Reconnect Fees/PJM Office (Acct. 451) | \$360,112 |  | \$360,112 |  | \$360,112 | \$716,868 |  | \$1,076,980 |
| 24 | Rent Electric Property (Acct. 454) | \$11,097,690 |  | \$11,097,690 |  | \$11,097,690 |  |  | \$11,097,690 |
| 25 | Rent Electric Property (Acct. 454) |  |  |  |  |  | \$318,500 |  | \$318,500 |
| 26 | Other Revenue (Acct. 456) | \$772,154 |  | \$772,154 |  | \$772,154 |  |  | \$772,154 |
| 27 | Utility Operations (Acct. 417) | \$415,473 |  | \$415,473 |  | \$415,473 |  |  | \$415,473 |
| 28 | Revenue Annualization | \$2,127,550 |  | \$2,127,550 |  | \$2,127,550 |  |  | \$2,127,550 |
| 29 | Revenue Loss Adjustment | $(\$ 8,449,647)$ |  | $(\$ 8,449,647)$ |  | $(\$ 8,449,647)$ |  |  | $(\$ 8,449,647)$ |
| 30 | Transmission - EGS (Acct. 456) |  |  |  |  |  | \$80,316,885 |  | \$80,316,885 |
| 31 | Transmission - Wholesale (Acct. 456) |  |  |  |  |  | $(\$ 4,180,372)$ |  | $(\$ 4,180,372)$ |
| 32 | Transmission - Tax Norm |  |  |  |  |  | \$1,429,774 |  | \$1,429,774 |
| 33 | Subtotal Other Revenue | \$7,373,775 | \$0 | \$7,373,775 | \$0 | \$7,373,775 | \$78,601,656 | \$1,393,033 | \$87,368,464 |
|  |  |  |  |  |  |  |  |  |  |
| 34 | Total Operating Revenue | \$550,674,305 | \$22,185 | \$550,696,490 | \$8,414,035 | \$559,110,526 | \$143,212,799 | \$218,127,867 | \$920,451,191 |

Duquesne Light Company


| A | B | c | D | E | F | G | H | 1 | J |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate Class | Distribution Revenue at Proposed Rates | Transmission Present Rate Revenue (w/shopping) | Generation Present Rate Revenue (w/shopping) | Total Proposed Rate Revenue (Sum Col. C - E) | Total Revenue Change | Total Percent Change | Distribution Revenue Change | Distribution <br> Percent <br> Change |
| 1 | RS | \$340,283,193 | \$46,293,538 | \$141,582,418 | \$528,159,148 | \$33,690,390 | 6.8\% | \$33,690,390 | 11.0\% |
| 2 | RH | \$34,141,445 | \$2,670,015 | \$17,479,718 | \$54,291,178 | \$8,352,683 | 18.2\% | \$8,352,683 | 32.4\% |
| 3 | RA | \$4,013,834 | \$653,932 | \$2,562,264 | \$7,230,030 | \$706,706 | 10.8\% | \$706,706 | 21.4\% |
| 4 | GS | \$13,339,564 | \$736,560 | \$3,479,014 | \$17,555,138 | \$2,782,455 | 18.8\% | \$2,782,455 | 26.4\% |
| 5 | GM<25 | \$38,685,610 | \$4,873,051 | \$17,370,002 | \$60,928,664 | \$6,482,055 | 11.9\% | \$6,482,055 | 20.1\% |
| 6 | GM>25 | \$81,402,461 | \$5,934,427 | \$20,049,249 | \$107,386,137 | \$20,279,569 | 23.3\% | \$20,279,569 | 33.2\% |
| 7 | GMH<25 | \$3,935,039 | \$254,625 | \$1,583,231 | \$5,772,895 | \$684,360 | 13.4\% | \$684,360 | 21.1\% |
| 8 | GMH>25 | \$7,716,321 | \$428,607 | \$2,162,508 | \$10,307,436 | \$1,687,843 | 19.6\% | \$1,687,843 | 28.0\% |
| 9 | GL | \$76,066,777 | \$1,385,607 | \$5,175,701 | \$82,628,085 | \$14,498,170 | 21.3\% | \$14,498,170 | 23.5\% |
| 10 | GLH | \$9,388,888 | \$340,331 | \$1,359,894 | \$11,089,114 | \$1,557,505 | 16.3\% | \$1,557,505 | 19.9\% |
| 11 | L | \$22,633,787 | \$16,151 | \$3,116,031 | \$25,765,969 | \$1,770,254 | 7.4\% | \$1,770,254 | 8.5\% |
| 12 | HVPS | \$323,589 | \$989,658 | \$187,969 | \$1,501,216 | \$36,266 | 2.5\% | \$36,266 | 12.6\% |
| 13 | AL | \$1,122 | \$10 | \$281 | \$1,414 | \$77 | 5.8\% | \$77 | 7.4\% |
| 14 | SE | \$1,571,485 | \$0 | \$0 | \$1,571,485 | \$129,694 | 9.0\% | \$129,694 | 9.0\% |
| 15 | SM | \$9,917,829 | \$3,255 | \$334,970 | \$10,256,054 | \$628,991 | 6.5\% | \$628,991 | 6.8\% |
| 16 | SH | \$120,958 | \$57 | \$5,951 | \$126,966 | \$9,700 | 8.3\% | \$9,700 | 8.7\% |
| 17 | UMS | \$1,363,465 | \$30,736 | \$216,073 | \$1,610,274 | \$294,500 | 22.4\% | \$294,500 | 27.5\% |
| 18 | PAL | \$455,697 | \$581 | \$69,561 | \$525,839 | \$33,098 | 6.7\% | \$33,098 | 7.8\% |
| 19 | Total | \$645,361,066 | \$64,611,143 | \$216,734,834 | \$926,707,043 | \$93,624,316 | 11.2\% | \$93,624,316 | 17.0\% |
| 20 | Other Electric Revenue: |  |  |  |  |  |  |  |  |
| 21 | Sales for Resale (Acct. 447) |  |  | \$1,393,033 | \$1,393,033 | \$0 |  | \$0 |  |
| 22 | Late Payment/Returned Check Charges (Acct. 450) | \$1,050,445 |  |  | \$1,050,445 | \$0 |  | \$0 |  |
| 23 | Reconnect Fees/PJM Office (Acct. 451) | \$360,112 | \$716,868 |  | \$1,076,980 | \$0 |  | \$0 |  |
| 24 | Rent Electric Property (Acct. 454) | \$11,097,690 |  |  | \$11,097,690 | \$0 |  | \$0 |  |
| 25 | Rent Electric Property (Acct. 454) |  | \$318,500 |  | \$318,500 | \$0 |  | \$0 |  |
| 26 | Other Revenue (Acct. 456) | \$772,154 |  |  | \$772,154 | \$0 |  | \$0 |  |
| 27 | Utility Operations (Acct. 417) | \$415,473 |  |  | \$415,473 | \$0 |  | \$0 |  |
| 28 | Revenue Annualization | \$2,127,550 |  |  | \$2,127,550 | \$0 |  | \$0 |  |
| 29 | Revenue Loss Adjustment | (\$8,449,647) |  |  | (\$8,449,647) | \$0 |  | \$0 |  |
| 30 | Transmission - EGS (Acct. 456) |  | \$80,316,885 |  | \$80,316,885 | \$0 |  | \$0 |  |
| 31 | Transmission - Wholesale (Acct. 456) |  | (\$4,180,372) |  | (\$4,180,372) | \$0 |  | \$0 |  |
| 32 | Transmission-Tax Norm |  | \$1,429,774 |  | \$1,429,774 | \$0 |  | \$0 |  |
| 33 | Subtotal Other Revenue | \$7,373,775 | \$78,601,656 | \$1,393,033 | \$87,368,464 | \$0 |  | \$0 |  |
| 34 | Total Operating Revenue | \$652,734,842 | \$143,212,799 | \$218,127,867 | \$1,014,075,507 | \$93,624,316 | 10.2\% | \$93,624,316 | 16.7\% |

Historic Test Year Revenue at Present Rates
12 Month Period Ended December 31, 2020 Assuming No Customer Shopping (i.e. 100\% Default Service Load)

Duquesne Light Company
12 Month Period Ended December 31, 2020 Assuming No Customer Shopping (i.e. 100\% Default Service Load)

| A | B | C | D | E | F | G | H | 1 | $J$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate | $\begin{aligned} & \text { Distribution } \\ & \text { Present Rate } \\ & \text { Revenue } \end{aligned}$ | State Tax Adj. Surcharge (STAS) | $\begin{array}{\|c\|} \hline \text { Distribution } \\ \text { (Sum Col. C - D) } \end{array}$ | System Improvement Charge (DSIC) | $\begin{gathered} \text { Surcharge } \\ \text { Adjusted Distribution } \\ \text { (Sum Col. E-F) } \end{gathered}$ | Transmission Present Rate Revenue (w/o shopping) | Generation Present Rate Revenue (w/o shopping) | Adjusted Present Rate Revenue (Sum Col. G-1) |
| 1 | RS | \$301,761,883 | \$8,936 | \$301,770,819 | \$4,821,984 | \$306,592,803 | \$65,933,062 | \$201,851,079 | \$574,376,944 |
| 2 | RH | \$25,389,026 | \$949 | \$25,389,975 | \$398,787 | \$25,788,762 | \$3,168,744 | \$20,760,137 | \$49,717,644 |
| 3 | RA | \$3,247,573 | \$119 | \$3,247,692 | \$59,436 | \$3,307,128 | \$860,376 | \$3,371,302 | \$7,538,806 |
| 4 | GS | \$10,407,423 | \$151 | \$10,407,574 | \$149,535 | \$10,557,110 | \$996,295 | \$4,706,689 | \$16,260,093 |
| 5 | GM<25 | \$31,739,553 | \$1,738 | \$31,741,291 | \$462,264 | \$32,203,555 | \$8,693,939 | \$31,693,176 | \$72,590,670 |
| 6 | GM 25 | \$60,253,326 | \$3,620 | \$60,256,945 | \$865,946 | \$61,122,892 | \$23,784,613 | \$86,438,731 | \$171,346,236 |
| 7 | GMH $<25$ | \$3,200,281 | \$191 | \$3,200,472 | \$50,206 | \$3,250,679 | \$419,739 | \$2,607,547 | \$6,277,965 |
| 8 | GMH>25 | \$5,942,858 | \$364 | \$5,943,222 | \$85,256 | \$6,028,478 | \$1,609,630 | \$8,362,361 | \$16,000,469 |
| 9 | GL | \$60,646,508 | \$3,812 | \$60,650,320 | \$918,287 | \$61,568,607 | \$25,413,701 | \$98,618,000 | \$185,600,309 |
| 10 | GLH | \$7,713,845 | \$505 | \$7,714,349 | \$117,034 | \$7,831,384 | \$3,348,183 | \$12,454,593 | \$23,634,160 |
| 11 | L | \$20,573,937 | \$1,206 | \$20,575,142 | \$288,391 | \$20,863,533 | \$9,863,776 | \$38,055,976 | \$68,783,285 |
| 12 | HVPS | \$273,695 | \$64 | \$273,759 | \$13,564 | \$287,323 | \$10,863,748 | \$44,795,038 | \$55,946,109 |
| 13 | AL | \$1,031 | \$0 | \$1,031 | \$14 | \$1,045 | \$295 | \$3,843 | \$5,183 |
| 14 | SE | \$1,420,662 | \$82 | \$1,420,743 | \$21,049 | \$1,441,792 | \$15,157 | \$820,545 | \$2,277,494 |
| 15 | SM | \$9,150,401 | \$434 | \$9,150,835 | \$138,003 | \$9,288,838 | \$8,216 | \$848,064 | \$10,145,118 |
| 16 | SH | \$109,362 | \$6 | \$109,368 | \$1,890 | \$111,258 | \$268 | \$27,856 | \$139,382 |
| 17 | UMS | \$1,053,788 | (\$3) | \$1,053,785 | \$15,181 | \$1,068,965 | \$175,204 | \$1,108,524 | \$2,352,693 |
| 18 | PAL | \$415,378 | \$13 | \$415,390 | \$7,208 | \$422,599 | \$721 | \$86,288 | \$509,608 |
| 19 | Total | \$543,300,530 | \$22,185 | \$543,322,715 | \$8,414,035 | \$551,736,751 | \$155,155,667 | \$556,609,749 | \$1,263,502,167 |
| 20 | Other Electric Revenue: |  |  |  |  |  |  |  |  |
| 21 | Sales for Resale (Acct. 447) |  |  |  |  |  |  | \$1,393,033 | \$1,393,033 |
| 22 | Late Paymentreturned Check Charges (Acct. 450) | \$1,050,445 |  | \$1,050,445 |  | \$1,050,445 |  |  | \$1,050,445 |
| 23 | Reconnect Fees/PJM Office (Acct. 451) | \$360,112 |  | \$360,112 |  | \$360,112 | \$716,868 |  | \$1,076,980 |
| 24 | Rent Electric Property (Acct. 454) | \$11,097,690 |  | \$11,097,690 |  | \$11,097,690 |  |  | \$11,097,690 |
| 25 | Rent Electric Property (Acct. 454) |  |  |  |  |  | \$318,500 |  | \$318,500 |
| 26 | Other Revenue (Acct. 456) | \$772,154 |  | \$772,154 |  | \$772,154 |  |  | \$772,154 |
| 27 | Utility Operations (Acct. 417) | \$415,473 |  | \$415,473 |  | \$415,473 |  |  | \$415,473 |
| 28 | Revenue Annualization | \$2,127,550 |  | \$2,127,550 |  | \$2,127,550 |  |  | \$2,127,550 |
| 29 | Revenue Loss Adjustment | (\$8,449,647) |  | (\$8,449,647) |  | (\$8,449,647) |  |  | (\$8,449,647) |
| 30 | Transmission - EGS (Acct. 456) |  |  |  |  |  | \$0 |  | \$0 |
| 31 | Transmission - Wholesale (Acct. 456) |  |  |  |  |  | (\$4,180,372) |  | (\$4,180,372) |
| 32 | Transmission - Tax Norm |  |  |  |  |  | \$1,429,774 |  | \$1,429,774 |
| 33 | Subtotal Other Revenue | \$7,373,775 | \$0 | \$7,373,775 | \$0 | \$7,373,775 | (\$1,715,229) | \$1,393,033 | \$7,051,579 |
| 34 |  |  |  |  |  |  |  |  |  |
| 34 | Total Operating Revenue | \$550,674,305 | \$22,185 | \$550,696,490 | \$8,414,035 | \$559,110,526 | \$153,440,438 | \$558,002,782 | \$1,270,553,745 |

Duquesne Light Company
Historic Test Year at Proposed Distribution Rates


| A | B | C | D | E | F | G | H | 1 | J |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate Class | Distribution Revenue at Proposed Rates | Transmission Present Rate Revenue (w/o shopping) | Generation <br> Present Rate Revenue (w/o shopping) | Total Proposed Rate Revenue (Sum Col. C - E) | Total Revenue Change | Total Percent Change | Distribution Revenue Change | Distribution Percent Change |
| 1 | RS | \$340,283,193 | \$65,933,062 | \$201,851,079 | \$608,067,334 | \$33,690,390 | 5.9\% | \$33,690,390 | 11.0\% |
| 2 | RH | \$34,141,445 | \$3,168,744 | \$20,760,137 | \$58,070,327 | \$8,352,683 | 16.8\% | \$8,352,683 | 32.4\% |
| 3 | RA | \$4,013,834 | \$860,376 | \$3,371,302 | \$8,245,512 | \$706,706 | 9.4\% | \$706,706 | 21.4\% |
| 4 | GS | \$13,339,564 | \$996,295 | \$4,706,689 | \$19,042,548 | \$2,782,455 | 17.1\% | \$2,782,455 | 26.4\% |
| 5 | GM<25 | \$38,685,610 | \$8,693,939 | \$31,693,176 | \$79,072,726 | \$6,482,055 | 8.9\% | \$6,482,055 | 20.1\% |
| 6 | GM 25 | \$81,402,461 | \$23,784,613 | \$86,438,731 | \$191,625,805 | \$20,279,569 | 11.8\% | \$20,279,569 | 33.2\% |
| 7 | GMH<25 | \$3,935,039 | \$419,739 | \$2,607,547 | \$6,962,325 | \$684,360 | 10.9\% | \$684,360 | 21.1\% |
| 8 | GMH>25 | \$7,716,321 | \$1,609,630 | \$8,362,361 | \$17,688,311 | \$1,687,843 | 10.5\% | \$1,687,843 | 28.0\% |
| 9 | GL | \$76,066,777 | \$25,413,701 | \$98,618,000 | \$200,098,479 | \$14,498,170 | 7.8\% | \$14,498,170 | 23.5\% |
| 10 | GLH | \$9,388,888 | \$3,348,183 | \$12,454,593 | \$25,191,665 | \$1,557,505 | 6.6\% | \$1,557,505 | 19.9\% |
| 11 | L | \$22,633,787 | \$9,863,776 | \$38,055,976 | \$70,553,538 | \$1,770,254 | 2.6\% | \$1,770,254 | 8.5\% |
| 12 | HVPS | \$323,589 | \$10,863,748 | \$44,795,038 | \$55,982,376 | \$36,266 | 0.1\% | \$36,266 | 12.6\% |
| 13 | AL | \$1,122 | \$295 | \$3,843 | \$5,261 | \$77 | 1.5\% | \$77 | 7.4\% |
| 14 | SE | \$1,571,485 | \$15,157 | \$820,545 | \$2,407,187 | \$129,694 | 5.7\% | \$129,694 | 9.0\% |
| 15 | SM | \$9,917,829 | \$8,216 | \$848,064 | \$10,774,109 | \$628,991 | 6.2\% | \$628,991 | 6.8\% |
| 16 | SH | \$120,958 | \$268 | \$27,856 | \$149,082 | \$9,700 | 7.0\% | \$9,700 | 8.7\% |
| 17 | UMS | \$1,363,465 | \$175,204 | \$1,108,524 | \$2,647,192 | \$294,500 | 12.5\% | \$294,500 | 27.5\% |
| 18 | PAL | \$455,697 | \$721 | \$86,288 | \$542,706 | \$33,098 | 6.5\% | \$33,098 | 7.8\% |
| 19 | Total | \$645,361,066 | \$155,155,667 | \$556,609,749 | \$1,357,126,482 | \$93,624,316 | 7.4\% | \$93,624,316 | 17.0\% |
| 20 | Other Electric Revenue: |  |  |  |  |  |  |  |  |
| 21 | Sales for Resale (Acct. 447) |  |  | \$1,393,033 | \$1,393,033 | \$0 |  | \$0 |  |
| 22 | Late Payment/Returned Check Charges (Acct. 450) | \$1,050,445 |  |  | \$1,050,445 | \$0 |  | \$0 |  |
| 23 | Reconnect Fees/PJM Office (Acct. 451) | \$360,112 | \$716,868 |  | \$1,076,980 | \$0 |  | \$0 |  |
| 24 | Rent Electric Property (Acct. 454) | \$11,097,690 |  |  | \$11,097,690 | \$0 |  | \$0 |  |
| 25 | Rent Electric Property (Acct. 454) |  | \$318,500 |  | \$318,500 | \$0 |  | \$0 |  |
| 26 | Other Revenue (Acct. 456) | \$772,154 |  |  | \$772,154 | \$0 |  | \$0 |  |
| 27 | Utility Operations (Acct. 417) | \$415,473 |  |  | \$415,473 | \$0 |  | \$0 |  |
| 28 | Revenue Annualization | \$2,127,550 |  |  | \$2,127,550 | \$0 |  | \$0 |  |
| 29 | Revenue Loss Adjustment | (\$8,449,647) |  |  | (\$8,449,647) | \$0 |  | \$0 |  |
| 30 | Transmission - EGS (Acct. 456) |  | \$0 |  | \$0 | \$0 |  | \$0 |  |
| 31 | Transmission - Wholesale (Acct. 456) |  | (\$4,180,372) |  | (\$4,180,372) | \$0 |  | \$0 |  |
| 32 | Transmission- Tax Norm |  | \$1,429,774 |  | \$1,429,774 | \$0 |  | \$0 |  |
| 33 | Subtotal Other Revenue | \$7,373,775 | (\$3,145,004) | \$1,393,033 | \$5,621,804 | \$0 |  | \$0 |  |
| 34 | Total Operating Revenue | \$652,734,842 | \$152,010,663 | \$558,002,782 | \$1,362,748,287 | \$93,624,316 | 7.4\% | \$93,624,316 | 16.7\% |


Before The Pennsylvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands)


| Line |
| :---: |
| $\#$ |


| COST ELEMENT |  |
| :---: | :---: |
| 1 | Straight-Time Labor |
| 2 | Building Rents |
| 3 | Incentive Compensation |
| 4 | Materials Purchased |
| 5 | Employee Expenses |
| 6 | Surcharge Revenue Offset |
| 7 | Hardware/Software Maintenance |
| 8 | Professional Services |
| 9 | Uncollectible Accounts |
| 10 | Business Meals |
| 11 | TOTAL |
| 12 | Deferred Costs |
| 13 | Difference |

Difference
Duquesne Light Company
10
14
15
23
51
53
58
59
65
$75 / 76$
Sum L 1 to $L 10$
66
L $11+L 12$

$\begin{array}{cl}\text { Schedule } & \text { D-6A } \\ \text { Witness: } & \text { O'Brien } \\ \text { Page } & 2\end{array}$ of 2







Update Purchased Energy Expenses

D-7
O'Brien
of 2 SCHEDULE
Witness:
PAGE






$\begin{array}{r}{[4]} \\ \text { Annualized } \\ \text { Amounts } \\ \hline \$ \begin{array}{r}78,140 \\ 9,528\end{array} \\ \hline 87,668 \\ 1,899 \\ \\ \\ \\ \hline\end{array}$


| $[3]$ |  |
| :---: | :---: |
|  |  |
| Non-Union |  |
| $\$$ | $\begin{array}{r}39,510 \\ 1,286\end{array}$ |
|  | 40,796 |
|  |  |
|  | $\begin{array}{c}2.50 \% \\ 12\end{array}$ |



$(L 4+L 8)^{*} L 9^{*} L 10 / 12$
$[4] L 4+L 8+L 11$
$L 13+L 14$
$L 2 / L 1 * L 15$
Sum L 13 to L 16
L 5 or L 6 * L 17
$\begin{array}{ccc}18 & \text { Pro Form Increase for Change in Employees } & \mathrm{L} 17+\mathrm{L} 18 \\ 19 & \text { Total Pro Form Payroll } & \mathrm{L} 8+\mathrm{L} 19 \\ 20 & \begin{array}{l}\text { Total O\&M PR Expense } \\ \text { Payroll Increase }\end{array} & {[3] \mathrm{L} 4} \\ 21 & \text { [6] L 20-L } 21 \\ 22 & \text { Percent Increase } & \mathrm{L} 22 / \mathrm{L} 21\end{array}$

Exhibit 4 TY 2020 4-8-21
D_7_p2 (A56..R110)

| $\stackrel{\text { Line }}{\#}$ | Before The PennsyIvania Public Utility Commission Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands) |  |  |  | SCHEDULE Witness: PAGE | D-8 O'Brien of 1 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | ADJUSTMENT---RATE CASE EXPENSE |  |  |  |  |  |  |
|  |  | [1] | [2] | [3] |  | [4] |  |  |
|  | Description | Reference | Amount | Amount | Sub-Total |  |  |
| RATE CASE FOR NORMALIZATION |  |  |  |  |  |  |  |
|  | EXPENDITURES TO 12-31-20 |  |  |  |  |  |  |
| 1 | Expended Recorded in 2020 |  | 250 |  |  |  |  |
| 2 | Estimated Worked by not billed at 12-31-20 |  | 100 |  |  |  |  |
| 3 | Total Through 12-31-20 | $\mathrm{L} 1+\mathrm{L} 2$ |  | 35 |  |  |  |
| EXPENDITURES DURING FTY Ended 12-31-21 |  |  |  |  |  |  |  |
| 4 | Estimated Expenditures |  | 2,090 |  |  |  |  |
| 5 | Sub-Total | Line 4 |  | 2,08 |  |  |  |
| TOTAL EXPENDITURES FOR RATE FILING |  |  |  |  |  |  |  |
| 6 | Total Rate Case | L3 + L 5 |  |  | \$ 2.440 |  |  |
| 7 | Normalization Period [ A ] | Years | 3 |  |  |  |  |
| 8 | Normalization Expense per Year | L6/L7 |  |  |  | \$ | 813 |
| 9 | Expense included in HTY Results |  |  |  |  |  | 782 |
| 10 | Normalization Adjustment | L8-L9 |  |  |  | $\xlongequal{\text { s }}$ | 31 |

[A] Time between rate cases - Next Case planned for April 2024 with rates effective 1-1-25

[^34]

$\begin{array}{ll}\overline{6} & \frac{\text { त }}{\mathrm{\sigma}} \\ & \end{array}$ ㄷ






 | N |
| :---: |
| N |
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|  |

 |  |  | $\hat{\infty}$ | $\hat{\infty} \\|$ |
| :--- | :--- | :--- | :--- |
|  | $\Leftrightarrow$ |  | $\infty$ |




 | 1 | 1 | 1 |
| :---: | :---: | :---: |
| $\infty$ |  |  |
| $\infty$ |  |  |

## Duquesne Light Company <br> Before The PennsyIvania Public Utility Commission

Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands)

Taxes Other Than Income Taxes


## GROSS RECEIPT TAX PRO FORMA AT PRESENT RATES

Revenue From Sales to Customers

Uncollectibles

Surcharge Related

Net Taxable

| Tax Rate |  |  | 5.90\% |
| :---: | :---: | :---: | :---: |
| Gross Receipts Taxes at Present Rates | L 14 * L 15 |  | 48,766 |
| Budget Amount |  |  | 50,723 |
| Adjustment | L $16-\mathrm{L} 17$ | \$ | $(1,957)$ |

Schedule
D-20
Witness: Simpson/O'
Page 1 of 2
$5]$

Pro Forma ense 9
$\xlongequal{\$(1,868)} \xlongequal{\$ 57,438}$

Duquesne Light Company
Before The Pennsylvania Public Utility Commission
Historic Test Year - 12 Months Ended December 31, 2020 (\$ in Thousands)

Schedule D-20
Witness: O'Brien
Page 2 of 2

Taxes Other Than Income Taxes

|  |  | [1] | [2] |  | [3] |  | 4] | [5] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line \# | Description | Account Number |  |  | HTY |  | \&W stment | Increase in Payroll Taxes |  |
| 1 | Total Payroll Charged to Expense |  |  | \$ | 87,668 | \$ | 1,899 |  |  |
| 2 | FICA Expense |  |  | \$ | 3,592 |  |  |  |  |
| 3 | FICA Expense - Percent | L $2 / \mathrm{L} 1$ |  |  | 4.10\% |  | 4.10\% |  |  |
| 4 | Pro Forma FICA Expense on Pro Forma S\&W | [4]L1*L3 |  |  |  |  |  | \$ | 78 |
| 5 | FUTA Expense |  |  | \$ | 45 |  |  |  |  |
| 6 | FUTA Expense - Percent | L 5 /L 1 |  |  | 0.05\% |  | 0.05\% |  |  |
| 7 | Pro Forma FUTA Expense on Pro Forma S\&W | [4]L1*L6 |  |  |  |  |  |  | 1 |
| 8 | SUTA Expense |  |  | \$ | 463 |  |  |  |  |
| 9 | SUTA Expense - Percent | L 8 /L 1 |  |  | 0.53\% |  | 0.53\% |  |  |
| 10 | Pro Forma SUTA Expense on Pro Forma S\&W | [4]L1*L9 |  |  |  |  |  |  | 10 |
| 11 | City of Pittsburgh Payroll Tax Expense |  |  | \$ | - |  |  |  |  |
| 12 | SUI Expense - Percent | L 11 / L 1 |  |  | 0.00\% |  | 0.00\% |  |  |
| 13 | Pro Forma SUI Expense on Pro Forma S\&W | [4]L 1 * 12 |  |  |  |  |  |  | - |
| 14 | Pro Forma Adjustment | Sum L 4 to L 13 |  |  |  |  |  | \$ | 89 |


| Duquesne Light Company | Schedule | D-21 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | O'Brien |
| Historic Test Year -12 Months Ended December 31, 2020 | Page | 1 |
| (\$ in Thousands) 3 |  |  |

## Depreciation and Annualization Expense Adjustment

| Line \# | Description |  | [1] <br> Account <br> Number | $\begin{gathered} \text { Current } \\ \text { Depreciation } \\ \text { Rate } \\ \hline \end{gathered}$ | [3] <br> [4] <br> Plant Balance At |  |  |  | [5] |  | [6] |  | [7] |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |  |  | Other |  | Depreciation Expense |  |  |  |
|  |  |  |  |  |  | 12/31/16 |  | 12/31/17 |  |  | For Year |  | Annualized |  |
| INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | Organization |  | 301 |  | \$ | 100 | \$ | 100 | \$ | - | \$ | - | \$ | - |
| 2 | Franchise \& Consent |  | 302 |  |  | 7 |  | 7 |  | - |  | - |  | - |
| 3 | Miscellaneous Intangible Plant |  | 303 | 0.1714 |  | 317,776 |  | 326,128 |  | - |  | 55,192 |  | 55,908 |
| 4 | TOTAL INTANGIBLE |  | SumL1 to L3 |  |  | 317,883 |  | 326,235 |  | - |  | 55,192 |  | 55,908 |
| TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5 | Land \& Land Rights |  | 360 |  |  | 14,347 |  | 14,384 |  | - |  | - |  | - |
| 6 | Structures \& Improvements |  | 352 | 0.0285 |  | 33,364 |  | 33,109 |  | - |  | 947 |  | 944 |
| 7 | Station Equipment |  | 353 | 0.0321 |  | 413,285 |  | 432,945 |  | - |  | 13,582 |  | 13,898 |
| 8 | Towers and Fixtures |  | 354 | 0.0117 |  | 70,428 |  | 78,247 |  | - |  | 870 |  | 915 |
| 9 | Poles and Fixtures |  | 355 | 0.0192 |  | 57,009 |  | 59,118 |  | - |  | 1,115 |  | 1,135 |
| 10 | Overhead Conductors \& Devices |  | 356 | 0.0155 |  | 119,655 |  | 139,592 |  | - |  | 2,009 |  | 2,164 |
| 11 | Underground Conduit |  | 357 | 0.0175 |  | 80,748 |  | 80,849 |  | - |  | 1,414 |  | 1,415 |
| 12 | Underground Conductors \& Devices |  | 358 | 0.0183 |  | 147,900 |  | 147,799 |  | - |  | 2,706 |  | 2,705 |
| 13 | Road and Trails |  | 359 | 0.0177 |  | 10,186 |  | 10,186 |  | - |  | 180 |  | 180 |
| 14 | Regional Trans - Computer Hardware |  | 382 |  |  | - |  | - |  | - |  | - |  | - |
| 15 | Regional Trans - Computer Software |  | 383 |  |  | - |  | - |  | - |  | - |  | - |
|  | Meter Communications Equipment |  | 370.1 |  |  |  |  |  |  |  |  |  |  |  |
| 16 | TOTAL TRANSMISSION PLANT |  | Sum L5 to L 15 |  |  | 946,922 |  | 996,229 |  | - |  | 22,823 |  | 23,356 |
| DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 17 | Land \& Land Rights |  | 360 |  |  | 23,190 |  | 23,190 |  | - |  | - |  | - |
| 18 | Structures \& Improvements |  | 361 | 0.0212 |  | 70,054 |  | 70,294 |  | - |  | 1,488 |  | 1,490 |
| 19 | Station Equipment |  | 362 | 0.0214 |  | 491,114 |  | 504,801 |  | - |  | 10,656 |  | 10,803 |
| 20 | Storage Battery Equipment |  | 363 |  |  | - |  | - |  | - |  | - |  | - |
| 21 | Poles, Towers and Fixtures |  | 364 | 0.0222 |  | 532,981 |  | 596,620 |  | - |  | 12,539 |  | 13,245 |
| 22 | Overhead Conductors and Devices |  | 365 | 0.0272 |  | 540,188 |  | 576,573 |  | - |  | 15,188 |  | 15,683 |
| 23 | Underground Conduit |  | 366 | 0.0138 |  | 145,979 |  | 146,553 |  | - |  | 2,018 |  | 2,022 |
| 24 | Underground Conductors and Devices |  | 367 | 0.0280 |  | 424,531 |  | 437,017 |  | - |  | 12,062 |  | 12,236 |
| 25 | Line Transformers |  | 368 | 0.0346 |  | 412,053 |  | 432,109 |  | - |  | 14,604 |  | 14,951 |
| 26 | Services |  | 369 | 0.0167 |  | 100,047 |  | 102,586 |  | - |  | 1,692 |  | 1,713 |
| 27 | Meters |  | 370 | 0.0808 |  | 135,505 |  | 142,524 |  | - |  | 11,232 |  | 11,516 |
| 28 | Meter Communications Equipment |  | 370.1 | 0.0857 |  | - |  | - |  | - |  | - |  | - |
| 29 | Leased Property On Customers Premises |  | 372 |  |  | - |  | - |  | - |  | - |  | - |
| 30 | Street Lighting and Signaling Systems |  | 373 | 0.0288 |  | 42,622 |  | 43,252 |  | - |  | 1,237 |  | 1,246 |
| 31 |  | 0 | 0 |  |  | - |  | - |  | - |  | - |  | - |
| 32 | TOTAL DISTRIBUTION PLANT |  | Sum L 17 to L31 |  |  | 2,918,264 |  | 3,075,519 |  | - |  | 82,716 |  | 84,905 |
| GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 33 | Land \& Land Rights |  | 389 |  |  | 6,145 |  | 6,145 |  | - |  | - |  | - |
| 34 | Structures \& Improvements |  | 390 | 0.0278 |  | 141,766 |  | 144,185 |  | - |  | 3,975 |  | 4,008 |
| 35 | Leasehold Improvements |  | LH | 0.0000 |  | 20,986 |  | 20,986 |  | - |  | 695 |  | 695 |
| 36 | Office furniture |  | 391.1 | 0.0446 |  | 6,414 |  | 6,414 |  | - |  | 286 |  | 286 |
| 37 | Office equipment |  | 391.2 | 0.1806 |  | 31,606 |  | 25,355 |  | - |  | 5,144 |  | 4,579 |
| 38 | Transportation equipment |  | 392 | 0.0623 |  | 61,529 |  | 66,957 |  | - |  | 4,002 |  | 4,171 |
| 39 | Store equipment |  | 393 | 0.0328 |  | 1,677 |  | 1,621 |  | - |  | 54 |  | 53 |
| 40 | Tools, shop and garage equipment |  | 394 | 0.0400 |  | 25,849 |  | 27,833 |  | - |  | 1,074 |  | 1,113 |
| 41 | Laboratory equipment |  | 395 | 0.0498 |  | 2,159 |  | 1,896 |  | - |  | 101 |  | 94 |
| 42 | Power operated equipment |  | 396 | 0.0431 |  | 3,694 |  | 3,582 |  | - |  | 157 |  | 154 |
| 43 | Electric communications equipment |  | 397 | 0.0644 |  | 83,854 |  | 74,175 |  | - |  | 5,089 |  | 4,777 |
| 44 | Miscellaneous equipment |  | 398 | 0.0566 |  | 230 |  | 230 |  | - |  | 13 |  | 13 |
| 45 |  | 0 | 0 |  |  | - |  | - |  | - |  | - |  | - |
|  |  |  |  |  |  | - |  | - |  | - |  | - |  | - |
| 46 | TOTAL GENERAL |  | Sum L 33 to L45 |  |  | 385,909 |  | 379,379 |  | - |  | 20,589 |  | 19,943 |
| $(L 4+L 16+L 32 L 46)$ |  |  |  |  |  | 4,568,978 |  | 4,777,362 |  | - |  | 181,319 |  | 184,112 |
|  |  |  |  |  |  | - |  | - |  | - |  | - |  | 87 |
| 49 | Cloud Depreciation Expense |  |  |  |  | - |  | - |  | - |  | - |  | 2,032 |
| 50 |  |  |  |  |  | - |  | - |  | - |  | - |  | - |
| 51 | TOTAL PLANT IN SERVICE |  | L 47 to L 50 |  | \$ | 4,568,978 | \$ | 4,777,362 | \$ | - | \$ | 181,319 | \$ | 186,231 |


| Duquesne Light Company | Schedule | D-21 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | O'Brien |
| Historic Test Year - $\mathbf{1 2}$ Months Ended December 31, 2020 | Page | 2 |
| of 3 |  |  | (\$ in Thousands)

Depreciation and Annualization Expense Adjustment


DLC RRM 2020 HTY 4-8-21
D-2!Section D 2 Schedule 2 (A96. AL190)

| Duquesne Light Company | Schedule | D-21 |
| :---: | :---: | :---: |
| Before The Pennsylvania Public Utility Commission | Witness: | O'Brien |
| Historic Test Year - $\mathbf{1 2}$ Months Ended December 31, 2020 | Page | 3 |

Depreciation and Annualization Expense Adjustment










$\begin{array}{ll}\text { Schedule } & \text { D-22 } \\ \text { Witness: } & \begin{array}{l}\text { O'Brien } \\ \text { Page }\end{array} \\ \text { Of } 4\end{array}$ ®.
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$\stackrel{-}{-}$


$\stackrel{y}{\square} \neq 1$


| INCOME TAX FACTOR |  |  |
| :---: | :---: | :---: |
| 13 | GROSS REVENUE FACTOR |  |
| 14 | STATE INCOME TAXES | [3]L 13-Rate [2] |
| 15 | FACTOR AFTER STATE TAXES | L13+L14 |
| 16 | FEDERAL INCOME TAXES | [3]L15•Rate [2] |
| 17 | NET OPERATING INCOME FACTOR | 16078 |
| 18 | GROSS REVENUE CONVERSION FACTOR | 1/L17 |
| 19 | Combined Income Tax Factor On Taxable Incor | -L 14 -L 16 |

Exhibit 4 HTY 2020 4-8-21

# Duquesne Light Company 

Docket No. R-2021-3024750

DLC Exhibit 5
Direct Testimony - Part I

BOOK 8

# Duquesne Light Company 

Distribution Rate Case
Docket No. R-2021-3024750

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BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 1

## DIRECT TESTIMONY OF C. JAMES DAVIS

Subjects: Overview, Cost Management, and Economic Development

## PUBLIC VERSION

April 16, 2021
Q. Please state your name and business address.
A. My name is C. James Davis. My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. By whom are you employed and in what capacity?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Director - Rates, Energy Procurement, and Federal/RTO Affairs. I am responsible for the oversight and direction of the Company's Rates \& Tariff Services Department, Supply Procurement and RTO Settlement activities, as well as Federal and RTO affairs.
Q. What are your qualifications, work experience and educational background?
A. I graduated from St. Vincent College with a Bachelor of Arts degree in Computer Science in 1989 and Duquesne University with a Master of Business Administration in 1995. Prior to joining Duquesne Light, I had more than 24 years of diversified experience in the utility industry working for Allegheny Energy and FirstEnergy. I have held positions in Risk Management, Finance, Portfolio Management, Generation Dispatch, and Commodity Operations.
Q. Have you previously testified before the Commission or other regulatory agencies?
A. Yes, I testified in the 2016 Petition of Duquesne Light Company for Approval of a Distribution System Improvement Charge at Docket No. P-2016-2540046, in the

Company's Petition for a Default Service Plan for the period of June 1, 2017 through May 31, 2021 at Docket No. P-2016-2543140, in the Company's 2018 base rate proceeding at Docket No. R-2018-3000124, in the Peoples Natural Gas 2018 base rate proceeding at Docket No. R-2018-3006818, and in the Company's Petition for a Default Service Plan for the period of June 1, 2021 through May 31, 2025 at Docket No. P-2020-3019522.

## Q. What is the purpose of your testimony?

A. The purpose of my testimony is to provide an overview of Duquesne Light, to explain the reasons for the proposed rate increase and to identify the witnesses providing direct testimony on behalf of Duquesne Light. My testimony has been divided into five sections: Section I provides an overview of Duquesne Light and its requested rate increase. In Section II, I discuss the Company's initiatives to manage cost, provide outstanding support for our customers, and provide highly reliable electric service. Section III details the primary reasons for requesting this rate relief. Section IV describes the proposed economic development program for large nonresidential customers. Section V describes the organization of the filing, introduces Duquesne Light's witnesses in the proceeding and reviews the importance of this case to Duquesne Light, its customers, and Southwestern Pennsylvania.

## Q. Are you sponsoring any exhibits at this time?

A. Yes, I am sponsoring the Statement of Reasons; CONFIDENTIAL Exhibit CJD-1, the Company's 2020 Annual Diversity Report; and CONFIDENTIAL Exhibit CJD-2, a special rate contract.

## I. OVERVIEW OF DUQUESNE LIGHT AND THE REQUESTED DISTRIB UTION RATE INCREASE

## Q. Please provide some background on Duquesne Light

A. For more than 135 years, Duquesne Light has been serving the people of the greater Pittsburgh region with reliable electric service. The Company provides distribution, transmission, and default supply services to approximately 600,000 customers within its service territory that extends across two counties and covers approximately 817 square miles. Duquesne Light is a "public utility" and an "electric distribution company" ("EDC") as those terms are defined under 66 Pa . C.S. §§ 102 and 2803.
Q. Why is the Company filing a general rate case requesting an overall increase in rates at this time?
A. The Company has been investing in the distribution system to provide safe, reliable service to its customers, which has been especially essential in the time of the COVID-19 pandemic. The Company must continue to invest to satisfy the needs of its customers, while also maintaining the ability to attract capital to support these investments. The Company's proposal will enable it to maintain a balance amongst: 1) providing safe, reliable service to customers; 2) controlling costs; 3)
providing enhanced customer assistance for those in need; and 4) stimulating beneficial customer growth to mitigate the economic effects of the pandemic on our region and our customers.

## Q. Please describe the increases and changes in rates for distribution service that the Company is proposing.

A. The Company is proposing a general rate increase to its distribution rates and is also proposing to roll its Distribution System Improvement Charge ("DSIC") into base rates. The Company also proposes to expand its offering of a Transportation Electrification Program and to provide a Community Development Rider aimed at nonresidential customers that would attract new customers to the region and/or enable existing customers to expand operations. The Company also is proposing to establish COVID-19 relief programs for residential and small/medium commercial customers that are currently dealing with the economic effects of the pandemic.

## Q. Please describe the changes to existing rate riders that affect distribution base rate revenue in this proceeding.

A. The Company implemented a Distribution System Improvement Charge ("DSIC") Rider beginning October 1, 2016, pursuant to the Commission's order at Docket No. P-2016-2540046. The Company proposes to roll the projected DSIC Rider charges and costs into base distribution rates and reset the DSIC Rider to zero as of the effective date of the base distribution rates determined in this proceeding. The DSIC Rider will remain at zero until the Company has placed in service plant in

DSIC eligible accounts in excess of the claimed amounts included in its estimated December 31, 2022 rate base in the current proceeding. As explained by Mr . O'Brien in his direct testimony (Duquesne Light St. No. 10), while the roll in of the DSIC charges has the effect of increasing base distribution rates by $\$ 29.2$ million, this will have no impact on customers' bills, because customers will no longer pay the current surcharge which will be set to zero when new distribution rates become effective as a result of this proceeding.
Q. Please provide a summary of the Company's request for a distribution rate increase.
A. Duquesne Light is requesting the Commission approve a $\$ 115.0$ million distribution rate increase effective January 15, 2022. If the Company's request is approved as submitted, the total bill (which includes rates for distribution, surcharges, transmission, and generation) for a residential customer using 600 kilowatt-hours ("kWh") per month and taking default power service from the Company would increase from $\$ 100.12$ per month to $\$ 107.85$ per month or by 7.72 percent.
II. COMPANY INITIATIVES TO MANAGE COSTS, PROVIDE OUTSTANDING SUPPORT FOR OUR CUSTOMERS, AND HIGHLY RELIABLE ELECTRIC SERVICE
Q. Please describe some of Duquesne Light's efforts to control costs while maintaining high levels of customer service and reliability.
A. The Company has always recognized a need to control costs and in 2020 created a team specifically focused on this issue, The Affordability and Innovation Management ("AIM") Organization. The AIM Organization provides the structure and support to take an idea and ensure its implementation to create value to our customers. The organization has four pillars of focus to drive improvement in our business while remaining focused on our customers. The AIM Organization's pillars are the Affordability Office, Business Analytics, Business Process Maturity, and the Innovation Center. I will provide a high-level overview of each: The Affordability Office takes ideas in a data driven approach to ensure risk and value are identified throughout the life cycle of the idea. The Affordability Office deploys the training, methodology, and performance accountability to ensure progression of the ideas. The Business Analytics group establishes governance and quality around our data while also deriving sophisticated insights from the data. Business Process Maturity looks at the maturity of our processes across the business and evaluates our maturity in those particular areas in comparison with our peers. Lastly, the Innovation Center takes a holistic look on innovative thought and explores new and forward-thinking opportunities.

## Q. Please describe some of benefits Duquesne Light's AIM Organization has realized to date.

A. In 2020, the Company realized approximately $\$ 7$ million in sustainable cash savings via AIM initiatives, which represents a combination of capital deployment, operations and Maintenance ("O\&M") expense and working capital savings.

## Q. What benefits does the Company project for the Future Test Year?

A. The Company has engaged in over 125 initiatives to drive approximately $\$ 6.3$ million in projected sustainable O\&M savings and approximately $\$ 8$ million in projected sustainable capital savings across the business. These initiatives not only drive affordability but also improve safety, reliability, customer service, and sustainability.
Q. What benefits does the Company project for the Fully Projected Future Test Year?
A. In addition to the sustainable savings discussed above, the Company projects approximately $\$ 1.0$ million in sustainable O\&M savings and approximately $\$ 11.0$ million in sustainable capital savings.
Q. Please provide an example of a program that reduces cost and addresses sustainability.
A. The Company has developed an E-Bill initiative that touches upon several of these areas. The Company's ability to offer a simpler E-Bill enrollment process, along with easy access to E-Bill, improves the affordability of our product, serves our customers in their preferred communication channel, and reduces the consumption of paper to drive sustainability.
Q. Has the Company performed any surveys or studies to track customer satisfaction?
A. As Ms. Neiswonger describes in her direct testimony (Statement No. 9), the Company has conducted transaction surveys of customers who have had interactions with the Company as well as other surveys conducted on a monthly basis to measure overall satisfaction with Duquesne Light.

## Q. Please describe the results of the surveys.

A. In general, the surveys indicate that for the four-year period beginning in 2017 over seventy three percent of Duquesne Light customers have been satisfied with our service and in 2020, the percentage increased to seventy five percent. Ms. Neiswonger describes the results in detail in her direct testimony.
Q. Please describe some of Duquesne Light's efforts to provide outstanding customer service.
A. The Company has undertaken several initiatives to improve customer satisfaction and engagement over the past several years as well as a complete bill redesign to improve the readability of the customer bill. The initiatives include:

- A new Duquesne Light mobile app available in the App Store and Google Play;
- Customer segmentation and initiative-specific personas to deliver more timely and relevant messages to customers in the channel they prefer;
- A self-serve Payment Arrangement portal on DuquesneLight.com to provide a simplified process for customers to set up a payment arrangement;
- A small and medium-size concierge Business Center within our Contact Center to better serve business customers;
- An email engagement platform to send relevant, timely email communications to customers with content related to storm preparation, energy efficiency information, products and services, and more; and
- A presence on Nextdoor, a social platform that allows the Company to send targeted neighborhood messages regarding outages and other important information.
Q. How has the Company helped low-income customers meet their need and ability to afford electric service?
A. In addition to energy efficiency programs, the Company has four Universal Services programs that assist low-income customers: 1) Customer Assistance Program ("CAP"), 2) Customer Assistance Referral and Evaluation Services ("CARES"), 3) the Hardship Fund, and 4) Smart Comfort/Low Income Usage Reduction Program ("LIURP"). These programs are described in detail by Ms. Scholl in her direct testimony (Statement No. 7).
Q. How has the Company performed with respect to its reliability metrics?
A. The Company measures its reliability performance based on three system and customer reliability metrics: System Average Interruption Duration Index
("SAIDI"), System Average Interruption Frequency Index ("SAIFI"), and Customer Average Interruption Duration Index ("CAIDI"). Mr. Morris describes in his direct testimony (Statement No. 4) the overall reliability metrics of the Company. In summary over the past five years of benchmarked data (i.e., 2016 through 2020 utilizing the Pennsylvania Public Utility Commission's annual Electric Service Reliability in Pennsylvania report and Quarterly Electric Reliability reports), Duquesne Light has been either the top-performing large Electric Distribution Company ("EDC") or the second top-performing EDC in the Commonwealth, depending on the specific reliability metric.
Q. How has the Company been able to continue to perform at such a high level?
A. The Company attributes its strong reliability performance over the 2016 to 2020 period to the Company's ongoing T\&D System Capacity and Reliability plant additions initiated in its LTIIP as well as vegetation management efforts.
Q. What steps is the Company taking to further improve its service reliability and reduce outages?
A. As Mr. Morris discusses in his testimony (Statement No. 4), the Company must continue to invest in its distribution system to maintain and enhance its reliability and resilience, which is a main driver of the Company's rate proposal.
Q. Mr. Morris addresses the Company's projected investments in 2022. Is the Company also considering how to provide safe, re liable, and affordable service in subsequent years?
A. Yes. The Company is looking ahead to understand customers' potential future needs and how to address them. Duquesne Light is focused on leveraging investments in the distribution grid to provide better visibility and situational awareness of the system, ensuring the integration of Distributed Energy Resources ("DER") and other emerging technologies. As the distribution system owner and operator, Duquesne Light plays an integral role in ensuring that the grid remains reliable and safe as new technologies emerge. The Company looks forward to engaging with the Commission and stakeholders on these issues in the future.
Q. What steps has the Company takento support diversity, equity, and inclusion?
A. In 2019, the Company established a Diversity and Inclusion Committee ("Diversity Committee") composed of a cross functional selection of employees tasked with enhancing the Company's culture of inclusion and equity. The Diversity Commitee began by implementing a comprehensive internal education and awareness campaign including unconscious bias training as well as various heritage month celebrations. To build upon those efforts, the Company also hired its first Chief Diversity Officer and worked to establish a comprehensive strategy to advance diversity, equity, and inclusion at Duquesne Light.
Q. Please describe management's program to address diversity, equity, and inclusion.
A. In 2020, the Company reaffirmed and accelerated its commitment to diversity, equity, and inclusion by introducing its first Inclusion Strategy, launching three newly formed Business Employee Resource Groups (BERGs), transforming its Diversity Committee to a Diversity, Equity and Inclusion Council ("DEI Council"), initiating phase two of unconscious bias training, and expanding its talent attraction and outreach programs. The Company's 2020 Annual Diversity Report, which is provided to the Commission on a confidential basis pursuant to the Commission's Diversity Policy Statement and is attached as CONFIDENTIAL Exhibit CJD-1, describes these efforts in more detail, along with priorities and plans for 2021 and beyond.


## III. REASONS FOR REQUESTED RATE RELIEF

## Q. Please explain the reasons for the increase in base rates proposed in this proceeding.

A. The three primary reasons for the Company to increase its base distribution rates are as follows:

1. The continued growth in the Company's distribution rate base. The Company has invested heavily in the distribution system, consequently the rate base has grown by 17.4 percent since the last base rate proceeding. As Mr. O'Brien describes in his direct testimony (Statement No. 10) the
projected rate base at December 31, 2022 will be $\$ 336.758$ million greater than the level currently reflected in current base distribution rates.
2. The sharp reduction in sales. Duquesne Light's projected 2022 revenue at current rates is $\$ 9.2$ million dollars less that what was agreed to in the Settlement Agreement approved by the Commission. As Mr. Mobley addresses in his direct testimony (Statement No. 3), sales to residential, commercial and industrial customers combined are expected to decline by approximately 1.4 percent annually each year between 2019-2025. The decline in usage in the Company's service area is due to a combination of factors that include the increases in efficiency of appliances, increases in net metering, and federal mandates to lighting standards, as well as the implementation of Pennsylvania's state-mandated energy efficiency and conservation programs under Act 129. These declines are partially offset by projected customer and Electric Vehicle growth. The Company has made an $\$ 8.450$ million revenue adjustment to reflect this projected loss, as Mr. O'Brien describes in his direct testimony and calculates in Schedule D5B.
3. Increase in ope rations and mainte nance ("O\&M") expense. Duquesne Light's projected O\&M expenses are 10.76 percent higher than in the last rate proceeding. The primary drivers include: 1) an increase of approximately 100 employees primarily in the Operations and Information Technology areas; 2) wage increases of approximately 3.0 percent per year; 3) costs of the previously mentioned Riders and COVID-19 relief programs
included in base rates; 4) inclusion of the Company's electrical model to improve reliability and responding to customer outages; and 5) increased costs associated with COVID-19. These increases are partially offset by AIM cost saving measures.

## IV. DESCRIPTION OF THE PROPOSED COMMUNITY DEVELOPMENT RIDER <br> Q. Does the Company's tariff currently provide for an economic development rate or rider?

A. No, the current tariff does not provide for a programmatic rate or rider for economic development. It does, however, provide for the Company to enter into special contracts for electric service with industrial or commercial customers on an individual basis to address changing business needs, operating conditions, or less expensive competitive alternatives for energy.

## Q. Is the Company proposing a new economic de velopment rate or rider in this case?

A. Yes. As detailed in the direct testimony of Ms. Everett (Statement No. 17), Duquesne Light is proposing a Community Development Rider that will provide a defined discount to eligible commerical and instrustrial customers in Duquesne Light's service territory.
Q. If the Company can enter into special contracts, why does it seek a specific Community Development Rider?
A. The Company is proposing a Community Development Rider for two reasons. First, to establish a measured, time bound program that has defined parameters addressing when an industrial or commercial customer could qualify for such program. These parameters would address issues such as the number of new or incremental jobs being created, the amount of new or incremental load being added to the service territory, the amount of a discount to the applicable general service rate that would be applied and a term for how long the discount would apply. Second, a standalone Community Development Rider will reduce the administrative burden of implementing such a program, compared to pursuing economic development through a series of individual special contracts.

## Q. Will the Community Development Rider be subsidized by other customers?

A. No, as Ms. Everett addresses in her direct testimony (Statement No. 17), the rate design of the Community Development Rider will collect all incremental costs created by the customer utilizing the rider and in addition provide a contribution to fixed costs.
Q. Will the Community Development Rider be available for only ne w customers?
A. No, the Company is proposing that the Rider would be available for both new and existing customers. In the case of existing customers, the discount available under the rider would only apply to the new incremental load.
Q. Does the Company intend to eliminate the use of special contracts?
A. No, the Company does not intend to eliminate the use of special contracts; however, they will continue to be used sparingly. Special contracts still have a useful purpose to address changing business needs, operating conditions, or less expensive competitive alternatives for energy. The Community Development rider is meant to specifically address growth in our service territory, whereas the special contracts would still be used to address more complex situations.
Q. Does the Company currently have any special contracts?
A. Yes, the Company does have one special contract that was reviewed and approved by the Commission at Docket P-2019-3014640.
Q. Is the Company providing a confidential report concerning the customer contract approved by the Commission at Docket P-2019-3014640?
A. Yes. As the Company explained in its Petition seeking approval of the contract on November 21, 2019, the contract was entered into with [BEGIN CONFIDENTIAL]

CONFIDENTIAL] ("Customer") pursuant to Rule 4 of the Company's tariff. The contract establishes a special distribution rate for the Customer for the period [BEGIN CONFIDENTIAL] CONFIDENTIAL]

The Company incurred approximately [BEGIN CONFIDENTIAL] [END CONFIDENTIAL] in capital costs to extend service to the customer. The contract was designed to recover all of these costs over the contract's [BEGIN CONFIDENTIAL] [END CONFIDENTIAL] term. In its confidential response to discovery request TUS P-4, the Company agreed to "provide a confidential report to the Commission that details the revenue resulting from this Contract at the end of the contract period, or in a future rate case, whichever occurs first." I am providing this report on behalf of the Company via my testimony.
Q. What are the revenues the Company has realize d resulting from the contract?
A. As of the date of this testimony, the Company has not realized revenues from the contract because the customer has not yet energized service. During the period the contract was pending before the Commission, the COVID-19 pandemic struck, and [BEGIN CONFIDENTIAL]
[END CONFIDENTIAL]. This impacted the customer's construction activities and necessitated several successive postponements of service energization.

The customer has since resumed construction, and the Company anticipates it will energize service in spring of 2021; however, the remaining duration of the rate contract - [BEGIN CONFIDENTIAL]
[END
CONFIDENTIAL] - will not be sufficient to recover the Company's incremental capital costs to serve the customer.
Q. How does the Company propose to recover these costs?
A. The Company has executed a revised contract with the customer to continue until [BEGIN CONFIDENTIAL] [END CONFIDENTIAL] and include a revenue guarantee. This revised contract is attached to my testimony as CONFIDENTIAL Exhibit CJD-2. This revised contract duration, together with the revenue guarantee, will ensure the Company's recovery of incremental capital costs incurred to serve the Customer. The Company is requesting the Commission's approval of this revised contract as part of this proceeding.

## V. ORGANIZATION OF THE FILING, WITNESSES, AND THE IMPORTANCE OF THE CASE TO DUQUESNE LIGHT

Q. Please identify the other witnesses presenting testimony on be half of Duquesne Light and the principal matters they will address.
A. In addition to my testimony, which is Statement No. 1, the Company's witnesses are presenting testimony as follows:

Jaime Bachota Statement No. 2 Provides an overview of the Company's accounting process. Explains the Company's actual financial results for the Historic Test Year and reviews the budgeted financial results for the Future Test Year and the Fully Projected Future Test Year.

Todd Mobley
Statement No. 3
Provides an overview of the sales forecast. Describes the outcome of the sales forecast model for the Historic Test Year, the Future Test Year, and the Fully Projected Future Test Year. Gives supporting details on the impacts of key drivers to the

|  |  | overall sales forecast including the effects of Energy Efficiency and Conservation. |
| :---: | :---: | :---: |
| Benjamin Morris | Statement No. 4 | Describes the Company's capital additions planned to be placed in service through the end of the Fully Projected Future Test Year. Provides a description of the Company's electric delivery system, a description of the planning process to ensure the system continues to meet the needs of its customers. This would include items such as reliability metrics, line losses, and other capital projects. |
| Krysia Kubiak | Statement No. 5 | Describes the Company's proposal to create a Stimulus Rider to address commercial customers impacted by the COVID-19 pandemic. |
| Yvonne Phillips | Statement No . 6 | Describes the Company's proposal to modify Tariff Rule 41 Prohibition of Residential Master Metering to allow master metering of certain new multifamily residential premises. |
| Katie Scholl | Statement No. 7 | Describes the Company's Universal Service Program as well as the Company's education and outreach for its proposed residential customer COVID-19 relief program. |
| Sarah Olexsak | Statement No. 8 | Describes theproposed <br> Transportation ("TE Programs") and <br> Programsexplains how the Company proposesto recover costs associated with theTE Programs. |
| Jennifer Neiswonger | Statement No. 9 | Describes the Company's customer satisfaction and the initiatives designed to further enhance |


| Robert L. O'Brien | Statement No. 10 | Discusses the components of Duquesne Light's overall revenue requirement, and supports certain pro forma ratemaking adjustments for the fully projected future test year ended December 31, 2022 ("FPFTY"), the future test year ended December 31, 2021 ("FTY") and the historic test year ended December 31, 2020 ("HTY"), and portions of the claimed measures of value, including Duquesne Light's cash working capital allowance. |
| :---: | :---: | :---: |
| John J. Spanos | Statement No. 11 | Provides the service life study and depreciation study which supports the Company's depreciation accruals for rate making purposes utilizing Commission approved procedures. |
| Matthew L. Simpson | Statement No. 12 | Discusses the Company's tax expense and related tax information for the Historic Test Year, the Future Test Year, and the Fully Projected Future Test Year, and describes the proposed Federal Tax Adjustment Charge. |
| Paul R. Moul | Statement No. 13 | Provides evidence, analysis and recommendation concerning the appropriate rate of return that the Commission should recognize in the determination of the revenues that the Company should realize as a matter of the proceeding. |
| Jim Milligan | Statement No. 14 | Provides explanation of the Company's current and future capital structure, cost of long-term debt, current credit ratings and the importance of maintaining the credit worthiness of the Company. |

\(\left.\left.$$
\begin{array}{lll}\text { Howard S. Gorman } & \text { Statement No. } 15 & \begin{array}{l}\text { Describes the Jurisdictional } \\
\text { Separation Studies and the } \\
\text { unbundled, Allocated Cost of }\end{array} \\
\text { Service Study used in this } \\
\text { proceeding. }\end{array}
$$\right\} \begin{array}{l}Addresses the allocation of the <br>
proposed revenue increase among <br>
the rate classes and the relative rate <br>
class returns. Describes the rate <br>

design principles and how they are\end{array}\right\}\)| used to determine the proposed rates. |
| :--- |
| Proves out that the proposed rates |
| produce the target revenue for each |
| class. Describes the proposed |
| changes to the Company's retail |
| tariff. |

## Q. Please explain the importance of the proposed rate increase to Duquesne

## Light.

A. In order to provide continued and enhanced reliability, prepare for catastrophic events such as storms or cyber-attack, and meet increasing customer service needs, the Company must continue to make substantial investments in new distribution plant as well as replace ageing infrastructure including the investments identified in its Commission-approved LTIIP. The Company must do this during a period of declining sales, DSIC revenues reaching the limit of 5.0 percent of distribution revenue provided by 66 Pa . C.S. § 1358(a) by the end of the Future Test Year, and increasing O\&M expenses. Due to these factors, Duquesne Light's projected overall rate of return for the Fully Projected Future Test Year, at present rates, is
only 5.36 percent, with an estimated return on common equity of 6.29 percent. As Mr. Moul will address in his direct testimony (Statement No. 13), this level of return on equity is inadequate to attract the capital and sustain the level of investment necessary to ensure customers continue to receive safe, reliable electric service. Therefore, it is important that the Company be granted the rate relief it has requested in this proceeding.

## Q. Does this complete your Direct Testimony at this time?

A. Yes. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

## BEFORE THE

 PENNSYLVANIA PUBLIC UTILITY COMMISSIONDocket No. R-2021-3024750

Duquesne Light Company

## CONFIDENTIAL EXHIBIT CJD-1

## BEFORE THE

 PENNSYLVANIA PUBLIC UTILITY COMMISSIONDocket No. R-2021-3024750

Duquesne Light Company

# BEFORE THE <br> PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

## Duquesne Light Company

Statement No. 2

Direct Testimony of Jaime A. Bachota

## Subject: Accounting Overvie w and Budget

## DIRECT TESTIMONY OF JAIME A. BACHOTA

Q. Please state your full name, business affiliation and address.
A. My name is Jaime A. Bachota. I am the Assistant Controller of Duquesne Light Company ("Duquesne Light" or the "Company"). My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. Please describe your education and work experience.
A. I graduated from Duquesne University with a Bachelor of Science in Business with a concentration in accounting. After graduating I was employed with Deloitte \& Touche LLP for seven years.

I joined the Company in 2007 in the title of Supervisor of Internal and External Reporting and was promoted to Assistant Controller in 2018. In my role as Assistant Controller, I have responsibility for accounting, financial reporting, payroll, timekeeping and accounts payable.
Q. Have you previously testified before the Commission or other regulatory agencies?
A. No.
Q. What is the purpose of your testimony in this proceeding?
A. My testimony covers two main areas. First, I will provide an overview of the Company's accounting processes and explain the Company's actual financial results for the Historic Test Year ended December 31, 2020. Second, I will present
and review the budgeted financial results for the Future Test Yearending December 31, 2021 and the Fully Projected Future Test Year ending December 31, 2022.
Q. Are you sponsoring any exhibits as part of your direct testimony?
A. Yes, I am. I am responsible for all of the recorded historical accounts, as well as the budgeted and projected accounts of the Company. As such, I am sponsoring all of the Company's financial statements, including income statements and balance sheets for the Historic Test Year ended December 31, 2020. I am sponsoring the Company's budget for the Future Test Year ending December 31, 2021 and the Fully Projected Future Test Year ending December 31, 2022. With regard to the Pennsylvania Public Utility Commission's ("Commission") data filing requirements filed with this proceeding, I sponsor the responses related to the Company's financial statements and regarding measures of value and operating income. Please see Exhibit JAB-1 to my testimony for the listing of data filing requirements that I am sponsoring. My name is at the top of each data filing requirement that I sponsor.
Q. Please describe the material presented on Schedules B-1 through B-4 and Schedules B-6 through B-8 of DLC Exhibits 2, 3 and 4?
A. All of the data shown in Schedules B-1 through B-4 and Schedules B-6 through B8 were derived from either the books and records of Duquesne Light for the twelve months ended December 31, 2020 and prior, or the budget for Duquesne Light for the twelve months ending December 31, 2021 and twelve months ending December

31, 2022. Schedules B-1 shows the budgeted balance sheet of Duquesne Light as of December 31, 2021 and December 31, 2022, and the actual balance sheet as of December 31, 2020. The balance sheets of Duquesne Light are prepared in accordance with Federal Energy Regulatory Commission ("FERC") requirements. Schedules B-2 include the statements of Duquesne Light's operating income for the twelve months ended December 31, 2020 and budgeted for the twelve months ending December 31, 2021 and twelve months ending December 31, 2022. Details of actual and budgeted operating revenues are provided in Schedules B-3. Schedules B-4 provide the actual and budgeted operations and maintenance expenses of Duquesne Light by FERC account, including the major categories of expense, such as purchased power, transmission, distribution, customer accounts, customer service and administrative and general expenses. Schedules B-6 and B-7 present the embedded cost of debt as of December 31, 2020 and estimated as of 2021, as well as December 31, 2022. The capital structure of Duquesne Light for the test year and prior years is shown on Schedules B-8. Please see further discussion of Schedules B-6, B-7 and B-8 in the testimony of Mr. James Milligan (DLC Statement No. 14).

## Q. Please explain the accounting system utilized by the Company.

A. For the twelve months ended December 31, 2020, Duquesne Light maintained its accounting records on the Oracle Fusion general ledger package, which is cloud based and was fully implemented in 2018. The accounting records are maintained in accordance with the FERC's Uniform System of Accounts ("USofA"). Financial
statements for Duquesne Light are also prepared in accordance with accounting principles generally accepted in the United States of America ("GAAP").

Duquesne Light maintains its property, plant and equipment accounting records on the Power Plan Consultant's fully integrated asset accounting system, referred to as PAAM. The USofA requires that utilities record all construction and retirements of electric plant by means of work orders. The work order system must show the nature of each addition to, or retirement from, electric plant, the total cost thereof, and the plant account or accounts affected. Duquesne Light uses such a work order system, and under this system, an authorized work order is used for all capital work performed.
Q. Are there cloud-based service arrangements that are included in the proce eding?
A. Yes, $\$ 3.1$ million of implementation costs associated with cloud-based service arrangements from January 1, 2021 through December 31, 2022 have and will be recorded as operating expenses for GAAP purposes.
Q. Is Duquesne Light including cost of cloud-based software in rate base in its claim for recovery in this rate case?
A. Yes. As the Company explained in its 2018 base rates case, cloud-based information systems provide benefits to customers over extended periods of time and not just the period in which the costs are incurred, and so should be treated as capital and includable in rate base. The Commission approved the inclusion of
cloud-based software costs in the Company's rate base in that 2018 proceeding, finding in relevant part: "Commencing with implementations subsequent to May 1, 2015, the Company shall be permitted to capitalize the development costs for cloudbased information systems." Consistent with that approval, the Company has continued to include such costs in rate base in this case. These costs are reflected as an adjustment to rate base in DLC Exhibit 2, Schedule D-11, which is sponsored by Mr. Robert L. O'Brien. Please see further discussion of this adjustment in the testimony of Mr. Robert L. O'Brien (DLC Statement No. 10).

## Q. How does Duquesne Light account for new plant put into service and associated retirements of existing plant?

A. Costs of new construction are tracked in the system by the use of work orders. At the completion of each project, operations personnel notify asset accounting that the constructed or purchased assets related to a specific work order are now used and useful for their intended purpose. Based on this information, the work order is placed in service and ultimately unitized, or charged to the correct units of property in the plant accounting system. At month end, journal entries are automatically generated and posted to the general ledger for these new in-service dollars. In addition, the system calculates the allowance for funds used during construction ("AFUDC"), spreads overheads, calculates depreciation expense, processes unitized additions and processes plant retirements. The related journal entries are created and automatically posted to our general ledger.
Q. Please explain why Duquesne Light is requesting permission to recover AFUDC for land held for future use.
A. Duquesne Light has not included land held for future use in rate base in this proceeding because the land is not currently providing service to customers. However, larger projects often have relatively long lead times from commencement to completion. While Duquesne Light is authorized to record AFUDC on the project expenditures once the project commences, Duquesne Light frequently must acquire land or land rights before construction begins. It is appropriate to allow Duquesne Light to record AFUDC on land acquired to provide future service and add such amount to rate base when the project is used to provide service to customers.
Q. Does Duquesne Light have an internal audit program?
A. Yes, Duquesne Light has an Internal Audit Department, which implements the annual internal audit program approved by the Audit Committee of our Board of Directors. This department reports to the Audit Committee, as well as the Vice President, Rates and Regulatory Affairs, General Counsel. They perform a slate of annual internal audit and analysis projects to ensure the Company maintains strong internal controls.

## Q. Does Duquesne Light have an external audit conducted periodically?

A. Yes, both Duquesne Light Holdings, Inc. and Duquesne Light ("Companies") have external audits conducted annually by Deloitte \& Touche LLP. Deloitte \& Touche

LLP recently completed their audits of the financial statements of the Companies for 2020 , the results of which were unqualified opinions on the consolidated financial statements of the Companies as of December 31, 2020. Deloitte \& Touche LLP also performs an annual audit of Duquesne Light's regulatory financial statements that are included in the FERC Form 1. Deloitte \& Touche LLP is in the fieldwork phase of its audit of the December 31, 2020 regulatory financial statements to be included in the December 31, 2020 FERC Form 1. The Company anticipates filing its FERC Form in April 2021. In addition to the annual audits performed by Deloitte \& Touche LLP, both the FERC and the Commission have performed periodic audits of Duquesne Light.

## Q. Have any major accounting changes occurred since the Company's last rate case? <br> A. There have been accounting changes that have occurred since our last distribution rate case in response to new pronouncements that have been issued by the Financial Accounting Standards Board ("FASB") and others. The Company has implemented these new standards and pronouncements in order to maintain their accounting records in accordance with GAAP. Please refer to data filing requirement II-D-12 that outlines the accounting changes that have occurred since our last rate case filing.

## Q. Are you responsible for the budget process for the Future Test Year and the Fully Projected Future Test Year?

A. Yes. In coordination with the Financial Planning \& Analysis (FP\&A) and Business Valuation Department, the Finance department accumulates all of the budget data from various sources each year to prepare a full income statement, balance sheet and cash flow budget for the Company for the year. The Company prepares a five year budget during its annual budgeting process.

## Q. Please describe the Company's budget process.

A. Each year there is an annual planning process that begins in June. The budget process requires active participation at many levels throughout the organization. Retail sales of electricity are budgeted by our FP\&A and Business Analysis and Valuation Department, while other revenues such as pole and duct attachment and rental of electric property are budgeted by our operations group. Operations and maintenance expenses are budgeted by individual cost center managers within the Company. Our Human Resources Department provides input on employee levels, salary increase projections and fringe benefit costs. The Tax Department assists in the budgeting of taxes other than income taxes, as well as income tax expense. Asset Accounting prepares the budget for depreciation and amortization expense, as well as AFUDC, based in part on information received from the Operations Group for expected capital expenditures. Our Treasury Department assists by preparing financing plans, budgeting the interest expense we expect to incur and calculating the amortization of debt discounts and premiums. The information necessary for the budget is summarized by the Financial Planning \& Analysis Department in cost element detail, which shows total labor, fringes, outside services
and other cost elements. See Exhibit JAB-2 to my testimony, which describes the cost elements the Company uses to prepare its budget, and Exhibit JAB-3 for a listing of the individual cost centers within Duquesne Light.

## Q. Does the Company typically prepare its budget by FERC account?

A. No, we typically prepare the budget for Duquesne Light by cost element detail as this level of detail enhances the review by our cost center managers and assists them in estimating their expenses for budgeting purposes. To satisfy the requirements for this rate filing, our cost element budget was allocated to FERC accounts. Certain cost element budget amounts could be specifically assigned to certain FERC accounts as they are easily identifiable to those accounts. For other cost element budget amounts, an allocation to FERC accounts was performed based on the same percentage to the total as the actual costs for fiscal year 2020 operating and maintenance expenditures, which were reported by both cost element and FERC account. Once this allocation was performed, the results were reviewed to ensure they appeared reasonable and adjustments were made as necessary to reflect expected variances. This process is more fully described in the testimony of Mr . Robert O'Brien (DLC Statement No. 10).
Q. Has the ope rating budget historically provided a reas onable estimate of actual expenditures?
A. Yes, over the past three years the total operations and maintenance budget has reasonably approximated the actual costs incurred.

## Q. How was the budgeted retail sales derived?

A. Mr. Mobley prepares a detailed budget for retail sales based on an extensive econometric analysis. Please see his testimony in DLC Statement No. 3 for details regarding this budget process.

## Q. How were the other operating revenues budgeted?

A. Other operating revenues may be divided into two categories, operationallyoriented and miscellaneous. Our Operations Group provides the budgeted amounts for operationally-oriented revenues such as pole and duct attachment, rental of electric property, miscellaneous transmission charges and other miscellaneous operationally-oriented revenue. The miscellaneous categories are determined based on historical trends adjusted for known changes or initiatives being undertaken. These amounts include late payment charges, returned check fees and reconnect fees.

## Q. How do cost center managers prepare their budgets for operations and maintenance expenses?

A. Cost center managers across the Company are provided with budgeting instructions and a budget template to fill out and submit to the Company's Senior Manager of Financial Planning \& Analysis, who reports to me. This template identifies and requires cost center managers to budget using cost elements that the Company uses to develop, track and report on its budget. Cost center managers use their
knowledge of the employee salary costs in their cost center and guidance provided in the budgeting directions on employee levels and management salary increases to determine the budgeted wages. Throughout the year, these cost center managers receive monthly reports that compare their actual spending to budgeted expenses. Cost center managers are required to explain any significant deviations from budget as they occur throughout the year. This reporting and the related accountability helps managers to improve each successive year's budget and more accurately quantify the various costs that they expect to incur during the coming year, such as outside consultants, materials and supplies and others.

## Q. Do these cost center managers budget for costs that are expected to be capitalize $d$, as well as expensed? <br> A. Yes they do. The Operations Group and other groups that spend capital dollars are provided with budget templates including all of the cost elements that are budgeted for capital. They use their understanding of the capital projects that have been planned for the next several years, as well as projections of the operating costs that they incur on an annual basis, to accurately project the capital spending for their cost center. During the year, these cost center managers receive monthly reports of the actual capital work they have performed to help them manage their costs and plan their work activities in a manner consistent with their budget.

Q. Do the budge ted employee levels for the Company include an assumed level of open positions at any given time?
A. Yes, the Company incorporates into its budget a "vacancy reserve" of 100 people to prevent ongoing, normal transitional openings from inflating our salary and wage expense. We anticipate that we will always have a level of open positions equal to our vacancy reserve unfilled but believe that vacant positions beyond those reflected in this reserve will be filled by the end of the fully projected future test year.

## Q. How do you budget for depreciation expense?

A. Our Asset Accounting Department prepares the budget for depreciation and amortization expense based on current property, plant and equipment accounts and projected capital expenditures and retirements, including estimated in-service dates, for the coming year.

## Q. How are income taxes and taxes other than income taxes budgeted?

A. Our Tax Department performs calculations to project income taxes and each type of taxes other than income taxes for budgeting purposes. Budgeted pre-tax book income is used to project income taxes based on statutory tax rates. The process of budgeting taxes other than income differs based on the type of tax. Gross receipts tax is based on estimated taxable revenues multiplied by the expected tax rate, projected to be 59 mills in 2021 and 2022. The Public Utility Realty Tax ("PURTA") and other real estate taxes are budgeted based on the amounts paid in the prior year, adjusted for any major additions or sales of real estate property. Payroll taxes are budgeted based on the expected tax rates applied against the estimated payroll costs to be incurred. Miscellaneous taxes are budgeted based on the expected amounts expected to be incurred for items such as sales and use tax audits.
Q. Please describe how interest expense and the amortization of debt discounts are calculated for the budget.
A. Our Treasury Department calculates the interest costs by multiplying the outstanding debt balances by the applicable interest and dividend rates. Annual amortization expense is determined by dividing the original unamortized balance of costs and premiums by the original life of the debt issuance. New financings are modeled into the budget when capital requirements exceed cash sources. The expected costs for these new financings, such as the expected interest rates and costs to be incurred are provided by outside financial institutions.

## Q. Please provide a general description of the process used by the Company to determine its distribution revenue requirement.

A. The Company first developed the 2021 and 2022 budgets for construction expenditures, operating revenues, operating expenses and other elements. Next, each of the budget elements were analyzed to determine where pro forma adjustments would be required to reflect the Future Test Year or Fully Projected Future Test Year under normalized conditions. The pro forma results for the Future Test Year and the Fully Projected Future Test year were used to prepare a
jurisdictional separation to show the distribution plant, revenue and expenses for the Company's Pennsylvania jurisdiction only.

## Q. Can you provide more detail on the overall process you described?

A. Yes, I can. I will use the operating budget as the example, but each of the measures of value, revenue and expense elements were determined following the same basic procedures. I was responsible for the development of the overall Duquesne Light budget for the Fully Projected Future Test Year. With regard to the operating expenses, Mr. Robert O'Brien (Statement No. 10) converted the Company's fully projected future test year budget from the cost element format that we use, to a FERC format, which is presented on DLC Exhibit 2, Schedule B-4 and included on DLC Exhibit 2, Schedule D-2. Mr. Robert O'Brien, working with myself and other Company personnel, developed pro forma adjustments to the budget expenses by cost element, as shown on DLC Exhibit 2, Schedules D-7 through D-16. Each of these adjustments was distributed to the appropriate FERC account as shown on DLC Exhibit 2, Schedule D-3. These processes provided a total Duquesne Light pro forma level of expenses by FERC accounts for the fully projected future test year ending December 31, 2019. Mr. Howard Gorman (Statement No. 15) then used these pro forma expenses in preparation of his Jurisdictional Separation Study, which is summarized on DLC Exhibit 2, Schedules C-1 and D-1.
Q. Was this process followed for each of the elements included in the Company's revenue requirement presentation?
A. Yes it was. For example, Mr. Robert O'Brien used the Company's budget for construction expenditures, construction closed to plant, plant retirements, depreciation expense, and other measures of value components as a starting point for pro forma adjustments. The resulting total Company pro forma measures of value was used by Mr. Howard Gorman in his Jurisdictional Separation Study to determine the amounts for the Pennsylvania jurisdiction. A comparison of the total Company and Pennsylvania jurisdictional pro forma measure of value amounts is shown on DLC Exhibit 2, Schedule D-1, page 3. In addition, Mr. Robert O’Brien used the Company's budget calculation for depreciation expense and made pro forma adjustments to reflect the use of the year-end plant in service for the Fully Projected Future Test Year ending December 31, 2022, using the depreciation rates recommended by Mr. John Spanos (Statement No. 11) and pro forma plant additions to determine the total pro forma depreciation expense for the total Company. Mr. Howard Gorman used this data to determine the portion assigned to the Pennsylvania jurisdiction on a pro forma basis for the test year.

## Q. Do you have an administrative services agreement that allows Duquesne Light employees to provide services to affiliates? <br> A. Yes, Duquesne Light has an administrative services agreement in place with its affiliates. This agreement has been filed with the Commission, and is updated periodically as necessary. This agreement is explained and included as part of the response to data filing requirement II-D-8.

## Q. Do you consider work that Duquesne Light employees may be doing for affiliates in the budgeting process?

A. Yes, cost center managers provide information in the budgeting process regarding any work that their department is doing for any affiliate company. In addition, the Company maintains an electronic time recording system ("E-Time") for recording and allocating employees' time between various affiliates and projects. Employee costs are budgeted using actual historical allocation data from E-Time, adjusted for information received from cost center managers about changing circumstances or project assignments. A projected allocation of all employees' costs between the Company and its affiliates is prepared in this manner. The cost charged to any affiliate includes the employee's salary and related benefits, as well as proportionate rent and supply costs. A total of all of the allocation amounts is calculated and is included in the budget process as a reduction in Duquesne Light's expense, which we refer to as subsidiary reimbursements.
Q. Does Duquesne Light share office space with its affiliates, and are the affiliates charged for this space?
A. Affiliates of Duquesne Light do not lease office space in the same building as the Company, and those affiliates have separate lease agreements with the building owner for the space they utilize.
Q. Please provide a summary of ring fencing measures that are in place at Duquesne Light in order to provide a separation between Duques ne Light's regulated operations and those of its parent and other nonregulated affiliates.
A. Duquesne Light and its parent, Duquesne Light Holdings ("DQE Holdings"), maintain policies and practices which provide effective segregation (ring fencing) between the activities of the Company and those of its parent and nonregulated affiliates. In addition, various external agencies and regulatory bodies have placed restrictions on the Company that provide additional assurance that effective separation has been achieved. The Company is a separate legal entity from DQE Holdings, maintains stand-alone financial statements, receives its own credit rating from Standard \& Poor's and Moody's and is able to independently raise capital via external markets.

Other ring fencing measures include:

- The Company's Articles of Incorporation limit it from declaring or paying dividends on any shares of capital stock ranking junior to Duquesne Light's Preferred Stock if the Common Stock equity of Duquesne Light is less than $25 \%$ of total capitalization.
- DQE Holdings LLC, the ultimate parent company, has appointed a locally based, independent director to its Board of Directors in order to ensure that our organization models best practices in corporate governance and that corporate decisions reflect the interests of our local community.
- The Company does not participate in its Parent's cash concentration system (cash pool) with DQE Holdings or other affiliates that are not regulated by the

Commission. As a result, nonregulated entities cannot use the Company's surplus cash for their operations.

## Q. In conjunction with other Commission approved settlement agreements, has the Company agreed to ring fencing measures?

A. Yes. The Company has agreed to the following ring fencing measures:

- Duquesne Light shall not guarantee the debt or credit instruments of its parent or any affiliate not regulated by the Commission, except as approved by the Commission upon a determination that such guarantee provides net benefits to customers.
- Duquesne Light shall not grant a mortgage or other lien on any property used and useful by Duquesne Light in providing retail utility service to the public subject to the Commission's jurisdiction, except for the financing needs of Duquesne Light.
- Duquesne Light shall not make any loan or otherwise extend credit to its parent or any affiliate not regulated by the Commission for a term of one year or more, except as approved by the Commission upon a determination that such loan or credit extension provides net benefits to customers.
- DQE Holdings will not permit a change in ownership among the members of DQE Holdings without prior Commission approval if such change would result in a change in control under the then-applicable Commission standards.
- Duquesne Light will seek Commission approval of all new or amended agreements with affiliates consistent with Chapter 21 of the Public Utility Code.
- Duquesne Light shall continue to have outstanding separately issued debt held by investors not affiliated with Duquesne Light or its affiliates, unless the Commission authorizes to the contrary.
- Duquesne Light's long-term debt ratio as a percentage of total capitalization shall not exceed 60\%, absent approval from the Commission.
- Duquesne Light shall notify the Commission of its intention to declare a special cash dividend to DQE Holdings, at least 30 days before declaring the divide nd.
- The Chief Executive Officer ("CEO") of DQE Holdings will be a member of DQE Holdings Board of Directors (Board), and will also chair a management committee, which will contain representatives of both the senior management team and the ownership consortium.
- DQE Holdings shall maintain, and cause its subsidiaries including Duquesne Light to maintain, separate books and financial records.
- DQE Holdings will maintain corporate organizational and financial policies sufficient to permit Duquesne Light to continue to meet requirements to maintain its own credit ratings, separate from its parent.
- DQE Holdings and its subsidiaries shall remain organized in a manner that provides corporate separation of regulated and non-regulated activities.


## Q. How do you budget for fringe benefits provided to employees?

A. This process varies, depending on the type of fringe benefits. However, common benefit programs are provided to employees of Duquesne Light and its affiliates. Therefore, the initial step is determining the total cost expected to be incurred. The

Human Resources department reviews each of the health coverage plan costs for the current year and then the budget is developed taking into consideration the present number of eligible employees, projected changes in the numbers of eligible employees, anticipated changes in employee contribution levels and estimated cost increases. Once the total cost has been established, the percentage of that total cost that is applicable to Duquesne Light employees and affiliate employees is determined on a pro-rated basis. The respective cost allocable to each company is then charged to the appropriate company.
Q. Do you allocate the cost of fringe benefits to both capital jobs and expense?
A. Yes we do. This allocation is calculated based on the total amount of budgeted labor costs to be incurred from the annual budgeting process. Based on past experience and their knowledge of planned capital projects, cost center managers separately budget the amount of labor that will be charged to expense or to capital. The result is used to allocate the benefit costs so that the benefit costs are allocate d between expense and capital in a manner that is proportionate to the related labor costs.
Q. Please briefly describe the process used to calculate the pro forma jurisdictional measure of value, net operating income and required revenue increase for the Pennsylvania jurisdiction.
A. The process began with the Company's 2021 and 2022 calendar year budgets by cost elements, which are determined by total Company requirements and can be
compared to budget and recorded amounts from prior years. The budgeted cost elements were then distributed to FERC accounts where necessary. Pro forma adjustments were made to the Company's budget amounts that allow for easy comparison for each adjustment. Finally, the total pro forma amounts were separated to the Pennsylvania jurisdictional level in the aggregate as opposed to making this calculation for each budget element and each pro forma adjustment.
Q. Please describe how the Company's request for an increase in its electric distribution rates is supported by your data.
A. The requested increase is supported by the Company's budgeted financial data. In Schedule C-1 and D-1 of DLC Exhibit 2, we summarize the revenues, expenses, rate base, and deficiencies in revenue for the Fully Projected Future Test Year. Duquesne Light is requesting an overall rate increase for the total Pennsylvania Jurisdiction of $\$ 85.8$ million, exclusive of DSIC roll-in. Duquesne Light's capital structure is shown in DLC Exhibit 2, Schedule B-8, with the requested return on equity of $10.95 \%$ reflected on DLC Exhibit 2, Schedule B-9.
Q. Are you aware of the requirement that a comparison of actual to budget data is to be supplied quarterly when you utilize a Future Test Year?
A. Yes, Exhibit JAB-4 has been provided showing a breakdown of revenues and expenses for the Future Test Year and Fully Projected Future Test Year. We will provide quarterly comparisons of actual results to the budget numbers presented as the actual data for each quarter becomes available. In addition, the Company will
provide, as directed by the Commission, data evidencing the accuracy of estimates contained in its Fully Projected Future Test Year.
Q. Did the Company pre pare a sche dule comparing its actual expenses for the twelve months ended December 31, 2019 to its projections in the last rate case proceeding?
A. Yes, please see Exhibit JAB-5. As recognized in the previous rate case settlement agreement, the agreement was deemed to be a black box settlement which represents a compromise of the Parties' positions on various issues.
Q. Did Duquesne Light prepare a comparison of its rate base additions for the twelve months ended December 31, 2019 to its projections in the 2018 rate case?
A. Yes, please see Exhibit JAB-6 for this comparison.
Q. Have you made any adjustments in your Future Test Year or Fully Projected Future Test Year to account for known and measurable changes?
A. Yes, we have. Mr. Robert O'Brien is sponsoring all the adjustments that are known and measurable, and his testimony (Statement No. 10) will address those items specifically.
Q. Was the Company impacted by the effects of the novel coronavirus (COVID19) during the year ended December 31, 2020?
A. Yes.
Q. Did the Company incur incremental uncollectible expenses (as defined in the Commission's May 13, 2020 Secretarial Letter at Docket No. M-20203019775)?
A. Yes. The Company experienced increased levels of customer delinquencies in the year ended December 31, 2020 and thus far into 2021. These delinquent amounts resulted in an increase (above uncollectible expense claimed in its last base rates case of $\$ 10,471,000$ ) of $\$ 4,186,575$, which was recorded as a regulatory asset at December 31, 2020. The amount of the regulatory asset has grown to $\$ 5.3$ million through March 2021 due to the continuation of the moratorium on terminations for nonpayment.
Q. How were the uncollectable expenses included within the Company's current rates and the incremental costs above that calculated?
A. The Company used its uncontested projection of uncollectible expense in its prior rate proceeding, $\$ 10,471,000$, as its baseline for calculating incremental amounts attributable to the COVID-19 pandemic and associated Commission actions.
Q. How does the Company plan to recover these incremental uncollectible expenses?
A. The Company has included an adjustment to normalize the associated incremental uncollectible expenses over a three year period as described in Mr. Robert

O'Brien's testimony (Statement No. 10). The Company also proposes to continue to record incremental uncollectible costs above what is included in this rate proceeding as a regulatory asset to be recovered in future rate proceedings.
Q. Why is the Company requesting a three-year recovery period?
A. Three years was selected as the most appropriate average because it is consistent with the typical and anticipated timing between distribution rate cases.
Q. Has the Company incurred other extraordinary, nonrecurring incremental COVID-19 related expenses (as defined in the Commission's May 13, 2020 Secretarial Letter at Docket No. M-2020-3019775) outside of incremental uncollectible expenses?
A. Yes. In accordance with the Secretarial Letter, the Company has tracked and maintained records of other extraordinary, nonrecurring incremental COVID-19 related costs net of savings associated with the pandemic. These costs primarily include waived late payment charges and waived reconnect fees, outside services and materials. Savings primarily include employee expenses associated with training costs and other employee events. These costs totaled approximately $\$ 4.2$ million, net of related savings, through December 31, 2020.
Q. How does the Company plan to recover these other extraordinary, nonrecurring incremental COVID-19 related costs net of savings?
A. The Company has included an adjustment to normalize the associated other extraordinary, nonrecurring incremental COVID-19 related costs net of savings over a three year period as described in Mr. Robert O'Brien's testimony (Statement No. 10). The Company also proposes to continue to record incremental costs above what is included in this rate proceeding as a regulatory asset to be recovered in future rate proceedings.
Q. Why is the Company requesting a three-year recovery period?
A. Three years was selected as the most appropriate average because it is consistent with the typical and anticipated timing between distribution rate cases.
Q. Is the re a specific provision that should be included in the Commission's final order related to the recovery of these other extraordinary, nonrecurring incremental COVID-19 related costs net of savings?
A. Yes. The Company proposes the following: "The Company shall be permitted to recover prudently incurred other extraordinary, nonrecurring incremental COVID19 related costs net of savings included in this rate proceeding (commencing from March 2020) and shall be able to defer future other extraordinary, nonrecurring incremental COVID-19 related costs net of savings as a regulatory asset to be recovered in future rate proceedings."
Q. Does the Company plan to recover deferred costs of required Eligible Customer Listing solicitations in this rate filing?
A. Yes, pursuant to the Commission's order (Docket No. M-2010-2183412), the Company was granted permission to recover the costs associated with its require d triennial eligible customer listing solicitations through its next base rate case proceeding. As of December 31, 2020, the Company maintains a regulatory asset of approximately $\$ 0.3$ million, associated with the Company's 2018 triennial solicitation, for which recovery is being requested.
Q. How does the Company plan to recover these deferred costs?
A. As the costs associated with the Commission required solicitations is on-going, the Company has included an adjustment to normalize the associated costs over a three year period as described in Mr. Robert O'Brien's testimony (Statement No. 10).
Q. Why are you using a three year period for the normalization of the costs associated with Eligible Customer Listing solicitations?
A. Three years is consistent with the triennial solicitation requirement as established by the Commission.
Q. Does the Company plan to recoverdefe rred costs of Electric Vehicle programs in this rate filing?
A. Yes. The Company maintains a regulatory asset of approximately $\$ 0.4$ million, for which recovery is being requested.
Q. How does the Company plan to recover these deferred costs?
A. The Company has included an adjustment to normalize the associated costs over a three year period as described in Mr. Robert O'Brien's testimony (Statement No. 10).
Q. Why are you using a three year period for the normalization of the costs associated with Electric Vehicle programs?
A. Three years was selected as the most appropriate average because it is consistent with the typical and anticipated timing between distribution rate cases.

## Q. What types of benefits do you provide to Duquesne Light employees?

A. Benefits for 2020 include medical and dental coverage, flexible spending accounts, life insurance, pet insurance, accident insurance, business travel insurance, disability benefits, an employee assistance program and tuition reimbursement. In addition, we maintain a retirement plan ("Plan") to provide pensions for eligible full-time employees. The Plan is closed to new participants. Upon retirement, an eligible employee receives a monthly pension based on his or her length of service and compensation. The cost of funding the pension plans is determined by the unit credit actuarial cost method. Our policy is to budget using the actuarially determined net periodic pension cost calculated by our actuaries under the provisions of Accounting Standards Codification 715 ("ASC 715"). All employees can also participate in the Company's defined contribution retirement plan; however, employees not eligible to participate in the pension plan receive expanded levels of Company matching funds in lieu of pension benefits.
Q. Is the Company self-insured for any employee benefits, and if so, how is the budget for those benefits estimated?
A. Yes, Duquesne Light is self-insured for its employee medical coverage, which is under national Preferred Provider Organizations ("PPO") arrangements. The budget estimates are developed based on the previous year's claim costs with adjustments for anticipated changes in the number of eligible employees, employee contribution levels and cost increases based on healthcare industry outlook. Duquesne Light does maintain stop-loss insurance coverage to cover individual claims that are over $\$ 300,000$ per incident.
Q. How has Duquesne Light tried to minimize healthcare coverage costs?
A. Over the past several years, Duquesne Light has taken various steps to mitigate the high cost of healthcare, such as promoting employee wellness programs, performing dependent eligibility audits, increasing employee contribution levels, negotiating reductions in administrative fees and reviewing opportunities to enter healthcare exchanges.
Q. What is the current funded status of Duquesne Light's pension plan?
A. The Plan's funded status on a GAAP basis (the basis utilized for financial reporting purposes) as of December 31, 2020 is a deficit of approximately $\$ 69.5$ million.
Q. What is the expected funded status at December 31 over the next six years?
A. Please see the chart below:

Expected Funded Status (in millions)

|  | $\underline{2021}$ | $\underline{2022}$ | $\underline{2023}$ | $\underline{2024}$ | $\underline{2025}$ | $\underline{2026}$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Funded Status | $\underline{\$(72.0)}$ | $\underline{\$(68.7)}$ | $\underline{\$(65.1)}$ | $\underline{\$(61.3)}$ | $\underline{\$(57.3)}$ | $\underline{\$(53.1)}$ |

## Q. How does Duquesne Light determine its level of pension cash contributions?

A. Duquesne Light's contributions to its pension plan are typically the larger of either the minimum amount required under the Pension Protection Act of 2006 ("PPA") or the amount required to fulfill regulatory commitments. However, in the event that a PPA determined minimum amount is zero, the Company also reviews the opportunity to make voluntary pension contributions in order to offset service costs as to not degrade the pension plan's funded status and to continue to foster the Company's de-risking strategies.
Q. What are Duquesne Light's projected pension contributions for the next 6 years?
A. Please see the below table for the Company's projected contributions (in millions).

| $\underline{2021}$ | $\underline{2022}$ | $\underline{2023}$ | $\underline{2024}$ | $\underline{2025}$ | $\underline{2026}$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
| $\$ 10.0$ | $\$ 10.0$ | $\$ 10.0$ | $\$ 10.0$ | $\$ 10.0$ | $\$ 10.0$ |

Q. Do these projected contributions re present PPA minimum funding requirements?
A. No. Based on currently projected pension plan funding levels, the Company is not required to make any minimum pension plan contributions until 2025.

Projected pension plan contributions for inclusion in this rate filing represent voluntary pension contributions in order to offset service costs as to not degrade the pension plan's funded status and to continue to foster the Company's derisking strategies.
Q. How have accounting changes affected the Company's pension plan?
A. The Company's accounting changes to its pension plan are described in data filing requirement II-D-12.
Q. What level of pension funding is the Company requesting in this case?
A. Consistent with its 2013 distribution rate case settlement agreement, the Company has incorporated a three year (2022-2024) average into its ratemaking calculations for the portion of contributions that will be recovered as an expense for ratemaking purposes. Mr. Robert O'Brien (Statement No. 10) explains this calculation in his testimony.
Q. Why is the Company requesting a three-year projected average for pension funding and not a six-ye ar average?
A. Three years was selected as the most appropriate average because it is consistent with the typical and anticipated timing between distribution rate cases.
Q. How is Duquesne Light's pension plan managed?
A. Duquesne Light's Board of Directors periodically reviews the Plan's ongoing performance and approves any changes to the Plan's allocation targets between investment categories to ensure the portfolio is properly diversified. Plan performance is evaluated by reviewing the performance of individual money managers against established benchmarks. The Board delegates responsibility for implementing the approved allocation to a group of executives that compose the Pension Investment Committee. This Committee meets on a regular basis to review investment performance, interview managers of funds in which the Plan is invested and make the day to day decisions involved in managing the pension plan's investment portfolio. The Committee utilizes an outside investment advisory firm, LCG Associates, Inc., to provide technical analysis and administrative support in its work. Please refer to the testimony of Mr. James H. Milligan (DLC Statement No. 14) for additional information on the Pension Investment Committee.

## Q. What steps has Duquesne Light taken to minimize pension costs?

A. In 2007, the Company amended the Plan such that non-represented employees hired after June 1, 2007 would not be eligible to participate in the Company's defined benefit pension plan. In 2010, the Company amended the Plan such that represented employees hired on or after October 1, 2010 would not be eligible to participate in the Company's pension plan. These two amendments effectively closed the plan to new participants. Employees hired after these dates receive expanded levels of Company matching under the Company's defined contribution retirement fund in lieu of pension benefits.
Q. Is the Company taking steps to reduce the investment risk associated with its pension trust?
A. Yes, we are. The Company is implementing a Liability Driven Investing ("LDI") strategy to mitigate the volatility associated with pension plan funding. LDI is an investment strategy that focuses on managing pension assets in relation to pension liabilities. The overall goal of LDI is to minimize the volatility of Plan funded status, and thus contribution volatility, by investing in long duration fixed income strategies that attempt to better match the duration of the Plan's liabilities. Please refer to the testimony of Mr. James Milligan (Statement No. 14) for further discussion of the Company's LDI strategy.
Q. Why is it appropriate to take these steps?
A. Reduced volatility in the pension plan funded status and pension plan funding will provide greater predictability to the Company's cash management and capital planning and ultimately provide for more stable rates for customers.
Q. Has Duquesne Light made the pension contributions under the terms of its 2018 Distribution Rate Case Settlement?
A. Yes. The Company is required by its 2018 distribution rate case settlement to fund the pension trust in an amount equal to $\$ 10.0$ million per year; provided, however, contributions in any year in excess of the foregoing may be used on a cumulative basis to satisfy future contribution obligations. The rate case settlement further
concludes that should a pension contribution less than $\$ 10.0$ million to the pension trust be appropriate, the Company may reduce the pension contribution and record a regulatory liability on its books that is equal to $50 \%$ of the reduction to the pension contribution below the level of $\$ 10.0$ million. If a regulatory liability remains at the time of the Company's next rate proceeding, the amount will be refunded to rate payers as part of the next rate case proceeding. The Company made pension contributions totaling $\$ 30.0$ million in the years 2018 through 2020. The Company plans to make pension contributions of $\$ 10.0$ million in 2021. This represents an average annual pension contribution of $\$ 10.0$ million over the last three years and therefore the Company will have no outstanding regulatory liability balance owed to rate payers as the end of the Future Test Year.
Q. What pension plan contribution commitment is the Company making with regard to its claim?
A. The Company commits to making pension contributions based on the three-year average (2022-2024) on a cumulative basis.
Q. Is the Company claiming the actuarially determine d net periodic pension cost for pensions in this rate proceeding?
A. No, we are not. Consistent with our 2006, 2010, 2013 and 2018 distribution rate cases, we are requesting recovery of the expense component of the annual contributions that we plan to make to the pension plan. These contributions reflect voluntary pension contributions in order to offset service costs as to not degrade
the pension plan's funded status and to continue to foster the Company's de-risking strategies. Therefore the expense claim for pensions in this proceeding is based on projected pension plan voluntary contributions. The criteria used to determine these contributions are different from the criteria required to be used to determine pension costs under ASC 715.
Q. Please explain the proposed future accounting treatment with regard to pensions.
A. The Company is required to accrue an amount for pension costs each year determined in accordance with ASC 715. While the procedures used to determine the annual ASC 715 expense will ultimately equal the total contributions over the duration of the plan, the annual accrual will differ from the pension contribution on a year-to-year basis. For this reason, the Company requests that the Commission authorize the Company to continue to record annually the difference between the pension reimbursement received in rates and the ASC 715 pension expense as either a regulatory asset or liability. These amounts will then be reversed over time in the future. The Company records ASC 715 capitalized pension amounts as part of the previously discussed employee benefit allocation. Please refer to Mr. Robert O'Brien's testimony for further discussion the Company's capitalized pension amounts.

## Q. Is the re a specific provision that should be included in the Commission's final order related to pensions?

A. Yes, the provision is as follows:
"Continuing in calendar year 2022, Duquesne Light will deposit into its pension trusts an amount equal to $\$ 10,000,000$ per year; provided, however, that contribution(s) in any year in excess of the foregoing may be used on a cumulative basis to satisfy future contribution obligations. The provision provides for recovery of the expense component of $\$ 5,000,000$ ( $50 \%$ of the average cash contributions) of projected future pension contributions. Additionally, Duquesne Light will be permitted to include the other $50 \%$ of actual pension contributions from January 1, 2007, forward, net of related accumulated deferred income taxes, in rate base for rate making purposes. The rate base adjustment for pensions shall be the amount necessary to adjust the ASC 715 capitalized pension amounts to equal accumulated capitalized pension contributions, net of applicable deferred income taxes, from January 1, 2007 forward. The depreciation expense for book and ratemaking purposes will be based on the ASC 715 capitalized amounts. The adjusted amounts will be used for reporting rate base in reports to the Commission."

## Q. What other postre tirement benefits ("OPEBs") does Duquesne Light provide to its employees?

A. In addition to pension benefits, the Company provides certain healthcare benefits and life insurance for retired employees hired before October 1, 2010. The retiree life insurance plan is non-contributory. Retirees participating in the health care plan do make contributions, which have increased as part of our efforts to control costs. Health care benefits terminate when a retiree reaches age 65 . We currently
account for and fund OPEBs through a Voluntary Employees Beneficiary Associated (VEBA) trust, into which we deposit the full amount of annual costs calculated by our actuary pursuant to ASC 715. Retiree OPEBs and administrative costs of maintaining the trusts and/or accounts are paid from the amounts deposited in the trust. The Company accrues the actuarially determined costs of the aforementioned postretirement benefits over the period from the date of hire until the date the employee becomes fully eligible for benefits.
Q. How have accounting changes impacted the Company's postretirement benefits?
A. The Company's accounting changes to its postretirement benefits are described in data filing requirement II-D-12.
Q. Are you claiming the actuarially determined net periodic cost for postretirement benefits in this rate proceeding?
A. Yes we are. The Company has incorporated a two year average into its ratemaking calculations for the portion of actuarially determined net periodic cost for postretirement benefits that will be recovered as an expense for ratemaking purposes. Two years was selected to be consistent with the treatment in its last distribution rate case settlement.
Q. Is Duquesne Light requesting that the difference between the rate allowance and the annual OPEB expense accrual be deferred as a regulatory asset or liability?
A. Yes. Any difference between the annual book accrual and the ratemaking allowance will be deferred and amortized over a reasonable period as an increase or decrease to the rate allowance for OPEBs in the next rate proceeding. This procedure is consistent with the Commission's requirement that the rate allowance be placed in the trust without regard to the actual annual accrual. As of December 31, 2020, the Company had recorded a regulatory liability of approximately $\$ 2.0$ million related to OPEBs. The Company has amortized this amount over a three year period in its ratemaking calculations. As explained in Mr. Robert O'Brien's testimony (Statement No. 10), three year period was selected as it is consistent with the typical and anticipated timing between distribution rate cases.

## Q. Is there specific language that should be included in the Commission's final order on the subject of OPEBs?

A. Yes, Duquesne asks for the same treatment as its last distribution case when the following provision was adopted:
"The Company accounts for and funds OPEBs through a Voluntary Employees Beneficiary Associated (VEBA) trust, into which it will deposit the full amount of annual costs calculated by the Company's actuary pursuant to ASC 715. Retiree OPEBs and administrative costs of maintaining the trusts and/or accounts are paid from amounts deposited in the trust. The Company accounts for the difference
between the net periodic postretirement benefit expense determined annually by the actuary in accordance with ASC 715 and the amount of ASC 715 postretirement benefit expense used to establish rates. That difference is recorded as a regulatory asset or liability and will be expensed or credited in future base rate proceedings in determining OPEB expense included in rates."

## Q. Does this conclude your direct testimony?

A. Yes, it does. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

| CITATION | DESCRIPTION |
| :---: | :---: |
| 53.53 I | GENERAL FILING INFORMATION |
| 53.53 I A | Summary of Filing |
| 53.53-A-3 | Summary Tables |
| 53.53-A-4 | Generation Plant additions |
| 53.53 I B | General Description of Operations |
| 53.53-B-1 | Corporate History |
| 53.53-B-2 | Description of the property of utilities |
| 53.53-B-2a | Schedule of generating capability |
| 53.53-B-2b | Generation outages |
| 53.53-B-2c | Generation retirements |
| 53.53-B-2d | Projected generation additions and retirements |
| 53.53 II | PRIMARY STATEMENTS OF RATE BASE \& OPERATING INCOME |
| 53.53 II A | Rate Base |
| 53.53-II-A-1 | Test Year rate base and rates of return - future |
| 53.53-II-A-2 | Test year rate base and rates of return - historic |
| 53.53-II-A-3 | Generation cost information |
| 53.53 II B | Rate Base Supporting Schedules |
| 53.53-II-B-1 | Plant held for Future Use |
| 53.53-II-B-2 | Construction Work In Progress |
| 53.53-II-B-3 | Claim for materials and supplies |
| 53.53-II-B-6 | Additional Items in Measure Of Value |
| 53.53 II C | Operating Income Statement |
| 53.53-II-C-1a | Budgeted Income Statement |
| 53.53-II-C-1c | Income Statement present rates after adjustments |
| 53.53-II-C-1d | Adjustment for revenue increase |
| 53.53-II-C-1e | Income Statement requested rates |
| 53.53-II-C-2 | Similar schedule historic test year |
| 53.53 II D | Income Statement Supporting Schedules |
| 53.53-II-D-1 | Schedule of revenues \& expenses for FTY \& HTY \& variance explanation |

# Exhibit JAB-1 

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| 53.53-II-D-2 | Summary of test year adjustments |
| :---: | :---: |
| 53.53-II-D-3 | Nonrecurring \& extraordinary items |
| 53.53-II-D-4 | Extraordinary property losses |
| 53.53-II-D-5 | Reserve for uncollectible |
| 53.53-II-D-6 | Claim for rate case expense |
| 53.53-II-D-7a | Miscellaneous general expenses |
| 53.53-II-D-7b | Outside service expenses |
| 53.53-II-D-7c | Regulatory commission expenses |
| 53.53-II-D-7d | Advertising expenses |
| 53.53-II-D-7e | Research and Development |
| 53.53-II-D-7f | Charitable and civic contributions |
| 53.53-II-D-8 | Affiliate charges for FTY and HTY |
| 53.53-II-D-9 | Social and Service organization memberships |
| 53.53-II-D-10a | Avg \&year-end \# of employees \& payroll \& benefit expense union |
| 53.53-II-D-10b | Avg \&year-end\# of employees \& payroll \& benefit expense -non-union |
| 53.53-II-D-10cc | Avg \&year-end\# of employees \& payroll \& benefit expense mgt |
| 53.53-II-D-10d | Wage rate, salary \& benefit changes |
| 53.53-II-D-10e | Claimed test year expense and employee benefit expense |
| 53.53-II-D-10f | Percentage of O\&M portion and basis |
| 53.53-II-D-11 | Leasing costs and method for calculating |
| 53.53-II-D-12 | Past \& anticipated accounting changes \& internal/external audit reports |
| 53.53-II-D-13 | Gross salvage, CR, net salvage for 4 previous years |
| 53.53-II-D-26 | Other items |
| 53.53 II E | Budgeted Data |
| 53.53-II-E-1 | Copies of budgets \& explanation of process |
| 53.53-II-E-2 | Budgets (operating \& capital) for 3 years |
| 53.53-III | RATE OF RETURN |


| 53.53-III-E | Parent - Subsidiary Relationship |
| :---: | :---: |
| 53.53-III-E-3 | Balance sheet and income statement consolidated/parent |
| 53.53-III-E-4 | Organizational chart |
| 53.53-III-F | General Financial Data |
| 53.53-III-F-1 | Quarterly and annual reports |
| 53.53-III-F-2 | Projected capital requirements and sources |
| 53.53-V | PLANT \& DEPRECIATION |
| 53.53-V-A | Adjusted original cost with accumulated depreciation |
| 53.53-V-A-1 | Schedule of plant in service by function |
| $53.53-\mathrm{V}-\mathrm{A}-3$ | Supporting schedules |
| $53.53-\mathrm{V}-\mathrm{A}-4$ | Schedule of rate case adjustments |
| 53.53-VI | UNADJUSTED BALANCE SHEETS AND INCOME STATEMENTS |
| 53.53-VI-a | Balance sheet - 3 years |
| 53.53-VI-b | Income Statement - 3 years |
| 53.53-VI-c | Plant in Service - 3 years |
| 53.53-VI-d | Accumulated depreciation - 3 years |

## Cost Elements

## Cost Element

## Description

Labor
Overtime Labor
Paid for Time Not Worked
Rent
Incentive Compensation
Stores Issues and Returns
Materials Purchased by Contractors
Materials Purchased
Utilities
Transportation
Telephone Services
Other Rent
Data Processing Leases
Insurance
Mobile Phone / Pager Costs
Regulatory Assessment \& Fees
Healthcare \& Misc. Benefits
Employee Expenses
Community Relations
Surcharge Revenue Offset
Pole Attachment Fees
Fiber Lease \& Sonet Network - DQE Comm
DataCom Service Fees
Outside Engineering Services
Consulting Services
Outside Services
Pension Costs
Transmission Expenses
Uncollectible Accounts
Deferred Cost
Reimbursements
Social Security \& Unemployment Taxes
Mailing Costs
Memberships / Dues
Business Meals
Subsidiary Reimbursements
Miscellaneous

## Organization <br> Office of CEO

## Cost Center Cost Center Name

001 Office of the CEO
$400 \quad$ Senior VP \& CFO
Customer Service
$019 \quad$ Chief Customer Officer
$030 \quad$ Credit \& Collections
032 Corporate Communications \& Citizenship
$310 \quad$ Universal Services Surcharge
480 Energy Efficiency \& Demand Reduction
483 Metering Systems
484 Street Lighting \& Unmetered Services
489 AMI Operations
$490 \quad$ Customer Contact Center
493 Customer Experience
495
496
498
499
553
847
General Counsel, Rate \& Regulatory Affairs
002 Risk Management
003
004
$005 \quad$ VP Office of General Counsel
006 Commercial
007 Compliance Services
010 Regulatory and Consumer Relations
$020 \quad$ Business Development
034 Litigation \& FERC
040 Governmental Affairs
050 Labor \& Employment
415 New Development Connections
$460 \quad$ Federal \& RTO Affairs
465 Supply Procurement \& Settlement
$470 \quad$ Rates \& Tariff Services
492 State Regulatory Affairs

## Organization Cost Center Cost Center Name

Human Resources

$300 \quad$ VP of Human Resources
301 Employee \& Labor Relations
302
303
500
512
513
571
573
Procurement \& Supply Chain
561
586
Information Technology
364
365
366
367
440
445
452
538
539
540
541
545
546
547
548
551
552
560
562
564
Office of CFO
Organizational Development \& Training
Diversity \& Inclusion
Talent Acquisition
HR Program \& Services
Other Benefits
Retirement Programs
Health \& Wellness
Supply Chain Management
Materials Management
Project Management Office
Business Solutions
Enterprise Architecture
Deployment \& Release Management
Solutions Consulting
Corporate Applications
Metering Applications
IT Network Services
IT Service Management
Office of the CIO
Quality Assurance
Computing Platforms
Network Services
Operations Systems
Customer Apps
Work, Asset \& Financial Management
Data and Integrations
Information Security
Governance, Risk \& Compliance
Identity \& Access Management
Innovation Center
Pension Benefits
Corporate Controller
Tax Reporting
Business Valuation \& Analysis
Accounting \& Financial Reporting
Accounts Payable \& Payroll FP\&A

| Organization | Cost Center | Cost Center Name |
| :---: | :---: | :---: |
|  | 437 | Workers Compensation |
|  | 438 | Treasury Operations |
|  | 476 | Affordability Office |
|  | 477 | Business Process \& Maturity |
|  | 478 | Business Analytics |
|  | 494 | Business Performance - SPARK |
| Operations |  |  |
|  | 311 | Health \& Safety |
|  | 351 | Workforce Development |
|  | 451 | ADMS |
|  | 502 | Vegetation Management |
|  | 503 | Project Management |
|  | 520 | Shops \& Testing |
|  | 530 | Property Services |
|  | 549 | Telecommunications |
|  | 565 | Real Estate and Rights of Way |
|  | 572 | Transportation Services |
|  | 705 | Environmental |
|  | 810 | Asset Management |
|  | 820 | Engineering |
|  | 821 | Third Party Attachments |
|  | 830 | Work Management \& Performance |
|  | 832 | Maint \& Services - Penn Hills |
|  | 833 | Maint \& Services - McKeesport |
|  | 838 | Maint \& Services - Raccoon |
|  | 839 | Maint \& Services - Edison |
|  | 840 | Operations Center |
|  | 845 | Maint \& Services - Preble |
|  | 848 | Security Services |
|  | 849 | Outage Coordination \& Field Ops |
|  | 850 | Transmission Planning |
|  | 852 | Substation - Raccoon |
|  | 853 | Substation - Preble Avenue |
|  | 855 | Underground |

Other

Subsidiary Reimbursements
RTO Settlements
Corporate Cost center AFUDC
Purchased Power

| DUQUESNE LIGHT COMPANY |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STATEMENT OF INCOME |  |  |  |  |  |  |  |  |  |  |
| Operating Budget |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | Total |
|  |  |  |  |  |  |  |  |  |  | 12 Mos. |
|  |  | 1st Qtr |  | 2nd Qtr |  | 3rd Qtr |  | 4th Qtr |  | 2/31/2021 |
| UTILITY OPERATING INCOME |  |  |  |  |  |  |  |  |  |  |
| Operating Revenues (400) | \$ | 230,447,275 | \$ | 228,498,991 | \$ | 278,947,920 | \$ | 237,776,693 | \$ | 975,670,880 |
|  |  |  |  |  |  |  |  |  |  |  |
| Operating Expenses |  |  |  |  |  |  |  |  |  |  |
| Operation Expenses (401) |  | 101,840,087 |  | 94,270,359 |  | 115,497,569 |  | 92,698,515 |  | 404,306,530 |
| Maintenance Expenses (402) |  | 12,093,528 |  | 11,194,621 |  | 13,715,356 |  | 11,007,965 |  | 48,011,470 |
| Depreciation Expense (403) |  | 50,348,046 |  | 50,905,500 |  | 51,780,423 |  | 52,821,031 |  | 205,855,000 |
| Amort. \& Depl. Of Utility Plant (404-405) |  | - |  | - |  | - |  | - |  | - |
| Regulatory Debits (Credits), net (407.3,407.4) |  | - |  | - |  | - |  | - |  | - |
| Taxes Other Than Income Taxes (408) |  | 15,131,591 |  | 14,406,191 |  | 17,568,881 |  | 14,744,337 |  | 61,851,000 |
| Income Taxes - Federal (409.1) |  | 7,249,837 |  | 7,467,507 |  | 11,554,742 |  | 8,251,322 |  | 34,523,408 |
| Income Taxes - Other (409.1) |  | 2,632,693 |  | 2,711,737 |  | 4,195,968 |  | 2,996,370 |  | 12,536,768 |
| Provision for Deferred Income Taxes, net (410.1,411.1) |  | $(498,215)$ |  | $(513,173)$ |  | $(794,052)$ |  | $(567,038)$ |  | $(2,372,478)$ |
| Investment Tax Credit, net (411.7) |  | - |  | - |  | - |  | - |  | - |
| Total Utility Operating Expenses |  | 188,797,567 |  | 180,442,741 |  | 213,518,888 |  | 181,952,502 |  | 764,711,698 |
| Net Utility Operating Income |  | 41,649,708 |  | 48,056,250 |  | 65,429,033 |  | 55,824,191 |  | 210,959,182 |
|  |  |  |  |  |  |  |  |  |  |  |
| OTHER INCOME AND DEDUCTIONS |  |  |  |  |  |  |  |  |  |  |
| Other Income |  |  |  |  |  |  |  |  |  |  |
| Equity in Earnings of Subsidiary Companies (418.1) |  | - |  | - |  | - |  | - |  | - |
| Interest and Dividend Income (419) |  | - |  | - |  | - |  | - |  | - |
| Allowance for Other Funds Used During Construction (419.1) |  | 867,548 |  | 1,261,799 |  | 1,661,856 |  | 1,832,969 |  | 5,624,172 |
| Miscellaneous Nonoperating Income (421) |  | - |  | - |  | - |  | - |  | - |
| Gain on Disposition of Property (421.1) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income |  | 867,548 |  | 1,261,799 |  | 1,661,856 |  | 1,832,969 |  | 5,624,172 |
|  |  |  |  |  |  |  |  |  |  |  |
| Other Income Deductions |  |  |  |  |  |  |  |  |  |  |
| Loss on Disposition of Property (421.2) |  | - |  | - |  | - |  | - |  | - |
| Donations (426.1) |  | 847,074 |  | 1,133,274 |  | 757,274 |  | 1,094,739 |  | 3,832,360 |
| Penalties (426.3) |  | - |  | - |  | - |  | - |  | - |
| Exp. for Certain Civic, Political, \& Related Activities (426.4) |  | - |  | - |  | - |  | - |  | - |
| Other Deductions (426.5) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income Deductions |  | 847,074 |  | 1,133,274 |  | 757,274 |  | 1,094,739 |  | 3,832,360 |
|  |  |  |  |  |  |  |  |  |  |  |
| Taxes Applicable to Other Income and Deductions |  |  |  |  |  |  |  |  |  |  |
| Income Taxes - Federal (409.2) |  | $(21,274)$ |  | $(21,912)$ |  | $(33,906)$ |  | $(24,212)$ |  | $(101,304)$ |
| Income Taxes - Other (409.2) |  | $(8,470)$ |  | $(8,724)$ |  | $(13,500)$ |  | $(9,640)$ |  | $(40,334)$ |
| Provision for Def. Inc. Taxes (410.2) |  | 237,113 |  | 244,232 |  | 377,909 |  | 269,868 |  | 1,129,122 |
| (Less) Provision for Def. Inc. Taxes (411.2) |  | $(98,663)$ |  | $(101,625)$ |  | $(157,249)$ |  | $(112,292)$ |  | $(469,830)$ |
| Total Taxes on Other Inc. and Ded. |  | 108,706 |  | 111,970 |  | 173,255 |  | 123,723 |  | 517,655 |
|  |  |  |  |  |  |  |  |  |  |  |
| Net Other Income and Deductions |  | $(88,232)$ |  | 16,555 |  | 731,327 |  | 614,508 |  | 1,274,158 |
|  |  |  |  |  |  |  |  |  |  |  |
| Interest Charges |  |  |  |  |  |  |  |  |  |  |
| Interest on Long-Term Debt (427) |  | 14,496,750 |  | 14,496,750 |  | 14,496,750 |  | 14,496,750 |  | 57,987,000 |
| Amortization of Debt Disc. and Expense (428) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Loss on Reaquired Debt (428.1) |  | 764,866 |  | 435,726 |  | 555,723 |  | 642,440 |  | 2,398,755 |
| Amortization of Premium on Debt - Credit (429) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Gain on Reacquired Debt - Credit (429.1) |  | - |  | - |  | - |  | - |  | - |
| Interest on Debt to Assoc. Companies (430) |  | 10,521 |  | 37,388 |  | 93,343 |  | 281,362 |  | 422,614 |
| Other Interest Expense (431) |  | 204,041 |  | 265,020 |  | 230,118 |  | 193,541 |  | 892,719 |
| Allowance for Borrowed Funds Used During Construction-Cr. (432) |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(1,689,332)$ |
| Net Interest Charges |  | 15,053,845 |  | 14,812,551 |  | 14,953,600 |  | 15,191,760 |  | 60,011,756 |
|  |  |  |  |  |  |  |  |  |  |  |
| Net Income | \$ | 26,507,631 | \$ | 33,260,254 | \$ | 51,206,759 | \$ | 41,246,939 | \$ | 152,221,584 |


| DUQUESNE LIGHT COMPANY |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STATEMENT OF INCOME |  |  |  |  |  |  |  |  |  |  |
| Operating Budget |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | Total |
|  |  |  |  |  |  |  |  |  |  | 12 Mos. |
|  |  | 1st Qtr |  | 2nd Qtr |  | 3rd Qtr |  | 4th Qtr |  | 2/31/2022 |
| UTILITY OPERATING INCOME |  |  |  |  |  |  |  |  |  |  |
| Operating Revenues (400) | \$ | 236,013,810 | \$ | 234,018,465 | \$ | 285,686,006 | \$ | 243,520,273 | \$ | 999,238,555 |
|  |  |  |  |  |  |  |  |  |  |  |
| Operating Expenses |  |  |  |  |  |  |  |  |  |  |
| Operation Expenses (401) |  | 107,554,438 |  | 99,559,965 |  | 121,978,256 |  | 97,899,924 |  | 426,992,584 |
| Maintenance Expenses (402) |  | 11,683,944 |  | 10,815,482 |  | 13,250,844 |  | 10,635,147 |  | 46,385,416 |
| Depreciation Expense (403) |  | 52,681,096 |  | 53,264,381 |  | 54,179,847 |  | 55,268,676 |  | 215,394,000 |
| Amort. \& Depl. Of Utility Plant (404-405) |  | - |  | - |  | - |  | - |  | - |
| Regulatory Debits (Credits), net (407.3,407.4) |  | - |  | - |  | - |  | - |  | - |
| Taxes Other Than Income Taxes (408) |  | 16,109,538 |  | 15,190,885 |  | 18,103,153 |  | 15,185,425 |  | 64,589,000 |
| Income Taxes - Federal (409.1) |  | 7,227,561 |  | 7,444,561 |  | 11,519,237 |  | 8,225,968 |  | 34,417,327 |
| Income Taxes - Other (409.1) |  | 2,624,603 |  | 2,703,404 |  | 4,183,075 |  | 2,987,163 |  | 12,498,246 |
| Provision for Deferred Income Taxes, net (410.1,411.1) |  | $(496,684)$ |  | $(511,597)$ |  | $(791,612)$ |  | $(565,296)$ |  | $(2,365,188)$ |
| Investment Tax Credit, net (411.7) |  | - |  | - |  | - |  | - |  | - |
| Total Utility Operating Expenses |  | 197,384,496 |  | 188,467,082 |  | 222,422,800 |  | 189,637,006 |  | 797,911,384 |
| Net Utility Operating Income |  | 38,629,314 |  | 45,551,384 |  | 63,263,206 |  | 53,883,267 |  | 201,327,171 |
|  |  |  |  |  |  |  |  |  |  |  |
| OTHER INCOME AND DEDUCTIONS |  |  |  |  |  |  |  |  |  |  |
| Other Income |  |  |  |  |  |  |  |  |  |  |
| Equity in Earnings of Subsidiary Companies (418.1) |  | - |  | - |  | - |  | - |  | - |
| Interest and Dividend Income (419) |  | - |  | - |  | - |  | - |  | - |
| Allowance for Other Funds Used During Construction (419.1) |  | 1,064,962 |  | 1,548,926 |  | 2,040,019 |  | 2,250,070 |  | 6,903,977 |
| Miscellaneous Nonoperating Income (421) |  | - |  | - |  | - |  | - |  | - |
| Gain on Disposition of Property (421.1) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income |  | 1,064,962 |  | 1,548,926 |  | 2,040,019 |  | 2,250,070 |  | 6,903,977 |
|  |  |  |  |  |  |  |  |  |  |  |
| Other Income Deductions |  |  |  |  |  |  |  |  |  |  |
| Loss on Disposition of Property (421.2) |  | - |  | - |  | - |  | - |  | - |
| Donations (426.1) |  | 833,218 |  | 1,165,668 |  | 761,418 |  | 1,158,482 |  | 3,918,786 |
| Penalties (426.3) |  | - |  | - |  | - |  | - |  | - |
| Exp. for Certain Civic, Political, \& Related Activities (426.4) |  | - |  | - |  | - |  | - |  | - |
| Other Deductions (426.5) |  | - |  | - |  | - |  | - |  | - |
| Total Other Income Deductions |  | 833,218 |  | 1,165,668 |  | 761,418 |  | 1,158,482 |  | 3,918,786 |
|  |  |  |  |  |  |  |  |  |  |  |
| Taxes Applicable to Other Income and Deductions |  |  |  |  |  |  |  |  |  |  |
| Income Taxes - Federal (409.2) |  | $(35,442)$ |  | $(36,506)$ |  | $(56,488)$ |  | $(40,338)$ |  | $(168,774)$ |
| Income Taxes - Other (409.2) |  | $(14,111)$ |  | $(14,535)$ |  | $(22,490)$ |  | $(16,061)$ |  | $(67,197)$ |
| Provision for Def. Inc. Taxes (410.2) |  | 395,035 |  | 406,895 |  | 629,604 |  | 449,604 |  | 1,881,138 |
| (Less) Provision for Def. Inc. Taxes (411.2) |  | $(164,375)$ |  | $(169,310)$ |  | $(261,979)$ |  | $(187,081)$ |  | $(782,744)$ |
| Total Taxes on Other Inc. and Ded. |  | 181,107 |  | 186,544 |  | 288,646 |  | 206,124 |  | 862,422 |
|  |  |  |  |  |  |  |  |  |  |  |
| Net Other Income and Deductions |  | 50,638 |  | 196,714 |  | 989,954 |  | 885,463 |  | 2,122,769 |
|  |  |  |  |  |  |  |  |  |  |  |
| Interest Charges |  |  |  |  |  |  |  |  |  |  |
| Interest on Long-Term Debt (427) |  | 14,646,978 |  | 15,714,174 |  | 15,714,174 |  | 15,714,174 |  | 61,789,500 |
| Amortization of Debt Disc. and Expense (428) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Loss on Reaquired Debt (428.1) |  | 777,669 |  | 443,020 |  | 565,025 |  | 653,194 |  | 2,438,909 |
| Amortization of Premium on Debt - Credit (429) |  | - |  | - |  | - |  | - |  | - |
| Amortization of Gain on Reacquired Debt - Credit (429.1) |  | - |  | - |  | - |  | - |  | - |
| Interest on Debt to Assoc. Companies (430) |  | 284,290 |  | 289,073 |  | 293,356 |  | 261,341 |  | 1,128,059 |
| Other Interest Expense (431) |  | 205,304 |  | 269,139 |  | 233,021 |  | 196,038 |  | 903,502 |
| Allowance for Borrowed Funds Used During Construction-Cr. (432) |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(422,333)$ |  | $(1,689,332)$ |
| Net Interest Charges |  | 15,491,908 |  | 16,293,074 |  | 16,383,243 |  | 16,402,413 |  | 64,570,638 |
|  |  |  |  |  |  |  |  |  |  |  |
| Net Income | \$ | 23,188,044 | \$ | 29,455,025 | \$ | 47,869,917 | \$ | 38,366,316 | \$ | 138,879,301 |



## Exhibit JAB-5

Page 2 of 2


| Duquesne Light Company |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Fully Projected Future Test Year - 12 Months Ended December 31, 2019 |  |  |  |  |  |
| ADDITIONS TO PLANT |  |  |  |  |  |
| 01/01/2019-12/31/2019 |  |  |  |  |  |
|  |  |  | 12 Months Ended April |  |  |
| Line \# | Description | Account Number | Actual | Forecast FPFTY | Variance |
| Intangible Plant |  |  |  |  |  |
|  | Organization | 301 | - | - | - |
| 2 | Franchises and consents | 302 | - | - | - |
| 3 | Misc intangible plant | 303 | 41,848 | 41,341 | 507 |
| 4 | Total Intangible |  | 41,848 | 41,341 | 507 |
|  |  |  |  |  |  |
| Production Plant |  |  |  |  |  |
| 5 | Land and land rights | 310 | - | - | - |
| 6 | Structures and Improvements | 311 | - | - | - |
| 7 | Misc power plant equipment | 316 | - | - | - |
| 8 | Total Production Plant |  | - | - | - |
|  |  |  |  |  |  |
| Storage Plant |  |  |  |  |  |
| 9 | Land and land rights | 340 | - | - | - |
| 10 | Structures and improvements | 341 | - | - | - |
| 11 | Misc power plant equipment | 346 | - | - | - |
| 12 | Total Storage and Equipment |  | - | - | - |
|  |  |  |  |  |  |
| 13 | Total Production Plant |  | 41,848 | 41,341 | 507 |
|  |  |  |  |  |  |
| Transmission Plant |  |  |  |  |  |
| 14 | Land and land rights | 350 | 216 | 763 | (547) |
| 15 | Structures and improvements | 352 | 2,929 | 5,241 | $(2,312)$ |
| 16 | Station equipment | 353 | 9,788 | 14,584 | $(4,796)$ |
| 17 | Towers and fixtures | 354 | 295 | 691 | (396) |
| 18 | Poles and fixtures | 355 | 2,126 | 549 | 1,577 |
| 19 | Overhead conductors, devices | 356 | 1,784 | 3,835 | $(2,051)$ |
| 20 | Underground conduit | 357 | - | - | - |
| 21 | Undergrnd conductors, devices | 358 | 100 | - | 100 |
| 22 | Roads and trails | 359 | 908 | - | 908 |
|  | Regional transmission - computer hardward | 382 | - | 2,214 | $(2,214)$ |
| 24 | Regional transmission - computer software | 383 | - | 5,414 | $(5,414)$ |
| 25 | Total Transmission Plant |  | 18,146 | 33,291 | $(15,145)$ |
|  |  |  |  |  |  |
| Distribution Plant |  |  |  |  |  |
| 26 | Land and land rights | 360 | 1,733 | - | 1,733 |
| 27 | Structures and improvements | 361 | 2,861 | 465 | 2,396 |
| 28 | Station equipment | 362 | 23,436 | 31,473 | $(8,037)$ |
| 29 | Poles, towers and fixtures | 364 | 51,903 | 34,054 | 17,849 |
| 30 | Overhead conductors, devices | 365 | 39,177 | 24,679 | 14,498 |
| 31 | Underground conduit | 366 | $(3,008)$ | 8,758 | $(11,766)$ |
| 32 | Undergrnd conductors, devices | 367 | 29,046 | 14,519 | 14,527 |
| 33 | Line transformers | 368 | 23,873 | 31,632 | $(7,759)$ |
| 34 | Services | 369 | 1,642 | 5,855 | $(4,213)$ |
| 35 | Meters | 370 | 8,575 | 16,772 | $(8,197)$ |
| 37 | Street lighting,signal system | 373 | 2,163 | 617 | 1,546 |
| 38 | Total Distribution Plant |  | 181,399 | 168,824 | 12,575 |
|  |  |  |  |  |  |
| General Plant |  |  |  |  |  |
| 39 | Land and land rights | 389 | - | - | - |
| 40 | Structures and improvements | 390 | 15,226 | 4,846 | 10,380 |
| 41 | Office furniture, equipment | 391 | 5,477 | 8,512 | $(3,035)$ |
| 42 | Transportation equipment | 392 | 3,162 | 7,000 | $(3,838)$ |
| 43 | Stores equipment | 393 | - | - | - |
| 44 | Tools, shop, garage equipment | 394 | 4,047 | 1,831 | 2,216 |
| 45 | Laboratory equipment | 395 | 1 | - | 1 |
| 46 | Power operated equipment | 396 | 108 | - | 108 |
| 47 | Communication equipment | 397 | 6,352 | 11,776 | $(5,424)$ |
| 48 | Miscellaneous equipment | 398 | - | - | - |
| 49 | Other tangible property | 399 | - | - | - |
| 50 | Total General Plant |  | 34,374 | 33,965 | 409 |
|  |  |  |  |  |  |
| 51 | Total Additions |  | 275,766 | 277,421 | $(1,655)$ |

BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

## Duquesne Light Company

Statement No. 3

Direct Testimony of Todd A. Mobley
Subject: Sales Forecast

Date: April 16, 2021

## DIRECT TESTIMONY OF TODD A. MOBLEY

Q. Please state your full name and business address.
A. Todd Allen Mobley; 411 Seventh Avenue, $7^{\text {th }}$ Floor, Pittsburgh, PA 15219.

## Q. What is your position at Duquesne Light Company ("Duquesne Light" or "Company")?

A. Director, Business Analytics.
Q. How long have you worked at Duquesne Light?
A. Since June 2014.

## Q. What are your current responsibilities?

A. In addition to other responsibilities, I manage Duquesne Light's sales throughput forecasting.
Q. What are your qualifications, work experience and educational background?
A. I have a Bachelor of Science in Mathematics and a Master of Business Administration from the University of Notre Dame, including classes in statistics, probability, and regression modeling and forecasting. Beyond my time at Duquesne Light, relevant work experience includes more than three years of experience as a Quantitative Analyst at Allegheny Energy. I also have industry training through Itron's Energy Forecasting Group.

## Q. What is the purpose of your direct testimony regarding Duquesne Light's request for increased rates?

A. The purpose of my testimony is to present the Company's sales forecast and the methodology used in its development.
Q. Are you sponsoring any exhibits as part of your direct testimony?
A. Yes, I am. I am sponsoring Exhibit TM-1, which is the past five years of weather normalized Company sales segmented by customer class. I am also sponsoring Exhibit TM-2, which is the Company's forecast of sales during the Historical Test Year through 2025, including the Future Test Year and Fully Projected Future Test Year, also segmented by customer class. Finally, I am sponsoring Exhibit TM-3, which displays the savings we expect to achieve through the Company's Act 129 Programs for the period of 2020 through 2025.

## Q. Please explain how these exhibits were prepared?

A. These exhibits were prepared by me, starting with Exhibit TM-1, which is based on weather normalized internal Company sales records. Exhibit TM-2 comes from the results of the annual forecast models I develop, which will be further described in this testimony. Lastly, Exhibit TM-3 comes from the Company's most recent filing detailing our energy efficiency and conservation ("EE\&C") programs related to PA Act 129. The Company's revised Act 129 EE\&C Plan for the period June 1, 2021 through May 31, 2025 was filed with the Public Utility Commission on March 1, 2021.

## Q. Before discussing your findings and methodology in detail, could you please address whe ther you accounted for the impacts of the COVID-19 pandemic?

A. Yes. The COVID-19 pandemic has had significant impacts across many aspects of customers' lives, including their electric consumption patterns. These anomalous impacts are most prominent in the Historic Test Year (HTY), 2020, as my findings below indicate. I discuss how the Company accounted for pandemic impacts in sales forecasts later in my testimony.

## Q. Please summarize your findings.

A. The forecast assumes normal temperature patterns for all years. Duquesne Light control area sales declined $3.5 \%$ between 2019 and the Historic Test Year (HTY). Control area sales are projected to decline an additional $0.2 \%$ between the HTY and the Future Test Year (FTY). Control area sales are projected to decline an additional $0.6 \%$ between the FTY and the Fully Projected Future Test Year (FPFTY). Total control area sales are projected to decline at a compound annual growth rate of $1.4 \%$ between 2019 and 2025.

Residential usage comprises approximately $32 \%$ of Duquesne Light's annual sales during the FPFTY, and this segment is expected to decline at a compound annual growth rate of $1.3 \%$ between 2019 and 2025. This projected decline is being driven by energy efficiency and distributed generation trends, and is partially offset by projected customer and electric vehicle (EV) growth.

Commercial usage comprises approximately $48 \%$ of Duquesne Light's annual sales, and this segment is expected to decline at a compound annual growth rate of $1.6 \%$ between 2019 and 2025. This projected decline is being driven by
energy efficiency and distributed generation trends, partially offset by growth associated with EV and new large customers.

Finally, Industrial usage comprises approximately $20 \%$ of Duquesne Light's annual sales. This segment is expected to decline at a compound annual growth rate of $1.1 \%$ between 2019 and 2025. The projected decline is being driven by energy efficiency trends and customer declines.

These forecasts are detailed in Exhibit TM-2.

## Q. What procedures and methodology does Duquesne Light utilize for pre paring its forecasts?

A. I develop the sales forecasts by modeling each rate and customer class separately, using multiple regression. For Residential and Commercial rate classes, I employ Itron's Statistically Adjusted End-Use (SAE) framework, which captures electricity usage for heating, cooling, and all other end-uses through a series of composite variables. For Industrial rate classes, I use multiple regressions more heavily reliant on trend variables.

The raw regression forecasts are then adjusted for a handful of external factors, namely: projected growth in electric vehicles, growth in distributed generation connections, known and potential new large commercial and industrial customers, anticipated adoption of electric buses, and for Industrial rate classes, projected deemed Act 129 energy efficiency savings. The outcome is a calendar monthly forecast for kWh and customer count by rate class.

## Q. What data do you utilize for the inputs into your forecasts?

A. The main data inputs used in the forecast models and their sources include:

- Historical kWh sales, customer count, and net metering requests by rate class provided internally
- 15 year historical daily temperature for Duquesne Light territory provided by AccuWeather.
- Historical and forecasted regional energy efficiency trends provided by Itron via the Energy Information Administration
- Historical and projected Duquesne Light Act 129 program deemed savings for Industrial customer class
- Historical and forecasted economic data for Allegheny and Beaver Counties provided by Oxford Economics
- Electric Vehicle electricity usage forecast provided by Electric Power Research Institute
- Projected growth rates in solar installations for PA provided by US Solar Market Insight report from GTM Research
- Market intelligence regarding known and potential new large commercial and industrial customers and known and potential behind-the-meter generation projects
- Google's Community Mobility Reports, which chart movement trends over time by geography, and across different categories of places such as retail and recreation, workplaces, and residential.
Q. How are Duquesne Light Company's Pa. Act 129 Energy Efficiency and Conservation obligations factored into your forecasts?
A. For Residential and Commercial classes, all energy efficiency and conservation effects, inclusive of Act 129, are incorporated through Itron's SAE model framework, which leverages the Energy Information Administration regional forecasts regarding end use equipment and appliance efficiency and saturation trends. For Industrial classes, the projected Act 129 deemed savings are subtracted from the unadjusted forecasts.


## Q. Are there any major events impacting the Company's test year forecasts?

A. Major events addressed through adjustments to the raw regression forecasts and include: projected growth in electric vehicles, growth in net metering connections, known and potential new large commercial and industrial customers, known and potential behind-the-meter generation projects, and anticipated adoption of electric buses.

In addition to the above, the COVID-19 pandemic impacted the HTY, serving to increase Residential usage and decrease Commercial and Industrial usage due to the associated increased shelter at home and work from home activity, restrictions on business activities, and the overall downturn in economic activity. These trends are reflected in the regressions through incorporating Google's Community Mobility Reports.
Q. How does the COVID-19 pandemic impact the FPFTY?
A. The forecast assumes that restrictions on business activities and work-from-home activity mostly return to normal, pre-pandemic conditions by late 2021, and thus do not impact the FPFTY. However, the forecast also projects some level of permanent increase in working from home, which serves to increase the Residential forecast and decrease the Commercial forecast during the FPFTY as a result of this shift in behavior. Beyond these direct responses to the pandemic, the economic impacts and their related effects on the forecast are reflected through the projected economic data provided by Oxford Economics.

## Q. Could you explain Duquesne Light Company's peak load demand forecasts?

A. Our peak load demand forecasts are provided to us by PJM, our Regional Transmission Organization. PJM develops peak load demand forecasts for each zone in its territory, and provides these forecasts to its members.
Q. Were your procedures and methodology for preparing these forecasts consistent with those utilized in prior Duquesne Light proceedings?
A. Yes. With the exception of certain adjustments related to the COVID-19 pandemic, which I discussed above, I employed the same methodology as in the Company's prior base rates proceeding, Docket Nos. R-2018-3000124 et. al.

Q Does this conclude your direct testimony?
A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

## Duquense Light Company

Weather Normalized Annual Retail Sales (GWh) by Customer Class

|  |  | $\mathbf{2 0 1 5}$ | $\mathbf{2 0 1 6}$ | $\mathbf{2 0 1 7}$ | 2018 |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Residential | 4,023 | 4,040 | 3,988 | 4,063 | 4,026 |
| Commerical | 6,368 | 6,258 | 6,142 | 6,121 | 6,034 |
| Industrial | 2,861 | 2,561 | 2,640 | 2,611 | 2,471 |
| Lighting | 57 | 56 | 53 | 54 | 53 |
| Total | $\mathbf{1 3 , 3 0 9}$ | $\mathbf{1 2 , 9 1 4}$ | $\mathbf{1 2 , 8 2 3}$ | $\mathbf{1 2 , 8 5 0}$ | $\mathbf{1 2 , 5 8 4}$ |

Year to Year Change by GWh

|  | 2015 | 2016 | 2017 | 2018 |
| :--- | :---: | :---: | :---: | ---: |
|  | 2019 |  |  |  |
| Residential | 17 | $(51)$ | 75 | $(37)$ |
| Commerical | $(111)$ | $(116)$ | $(20)$ | $(88)$ |
| Industrial | $(301)$ | 79 | $(28)$ | $(140)$ |
| Lighting | $(1)$ | $(3)$ | 1 | $(2)$ |
| Total | $\mathbf{( 3 9 5 )}$ | $\mathbf{( 9 1 )}$ | $\mathbf{2 7}$ | $\mathbf{( 2 6 6 )}$ |

Year to Year Change by Percentage

|  | 2015 | 2016 | 2017 | 2018 |
| :--- | ---: | ---: | ---: | ---: |
| Residential | $0.4 \%$ | $-1.3 \%$ | $1.9 \%$ | $-0.9 \%$ |
| Commerical | $-1.7 \%$ | $-1.9 \%$ | $-0.3 \%$ | $-1.4 \%$ |
| Industrial | $-10.5 \%$ | $3.1 \%$ | $-1.1 \%$ | $-5.4 \%$ |
| Lighting | $-1.2 \%$ | $-5.2 \%$ | $2.3 \%$ | $-2.9 \%$ |
| Total | $\mathbf{- 3 . 0 \%}$ | $\mathbf{- 0 . 7 \%}$ | $\mathbf{0 . 2 \%}$ | $\mathbf{- 2 . 1 \%}$ |

Exhibit TM-2
Todd Mobley

## Duquense Light Company

Forecasted Retail Sales (GWh) by Customer Class

|  | Historic Test Year <br> 2020 | Future Test <br> Year <br> 2021 | Fully Projected Future Test Year 2022 | 2023 | 2024 | 2025 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Residential | 4,193 | 4,021 | 3,895 | 3,834 | 3,782 | 3,722 |
| Commerical | 5,549 | 5,645 | 5,711 | 5,624 | 5,556 | 5,463 |
| Industrial | 2,352 | 2,405 | 2,399 | 2,367 | 2,343 | 2,312 |
| Lighting | 51 | 53 | 53 | 53 | 53 | 53 |
| Total | 12,145 | 12,124 | 12,058 | 11,878 | 11,733 | 11,550 |

Year to Year Change by GWh

|  | by GWh |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Historic Test |  | Fully Projected |  |  |  |
|  | Year | Year | Future Test Year |  |  |  |
|  | 2020 | 2021 | 2022 | 2023 | 2024 | 2025 |
| Residential | 167 | (172) | (126) | (61) | (52) | (60) |
| Commerical | (485) | 96 | 66 | (86) | (69) | (92) |
| Industrial | (119) | 53 | (6) | (32) | (24) | (30) |
| Lighting | (2) | 3 | (0) | (0) | (0) | (0) |
| Total | (439) | (21) | (66) | (180) | (145) | (183) |

Year to Year Change by Percentage

|  | Historic Test | Future Test | Fully Projected |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{aligned} & \text { Year } \\ & 2020 \end{aligned}$ | $\begin{aligned} & \text { Year } \\ & 2021 \end{aligned}$ | Future Test Year 2022 | 2023 | 2024 | 2025 |
| Residential | 4.1\% | -4.1\% | -3.1\% | -1.6\% | -1.3\% | -1.6\% |
| Commerical | -8.0\% | 1.7\% | 1.2\% | -1.5\% | -1.2\% | -1.7\% |
| Industrial | -4.8\% | 2.2\% | -0.2\% | -1.3\% | -1.0\% | -1.3\% |
| Lighting | -3.5\% | 5.0\% | -0.4\% | -0.4\% | -0.4\% | -0.4\% |
| Total | -3.5\% | -0.2\% | -0.5\% | -1.5\% | -1.2\% | -1.6\% |

Note: Historic Test Year (2020) is weather normalized

Exhibit TM-3
Todd Mobley

Duquense Light Company
Act 129 Program Savings (GWh) by Customer Class

|  | Historic Test | Future Test | Fully Projected |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Year | Year | Future Test Year |  |  |  |
|  | 2020 | 2021 | 2022 | 2023 | 2024 | 2025 |
| Residential | 40 | 73 | 107 | 144 | 180 | 214 |
| Commercial | 28 | 54 | 79 | 103 | 128 | 152 |
| Industrial | 18 | 33 | 48 | 62 | 75 | 87 |
| Lighting | - | - | - | - | - | - |
| Total | 86 | 160 | 235 | 309 | 383 | 453 |

## BEFORE THE

 PENNSYLVANIA PUBLIC UTILITY COMMISSIONDocket No. R-2021-3024750

## Duquesne Light Company

Statement No. 4

Direct Testimony of Benjamin Buxton Morris
Subjects: Electrical System, Planning Process, Reliability Performance, Plant Additions, Vegetation Management, Consolidated Tax Savings Adjustment

Date: April 16, 2021

## DIRECT TESTIMONY OF BENJAMIN BUXTON MORRIS

## I. INTRODUCTION

Q. Please state your full name and business address.
A. My name is Benjamin Buxton Morris. My business address is 2825 New Beaver Avenue, Pittsburgh, PA 15233
Q. What is your position at Duquesne Light Company?
A. I am the Director, Operations Work Management \& Performance for Duquesne Light Company ("Duquesne Light" or the "Company").

## Q. Please summarize your responsibilities and duties as they relate to this

 testimony.A. In my capacity as the Director, Operations Work Management \& Performance, I currently have three primary areas of responsibility: (1) Work Planning, (2) Work Management, and (3) Work Performance.

The first of these areas, Work Planning, involves leading the development of a five-year plan for Operations' construction, inspection, and maintenance work as part of the Company's annual business planning process. Additionally, this group tracks the Operations' performance versus its schedule and cost targets through a given year.

The second of these areas, Work Management, involves administering the work of Operations' field resources to ensure that the work being undertaken aligns
with what was included in the five-year plan for construction, inspection, and maintenance work. This administration includes the facilitation of decisions between the insourcing and outsourcing of work, depending on the capacity of the Company's field workers to take on new work at any given point in time. The administration of work also includes the scheduling of work for Company field workers and the provision of asset accounting support, work order management, and other clerical duties to the Company's field management.

The third and final of these areas, Work Performance, involves the development, reporting, and analysis of key performance indicators for Operations. The Work Performance function enables Company management to make datadriven decisions with respect to its operations. Additionally, the Work Performance function performs ad hoc quantitative analyses in support of the same goal of operational excellence.

I am providing this testimony on behalf of the Company primarily due to my oversight of the development of the five-year plan for Operations' construction, inspection, and maintenance work, discussed above in the context of the Work Planning function. This five-year plan underpins the operational expenditures for which the Company is seeking recovery through this proceeding.
Q. Please provide your educational background and describe your professional experience.
A. As stated above, I currently am the Director, Operations Work Management \& Performance at Duquesne Light. Prior to this role, I served as the Senior Manager,

Operations Strategic Planning from November 2016 through February 2017; the Senior Manager, Strategic Planning \& Operational Analytics from October 2015 through October 2016; and the Manager, Operational Analytics from December 2014 through September 2015.

Prior to joining Duquesne Light, I was a Vice President in the Regulated Utilities group of Macquarie Infrastructure and Real Assets, Inc. ("MIRA"), where I helped to identify new private equity investment opportunities and to manage existing private equity investments in the regulated utility industry. Specific private equity investments in the regulated utility industry that I helped to manage for MIRA included investments in Duquesne Light; in Aquarion Company, a water utility serving approximately 220,000 customers in Connecticut, Massachusetts, and New Hampshire; and in Hawaii Gas, a gas utility serving approximately 68,000 customers in Hawaii.

Prior to joining MIRA, I was an Associate in the Oil \& Gas investment banking group of Macquarie Capital (USA) Inc., where I worked with clients in the upstream, midstream, downstream, and equipment/services sectors of the oil and gas industry. Specifically, I helped to provide strategic advice related to mergers and acquisitions, restructurings, and recapitalizations and to raise capital in the private and public equity and debt capital markets.

With respect to my educational background, I hold Bachelor of Arts degrees from Middlebury College and from Columbia University. I additionally hold a Master of Arts degree from Middlebury College, a Master of Finance degree from INSEAD, and a Master of Business Administration degree from Columbia

University. I am credentialed by the Project Management Institute as a Project Management Professional. I am credentialed by the Utility Safety \& Ops Leadership Network as a Certified Utility Safety Professional.

## Q. What is the purpose of your direct testimony?

A. The purpose of my testimony is to describe and explain Duquesne Light's plant additions in 2020, 2021, and 2022, which are the historic test year ("HTY"), future test year ("FTY"), and fully projected future test year ("FPFTY"), respectively. Specifically, my testimony describes: (1) Duquesne Light's electric delivery system, (2) Duquesne Light's planning process to ensure its electric system continues to meet the needs of its customers, (3) the Company's historical reliability performance, (4) major plant additions through the FPFTY, (5) the Company's vegetation management practices, and (6) the Company's plant additions in relation to the consolidated tax savings adjustment ("CTA") calculation.

## II. ELECTRICAL SYSTEM

Q. Could you brie fly describe Duquesne Light's electric system?
A. Duquesne Light provides electric service to more than 600,000 customers located primarily in Allegheny and Beaver counties (including the city of Pittsburgh), a service territory of approximately 817 square miles. Duquesne Light delivers electricity from a variety of generation sources through a transmission and distribution system at the voltages and in the quantity required by our customers. The system includes approximately 7,484 miles of distribution and sub-
transmission lines, approximately 669 miles of transmission lines, 159 companyowned substations, 195 customer-owned substations, approximately 212,227 utility poles, and 51,434 distribution transformers.

The transmission system consists of a network of $345 \mathrm{kV}, 138 \mathrm{kV}$, and 69 kV transmission lines that supply a series of substations. These lines move bulk power from various sources of supply, which are not owned by Duquesne Light, to the places in Duquesne Light's service territory where it is needed. These lines are the most reliable form of power delivery and are the most electrically efficient. They enable the movement of large quantities of bulk power with minimal energy loss or voltage drop. These transmission lines supply power to several types of substations within our service territory. Substation transformers then convert the transmission voltages to lower (distribution) voltages that are used for distribution to the majority of Duquesne Light's customers. Costs for transmission assets are recovered through Duquesne Light's FERC-approved formula rate.

Once converted down to distribution voltages (typically 23 kV or 4 kV , except in our downtown Pittsburgh network system where there is both 11 kV and 23 kV primary distribution voltage), electricity is delivered to customers through the local distribution system. The local distribution system consists of distribution lines, transformers, switches, breakers, and other electrical equipment that Duquesne Light uses to deliver power from the various substations to the customer.

## III. PLANNING PROCESS

Q. Does Duquesne Light have a planning process to ensure its electric system is reliable and able to meet the needs of its customers?
A. Yes. Duquesne Light's planning process encompasses a review of plant additions needed for service restoration, customer commitments, service capacity and reliability, and infrastructure support. This planning process addresses both our annual investment needs for plant additions and replacements as well as necessary investments in our energy delivery and support infrastructure to replace physical infrastructure that is either nearing obsolescence or unable to meet our customers' needs.

In light of evolving customer behaviors and expectations, Duquesne Light's planning process takes into account the changing nature of the distribution system. For instance, as the Company's customers seek to interconnect DERs to the distribution grid, Duquesne Light's Distribution Planning team studies the grid's capacity to host DERs at our customers' proposed interconnection-points, and develops plans by which to facilitate the interconnection process. Similarly, as our customers purchase electric vehicles and charge them at their residences or places of business, Duquesne Light's Distribution Planning team works to ensure that our grid has sufficient capacity to support the increased demand on the system.

## IV. RELIABILITY PERFORMANCE

Q. Has Duquesne Light been able to maintain high le vels of reliability since its last base rate proceeding?
A. Yes. The Company has maintained high levels of reliability. The Company measures its reliability performance based on three system and customer reliability metrics: System Average Interruption Duration Index ("SAIDI"), System Average Interruption Frequency Index ("SAIFI"), and Customer Average Interruption Duration Index ("CAIDI"). The Company consistently has performed well against the standards set by the Commission.

## Q. Please summarize Duquesne Light's reliability metrics in recent history (e.g., over the past five years of be nchmarked data).

A. Over the past five years of benchmarked data (i.e., 2016 through 2020 utilizing a combination of the Pennsylvania Public Utility Commission's annual Electric Service Reliability in Pennsylvania report) for 2016 through 2019 and large Electric Distribution Companies' ("EDCs'") individual Quarterly Electric Reliability Reports for the fourth quarter of 2020 (Docket No. M-2016-2522508), Duquesne Light has been, on average over the five-year period, either the top-performing large EDC or the second top-performing large EDC in the Commonwealth, depending on the specific reliability metric.

For the SAIDI reliability metric over the 2016 through 2020 period, Duquesne Light was the top-performing (i.e., \#1) of the Commonwealth's seven large EDCs over the five-year period (i.e., the arithmetic mean of 2016 through 2020 performance). With respect to individual years' performances, Duquesne Light was the \#1 large EDC in 2016, 2018, 2019, and 2020 and the \#3 large EDC in 2017. Duquesne Light performed better than the Company's Benchmark and

|  | 2016 | 2017 | 2018 | 2019 | 2020 | Mean |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Duquesne Light | 70 | 112 | 89 | 106 | 111 | 98 |
| Benchmark | 126 | 126 | 126 | 126 | 126 | 126 |
| Standard | 182 | 182 | 182 | 182 | 182 | 182 |
|  |  |  |  |  |  |  |
| PA Large EDC "2" | 178 | 217 | 165 | 253 | 190 | 201 |
| PA Large EDC "3" | 106 | 82 | 106 | 205 | 116 | 123 |
| PA Large EDC "4" | 171 | 239 | 195 | 252 | 214 | 214 |
| PA Large EDC "5" | 104 | 160 | 152 | 178 | 179 | 155 |
| PA Large EDC "6" | 94 | 104 | 141 | 150 | 122 | 122 |
| PA Large EDC "7" | 159 | 214 | 209 | 196 | 241 | 204 |
|  |  |  |  |  |  |  |
| Rank (Duquesne Light) | $\# 1$ | $\# 3$ | $\# 1$ | $\# 1$ | $\# 1$ | $\# 1$ |
| Percentile (Duquesne Light) | $0 \%$ | $33 \%$ | $0 \%$ | $0 \%$ | $0 \%$ | $0 \%$ |

Standard values of 126 and 182, respectively, in each of the five years. This information is summarized in the following table.

Table 1 - SAIDI Performance Among Large Pennsylvania EDCs, 2016-2020

For the SAIFI reliability metric over the 2016 through 2020 period, Duquesne Light was the second top-performing (i.e.,\#2) of the Commonwealth's seven large EDCs over the five-year period (i.e., the arithmetic mean of 2016 through 2020 performance). With respectto individual years' performances, Duquesne Light was the \#1 large EDC in 2018 and 2020; the \#2 large EDC in 2016 and 2019; and the \#3 large EDC in 2017. Duquesne Light performed better than the Company's Benchmark and Standard values of 1.17 and 1.40, respectively, in each of the five years. This information is summarized in the following table.

Table 2 - SAIFI Performance Among Large Pennsylvania EDCs, 2016-2020

|  | 2016 | 2017 | 2018 | 2019 | 2020 | Mean |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Duquesne Light | 0.85 | 0.98 | 0.84 | 1.01 | 0.84 | 0.90 |
| Benchmark | 1.17 | 1.17 | 1.17 | 1.17 | 1.17 | 1.17 |
| Standard | 1.40 | 1.40 | 1.40 | 1.40 | 1.40 | 1.40 |
|  |  |  |  |  |  |  |
| PA Large EDC "2" | 1.44 | 1.47 | 1.27 | 1.54 | 1.27 | 1.40 |
| PA Large EDC "3" | 1.00 | 0.83 | 0.97 | 1.08 | 0.84 | 0.94 |
| PA Large EDC "4" | 1.43 | 1.73 | 1.71 | 1.72 | 1.58 | 1.63 |
| PA Large EDC "5" | 1.09 | 1.06 | 1.10 | 1.38 | 0.97 | 1.12 |
| PA Large EDC "6" | 0.78 | 0.71 | 0.84 | 0.85 | 0.90 | 0.82 |
| PA Large EDC "7" | 1.08 | 1.29 | 1.22 | 1.19 | 1.12 | 1.18 |
|  |  |  |  |  |  |  |
| Rank (Duquesne Light) | $\# 2$ | $\# 3$ | $\# 1$ | $\# 2$ | $\# 1$ | $\# 2$ |
| Percentile (Duquesne Light) | $17 \%$ | $33 \%$ | $0 \%$ | $17 \%$ | $0 \%$ | $17 \%$ |

For the CAIDI reliability metric over the 2016 through 2020 period, Duquesne Light was the top-performing (i.e., \#1) of the Commonwealth's seven large EDCs over the five-year period (i.e., the arithmetic mean of 2016 through 2020 performance). With respectto individual years' performances, Duquesne Light was the \#1 large EDC in 2016, 2018, 2019, and 2020 and the \#2 large EDC in 2017. Duquesne Light performed better than the Company's Benchmark value of 108 in all years except 2017 and 2020, which were years marked by high storm activity. Duquesne Light performed better than the Company's Standard value of 130 in each of the five years except 2020. This information is summarized in the following table.

Table 3-CAIDI Performance Among Pennsylvania EDCs, 2016-2020

|  | 2016 | 2017 | 2018 | 2019 | 2020 | Mean |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Duquesne Light | 82 | 115 | 106 | 106 | 132 | 108 |
| Benchmark | 108 | 108 | 108 | 108 | 108 | 108 |
| Standard | 130 | 130 | 130 | 130 | 130 | 130 |
|  |  |  |  |  |  |  |
| PA Large EDC "2" | 124 | 147 | 130 | 164 | 150 | 143 |
| PA Large EDC "3" | 106 | 99 | 110 | 189 | 137 | 128 |
| PA Large EDC "4" | 120 | 138 | 114 | 147 | 136 | 131 |
| PA Large EDC "5" | 95 | 150 | 138 | 129 | 185 | 139 |
| PA Large EDC "6" | 121 | 146 | 168 | 176 | 135 | 149 |
| PA Large EDC "7" | 147 | 166 | 171 | 165 | 216 | 173 |
|  |  |  |  |  |  |  |
| Rank (Duquesne Light) | $\# 1$ | $\# 2$ | $\# 1$ | $\# 1$ | $\# 1$ | $\# 1$ |
| Percentile (Duquesne Light) | $0 \%$ | $17 \%$ | $0 \%$ | $0 \%$ | $0 \%$ | $0 \%$ |

Duquesne Light's attributes its strong reliability performance over the 2016 to 2020 period to the Company's ongoing T\&D System Capacity and Reliability plant additions and vegetation management efforts.
Q. Please summarize Duquesne Light's reliability metrics for 2020.
A. For 2020, the Company's SAIDI, SAIFI, and CAIDI performance was 111, 0.84 , and 132 , respectively. The Company's 2020 performance was below (i.e., favorable to) the Benchmark values for SAIDI and SAIFI, but the Company's 2020 value for CAIDI was above (i.e., unfavorable to) the Benchmark and Standard values as detailed in the chart below:

|  | SAIDI | SAIFI | CAIDI |
| :--- | :---: | :---: | :---: |
| 2020 | 111 | 0.84 | 132 |
| Benchmark | 126 | 1.17 | 108 |
| Standard | 182 | 1.40 | 130 |

Table 4 - Duquesne Light 2020 Reliability Metrics

The Company attributes its CAIDI results in 2020 to increased storm activity during the year. The Company experienced a total of 27 Storm Days in 2020. The Company had five PUC Reportable Storms in 2020, which occurred in the months of April, June, July, August, and November. The Company had one Major Event Exclusion in 2020. In light of this higher storm activity, the Company's 2020 reliability performance was significantly impacted by the contribution of storm days. This fact is illustrated in the following table.

Table 5 - Duquesne Light 2020 Reliability Metrics by Day Type

|  | Incidents | SAIDI | SAIFI | CAIDI |
| :--- | :---: | :---: | :---: | :---: |
| Blue Sky Days | 2,216 | 49 | 0.56 | 88 |
| Storm Days | 1,003 | 62 | 0.28 | 220 |
| All Days | 3,219 | 111 | 0.84 | 132 |
| Benchmark | - | 126 | 1.17 | 108 |
| Standard | - | 182 | 1.40 | 130 |

The Company's 2020 reliability performance on Blue Sky days was significantly below (i.e., favorable to) the Benchmark and Standard values. In contemplation of increasing storm frequency and severity, the Company plans to continue to increase its reliability-driven capital investment and storm restoration work, among other efforts, as I discuss in further detail below.
Q. What steps is the Company taking to further improve its service reliability and reduce outages?
A. Duquesne Light must continue to invest in its distribution system to maintain and enhance its reliability and resilience. The Company's plant additions to this end are made in accordance with our planning process described above. Additionally, Duquesne Light must continue to maintain vegetation around its distribution assets to improve service reliability and reduce outages. The Company's vegetation management efforts are described in Section VI.

In addition to Duquesne Light's traditional transmission and distribution plant investments and vegetation management activities, the Company is investing in technology designed to help improve reaction time to service interruptions. Specifically, Duquesne Light is investing in an outage management system ("OMS") that will be implemented in 2022. This project is described in the "Plant Additions" section of this testimony, under the category of "IT Programs and Projects."

## V. PLANT ADDITIONS

Q. Can you summarize the process used by Duquesne Light to determine which plant additions are necessary and when the $y$ must be added?
A. Yes. Duquesne Light identifies the need and priority for plant additions by comparing knowledge regarding the condition and use of its assets to knowledge regarding the future performance requirements of those assets. In cases when a problem with future performance is predicted, or where a need to improve
performance has been identified, Duquesne Light engineers develop a variety of reasonable alternatives to resolve the problem or meet the need. Each alternative is then evaluated on its technical and financial merits and the alternative with the greatest customer value consistent with Duquesne Light's materials, design, and construction standards is recommended.

A Company management team reviews these recommended plant additions and challenges the underlying technical and financial facts, assumptions, and conclusions. This process ensures that appropriate analytical rigor is applied to the decision-making process and ensures that each plant addition is considered within the context of all other capital needs. This is an iterative process that continues until a final decision is made on a plant addition.

Approved plant additions are then included in an integrated work plan that is used by Duquesne Light planners, engineers, schedulers, and project managers to ensure optimum sequencing of the many different additions made during any given year. As projects are completed, field supervisors perform project reviews to assure the scope of work has been completed and then notify the plant accounting department to ensure proper accounting treatment of the capital project.

## Q. Can you explain how Duquesne Light seeks to balance plant additions with customer affordability? <br> A. Yes. With respect to plant additions, Duquesne Light strives to render its electric distribution service as affordable as possible for our customers by (1) making plant additions only when the Company believes that it is prudent to do so by virtue of

our planning process, (2) employing or procuring the least-cost labor, materials, and services that meet our materials, design, and construction standards, and (3) striving to maximize efficiency and productivity in our design and construction processes. The Company is also increasingly exploring alternatives to traditional distribution facility investments (also called "non-wires alternatives") as potentially cost-effective electric delivery solutions.

## Q. Please explain the reasons why Duquesne Light invests in its distribution system.

A. Duquesne Light makes plant additions in order to provide safe and reliable service to our customers. Plant additions, including those planned through the end of the FPFTY, are necessary for five primary reasons and are categorized accordingly as: (1) Transmission and Distribution ("T\&D") Service Restoration, (2) T\&D Customer Commitments, (3) T\&D System Capacity and Reliability, (4) T\&D Support, and (5) IT Projects \& Programs. The value of plant additions in these five functional categories during the HTY, FTY, and FPFTY is summarized in Exhibit BBM-1.
Q. Please explain Duquesne Light's anticipated Plant Additions for the time period of 2020, 2021, and 2022.
A. Duquesne Light plans to make $\$ 549.9$ million of additions to Distribution Plant for the time period of 2020, 2021, and 2022. In addition to this amount, Duquesne Light plans to make $\$ 186.0$ million of additions to Transmission Plant during the same

|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
|  |  |  |  | HTY | FTY | FPFTY |
| $\$$ Millions | Actual | Actual | Actual | Actual | Forecast | Forecast |
| Intangible | $\$ 23.3$ | $\$ 32.9$ | $\$ 39.8$ | $\$ 12.7$ | $\$ 29.6$ | $\$ 27.2$ |
| Transmission | 26.6 | 36.1 | 18.1 | 53.9 | 48.5 | 83.6 |
| Regional Transmission | 1.1 | 0.2 | - | - | - | - |
| Distribution | 166.4 | 216.9 | 181.4 | 178.9 | 210.0 | 161.0 |
| General | 21.8 | 30.9 | 43.3 | 10.2 | 31.7 | 29.9 |
| Total | $\$ 239.2$ | $\$ 317.0$ | $\$ 282.6$ | $\$ 255.7$ | $\$ 319.8$ | $\$ 301.8$ |

time period. The Company is not claiming any Transmission Plant additions in its rate base claim in this proceeding. Supporting these additions to both Distribution Plant and Transmission Plant, the Company plans to make $\$ 71.8$ million and $\$ 69.6$ million of additions to General Plant and Intangible Plant, respectively, for the period of 2020, 2021, and 2022. The value of plant additions in these accounting categories during the HTY, FTY, and FPFTY is summarized in Exhibit BBM-2.
Q. How do these Distribution Plant addition values compare with those of recent years (e.g., 2017, 2018, and 2019)?
A. Duquesne Light's anticipated Distribution Plant additions for 2020, 2021, and 2022 are comparable to recent years. The table, below, illustrates that the Company's Distribution Plant additions range between a low of $\$ 161.0$ million in 2022 and a high of $\$ 216.9$ million in 2018. 2022 is a relatively low year for Distribution Plant additions, but the Company is anticipating a relatively high level of Transmission Plant additions that same year.

Table 6 - Plant Additions, 2017-2022

It is worth noting that the Duquesne Light's actual Distribution Plant additions for 2018 and 2019 exceeded its projections for those years presented in its last base rate case, R-2018-3000124. Specifically, the Company made $\$ 216.9$ million of Distribution Plant additions in 2018, compared with its original projection of $\$ 153.5$ million. Similarly, Duquesne Light made $\$ 181.4$ million of Distribution Plant additions in 2019, compared with its original projection of $\$ 159.8$ million.

## Q. Please explain T\&D Service Restoration as a primary reason for making plant additions.

A. Duquesne Light customers expect their electric service to be restored promptly if it is interrupted. T\&D Service Restoration includes plant additions to replace equipment that has failed and either resulted in a service interruption to Duquesne Light customers or presented a significant risk of an imminent service interruption. Plant additions in this category include additions to replace equipment failures related to storms, adverse weather conditions, animal contacts, and equipment that fails due to reaching the end of its service life. This category also includes plant additions in response to outages caused by people and/or their equipment, including motor vehicle crashes.

Forecasts of plant additions needed for Service Restoration are estimated based on previous years' experience.
Q. Please summarize the types of plant additions that are included in the January 1, 2020 through December 31, 2022, projections for T\&D Service Restoration.
A. In the time period of 2020, 2021, and 2022, Duquesne Light projects to make $\$ 111.3$ million of plant additions in the T\&D Service Restoration category. The service restoration program provides funding for the restoration of equipment that may require replacement due to damage caused by storms, wind, ice, or heat. Replacement includes both overhead and underground facilities. It also includes funding to replace equipment that may fail and cause customer outages or has the potential for causing imminent outages to customers. In calendar year 2020, Duquesne Light made $\$ 39.6$ million of plant additions in the T\&D Service Restoration category.

## Q. Please explain T\&D Customer Commitments as a primary reas on for making plant additions.

A. Duquesne Light serves residential, commercial, industrial, and lighting customers. All customer classes rely on us to provide service for new or remodeled homes and businesses, and also to upgrade existing services to meet new capacity requirements they may have as a result of additional load such as computers, air conditioning, and modernization. T\&D Customer Commitments also include plant additions associated with relocations of Company facilities that are regularly requested by governmental agencies due to highway improvements or other rights-of-way interferences. These projects include road widening, bridge repairs, sewer and water main replacements/upgrades, or other infrastructure improvements.

Forecasts of plant additions needed as a result of T\&D Customer Commitments are based upon forecasted economic conditions in the Duquesne

Light service area, projected number of new customers, major customer projects that are known to us, and projects identified to us by state, county, city and local municipalities.
Q. Please summarize the types of plant additions that are included in the January 1, 2020 through December 31, 2022, projections for T\&D Customer Commitments.
A. In the time period of 2020, 2021, and 2022, Duquesne Light projects making $\$ 68.3$ million of plant additions for T\&D Customer Commitments. This amount funds hundreds of various sized projects to install overhead or underground distribution equipment requested by residential, commercial or industrial customers, or governmental agencies in accordance with Duquesne Light service policies.
Q. Please explain T\&D System Capacity and Reliability as a primary reason for making plant additions.
A. Duquesne Light customers expect our electric system to provide the equipment capacity needed to assure reliability and voltage stability. Plant additions to the Duquesne Light electric system are required to ensure that it continues to meet those needs as customer load grows or the location of load shifts within the Duquesne Light service territory. The types of additions required to ensure service capacity and reliability include substation upgrades, circuit extensions and conversions to ensure the distribution system meets our customers' voltage and load requirements,
and the installation of new equipment to replace deteriorated, obsolete, or failed equipment.

Forecasts of plant additions needed to ensure T\&D System Capacity and Reliability are identified through analysis of inspection and maintenance program results, reliability data analysis, reviews of customer requests, and an engineering review of load growth in particular areas.
Q. Please summarize the types of plant additions that are included in the January 1,2020 through December31, 2022, projections for T\&D System Capacity and Reliability.
A. In the time period of 2020, 2021, and 2022, Duquesne Light's projections include making $\$ 515.6$ million of plant additions for T\&D System Capacity and Reliability. The T\&D System Capacity and Reliability forecasted plant additions of $\$ 515.6$ million includes $\$ 433.3$ million of programs and projects to address emergent issues and to systematically replace equipment that is at the end of its useful life. The remaining $\$ 82.3$ million is related to programs and projects approved as a part of the Company's current Long Term Infrastructure Improvement Plan ("LTIIP") for the period through December 31, 2022.
Q. Please describe the Company's major T\&D System Capacity and Reliability plant additions through the FPFTY that are not included in the current LTIIP.
A. There are three major capital programs and projects included in the T\&D System Capacity and Reliability category that are not included in the current LTIIP. They
are (1) the Pole Assessment, Repair, and Replacement Program, (2) the Establish Riazzi Substation Project, and (3) the Oakland Capacity and Resiliency Project.

## Q. Please describe the Pole Assessment, Repair, and Replacement Program.

A. This program includes the replacement and repair of poles and any associated supporting equipment for distribution class voltages. Transmission poles that fail inspection are replaced under a separate program. As required by Duquesne Light's Inspection and Maintenance ("I\&M") ${ }^{1}$ plan, the Company inspects distribution poles on a 12-year cycle. The I\&M plan also provides for the replacement of poles as necessary and appropriate based on the condition of the pole.

The Company anticipates making $\$ 61.3$ million of plant additions in the period from 2020 through 2022 as a result of this program.

## Q. Is this an increase from prior years?

A. Yes, Duquesne Light is projecting increased cost of plant additions for its Pole Assessment, Repair, and Replacement Program relative to prior years. A timeseries of plant additions related to the Pole Assessment, Repair, and Replacement Program can be found in the following table.

[^35]|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | ${ }^{\prime} 17-{ }^{\prime} 22$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  | - | - | - | HTY | FTY | FPFTY | - |
| \$ Millions | Actual | Actual | Actual | Actual | Forecast | Forecast | CAGR |
| Plant Additions | $\$ 9.9$ | $\$ 21.1$ | $\$ 24.7$ | $\$ 21.3$ | $\$ 22.1$ | $\$ 20.8$ | $16.0 \%$ |

Table 7 - Pole Assessment, Repair, and Replacement Additions, 2017-2022

The table, above, shows an increase in plant additions related to the Company's Pole Assessment, Repair, and Replacement Program beginning in 2018. This increase is driven both by an increased failure rate in the Company's pole inspections, which has resulted in the need to replace a larger number of poles, and by an increase in the number of poles contracted out for replacement due to internal resource constraints resulting from the need to replace more poles, which has resulted in a higher unit-cost than internally replaced poles. The increased failure rate that Duquesne Light has experienced is the result of a combination of the condition of the poles in the specific geographic areas being inspected and the implementation of a new, more accurate testing methodology by the Company. To help mitigate the increase in plant additions, Duquesne Light began in 2019 to reinforce, as opposed to replace, certain poles that did not pass inspection. These facts are seen in the following table.

|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | ${ }^{\prime} 17-{ }^{`} 22$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  | - | - | - | HTY | FTY | FPFTY | - |
|  | Actual | Actual | Actual | Actual | Forecast | Forecast | CAGR |
| Poles Inspected | 18,363 | 17,955 | 18,325 | 17,781 | 18,181 | 18,000 | $(0.4 \%)$ |
| Inspection Failure Rate | $7.4 \%$ | $9.3 \%$ | $10.6 \%$ | $11.7 \%$ | $11.5 \%$ | $11.5 \%$ | $9.3 \%$ |
| Poles Failed | 1,354 | 1,662 | 1,949 | 2,074 | 2,091 | 2,070 | $8.9 \%$ |
| Poles Reinforced | - | - | 186 | 463 | 455 | 450 | N/A |
| Poles Replaced | 1,175 | 1,614 | 1,998 | 1,644 | 1,808 | 1,620 | $6.6 \%$ |
| Plant Additions (\$ Millions) | $\$ 9.9$ | $\$ 21.1$ | $\$ 24.7$ | $\$ 21.3$ | $\$ 22.1$ | $\$ 20.8$ | $16.0 \%$ |
| Plant Additions / Pole Replaced | $\$ 8,426$ | $\$ 13,073$ | $\$ 12,362$ | $\$ 12,956$ | $\$ 12,223$ | $\$ 12,840$ | $8.8 \%$ |

Table 8 - Pole Inspections and Replacement, 2017-2022

This table illustrates a relatively constant level of Plant Additions related to pole replacements over the 2018 through 2022 period. Duquesne Light expects Plant Additions to remain generally around this same level through at least the time that the current twelve-year inspection and replacement cycle is completed.

## Q. Please describe the Establish Riazzi Substation Project.

A. The Oakland area is a highly concentrated load center on the Duquesne Light system. There are four universities, three hospitals, two museums, and densely arranged homes, shops, and restaurants. Presently, this area is supplied by a single source, Oakland Substation. There are 22 circuits emanating from Oakland Substation with limited capacity ratings. The capacity ratings are limited due to the fact that Duquesne Light's distribution circuits are predominantly underground in Pittsburgh's urban Oakland neighborhood, and because underground distribution circuits located in the same duct bank cause each other to heat up, thermally, in a phenomenon known as "mutual heating." When distribution circuits are subject to thermal heating, they lose electric distribution capacity. Due to anticipated load growth and limited circuit ampacity, an additional power source to Oakland

Substation must be established in the form of a new $138 \mathrm{kV}-23 \mathrm{kV}$ substation. This substation is to be known as Riazzi Substation, and it will be located centralized to Oakland Substation's load center. Riazzi Substation will provide power to customers in the neighborhoods of Oakland, Shadyside, Squirrel Hill, Greenfield, Hazelwood, and Point Breeze.

This project will establish a new bulk substation in the Panther Hollow area and adjacent to the underground Arsenal - Oakland 138 kV transmission line to allow the line to be looped into the station. The substation is to consist of a 138 kV ring bus with four bus sections; two $100 \mathrm{MVA}, 138 \mathrm{kV}-23 \mathrm{kV}$ power transformers; and three 23 kV bus sections each containing five 23 kV circuit positions.

The Company anticipates making $\$ 36.7$ million of plant additions in the period from 2020 through 2022 as a result of this project.

## Q. Please describe the Oakland Capacity and Resiliency Project.

A. The establishment of Riazzi Substation provides an alternate power source to supply the Oakland area. The Establish Riazzi Substation project plan includes construction of the substation and two distribution circuit getaways. The Oakland Capacity and Resiliency Project will fully utilize Riazzi Substation by establishing additional distribution duct paths and circuits. This expansion is intended to alleviate forecasted overloads of Oakland Substation distribution circuits, eliminate Oakland Substation circuits in order to increase ratings of the remaining circuits, and transfer large customers from Oakland Substation to Riazzi Substation in order to be able to support these and other customers. The scope of this project is to install
and extend an additional seven 23 kV circuits and underground infrastructure in and around Riazzi Substation.

The Company anticipates placing $\$ 17.6$ million of plant additions in service in the period from 2020 through 2022 as a result of this project.
Q. You mentioned that the T\&D System Capacity and Reliability category included $\$ 82.3$ million in LTIIP programs and projects. Please explain.
A. On April 15, 2016, Duquesne Light filed a Petition for Approval of its LTIIP ("LTIIP Petition") at docket number P-2016-2540046. In the LTIIP Petition, Duquesne Light requested that the Commission approve its proposal for accelerating the repair, improvement and replacement of aging infrastructure for the six-year period beginning January 1, 2017. The Company's LTIIP was approved on September 15, 2016.

On May 26, 2016, the Company filed a petition seeking approval of a Distribution System Improvement Charge ("DSIC"). By Order entered April 20, 2017, the Commission approved the Company's DSIC at docket number P-20162540046. The Company recovers some costs associated with its LTIIP through its DSIC. As explained in the testimony of Mr. Davis (DLC Statement No. 1) and Mr. Ogden (DLC Statement No. 16), the Company is proposing to roll current DSIC into base rates and to reset the DSIC rate to zero.
Q. Please explain T\&D Support as a primary reason for making plant additions.
A. Meeting the critical needs of Duquesne Light customers requires more than an electric distribution system. It requires assets to support the workforce who operate and maintain that system and provide other services to the Company's customers. T\&D Support plant additions include items such as new vehicle purchases needed to replenish Duquesne Light's fleet upgrades to existing facilities, and the construction of new facilities needed to support the Company's workforce.

Forecasts of plant additions for T\&D Support are based on past experience for items such as facility upgrades, and on analysis of needs for items such as new facilities and vehicle replacements.
Q. Please summarize the types of plant additions that are included in the January 1, 2020, through December 31, 2022, projections for T\&D Support.
A. In the time period of 2020, 2021, and 2022, Duquesne Light will anticipates making $\$ 80.7$ million in T\&D Support plant additions. These plant additions are primarily programmatic in nature, and include annual additions to vehicle, metering, facility, communications, and tools and testing equipment plant.
Q. Please explain IT Programs and Projects as a primary reasonfor making plant additions.
A. Meeting the critical needs of customers requires IT assets to support the workforce and systems that serve them.
Q. Please summarize the types of plant additions that are included in the $\mathbf{2 0 2 0}$, 2021, and 2022 projections for IT Programs and Projects.
A. IT Programs and Projects plant additions include corporate applications, cyber security, and Supervisory Control and Data Acquisition ("SCADA"), amongst other needs. Forecasts of plant additions for IT Programs and Projects typically are based both on past experience, on analyses of future needs for items such as hardware and software upgrades or supplements, and on the specifics of projects' scopes. Some of these projects, like the OMS implementation, have a direct impact on Duquesne Light's reliability.

The Company anticipates placing $\$ 101.4$ million of plant additions in service in the period from 2020 through 2022 as a result of IT Programs and Projects.

## Q. Please describe the OMS Project.

A. The OMS Project is expected to automate Duquesne Light's methods of handling outages by utilizing a single system to group outages, track customers without power, manage crews, update estimated times of restoration, and initiate automated restoration verification.

The Company's outage management process currently relies on the use of paper maps, multiple computer applications and stand-alone databases to support outage restoration. In today's process, an Outage Analysis System ("OAS") processes customer calls and lists all electrical circuits in the vicinity. Employees manually group customer outages together once the affected circuit is identified
and estimate the total number of customers without power. The outage management process currently is labor intensive, as it requires teams of individuals to sort and group individual trouble tickets, estimate customers out of power, enter data into various computer systems, and perform manual customer callbacks.

The OMS implemented as part of this project will digitize and automate Duquesne Light's current outage management process. For instance, where Duquesne Light today has employees manually grouping customer outages together once the affected circuit is identified and estimating the total number of customers without power, in the future, the OMS automatically will group and count customers together based on their electrical connectivity to one another. Similarly, where the Company today must manually create the equivalent of a work order into a restoration-specific work management system to repair identified trouble, in the future, the OMS will serve as that same restoration-specific work management system and eliminate the need for "swivel-chair" data-entry or for electronic integrations between disparate restoration-related systems. With these improvements to digitize and automate Duquesne Light's existing outage management process, the Company believes that it should be able to decrease the time and resources required to restore electric distribution service to our customers following an outage.

The Company anticipates placing $\$ 10.1$ million of plant additions in service in the period from 2020 through 2022 as a result of the OMS Project.

## VI. VEGETATION MANAGEMENT

Q. Please describe the Company's vegetation management program.
A. Duquesne Light professionally manages a comprehensive vegetation program utilizing industry best management practices to provide safe and reliable distribution service. This program is specifically designed for the management of vegetation along Duquesne Light's rights-of-way ("ROW") for the dependable operation of its distribution ( $4 \mathrm{kV}, 23 \mathrm{kV}$, and 23 TkV ) system and includes: (i) select tree pruning and removal within or along the ROW, (ii) hazard tree assessment and the removal of defective, dead, or diseased trees within or along the ROW, and (iii) the selective mechanical and/or chemical control of incompatible tall-growing brush within the ROW. Specific methods for line clearance are chosen based on the type of work involved while achieving it in a professional, economical, and environmentally sound manner. This year-round operation ensures that the safety and reliability of approximately 7,500 distribution circuit miles complies with regulatory standards. The present frequency of vegetation management activities for the distribution system ranges between four to six years.

## Q. What level of cost is the Company projecting for its vegetation management program for the FPFTY?

A. In total, the Company plans to spend $\$ 20.8$ million, comprising both expense and capital costs, for its vegetation management program in the FPFTY. The Company is requesting $\$ 11.3$ million of vegetation management expense in the FPFTY for pruning and selective mechanical and/or chemical control of incompatible tallgrowing brush within the ROW. Additionally, the Company plans to make $\$ 9.5$
million of vegetation management capital expenditures in 2022 related to tree removals and other ROW clearing.

## Q. Is this an increase from prior years?

A. Yes, the Company's projected spending for its vegetation management activities in the FPFTY does represent an increase from prior years. Duquesne Light is require d to manage vegetation within or along 1,300 miles of distribution circuits annually, and these activities result in a mixture of both expense for pruning-type activities and capital for removal-type activities. Depending on the vegetation management needs of the specific distribution circuit-miles maintained in a given calendar year, the mixture of pruning-type (i.e., expense) vs. removal-type (i.e., capital) activities may fluctuate in a given calendar year. For this reason, looking at the total cost of vegetation management activities, defined as the sum of both the pruning-type (i.e., expense) and removal-type (i.e., capital) costs, provides the most meaningful view of the true cost of the Company's vegetation management program. Additiona lly, again dependent on the needs of the specific 1,300 circuit-miles maintained in a given calendar year, each expense, capital, and total vegetation management costs may fluctuate slightly from year to year. For this reason, a rolling arithmetic mean (e.g., a three-year mean) provides a normalized sense of cost-levels. The following table provides time-series data for the Company's vegetation management costs.

Table 9 - Vegetation Management Costs, 2017-2022

|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | $\prime 17-{ }^{\prime} 22$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  | - | - | - | HTY | FTY | FPFTY | - |
| $\$$ Millions | Actual | Actual | Actual | Actual | Forecast | Forecast | CAGR |
|  |  |  |  |  |  |  |  |
| Expense | $\$ 11.7$ | $\$ 11.4$ | $\$ 11.9$ | $\$ 9.9$ | $\$ 8.7$ | $\$ 11.3$ | $(0.8 \%)$ |
| Capital | $\$ 3.4$ | $\$ 3.4$ | $\$ 5.2$ | $\$ 9.0$ | $\$ 7.5$ | $\$ 9.5$ | $23.1 \%$ |
| Total | $\$ 15.1$ | $\$ 14.8$ | $\$ 17.1$ | $\$ 18.9$ | $\$ 16.3$ | $\$ 20.8$ | $6.6 \%$ |
| 3-Year Mean | $\$ 15.0$ | $\$ 15.2$ | $\$ 15.7$ | $\$ 16.9$ | $\$ 17.4$ | $\$ 18.6$ | $4.4 \%$ |

Focusing on the "3-Year Mean" for the Company's total vegetation management costs, one can see that these costs are forecast to increase at a compound annual growth rate ("CAGR") of $4.4 \%$ over the 2017 to 2022 period. This increase is driven primarily by Duquesne Light's removal-type (i.e., capital) costs, which are forecast to increase at a CAGR of $23.1 \%$ over the 2017 to 2022 period.

With specific respect to vegetation management expense, the above table also illustrates that, while 2020 and 2021 were relatively low years for expense, Duquesne Light's forecasted 2022 level for expense is in line with the 2017 through 2019 period.

With specific respect to vegetation management capital, it is worth noting that the one-time removal-type (i.e., capital) activities ultimately should serve to reduce ongoing pruning-type (i.e., expense) activities, thereby reducing the multiyear total cost of Duquesne Light's vegetation management activities for the Company's customers. Ultimately, Duquesne Light's vegetation management capital should reduce over time as fewer removal-type activities remain on or near the Company's ROWs, and the ongoing pruning-type activities should be lower than current levels since fewer vegetation units remain to be pruned.

## Q. Why are the Company's vegetation management costs increasing for the FPFTY?

A. While the Company's planned FPFTY vegetation management costs of $\$ 20.8$ million is an increase from prior years, this fact is more a function of the size and quantity of the vegetation-units of the specific circuits along which Duquesne Light plans to manage vegetation in the FPFTY than it is a reflection of either (1) a change in total circuit-miles to be maintained, which remain fixed at the Company's required 1,300 distribution circuit-miles per year, or (2) a change to the specifications in accordance with which Company's manages vegetation along its circuits.

Duquesne Light's total vegetation management cost is a function of the number of vegetation-units (i.e., trees) along the 1,300 distribution circuit-miles per year that the Company manages. Duquesne Light's vegetation management contractors walk the distribution circuit-miles that the Company intends to manage each year and conduct an inventory of the different vegetation-units that will be managed. In this manner, the Company creates an annual work plan and associated cost forecast for the 1,300 distribution circuit-miles that it will maintain in a given calendar year.

Since 2017, Duquesne Light has increased its focus on removal-type (i.e., capital) vegetation management activities as a means by which to improve the reliability of the Company's electric distribution service for the benefit of our customers. Specifically, Duquesne Light has been working to expand the removal
of vegetation units to the full width of the Company's ROW. Additionally, in cooperation with landowners adjacent to the Company's ROWs, Duquesne Light has removed trees alongside of, as opposed to within, the Company's ROWs to reduce the risk of certain trees falling into the ROWs and causing a service interruption. This focus on expanding the width of Duquesne Light's managed corridors has increased the number of removal-type (e.g., capital) vegetation units that the Company has encountered in managing vegetation within and along its annual requirement of 1,300 distribution circuit-miles, and this fact is reflected in Duquesne Light's increased cost of removal-type (i.e., capital) vegetation management. These capital costs ultimately should decrease to lower levels once the Company has completed expanding the width of its managed corridors.

## Q. What impact will the Company's FPFTY vegetation management program have on its reliability of service?

A. As discussed above, Duquesne Light expects to be removing more vegetation-units in the FPFTY than it did in the HTY and FTY. As each vegetation-unit along the Company's circuits poses a potential threat to reliability, Duquesne Light's plan to remove more vegetation-units in the FPFTY is anticipated to result in a commensurately increased level of risk-reduction for the Company with respect to vegetation-driven electric distribution service interruptions experienced by its customers, all else equal.
VII. CONSOLIDATED TAX SAVINGS ADJUSTMENT ("CTA")
Q. In Mr. Simpson's Exhibit MLS-2, he calculates the CTA to be $\mathbf{\$ 5 . 8}$ million. Has Duquesne Light used at least 50 percent of that amount to support reliability or infrastructure related plant additions?
A. Yes. Duquesne Light projects placing approximately $\$ 549.9$ million of Distribution Plant additions in service in the period from 2020 through 2022, $\$ 82.3$ million of which are attributable to LTIIP Initiatives. This leaves $\$ 467.6$ million of Distribution Plant additions projected to be placed in service in excess of the Company's LTIIP plant in the period from 2020 through 2022. This $\$ 467.6$ million amount is much greater than $50 \%$ of the $\$ 5.8$ million amount that Mr. Simpson identifies as the CTA.

## VIII. CONCLUSION

Q. Are the plant additions and other programs described in your testimony necessary?
A. Yes, they are. The plant additions and other programs described herein are necessary to meet the needs of Duquesne Light's customers.
Q. Has the Company included any plant additions related to its LTIIP in its rate base claim in this proceeding?
A. As explained in the Direct Testimony of Mr. Davis, DLC Statement No. 1, and Mr. Ogden, DLC Statement No. 16, the Company is proposing to roll its LTIIP-related plant additions and other DSIC-eligible rate base into base rates at this time and not recover further costs through the Distribution System Improvement Charge, until
such time as the Company's DSIC-eligible rate base investment exceeds the levels identified for the FPFTY.
Q. Does this conclude your direct testimony?
A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

## Exhibit BBM-1

## Duquesne Light Company

January 1, 2020 through December 31, 2022 Projected Plant Additions (by Category)
(\$)

|  | 2020 | 2021 | 2022 | 2021-2022 | 2020-2022 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | HTY | FTY | FPFTY | TOTAL | TOTAL |
|  |  |  |  |  |  |
| TRANSMISSION \& DISTRIBUTION |  |  |  |  |  |
| Service Restoration | \$39,639,571 | \$35,757,076 | \$35,933,174 | \$71,690,250 | \$111,329,820 |
| Customer Commitments | 20,966,621 | 23,596,974 | 23,717,968 | 47,314,942 | 68,281,563 |
| Programs | 58,029,045 | 66,657,723 | 68,854,350 | 135,512,073 | 193,541,118 |
| Projects | 45,469,321 | 105,193,380 | 89,095,976 | 194,289,356 | 239,758,676 |
| LTIIP Initiatives | 41,169,684 | 20,889,335 | 20,224,819 | 41,114,154 | 82,283,838 |
| System Capacity and Reliability | 144,668,050 | 192,740,438 | 178,175,144 | 370,915,582 | 515,583,632 |
| Support | 24,063,494 | 30,396,186 | 26,250,880 | 56,647,065 | 80,710,559 |
| Sub-Total | \$229,337,736 | \$282,490,673 | \$264,077,167 | \$546,567,839 | \$775,905,575 |
|  |  |  |  |  |  |
| INFORMATION TECHNOLOGY |  |  |  |  |  |
| Projects and Programs | 26,342,784 | 37,322,002 | 37,716,555 | 75,038,557 | 101,381,341 |
|  |  |  |  |  |  |
| TOTAL | \$255,680,520 | \$319,812,675 | \$301,793,722 | \$621,606,397 | \$877,286,917 |

## Exhibit BBM-2

## Duquesne Light Company

## January 1, 2020 through December 31, 2022 Projected Plant Additions (by FERC Account)

(\$)

|  | $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ | $\mathbf{2 0 2 1 - 2 0 2 2}$ | $\mathbf{2 0 2 0 - 2 0 2 2}$ |  |
| :--- | ---: | ---: | ---: | ---: | ---: |
|  |  | $H T Y$ | $F T Y$ | $F P F T Y$ |  |
|  |  |  |  |  |  |


| Sub-Total | \$53,880,809 | \$48,487,558 | \$83,640,245 | \$132,127,803 | \$186,008,612 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| DISTRIBUTION PLANT |  |  |  |  |  |
| 360 - Land and land rights | \$- | \$- | \$- | \$- | \$- |
| 361 - Structures and improvements | 312,432 | 973,216 | 1,330,582 | 2,303,799 | 2,616,230 |
| 362 - Station equipment | 17,912,406 | 27,022,055 | 8,611,115 | 35,633,170 | 53,545,576 |
| 364 -Poles, towers and fixtures | 65,826,351 | 35,412,401 | 31,265,580 | 66,677,981 | 132,504,332 |
| 365 - Overhead conductors, devices | 40,567,561 | 38,307,678 | 33,148,115 | 71,455,793 | 112,023,354 |
| 366 - Underground conduit | 746,632 | 43,871,172 | 23,826,852 | 67,698,024 | 68,444,656 |
| 367 - Underground conductors, devices | 16,809,585 | 15,558,996 | 19,744,819 | 35,303,815 | 52,113,399 |
| 368 - Line transformers | 24,944,060 | 35,469,612 | 29,966,741 | 65,436,353 | 90,380,413 |
| 369 - Services | 2,762,070 | 6,351,565 | 6,000,837 | 12,352,402 | 15,114,473 |
| 370 - Meters | 7,065,279 | 5,433,694 | 5,465,856 | 10,899,550 | 17,964,829 |
| 371 - Installs customer premise | - | - | - | - | - |
| 373 - Street lighting, signal system | 1,918,068 | 1,613,451 | 1,621,983 | 3,235,433 | 5,153,502 |
| Sub-Total | \$178,864,443 | \$210,013,839 | \$160,982,481 | \$370,996,320 | \$549,860,763 |
|  |  |  |  |  |  |
| GENERAL PLANT |  |  |  |  |  |
| 389 - Land and land rights | \$- | \$- | \$- | \$- | \$- |
| 390 - Structures and improvements | 2,435,532 | 14,020,764 | 9,632,696 | 23,653,460 | 26,088,992 |
| 391 - Office furniture, equipment | $(2,822,557)$ | 8,132,416 | 10,822,001 | 18,954,417 | 16,131,860 |
| 392 - Transportation equipment | 7,726,393 | 6,000,000 | 6,000,000 | 12,000,000 | 19,726,393 |
| 393 - Stores equipment | 207,126 | - | - |  | 207,126 |
| 394 - Tools, shop, garage equipment | 2,088,935 | 1,577,829 | 1,577,766 | 3,155,595 | 5,244,530 |
| 395 - Laboratory equipment | - | - | - | - | - |
| 396 - Power operated equipment | - | - | - | - | - |
| 397 - Communication equipment | 596,731 | 1,933,036 | 1,906,217 | 3,839,253 | 4,435,984 |
| 398 - Miscellaneous equipment | - | - | - | - | - |
| 399 - Other tangible property | - | - | - | - | - |
| Sub-Total | \$10,232,160 | \$31,664,045 | \$29,938,680 | \$61,602,725 | \$71,834,885 |


| ADVANCED METERING INFRASTRUCTURE (AMI) SURCHARGE PLANT |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |
| 303 - Miscellaneous intangible plant | \$- | \$- | \$- | \$- | \$- |
| 370 - Meters | - | - | - | - | - |
| 397 -Communication equipment | - | - | - | - | - |
| Sub-Total | \$- | \$- | \$- | \$- | \$- |
|  |  |  |  |  |  |
| TOTAL | \$255,680,520 | \$319,812,675 | \$301,793,722 | \$621,606,397 | \$877,286,917 |

BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 5

Direct Testimony of
Krysia Kubiak

Subjects: New Business Stimulus Rider and Crisis Recovery Program

Dated: April 16, 2021

## I. INTRODUCTION

Q. Please state your full name and business address.
A. My name is Krysia Kubiak. My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. By whom are you employed and in what capacity?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, External Affairs.
Q. What are your job responsibilities?
A. In my role with Duquesne Light, I oversee our teams that handle Regulatory Affairs, Government Affairs, Clean Energy and New Development Connections, which helps new customers with seamless transition to obtaining service for large construction projects.

## Q. What is your educational background?

A. I am a licensed attorney in Pennsylvania. I graduated from Swarthmore College in 1994, and from the College of William and Mary, Marshall-Wythe School of Law in 1997 with a Juris Doctorate.

## Q. Please describe your professional experience.

A. I am in my fourteenth year working for Duquesne Light. Prior to my current role, I worked as an attorney for the Company handling litigation, Pennsylvania Public Utility Commission ("PUC" or "Commission") complaints and legal work atPJM Interconnection

LLC ("PJM") and the Federal Energy Regulatory Commission ("FERC"). In those prior roles, I developed an in-depth working knowledge of the legal and regulatory frameworks that guided the Company's customer-engagement, rate-setting, and financial assistance programs.

## Q. What is the purpose of your testimony?

A. The purpose of my testimony is to provide details supporting the proposal by Duquesne Light to create two tariff riders that assist new and existing businesses that have experienced financial hardship due to the COVID-19 pandemic. The remainder of my testimony is organized as follows: Section II describes the COVID-19 pandemic and the impact on the business community, Section III describes the New Business Stimulus Rider ("NBSR") proposal available to new customers in certain districts, and Section IV describes the Crisis Recovery Program ("CRP") available to existing business customers who have been financially impacted by the COVID-19 pandemic.

## II. BACKGROUND

## Q. Are you generally familiar with the COVID-19 pandemic?

A. Yes. In or around March 11, 2020, the World Health Organization and the Centers for Disease Control and Prevention ("CDC") declared a novel coronavirus ("COVID-19") a "public health emergency of international concern," and the U.S. Department of Health and Human Services ("HHS") Secretary declared that COVID -19 created a public health emergency. On March 6, 2020 Pennsylvania Governor Tom Wolf proclaimed the existence of a state-wide disaster emergency pursuant to 35 Pa . C.S. § 7301(c). Then, on

March 19, 2020, Governor Wolf issued an Executive Order mandating all non-lifesustaining businesses in Pennsylvania close their physical locations because of the COVID19 crisis. As a result, many Pennsylvanians are experiencing financial hardship. On April 1, 2020, Governor Wolf issued a statewide stay-at-home order, allowing Pennsylvania residents to leave their homes only for certain allowable activities and travel. On April 15, 2020, the Pennsylvania Secretary of Health issued an order directing life-sustaining businesses to institute mitigation measures to protect the safety of employees and customers. As mitigation efforts through the spring and into the summer limited the spread of the virus, case counts were relatively low. In the fall of 2020, with the resumption of certain congregant activities and in-person business operations, a resurgence of the pandemic caused the Governor and Secretary of Health to repeatedly adjust their response and renew mitigation orders at various times relating to limiting gatherings in social settings, teleworking, business occupancy limits, alcohol sales and other restrictions on business operations. As part of the November 23, 2020 order, the Secretary observed, "Despite the efforts taken to date, the pandemic continues to spread, and taking action to prevent that spread while continuing to allow for necessary resumption of economic and social activity requires the Commonwealth to take steps to minimize the danger to Pennsylvanians as a result of participating in that activity." To limit spread related to Thanksgiving holiday travel, the Governor concurrently issued a stay-at-home advisory extending through January 4, 2021. That order halted all sit-down service for bars and restaurants. According to the Pennsylvania COVID-19 Mitigation Guidelines as of late January 2021, in-person businesses may operate at $75 \%$ occupancy, except in the following instances: self-certified restaurants are restricted to $50 \%$ capacity for indoor dining; on-
premises alcohol consumption is conditionally permitted until 11 p.m.; gyms and spas are restricted to $50 \%$ occupancy with appointments strongly encouraged; entertainment venues such as casinos, theaters, and shopping malls are permitted to open at $50 \%$ occupancy.

Governor Wolf further amended his November 23, 2020 order, directing Mitigation, Enforcement and Immunity Protections, such that on April 4, 2021 those businesses identified above with $50 \%$ capacity restrictions were allowed to expand operations to $75 \%$ occupancy. Social distancing, face covering, and other mitigation measures still apply.

While Duquesne Light supports these efforts to protect public health and reduce the spread of the COVID-19 virus, the Company recognizes that many businesses have been adversely and disproportionately affected as a result of the restrictions. Specifically, small businesses such as a restaurants, bars, gyms, child care centers and event venues have been the hardest hit throughout this pandemic. Despite the recently expanded capacity, negative residual impacts, including reluctant consumer behavior, will continue to affect businesses to a significant degree for the foreseeable future.

## Q. How has the COVID-19 pandemic affected businesses in Duquesne Light's service territory?

A. Duquesne Light furnishes electric service to more than 600,000 customers throughout its certificated service territory, which includes all or portions of Allegheny and Beaver Counties and encompasses approximately 800 square miles in western Pennsylvania. Of the 600,000 customers, approximately 55,000 customers are commercial business accounts. According to a survey of economic impacts of the COVID-19 pandemic on
workers residing in Allegheny County conducted by the University Center for Social and Urban Research ("UCSUR") at the University of Pittsburgh, $20.1 \%$ of workers employed at the beginning of March 2020 were no longer employed and receiving a wage or salary at the time of the survey conducted between April 15 and May 8, 2020. 83.1\% of these reported that their recent separation was due to COVID-19.

According to the Allegheny Conference on Economic Development's ("ACED") Redefined Growth Outlook for Key Sectors and Near-term Solvency Risks for Small Businesses, "... the region has lost over 200,000 jobs and has yet to recover $45 \%$ of them [as of October 2020]. This represents a deeper setback than we experienced during the Great Recession and even during the collapse of Pittsburgh's industrial economy in the early '80s." Further, ACED offers, "Small businesses in the Pittsburgh region are important engines of our region's economy, accounting for $99 \%$ of all businesses and $75 \%$ of all jobs. They play an integral role in every industry. Many of these businesses could not absorb the pandemic-induced economic shock and are struggling to remain open. It is vital that we shore up these lifelines for economies across our region, both related to jobs and tax revenue for our towns and boroughs and to the essential role they play in community vitality and sense of place. Many of these establishments are points of pride in our communities and for our people - and must be supported as we move forward." The ACED analysis indicates that between a quarter and a third of small businesses (14,000 21,000 ) in the Pittsburgh region, accounting for between $100,000-188,000$ jobs, are at risk of closing permanently.

Data presently available to the Company demonstrates that small and medium commercial customers are struggling to make payments. Duquesne Light anticipates that
small and medium commercial customers who have made timely payments prior to the COVID-19 pandemic may increasingly become payment troubled due to the ongoing pandemic. As of September 2020, small and medium commercial customers in Duquesne Light's service territory are carrying approximately $\$ 2$ million more in delinquencies compared to September 2019. The Company has observed that this payment difficulty has affected certain businesses disproportionately, while other businesses continue to operate with no delinquencies or delays in bill payment.

## Q. Have certain industries been disproportionately impacted by the COVID-19 pandemic?

A. Yes. Due to the inherent nature of their operations, certain businesses are particularly challenged to operate effectively, or at all, under the restrictions imposed to mitigate the spread of the virus. Childcare centers, retail boutiques, restaurants, and bars have closed in Duquesne Light's service territory. Many of the businesses that were once the heart of small town "main streets" are now shuttered. Regional results mirror national data which indicates that leisure and hospitality sector jobs were hardest hit, with an $11.7 \%$ year-overyear increase in the December unemployment rate for restaurants, bars, and similar hospitality venues. Personal service sector businesses, such as laundry and dry-cleaning services, have also struggled to rebound, with a $4.2 \%$ year-over-year unemployment rate increase. Allegheny Conference data for the region indicates that leisure and hospitality sector employment has only rebounded to between $70-75 \%$ of pre-COVID levels.

A Penn State Harrisburg Institute of State and Regional Affairs report, The Impact of COVID-19 on Pennsylvania Child Care, estimates that at least 280 child care providers
will close permanently statewide, with another 1,000 at risk of closure. Those providers which remain open and operating will continue to struggle with reduced capacity (and thereby reduced operating revenue) and ongoing overhead, payroll and facility expenses.
Q. Basedon the results of the analysis, has the Company de veloped aproposal to provide assistance to new or existing "main street" businesses in its service territory?
A. Yes. The Company has developed two riders that are designed to restore vitality on main streets and assist existing businesses that have experienced financial hardship due to the COVID-19 pandemic. The first rider is the New Business Stimulus Rider ("NBSR"): a temporary discount provided to new small and medium commercial customers to incentivize new business development in vacant "main street" store fronts. The second rider is the Crisis Recovery Program ("CRP"): a temporary program for small and medium commercial customers that have become payment troubled and developed delinquent balances as a result of the COVID-19 pandemic.

## III. PROPOSED NEW BUSINESS STIMULUS RIDER

## Q. Please summarize the Company's New Busine ss Stimulus Rider ("NBSR") proposal.

A. Duquesne Light's NBSR is designed to assist new customers who are billed in accordance with the following rate schedules as defined in the Company's Retail Electric Tariff: General Service Small ("GS"), General Service Medium Heating ("GMH"), General Service Medium < 25 kW and General Service Medium $>25 \mathrm{~kW}$ (collectively, "GM"). New GS, GM, and GMH customers who apply for new electric service in a vacant storefront after June 1, 2021 will be eligible for a reduced distribution rate for 2 years,
beginning at enrollment. Enrolled GS, GM, and GMH customers will receive a 30\% discount on the variable base distribution charges (distribution kilowatt hour and demand) portions of their bills. Mr. O'Brien discusses the costs associated with the NBSR in his direct testimony, Statement No. 10.

## Q. What is the purpose of Duquesne Light's NBSR?

A. The NBSR will help support the rebuilding of small communities' business districts by incentivizing new businesses to occupy and operate from vacant storefronts in certain communities in Duquesne Light's service territory by providing them with a reduced distribution rate for 2 years.
Q. How will the Company's NBSR attract or retain businesses in Duquesne Light's service territory?
A. Research conducted among GS, GM, and GMH businesses in February 2021 indicates that the NBSR is a welcomed opportunity for new businesses to get started on the right foot. A majority of respondents ( $70 \%$ ) expect the reduced distribution rate to be valuable to new businesses, primarily because it provides some relief after incurring start-up costs, as well as allowing for business owners to focus on other factors related to growing the business.

## Q. Is Duquesne Light's NBSR consistent with the PUC's mission?

A. Yes. The PUC's mission includes balancing the needs of consumers and utilities, furthering economic development. Both components of the Company's COVID-19

Stimulus Rider align with the PUC's mission to balance the need of utilities and customers, while also encouraging economic development.

## Q. Who is eligible for the NBSR?

A. Duquesne Light's NBSR will be available to new retail customers who will be billed in accordance with the GS, GM, or GMH rate schedules who apply to establish new electric service in a vacant storefront or brick-and-mortar location after June 1, 2021 within a Local Neighborhood Commercial ("LNC") Districts, as defined by City of Pittsburgh Code of Ordinances, or Qualified Low-Income Census Tracts ("QCT") as defined by the United States Department of Housing and Urban Development, or Neighborhood Assistance Program ("NAP") Districts, as defined by the United States Department of Housing and Urban Development.

## Q. How long will enrollees benefit from the NBSR?

A. The NBSR will provide a discounted rate for 2 years. Upon enrollment, eligible customers will receive a $30 \%$ discount on the variable base distribution portion of their bill for a period of no more than 2 years from commencing service or until December 31, 2024, whichever occurs earlier.

## Q. How will the potential enrollees apply for the NBSR?

A. When potential customers call for service, the customer will be screened then for eligibility in the program, and a customer service representative will send the customer a link to the
form to certify that they fit the criteria. Upon review, the business will be notified if they are eligible for the program.
Q. How will the Company promote or otherwise identify eligible customers for the NBSR?
A. When promoting a program to customers, Duquesne Light uses multiple channels to ensure broad delivery across our diverse customer base. This program will be promoted in targeted bill messages directly to customers, through social media channels, email communication, and on the DuquesneLight.com website, where it will be featured on a relevant landing page and highlighted on a promotional basis on the homepage carousel. The Company will also proactively reach out to development corporations and other community-based nonprofit organizations to promote the program. Customers will be referred to contact the Company's Business Contact Center, consisting of a group of Customer Service Representatives ("CSRs") who are trained to address questions presented by small and medium commercial customers.

## Q. Are NBSR customers eligible for other discounts offered by the Company during their enrollment?

A. No. Enrolled NBSR customers will be billed in accordance with the NBSR tariff provisions for a period of no more than 2 years from commencing service or until December 31, 2024, whichever occurs earlier. The tariff provision for the NBSR is shown on Mr. Ogden's Exhibit DBO-1, which is the proposed tariff supplement to the currently effective Tariff Electric Pa. P.U.C. No. 25 implementing the proposed rates, riders and tariff revisions in this proceeding.

## Q. What is the expected cost associated with implementing the NBSR, and how was it derived?

A. The Company has estimated that it will provide approximately $\$ 276,000$ in discounts to enrolled customers. The discount cost estimate is based on an average of 270 new GS, GM, and GMH customers per year across Duquesne Light's service territory and assumes $100 \%$ enrollment.
Q. How is Duquesne Light proposing to recover the costs associated with the NBSR?
A. Duquesne Light proposes to recover the costs waived in accordance with the NBSR by incorporating the cost of the program into rates for GS, GM, and GMH customers. The Company is proposing to directly assign these costs to the rate classes that are eligible to participate in the COVID related programs (GS, GM $<25$, GM $>25$, \& GMH). The direct assignment is reflected within the Company's allocated cost of service model and will be reflected in each applicable customer class's base rates. The proposed costs are reflected on Exhibit DLC 2, Schedule D-13 within the Company's Fully Projected Future Test Year. The average bill impact is estimated to be an average of $\$ 0.28$ per month.

## Q. Do you believe that the proposed NBSR is cost-effective and reasonable?

A. Yes. This program is cost-effective in that it provides assistance for business customers at the time that they need assistance the most - in the beginning of their business, when most
businesses lose money. It is a reasonable cost for existing customers that will end up as a significant benefit for the enrollees. Additionally, it is a well-timed program since it incentivizes customers to begin businesses at a time there may still be impacts from the pandemic. Furthermore, the program will benefit other businesses in the area, by increasing the foot traffic on the "main street" corridors, which increases traffic for existing businesses.

## IV. PROPOSED CRISIS RECOVERY PROGRAM

## Q. Please describe the Company's Crisis Recovery Program ("CRP").

A. Duquesne Light's CRP is designed to assist existing GS, GM, or GMH customers who did not have an overdue account balance on February 29, 2020, but have since accumulated a balance. Program participants will have their existing delinquent account balances temporarily frozen over a period of 6 bills, beginning with the first bill that renders 6 or more days after enrollment.

## Q. Who is eligible for the CRP?

A. Existing customers billed in accordance with rates GS, GM, or GMH who did not have an overdue account balance on February 29, 2020, but have since accumulated a balance are eligible for the CRP. Existing customers who already have a payment arrangement on their account are also eligible, as long as they have complied with their existing payment arrangement. A customer who established service after February 29, 2020 and has since accumulated a balance would also be eligible for the CRP. Importantly, the customer must
demonstrate being impacted by the COVID-19 pandemic or subsequent orders from the Governor.

## Q. For how long would the CRP participant's balance be frozen?

A. CRP customers will have $25 \%$ of their frozen delinquent account balance forgiven if they pay their electric charges in full at the end of 6 billing cycles, beginning with the first bill that renders 6 or more days after enrollment. The Company will not pursue termination or collection action on the frozen account balance until after the due date for the sixth bill has lapsed. Accordingly, timely payment for each bill rendered while the delinquent balance is frozen is not required.

## Q. What happens at the end of the $\mathbf{6}$-bill period?

A. It depends on whether the enrolled customer paid their non-frozen electric charges in full at the end of 6 billing cycles. If the enrolled customer pays all their non-frozen electric charges, then $25 \%$ of the customer's frozen balance will be forgiven, and the customer will receive an 18-month payment arrangement on any remaining balance, unless the customer agrees to a shorter payment arrangement timeframe. If the enrolled customer does not make the appropriate payment, then the customer will receive an 18 -month payment arrangement on the entire delinquent balance. Customers will be responsible for paying their monthly electric charges in addition to their payment arrangement amount each month until their balance is paid in full.

## Q. Who is responsible for administering the CRP?

A. Duquesne Light Company's Business Contact Center will administer the CRP by verifying eligibility and setting up payment arrangements.
Q. How will Duquesne Light promote or otherwise identify potential CRP customers?
A. When promoting a program to customers, Duquesne Light uses multiple channels to ensure broad delivery across our diverse customer base. The CRP will be promoted in targeted bill messages directly to customers, through social media channels, email communication, and on the DuquesneLight.com website, where it will be featured on a relevant landing page and highlighted on a promotional basis on the homepage carousel. The Company will also proactively reach out to development corporations and other community-based nonprofit organizations to promote the program. Customers will be referred to contact the Company's Business Contact Center, consisting of a group of Customer Service Representatives ("CSRs") who are trained to address questions presented by small and medium commercial customers.

## Q. How will the Duquesne Light administer the CRP?

A. Once the customer is confirmed eligible for the CRP, the customer's existing account balance will be frozen for 6 billing cycles. Approximately 10 days before the end of the six billing cycles, the customer will receive a reminder that the customer must pay all charges billed since enrollment into the CRP in order to be eligible to have $25 \%$ of the account balance waived and an 18-month payment arrangement placed on the account for the remaining balance. The Company will evaluate the CRP customer's account balance at the end of the six billing cycles, and if the customer has paid non-frozen charges at the
end of the six billing cycles, the Company will waive $25 \%$ of the frozen account balance and provide the customer with an 18-month payment arrangement. Customers will be permitted to enter into shorter payment arrangements if desired.

## Q. Under the proposal, when is the CRP expected to be complete?

A. The CRP is designed to be a temporary program and enrollment in the CRP will end on June 30, 2022.

## Q. Are CRP customers eligible for other rate discounts offered by the Company during their enrollment?

A. No. Enrolled CRP customers will be billed in accordance with the CRP tariff provisions. The tariff provision for the CRP is shown on Mr. Ogden's Exhibit DBO-1, which is the proposed tariff supplement to the currently effective Tariff Electric Pa. P.U.C. No. 25 implementing the proposed rates, riders and tariff revisions in this proceeding.
Q. Please describe the be nefits that the Company expects to achieve with the CRP.
A. As stated above, many businesses are in danger of closing due to the financial pressures of the pandemic. This program gives a break to those customers and makes it easier for them to begin the process back to a full recovery. The company hopes that the 6 month break from paying on their balance along with the $25 \%$ reduction in debt will allow these businesses to start the post-pandemic time with a clean slate. Research conducted among GS, GM, and GMH business owners in February 2021 revealed that a strong majority (78\%) were negatively impacted by the COVID-19 pandemic. More than one-half of
respondents (54\%) cite concern for their business's ability to recover from the pandemic. In addition, $75 \%$ report knowing of at least one small or mid-sized business in their community that is considering closing their business as a result of the pandemic. Further, more than one-half of those surveyed (58\%) believe that support for struggling small businesses is insufficient. The CRP is viewed favorably among many customers surveyed, citing the opportunity to relieve a burden and focus on other expenses and recovery efforts. About one-half of customers surveyed (54\%) believe that the $25 \%$ reduction will provide much needed relief to struggling businesses in the community and $44 \%$ believe it will allow for a quicker recovery.

## Q. What is the expected cost associated with implementing the CRP, and how was it derived?

A. The write-off portion of the CRP program is estimated to be $\$ 400,000$, depending on enrollment, which was calculated by comparing current delinquencies in the GS, GM, and GMH rate classes with the historical delinquencies of the same rate classes.

## Q. How is Duquesne Light proposing to recover the costs waived in accordance with the CRP?

A. Duquesne Light proposes to recover the costs waived in accordance with the CRP by incorporating the cost of the program into rates for GS, GM, and GMH customers. The Company is proposing to directly assign these costs to the rate classes that are eligible to participate in the COVID related programs (i.e. GS, GM $<25, \mathrm{GM}>25$, \& GMH). The direct assignment is reflected within the Company's allocated cost of service model and will be
reflected in each applicable customer class's base rates. The proposed costs are reflected on Exhibit DLC 2, Schedule D-13, within the Company's Fully Projected Future Test Year. The average bill impact is estimated to be $\$ 0.31$ per month.
Q. Do you believe that the proposed CRP is cost-effective and reasonable?
A. Yes. This program allows customers a chance to get their feet under them. After facing months of losses, experts predict that 2022 will be a time for recovery. However, if businesses are still dealing with old debts that occurred during the pandemic, it will be difficult for them to move forward. This program gives businesses an incentive to pay their bill regularly, while giving them a discount for their effort.

## Q. Does this conclude your Direct Testimony at this time?

A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

## BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 6

Direct Testimony of Yvonne Phillips
Subject: Master Metering Proposal

Date: April 16, 2021

## DIRECT TESTIMONY OF YVONNE PHILLIPS

Q. Please state your full name and business address.
A. My name is Yvonne Phillips. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, Meter Operations.
Q. How long have you worked at Duquesne Light?
A. I have been employed by Duquesne Light since 2014.
Q. What are your current responsibilities?
A. I currently oversee the Meter Operations organization which includes Field Metering, Meter Shop, Meter Engineering, and our Smart Meter Operations Center.
Q. What are your qualifications, work experience and educational background?
A. I graduated from Seton Hill University with an MBA in 2004. I've held various utility management positions through my career with approximately 15 years in Metering.
Q. Are you sponsoring any exhibits, parts of exhibits or responses to the Commission's filing requirements as part of your direct testimony?
A. I am sponsoring the revision to tariff Rule 41 and the addition of Rule 41.1, included within witness Ogden's Exhibit DBO-1.
Q. What is the purpose of your direct testimony?
A. I address the Company's proposal to allow master-metering of certain new multifamily residential premises.
Q. Does the Company's tariff currently allow master metering of new residential multifamily premises?
A. No. Currently, Rule 41 of the Company's retail tariff prohibits residential master metering, providing that each residential dwelling unit in a building must be individually metered by the Company for buildings connected after January 1, 1981. Residential master metering would also violate tariff Rule 18, which provides that all electric energy shall be consumed by the customer to whom the Company supplies and delivers such energy, with limited exceptions.
Q. Why has the Company historically prohibited master metering of new residential multifamily premises?
A. The Company has not allowed master metering for residential customers for several reasons.

First, individual metering helps to ensure the Company can provide critic al customer protections and assistance programs. For example, the Company's Customer Assistance Program (CAP) offers benefits to low-income customers that are linked to the customer's individual Duquesne Light account. Without visibility to residential customers through single metering applications, these programs cannot be afforded to all eligible customers.

Second, individual metering affords customer access to advanced metering infrastructure (AMI) functionalities, such as increased customer visibility to their interval data, usage tracking tools, and suggestions on how customers can conserve energy.

Third, individual metering allows residential customers to choose their own electric generation supplier (EGS).

Fourth, individual metering protects against inappropriate or illegal use of landlord-owned tenant submeters. For example, landlord-owned tenant submeters installed behind a utility master meter could enable unscrupulous landlords to overcharge their tenants for electricity, or turn off tenants' electricity as a means of eviction.

## Q. Why is the Company making a proposal regarding master metering in this proce eding?

A. The Company is making a proposal in this proceeding pursuant to the Joint Petition for Settlement in its last base rates proceeding, Docket No. R-2018-3000124 ("Settlement"). Paragraph 59 of the Settlement provides:

Within 180 days of the effective date of rates, Duquesne Light will convene a non-confidential collaborative with all parties to the proceeding, and all interested stakeholders who are developers of multifamily housing within its service territory, to discuss the feasibility of revising its retail tariff to permit master-metering of multifamily housing. Parties to the collaborative will specifically consider:
a) Under what circumstances master-metering would be permitted, and the factors Duquesne Light would require a building owner to meet before approving a master-metering configuration;
b) The impact that any such tariff change would have on low income tenants' ability to continue to afford utility service;
c) The impact of individual customers not utilizing Advanced Metering Infrastructure ("AMI") meters; and
d) The impact that any such change would have on the Company's revenue allocation and the ability to meet its projected revenue requirements.

The parties to the collaborative will make a good faith effort, in coordination with the Company, to develop consensus on the scope of a tariff revision that permits master-metering, taking into consideration all of the foregoing factors. Additional collaborative meetings will be held thereafter, as necessary, but not less than on an annual basis, in an effort to reach consensus on any issues which remain unresolved after the first collaborative is held. Based on feedback from the collaborative meetings, Duquesne Light will present a proposal regarding master-metering of multifamily housing buildings as a part of its next general base rate case. The treatment of any alleged confidential information during the collaborative will be subject of an agreement of the parties and stakeholders participating in the collaborative.

## Q. Please summarize the Company's master metering proposal.

A. The Company is proposing to permit master metering for new residential multifamily premises where the premise:

- Is a new service (i.e., new construction or otherwise newly connected to the Company's distribution system);
- Is master-metered through entire building (i.e., no individual tenant meters);
- Has a minimum of four dwelling units; and
- Is low-income supportive housing. "Low-income supportive housing" refers to housing that is permanently available to low-income tenants where the housing provider is responsible for utility bills. To be eligible to mastermeter a given residential building, in addition to satisfying the other eligibility criteria, a provider of low-income housing must either: (1) show that the building is a Public Housing Authority development, or (2) certify annually that all tenants are (i) eligible for a Housing Choice Voucher (HCV), available to residents who make $50 \%$ or less of the median family income, or (ii) have household incomes equal to or less than $150 \%$ of federal poverty guidelines.

Customers that are master metered under this proposal would also be subject to additional ongoing requirements, which I discuss later in my testimony. If a customer master metered under this proposal subsequently falls out of compliance with these eligibility criteria or ongoing requirements, they will be required to update the building's electrical systems, at customer expense, to allow the Company to separately meter each residential dwelling unit.

## Q. Why is the Company proposing to limit master metering to new services?

A. The Company is proposing to limit master metering to new services for several reasons. First, converting an existing building from individual- to a master-metered service would deprive tenants of the benefits and protections provided through the individual customer meter, which I discussed earlier in my testimony. Also, conversions of existing services may produce inter- and intra-class revenue allocation impacts. Individually-metered dwelling units are billed on residential rates, whereas master-metered buildings are billed on nonresidential rates. Shifting existing loads between customer classes would therefore produce unpredictable corresponding shifts in revenue allocation. Finally, the new-service requirement mirrors the Company's original adoption of the residential master metering prohibition, which per Rule 41, applies on a proactive basis only to buildings connected after January 1, 1981.

## Q. How did the Company derive the minimum threshold of four dwelling units?

A. The Company has historically applied this four-unit threshold for "multifa mily buildings" in each of its Act 129 Energy Efficiency \& Conservation ("EE\&C") programs. Maintaining this threshold will support consistency across Company programs. Furthermore, this requirement will probably not substantially limit master-metering participation. The Company expects that the majority of multifamily housing that would satisfy the Company's other proposed mastermetering eligibility criteria would already be designed to four units or larger.

## Q. Why is the Company proposing to limit master metering to supportive housing?

A. This proposal responds to expressed stakeholder interest and is intended to ensure tenant protections. Parties' input in the Company's last base rates case, and in the subsequent collaborative meetings, suggested that supportive housing was a high stakeholder priority for master metering. The Company presented its plans for supportive housing master metering at the collaborative meeting held on February 24, 2021, which met with a positive response from the external stakeholders in attendance.

To an extent, supportive housing canbe a substitute for the utility assistance programs available to individually-metered low-income customers. As I discussed above, these programs are not available to tenants of master-metered premises. However, it is my understanding that supportive housing provides tenants with other benefits that may help fill this gap. For example, based on stakeholder input, I understand that providers of supportive housing typically pay their tenants' electric bills, whether the building is individually- or master-metered. This mitigates the drawbacks of low income tenants not being able to participate in CAP.

## Q. Will master metered customers be subject to any additional requirements?

A. Yes. Master metered housing providers may not resell electricity delivered to the building, such as through a tenant sub-metering arrangement. Such resale is already prohibited under the Company's tariff Rule 18, but is restated here for avoidance of doubt. Master metered housing providers will be required to participate in the

Company's applicable EE\&C and LIURP programs, to ensure maximum benefits to low-income tenants. Master metered housing providers will be required to annually recertify their compliance with applicable master metering requirements, including tenants' household incomes or HCV eligibility where applicable, so the Company will know when a building will need to become individually metered. Finally, the master metered housing providers must post a security deposit, in an amount not to exceed two months' estimated bills, for the duration of the master metering.

## Q. Why is the Company proposing to retain the customer's security deposit for the duration of master metering?

A. Compared to an individually-metered building, a master metered building may represent increased collections risk if the landlord defaults on their electric bills. Individual metering allows the Company to engage directly with payment-troubled occupants, and where necessary, to terminate service to individual units. Terminating service to a master metered building, on the other hand, is "all or nothing." Such service terminations are therefore subject to extensive additional process and tenant protections under sections 1521-1533 of the Public Utility Code. In light of the practical and legal issues associated with landlord-ratepayer customer collections, it is reasonable to allow the Company to retain these master metered customers' security deposits.
Q. Does this conclude your direct testimony?

1 A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

BEFORE THE

## PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 7

Direct Testimony of Katherine M. Scholl Subject: Residential Customer Assistance Programs

## Introduction and Summary

Q. Please state your full name and business address.
A. My name is Katherine Scholl. My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh PA 15219.
Q. What is your position at Duquesne Light Company ("Duquesne Light" or "Company")?
A. I am the Director of Billing and Revenue Management.
Q. How long have you worked at Duquesne Light?
A. I have been with Duquesne Light since May 2016.
Q. What are your current responsibilities?
A. In my current position, I oversee three areas: 1) Billing; 2) Credit and Collections; and 3) Universal Services.
Q. What are your qualifications, work experience and educational background?
A. I attended Duquesne University, where I graduated Magna Cum Laude with a Bachelor of Science in Business Administration and also completed my Masters in Business Administration with High Honors.

I joined Duquesne Light in 2016 as the Director of Customer Experience. In that role, I oversaw several areas including Energy Efficiency/Act 129; Universal Services; Transportation Electrification; Customer Research and Experience

Recovery; and the more broad-based customer experience function, which included oversight of customer interfaces including the website, mobile application, and interactive voice response (IVR) system.

Prior to joining Duquesne Light in 2016, I spent nearly ten years at Giant Eagle Inc. in Pittsburgh, where my responsibilities included directing various aspects of customer relationship management (CRM), including the design and administration of loyalty programs, targeted marketing, and customer data analytics. I was also responsible for the company's Payment Acceptance Strategy, which involved optimizing relationships with payment systems providers to balance the cost of meeting customers' preferences for using various forms of tender with the cost of payment acceptance.

Prior to joining Giant Eagle, I spent seven years at Acxiom Corporation providing customer acquisition and relationship management consulting services to top credit card issuers in the United States and the United Kingdom. Prior to joining Acxiom Corporation, I spent 6 years in various roles in Consumer Lending and Credit Card management at Mellon Bank.

## Q. Have you testified before the Pennsylvania Public Utility Commission ("PUC" or "Commission") in prior proceedings?

A. Yes. I have testified in Duquesne Light's 2018 base rate proceeding at Docket No. R-2018-3000124 and the Company's Default Service Plan IX ("DSP IX") proceeding at Docket No. P-2020-3019522.
Q. What is the purpose of your direct testimony in this proceeding?
A. The purpose of my testimony is to describe existing and proposed residential customer assistance programs available to help Duquesne Light customers recover from the economic impacts of the COVID-19 pandemic. These programs provide long term or short term assistance designed to help customers maintain affordable electric service based on the individual needs of the customer segment.

## II. Universal Service and Energy Conservation Plan

## Q. Please describe the Company's existing Universal Service and Energy Conservation Plan ("USECP").

A. Duquesne Light's USECP includes 4 programs: 1) Customer Assistance Program ("CAP"), 2) Customer Assistance Referral and Evaluation Services ("CARES"), 3) the Hardship Fund, and 4) Smart Comfort/ Low Income Usage Reduction Program ("LIURP").

## Q. Please describe CAP.

A. CAP is a special payment program for payment-troubled customers with a gross household income at or below 150 percent of Federal Poverty Level ("FPL"). The program is designed to provide long term assistance to low income customers. Most CAP customers are required to recertify their income every two years; customers reporting zero income are required to recertify every six months. CAP customers are given a discount on their monthly electric service bill based on their income. In 2018, the Commission approved the implementation of a percentage of
payment plan ("PIPP") for Duquesne Light CAP customers. ${ }^{1}$ Under the current plan, CAP customers are billed in one of three ways: 1) a percentage of their monthly gross household income, as outlined in the chart below; 2) the average monthly bill; or 3) their actual usage if less then PIPP and average monthly bill.

## Q. Please explain the PIPP tiers.

A. Under the Company's CAP, customers are billed in accordance with the following tiers:

| Income Category | Residential Service <br> Percent of Income <br> Payment: | Residential Electric <br> Heat Percentage of <br> Income Payment: |
| :---: | :---: | :---: |
| Up to 50\% FPL | $2 \%$ | $6 \%$ |
| $51 \%$ to 100\% FPL | $4 \%$ | $10 \%$ |
| $101 \%$ to 150\% FPL | $4 \%$ | $10 \%$ |
| *Minimum Payment | $\$ 20$ | $\$ 40$ |

## Q. Please explain the Average Monthly Bill method.

A. If the customer's average monthly bill (based on a 12 month rolling average that would otherwise be the budget billing payment) is less than what the CAP bill would be as determined under the PIPP, the customer's monthly payment will equal the 12 month average bill. The monthly payment is reviewed and updated (if necessary) every four months to determine whether the customer is best served in the PIPP or in the Average Monthly Bill plan. The average monthly bill is not the budget amount and is not subject to reconciliation.

[^36]Q. Please explain the actual usage method.
A. If the customer's bill based on their actual usage is less than what the CAP bill would be as determined under the PIPP or average monthly bill methods, the customer's payment will be based on their actual usage for that month. Customers whose actual usage in any given month results in a bill that is less than the Minimum Payment are billed based on actual usage.
Q. How are customers with $\$ 0$ income billed under the new PIPP program structure?
A. Customers who report $\$ 0$ income are required to make the minimum CAP payment. As a cost containment measure, the Company requires a monthly minimum CAP payment amount of $\$ 20$ for residential service customers, and $\$ 40$ for residential heating customers (except where a customer's actual usage in a given month results in a bill that is less than the minimum payment; in which case, the customer is billed based on actual usage). The mandatory minimum payment ensures that CAP customers pay a portion of their energy costs while helping to control costs borne by non-CAP residential service customers.
Q. Other than a monthly discount, has the Company provided any additional payment assistance for customers enrolled in CAP?
A. Yes. When the Company implemented its new PIPP structure in January 2021, CAP customers were provided the opportunity to earn forgiveness of their entire delinquent balance. All CAP customer delinquent balances were frozen and will be forgiven over a twenty-four month period if the customer makes the required
monthly payments. The total customer delinquency associated with CAP accounts was approximately $\$ 10.5 \mathrm{M}$. The Company will recover $55 \%$ of the CAP account delinquent amount through Rider No. 5 related to Universal Services. The Company is not seeking recovery of the remaining $45 \%$ of the CAP account delinquent amount. ${ }^{2}$ Accordingly, CAP customers have been provided a fresh start under the new program, and are virtually guaranteed affordable bills based on their income moving forward.

## Q. Is the Company proposing any changes to its CAP in this proceeding?

A. No, except to update the participation level to reflect the estimated CAP enrollment in 2022 to 35,853 , as identified in witness Ogden's Exhibit DBO-1. The Company's USECP is currently pending Commission review at docket number M-2019-3008227. The newly implemented CAP provides affordable payments as described in the Commission's Policy Statementon Customer Assistance Programs at 52 Pa . Code $\S \S 69.261$ - 69.267. The merits of the Company’s USECP are presently being considered in a prior proceeding. No additional changes are proposed in this proceeding.

## Q. Please describe the CARES program.

A. Duquesne Light's CARES program assists payment-troubled and special needs customers to obtain necessary social service support and assistance. The CARES program serves an important function in connecting customers in need of assistance

[^37]with community resources. The program focuses on residential customers whose income is at or below $150 \%$ of the FPL and senior citizens whose income is at or below $200 \%$ of the FPL. Customers may be referred to CARES by internal and external sources including but not limited to other Duquesne Light departments, other utility companies, community based organizations ("CBOs") (e.g., Holy Family and Catholic Charities), the PUC, or word of mouth. An outreach worker or community agency acts as an intermediary between the customer and the Company in an effort to link the customer to the necessary social service programs that will enhance the customer's ability to pay for electric service.

## Q. Is the Company proposing any changes to its CARES program in this proce eding?

A. No. The Company's USECP is currently pending Commission review at docket number M-2019-3008227. The merits of the Company's USECP are presently being considered in that proceeding. However, it is important to highlight the availability of these programs given the Company's request for base rate increase as a reminder that Duquesne Light continues to work to provide needed assistance to its customers.

## Q. Please describe the Hardship Fund.

A. Duquesne Light's Hardship Fund is administered by the Dollar Energy Fund ("DEF"). The primary features of the DEF include direct financial assistance for customers with overdue energy bills, protection against termination for nonpayment, and referral to other programs and services. The Hardship Fund
operates from October 1st of each year and continues until funds are depleted. DEF is designed specifically for lower-income residential customers (household income at or below $200 \%$ of the FPL) who are unable to pay their electric service. Approved applicants receive a grant of up to $\$ 500$ based on overdue balance. A household can receive only one Dollar Energy Fund grant during a program year. Upon receipt of the grant, a 30-day stay on termination is placed on the account.

## Q. Is the Company proposing any change to the Hardship fund in this proce eding?

A. No. The Company's USECP is currently pending Commission review at docket number M-2019-3008227 and no additional changes are proposed in this proceeding.

Notably, in April 2020, Duquesne Light was granted permission by the Commission to temporarily expand DEF eligibility to customers up to $250 \%$ of the FPL and to increase the maximum grant amount to $\$ 1,000$. The Company also contributed an additional $\$ 750,000$ to the DEF program which enabled an additional $\sim 1,300$ customer grants in 2020 . This is another example of how the Company has, and will continue to seek ways to balance affordability with the need to invest in the infrastructure to maintain safe, reliable and affordable service to our customers.

## Q. Please describe the Smart Comfort Program.

A. Smart Comfort is Duquesne Light's Low-Income Usage Reduction Program ("LIURP"). The program targets residential customers whose gross household
income is less than $150 \%$ of the FPL and senior citizens whose gross household income is less than $200 \%$ of the FPL, with base load electric usage more than 500 kWh per month and who have been residing at their current address for at least six months. Smart Comfort has evolved from strictly weatherization to an "end use" strategy. Usage reduction measures include cost effective appliance and lighting replacements in addition to determining if weatherization is warranted. Additionally, low-income customers, whose base load usage is less than 500 kWh per month, are referred to Watt Choices (Duquesne's Energy Efficiency / Act 129 program. Through the Smart Comfort program, the Company provides energy efficiency and conservations measure to low income customers to help reduce their electric service bill. Recently, the Company has established an allowance for health and safety that authorizes LIURP contractors to spend up to $\$ 200$ per electric baseload Smart Comfort visit without prior Company approval on incidental repairs including health and safety items when necessary to allow for conservation measures to be installed. For electric heating customers, the Company will authorize the Smart Comfort contractor an allowance up to $\$ 600$ per Smart Comfort visit without prior Company approval where the inclusion of health and safety and incidental repair will remedy situations that would otherwise impede the installation of conservation measures.

## Q. Is the Company proposing any changes to the Smart Comfort program in this

 proce eding?
#### Abstract

A. No. The Company's USECP is currently pending Commission review at docket number M-2019-3008227 and no additional changes are proposed in this proceeding.

\section*{Q. How does the Company recover its cost for the USECP?} A. The cost of Duquesne Light's four USECP programs are recovered though Rider No. 5 - Universal Service Charge ("USC"). The USC is a cost recovery mechanism to recover the costs incurred by the Company to provide its USECP. The USC is applicable to all residential customers who take distribution service under Rate Schedules RS, RH and RA except for residential customers in the CAP. The Company's allocation of universal service cost to residential customers is consistent with Commission precedent and principles of cost allocation. The Company is not proposing changes to its cost recovery mechanism in this proceeding.


## III. Residential COVID-19 Debt Relief Program

## Q. Is Duquesne Light proposing any additional residential customer assistance programs in this proceeding?

A. Yes. The Company is proposing a new temporary residential COVID-19 debt relief program. Unlike the Company's existing universal service programs, the COVID19 debt relief program is a short-term program designed to provide targeted assistance to low to moderate income customers with delinquencies as a result of the pandemic.
Q. Please describe the residential COVID-19 debt relief program.
A. The residential COVID-19 debt relief program is available to non-CAP customers earning $151 \%-300 \%$ FPL with a delinquent balance of at least $\$ 100$. Under the program, customers who make a payment will receive matching forgiveness up to $\$ 300$ and a payment arrangement up to 36 months on the remaining unpaid balance. Grants will be awarded to qualified applicants on a first come first serve basis. Total forgiveness will not exceed the total program budget of $\$ 3$ million.

For customers or applicants seeking restoration, the Company will also waive the reconnection fee and restore service if $25 \%$ of outstanding balance is paid. Subject to approval, the program would begin January 15, 2022 and remain open until the earlier of March 31, 2022 or when funding is exhausted.

## Q. What is the program budget?

A. $\$ 3$ million for grants plus $\$ 500,000$ in administrative costs, which include technology development, resources for processing applications and customer inquiries, and marketing/promotional costs.
Q. How can customers apply for the residential COVID-19 Relief Program?
A. Customers will be able to apply online. Additionally, the Company is exploring opportunities to acceptapplications through a Community BasedOrganization such as the Dollar Energy Fund, and/or through the Company's own Contact Center.
Q. Does the Company plan to advertise the program?
A. Yes. The Company plans to advertise the program through bill messages and/or inserts, social media, and emails to customers.
Q. Are the costs for the residential COVID-19 Relief Program included in the Company's claim?
A. Yes. The total costs of the residential COVID-19 Relief Program are included in the Company's revenue requirement as described in the testimony of Witness O'Brien, Statement No. 10.
Q. Does this conclude your direct testimony?
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 8

Direct Testimony of Sarah J. Olexsak
Subject: Transportation Electrification Programs

Date: April 16, 2021

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## I. INTRODUCTION AND PURPOSE OF TESTIMONY

Q. Please state your full name and business address.
A. My name is Sarah J. Olexsak. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Manager, Transportation Electrification.
Q. How long have you worked at Duquesne Light?
A. I have been employed by Duquesne Light since May 2018.
Q. What are your current responsibilities?
A. As the Manager, Transportation Electrification, my primary responsibilities include developing and implementing the Company's transportation electrification ("TE") strategy. In this role, I oversaw the execution of the EV ChargeUp Pilot approved as part of the Company's prior base rate case, Docket No. R-2018-3000124. I also contributed to the development of the Company's EV Time-of-Use Rate for default supply, which was approved by the Commission at Docket No. P-2020-3019522 and will be available to customers in June 2021.
Q. What are your qualifications, work experience and educational background?
A. I have been employed in the energy and automotive sector since 2006. Prior to joining Duquesne Light Company, I was employed at the U.S. Department of Energy ("U.S. DOE") within the Office of Energy Efficiency and Renewable Energy ("EERE"). During my eight-year tenure in EERE, I held a variety of positions within the Office of Strategic Programs and the Vehicle Technologies Office. These positions included Manager, Electrification and Project Manager, Innovation \& Deployment, wherein I managed electric vehicle (EV) market readiness research and performed analysis to inform strategic investment across EERE's research portfolio, and Coordinator of the Workplace Charging Challenge. I also served as a Senior Sustainability Officer on assignment to the White House Council on Environmental Quality. Prior to this, I worked as a consultant to the U.S. DOE under employment by Sentech, Inc. managing the evaluation of EV and battery manufacturing loan and tax credit proposals, and as an analyst at the U.S. Fuel Cell Council (now the Fuel Cell and Hydrogen Energy Association), the trade association of the hydrogen fuel cell industry.

I currently serve on the Pittsburgh Region Clean Cities Board. I have an M.S. in Energy Policy and Climate from Johns Hopkins University, and a B.S. in Biology from Muskingum University.
Q. Are you sponsoring any exhibits, parts of exhibits or responses to the Commission's filing requirements as part of your direct testimony?
A. Yes. I am sponsoring the following exhibits:

Exhibit SO-1: EV ChargeUp Pilot Annual Report (January 2019 - February 2020) Exhibit SO-2: EV ChargeUp Pilot Annual Report (March 2020 - February 2021) Exhibit SO-3: EV ChargeUp Pilot Progress Report

Exhibit SO-4: Duquesne Light Customer EV Survey Results Summary
Exhibit SO-5: Home Charging Pilot Customer Agreement In addition, I am sponsoring Rider Nos. 23 (Home Charging Pilot) and 24 (Fleet Charging Pilot), which are included within Company witness Mr. Ogden's Exhibit DBO-1.

## Q. What is the purpose of your direct testimony?

A. The purpose of my testimony is to present the Company's proposed Transportation Electrification Programs ("TE Programs"). Within my testimony, I will: 1) describe why the Company is proposing the TE Programs; 2) report on the performance of the Company's transportation electrification pilots ("EV ChargeUp Pilot") to date; and 3) describe in detail the proposed TE Programs.

## Q. Why is the Company proposing the TE Programs in this case?

A. Transportation electrification market trends demonstrate there is a need and benefit for utility planning and investment in infrastructure and programs. The goal of the TE Programs is to increase utilization of and equitable access to safe and reliable electric transportation fuel in the Company's service territory. The key objective s of the TE Programs are:

1) Maximize the benefits of transportation electrification for customers and communities by evaluating the impacts EVs have on the electric grid, informing the Company's distribution system planning, and advancing our ability to serve our customers' evolving needs;
2) Serve as a trusted advisor to customers to help them transition to an electrified transportation environment; and
3) Leverage learnings from the EV ChargeUp Pilot and the Company's unique position to mitigate market obstacles through new products and services.

## Q. Please summarize the Company's TE Programs.

A. The proposed TE Programs consists of two Portfolios. The first is the Charging Infrastructure Portfolio, comprising three programs intended to increase the number of EV charging stations in the Company's service territory, as a means of facilitating the EV market. The second component is the Customer Portfolio, which includes Awareness, Education, and Engagement, Fleet Electrification Advisory Service, and Registration Incentive programs. The Customer Portfolio is designed to increase customer knowledge of transportation electrification and allow the Company to more effectively engage customers.

These programs are summarized in the table below. This table includes projected program budgets for calendar year 2022; however, as I discuss later in my testimony, each of these programs is designed to operate on an ongoing basis through at least 2024.

Table 1: TE Programs Budgets

| Component | Description | $2022$ <br> Budget |
| :---: | :---: | :---: |
| Charging Infras tructure Portfolio |  |  |
| Public, Workplace, and Multi-Unit Dwelling MakeReady Pilot | Public, workplace, and multi-unit dwelling makeready investment to support Level 2 and DC fast charging stations | \$1,047,940 |
| Fleet and Transit Charging Pilot | Optional fleet and public transit make-ready and charging station programto install and support Level 2 and DC fast charging stations | \$2,013,730 |
| Home Charging Pilot | Optional turnkey service for residential customers to install Level2 charging stations at their home. | \$503,650 |
| Customer Portfolio |  |  |
| Awareness, Education, and Engagement | Support for customers to make informed decisions about fueling vehicles with electricity. | \$392,460 |
| Fleet Electrification Advisory Service | Vehicle and charging infrastructure planning and analys is support for public and private fleet customers. | \$292,400 |
| Registration Incentive | $\$ 50$ one-time regis tration incentive for customers who own or lease an EV. | \$68,000 |
|  | Capital ProgramCost For 2022 | \$2,964,090 |
|  | Expense ProgramCost For 2022 | \$1,353,090 |
|  | Total ProgramCost For 2022 | \$4,317,180 |

## Q. What are the projected bill impacts of the Company's EV proposals?

A. The Company estimates that these proposed programs would add approximately $\$ 0.20$, or $0.19 \%$, to the monthly bills of a typical residential customer; and $\$ 0.88$, or $0.09 \%$, to the monthly bills of a typical nonresidential customer on rate GM.

## II. TRANSPORTATION ELECTRIFICATION LANDSCAPE

## Q. Please describe the market for EVs at the national le vel.

A. Market trends indicate a broad movement towards vehicle electrification. Across the U.S., EV production and sales have increased steadily over the last decade and continue to trend upward. The Edison Electric Institute indicates that as of March 2021, there were more than 1.7 million EVs on the road. ${ }^{1}$ From 2015 to 2021, EV registrations increased by more than $300 \%$ across the U.S. EV sales are expected to increase rapidly over the next decade. ${ }^{2}$ By 2030 , 18.7 million EVs are expected on the roads and annual EV sales are forecasted to exceed 3.5 million per year, accounting for more than $20 \%$ of annual vehicle sales. The forecasted growth is driven by the more than $\$ 135$ billion automakers plan to invest in vehicle electrification by 2030. ${ }^{3}$ American drivers will soon have even more choices, with approximately 130 EV makes and models projected by 2026, up from 51 available in 2019. ${ }^{4}$ National-level fleets are also driving demand. For example, President

[^38]Biden ordered the federal government, which purchases more than 50,000 vehicles per year, to develop a plan to transition to zero emission vehicles. ${ }^{5}$

## Q. Please describe the EV market within the Company's service territory.

A. At the local level, EV penetration within the Company's service territory is growing rapidly, although it still represents a small portion of total market share. Despite the COVID-19 pandemic, there was a $21 \%$ increase in new EV registrations and a $33 \%$ increase in total number of EVs within the Company's service territory from December 2019 to December 2020, bringing the total registered to approximately 4,123. ${ }^{6}$ The Electric Power Research Institute indicates EV registration in the Company's service territory will be between 18,900 and 30,325 by 2025 - up to $635 \%$ more than the existing number of registrations. ${ }^{7}$

Fleets at the state and local are also driving demand. The State of Pennsylvania plans to convert $25 \%$ of its fleet to electric by 2025 and the City of Pittsburgh aims to have a fossil fuel free fleet by 2030. ${ }^{8}$ The Company has already

[^39]started electrifying its fleet and aims to find electric solutions for $30 \%$ of its fleet by 2030 , including $100 \%$ of its light-duty vehicles.

## Q. What are some of the benefits of increased transportation electrification driving this demand?

A. Increased EV adoption displaces petroleum with more efficient electric fuel, which results in benefits for customers who drive EVs, as well as those who do not. Such benefits include:

- Increased Distribution System Utilization: EVs support efficient use of the electric grid. Most charging occurs during non-peak hours, which helps spread the Company's fixed distribution costs over more kilowatt-hours, while mitigating grid impacts. This applies downward pressure on delivery rates for all customers, and supports efficient planning and construction of distribution facilities.
- Reduced Greenhouse Gas ("GHG") Emissions: Transportation is responsible for $20 \%$ of annual $\mathrm{CO}_{2}$ emissions in Pennsylvania, contributing to climate change. ${ }^{9}$ A key strategy to reduce these emissions is to increase the deployment of EVs. According to the U.S. Department of Energy, a light duty vehicle charging up in Pennsylvania emits $1 / 3$ of the amount of GHG

[^40]emissions of a comparable gasoline-fueled vehicle. As the local generation mix continues to shift towards clean energy sources, total emissions attributable to EV fueling will continue to decline over time. The average passenger EV on the road is estimated to save $7,970 \mathrm{lbs} . \mathrm{CO}_{2} \mathrm{e}$ per year compared to an internal combustion engine vehicle. The Company's EV ChargeUp Pilot has already supported the reduction of 100 tons $\mathrm{CO}_{2}$ emissions (Exhibit SO-1: EV ChargeUp Pilot Annual Report (January 2019 February 2020) and Exhibit SO-2: EV ChargeUp Pilot Annual Report (March 2020 - February 2021).

- Improved Air Quality: Increased transportation electrification will cut criteria pollutants emitted by motor vehicles including ozone, particulate matter, carbon monoxide, nitrogen dioxide and hazardous air pollutants (HAPs), leading to better overall health, including fewer respiratory conditions. This is particularly important in the Company's service territory, where the air quality consistently ranks among the worst in the nation. For example, in 2020, Allegheny County received a failing "F" grade from the American Lung Association for three measures of air pollution - ozone, particle pollution in a 24-hour period and annual particle pollution. ${ }^{10}$ In this same area, transportation is responsible for $22 \%$ of air pollution, according to the U.S. EPA's 2015 National Emissions Inventory.

[^41]- Boost to the Local Economy: Transportation electrification is also expected to benefit Pennsylvania's economy. As of 2019, the electric transportation industry in Pennsylvania already supported nearly 4,400 jobs across 151 different companies and accounted for more than $\$ 430$ million in gross state product. Jobs in the state's electric transportation industry are projected to grow $24 \%$ between 2019 and 2024, ${ }^{11}$ compared with $3 \%$ growth across statewide employment over the same timeframe.
- Customer Savings: Customers driving electric benefit from a reduced total cost of ownership when compared to an internal combustion engine vehicle. EVs require less maintenance ${ }^{12}$ and electricity fueling costs are more predictable and more than $50 \%$ cheaper compared to the costs of gasoline fuel in Pennsylvania. ${ }^{13}$
- Energy Security: As noted by the U.S. Department of Energy, EVs are an important part of continuing the country's successful trend of minimizing imported petroleum. The diversification of fuel sources used in the generation of electricity results in a more secure and domestically generated energy

[^42]source for the electrified portion of the transportation sector, adding to our nation's energy security. ${ }^{14}$

## Q. Does transportation electrification benefit disadvantaged communities?

A. Yes. Transportation electrification helps to mitigate disproportionate health impacts felt by disadvantaged communities. As noted by Synapse Energy Economics, "Importantly, because transportation sector emissions occur at ground level where they are less likely to be dispersed and more likely to have an impact on customers' health, a decrease in tailpipe emissions is likely to produce the most health benefits for the customers who are physically located near where the vehicles are operated. This is particularly relevant in situations where EVs may be used to reduce emissions from transit buses, school buses, and large trucks, which disproportionately impact lower-income and communities of color located near industrial and transit sites." ${ }^{15}$

This holds true in the Company's service territory, where low-income individuals are disproportionately exposed to air pollution caused in part by ground transportation used to move people and goods throughout a community. As part of its EV ChargeUp Pilot, as summarized in Exhibit SO-3: EV ChargeUp Pilot

[^43]Progress Report, attached to my testimony, the Company aligned with the PA Department of Environmental Protection (DEP) definition of Environmental Justice (EJ) Areas to identify disadvantaged communities within its service territory that could especially benefit from greater transportation electrification. According to the Breathe Project's Black Carbon Map, many of the EJ Areas are also exposed to some of the highest amounts of black carbon pollution in our region. ${ }^{16}$ A shift toward transportation electrification will help reduce these impacts.

## Q. Is charging infrastructure in the Company's service territory keeping pace with the growing need?

A. No. According to the U.S. Department of Energy's Alternative Fuels Data Center, the Pittsburgh region needs at least 2,149 workplace and public Level 2 (L2) charging ports and 78 public direct current fast charger (DCFC) ports by 2025 to keep up with a median projection of EV growth for the area. Currently, there are only 389 Level 2 charging ports and 62 DCFC ports ( 20 accessible by non-Tesla EVs ) in the region.
Q. Have state and local governments recognized the need for more EV charging infrastructure?
${ }^{16}$ Breathe Project (2021, March). "Black Carbon Nitrogen Dioxide Map," Obtained from: https://breatheproject.org/pollution-map/.
A. Yes, and both have recommended that electric distribution companies play a role in helping to meet this need. In 2019, the PA DEP released its "Electric Vehicle Roadmap" describing five years of action to drive EV adoption. The Roadmap includes a utility transportation and electrification directive, noting how utilities can play a unique role in advancing transportation electrification due to their existing role in serving public interests; knowledge of installing and maintaining electricity infrastructure; stable business structure that continues to be involved in electric distribution for the long-term; and cost recovery mechanisms that allow for the installation of chargers where there is the greatest need rather than where there is greatest profit. Additionally, the City of Pittsburgh's EV Task Force made several recommendations for transportation electrification at the local level to bridge charging gaps by creating and then promoting regional charging opportunities and networks. To address the need for more local public charging, the task force recommends working with the Company to increase Level 2 public charging infrastructure throughout city neighborhoods at existing and new properties and to make obtaining permits for DCFC infrastructure easier. ${ }^{17}$
Q. Are these state and local examples consistent with trends elsewhere in the country?

[^44]A. Yes. Public utilities across the country are increasingly investing in EV programs and infrastructure, ranging from residential charging services to charging infrastructure make-ready investment to charging station ownership. As of January 2021, 52 electric companies in the U.S. received approval for transportation electrification-related filings, representing a total investment of more than $\$ 1.51$ billion, representing a total potential investment of nearly $\$ 3$ billion. ${ }^{18}$
Q. On March 31, 2021, President Biden proposed the American Jobs Plan, which includes $\mathbf{\$ 1 7 4}$ billion for trans portation electrification programs. ${ }^{19}$ In light of this announcement, why is Duquesne Light still proposing transportation electrification programs in this case?
A. President Biden's recent announcement in support of transportation electrification is extremely encouraging, but it does not obviate the Company's proposed programs for several reasons. First, as of the date of this testimony, the President's infrastructure plan is a conceptual proposal that would require Congressional approval to implement. Second, details of the President's plan have not been shared with the public, so we cannot assume that it will address the objectives outlined in the Company's proposal. Lastly, the Company is uniquely positioned to support its

[^45]customers with programs that may not be included in a federal infrastructure plan, such as those that address home charging.
B. EV ChargeUp Pilot Performance

## Q. What TE initiatives has the Company previously implemented?

A. As part of the EV ChargeUp Pilot, the Company has implemented a Level 2 Charging Station Evaluation, a DCFC Evaluation, an EV Registration Incentive and executed Education and Outreach activity.
Q. Has the Company submitted annual reports concerning the Company's implementation of the EV Charge Up Pilot?
A. Yes, the Company filed annual reports in 2020 and 2021 pursuant to the parties' settlement in the Company's 2018 base rates case ("Settlement"). These reports are attached as Exhibits SO-1 and SO-2, respectively, to my testimony. They provide, among other things: (a) charging infrastructure deployed over time, including by location, and activation date; (b) charging infrastructure installation costs by site type (broken out by capital and rebate costs); (c) for all charging stations deployed, the usage rate by site type and charger type; and (d) estimated avoided emissions resulting from the programs.
Q. Is the Company providing a report in this filing on the EV Charge Up Pilot Level 2 Charging Evaluation?
A. Yes. The Settlement provides that the Company will provide a report in this proceeding on the EV ChargeUp Pilot Level 2 Charging Evaluation. This report is attached as Exhibit SO-3 to my direct testimony. The report evaluates customer participation and feedback, public access to charging stations and charging station usage, identifies the charging station revenues received by the Company from charging station site host customers, and discusses the Company's activities under the DCFC Evaluation, EV Registration Incentive, and Education and Outreach components of the EV ChargeUp Pilot.

In addition to the results identified in Exhibit SO-3, as I discuss further in my testimony, the EV ChargeUp Pilot yielded valuable experience that has informed the development and design of the TE Programs proposed in this proceeding.

## III. CHARGING INFRASTRUCTURE PORFOLIO

Q. Please summarize the proposed Charging Infrastructure Portfolio.
A. The Charging Infrastructure Portfolio includes the following:

- A Public, Workplace, and Multi-Unit Dwelling (MUD) Make-Ready Pilot, through which the Company will construct and own make-ready infrastructure to facilitate the deployment of approximately 30 Level 2 charging stations and 4 DC fast charging stations annually.
- A Fleet and Transit Charging Pilot, through which the Company will construct and own make-ready and charging station infrastructure to serve customers with electric fleets. Approximately 38 Level 2 charging stations will be deployed annually in partnership with non-transit customers, and 6 DC fast charging stations will be deployed in 2022 to power electric buses for the Port Authority of Allegheny County.
- A Home Charging Pilot, through which the Company will construct and own make-ready and charging station infrastructure to serve residential customers. The Company projects an average of 125 new residential participants each year. The table below provides additional detail on the Charging Infrastructure Portfolio:

1 Table 2: Charging Infrastructure Portfolio

|  | Fleet and Transit Charging |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Public, Workplace, and <br> MUD Make-Ready Pilot | Fleet Pilot | Transit Pilot | Home Charging Pilot |
| Number of Installations | Averageof 30 Level2 and 4 DC fast charging stations installed annually | Average of 38 Level 2 charging stations installed annually | 6 DC fast charging stations installed in 2022 | 125 Level2 charging stations installed annually |
| Example <br> Deployment | Public parking garage, community recreation center | Parcel delivery service, paratransit service | Port Authority of Allegheny County | Homeowner |
| Ownership <br> Structure | DLC owns "make-ready" infrastructure; customersite hostowns charging station | DLC owns "makeready" infrastructure; customerorDLC owns charging station | DLC owns "makeready" infrastructure and charging station | Customerowns "makeready" infrastructure and DLC owns charging station |
| Maintenance | DLC maintains makeready infrastructure; customersite-host maintains charging station | DLC maintains make-ready infrastructure; Charging station owner maintains station | DLC maintains make-ready infrastructure and charging station | Customermaintains make-ready infrastructure; DLC maintains charging station |
| Costto Participating Customers | Tariffed general service distribution rate | Tariffed general service distribution rate plus monthly per-port fee | Tariffed general service distribution rate | Tariffed residential dis tribution rate plus monthly fee |
| Low Income Customer and EJ Area Considerations | Specialized technical ass is tance and $\$ 5,000$ Level 2 charging station rebate for customers that serve EJ Areas | Target $25 \%$ of customers participating annually serve or are located in EJ Areas | Electric buses serve EJ Areas and low-income customers | Low-income customers eligible for $\$ 2,000$ installation upgrade allowance |
| $\begin{aligned} & \text { 2022 Capital } \\ & \text { Costs } \end{aligned}$ | \$899,570 | \$728,710 | \$984,000 | \$351,810 |
| $\begin{aligned} & 2022 \text { O\&M } \\ & \text { Costs } \\ & \hline \end{aligned}$ | \$147,370 | \$201,190 | \$99,830 | \$151,840 |

## 3 Q. Why is the Company proposing the Charging Infrastructure Portfolio?

4 A. The Company's Charging Infrastructure Portfolio will help address a market need, 5 improve distribution system utilization, ensure installations are done safely and
economically, and expand access to the environmental and public health benefits of EVs, particularly for low income customers and those living within EJ Areas.

## Q. Is the Company proposing to own infrastructure (make-ready and charging stations) as part of its proposals?

A. Yes. The Company is proposing to own make-ready and/or charging stations in each of its Charging Infrastructure Portfolio programs. The Program Summary table provides a description of the ownership structure and I will provide further detail in my testimony about each program.
Q. Why is it appropriate for the Company to install and own make-ready and charging infrastructure?
A. Through the EV ChargeUp Pilot, the Company has seen that the upfront cost of charging infrastructure, together with the time and resources necessary to manage an installation, can deter customers from deploying charging stations. This exacerbates the lack of charging infrastructure and range anxiety, which, as I discuss below, are the leading reasons the Company's customers cite for not adopting EVs. The Company's proposed investments in charging infrastructure address these primary obstacles to EV adoption, and will facilitate charging infrastructure deployment in much-needed locations, including EJ Areas.

Additionally, the Company's experience with electrical infrastructure planning, and ability to achieve economies of scale, can help lower costs and produce more efficient projects for customers than they could achieve on their own.

## Q. Will the Company's proposals stifle competition?

A. No. The Company's proposed investments are intended to accelerate EV charging development, particularly where market gaps exist such as for multi-unit dwellings ("MUDs") and fleets. This will encourage greater EV adoption that will, in turn, expand opportunities for competitive market providers. Greater EV adoption can help improve the economics of charging stations by expanding the population of charging station customers and increasing charging station utilization.

Additionally, the Company's proposed infrastructure deployments through these programs represent a small fraction of the investment needed to support anticipated EV growth. As I discuss further below, the Company's programs would support approximately 90 public, workplace and MUD L2 station and 12 public DCFC deployments from 2022 through 2024, compared to the $1,760 \mathrm{~L} 2 \mathrm{~s}$ and minimum of 16 DCFCs (with significantly more DCFC needed to support nonTesla drivers) needed in the Company's service territory over the same time period based on a median EV adoption projection. The Company's proposed programs will therefore not hinder the development of the competitive EV market.

Finally, the Company will maintain a market neutral approach by holding competitive solicitations for the products and outside services procured to
implement these programs. This will provide opportunities for market providers, as well as ensure competitive prices for customers.

## Q. How does the Company's proposed Charging Infrastructure Portfolio provide

 opportunities for low-income customers?A. As I discuss in further detail below, each of the Company's proposed infrastructure activities were informed by assessing best practices for ensuring equity in the growth of electric mobility. These programmatic considerations will help address the cost and awareness barriers, and provide a tailored approach to serving the unique challenges of our low-income customers and those within EJ Areas.
A. Public, Workplace, and Multi-Unit Dwelling Make-Ready Pilot
Q. Please summarize the Company's proposed Public, Workplace, and MultiUnit Dwelling Make-Ready ("Make-Ready") pilot.
A. This pilot is designed to address the charging infrastructure gap in the Company's service territory by expanding upon its EV ChargeUp Pilot Level 2 Evaluation. Through the Make-Ready pilot, the Company will work with customers to provide all necessary supply infrastructure, including service connections and EV makeready behind the meter for L2 and DCFC stations in public, workplace, and MUD settings. Customers will be responsible for the procurement, installation, ownership and maintenance of the charging station. There will be no additional fees required from the participating customers beyond applicable charges for electric delivery and supply.

## Q. Why is the Company proposing the Make-Ready pilot?

A. The Company is proposing the Make-Ready pilot based on the need for more charging infrastructure in the Company's service territory. This need has been substantiated from projections of EV growth and feedback from residential customers, summarized in Exhibit SO-4, indicating the lack of charging and range concerns as a barrier to purchasing an EV. For example, in a 2020 survey, the Company's customers identified that the top two major barriers to purchasing EVs were lack of public charging stations nearby (66\%) and concerns regarding vehicle driving range (64\%).

To support the growth in light-duty EVs from approximately 4,000 today to an estimated 18,900 to 30,325 by $2025,{ }^{20}$ the Pittsburgh region will need to substantially increase its public, workplace, and MUD charging infrastructure. The table below shows the number of public and workplace L2 and DCFC ports available today and the additional ports required to support the anticipated range of EV growth. These numbers do not fully account for the charging ports required to support customers living in MUDs, which represent approximately $26 \%$ of

[^46]households in Allegheny and Beaver counties. Additionally, an estimated 35\% of households rent their home, which can make home charging more challenging and increases the need for sufficient public and workplace charging. ${ }^{21}$

Table 3: Regional Charging Infrastructure Needs

| Year Scenario | L2 Ports* | DCFC Ports |
| :--- | :---: | :---: |
| $2021-$ Current Supply | 22 | 389 |
| $2025-2^{* *}$ |  |  |
| $2025-$ Hedian Need ${ }^{23}$ | 2149 | 78 |

*Includes public and workplace ports. 2021 figure includes public L2 only. The current number of non-public workplace charging installations is unknown.
${ }^{* *}$ Currently only 20 of the 62 available DCFC ports can serve non-Tesla vehicles.
Q. Please describe how le arnings from the EV Charge Up Pilot are applied to the proposed activity.
A. The Make-Ready pilot builds on lessons learned from the EV ChargeUp Pilot to help minimize costs and streamline program management and implementation. The Make-Ready pilot includes the following key changes:

- Include DCFC stations in addition to L2 charging stations.

[^47]- Include workplace and MUD sites, in addition to public charging station host customers.
- Reduce the minimum number of required charging station ports per site.
- Provide specialized technical assistance and financial support for qualified customers serving EJ Areas.
- The Company will construct and own electrical make-ready infrastructure instead of providing a rebate to the customer for make-ready costs.


## Expand to Include DCFC

As described above, the Pittsburgh region is severely lacking the required nonTesla DCFC infrastructure. Robust DCFC deployment is necessary because customers need a much faster way to charge their vehicle (30-45 minutes) than the 4-8 hours it can take to fully charge using a L2 station. The upfront equipment costs of DCFC stations can cost more than $\$ 50,000$. These higher equipment costs combined with low early-stage levels of utilization can deter customer investment in DCFCs. ${ }^{25}$

Expand to Include Workplace and MUD Locations

[^48]The Make-Ready pilot aims to ensure that investments are made in charging infrastructure where they will see the greatest utilization. With the majority of charging happening at home and $26 \%$ of households in Allegheny and Beaver counties living in MUDs, ${ }^{26}$ having sufficient charging is essential to support MUD customers interested in EVs. MUD charging proved the most durable during the pandemic. In fact, the two EV ChargeUp Pilot sites with the greatest usage during the pandemic are public sites that are accessible to multi-unit dwelling residential customers, reflecting the importance of charging accessibility at such locations.

Outside of the home, workplace charging is the most-utilized type of charging infrastructure. ${ }^{27}$ Studies show that individuals who have access to workplace charging are six times more likely to purchase an EV than those who do not. ${ }^{28}$ Expanding the Make-Ready pilot to include site hosts at these locations will make it more feasible for customers to switch to an EV and can help meet the anticipated EV growth.

Reduce Number of Required Ports

[^49]The EV ChargeUp Pilot required participating customers to install at least 4 dualport charging stations, which translates to 8 charging ports, per site. ${ }^{29}$ Several customers that were interested in the program were unable to participate because they could not meet this 8 charging port requirement. The Make-Ready pilot lowers the required number of ports to 4 per site to expand customer access.

## EJ Area Support

The Make-Ready pilot will provide specialized technical assistance and financial support for qualified L2 charging station host customers within EJ Areas. While these customers may be interested in hosting charging infrastructure for their communities, they may lack the funding and internal resources to manage the installation process. The Make-Ready pilot can help overcome these barriers.

## Q. Why is the Company proposing to own the make-ready rather than offer customers a rebate as it did under the EV Charge Up Pilot?

A. From executing the EV ChargeUp Pilot, the Company learned that the upfront cost of charging infrastructure, along with the resources to manage the project, can be deterrents for customers. Providing customers with a rebate did not directly address these impediments. For the Make-Ready Pilot, the Company is proposing

[^50]ownership of the make-ready to address these issues and accelerate charging infrastructure investments in its service territory.
Q. What services will the Company provide through the Make-Ready pilot?
A. The Company will install, own, and maintain EV charging station make-ready, which may include new panels, conduit, and wiring, located between the meter and the charging station. The Customer will own, operate, and maintain the EV charging stations. A simplified typical example is depicted in the below illustration:

Figure 1: Public, Workplace, and MUD Make-Ready Pilot Example Ownership Structure


In addition, in response to customer feedback from the EV ChargeUp Pilot, the Company will continue to provide participating customers with a list of prequalified vendors for the customer-owned and -installed charging stations. The Company will identify these qualified vendors and equipment through competitive solicitation. The stations will be required to, among other things, provide interoperability and managed charging capabilities that would enable customers participate in possible future managed charging programs, and to share usage data with the Company. Customers will choose their charging station hardware and
networking service from this qualified vendor list, or will have the option to select their own stations so long as they meet the Company's safety and technical standards.

## Q. Will participants be required to separately meter the charging stations?

A. No. The Company evaluated this option, but determined that the benefits of requiring a separate meter were outweighed by the cost and inconvenience to the participating customers. Customers interested in a separate meter for their EV charging load may do so by establishing a separate service to the charging stations.

## Q. Will the Customershare charging data with the Company under the MakeReady pilot?

A. Yes, participating customers will be required to grant the Company access to their charging data through the network provider. The Company will use these data to better understand charging station utilization, charging patterns for different use cases, and potential grid impacts. These data may also help the Company identify future services for these customer segments. The Company will follow its Privacy Policy ${ }^{30}$ for collecting, storing, and using these customer data.
Q. Who will be eligible to participate in Make-Ready pilot?

[^51]A. Non-residential customers that own, lease or manage commercial properties or MUDs will be eligible to participate.

## Q. What will be the requirements to participate in the Make-Ready pilot?

A. Eligible customers will be required to meet the following to participate in the MakeReady pilot:

- Own or lease property, and demonstrate site control thereof (which may include written permission from the property owner), suitable for charging station installation.
- For L2 sites: Install a minimum of 4 charging ports (e.g., 2 dual-port chargers), or for customers in EJ Areas, a minimum of 2 charging ports (e.g., 1 dual-port charger).
- For DCFC sites: Install a minimum of 2 DCFC charging ports of at least 150 kW , which must be publicly accessible.
- Operate and maintain charging stations.
- Subscribe to charging station networking service.
- Provide the Company charging data via network vendor.
- Grant the Company any rights-of-way or easements deemed necessary.
- Execute a contract memorializing the Company's and customer's respective obligations under the pilot.
Q. How will the Company evaluate customer applications to the Make-Ready pilot?
A. The Company will evaluate applicant sites based on a variety of factors, including technical feasibility and anticipated charging station utilization. As part of this evaluation, the Company will analyze the projected costs of the project, as well as the projected incremental distribution revenues the project may yield. The Company will reject proposed projects with disproportionately high estimated perport costs and/or disproportionately low projected utilization.
Q. How will the Make-Ready pilot support charging station growth in EJ Areas?
A. Though the pilot removes customers' up-front costs of make-ready infrastructure, the costs of the charging station alone may be too much to bear for some customers who serve EJ Areas. Therefore, for qualified customers serving EJ Areas, the pilot will provide a charging station rebate of up to $\$ 5,000$ per dual-port L2 unit. In addition, the Company will provide specialized technical assistance, which canhelp reduce the project management burden for the charging station installation portion of the project. The Company aims to select charging station sites located in EJ Areas for at least $25 \%$ of annual pilot participants.
Q. Please describe how the Company will conduct outreach and education about the Make-Ready pilot.
A. The Company will conduct outreach and education through a variety of channels. The Company will host content on its website explaining the pilot, as well as produce print collateral materials. The Company's Major Account Managers will also discuss the program directly with non-residential customers. In addition, the Company will engage with local non-profits and trade association groups to target groups like property managers and developers.

The Company will seek to leverage other funding sources, such as governmental grants, to help expand the reach of the program. For example, as part of its engagement with customers through this program, the Company will educate customers on other funding that they may be eligible for, such as Driving PA Forward rebates or grants.
Q. How many customers are projected to participate in the Make-Ready pilot?
A. The Company projects that a total of 14 customers, comprising 12 L2 site locations and 2 DCFC locations, will participate in the Make-Ready pilot on an annual basis. To help control Pilot costs, the Company will cap participation at 21 new customers annually.

## Q. What are the Company's projected costs of the pilot in 2022?

A. The Company's projected costs for 2022 are as follows:

Table 4: Make-Ready 2022 Pilot Cost

Make Ready 2022 Pilot Costs
Capital

| Make Ready Design, Installation and Equipment | $\$ 624,000$ |
| :--- | :--- |
| Operations Support and Oversight | $\$ 275,570$ |
| Expense |  |
| ProgramManagement | $\$ 29,600$ |
| Disadvantaged Community Support | $\$ 112,770$ |
| Advertising and Collateral | $\$ 5,000$ |
| Total | $\mathbf{\$ 1 , 0 4 6 , 9 4 0}$ |

The Company estimates incurring similar annual capital and expense costs in subsequent years.
Q. How will the Company recover its costs of the Make-Ready pilot?
A. Costs for this program will be recovered through base distribution rates.
B. Fleet and Transit Charging Pilot
Q. Please summarize the Company's proposed Fleet and Transit Charging pilot.
A. Through the Fleet and Transit Charging pilot, the Company will install, own, and maintain EV infrastructure, including make-ready infrastructure and charging stations, on behalf of fleet customers, including the Port Authority of Allegheny County (Port Authority). The goal of the pilot is to reduce the upfront cost for EV
charging infrastructure and reduce the project planning and execution burden for customers to help spur transportation electrification adoption.

## Q. Why is the Company proposing the Fleet and Transit Charging pilot?

A. The Company is proposing the Fleet and Transit Charging pilot to help customers overcome key barriers to fleet electrification. As I mentioned earlier in my testimony, the coming years will bring a host of new vehicle types to market, including pick-up trucks and delivery vehicles. Switching to an electric option can produce meaningful savings for customers. For example, an electric school bus is estimated to save $\$ 6,400$ annually in fuel and maintenance costs, and an electric transit bus is estimated to produce lifetime savings of $\$ 81,000$ compared to a diesel transit bus. ${ }^{31}$ However, upfront costs of vehicles and charging infrastructure, ${ }^{32}$ along with the resources required to execute projects with a new technology, can hinder customers from realizing these savings. This pilot is intended to help bridge this deployment gap. The Company believes it is well-positioned to help customers navigate this emerging market and provide technical and implementation support to encourage them to adopt EVs.

[^52]This program also aligns with the Commonwealth's goals of achieving $100 \%$ zero emission vehicles sales for all new medium and heavy duty vehicles by 2050 and reaching $30 \%$ of new medium and heavy duty sales by 2030, as articulated in a 2020 Memorandum of Understanding among Pennsylvania, 14 other states, and the District of Columbia. ${ }^{33}$

Finally, fleet electrification promotes environmental health benefits as I discussed earlier in my testimony. Medium and heavy-duty fleet electrification in particular produces environmental and air quality benefits for surrounding populations, "especially those residents nearest major roadways, warehouse distribution centers and other pollution hotspots." ${ }^{34}$

## Q. Describe the Company's proposal with respect to Transit Charging.

A. The Company proposes to install, own, and maintain six 150 kW DCFC stations at Port Authority's East Liberty Garage. These units are the same size as the stations installed as part of the Company's DCFC Evaluation Pilot. This charging infrastructure is required by Port Authority to power six 40 -foot electric buses that Port Authority will receive in 2021, and will support its planned fleet electrification objectives. In all other respects, except where I note otherwise, the Company's Transit Charging proposal mirrors the Fleet Charging pilot.

[^53]
## Q. How will the Fleet and Transit Charging Pilot be structured?

> A. Under the Fleet and Transit Charging Pilot, the Company will:
> - Continue to install, own, operate and maintain electric facilities up to the customer's service point.
> - Install, own and maintain the make-ready infrastructure, including new service panel, conduit, and wiring as applicable, from the service point up to the charging station stub.

Participating customers will have the option to:

- Have the Company purchase, install, own and maintain the charging stations. Customers will be assessed a monthly charge to cover the cost of the charging stations and on-going data management and maintenance (Bundled Option); or
- Have the Company purchase, install, own and maintain the charging stations. Customers can pay up-front for costs of the charging stations and pay a smaller, on-going monthly charge to cover data management and maintenance ("Pre-Pay Option"); or
- Purchase, install, own and maintain their own charging stations ("Customer-Supplied Charging Stations") with no additional fee applied. For the Port Authority specifically, the Company will purchase, install, own and maintain the make-ready and charging stations.

A simplified illustration is provided below:
Figure 2: Fleet and Transit Charging Pilot Example Ownership Structure


If the customer elects for the Company to own and maintain the charging stations under either the Bundled or Pre-Pay Options, the customer will select the charging stations from a pre-approved list. The Company plans to issue a competitive solicitation to identify the charging stations and network options for its pre-approved list.

Alternatively, customers selecting the Customer-Supplied Charging Station option can own and maintain the charging stations on their own, so long as they meet the Company's safety and technical standards. In this circumstance, the

Customer will own, install, and maintain the charging stations, and the Company will install, own, and maintain the make-ready infrastructure, similar to the MakeReady pilot.

## Q. What services will the Company provide through the Fleet and Transit pilot?

A. The Company will oversee the planning, design, and implementation of the applicable EV infrastructure.

First, the Company will work with the customer through the proposed Fleet Electrification Advisory Service, which I discuss later in my testimony, to conduct a fleet assessment or leverage an existing assessment. Using an assessment, the Company and customer will determine the size of the project and identify appropriate and cost-effective locations for charging infrastructure. The Company will work with the customer to design and install the make ready infrastructure and, as applicable, the charging stations.

Following installation, the Company will maintain the Company-owned equipment for the duration of the customer's participation in the pilot.
Q. Will participants be required to se parately meter the charging stations?
A. With the exception of the Port Authority, no. The Company evaluated this option, but determined that the benefits of requiring a separate meter were outweighed by the cost and inconvenience to the participating customer. Customers interested in a
separate meter for their EV charging load may do so by establishing a separate service to the charging stations.

## Q. Who will be eligible to participate in the pilot?

A. Non-residential customers that own, lease, or operate a fleet of at least six on-road vehicles will be eligible for this pilot.
Q. What will be the requirements to enroll and participate in the pilot?
A. Eligible customers will be required to meet the following to participate in the pilot, for the duration of the customers' participation:

- Demonstrate that EVs are currently in-use at the participating site(s) or provide proof of purchase with anticipated delivery date.
- Install a minimum of 4 charging ports per site.
- Own or lease property, and demonstrate site control thereof (which may include written permission from the property owner), suitable for charging station installation.
- Operate and maintain (as applicable) the charging stations.
- Where the Company will not own the charging stations, subscribe to a charging station networking service.
- Provide the Company charging data via network vendor.
- Grant the Company and rights-of-way or easements deemed necessary.
- Execute a contract memorializing the Company's and customer's respective obligations under the pilot.


## Q. How will the Company evaluate Customer applications?

A. The Company will evaluate applicant sites based on a variety of factors, including technical feasibility and anticipated charging station utilization. As part of this evaluation, the Company will analyze the projected costs of the charging station project, as well as the projected incremental distribution revenues the project may yield. The Company will reject proposed projects with disproportionately high estimated per-port costs and/or disproportionately low projected utilization.

## Q. What is the term of customer's participation in the pilot?

A. A customer's participation in the pilot will be for ten years. The Company is proposing a ten-year period to align with depreciable lives of the make-ready and the charging stations, and to ensure Company's recovery of the costs of the charging stations from the participating customer when applicable. Upon expiration of this ten-year period, ownership of the charging stations and make-ready will either pass automatically to the customer on an "as is" basis, or the customer may renew the service agreement under any applicable program then offered by the Company.
Q. What happens if the customer te rminates the service agreement before the end of the contract term?
A. Customers that leave the program prematurely will be required to purchase the make ready and charging stations at the remaining undepreciated value of the equipment, or alternatively, to have the Company remove the infrastructure, and reimburse the Company's costs of removal and stranded equipment (if any).
Q. How will the pilot support disadvantaged communities?
A. The Company will target school districts, municipal governments, and non-profit organizations that serve EJ Areas to participate in the pilot. The Company will target that $25 \%$ of projects annually serve or are sited within EJ Areas.
Q. Please describe how the Company will conduct outreach about the pilot.
A. The Company will conduct outreach and education through a variety of channels. The Company will employ outreach strategies similar to those I outline above for the Make-Ready Pilot. Additionally, the Company will leverage its relationships with its Community Based Organizations (CBOs) to identify appropriate non-profit entities serving low income customers and EJ Areas. The Company will also conduct outreach to fleet distributors who sell in key customer segments. Finally, the Company will leverage relationships with participating charging station vendors, as well as the vendor providing the fleet electrification assessments, to conduct outreach to prospective customers.
Q. How many customers are projected to participate in the pilot?
A. The Company projects that in addition to the Port Authority, a total of 7 customers will participate annually, comprising a mix of customers including school districts or bus operators, local government, non-profits, and commercial customers. To help control Pilot costs, the Company will cap participation at 12 new participants annually.

## Q. What are the Company's projected costs of the Pilot?

A. The Company projects the following costs for the non-Transit Fleet portion:

Table 5: Non-Transit Fleet 2022 Pilot Costs

| Non-Transit Heet 2022 Pilot Costs |  |
| :--- | :--- |
| Capital |  |
| Make Ready Design, Installation, and Hardware | $\$ 198,900$ |
| Charging Stations, Network Fees, Commissioning | $\$ 268,520$ |
| Operations Project Management and Oversight | $\$ 137,790$ |
| IT | $\$ 123,500$ |
| Expense | $\$ 102,000$ |
| Maintenance and Warranty | $\$ 4,590$ |
| Shipping | $\$ 91,330$ |
| ProgramManagement and Administration | $\$ 1,000$ |
| Marketing/Advertising/Education | $\$ 2,270$ |
| Sales Tax | $\$ 929,900$ |
| Total |  |

The Company estimates incurring similar annual capital and expense costs in subsequent years.

The Company projects the following costs for the Transit portion:
Table 6: Transit 2022 Pilot Costs

| Transit 2022 Pilot Costs |  |
| :--- | :--- |
| Capital | $\$ 300,000$ |
| Make Ready Installation and Hardware | $\$ 510,000$ |
| Charging Stations and Commissioning | $\$ 174,000$ |
| Operations Project Management and Oversight |  |
| Expense | $\$ 99,830$ |
| Maintenance and W arranty | $\mathbf{\$ 1 , 0 8 3 , 8 3 0}$ |
| Total |  |

The Company anticipates no additional Transit capital expenditures after 2022. Annual expenses for Transit are expected to decrease substantially after 2022. The Company is therefore proposing to normalize recovery of the $\$ 99,830$ over a threeyear period, or $\$ 33,280$ per year.

## Q. Will customers be required to pay a separate fee to participate in the Pilot?

A. With the exception of the Port Authority, yes. Participating customers who select the Bundled Option will be required to pay a monthly fee designed to recover the costs of the charging stations, shipping, commissioning, sales tax, and associated network data and maintenance costs over the 10 -year contract duration. Customers
who select the Pre-Pay Option will pay upfront for the charging station, shipping, commissioning, and sales tax and will pay a smaller monthly fee designed to cover the cost of maintenance, and network data. The monthly fee does not include costs for make-ready design, equipment, and installation, program management, IT, and marketing and education, which will be recovered through base rates.

Table 7: Fleet Pilot Monthly Per Port Fees

| Option | Monthly Per Port Fee |
| :--- | :---: |
| Bundled Option | $\$ 63.24$ |
| Pre-Pay Option | $\$ 28.82$ |

Company witness Ms. Everett discusses program cost recovery, including the calculation of these monthly fees, in further detail in her direct testimony, DLC St. No. 18.

The Port Authority will not be required to pay a separate fee to participate in the Pilot. The Port Authority plays a critical role in the community $-80 \%$ of its bus routes serve low-income communities and it provided over 40 million rides in 2020 even through the pandemic. ${ }^{35}$ In light of its unique position and functions in the Company's service territory, the Port Authority will not be required to pay a separate fee to participate in the Pilot.

## Q. Has the Company conducted a benefit-cost analysis of this pilot?

[^54]A. Yes. As Company witness Ms. Everett discusses in detail in her direct testimony, DLC St. No. 18, the Company conducted benefit-cost analyses of this Pilot using several methodologies. These analyses indicate that the Pilot is cost effective.
C. Home Charging Pilot

## Q. Please summarize the Company's proposed Home Charging pilot.

A. The Company proposes to offer an optional pilot to install a L2 station in residential customers' homes. The Company will install, own, and maintain the L2 station on the customer's behalf over a 5 -year period.

## Q. Why is the Company proposing the Home Charging pilot?

A. The Company is proposing the Home Charging pilot to benefit customers and help drive EV adoption.
Q. What barriers to EV adoption does the pilot address?
A. The pilot facilitates installation of L2 charging stations, which the Company has identified as a central obstacle to residential EV adoption. For the average EV driver, $80 \%$ of charging happens at home. In order to feel comfortable and to maximize the convenience of converting to an EV, many people need to have access to sufficiently-fast charging at home. L2 stations provide quick and controllable charging.

Purchasing and installing a L2 station can present a number of barriers for customers. For many people this is a brand new way to fuel their vehicle. The technology is unfamiliar, with an array of options and features to consider. The Company's customer surveys on this topic indicate that the majority of survey respondents are unfamiliar with key topics, such as electrical requirements, general price, charging station brands and models, and installation. See Exhibit SO-4: Duquesne Light Customer EV Survey Results Summary for further details.

Additionally, the station and its installation can be expensive. The Company's experience suggests that slightly less than half of L2 installations in its service territory require additional electrical work in the form of panel upgrades or additional breakers. This additional electrical work can cost anywhere from $\$ 1,000$ $\$ 3,000$ or more, depending on the complexity and the upgrades required. This is in addition to the cost of the station itself, which can range from $\$ 250$ for a basic, nonWiFi connected station to $\$ 750$ for a Wi-Fi connected, "smart" station, plus an average cost of $\$ 500$ to install the station.

These barriers can be overwhelming and create a "hassle" factor that turns people off from switching to an EV. The pilot will address each of these obstacles by offering customers an affordable, convenient, all-inclusive service to install a L2 station in their home, potentially at no up-front cost.

## Q. Have the Company's customers indicated interest in the pilot?

A. Yes. In a survey the Company conducted of customers who indicated that they were extremely likely or likely to purchase an EV for their next vehicle, $69 \%$ of participants agreed that the home charging install program would make it easier for them to drive electric, and $65 \%$ responded that they were likely to participate in the program if offered. See Exhibit SO-4 for further details.

## Q. What services will the Company provide through the pilot?

A. Through the pilot, the Company will install, own, and maintain L2 stations for residential customers. The Company will also pay for a standard charging station installation up to $\$ 500$ ("Standard Installation Costs"). Installation costs above $\$ 500$, or upgrades to home electrical equipment such as for a new panel or breaker ("Home Electrical Upgrade Costs"), shall be borne by the customer, except for lowincome participants, whom I address further below. In addition, the Company will coordinate charging station troubleshooting and station repair or replacement in the event of a station failure.

A simplified typical example is depicted in the below illustration:

Figure 3: Home Charging Pilot Example Ownership Structure

Q. Who will be eligible to participate in the Home Charging pilot?
A. All residential customers who meet the following requirements will be eligible to apply:

- Be a Duquesne Light residential customer with no overdue bills at the service address;
- Own a single-family detached, row house or duplex property with a personal garage or private driveway suitable for charging station installation; and
- Own or lease an EV, which is registered to the service address.

Customers' enrollment in the Pilot shall be for a period of five years. Participating customers will be required to:

- Execute a Home Charging Pilot Customer Agreement, which is provided as Exhibit SO-5;
- Agree to share their charging data via the charging station vendor for the duration of their participation; and
- Maintain active $\mathrm{Wi-Fi}$ at the service address with sufficient signal at charging station location for the duration of their participation.


## Q. What happens at the conclusion of the customer's five-year term of participation?

A. At the conclusion of the five year contract term, ownership of the charging station, as well as all associated responsibilities for on-going maintenance and management, will pass automatically to the customer. Alternatively, the customer will have the option to enter into a new service agreement under any applicable programs then offered by the Company, or pay the Company $\$ 200$ (i.e., the Company's estimated average cost of charging station removal) to remove the station.

## Q. What happens if the customer defaults or terminates the agreement early?

A. Customers who default or terminate the agreement early will be required to make a lump-sum payment of all amounts due under the remaining term of the agreement.

The Company will also remove the station at customer request for a fee of $\$ 200$. A customer's default will not be grounds for termination of electric service to the customer's residence.
Q. Is the Company's proposal consistent with those adopted in other states?
A. Yes. A number of other utilities, including Madison Gas \& Electric and Xcel Energy, have implemented similar charging station turn-key services. ${ }^{36}$
Q. Will the pilot provide the Company with additional insight that may aid distribution planning?
A. Yes. The average L2 load (7.2 kW-12kW) can significantly increase a household's electric demand. The Pilot enrollment process will provide the Company notice of increasing load, which can facilitate distribution system investment that may be required to ensure grid reliability and safety. This advance notice will become increasingly important as EV adoption, and corresponding system issues associated with EV clustering, accelerate.
Q. Will the Company offer additional assistance to low-income customers interested in participating in the pilot?

[^55]A. Yes. As I indicated earlier, the Company will cover up to the Standard Installation Costs. Where a participant is low-income - i.e., where the customer's household income is no greater than $150 \%$ of federal poverty guidelines - the Company shall cover up to $\$ 2,000$ of combined Standard Installation Costs and required Home Electrical Upgrade Costs that are necessary to accommodate charging station installation and that otherwise might put the program out of reach. The customer will be responsible for paying for any upgrades beyond this allowance.

## Q. Please describe how the Company will conduct outreach and education about the pilot.

A. The Company will conduct outreach and education about its pilot through a variety of methods. It will include information about the program and enrollment processes on its website. The Company will also engage with local auto dealerships and charging station vendors, conduct social media and digital advertising, and promote the program at public events, such as ride-and-drives.

## Q. How many customers are projected to participate in the pilot?

A. The Company projects 125 customers annually and will cap participation at this amount.

## Q. What are the Company's projected costs of the pilot?

A. The Company projects the following pilot costs:

Table 8: Home Charging 2022 Pilot Costs

| Home Charging 2022 Pilot Costs |  |
| :--- | :--- |
| Capital | $\$ 183,040$ |
| Charging Station Hardware and Installation | $\$ 126,100$ |
| IT | $\$ 42,670$ |
| Operations Engineering | $\$ 105,535$ |
| Expense | $\$ 7,800$ |
| ProgramManagement | $\$ 4,125$ |
| Data Management | $\$ 13,600$ |
| Charging Station Maintenance | $\$ 19,500$ |
| Marketing/Advertising/Education | $\$ 1,280$ |
| Low-Income Assistance | $\$ 503,650$ |
| Sales Tax |  |
| Total |  |

The Company estimates incurring similar annual capital and expense costs in subsequent years.
Q. Will customers be required to pay a separate fee to participate in the pilot?
A. Yes. Similar to the Company's proposed Fleet Charging pilot, participating customers will be required to pay a monthly fee of $\$ 21.17$ designed to recover the costs of the charging stations, installation, sales tax, and maintenance costs over the 5-year term of the agreement. The monthly fee does not include costs for program management, IT, operations engineering, and marketing and education, which will
be recovered through base rates. Company witness Ms. Everett discusses program cost recovery, including the calculation of this fee, in further detail in her direct testimony, DLC St. No. 18.

## Q. Has the Company conducted a benefit-cost analysis of this pilot?

A. Yes. As Company witness Ms. Everett discusses in detail in her direct testimony, DLC St. No. 18, the Company conducted benefit-cost analyses of this Pilot using several methodologies. These analyses indicate that the Pilot is cost effective.

## IV. CUSTOMER PORFOLIO

Q. Please summarize the Company's proposed Customer Portfolio.
A. The Customer Portfolio includes the following three components:

- Awareness, Education, and Engagement ("AEE"), which will allow the Company to provide transportation electrification informational services to customers.
- Fleet Electrification Advisory Service, which will support planning and analysis for an average of 7 fleet customers annually.
- A Registration Incentive, which will allow the company to engage with EV drivers and gather data to assist with distribution system planning.
A. Awareness, Education, and Engagement
Q. Why is the Company proposing to conduct customer transportation electrification awareness, education, and engagement?
A. The Company's AEE efforts are intended to (1) fill an information gap in the Company's service territory around EVs and charging stations generally; and (2) educate customers about the Company's transportation electrification programs. The Company will build upon its education and outreach efforts to date, as discussed in Exhibit SO-3, to support customers who have not yet been reached and provide assistance to customers who are navigating the rapidly evolving electric transportation market transformation.

The Company's lessons learned to date indicate that customers face a significant learning curve associated with transportation electrification, and lack of consumer awareness continues to be one of the most significant barriers to greater adoption of EVs.

The Company is well-positioned to address this barrier. Many aspects of EV education bear directly on the Company's systems and functions. For example, current and prospective EV owners may require fundamental information regarding different EV charging technologies, how to connect EV charging equipment to the Company's grid, and bill impacts. This information can often best be provided (and in some instances, can only be provided) by the Company.

## Q. Please describe the Company's plans for future AEE activities.

A. As mentioned elsewhere throughout my testimony, the Company will undertake program-specific outreach to ensure that customers are aware of the programs available to them and educate them on the program benefits and requirements. The Company will continue employing several communication channels, including the Company's website, web tools, community based events, technical assistance and internal knowledge building. The Company will also continue to regularly examine customer feedback and adjust its communication approaches accordingly. For example, in a recent evaluation of its EV Guide web tool, the Company found that the majority of users accessed the tool via a mobile device (50\%) compared to $44 \%$ on desktop and $6 \%$ on tablet. The Company therefore plans to evaluate and improve the usability of EV educational content and support on mobile devices.

## Q. Does the Company plan to engage low-income customers and communities through its AEE activities?

A. Yes. As shown in the table below, the Company's research indicates that the distribution of individuals who state that they are likely to purchase an EV as their next vehicle is fairly evenly distributed among household income levels. This suggests that EVs are not only for the Company's wealthiest customers; with equitable awareness and education, all customers can evaluate how EVs can serve as a cost-saving solution to their mobility needs.

Table 9: EV Purchase Intent by Income

| Houschold Income | \% of individuals within Income <br> Class likely to purchase an <br> EV as their next vehicle |
| :---: | :---: |
| $<\$ 20,000$ | $6 \%$ |
| $\$ 20,000-\$ 49,999$ | $21 \%$ |
| $\$ 50,000-\$ 74,999$ | $20 \%$ |
| $\$ 75,000-\$ 99,999$ | $16 \%$ |
| $>\$ 100,000$ | $24 \%$ |
| Prefer not to answer | $13 \%$ |

Ensuring that AEE efforts serve low income customers, especially those within EJ Areas, is a high priority for Duquesne Light. The Company recognizes that the needs of communities that it serves vary widely, and EV engagement must be responsive and inclusive to those varied needs. AEE efforts tailored to low income customers will be informed by equitable best practices that are emerging in other regions of the country, including the Greenlining Institute's "Electric Vehicles for All Equity Toolkit." ${ }^{37}$
Q. What are the Company's projected costs of the AEE activities?
A. The Company's projected costs for 2022 are as follows:

[^56]| Expense |  |
| :--- | :--- |
| Tools and Software | $\$ 187,460$ |
| Advertising and Market Research | $\$ 95,000$ |
| Events | $\$ 85,000$ |
| Sponsorship and Training | $\$ 25,000$ |
| Total | $\$ \mathbf{3 9 2 , 4 6 0}$ |

The Company expects to incur similar annual expenses in subsequent years.
Q. How will the Company recover its costs of the AEE activities?
A. These costs will be recovered through base distribution rates.
B. Fleet Electrification Advisory Service
Q. Please summarize the Company's proposed Fleet Electrification Advisory Service.
A. This service will provide targeted outreach to customers with vehicle fleets to help them to develop fleet electrification plans. Through this service, the Company will collect and analyze customer fleet data and produce fleet strategic electrification plans for participating customers. The plan will identify which vehicles are the best candidates for electrification, calculate total cost of ownership, estimate GHG emissions and emission reductions, identify available financial incentives, and
estimate the charging infrastructure required to support electrification. The end result will be a plan that the customer can use to guide its decision-making about fleet electrification efforts going forward. Where applicable, the Company will further assist participating customers in implementing these plans through the Fleet Charging pilot.

## Q. Why does the Company believe it is important to offer this service?

A. This service will leverage the Company's expertise to help fleet customers overcome unique challenges to fleet electrification. Many fleet customers interested in electrification lack the resources to understand the nascent EV market, evaluate their own fleets, and analyze the financial and practical implications of electrification. Without undertaking such a full-scale evaluation, many fleets will not make the transition in the near future due to the large number of unknowns. The Fleet Electrification Advisory Service will address this gap.

In addition to benefitting participating customers, this program will also benefit the Company by providing early, detailed insight into customers' electric service needs. The Company anticipates that engaging with customers early in the planning process will help inform the Company's distribution system planning, construction, and operation decisions.
Q. What customers will be eligible and targeted for this service?
A. Non-residential customers with a minimum fleet size of 10 vehicles will be eligible to participate. This minimum fleet size requirement is reduced to 6 vehicles for 501(c)(3) not-for-profit entities. The Company anticipates that customers with smaller fleets will be able to use the tools and information on the Company's website to conduct self-guided fleet evaluations. The Company will primarily target those customers that may not already have national, corporate-level support to conduct this type of evaluation, and, in particular, will focus on public-sector entities such as municipal governments and school districts.

## Q. Please describe how the Company will conduct outreach and education for the Fleet Electrification Advis ory Service.

A. The Company will recruit municipal governments, school districts, non-profits, and private sector commercial customers to participate in this service. The Company will host Fleet Electrification Advisory Service content and application instructions on its website, and will conduct direct customer outreach via its Major Accounts, Government Affairs, Universal Services, and Transportation Electrification teams. The Company will also work with local non-profits, trade associations, and fleet dealers to help inform customers of this opportunity and identify good candidates for inclusion.
Q. How many customers are projected to participate in the service?
A. The Company is anticipating that a total of 36 customers will participate from 2022 through 2024.
Q. How will low-income customers and communities benefit from this service?
A. The Company will target non-profit organizations that serve EJ Areas to participate in the Fleet Electrification Advisory Service. Perhaps even more than other customers with fleets, these entities may lack the resources or expertise to undertake a fleet electrification evaluation, even if doing so would ultimately benefit their operations and the communities they serve. The Company anticipates having at least two non-profit entities serving EJ Areas participate on an annual basis.

## Q. What are the Company's projected costs for this service?

A. The Company projects the following costs in 2022 for this service:

Table 11: Fleet Electrification Advisory Service 2022 Costs

| Fleet Dectrification Advisory Service 2022 Costs |  |
| :--- | :--- |
| Expense | $\$ 194,300$ |
| Customer Assessments | $\$ 40,600$ |
| ProgramManagement | $\$ 50,000$ |
| Fleet Identification | $\$ 2,500$ |
| Marketing/Advertising/Education | $\$ 5,000$ |
| IT | $\$ \mathbf{2 9 2 , 4 0 0}$ |
| Total |  |

The Company expects to incur similar annual expenses in subsequent years.

## Q. How will the Company recover its costs of the service?

A. The costs of this service will be recovered through base distribution rates.
C. Registration Incentive

## Q. Please summarize the Company's proposed Registration Incentive.

A. The Registration Incentive will offer a one-time incentive to customers that register their EV with the Company. It is designed to provide the Company with information regarding the location and usage patterns of customers with EVs and to assist with future distribution system planning.
Q. Why is the Company proposing to continue the Registration Incentive ?
A. As of December 2020, there were approximately 3,900 EVs in operation in the Company's service territory. As of December 2020, only $17 \%$ of these vehicles have been registered with the Company. The customer information collected to date serves as a good foundation, but more responses are needed for a representative sample. Additionally, as more customers purchase EVs, the need to stay apprised of the evolving impact that the vehicles are having on the grid becomes more important, as discussed further in Exhibit SO-3.
Q. Is the Company proposing any changes to the Registration Incentive?
A. Yes. During administration of the EV ChargeUp Pilot, the Company found that the manual application of the incentive to a customer's bill is process-intensive. Moving forward, the Company proposes to provide the incentive in the form of a pre-paid debit card instead of a bill credit.

The Company proposes to reduce the incentive amount from $\$ 60$ to $\$ 50$. This would reduce costs an average of approximately $\$ 16,500$ per year from 20222024. An incentive amount of $\$ 50$ is in line with EV registration programs offered by other electric utility companies, including PECO. ${ }^{38}$ The Company does not anticipate that this incentive reduction will impact customer participation.

## Q. How will customers apply for the Registration Incentive?

A. Customers apply for the Registration Incentive by visiting Duquesne Light's website and accessing the application link. Applicants must complete the application and include the required documentation, including proof of vehicle registration.

## Q. What are the eligibility requirements for the Registration Incentive?

A. The applicant must be a residential or nonresidential customer who owns or leases an EV. Applications are evaluated to ensure that each vehicle is registered only once; only one incentive is available per qualified vehicle. Only plug-in EVs, as
${ }^{38}$ PECO (2021). "Smart Driver Rebate," Obtained from: https://pecorebateportal.com/electric-vehicles/smart-driver-rebate.html.
identified by the U.S. Environmental Protection Agency and U.S. Department of Energy's fueleconomy.gov database, qualify.
Q. How many customers do you expect to receive the Registration Incentive?
A. The Company estimates that an average of 3,977 customers will participate each year from 2022-2024. This estimate is based on an average of EPRI's median and high EV adoption scenarios within the Company's service territory. It assumes an uptake of the incentive by $25 \%$ of EVs in operation in 2022, $30 \%$ of EVs in operation in 2023, and $35 \%$ of EVs in operation in 2024.
Q. What are the Company's projected costs of the Registration Incentive?
A. The Company anticipates the following expenses for this activity in 2022:

Table 12: Registration Incentive 2022 Costs

| Registration Incentive 2022 Costs |  |
| :--- | :--- |
| Expense | $\$ 47,660$ |
| Incentives | $\$ 13,290$ |
| Program Administration | $\$ 7,000$ |
| Advertising and Collateral | $\$ 67,950$ |
| Total |  |

The Company expects to incur similar annual expenses in subsequent years.
Q. How will the Company recover its costs of the Registration Incentive?
A. These costs will be recovered through base distribution rates.
VI. OTHER TRANSPORTATION ELECTRIFICATION MATTERS
Q. Does the Company's proposal include other aspects related to the EV Charge Up Pilot?
A. Yes. The Settlement in the Company's previous base rates case deferred resolution of certain EV ChargeUp Pilot issues to this proceeding. These issues are (1) recovery of L2 rebate costs; (2) treatment of unspent Registration Incentive funds; and (3) a plan for an EV load management program. I address each of these issues, as well as the costs of the DC Fast Charging Evaluation undertaken as part of the EV ChargeUp Pilot, in this section.
Q. What did the 2018 Settlement provide with respect to $\mathbf{L} 2$ rebate expenses?
A. In relevant part, the Settlement authorized the Company to invest up to $\$ 650,000$ in expense in the form of rebates behind the meter. The Settlement provides that "Determination of the appropriate method of cost recovery for the behind the meter Level 2 rebate costs will be deferred" to this base rate case proceeding. Settlement II 45(b).
Q. How much expense did the Company incur in $L 2$ rebate costs?
A. The Company incurred $\$ 413,848$ of L2 rebate costs under this program. I address the Company's proposed treatment of these expenses below.

## Q. What did the 2018 Settlement provide with respect to customer Registration Incentives?

A. The Settlement provided for $\$ 70,000$ per year in registration incentives, and further provides that "[a]ny unused portion of the $\$ 70,000$ per year will be addressed" in this proceeding. Settlement II 45(e).
Q. Is there any unused portion of the $\$ \mathbf{7 0 , 0 0 0}$ perye ar of Registration Incentives?
A. Yes. At the conclusion of 2020, unused Registration Incentives totaled \$48,580 for 2019 and $\$ 51,640$ for 2020. The Company recorded these amounts as a regulatory liability. The unused portion of the 2021 program budget is projected to be $\$ 39,922$, for a total expected unused incentive amount of $\$ 140,142$ for 2019-2021. This 2021 estimate is based on an average of EPRI's median and high EV adoption scenarios within the Company's service territory and assumes an uptake of the incentive by $20 \%$ of EVs in operation.

## Q. What is the Company's proposal with respect to $\mathbf{L} 2$ rebate expenses and unused Registration Incentive expenses?

A. The Company is proposing to net these two amounts $(\$ 413,848-\$ 140,124=$ $\$ 273,724$ ) and recover the net amount normalized over a three-year period. Company witness Mr. O'Brien's testimony addresses this in further detail in his direct testimony, DLC St. No. 10.
Q. What does the Settlement provide with respect to DC Fast Charging Evaluation?
A. In relevant part, the Settlement provided as follows:
a. The Company's proposed DC Fast Charging Evaluation will be limited to make ready infrastructure, as defined in DLC Statement No. 6, and fast charging stations owned by the Company to be used solely for the Company and the Port Authority of Allegheny County electric bus evaluation. The cost associated with this investment included in rate base in this case is $\$ 500,000$.

2018 Rate Case Settlement, II 45(a).
Q. Did this Settlement provision limit the Company's costs of the DC Fast Charging Evaluation?
A. No; the Settlement simply identified the extent of the investment that was deemed to be included in rate base through the FPFTY of the 2018 rate case.
Q. Has the Company incurred additional costs to implement the DC Fast Charging Evaluation?
A. Yes. The Company incurred a total of $\$ 854,736$ in capital investment for this activity.
Q. Is the Company proposing to be allowed to include the entire amount in rate base in this proceeding?
A. Yes. It was not possible to complete the evaluation for $\$ 500,000$. For example, in order to deliver service to the two (2) 150 kW bus DCFCs and install make ready infrastructure, the Company needed to construct new service facilities. These costs were prudent because they supported system upgrades that will facilitate further DCFC installations at the Port Authority's garage at a reduced cost per charging station. Moreover, the DC Fast Charging Evaluation provides many benefits for customers, as I explain in Exhibit SO-3.
Q. Please summarize the 2018 Settlement's provisions regarding an EV load management program.
A. The Settlement provides at $\mathbb{I}[45(\mathrm{~d})$ that the Company will assess the EV ChargeUp Pilot data and develop a plan for an EV load management program, to be proposed in this proceeding.

## Q. How do the Company's proposals support EV load management?

A. Several components of the Company's proposals, as well as its existing EV programs, are designed in part to help EV customers manage their load.

First, as Company witness Ms. Everett describes in detail in her direct testimony, DLC St. No. 18, the Company is proposing a residential subscription rate pilot in this proceeding, wherein participating residential customers' variable distribution charges will be based on their demand subscription level. This program will incent participating customers to spread out or "flatten" their electric load,
which may be particularly attractive to customers with EVs that can be charged during off-peak hours.

Additionally, in its Default Service Plan IX proceeding, Docket No. P-2020-3019522, the Company obtained approval for the Electric Vehicle Time of Use rate (EV-TOU) supply rate program that will become effective in June 2021. The EV-TOU rate is a voluntary supply rate available to residential customers who own or lease an EV, and small and medium commercial customers that own or lease an EV or that own charging stations. It provides a schedule of three time periods (peak, shoulder, and off-peak) and promotes vehicle charging with lower supply rates during shoulder and off-peak hours.

The Company's proposals also reflect the need to continue to collect and analyze data to inform how the Company and its customers plan for, accommodate, and manage EV loads. Closely related to these efforts, as Company witness Mr. Morris describes in his direct testimony, DLC St. No. 4, one driver of this rate case is the Company's ongoing investment in distribution and IT system technologies. As Mr. Morris discusses, these investments will help to mature the Company's system planning and operational flexibility, which can support future load management strategies.

## VII. CONCLUSION

## Q. Does that conclude your testimony?

1 A. Yes it does. I reserve the right to supplement my testimony through the course of 2 this proceeding.

Michael Zimmerman
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April 2, 2020

## Via Electronic Filing

Ms. Rosemary Chiavetta, Secretary
Pennsylvania Public Utility Commission
Commonwealth Keystone Building, $2^{\text {nd }}$ Floor
400 North Street
Harrisburg, PA 17120

## Re: Duquesne Light Company's EV ChargeUp Pilot Annual Report Docket No. R-2018-3000124

Dear Secretary Chiavetta:
Pursuant to Paragraph 45(f) of the Joint Petition for Approval of Settlement Stipulation, approved in relevant part by the Pennsylvania Public Utility Commission by Order entered December 20, 2018 at the above-captioned docket, please find enclosed for filing Duquesne Light Company's EV ChargeUp Pilot Annual Report for the period January 1, 2019 through February 29, 2020.

Should you have any questions, please do not hesitate to contact me.
Respectfully Submitted,


Michael Zimmerman
Senior Counsel, Regulatory
Enclosure


## EV ChargeUp Pilot Annual Report January 2019 - February 2020

April 2, 2020

## Introduction

Duquesne Light Company (the "Company") hereby submits this Report pursuant to the Joint Petition for Approval of Settlement Stipulation ("Settlement"), approved in relevant part by the Pennsylvania Public Utility Commission by Order entered December 20, 2018 at Docket No. R-2018-3000124 ("Settlement"). Settlement IT 45(f) provides that the Company will submit an annual report concerning the Company's implementation of the EV ChargeUp Pilot ("Pilot"), including: (a) charging infrastructure deployed over time, including by location, and activation date; (b) charging infrastructure installation costs by site type (broken out by capital and rebate costs); (c) for all charging stations deployed, the usage rate by site type and charger type; and (d) estimated avoided emissions resulting from the programs.

The Company's EV ChargeUp Pilot commenced on January 1, 2019. This Report covers the period January 1, 2019 through February 29, 2020.

## Charging Infrastructure Deployment

## Level 2 Charging Station Evaluation

The Pilot has deployed 49 Level 2 dual-port charging stations ( 98 plugs) at nine publically-accessible customer sites. Each site included a minimum of four Level 2 dual port charging stations. Table 1 indicates the date of site electrification for each of the Level 2 charging station evaluation sites.

Table 1: Level 2 Charging Station Evaluation (as of 2/29/2020)

| Customer <br> Site | Site <br> Electrification <br> Date | Number <br> of Plugs | DLC Installation <br> Costs (Up to <br> and Including <br> Meter) | DLC <br> Installation <br> Costs <br> (Rebate) | Electricity <br> consumed <br> (kWh) | CO2 <br> Avoided <br> (Tons) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{1}$ | $10 / 11 / 2019$ | 16 | $\$ 977$ | $\$ 69,149$ | 2,116 | 2.49 |
| $\mathbf{2}$ | $11 / 20 / 2019$ | 10 | $\$ 1,572$ | $\$ 18,650$ | 1,393 | 1.64 |
| $\mathbf{3}$ | $12 / 19 / 2019$ | 8 | $\$ 1,545$ | $\$ 52,819$ | 2,511 | 2.96 |
| $\mathbf{4}$ | $12 / 30 / 2019$ | 8 | $\$ 1,627$ | $\$ 32,342$ | 2,153 | 2.54 |
| $\mathbf{5}$ | $12 / 30 / 2019$ | 8 | $\$ 624$ | $\$ 24,056$ | 685 | 0.81 |
| $\mathbf{6}$ | $1 / 14 / 2020$ | 8 | $\$ 1,872$ | $\$ 55,514$ | 3,017 | 3.56 |
| $\mathbf{7}$ | $1 / 14 / 2020$ | 8 | $\$ 2,103$ | $\$ 29,550$ | 496 | 0.58 |
| $\mathbf{8}$ | $1 / 21 / 2020$ | 8 | $\$ 1,959$ | $\$ 32,740$ | 203 | 0.24 |
| $\mathbf{9}$ | $2 / 28 / 2020 *$ | 24 | $\$ 343$ | $\$ 100,000$ | 0 | 0 |

[^57]This table depicts only Duquesne Light's costs. As the table shows, Duquesne Light incurred relatively low front-of-meter costs associated with each installation. This indicates that Duquesne Light is able to serve these charging station installations mainly through pre-existing distribution grid capacity.

Participating customers have demonstrated a high level of "buy-in" with respect to charging station installation. Duquesne Light worked closely with customers as part of the Pilot, including assisting customers in leveraging the Pilot to obtain other sources of project funding. Customer-reported project cost data (including costs related to charging station installation, charging station hardware, service fees, signage, etc.) indicates that the Company's rebate covered about $1 / 3$ of project costs, customers themselves covered $1 / 3$ of project costs, and the state's Driving PA Forward rebate program covered $1 / 3$ of project costs.

## DC Fast Charging Station Evaluation

The Pilot deployed two DC fast charging stations at one Port Authority of Allegheny County location for electric buses and Company fleet vehicles. The DC fast charging stations were activated on February 20, 2020, and the Port Authority's electric buses were placed into service on March 30, 2020.

Table 2: DC Fast Charging Station Evaluation (as of 2/29/2020)

| Customer <br> Site | Site <br> Electrification <br> Date | Number of Plugs |
| :---: | :---: | :---: | :---: | :---: | :---: |$\quad$| DLC Installation |
| :---: |
| Costs |$\quad$| Electricity |
| :---: |
| consumed |
| $(\mathrm{kWh})$ | | $\mathrm{CO}_{2}$ <br> Avoided <br> (Tons) |
| :---: |
| $\mathbf{1}$ |

The Port Authority has also demonstrated success in leveraging other funding sources to support fleet electrification, including funding from the Federal Transit Administration's Low or No Emission Vehicle Program for the incremental cost difference between its electric buses and traditional diesel buses.

[^58]
## Estimated Avoided Emissions

The Company has developed a framework to estimate the avoided emissions (Appendix 1). The objective of this framework is to measure the difference in emissions from the use of electricity as a transportation fuel resulting from the Pilot relative to a business-as-usual scenario in which petroleum-based transportation fuels are used for vehicle travel.

The Pilot has resulted in total estimated avoided emissions of 14.8 Tons $\mathrm{CO}_{2}$ as of $2 / 29 / 2020$. Table 1 indicates estimated avoided emissions $\left(\mathrm{CO}_{2}\right)$ of the Level 2 charging stations for each of the Level 2 charging station evaluation sites. No avoided emissions have been recorded as a result of the DC fast charging station evaluation as of 2/29/2020.

## Conclusion

The Company is encouraged by the positive overall response to the Pilot to date, particularly with respect to the high degree of "buy-in" demonstrated by participants. This response affirms the Company's continued support for transportation electrification. With strategic planning, transportation electrification can provide benefits to all utility customers, the electricity system, and the environment. The Company is uniquely positioned to realize these benefits by supporting the deployment of critical electrical infrastructure, spurring the deployment of innovative technologies, generating customer awareness of transportation electrification, and managing EV load to enhance system flexibility and reliability.

The Company continues to experience ongoing interest from customers, and foresees significant additional opportunities to accelerate the benefits of electric transportation for all Duquesne Light customers. The Company looks forward to further engaging with the Commission and stakeholders on transportation electrification in future proceedings.

## Appendix 1

## Level 2 Charging Station Evaluation Avoided Emissions Framework

## Avoided Emissions Framework Inputs

| Input | Unit | Assumption |
| :--- | :--- | :--- |
| Energy dispensed | kWh | EV Charge Rebate data |
| EV Fuel Economy | kWh per mile $(\mathrm{kWh} / \mathrm{mi})$ | $0.3 \mathrm{kWh} / \mathrm{mi}^{2}$ |

Avoided Emissions Framework Intermediate Outputs

| Intermediate Output | Unit | Calculation <br> Energy Dispensed / EV Fuel <br> Electric Vehicle Miles Traveled |
| :--- | :--- | :--- |
| (eVMT) |  | Economy |
| Electric Vehicle Total | $\mathrm{lb} . \mathrm{CO}_{2}$ | Energy Dispensed * 2018 <br> Average PA Carbon Intensity of <br> Emissions |
| Electricity Generation |  |  |
| Avoided Gasoline Vehicle | $\mathrm{lb} . \mathrm{CO}_{2}$ | (eVMT / Gasoline Vehicle Fuel <br> Emissions |
| Economy) *Carbon Intensity of |  |  |
| Gasoline |  |  |

Avoided Emissions Framework Final Output

| Final Output | Unit | Calculation |
| :--- | :--- | :--- |
| Net Avoided Emissions | Tons of $\mathrm{CO}_{2}$ | (Avoided Gasoline Vehicle <br> Emissions - Electric Vehicle <br> Total Emissions) $/ 2,000 \mathrm{lb}$. |

[^59]

# EV ChargeUp Pilot Annual Report March 2020 - February 2021 

April 16, 2021

## Introduction

Duquesne Light Company (the "Company") hereby submits this Report pursuant to the Joint Petition for Approval of Settlement Stipulation ("Settlement"), approved in relevant part by the Pennsylvania Public Utility Commission by Order entered December 20, 2018 at Docket No. R-2018-3000124 ("Settlement"). Settlement $\mathbb{T} 45$ (f) provides that the Company will submit an annual report concerning the Company's implementation of the EV ChargeUp Pilot ("Pilot"), including: (a) charging infrastructure deployed over time, including by location, and activation date; (b) charging infrastructure installation costs by site type (broken out by capital and rebate costs); (c) for all charging stations deployed, the usage rate by site type and charger type; and (d) estimated avoided emissions resulting from the programs.

The Company's EV ChargeUp Pilot commenced on January 1, 2019. The first reporting period covered January 1, 2019 through February 29, 2020. This Report covers the period March 1, 2020 through February 28, 2021.

## Charging Infrastructure Deployment

## Level 2 Charging Station Evaluation

The Pilot has deployed 49 Level 2 dual-port charging stations ( 98 plugs) at nine publically-accessible customer sites. Each site included a minimum of four Level 2 dual port charging stations. Table 1 indicates the date of site electrification for each of the Level 2 charging station evaluation sites.

## Table 1: Level 2 Charging Station Evaluation

| Customer Site | Site Electrification Date | Number of Plugs | DLC <br> Installation Costs (Up to and Including Meter) | DLC Installation Costs (Rebate) | Electricity consumed (kWh) <br> (Activ ation - 2/29/20) | $\begin{gathered} \mathrm{CO}_{2} \\ \text { Avoided } \\ \text { (Tons) } \\ \text { (Activation } \\ -2 / 29 / 20 \text { ) } \end{gathered}$ | Electricity consumed (kWh) $\begin{aligned} & (3 / 1 / 20- \\ & 2 / 28 / 21) \\ & \hline \end{aligned}$ | $\begin{gathered} \mathrm{CO}_{2} \\ \text { Avoided } \\ \text { (Tons) } \\ (3 / 1 / 20- \\ 2 / 28 / 21 \text { ) } \end{gathered}$ | Electricity consumed (kWh) <br> (Total) | $\mathrm{CO}_{2}$ <br> Av oided (Tons) <br> (Total) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 10/11/2019 | 16 | \$977 | \$69,149 | 2,116 | 2.49 | 10,647 | 12.6 | 12,763 | 15.1 |
| 2 | 11/20/2019 | 10 | \$1,572 | \$18,650 | 1,393 | 1.64 | 2,594 | 3.1 | 3,987 | 4.7 |
| 3 | 12/19/2019 | 8 | \$1,545 | \$52,819 | 2,511 | 2.96 | 7,594 | 9.0 | 10,105 | 12.0 |
| 4 | 12/30/2019 | 8 | \$1,627 | \$32,342 | 2,153 | 2.54 | 10,115 | 11.9 | 12,268 | 14.4 |
| 5 | 12/30/2019 | 8 | \$624 | \$24,056 | 685 | 0.81 | 3,428 | 4.0 | 4,113 | 4.8 |
| 6 | 1/14/2020 | 8 | \$1,872 | \$55,514 | 3,017 | 3.56 | 4,964 | 5.9 | 7,981 | 9.5 |
| 7 | 1/14/2020 | 8 | \$2,103 | \$29,550 | 496 | 0.58 | 3,000 | 3.5 | 3,496 | 4.1 |
| 8 | 1/21/2020 | 8 | \$1,959 | \$32,740 | 203 | 0.24 | 1,058 | 1.49 | 1,261 | 1.7 |
| 9 | 2/28/2020 | 24 | \$343 | \$100,000 | 0 | 0 | 0 | 0 | 0 | 0 |

Data indicates Level 2 charging station utilization across all sites was negatively impacted due to the COVID-19 pandemic. Beginning in March 2020, shortly after sites were electrified, customer site hosts generally observed decreased usage of their parking facilities. In one instance, Customer Site Host 9, the charging stations have not been utilized since the site was electrified. The Company attributes this to the COVID19 pandemic.

Table 1 depicts only Duquesne Light's costs. As the table shows, Duquesne Light incurred relatively low front-of-meter costs associated with each installation. This indicates that Duquesne Light is able to serve these charging station installations mainly through pre-existing distribution grid capacity.

Participating customers have demonstrated a high level of "buy-in" with respect to charging station installation. Duquesne Light worked closely with customers as part of the Pilot, including assisting customers in leveraging the Pilot to obtain other sources of project funding. Customer-reported project cost data (including costs related to charging station installation, charging station hardware, service fees, signage, etc.) indicates that the Company's rebate covered about $1 / 3$ of project costs, customers themselves
covered $1 / 3$ of project costs, and the state's Driving PA Forward rebate program covered $1 / 3$ of project costs.

## DC Fast Charging Station Evaluation

The Pilot deployed two DC fast charging stations at one Port Authority of Allegheny County location for electric buses and Company fleet vehicles. The DC fast charging stations were activated on February 20, 2020, and the Port Authority's electric buses were placed into service on March 30, 2020.

Table 2: DC Fast Charging Station Evaluation

| Customer Site | Site Electrification Date | Number of Plugs | $\begin{aligned} & \text { DLC } \\ & \text { Installation } \\ & \text { Costs } \end{aligned}$ | Electricity consumed (kWh) | $\mathrm{CO}_{2}$ Av oided (Tons) | Electricity consumed (kWh) | $\mathrm{CO}_{2}$ <br> Av oided (Tons) | Electricity consumed (kWh) | $\underset{\text { Avoided }}{\mathrm{CO}_{2}}$ (Tons) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | (Activation $-2 / 29 / 20)$ | (Activation $-2 / 29 / 20)$ | $\begin{aligned} & (3 / 1 / 20- \\ & 2 / 28 / 21) \end{aligned}$ | $\begin{aligned} & (3 / 1 / 20- \\ & 2 / 28 / 21) \end{aligned}$ | (Total) | (Total) |
| 1 | 2/20/2020 | 2 | \$854,736 | 0 | 0 | 25,198 | 34.8 | 25,198 | 34.8 |

## Estimated Avoided Emissions

The Company has developed a framework to estimate the avoided emissions from the Level 2 Charging Station Evaluation (Appendix 1) and the DC Fast Charging Station Evaluation (Appendix 2). The objective of these frameworks are to measure the difference in emissions from the use of electricity as a transportation fuel resulting from the Pilot relative to a business-as-usual scenario in which petroleum-based transportation fuels are used for vehicle travel.

The Pilot has resulted in total estimated avoided emissions of 66.3 Tons $\mathrm{CO}_{2}$ for the Level 2 Charging Station Evaluation and 34.8 Tons $\mathrm{CO}_{2}$ for the DC Fast Charging Station Evaluation from 3/1/20 through 2/28/21. Table 1 indicates estimated avoided emissions $\left(\mathrm{CO}_{2}\right)$ of the Level 2 charging stations for each of the Level 2 Charging Station Evaluation sites. Table 2 describes the avoided emissions recorded as a result of the DC Fast Charging Station Evaluation.

[^60]
## Conclusion

The Company continues to be encouraged by the positive overall response to the Pilot to date, particularly with respect to the high degree of "buy-in" demonstrated by participants. This response affirms the Company's continued support for transportation electrification. With strategic planning, transportation electrification can provide benefits to all utility customers, the electricity system, and the environment. The Company is uniquely positioned to realize these benefits by supporting the deployment of critical electrical infrastructure, spurring the deployment of innovative technologies, generating customer awareness of transportation electrification, and managing EV load to enhance system flexibility and reliability.

In spite of the pandemic the Company continues to experience ongoing interest from customers, and foresees significant additional opportunities to accelerate the benefits of electric transportation for all Duquesne Light customers. The Company looks forward to further engaging with the Commission and stakeholders on transportation electrification in future proceedings.

## Appendix 1

## Level 2 Charging Station Evaluation Avoided Emissions Framework

## Av oided Emissions Framework Inputs

| Input | Unit | Assumption |
| :--- | :--- | :--- |
| Energy dispensed | kWh | EV Charge Rebate data |
| EV Fuel Economy | kWh per mile $(\mathrm{kWh} / \mathrm{mi})$ | $0.3 \mathrm{kWh} / \mathrm{mi}^{2}$ |
| Gasoline Vehicle Fuel Economy | miles per gallon $(\mathrm{mpg})$ | $24.9 \mathrm{mpg}^{3}$ |
| 2018 Average Pennsylvania <br> Carbon Intensity of Electricity <br> Generation | grams of $\mathrm{CO}_{2}$ per $\mathrm{kWh}(\mathrm{lb}$. <br> $\left.\mathrm{CO}_{2} / \mathrm{kWh}\right)$ | $.789 \mathrm{lb} \mathrm{CO}_{2} / \mathrm{kWh}^{4}$ |
| Carbon Intensity of Gasoline | pounds of GHG per gallon <br> (Ib/gal) | $23.5 \mathrm{lb} / \mathrm{gal}^{5}$ |

## Avoided Emissions Framework Intermediate Outputs

| Intermediate Output | Unit | Calculation |
| :---: | :---: | :---: |
| Electric Vehicle Miles Traveled (eVMT) | mi | Energy Dispensed / EV Fuel Economy |
| Electric Vehicle Total Emissions | lb. $\mathrm{CO}_{2}$ | Energy Dispensed * 2018 Average PA Carbon Intensity of Electricity Generation |
| Avoided Gasoline Vehicle Emissions | lb. $\mathrm{CO}_{2}$ | (eVMT / Gasoline Vehicle Fuel Economy) * Carbon Intensity of Gasoline |

Av oided Emissions Framework Final Output

| Final Output | Unit | Calculation |
| :--- | :--- | :--- |
| Net Avoided Emissions | Tons of $\mathrm{CO}_{2}$ | (Avoided Gasoline Vehicle <br> Emissions - Electric Vehicle <br> Emal Emissions) $/ 2,000 \mathrm{lb}$. |

[^61]
## Appendix 2

## DCFC Evaluation Avoided Emissions Framework

Av oided Emissions Framework Inputs

| Input | Unit | Assumption <br> Total Energy Consumed by Bus <br> Trip |
| :--- | :--- | :--- | kWh $\quad$ Measured directly by bus

Avoided Emissions Framework Intermediate Outputs

| Intermediate Output | Unit | Calculation |
| :---: | :---: | :---: |
| Electric Bus $\mathrm{CO}_{2}$ Emissions per Kilowatt-Hour | $\mathrm{lb} \mathrm{CO} / \mathrm{chWh}$ | (2018 PA Total $\mathrm{CO}_{2}$ Emissions from Electrical Power Generation * 2204.62 lb / metric ton) / (2018 PA Total Electrical Power Generation * 1000 kWh / MWh) |
| Electric Bus Trip $\mathrm{CO}_{2}$ Emissions | lb CO 2 | Total Energy Consumed by Bus Trip / Electric Bus $\mathrm{CO}_{2}$ Emissions per Kilowatt-Hour |
| Diesel Transit Bus Equivalent Trip $\mathrm{CO}_{2}$ Emissions | lb CO 2 | (Trip distance miles / Diesel Transit Bus Avg Fuel Economy) * Carbon Intensity of Gasoline |

## Av oided Emissions Framework Final Output

| Final Output | Unit | Calculation |
| :--- | :--- | :--- |
| Net Avoided Emissions | Tons of $\mathrm{CO}_{2}$ | (Diesel Transit Bus Equivalent <br> Trip $\mathrm{CO}_{2}$ Emissions - Electric Bus <br> Trip $\mathrm{CO}_{2}$ Emissions) $/ 2,000 \mathrm{lb} /$ <br> ton |

[^62]

## EV ChargeUp Pilot Progress Report

April 2021

## Exhibit SO-3

## Introduction

Duquesne Light Company (the "Company") hereby submits this Report pursuant to the Joint Petition for Approval of Settlement Stipulation ("Settlement"), approved in relevant part by the Pennsylvania Public Utility Commission by Order entered December 20, 2018 at Docket No. R-2018-3000124 ("Settlement"). Settlement $\mathbb{T} 45$ (f) provides that the Company will submit a report in its next rate case proceeding on the EV ChargeUp Pilot Level 2 Charging Evaluation ("L2 Pilot Evaluation"), including: (a) customer participation and feedback; (b) public access to charging stations; (c) charging station usage; and (d) identifies the charging station revenues received by the Company from charging station owners participating in the L2 Pilot Evaluation. The Company is providing information to meet this reporting requirement herein and is also covering information related to the performance of three additional activities included in the EV ChargeUp Pilot; DC Fast Charger Evaluation, EV Registration Incentive, and Education and Outreach.

The Company's EV ChargeUp Pilot commenced on January 1, 2019. This Report covers the period January 1, 2019 through February 28, 2021.

## L2 Pilot Evaluation

Through the L2 Pilot Evaluation, the Company offered Commercial customers a rebate for electrical make-ready costs required to install a minimum of 4 dual-port L2 charging stations available for public use within the Company's service territory.

## L2 Pilot Evaluation Public Access

The L2 Pilot Evaluation supported the deployment of charging stations at nine publically-accessible customer sites. Sites are all located within parking garages, and each site is accessible to a combination of user types. For example, one installation at a mixed use transit oriented development site is accessible to those accessing public transit, working at nearby businesses, patrons of retail or restaurants, or living in nearby multi-unit dwellings. To raise awareness of completed L2 Pilot Evaluation installations, the Company partnered with the installation site host customer to install promotional
signage in heavily-trafficked facility common areas such as parking garage lobbies and elevators.

The Company earmarked a minimum of $10 \%$ investment allocation for the L2 Pilot Evaluation for disadvantaged communities. To identify such communities, the Company aligned with the definition of Environmental Justice (EJ) Area found in the Pennsylvania Department of Environmental Protection's Environmental Justice Public Participation Policy. ${ }^{1}$ Under this policy, an EJ Area is defined as any census tract where 20 percent or more individuals live at or below the federal poverty line, and/or 30 percent or more of the population identifies as a non-white minority, based on data from the U.S. Census Bureau and the federal guidelines for poverty. Ultimately, 78\% of L2 Pilot Evaluation rebate funds were allocated to projects within these EJ Area communities.

## L2 Pilot Evaluation Charging Station Usage

Figure 2 shows the number of unique users of charging stations each month and Figure 3 shows the total number of charging station sessions by month. Throughout the program lifetime through the end of February, 2021, more than 4,500 charging station sessions have been recorded. The first charging station incented by the program was electrified on October 11, 2019. As additional sites became electrified in the following months, usage grew quickly. In mid-March 2020, usage declined dramatically due to the COVID-19 pandemic. Usage of the charging stations rebounded to some extent over the course of 2020, but it is still stunted due to members of the community traveling away from home at a reduced rate due to the pandemic. In fact, the top two sites with the greatest usage during the pandemic are public sites that are accessible to multi-unit dwelling residential customers, reflecting the importance of charging accessibility at such locations regardless of pandemic conditions.

Figure 2: Number of Charging Station Unique Users by Month (Nov 2019 - Feb 2021)

[^63]

Figure 3: Number of Charging Station Sessions by Month
(Nov 2019 - Feb 2021)


L2 Pilot Evaluation Charging Station Revenues (by year)
Table 1 identifies the charging station revenue received by the Company from charging station owners. In total, a combined incremental revenue of $\$ 10,732$ has been received by the Company as of February 2021. As described above, the utilization of the charging stations was significantly impacted by the COVID-19 pandemic. It is expected that during post-pandemic times and with increased EV adoption in the region, these revenue figures will continue to grow over the charging stations' lifetime.

Table 1: Charging Station Revenue ${ }^{2}$ Received by the Company by Year
(Nov 2019 - Feb 2021)

| Customer <br> Site | Site <br> Electrification <br> Date | Revenue <br> $\mathbf{( 2 0 1 9 )}$ | Revenue <br> $\mathbf{( 2 0 2 0 )}$ | Revenue <br> $\mathbf{( 2 0 2 1 )}$ | Cumulative <br> Total <br> Revenue |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{1}$ | $10 / 11 / 2019$ | $\$ 7.38$ | $\$ 782.69$ | $\$ 145.58$ | $\$ 935.65$ |
| $\mathbf{2}$ | $11 / 20 / 2019$ | $\$ 107.65$ | $\$ 831.58$ | $\$ 135.23$ | $\$ 1,074.46$ |
| $\mathbf{3}$ | $12 / 19 / 2019$ | $\$ 82.92$ | $\$ 2,439.27$ | $\$ 503.81$ | $\$ 3,026.00$ |
| $\mathbf{4}$ | $12 / 30 / 2019$ | $\$ 0$ | $\$ 1,404.46$ | $\$ 190.63$ | $\$ 1,595.09$ |
| $\mathbf{5}$ | $12 / 30 / 2019$ | $\$ 0.22$ | $\$ 873.59$ | $\$ 208.02$ | $\$ 1,081.83$ |
| $\mathbf{6}$ | $1 / 14 / 2020$ | $\$ 0$ | $\$ 1,286.02$ | $\$ 211.51$ | $\$ 1,497.54$ |
| $\mathbf{7}$ | $1 / 14 / 2020$ | $\$ 0$ | $\$ 565.01$ | $\$ 183.32$ | $\$ 748.34$ |
| $\mathbf{8}$ | $1 / 21 / 2020$ | $\$ 0$ | $\$ 657.27$ | $\$ 93.96$ | $\$ 751.23$ |
| $\mathbf{9}$ | $2 / 28 / 2020$ | $\$ 0$ | $\$ 14.32$ | $\$ 7.55$ | $\$ 21.87$ |

## L2 Pilot Evaluation Customer Feedback

The Company conducted extensive outreach with Commercial customers to educate them on the L2 Pilot Evaluation. Program collateral was produced to cover DLC and customer roles and requirements, program costs and benefits, customer application instruction. Education sessions were held one-on-one with commercial customers interested in participating in programs and general program awareness was achieved through promotion in local trade and member organization networks.

The L2 Pilot Evaluation was successfully undertaken with nine Commercial customers, resulting in the installation of 98 Level 2 charging station ports. After all charging station installations were complete, the Company conducted an evaluation to obtain feedback on the activity. Customers shared that having pre-qualified charging station vendors made selecting a charging station easier and that they have been pleased with the vendors' hardware and networks. Customers described that they benefit from the Company's technical support throughout the charging station planning and installation process. In particular, they noted value of Company leading site walks with

[^64]representatives of the Company's distribution planning, distribution engineering, and metering teams, as well as the customers' facility management and engineering and electrical leads. During these site walks, the Company led teams to identify installation siting that would optimize cost efficiency and utilization of charging stations.

All customers who participated in the L2 Pilot Evaluation also took advantage of the state's Driving PA Forward Level 2 charging station rebate program, many of whom became aware of the program as a result of the Company's outreach efforts. The Company provided support for customers as they completed the state rebate application and rebate redemption process. Customers described that the availability of the Company's rebate, leveraged alongside the state rebate, was critical in their ability to execute the project. Customer-reported project cost data indicates that the Company's rebate covered about $1 / 3$ of project costs, customers themselves covered $1 / 3$ of project costs, and the state's Driving PA Forward rebate program covered $1 / 3$ of project costs.

Customers provided critical feedback to their participation in the L2 Pilot Evaluation as well. Customers shared a desire for a more user-friendly process to submit and track all required paperwork. They felt that the timeline was aggressive, and that the charging station procurement and permitting processes presented unexpected and time-intensive challenges. Customers indicated that it was difficult to only be able to decide to execute a project until after a) running procurement processes and obtaining project cost estimates from charging station vendors, engineering firms, and electrical contractors, and then b) applying and qualifying for the L2 Pilot Evaluation and state rebate program.

Approximately 20 additional Commercial customers expressed interest in the L2 Pilot Evaluation but were unable participate for a number of reasons. Some customers cited not having the need for or ability to devote the parking space for all four dual port charging stations required by the L2 Pilot Evaluation. Other customers faced challenges with the timeline, needing more time for planning and procurement. A few customers
had impending parking facility renovations or new build construction that did not align with the L2 Pilot Evaluation timeline.

## DC Fast Charger Evaluation

The Company's DC Fast Charger Evaluation project allowed the Company to provide the make-ready and charging station infrastructure for the first two electric buses at Port Authority's East Liberty Garage. The charging stations were activated on February 20, 2020, and Port Authority's electric buses were placed into service on March 30, 2020.

The DC Fast Charger Evaluation project has enabled Port Authority and the Company to collaborate on many aspects of bus electrification planning and implementation that will benefit the growth of electric buses within the transit fleet. For example, the two organizations worked closely to define service needs for distribution upgrades required to power the charging infrastructure and evaluate a path forward for future expansion. The project has also already resulted in an estimated avoided emissions of 34.8 Tons $\mathrm{CO}_{2}$ through February 28, 2021.

## EV Registration Incentive

The Company began offering the EV Registration Incentive to customers as part of the EV ChargeUp Pilot on April 1, 2019. The EV Registration Incentive offers a one-time incentive to customers that register their EV with DLC.

| Year | Incentives <br> $(\boldsymbol{\#})$ | Incentives <br> $\mathbf{( \$ )}$ |
| :---: | :---: | :---: |
| $\mathbf{2 0 1 9}$ | 357 | $\$ 21,420$ |
| 2020 | 306 | $\$ 18,360$ |
| 2021 | 501 | $\$ 30,060$ |

The EV Registration Incentive has increased the Company's ability to engage with EV driving customers. The ability to identify EV-driving customers provides a pathway for engaging with this customer segment to better understand their evolving needs and be
able to share information about EV-related products and services offered by the Company. Information gained through the EV Registration Incentive has the potential to help the growth of EV charging infrastructure in places where it will have the greatest utilization. For example, through a brief survey that accompanies the EV Registration Incentive application, customers have identified whether or not they have access to workplace charging and, in some cases, the name of their employer. This information can help the Company provide support to businesses that are likely to consider installing charging or expanding existing charging stations at their facilities.

The customer survey accompanying the incentive application provides high-level data such as home charging type and typical time of day that the customer charges their vehicle. As the EV Registration Incentive customer database as a whole grows, it can inform distribution system planning. For example, it may help the Company mitigate reactive, and potentially more costly, transformer and distribution circuit upgrades.

One way that the Company has utilized the EV Registration Incentive database to inform distribution planning is by conducting a residential EV clustering analysis. Residential EV clustering is when multiple homes with EVs are located very close to one another and have the potential to be serviced from the same neighborhood transformer. The Company is especially interested in residential EV clustering because it represents a higher than typical potential for EVs to overload a transformer. To conduct the analysis, EV-driving customers' residential addresses were plotted on a map of the Company's service territory (Figure 4). Ten areas of residential EV clustering were identified. Preliminary modeling of the corresponding service accounts found that as many as half of the clusters share a transformer. The Company is monitoring the overall usage of the shared transformers to determine if there is any concerns of overloading the transformer.

Figure 4: Location of customers who have participated in the Company's EV Registration Incentive activity as of December 2020


## Education and Outreach

The Company's Education and Outreach activity has filled an EV and charging station information gap in the Pittsburgh Region. The Company has undertaken numerous EVfocused educational initiatives, and developed internal capabilities to support customers as they transition to electric transportation. A highlight of accomplishments is as follows:

- Communication Channels: The Company has used a variety of communication channels to inform customers about vehicle electrification and fueling vehicles with electricity. This includes but is not limited to print informational cards and handouts for use at in-person events; inclusion in print and digital versions of DLC's ServiceLine customer newsletter; EV-focused informational emails, traditional and paid social media on Facebook, Linkedln, and Twitter platforms; DLC Newsroom stories; press releases; YouTube videos; article series featured in the Green Voice newsletter; earned media such as newspaper coverage and television and radio interviews.
- Website: From January 2019 to December 2020, the Company's EV landing page recorded approximately 11,500 unique page views, with visitors spending two minutes and 43 seconds on the page during their visit. The page was a home for providing customers information about details of the EV ChargeUp Pilot. In April 2021, a redesigned and enhanced EV landing page on the DLC website was launched. The page was informed by interviews with commercial and residential customers, and emphasizes DLC's ability to provide customers with technical support for EV and charging related questions. The page features improved informational content for residential customers seeking information about EVs and charging, as well as content devoted to commercial customers interested in installing charging stations at their business or adding EVs to their fleet.
- Web Tools: The EV Guide web tool was launched in July 2019. Located at https://ev.duquesnelight.com/, the EV Guide provides customized information about available EV model options available for sale in the Pittsburgh region. It helps customers evaluate how the total cost of ownership and expected greenhouse gas emissions compare to similar gasoline vehicles, locate charging stations throughout the area, see how their electrical bill would be impacted by charging their vehicle based on their vehicle use patterns, and find current information about available federal and state EV purchase incentives and tax credits. A print companion piece for the EV Guide web tool was also developed. The piece showcases available vehicle models and costs for use by DLC customers without internet access and for distribution at community-based events. In the first 17 months of operation, the EV Guide web tool has recorded 9,667 unique users and 12,302 sessions, meaning on average one in four users return to the site after their initial session.
- Community Based Events: The Company provided EV and charging information to customers and sponsored a variety of events, for example:
- Exhibited an EV and a simulated "electric garage" home charging display at the Pittsburgh Home \& Garden Show
- Executed the inaugural EV Car Show at the annual SolarFest event at the Frick Environmental Center
- Organized EV display booths for the Beaver and Mount Lebanon Farmers Markets
- Held launch events for new charging station installations at two downtown Pittsburgh Parking Authority parking garages
- Held a Charging Station Installation webinar attended by over 55 stakeholders to share learned by commercial customers who participated in DLC's Charging Station Evaluation.
- Organized live and virtual events annually for Pittsburgh's National Drive Electric Week, including a Workplace Charging Workshop held in partnership with the Green Building Alliance attended by over 60 commercial customers.
- Representatives from the Company served as EV subject matter expert by speaking or presenting at numerous community meetings, workshops, working group sessions, and other events. Select presentations include Pittsburgh Region Clean Cities' Odyssey Day workshop for fleets and PA DEP's "Driving EVs: The Benefits and Basics for Pennsylvanians" webinar.
- Technical Assistance: Direct customer service technical support was provided to customers who submitted calls and emails to the Company about EVs and fueling their vehicles with electricity. The centrally managed account ElectricVehicles@duqlight.com was established to field customer inquiries via email and the Company's Contact Center was provided frequently asked question content to provided improved support to customers who reach the company via phone.

The Company has also tracked customer perceptions and awareness of EVs through customer surveys and panels. The survey results suggest that customers' awareness of EVs has increased substantially over the course of the Company's Education and Outreach efforts. For example:

- $14 \%$ of respondents were likely extremely or likely to consider an EV as their next vehicle in 2018. That figure increased to $23 \%$ by 2020.
- $35 \%$ of those who have researched EV technology are likely to consider purchasing an EV in 2020. In 2018 only $25 \%$ of individuals who had researched EVs were likely to consider purchasing an EV.
- Awareness of public charging increased from 33\% in 2018 to $40 \%$ in 2020.


# Duquesne Light Electric Vehicle Customer Research Summary of Findings (2018-2021) 

## Introduction

To support the development and evaluation of its electric vehicle (EV) education and outreach efforts, Duquesne Light Company (DLC) has retained Schmidt Market Research to conduct primary research to gather feedback and insights among customers. Since 2018, five research studies have been executed and topics have included interest in owning an EV, familiarity, and knowledge of various aspects of EVs (e.g., home and public charging, technology, pricing) as well as the perceived benefits and challenges associated with driving an EV. Insights about at-home charging and time of use pricing reveals specific opportunities for DLC to help its customer base overcome specific barriers to adoption and inform load management strategies.

## Section 1: Awareness \& Attitudes related to Electric Vehicles

While current ownership is low among customers in Duquesne Light's service territory, interest in EVs continues to grow, and customers' overall perceptions of EVs are improving. For example, in 2018, $48 \%$ of customers surveyed perceived EVs to be 'much better' or 'somewhat better' than gasoline vehicles overall. This proportion of customers increased to $57 \%$ in 2020.

Overall familiarity with EVs has remained stable since 2018 (around 22\%). Research has shown that increased familiarity with EVs among customers leads to greater interest in future ownership. 35\% of DLC customers surveyed in 2020 who had researched EV technology in the past were 'extremely likely' or 'likely' to consider buying or leasing an EV in the future, a significant increase from $25 \%$ in 2018. Despite growing interest, more than half of prospective EV owners do not have personal experience driving or riding in an EV.

Customers report that programs provided by DLC could help lower some barriers to EV adoption. For example, a recent study conducted among prospective EV buyers suggests that home charging installation and maintenance programs supported by DLC would "make it easier" to drive an EV (69\%) - and current owners also see value in the programs.

## Section 2: Interest \& Barriers to EV Adoption

Adoption of EVs continues to grow, and likelihood to consider an EV for the next vehicle purchase is improving over time as well. The proportion of customers surveyed who are 'extremely likely' or 'likely' to buy/lease an electric vehicle was $14 \%$ in 2018, $17 \%$ in 2019 , and $23 \%$ in 2020.

Figure 1


Customer satisfaction with the EV experience is strong and likely to stay that way in the near-term. Interest in purchasing another EV in the future suggests that current owners are fairly satisfied with their EV experience. In 2020, $88 \%$ of owners indicated they were likely to consider purchasing another EV in the future, up from $75 \%$ in 2018 . As customers buy and integrate EV driving into their daily lives, many report finding that their normal routines are well suited to the capabilities of their EVs. W hile some recognize the limitations on driving range, many report it is not a problem for their lifestyle.

While progress is being made, EV concerns persist among Duquesne Light customers. The 2018 study identified environmental impact and reduced cost of everyday use as drivers of interest in EVs, but those surveyed expressed concerns about driving range, the ability to recharge, vehicle options to choose from, and purchase price. Since that study, there have been advances in driving range, vehicle options, and cost. However, these considerations remain relevant among prospective buyers. In 2020, the top three major barriers to purchasing EVs identified among customers were lack of public charging stations nearby (66\%), concerns on vehicle driving range (64\%) and lack of at home EV charging. (61\%).

Few Duquesne Light customers have researched the topics that are viewed as the primary adoption barriers, such as driving distance, charging equipment, and cost of ownership, indicating an opportunity to educate customers to overcome perceived drawbacks. A January 2021 study of prospective EV owners shows that less than onehalf have researched at-home charging options and/or public charging stations. The January 2021 study also revealed that knowledge of at-home charging stations remains fairly low - especially in terms of pricing, brands/models, and installation contractors in addition to the electrical requirements (Figure 2).

## Section 3: Charging Needs \& Infrastructure

Helping prospective EV buyers install home charging stations may help increase adoption, since $48 \%$ of Duquesne Light customers expect to require a Level 2 station to meet their charging needs. However, $27 \%$ of prospective owners are unsure about their expected charging needs. These customers may need additional resources to assist in making this determination. The January 2021 study revealed that knowledge of athome charging stations remains fairly low - especially in terms of pricing (64\%), brands/models (68\%), and installation contractors (75\%) in addition to the electrical requirements (50\%) (Figure 2).

Figure 2


A home charging installation program could also make more people comfortable with getting a Level 2 charger. In January 2021, $69 \%$ of customers who indicated that they were 'extremely likely' or 'likely' to purchase an EV for their next vehicle, agreed that a home charging installation program would make it easier to drive an electric vehicle and $65 \%$ of these respondents would be likely to participate in this program if offered.

A post-COVID environment will require more robust non-residential charging infrastructure. Post-COVID, customer input suggests there is likely to be more of a need for charging options outside the home - though most drivers are still unlikely to rely on local options on a daily basis due to accessible at home charging. Current EV drivers suggest that public charging stations situated in commercial shopping areas, public parks and recreation areas, and other locations such as hospitals, and airports in Duquesne Light's service area are nice to have and seen as a convenience to many.

## Exhibit SO-4

Current EV drivers also indicate that higher-powered DC Fast Charging along corrid ors is important for longer-distant traveling.

Awareness of public charging stations located in areas Duquesne Light customers frequent is growing with $40 \%$ aware of a public charging station in 2020, up from $33 \%$ in 2018 (Figure 3).

Figure 3


## Home Charging Pilot Customer Agreement

This Home Charging Pilot Customer Agreement ("Agreement") is made and entered into by and between Duquesne Light Company ("DLC"), and the Customer identified below, hereinafter referred to as "Customer", and is effective on the date signed by DLC.

## Customer Information

| Customer Name: |  |
| :--- | :--- |
| Customer Service |  |
| Address: |  |
| Customer Phone Number: |  |
| Customer Email Address: |  |
| DLC Account Number: |  |

## Recitals

A. DLC is conducting a Home Charging Pilot (the "Program") that involves installing home electric vehicle ("EV") charging equipment at a qualified homeowner residence (the "Service Address").
B. The Program will allow DLC to obtain information about EV use and charging information.
C. A summary of the program is attached as Attachment 1.

## Agreement

Now, the refore, for good and valuable consideration, Customer and DLC, intending to be legally bound by this Agreement, agree as follows:

1. DLC Installation, Operation, and Maintenance of Charging Stations.
a. DLC, through its own resources or its network of authorized third party independent contractors, shall provide, install, maintain, repair or replace (collectively the "Services") Level 2 electric vehicle charging equipment (the "Charging Station") and associated electrical service modifications on property owned by the Customer at the Service Address listed above, consistent with terms of the Program as approved by the Pennsylvania Public Utility Commission. Customer must choose a Charging Station from the DLC approved vendor list. DLC shall provide, at its cost, all reasonably necessary maintenance for the Charging Station. In the event of equipment failure, DLC will utilize good utility practice to bring the equipment back to working order as quickly as is reasonably practicable. DLC, in DLC's sole discretion, shall have the right to repair, modify, or replace the Charging Station at any time during the Term of this Agreement.
b. Upon completion of the installation and at all times during the Term of this Agreement, ownership of and title to the Charging Station shall remain with DLC. The Customer shall ensure that the Charging Station shall not be subject to any lien, security interest or other claim asserted by any creditor of the Customer, and any sale of the Customer Service Address by the Customer shall not include the Charging Station.
c. Customer shall maintain the connection between the Charging Station and an Internet service provider via Wi-Fi connection, for the operation of the Charging Station under this Agreement.

## 2. Monthly Charge.

a. The Customer's charge for the Charging Station shall be the following monthly rate per Charging Station for the Term of this Agreement ("Monthly Charge"):

| Rate <br> Options | Monthly <br> Charge | Services Included in <br> Monthly Charge | Customer Upfront Out- <br> of-Pocket Expenses |
| :--- | :---: | :--- | :--- |
| Home | $\$ 19.57$ | $\bullet$Charging Station and <br> Charging <br> Pilot |  |
|  | Standard Installation <br> Costs. <br> Maintenance and <br> Management Services. | Additional Installation <br> Costs (as defined <br> below) |  |

b. DLC will include the Monthly Charge for the Charging Station on the Customer's first utility bill invoiced after the installation date of the Charging Station. The Customer agrees to pay the Monthly Charge pursuant to DLC's billing terms.
c. Installation typically includes extending electrical facilities from the electrical panel to the home charging station and related work. DLC agrees to pay up to $\$ 500^{1}$ in installation costs ("Standard Installation Costs"). In some cases, additional upgrades to the electric panel and/or additional installation work beyond that typically anticipated may be required. In the event that installation requires work that cost more than the Standard Installation Costs, or upgrades to the customer's home electrical equipment ("Additional Installation Costs") payment of these Additional Installation Costs are separate from and in addition to the Monthly Charge. Additional Installation Costs will be invoiced separately by a third-party independent contractor and Customer will pay any invoice for Additional Installation Costs directly to the independent contractor.

## 3. Program Term, Default, and Termination.

[^65]a. Term. This Agreement is effective upon the Company's receipt of an Agreement fully executed by Customer. The Term shall commence on the first billing date after the Charging Station is installed, and DLC and the Charging Station vendor have confirmed that the Charging Station is operational, and will continue in effect for a minimum of sixty (60) months (the "Term").
b. Termination by DLC for Cause/ Early Termination. If Customer defaults in the performance of any material provision of this Agreement, including payment of Customer's utility bill, DLC will provide Customer written notification that the Customer is in default. If the default is not cured within thirty (30) days, or the Customer fails to take reasonable steps to begin curing the default to the satisfaction of DLC, this Agreement shall be terminated and Customer shall provide access to DLC or DLC's third party independent contractor to remove the Charging Station. The Customer shall be responsible for the termination fees outlined below and for all expenses associated in enforcing this Agreement including attorneys' fees and other associated costs.

If Customer cancels the Agreement before completion of the Term or DLC terminates for default, the Customer agrees to pay a sum equal to the number of months remaining in the Term multiplied by the Monthly Charge per Charging Station plus a one-time $\$ 200$ removal fee.

Upon early termination by Customer or termination for cause by DLC, DLC or a third party independent contractor will remove the Charging Station from the Customer's residence. Removal of the Charging Station shall not include any removal or possession of the dedicated home circuit or wiring installed to supply the Charging Station with electricity ("Ancillary Hardware") All such Ancillary Hardware will be disconnected by DLC or its authorized third party independent contractor and left in place at the Service Address.
c. End of Term. Unless terminated earlier per Section 3(b) or the parties enter into a subsequent contract, upon expiration of the initial Term, ownership of the Charging Station shall pass automatically to Customer.

TRANSFER OF THE CHARGING STATION TO CUSTOMER IS MADE "AS IS, WHERE IS" AND DLC MAKES NO WARRANTY OR REPRESENTATION, WHETHER EXPRESS OR IMPLIED IN FACT OR IN LAW OR MERCHANTABILITY, FITNESS FOR ANY PURPOSE, STATE OF REPAIR, CONDITION OR SAFETY OF THE CHARGING STATION, NOR COMPLIANCE WITH APPLICABLE LAW, RULE, ORDER AND REGULATION, CONCERNING THE CHARGING STATION.
d. Relocation. If the Customer moves to a different premises and remains a DLC residential electric customer and otherwise eligible for the Program within the initial 60-month Term, per DLC Tariff rule 9C, DLC shall relocate the Charging

Station to a suitable location at Customer's new premises at Customer's request and expense. The Customer acknowledges that failure to notify DLC of relocation, or Customer's tampering with or relocation of the Charging Station itself, may result in DLC's immediate termination of this Agreement and incurrence of any early termination fees.
e. DLC Termination for Convenience. DLC, in its sole discretion, may terminate the Agreement at any time, in which case DLC will provide Customer with sixty (60) days' prior written notice. The Customer may continue using the Charging Station until removal.
4. Title to Equipment and Data. At all times under this Agreement where DLC shall own and maintain title to the Charging Station, the Customer shall not make any alterations, changes, or modifications to the Charging Station without first securing written permission from DLC and any applicable underlying manufacturer.

Customer hereby grants to DLC a non-assignable, non-transferable, and non-exclusive license to use the Charging Station electric consumption data and related information (the "Usage Data"). DLC shall therefore have the right to use, copy, and distribute such Usage Data and information as necessary and helpful to evaluate electric vehicles and electric vehicle support equipment and for any other DLC business purpose consistent with DLC's Customer Privacy Policy. Customer shall authorize the Charging Station vendor to release such Usage Data to DLC by completing the Data Release and Authorization Form located in Attachment 2. To the extent applicable, DLC shall indemnify and hold harmless the Customer from any and all claims whatsoever for the use and distribution of said Usage Data.
5. Customer Obligations and Duties. Throughout the Term of this Agreement:
a. Customer shall grant to DLC such access to the Service Address and Charging Station as may be deemed necessary by DLC.
b. Customer shall be responsible for the expense and installation of any Additional Installation Costs necessary to install and provide electricity to the Charging Station. Customer may opt to use DLC's third party independent contractor for the additional upgrade or installation work in addition to any standard installation work, provided that Customer will be responsible for the expense to have the third party independent contractor complete the additional work. Alternatively, Customer may choose a separate contractor to complete the additional upgrade or installation work. However, in either case, DLC's third party independent contractor must perform installation of the Charging Station. All installation and upgrade work is subject to the required inspection and wiring approvals.
c. In the event the Charging Station fails to operate or otherwise requires repair, the Customer shall promptly notify DLC. Customer agrees to remedy minor issues that do not require qualified technicians to address, including but not limited to the resetting of a tripped circuit breakers or assisting with software or interconnectivity issues.
d. The Customer will establish and maintain an account with the applicable Charging Station vendor and for wireless internet connectivity enabling communication between the Charging Station and Charging Station vendor's hardware and software.
e. Customer will use DLC's Charging Station in accordance with the manufacturer's recommendations and releases DLC from any loss or damage caused by the Charging Station.
f. Customer shall maintain the area surrounding the Charging Station and will promptly notify DLC of any problems related to the Charging Station that the Customer becomes aware of. Customer required maintenance includes, but is not limited to, pavement maintenance, pruning of vegetation, and snow removal. For avoidance of doubt, Customer is not responsible for the ongoing maintenance of the Charging Station itself. Per DLC Tariff Rule 23, Customer shall protect DLC Charging Station and related property on the premises.
g. Customer agrees to participate in surveys and provide feedback about the Program, as well as to cooperate with DLC in fulfilling DLC's reporting requirements to any federal, state, or local regulatory or governing entities.
6. Customer Use. Customer acknowledges that they are accepting this Agreement on behalf of all persons who use the Charging Station and charging services at the Customer Address and that they have sole responsibility for ensuring that all other users understand and comply with the terms and conditions of this Agreement and any applicable policies. Although DLC has general responsibility for maintaining and servicing the Charging Station during the Term, the Customer will be liable to DLC for any damage to the Charging Station caused or allowed to be caused by the Customer including, without limitation, damage caused by the Customer's misuse, abuse, removal, transfer, or tampering with the Charging Station or damage caused by vandalism. Customer shall indemnify, defend and hold harmless DLC and its affiliates, suppliers, and agents against all claims and expenses (including reasonable attorneys' fees) arising out of the use of the Charging Station or the breach of this Agreement or any applicable policies.
7. Insurance. Customer shall have in full force and effect a standard fire and homeowner's insurance policy with amounts sufficient to cover the full replacement cost of the Charging Station. The Customer hereby waives any and all claims and rights of action (by way of subrogation or otherwise) against DLC (and against any insurance
company insuring DLC) which may hereafter arise on account of bodily injury or damage to the Charging Station or the Service Address, resulting from any fire, or other perils or claims of the kind covered by standard fire and homeowner's insurance policies regardless of whether or not, or in what amount, such insurance is now or hereafter carried by the parties, or either of them. Customer agrees that DLC self-insures against any loss or damage which could be covered by a commercial general public liability insurance policy and or a property policy.
8. Charging Stations Provided "AS IS". CUSTOMER ACKNOWLEDGES AND AGREES THAT DLC IS NOT THE MANUFACTURER OF THE CHARGING STATION AND MAKES NO REPRESENTATIONS OR WARRANTIES ABOUT THE USE OR OPERATION OF THE CHARGING STATIONS OR ANY EQUIPMENT INSTALLED FOR THE OPERATION OF THE CHARGING STATION. DLC PROVIDES THE CHARGING STATION "AS IS". DLC DOES NOT GUARANTEE THAT THE CHARGING STATION WILL PERFORM UNINTERRUPTED.
9. Limitations of DLC's Liability. DLC's liability is limited to repair or replacement of the Charging Station at DLC's sole discretion and as may be required by this Agreement. Notwithstanding anything to the contrary contained in this Agreement, to the full extent allowed by applicable law, in no event shall DLC be liable to the Customer for indirect, incidental, special, consequential, or punitive damages arising out of this Agreement or the transactions contemplated hereunder whether for breach of contract, tort (including negligence), or otherwise and whether or not the Customer has been advised of the possibility of such damages. Notwithstanding anything set forth in this Agreement to the contrary, under no circumstances shall DLC's total liability under this Agreement exceed the total cost of the Charging Station plus installation costs made by DLC under this Agreement. This section shall survive the termination of this Agreement.

By participating in this Program, Customer agrees that DLC has no liability concerning the quality, safety and/or operation of the plug-in electric vehicle, any mileage performance, or any estimated energy usage.
10. Privacy Law. Customer acknowledges and agrees that Customer is knowingly consenting to and authorizing: (a) DLC to release and share Customer's name, address, telephone number, charging data and any charging or electrical usage patterns with DLC's third party independent contractors, in order for the authorized third party independent contractors to provide the Charging Station and services to Customer under the Program; and (b) DLC's independent contractors to share information with DLC about Customer regarding Customer's site assessment, quoted additional installation work (if applicable), Additional Installation Costs and Standard Installation Costs. DLC's use of the above information shall be consistent with DLC's privacy policies.
11. No Partnership. Nothing in this Agreement shall be construed as creating any partnership, joint venture, or other business relationship between DLC and the Customer. The Customer shall not, for any purpose, be considered an agent of DLC.
12. Assignment. This Agreement shall not be assigned except with the prior written consent of all parties hereto. The terms and conditions of this Agreement shall bind any permitted successors and assigns of the parties.
13. Severability. If any term or provision of this Agreement is found by a court of competent jurisdiction to be illegal or otherwise unenforceable, that finding shall not invalidate the entire Agreement and the remaining provisions shall remain in full force and effect, and such invalid provisions shall be deemed to be modified to be enforceable to the fullest extent permitted by law.
14. Waiver. DLC's failure to insist on performance of any of the terms and conditions herein or to exercise any right or privilege or DLC's waiver of any breach hereunder shall not thereafter waive any of DLC's rights or privileges under this Agreement or at law. Any waiver of any specific breach shall be effective only if given expressly by DLC in writing.
15. Notices. All notices required by this Agreement shall be sent by email with notifications from the Customer to DLC addressed to electricvehicles@duqlight.com and notifications from DLC to Customer addressed to the email address set forth above. Either party may change its email address by sending notice of the change to the other party at its current email address and specifically referencing this Agreement in its notification.
16. Dispute Resolution. If any dispute arises between the parties regarding issues or interpretations of the Agreement or the services performed pursuant to the Agreement, Customer shall first email electricvehicles@duqlight.com with a summary of the issue and a contact phone number. DLC will consider all disputes and respond within fifteen (15) days of receiving notice of a dispute. In the event the Customer is dissatisfied with the resolution of the dispute, Customer has the right to file a complaint with the Pennsylvania Public Utility Commission. DLC will take no other action to enforce this Agreement until any complaint filed with the Commission is resolved.
17. Governing Law. This Agreement shall be governed by, enforced and interpreted in accordance with the laws of the Commonwealth of Pennsylvania, without regards to its internal conflict of law principles.
18. Entire Agreement. This Agreement contains the entire agreement between DLC and Customer with respect to the subject matter. No changes, modifications or amendments of any terms or conditions of this Agreement are valid or binding unless agreed to by the parties in writing and signed by their authorized agents.
[SIGNATURE NEXT PAGE]
-DUQUESNE LIGHT CO. -

## Customer Signature

By signing this Agreement, Customer acknowledges and certifies the following:

- Customer has received, read and understands the Home Charging Pilot requirements and concurs that they meet all eligibility criteria as outlined in the Program.
- Customer has received, read and understands the terms and conditions of this Agreement and agrees to abide by and be bound by the terms and conditions.
- The person signing represents that they are duly authorized, with full authority to bind Customer, and that no signature of any other person or entity is necessary to bind Customer.


## Signature:

Printed
Name:
Title:

Date:

## ATTACHMENT 1

## Duquesne Light Company (DLC) <br> Home Charging Pilot Summary

1. Customer Eligibility. To be eligible for the DLC Home Charging Pilot, Customers must:
a. own a single-family home, defined as a detached single family home, townhome/row house, or duplex ("Service Address");
b. have an active DLC electric service account with no past due bills at the Service Address;
c. have a personal garage or private driveway at Service Address where Charging Station will be installed and that is adequate to protect DLC's Charging Station and related facilities;
d. own or lease an electric vehicle ("EV"), which is registered to the Customer Service Address;
e. have and maintain wireless internet ("Wi-Fi") service at the Service Address with sufficient signal at the Charging Station installation location;
f. agree to and sign the DLC Home Charging Pilot Customer Agreement;
g. choose an eligible Charging Station from the DLC approved list of Charging Station vendors; and
h. share charging data with (and sign any required authorization paperwork) DLC via the applicable charging station vendor.
2. Initial Site Assessment. Before scheduling installation of the home charging station, DLC will direct the Installer to complete a site assessment of the residence. This assessment will determine where the home charging station and electrical connections will be located, any electrical and other modifications required for installation, and any Additional Installation Costs to Customer. The installer will also verify that the Customer has Internet Wi-Fi connectivity available for use by the Customer and DLC to communicate with the home charging station.

Installation typically includes extending a separate 240-volt circuit from the electrical panel to the home charging station, which includes drilling holes and running electrical
wire and conduit. It also includes securely mounting the home charging station to an interior garage wall, exterior wall, or pedestal provided as part of the installation.

In the event the installation requires work that is not typical or would otherwise cost more than $\$ 500$, the Installer will discuss this extra work with the Customer and estimate the cost of this additional work in a written proposal to the Customer. To continue with the installation, the Customer must agree to pay the Installer to complete this additional work as described in the Installer's proposal or use a separate contractor of Customer's choosing to complete the additional required work. These costs are separate from and in addition to the Home Charging Pilot Monthly Charge.
3. Installer. Installation of the home charging station and all standard installation work will be carried out by DLC's installer, a Pennsylvania licensed electrical contractor (the "Installer"). This Installer is hired by DLC and carries commercial general liability insurance.
4. Installation. Installation will commence only after the Customer has signed the Home Charging Pilot Customer Agreement. If any homeowner association, review board, or other neighborhood body must approve such installation at the Customer's residence, installation will commence only after the Customer conveys to DLC and DLC confirms receipt of written documentation of that body's approval.

DLC will supply the home charging station to the Installer prior to the installation. The Installer will supply or otherwise arrange for all labor, materials, equipment, necessary permits, and inspections. The installation will require obtaining applicable permit(s) and related inspections and will comply with all applicable local, state, and national electrical and building codes.
5. Residence Requirements. An adult member of the Customer's household must be present at the time of all home visits related to the Home Charging Pilot, including the initial site assessment and installation. It is the Customer's responsibility to provide reasonable access to DLC and the Installer to complete work related to the Home Charging Pilot.

The Customer will maintain and pay for home Wi-Fi Internet service for use with the Home Charging Pilot and the home charging station.

## ATTACHMENT 2

## HOMEOWNER DATA RELEASE AND AUTHORIZATION

I (the Customer identified in the Home Charging Pilot Customer Agreement) have enrolled in Duquesne Light Company ("DLC") Home Charging Pilot (the "Program") pursuant to that described in the Home Charging Pilot Customer Agreement. I understand that, as a condition of my participation in the Program, Iam required to authorize you, as my Charging Station Vendor, to release usage information (the "Usage Information") generated by DLC's Charging Station at my service address to DLC in connection with the Program. I understand that the release of such information may include a release to DLC of certain personally identifiable information about me including, but not limited to, name, account number, service address, email address, billing address, type of electric vehicle ("EV"), billing information, EV use, and electronic and charging information (collectively the "PII"). I also understand and agree that you, as my Charging Station Vendor, are not responsible for, nor has any authority with respect to, DLC's privacy practices or how DLC may use any information about me. In consideration for being allowed to participate in the Program, I hereby authorize you, as my Charging Station Vendor, to release the Usage Information and the Pll to DLC. I hereby forever release and disclaim, on behalf of myself, my heirs, and my assigns, you, as my Charging Station Vendor, and DLC from any and all claims I may have against either party, their employees, officers, and directors arising out of or in connection with the release of usage information and/or Pll to DLC.

I understand and agree that the Program is being offered solely by DLC and not by you, my Charging Station Vendor. Ihereby agree that you, as my Charging Station Vendor, shall have no liability whatsoever fromDLC's failure to delivery any of the benefits offered by DLC in connection with the Program and hereby forever release and disclaim, on behalf of myself, my heirs, and my assigns, you, as my Charging Station Vendor, from any and all claims I may have against you, your employees, officers, and directors arising out of or in connection with DLC's failure to deliver such benefits.

Signature: $\qquad$
Name: $\qquad$
Date: $\qquad$

# BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 9

## DIRECT TESTIMONY OF <br> JENNIFER NEISWONGER

Subjects: Customer Service Performance and Enhancement, Customer Education for Residential Subscription Rate Pilot

## Direct Testimony of Jennifer Neis wonger

Q. Please state your full name and business address.
A. My name is Jennifer Neiswonger. My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company ("Duquesne Light" or "Company")?
A. I am the Interim Director of Customer Experience.
Q. How long have you worked at Duquesne Light?
A. I have been with Duquesne Light since January 2017.
Q. What are your current responsibilities?
A. I oversee three areas within the Company's Customer Service department: 1) Energy Efficiency / Act 129 Programs; 2) Transportation Electrification; and 3) Customer Experience, which includes the design and implementation of strategies to: improve customer satisfaction, respond more effectively to customer needs and preferences, and make interactions with customers through various channels as seamless and efficient as possible.
Q. What are your qualifications, work experience and educational background?
A. I attended Robert Morris University, where I graduated Cum Laude with a Bachelor of Science in Business Administration and also completed my Masters in Business

Administration. Prior to being appointed the Interim Director in January 2021, I spent 4 years as Manager, Customer Experience at Duquesne Light where I was responsible for the day-to-day management and implementation of our Customer Experience strategy mentioned above. And prior to that, I spent over eleven years at Giant Eagle Inc. in Pittsburgh, where I held various customer-related positions, including most recently as the Senior Manager of Customer Loyalty, where I was responsible for the strategic development and administration of customer-facing programs, such as the loyalty card and associated rewards, digital engagement programs, and point-of-sale offers. In earlier roles with the company, I developed and implemented the omni-channel marketing strategy for a significant line of business and collaborated with in-store banks on targeted and in-store marketing campaigns to grow the number of joint customers.

## Q. What is the purpose of your direct testimony?

A. The purpose of my testimony is to explain the Company's historical customer service performance and the initiatives designed to further enhance Duquesne Light customers' experience. I also discuss customer education for the Residential Subscription Rate Pilot.

## Q. How is your testimony organized?

A. Section I of my direct testimony discusses the Company's customer service performance and metrics. Section II of my direct testimony discusses customer service initiatives implemented to enhance the customer's experience with the Company. Section III discusses customer education for the residential subscription rate proposed by Ms. Everett in Statement No. 17.

## Q. Are you sponsoring any exhibits?

A. Yes. I am sponsoring the following exhibits:

Exhibit JAN-1 Customer Service Performance Metrics

Exhibit JAN-2 2020 Research America survey results

Exhibit JAN-3 J.D. Power 2020 Residential and Business Customer Satisfaction Study results

Exhibit JAN-4 Residential Subscription Rate Pilot Program
Marketing and Education Costs

## I. CUSTOMER SERVICE PERFORMANCE

Q. Please explain the metrics used to measure the Company's customer service performance.
A. At Duquesne Light, we measure customer service performance in several ways. The Company monitors, tracks and reports on those customer service performance metrics required by 52 Pa . Code § $54.153(\mathrm{~b})$. Among other metrics, the Company monitors, tracks and reports:

- 54.153(b)(1) Telephone Access:
- Percent of calls answered within 30 seconds;
- Average busy-out rate; and
- Call abandonment rate.
- 54.143(b)(2) Billing:
- Number and percent of residential bills not rendered once every billing period; and
- Number and percent of small business bills not rendered once every billing period.
- 54.143(b)(3) Meter Reading:
- The number and percent of residential meters for which the company has failed to obtain an actual or ratepayer supplied reading within the past 6 months to verify the accuracy of estimated readings in accordance with § 56.12(4)(ii);
- The number and percent of residential meters for which the company has failed to obtain an actual meter reading within the past 12 months to verify the accuracy of the readings, either estimated or ratepayer read in accordance with § 56.12(4)(iii); and
- The number and percent of residential remote meters for which it has failed to obtain an actual meter reading under the time frame in § 56.12(5)(ii).
- 54.153(b)(4) Response to Disputes:
- The actual number of disputes for which the company did not provide a response to the complaining party within 30 days.


## Q. How has the Company performed with respect to those metrics?

A. The Company's performance with respect to those metrics is included as Exhibit JAN-1.
Q. How else does the Pennsylvania Public Utility Commission ("Commission") benchmark the Company's customer service performance versus other electric utilities?
A. The Commission's Bureau of Consumer Services ("BCS") releases a quarterly UCARE Report that measures major Pennsylvania utilities' customer service performance across several metrics. The BCS's most recent UCARE Report, which covers calendar year 2020, is publicly available on the Commission's website here: https://www.puc.pa.gov/filing-resources/reports/consumer-activities-report-evaluation/.
Q. How does the Company compare to other utilities in the UCARE Report?
A. In 2020, the Company had a $39 \%$ decline in needs further investigation (NFI) residential consumer complaints and a $61 \%$ decline in first contact resolution (FCR) statistics for residential and commercial. The Company was second lowest for both metrics compared to the other PA Electric Distribution Companies (EDCs). In the 2019 UCARE Report, the Company ranks first among Pennsylvania EDCs in highest percent change (2017 to 2019) of residential service reconnections at $44 \%$. The Company also experienced a $31 \%$ improvement in our Commission infraction rate from 0.21 to 0.16 and was second lowest for consumer complaint rate.

## Q. Has the Company performed any surveys related to customer satisfaction?

A. Yes. As required by 52 Pa . Code § 54.154 , the Company works with Research America to conduct transaction surveys of customers who have had interactions with the Company. Research American benchmarks results across Pennsylvania's EDCs.

## Q. How has the Company performed with relation to these surveys?

A. The Research America report for 2020 is included as Exhibit JAN-2. Duquesne Light ranks \#6 out of 8 Pennsylvania utilities with $90.6 \%$ of customers surveyed rating their satisfaction with Duquesne Light 7 or higher on a scale of 1-10. In 2019, Duquesne Light ranked \#5 out of 8 with $88.2 \%$ of customers surveyed rating 7 or higher.
Q. Are there any other surveys that the Company conducts to assess customer satisfaction?
A. Yes. The Company contracts with Schmidt Market Research to conduct monthly custom surveys via the phone and web. The surveys measure overall satisfaction with Duquesne Light and probe on areas that are likely to influence customer satisfaction such as power quality and reliability, company reputation, energy efficiency, corporate citizenship, billing and payment, and experience with the website and mobile app.

## Q. Please summarize the results of these surveys.

A. In 2017, the Company started reporting satisfaction on an 8-10 scale whereas previously it was reported on a 6-10 scale with the goal to identify the percentage of customers that are truly satisfied and rate the Company based on those top 3 boxes. The Company saw consistent results in 2017 and 2018, with a slight decrease in satisfaction in 2019. In 2020, satisfaction exceeded the prior 3 year trend. See Chart 1 below.

Chart 1:


## Q. Does the Company benchmark its customer satisfaction performance versus other electric utilities?

A. Yes. The Company benchmarks its performance using the J.D. Power Residential and Business Electric Utility Customer Satisfaction surveys.

## Q. How has the Company performed in these benchmarking studies?

A. J.D. Power benchmarks residential customer satisfaction for a calendar year that runs January through December. For the overall customer satisfaction index, Duquesne Light scored 736 which was on par with the peer group (East Large) average score. This was an improvement over the 2019 and 2018 scores of 722 and 699, respectively. See Exhibit JAN-3 for additional details.

Business customer satisfaction is also measured on a calendar year basis. For the full-year 2020, Duquesne Light ranked number third in its peer group (East Mid-size) with a score of 791, only 7 points out of first place. Duquesne Light scored 792 in 2019 and 785 in 2018. See Exhibit JAN-3 for additional details.
Q. Are there any other metrics the Company uses to measure customer service?
A. Yes, we also track service reliability as measured by SAIDI, SAIFI, and CAIDI. Mr. Benjamin Morris provides an overview of the Company's reliability performance in his direct testimony, Statement No. 4.

## II. ENHANCING CUSTOMER EXPERIENCE

Q. Are there any areas where the Company is seeking to enhance the customer experience?
A. Yes. The Company established a Customer Service vision and guiding principles in 2020 that puts the customer top-of-mind with the goal to "...provide a seamless, personalized experience along with innovative products and services." The Company seeks to enhance the customer experience by continuing to develop more self-serve features and serving customers in the channels they prefer.
Q. Please discuss the customer service initiatives implemented from 2018 through 2020.
A. Customer Service initiatives for 2018-2020 include:

- A new Duquesne Light mobile app available in the App Store and Google Play;
- Customer segmentation and initiative-specific personas to deliver more timely and relevant messages to customers in the channel they prefer;
- A self-serve Payment Arrangement portal on DuquesneLight.com to provide a simplified process for customers to set up a payment arrangement;
- A small and medium-size concierge Business Center within our Contact Center to better serve business customers;
- An email engagement platform to send relevant, timely email communications to customers with content related to storm preparation, energy efficiency information, products and services, and more; and
- A presence on Nextdoor, a social platform that allows the Company to send targeted neighborhood messages regarding outages and other important information.


## Q. Is the Company planning additional customer enhancements in the next few years to improve customer satisfaction?

A. Yes. With the implementation of the email engagement platform and customer segmentation and personas mentioned above, the Company plans to build upon that foundation and implement a preference center in order to deliver communications in the customer's channel of choice as well as journey mapping to improve the key journeys that customers experience while doing business with the Company. As a means of continuous improvement, the Company also plans to add additional self-serve features to the website and mobile app such as budget billing enrollment and implement an additional customer
service channel through live chat. These additional enhancements are already in progress and the Company is not seeing rate recovery for these items.

## III. CUSTOMER EDUCATION FOR RESIDENTIAL SUBSCRIPTION RATE PILOT

Q. Please generally describe the proposed residential subscription rate.
A. As stated in Ms. Everett's direct testimony (Statement No. 17), the Company proposes to implement a pilot residential subscription rate that would offer customers the option to select a specified level of grid access for distribution service for a set monthly charge. This rate design substitutes the traditional volumetric rate structure, or price per kWh consumed, for a more stable rate structure that is easy to understand and predictable for customers. The energy subscription rate is a rate design option that may meet pricing needs of customers, like data plans for cell phones or standard pricing for video streaming services.
Q. How many customers will be permitted to participate in the residential subscription rate pilot?
A. The pilot will launch starting January 2022 and will be limited to 2,000 participants who can enroll over a one-year period (through December 2022).
Q. How will Duquesne Light promote or otherwise advertise the residential subscription rate pilot to its customers?
A. Exhibit JAN-4 lists the proposed customer education budget for the residential subscription rate pilot program. As mentioned above, the pilot program will have a limited number of participants and the Company plans to take a targeted approach to enrollment leveraging
email and direct mail, as opposed to mass outreach, to maximize and control the number of customers participating in the pilot.

The Company will include information about the residential subscription rate on its website to allow customers to learn more and determine if the subscription rate is right for them. In addition, an educational video will be developed and posted on the website and included in targeted emails. We are assuming a $1 \%$ response rate on our targeted communications (email and direct mail). Accordingly, plan to reach out to 300,000 customers through email and direct mail in order to enroll 2,000 participants along with a control group as mentioned in Ms. Everett's testimony.

Lastly, as part of the program, the Company will implement usage alerts via email, SMS and outbound voice to notify customers when they are approaching or exceeding their subscription level.

## Q. Is the Company proposing to recover the costs of creating customer education and

 outreach materials, and incremental costs to evaluate the program?A. Yes. As stated in Ms. Everett's testimony, the total estimated cost of designing and implementing the Residential Subscription Pilot is $\$ 67,000$ over the course of three years. These costs include creating a new rider in the billing system, creating customer education and outreach materials, and incremental costs to evaluate the program. Only costs that are incremental to normal levels of staffing and operations are included in this estimate Only costs that are incremental to normal levels of staffing and operations are included in this estimate.
Q. How will the Company measure customers' satisfaction with the residential subscription rate pilot?
A. The company plans to measure satisfaction with customers participating in the pilot program in a number of ways:

- Track and report the length of time that customers remain in the pilot program, and
- Conduct periodic surveys throughout the pilot with customers enrolled in the subscription rate, and
- Conduct a post-survey with customers that choose to be removed from the pilot program.
Q. Does this conclude your testimony?
A. Yes. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.


## EXHIBIT JAN-1

## CUSTOMER SERVICE PERFORMANCE METRICS

## 2020 FULL-YEAR AVERAGE

| 54.1433(b)(1) Telephone Access: |  |
| :---: | :---: |
| Percent of calls answered within 30 seconds | Actual: 88.25\% <br> Goal: >80\% |
| Average busy-out rate | Actual: 0.28\% <br> Goal: 0\% |
| Call abandonment rate | Actual: 4.19\% <br> Goal: <6.5\% |
| 54.143(b)(2) Billing: |  |
| Average monthly number and percent of residential bills not rendered once every billing period | 1/0.0002\% |
| Average monthly number and percent of small business bills not rendered once every billing period | $0 / 0$ |
| 54.143(b)(3) Meter Reading: |  |
| Average monthly number and percent of residential meters for which the Company failed to obtain a reading in the past six months in accordance with § 56.12(4)(ii) | 3/0.0005\% |
| Average monthly number and percent of residential meters for which the Company failed to obtain a reading in the past twelve months in accordance with § 56.12(4)(iii) | 1/0.0002\% |
| Average monthly number and percent of residential meters for which the Company failed to obtain an actual reading under the timeframe in § 56.12(5)(i). | $0 / 0$ |
| 54.143(b)(4) Response to disputes |  |
| The actual number of disputes for which the company did not provide a response to the complaining party within 30 days | 2020 Total: 0 |

EXHIBIT JAN-2
RESEARCH AMERICA 2020 SURVEY RESULTS



## LC EXHIBIT JAN-3

J.D. POWER 2020 RESIDENTIAL AND BUSINESS CUSTOMER SATISFACTION



## EXHIBIT JAN-4

## RESIDENTIAL SUBSCRIPTION RATE PILOT PROGRAM

## MARKETING AND EDUCATION COSTS

|  | Cost |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Item | Year 1 |  | Year 2 |  | Year 3 |  | Total |  |
| Webpage Feature / Updates | \$ |  | \$ | - | \$ | - | \$ | 0 |
| Enrollment Video and Targeted Email* | \$ | 25,000 | \$ | 0 | \$ | 0 | \$ | 25,000 |
| Targeted Direct Mail** | \$ | 36,000 | \$ | 0 | \$ | 0 | \$ | 36,000 |
| Usage Alerts - SMS + Email, Voice*** | \$ | 5,000 | \$ | 500 | \$ | 500 | \$ | 6,000 |
|  |  |  |  |  |  |  |  |  |
| Total | \$ | 66,000 | \$ | 500 | \$ | 500 | \$ | 67,000 |

*Target 200 K customers, assumes $1 \%$ response or 2,000 enrollments
**Target 100 K customers, assumes $1 \%$ response or 1,000 enrollments ( $\sim 3 \mathrm{~K}$ total to allow for control group); \$0.12 print/production + \$0.24 postage
${ }^{* * *}$ Assumes monthly outbound notification to $25 \%$ of enrolled customers (500) regarding overages; $50 \%$ email,
$25 \%$ voice, $25 \%$ SMS

# Duquesne Light Company 

Docket No. R-2021-3024750

DLC Exhibit 5
Direct Testimony - Part II

## BOOK 9

# Duquesne Light Company 

Distribution Rate Case
Docket No. R-2021-3024750

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Duquesne Light Company
Statement No. 10

Direct Testimony of Robert L. O'Brien
Subject: Revenue Requirement

Dated: April 16, 2021

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## DIRECT TESTIMONY

OF
ROBERT L. O'BRIEN

## I. INTRODUCTION AND PURPOSE OF TESTIMONY

Q. Please state your full name and business address.
A. My name is Robert L. O'Brien, and my business address is 1753 Via Mazatlan, Rio Rico, Arizona 85648.
Q. By whom are you employed and in what capacity?
A. I am employed by O'Brien Innovative Regulatory Solutions, LLC where I am the Sole Member.
Q. Please summarize your professional experience and educational background.
A. I have been employed in my current position since January 4, 2008 after my retirement from Black \& Veatch Corporation ("B\&V) where I worked in the Executive Management Services division as a Principal Consultant. Prior to that, I was employed by R.J. Rudden Associates ("Rudden"), where I served as Vice President. In these positions, I have assisted clients in the areas of Strategic Planning, State Regulatory Operations, Financial Planning, Cash Working Capital Calculations, Rate Case Preparation, Revenue Requirement Determination and Revenue Requirement Model Design.

Prior to joining Rudden in 2000, I was employed by Citizens Communications Company (formerly Citizens Utilities Company) ("Citizens") from 1975 to 1999 holding the positions of Vice President, Strategic Planning and

Regulatory Affairs for Citizens' Public Utilities Sector (1997 to 1999); Vice President, Corporate Regulatory Affairs (1978 to 1997); and Manager of Special Studies (1975 to 1978). From 1967 to 1975, I was employed as controller by a series of companies engaged in the financial, communications, educational and printing industries. Prior to 1967 , I was employed by Ernst \& Young where I attained the status of Senior Auditor after four years (including two-years work experience during a 5 -y ear work-study program at the University of Cincinnati). I graduated from the University of Cincinnati in 1965 with a Bachelor of Business Administration, having majored in Accounting. I am a Certified Public Accountant.
Q. Have you previously testified before the Pennsylvania Public Utility Commission ("Commission") or any other regulatory agencies?
A. Yes. I have testified or filed testimony before this Commission many times on behalf of Citizens' water and telephone operations; on behalf of Duquesne Light Company ("Duquesne Light" or the "Company") in its 2006, 2009, 2013 and 2018 applications for a general rate increase; on behalf of PECO Energy Company in a 2008 gas rate proceeding and again in the 2010 rate applications for its gas division and its electric division. In addition, I have presented testimony and or testified in over 250 proceedings before state regulatory commissions in Arizona, California, Colorado, Hawaii, Idaho, Illinois, Indiana, Missouri, Montana, Nevada, Ohio, Rhode Island, Tennessee, Vermont and West Virginia on behalf of electric, natural gas, communications, water and wastew ater utility companies. Those proceedings
involved company-initiated rate increases, commission-ordered rate reviews, purchased energy pass-through proceedings, acquisitions and sales of utility companies, disaster relief requirements and the recovery of acquisition premiums. I have testified concerning all measures of value elements, including deferred income taxes and cash working capital, as well as revenues, operating expenses, income taxes, rate design and rate of return issues. I have also testified in generic proceedings related to income taxes, as well as changes in the regulation of the communications and electric industries.

## Q. What is the purpose of your direct testimony in this proceeding?

A. I was asked by Duquesne Light to assist it in preparing and presenting a request for a general rate increase for its Pennsylvania electric distribution delivery operations. More specifically, I develop the components of Duquesne Light's overall revenue requirement and will supp ort certain pro formaratemaking adjustments for the fully projected futuretest y ear ended December 31,2022 ("FPFTY"), the futuretest y ear ended December 31, 2021 ("FTY") and the historic test y ear ended December 31, 2020 ("HTY"), and portions of the claimed measures of value, including Duquesne Light's cash working cap ital allow ance.
Q. Before discussing the specific adjustments and sche dules you are sponsoring, please describe the relationship of your work to that of the other Company witnesses.
A. In general, my assignment was to prepare pro forma adjustments to each of the three test y ears to obtain total Company pro forma balances for each test y ear. The total Company values were developed and classified by use of the Federal Energy Regulatory Commission ("FERC") Uniform System of Accounts for Mr. Gorman to use in his Jurisdictional Separation Study ("JSS"), which determines the pro forma earnings at present rates and the revenue increase required for the Company's Pennsylvania jurisdictional distribution assets and his related Cost of Service Study ("COSS"). As a starting point, I used the actual, budgeted and/or projected data for each year provided by Ms. Bachota. In addition, I developed, working with Company personnel, pro forma adjustments based on total Company operations. Finally, I provided the total Company pro forma measures of value, operating revenues and expenses for the HTY, FTY and FPFTY to Mr. Gorman who, through a JSS for each test year, determined the allocated jurisdictional amounts correctly assigned to the Pennsylvania jurisdiction for the Company's distribution operations and also a COSS for the FPFTY.

## Q. Are you sponsoring all or portions of any exhibits in this procee ding?

A. Yes. Together with other Company witnesses, I am sponsoring portions of DLC Exhibits 2, 3 and 4, which compriseDuquesneLight's princip al accounting exhibits for the FPFTY, FTY and the HTY respectively. As explained by Ms. Bachota (DLC St. No. 2), Duquesne Light's Assistant Controller, the base data for the FPFTY in DLC Exhibit 2 were derived, for the most part, from Duquesne Light's capital and operating forecasts for the twelve months ended December 31, 2022;
the correspondingdata for the FTY in DLC Exhibit 3 were taken from Duquesne Light's budgets, books and records for the year ended December 31, 2021; and finally, the data for the HTY in DLC Exhibit 4 from the actual data for the year ended December 31, 2020. In addition, I am responsible for the responses provided to certain of the Commission's standard data filing requirements.

## Q. Will you be discussing DLC Exhibit 2, DLC Exhibit 3 and DLC Exhibit 4?

A. Yes, I will. However, because Duquesne Light is basing its proposed rate increase on the adjusted FPFTY (December 31, 2022) data, I will focus my comments on Section $C$ (Measures of Value/Rate Base) and Section D (Operating Income/Revenues and Expenses) of DLC Exhibit 2 for the FPFTY. Because my testimony regarding DLC Exhibit 3, which is Duquesne Light's FTY (December 31,2021) and DLCExhibit 4 which is Duquesne Light's HTY (December 31, 2020) are organized in essentially the same format as DLC Exhibit 2, I will briefly address the pro forma adjustments and any area that requires additional comment or information.

## Q. How is the balance of your testimony structured?

A. In Section II, I present an overview of Duquesne Light's FPFTY revenue requirement and explain, in summary fashion, how the claimed measures of value, pro forma present rate revenues, operating expenses, depreciation and taxes were determined. Section III of my testimony provides a more detailed description of the individual components comprising Duquesne Light's requested measures of
value for the FPFTY, while Section IV discusses the derivation, including appropriate ratemaking adjustments, of Duquesne Light's revenue and expense claims for the FPFTY. Finally, Section V contains the presentation of the FTY and the HTY data.

## II. OVERVIEW OF DUQUESNE LIGHT'S FULLY PROJECTED FUTURE TES T YEAR REVENUE REQUIREMENT

Q. Please explain how the Company's FPFTY December 31, 2022 measures of value were determined.
A. First, to determine FPFTY-end utility plant in service, the Company began with the closing plant balances at December 31, 2020, added the budgeted capital expenditures that are projected to close to plant in service during twelve months ended December 31, 2021, subtracted the ap propriate plant retirements and made any reclassifications or adjustments, which resulted in the plant in service balances at December 31, 2021. The same procedures were followed using plant closings and related plant retirements for the y ear ended December 31, 2022, which resulted in the plant in service balances at December 31, 2022. The accumulated depreciation at December 31, 2022 was determined in a similar fashion, using the closing balances at December 31, 2020 plus the budgeted and/or pro forma depreciation expense, amortization of net salvage and the plant retirements through December 31, 2021 and for the FPFTY. The measures of value include a reduction for the accumulated deferred income taxes ("ADIT"), which includes an amount for the federal ADIT. The ADIT balance at the end of each of the y ears 2020, 2021 and 2022 also includes the amortization of the excess ADIT resulting from the
reduction of the Federal income tax rate contained in the Tax Cuts and Jobs Act of 2017 ("TCJA"). The claimed levels of materials and supplies and customer deposits are based on 13-month historic averages for the period ended December 31, 2020. In addition, the capitalized pension balance and an amount for cash workingcapital which was calculated using lead-lag study procedures are added to the measures of value for the FPFTY. Each of these components and the other elements shown on DLC Exhibit 2, Schedule D-1, page 3 of 3, column 1, lines 1 to 13 of the measures of value will be described later in my testimony. This total Company data, as described by Mr. Gorman, are then analyzed and the portion used to provide distribution service is allocated to the Pennsylvania Jurisdiction with the results shown in column 2.

## Q. How were the revenues at present rates for the FPFTY derived?

A. Revenues at present rates were derived by adjusting the forecasted revenues for Duquesne Light's electric distribution operations for the twelve months ending December 31, 2022 to reflect the removal of surcharge revenues that will not be included in base rates when new rates are authorized in this proceeding; to reflect the annualization of customers to year-end levels in the FPFTY and to reflect the other pro forma revenue adjustments which are summarized in DLC Exhibit 2, Schedule D-5.
Q. How were the claimed operating expenses for the FPFTY determined?
A. The pro forma FPFTY expenses were calculated using Duquesne Light's forecast for the twelve months ended December 31, 2022 as a starting point. Those expenses, which were prepared based on business activities and related cost elements such as payroll, employee benefits, etc., were distributed to FERC accounts using the distribution of expenses actually experienced by the Company during the year ended December 31, 2020. Adjustments were then made to the forecast data including annualization and normalization adjustments in accordance with established Commission ratemaking practices. These adjustments are summarized on DLC Exhibit 2, Schedule D-3 pages 1 and 2 and are described in connection with the specific schedules included in DLC Exhibit 2. Each pro forma adjustment was then included in the ap propriate FERC account(s).

## Q. Please describe how the taxes-other-than-income ("TOTI") we re determined for the FPFTY.

A. The base amounts were determined by using Company forecasted amounts for the twelve months ended December 31, 2022, with pro forma adjustments to pay roll taxes to reflect the impact of the changes to FPFTY salaries and wages and other adjustments to reflect known and measurable changes, as shown on DLC Exhibit 2, Schedule D-20.

## Q. Please describe the calculation of depreciation expense for the fully projected

 future test year.A. The pro forma depreciation expense for the FPFTY was determined by FERC account using depreciation rates determined by Mr. Spanos in his depreciation study as described in his testimony (DLC St. No. 11) or by using dep reciation rates based on Company data for intangible, leasehold and transportation plant times the year-end plant at December 31, 2022. The five-year amortization of net salvage was added by FERC account to determine the total depreciation and amortization expense for the FPFTY, as described in more detail in connection with Schedule D-21 of DLC Exhibit 2.

## Q. How were income taxes calculated?

A. Income taxes were calculated using the regulatory procedures normally followed by the Commission, including the use of sy nchronized interest expen se; the flowthrough of certain tax deductions for State income tax calculation; the normalization of the federal method difference for accelerated depreciation and other normalized deductions as explained by Mr. Simpson in his testimony (DLC St. No. 12). The income tax expense for the FPFTY for total Company operations at present rates and for the distribution operations at proposed revenue levels is shown on DLC Exhibit 2, Schedule D-22, page 1 of 3. The income tax expense, as explained by Mr. Simpson in DLC Statement No. 12, was calculated using the provisions and rates under the Tax Cuts and Jobs Act ("TCJA"). In addition, the income tax expense calculation includes the annual amortization of excess deferred income taxes ("EDIT") associated with the change in the Federal Income Tax Rate beginning in 2018, as described by Mr. Simpson.
Q. Please describe how the pro forma re venue incre ase and re venues at proposed rates we re established.
A. Each of the total Company forecasted amounts and pro forma adjustments for the FPFTY 2022, which will be described in testimony related to the specific filing schedule or requirement, were used to determine the total Company pro forma measures of value, revenues at present rates and pro forma expenses. These total Company amounts were provided to Mr. Gorman and formed the basis for the JSS, which determined the fully distributed costs and the revenue requirement for the Company's Pennsy lvania distribution operations. The summary results for the Company's jurisdictional distribution operations are presented in DLC Exhibit 2, Schedule D-1 pages 1 to 3.
Q. What is the overall required increase in annual revenues for the Company's jurisdictional distribution operations for the FPFTY?
A. As shown on DLC Exhibit 2, Schedule D-1, page 1 of 3, column 2, line 2 and also on line 20 of DLC Exhibit 2, Schedule D-1, page 2 of 3, the proposed increase in PA Jurisdictional annual operating revenues is $\$ 85.8$ million which is supported by the testimony of Mr. Gorman.
Q. Is the $\mathbf{\$ 8 5 . 8}$ million of additional re venue the only increase that will be applied to the present base rates of the PA Jurisdictional customers?
A. No. In addition to the overall revenue increase of $\$ 85.8$ million, the present base rates will also be increased by the surcharge revenues of $\$ 29.2$ million which is currently being collected from PA Jurisdictional customers via a surcharge which will be set to zero when the new base rates are established in this proceeding. This combination results in a base rate increase of $\$ 115.0$ million and a reduction in surcharge revenue of $\$ 29.2$ million and a net increase in PA Jurisdictional revenue of $\$ 85.8$ million.

## Q. What is contained in DLC Exhibit 2, Schedule B?

A. Schedule B contains Schedules B-1 to B-8 which present the Company's financial data for the FPFTY and are sponsored by Witnesses Bachota, Simpson, Milligan and Moul as indicated on each schedule.

## III. MEASURES OF VALUE

## A. Plant In Service

## Q. Please describe Schedule C-1 of DLC Exhibit 2.

A. Schedule C-1 summarizes the measures of value for the FPFTY for the total Company and the Pennsylvania jurisdiction, the proforma rate of return at present rates for the total Company and the Pennsylvaniajurisdiction and the pro forma rate of return at proposed rates for the Pennsylvania jurisdiction. The data for the total Company are supported by me and the data for the Pennsylvania jurisdiction will be described and supported by Mr. Gorman. As shown on line 1, the total Measures of Value for the total Company is $\$ 2.998$ billion (column 1, line 1) billion
and is $\$ 2.276$ billion (column 2, line 1) for the Pennsylvania jurisdiction. The net operating income and earned rate of return at present rates for the total Company and the Pennsylvania jurisdiction are shown on lines 2 and 3 in columns 1 and 2 respectively. Finally, the pro forma return at proposed rates for the Pennsylvania jurisdiction of $\$ 178.5$ million (line 4), that is required to attain the target rate of return of $7.84 \%$, shown on line 5 .

## Q. Please describe Schedule C-2 of DLC Exhibit 2.

A. Schedule C-2 contains 4 pages and presents the Company's claimed FPFTY utility plant in service.
Q. How was the utility plant in service for the total Company of $\mathbf{\$ 5 . 3 1 3}$ billion shown on Schedule C-2, page 1, column 3, line 7 determined?
A. That amount represents theestimated plant in service balance at December 31, 2022 and is based on utility plant in service at December 31, 2020 plus budgeted and forecasted capital expenditures estimated to be closed to plant in the FTY and the FPFTY, less the FTY and FPFTY estimated retirements and pro forma adjustments to the FTY and FPFTY plant. The plant balances at December 31, 2022 by FERC account are shown on page 2 with the detail for plant additions, retirements and adjustments for the year ended December 31, 2022 shown on pages 3 and 4. The total plant in service of $\$ 5.313$ billion is entered on DLC Exhibit 2, Schedule D-1, page 3 of 3 at column 1, line 1 for the total Company.

## Q. Please describe what is contained on Schedule C-2, page 2.

A. Page 2, column 2, presents the year-end plant balances for the FPFTY by FERC account and summarized by functional plant category. The total plant in service at December 31, 2022 of $\$ 5.300$ billion shown on line 42 in column 2 is brought forward by functional plant category to page 1 , column 1 , lines 1 to 4 .

## Q. What is shown on page 3 of Schedule C-2?

A. Page 3 shows the plant balances and activity by FERC account for the FPFTY. Column 2 contains the balances at December 31, 2021 while plant additions for the FPFTY are show in column 3. Plant retirements for the FPFTY are shown in column 4 and reclassifications and adjustments are shown in column 5. TheFPFTY balance at December 31, 2022 of $\$ 5.300$ billion is shown in column 6 on line 51 and is reflected on pages 1 and 2 of Schedule C-2.

## Q. What is contained on Exhibit DLC 2, Schedule C-2, page 4?

A. This schedule contains the pro forma adjustment to reflect capital expenditures for development of cloud-based information systems that are not included in the Company's capital exp enditure budgets or reflected in the plant in service accounts but are required on a going forward basis. The support for this adjustment is provided by Ms.Bachotain her testimony (DLCSt.No.2). The adjustment, shown in column 1 on page 4, will be described in more detail in connection with Schedule D-11.

## Q. What is the total plant in service pro forma for at the end of the FPFTY?

A. The total plant in service for the Company in the FPFTY is $\$ 5.313$ billion as shown on Schedule C-2, page 1 of 4, column 3, line 7 and also on Exhibit 2, Schedule D1 , page 3 , column 1 , line 1 .

## B. Accumulated Depreciation

Q. What is the purpose of Schedule C-3 of DLC Exhibit 2?
A. This schedule, consisting of 4 pages, presents the accumulated provision for depreciation at December 31, 2022 for the total Company by FERC account. DuquesneLight's accumulated depreciation at December 31, 2022 is $\$ 1.810$ billion as summarized on page 1 , column 4 , line 7 of Schedule C-3 and then carried forward to page 3, column 1, line 2 of Schedule D-1.

## Q. Please describe page 1 of DLC Exhibit 2, Schedule C-3.

A. This page shows the accumulated depreciation balance by FERC plant category at the end of the FPFTY in column 1. These balances include the accumulated depreciation at December 31, 2021 plus depreciation expense, amortization of average net salvage, less retirements, less cost of removal and adjustments, which are reflected on DLC Exhibit 2, Schedule C-3, on page 3 in columns 3 to 10 by FERC account. In addition, column 2 shows the accumulated amortization for the cloud expenditures through December 31, 2022 in the amount of $\$ 8.037$ million, which will be described in more detail in connection with schedule D-11.

## Q. What is contained on pages 2 to 4 of Schedule C-3?

A. Page 2 shows the pro forma accumulated depreciation for the FPFTY by FERC account in the amount of $\$ 1.802$ billion. Page 3 contains eleven columns showing the changes to the FPFTY accumulated depreciation balances by FERC account from December 31, 2021 (column 2) to December 31, 2022 (column 11). Column 3 shows the depreciation expense for 2022 while column 4 shows the plant retirements, which are equal to the plant retirements shown on the Plant in Service Schedule C-2, page 3, column 4. Columns 5 to 10 show other charges and credits to the accumulated depreciation for 2022. The accumulated depreciation at the end of 2022 is shown in column 11. Page 4, column 2, shows the accumulated amortization adjustment related to the adjustment to plant for Cloud expenditures as shown on DLC Exhibit C-2, page 4. In addition, column 3 reflects an increase in accumulated depreciation of $\$ 384,000$ to reflect changes in depreciation expense for EV plant for the y ears 2020 to 2022 as will be described in connection with the adjustment on Section D-1, Schedule 15.

## Q. What is the balance for accumulated depreciation at the end of the FPFTY?

A. That amount is $\$ 1.810$ billion for the total Company as shown on DLC Exhibit 2, Schedule C-3, page 1, column 4, line 7 and also on DLC Exhibit 2, Schedule D-1, page 3, column 1, line 2.

## C. Cash Working Capital

Q. What is set forth on Schedule C-4, page 1, of DLC Exhibit 2?
A. This is a summary of the Cash Working Capital ("CWC") calculations, which are detailed on pages 2 to 10 in Schedule C-4. The total of $\$ 68.330$ million shown on line 6 is included in Duquesne Light's claimed measures of value as CWC for the total Company, as shown on DLC Exhibit 2, Schedule D-1, page 3 of 3, column 1, line 4. The CWC amount for the PA Jurisdictional business is $\$ 46.162$ million as shown on page 3 of 3 in column 2, line 4 of Schedule D-1.

## Q. Please describe page 2 of Schedule C-4.

A. Page 2 summarizes the derivation of Duquesne Light's revenue collection lag and overall operating expense payment lag. The revenue lag days of 57.36 days is shown on line 1 ; the expense lag days for each of the expense components appear on lines 3 to 6 and in column 3 and the respective amounts are totaled on line 7 . The composite $O \& M$ expense lag day s of 28.22 days is shown on line 8 . The net lag in the collection of revenue of 29.14 days $(57.36-28.22=29.14)$ shown on line 9 is then multiplied by the average daily operatingexpense balance of $\$ 625,000$ on line 10 to arrive at the base CWC amount of $\$ 18.213$ million for operating expenses shown on line 11. The average daily operating expense balance of $\$ 625,000$ on line 10 was determined by dividing the total pro forma annual operating expenses of $\$ 228.002$ million on line 7 , column 2, which excludes uncollectible accounts expense and purchased power costs, by the number of days in a year, 365. The other components of CWC are shown on lines 12 to 14 and will be described in connection with my discussion of related supporting schedules. The calculation of the working capital for power purchased shown on lines 16 to 19 is
shown separately so it can be assigned directly to the purchased power activity by Mr. Gorman and therefore is not included in the determination of working capital as part of the revenue requirement for the PA jurisdictional operations.

## Q. Please describe the re venue lag calculation shown on Schedule C-4, page 3.

A. The total revenue lag days shown on line 21 of 57.36 days were determined by dividing the average month-end accounts receivable balances for the thirteen months ended December 31, 2020 shown in column 2 on line 17 into the annual revenue billed during the 12 months ended December 31, 2020, as shown in column 3 on line 17. This results in an accounts receivable turnover rate of 8.66 (column 4, line 17), which is equivalent to 42.15 lag days ( 365 days divided by the 8.66 accounts receivable turnover rate), as shown in column 5 on line 17. This is referred to as the collection lag or the pay ment portion of the revenue lag. The pay ment portion of the revenue lag is added to the 15.21 day service period lag, which is the time from the mid-point of the service period until the meter reading date, generating a total revenue lag of 57.36 days, as shown on line 21 . As shown on line 19 , there is no lag for the calculation and recording of the bill since it is accomplished on the same day.

## Q. How was the mid-point of the service period calculated?

A. The mid-point of the service period is equal to the days in an av erage month (365 days divided by 12 , or 30.42 days per month) divided by 2 , or a mid-point of 15.21 day s.

## Q. What is shown on page 4?

A. Page 4 shows the monthly revenueby class of service for the years ended December 31, 2018 through 2020.

## Q. Please describe page 5 of Schedule C-4.

A. Schedule C-4, page 5, shows the calculation of the expense lags for specific expense categories used in the CWC calculation as shown on Schedule C-4, page 2, column 3, lines 3 to 6 . Lines 1 to 5 reflect the pay roll expense lag. The pay roll amounts reflect the forecasted pay roll amounts for the FPFTY as shown on Schedule D-7. The lag periods for the payment of union and non-union payroll are shown separately to reflect DuquesneLight's actual pay ment cy cles for each classification. Lines 6 and 7 show the lag in the pay ment of pension costs for the FPFTY. The lag period is calculated using a mid-point of July 1 and the payment date shown on line 6 in column 1. This results in an average pay ment lead of 108 days, which was applied to the pro forma pension expense from Schedule D-9, page 1, line 11 and shown on line 4 of Schedule C-4, page 2 of 10 .
Q. How did you de velop the lag days associated with the purchased energy costs shown on line 13 of Schedule $\mathbf{C - 4}$, page 5 ?
A. Effective June 1, 2013, Duquesne Light began to purchase power for its defaultservice customers through a Supply Master A greement. The pay ment terms under that contract and the most recent contract result in a lag-day component of 33.88
days which is used for the purchased energy lag-days. This includes a service period lag of 15.21 days; a bill processing lag of 8.67 days and a pay ment lag of 10 days. The 33.88 payment lag days results in a net lead of 25.48 days when subtracted from the revenue lag day s of 57.36 calculated on DLC Exhibit C-4, page 3 and shown on line 21 ( 57.36 day $s-33.88$ day $s=23.48$ days). The 23.48 payment lead days is used to calculate the cash working capital requirement related to the purchased energy of $\$ 13.797$ million shown on DLC Exhibit C-4, page 2 on lines 16 to 19 . These amounts have been removed from the operating expenses summarized on lines 3 to 7 and are shown separately so they can be removed by Mr. Gorman from the PA Jurisdictional CWC calculation. As shown on Mr. Gorman's JSS, this amount is assigned directly to the Supply sector and is not included in his determination of the PA Jurisdictional distribution revenue requirement.

## Q. Please describe how you determined the payment lag associated with other operating and maintenance expenses shown on line 6 of page 2.

A. The summary of the average pay ment lag for all remaining expenses listed as other expenses on page 2 , line 6 , is set forth on lines 10 to 14 on page 5 of Schedule C4. These amounts were derived from data for the four months shown on page 6 of Schedule C-4. More specifically, I requested that the Company provide a listing of all cash disbursements during each of the four months selected in a format that would show the payee, the date the service was provided or the invoice date, the amount of the disbursement, the type of payment, the date the pay ment cleared the
bank, the account to which the disbursement was charged and certain other data. Each month's listing contained thousands of cash disbursements.

## Q. How did you utilize the data provided by the Company?

A. I used the total data provided by the Company for each of the four months, calculated the number of day s it took each disbursement to clear the bank from the invoice or service date and calculated the dollar days (the amount of the actual disbursement times the number of day s the payment took to clear the bank) and sorted the disbursements by amount. I then eliminated disbursements that are not material in total or those which should not be included in a CWC calculation for operating expenses.

## Q. What disbursements did you eliminate from the balances used on page 6 of Schedule C-4?

A. First, using the data for February 2020 as an example, referring to line 1 of page 6, I started with a total number of cash disbursements (exclusive of expenditures recorded "below-the-line" which are not charged to utility operations) of 3,887 (column 1) and a total dollar amount of those disbursements of $\$ 46.789$ million (column 2) which produced a total-dollar-day s of $\$ 2.083$ billion (column 3). This resulted in expense payment lag day s of 44.52 days (column 4). I then removed all disbursements under $\$ 1,000$ since those amounts, while significant in number, would not have a meaningful impact on the overall lag-day calculation. Next, I removed all disbursements charged to asset and liability accounts, except charges
to accounts pay able. The results of these two removals provided the balances on line 2 which provided abase number of lag day s for the other disbursements. While the number of disbursements dropped significantly from 3,887 to 500 and the dollar amounts also decreased significantly as show in columns 2 and 3 on lines 1 and 2, there was no significant movement in the expense lag-days as shown in column 4. In the next steps I removed disbursements for accounts pay able, remaining negative amounts and also all disbursements in excess of $\$ 350,000$ since they are not likely to represent normal monthly operating expenses. The final result for February 2020, show n on line 3 , is 47.54 lag-days. A similar process was followed for the months of May, August and November 2020 with the lag-days for each month shown on lines 6, 9 and 12 in column 4. Thetotals for the four months are included on lines 13 to 15 which result in 44.90 expense lag-days for other disbursements as shown on line 15 , column 4 . These data are summarized on page 5 , lines 10 to 14 and the average of 44.90 lag-days is reflected on page 2 of 10 , column 3 , line 6 .

## Q. Please explain how the average prepayment amount of $\mathbf{\$ 1 8 . 2 6 0}$ million included on line 12 of Schedule C-4, page 2 was determined. <br> A. That amount is calculated on page 10 of Schedule C-4 and represents the thirteenmonth average of actual amounts recorded for each month end from December 31, 2019 to December 31, 2020. As shown on page 10, the prepay ments in question comprise 36 different items, ranging from commission assessments to insurance.

Q. How did you determine the lag days for the tax expense component of working capital shown on page 7 of $S$ chedule $C-4$ and brought forward to page 2 on line 13 ?
A. The calculations on page 7 of Schedule C-4 use the pro forma tax expense at proposed rates shown in column 1 and the net revenue lag days for each tax as shown in column 4. The result of the multiplication of those components is shown in column 3 and used as the working capital related to the taxes paid by the Company. The net payment lag days for each of the taxes are calculated on page 9 of Schedule C-4.

## Q. Please describe the calculation of the interest expense lag shown on page 8 and included on page 2, line 14 of Schedule C-4.

A. This calculation measures the lag associated with the semi-annual payment of interest on outstandingdebt. Thepro formainterest expense is the amount resulting from the sy nchronized interest calculation using the pro forma measures of value and the weighted cost of debt included in the requested rate of return as shown on lines 1 to 4 . The daily interest expense amount of $\$ 164,000$, calculated on line 5 , is multiplied by the net payment lag of 33.89 days shown on line 8 for a reduction to the workingcapital allow ance of $\$ 5.571$ million, as shown on line 9 and included on page 2 at line 14 .

## Q. What is presented on page 9 of Schedule C-4?

A. As noted previously, this page provides the calculations of the net pay ment lag days for the tax exp ense components of Duquesne Light's CWC allowance. The type of tax and the pay ment schedule for that tax are show $n$ in the description column with the actual pay ment dates reflected in column 1. The payment lead or (lag) from the midpoint of the year is shown in column 3. The pro forma payment amount for each tax is shown in column 4 on the line with the name of the tax. For example, the federal income tax amount, pro forma at proposed revenue levels for the total Company, of $\$ 37.058$ million is shown on line 1 in column 4. The payment amounts required are reflected for each tax on the dates shown in column 1 and the weighted lead (lag) for each pay ment is calculated in column 5 for each tax. The payment lead (lag) days are calculated and shown on the total line for each tax. These days are compared to the lag days for revenue shown in column 7 and the net pay ment lag is shown in column 8 and also reflected on page 7 of Schedule C4.

## Q. Why are se parate calculations made for the various categories of tax expense?

A. This is necessary because each of the tax expense items can have separate pay ment dates. For example, as shown on page 9 of Schedule C-4, lines 2 to 5,25 percent of the estimated federal income tax liability is due on April 15, June 15, September 15 and December 15 of each year. The tax pay ment dates and percent ages due for other tax expense items are not the same. Using a separate calculation for each tax expense provides a matching of the cash requirement for pay ment of those expenses with the anticipated cash from revenues.

## Q. What is shown on Schedule C-4, page 10?

A. This page shows the calculation of the average prepaid expenses included in the CWC which was described earlier in my testimony.
Q. What is the total amount of CWC included in the claimed measures of value?
A. That amount is the $\$ 68.330$ million shown on Schedule C-4, page 1 , line 6 and on Schedule D-1, page 3 of 3 , column 1, line 4.

## D. Materials and Supplies

Q. Please describe Schedule C-5.
A. Schedule C-5 reflects the Materials and Supplies for the FPFTY based on the thirteen-month average from December 31, 2019 to December 31, 2020 of $\$ 33.482$ million as shown on line 16. The distribution of the average to various functions is shown on lines 17 to 22 .

## E. Accumulated Deferred Income Taxes

## Q. What is the purpose of Schedule C-6?

A. Schedule C-6 shows the December 31, 2022 balance of accumulated deferred income taxes ("ADIT") that is deducted in the determination of the measures of value. The ADIT shown on line 6 of $\$ 692.225$ million reflects the federal income tax that must be deferred in compliance with the normalization provisions concerning the use of accelerated tax depreciation on FPFTY plant balances. The

ADIT balance also reflects the normalization of the tax repair deductions and Section 263A deductions as permitted by the Commission. The accelerated tax depreciation and other tax deductions used in the determination of taxable income for federal and state income tax expense calculations are reflected on Schedule D22, pages 1 and 2 of 3 . These amounts are supported in the testimony of Mr . Simpson (DLC St. No. 12). The ADIT amounts for CIAC and Non-Utility listed on the schedule on lines 7,8 and 9 are not included because the related plant in service shown on Schedule C-2 is not included in the measures of value for the FPFTY.

## Q. What is the amount of ADIT used in the measures of value?

A. The amount for the total Company is $\$ 692.225$ million as shown on line 6 of Schedule C-6 and on line 11 of page 3 of 3 of Schedule D-1 in column 1 for the total Comp any and $\$ 521.809$ million for the PA Jurisdiction as shown in column 2.

## F. Customer Deposits

Q. Please explain the data concerning customer deposits on Schedule C-7 that was deducted from the claimed measures of value on Schedule D-1, page 3.
A. The amount for customer dep osits shown in column 1 reflects the average monthend balance for the thirteen months ended December 31, 2020. The amount for the interest expense paid to customers on the customer deposits is shown in column 2. The customer deposit amount is reflected as a reduction to the measures of value
and the interest expense is shown as a recoverable operating expense for the FPFTY.
Q. Where are these amounts of customer deposits and interest shown?
A. The amount of customer deposits for the total Company is a deduction of $\$ 11.163$ million, as shown on line 15 of Schedule C-7 and on Schedule D-1, page 3 of 3, line 9, column 1. In addition, the calculated interest expense related to these customer deposits of $\$ 532,000$ is included in the Company's operating expenses as shown on DLC Exhibit 2, Schedule D-3, page 2 of 2, column 18, line 55.

## G. Capitalized Pension Adjustment

## Q. Please describe DLC Exhibit 2, Schedule C-8.

A. This schedule shows the calculation of the capitalized pension adjustment included in the Company's measures of value, consistent with the Commission-approved settlements in the Company's 2013 and 2018 rate cases, Docket Nos. R-20132372129 and R-2018-3000124. Per the 2018 settlement, the amount to be included as a rate base adjustment is, "...the amount necessary to adjust the Accounting Standards Codification ("ASC") 715 capitalized pension amounts to equal accumulated capitalized pension contributions, net of applicable deferred income taxes, from January 1, 2007 forward." (Settlement in Docket No. R-20183000124). Following the conditions of the settlement, the schedule shows the capitalized pension contributions in column 1 and the amount of the ASC 715 pension capitalized in column 2. The difference in column $3, \$ 96.687$ million, is
the amount for the capitalized pension adjustment included in the measures of value for the FPFTY.
Q. What is the adjustment to include the capitalized pension adjustment in rate base for the FPFTY?
A. As shown on DLC Exhibit 2, Schedule 8, column 3, line 15, the amount is $\$ 96.687$ million. This amount is also shown on DLC Exhibit 2, Schedule D-1, page 3 of 3, column 1, line 6 for the total Company and $\$ 74.408$ million for the PA Jurisdiction as shown in column 2.
Q. What is the Company's claimed measures of value in this proceeding?
A. Duquesne Light's claimed measures of value, or rate base, for the FPFTY equals $\$ 2.998$ billion, as shown on line 13, page 3 of 3, column 1 of Schedule D-1 for the total Comp any and $\$ 2.276$ billion for the Pennsylvania jurisdictional measures of value shown on Schedule D-1, page 3 of 3 , column 2, line 13 , which will be supported by Mr. Gorman.

## IV. REVENUES AND EXPENSES

## Q. What is shown on Schedule D-1 of DLC Exhibit 2?

A. Schedule D-1, which is supported by myself and Mr. Gorman, contains three pages showing the calculation of the total Company and Pennsylvania jurisdictional measures of value (rate base) on page 3, the total Company and Pennsylvania jurisdictional revenue, expense and operating income on page 2 and the

Pennsylvania jurisdictional revenue requirement including the measures of value, revenues and expenses at present rates, the revenue increase required and the revenues and expenses at proposed rates on page 1. The Pennsy lvaniajurisdictional revenue increase that is calculated by Mr . Gorman is $\$ 85.759$ million as shown on page 2, line 20 and brought forward to page 1, column 2, line 2.

## Q. Please describe Schedule D-2.

A. Schedule D-2 shows the revenues and expenses by major FERC account classification. It begins with the Company's forecasted revenues and expenses for the FPFTY in column 1, and then annualizes and/or normalizes those amounts through adjustments summarized in column 2. The pro forma data in column 3 are summarized and brought forward to Schedule D-1, page 2, column 1 and used in the determination of the required jurisdictional Pennsylvania distribution revenue increase. The various revenue adjustments totaled in column 2 on Schedule D-2 are shown by separate adjustment on Schedule D-5, and the expense adjustments are summarized on Schedule D-3 and described in more detail on the separate adjustment schedules beginning with Schedule D-6 through Schedule D-16.

## Q. Please describe Schedule D-3.

A. Schedule D-3 summarizes the various adjustments that were made to the FPFTY forecast revenue and expense data to derive the pro formap resent rate revenues and expenses that appear in column 3 of Schedule D-2 and are included in the adjusted amounts that are carried forw ard to Schedule D-1. The FPFTY forecasted amounts
are shown in column 1 on page 1 and the revenue adjustment s are shown in columns 2 to 6 on page 1. The various expense adjustments are reflected in columns 7 to 11 of page 1 and in columns 14 to 23 of page 2 of Schedule D-3. Each of the pro forma adjustments will be described in connection with the specific schedule supporting the adjustment.

## A. Revenue Adjustments

## Q. Please describe Schedule D-5.

A. Schedule D-5 presents a summary of the sep arate pro forma adjustments to revenue for the FPFTY. Each of these adjustments will be described in detail in connection with the sep arate calculation of the adjustment shown on Schedules D-5A to D-5C.

## Q. Please describe the adjustment calculated on Schedule D-5A, which is shown on Schedule D-5 in column 3.

A. This adjustment removes revenue recovered through surcharges as shown on lines 1 to 9 and summarized on lines 33 to 36 . Related costs and expenses are also removed from other sections of the presentation for the FPFTY. The forecasted revenue amounts are shown in columns 2 and 3 with the related gross receipts tax amounts in column 4 and the net amounts in column 5. The total adjustment to revenue of $\$ 31.881$ million on line 33 is shown on Schedule D-5, column 3, line 2. In addition, the schedule shows the total amounts for two surcharges that are being included in base rates in the FPFTY. These are the DSIC and State Tax Adjustment surcharges in the amounts shown in columns 1 and 2 on lines 10 to 31 and totaled
on line 32 in the amount of $\$ 29.171$ million. The revenue from these two surcharges is being included as part of the Company's revenue at present rates and is not part of the requested revenue increase. This is confirmed by the revenue data on Schedule D-5, line 2. The total surcharge revenue at present rates shown on Schedule D-5, column 1, line 2 is $\$ 29.172$ million. Once the surcharge revenue of $\$ 31.881$ million shown in column 3 on line 2 is removed, the remaining $\$ 29.172$ shown in column 9, line 2 of Schedule D-5 is included as pro forma adjusted at present rates. Mr. Ogden describes how these surcharge revenues are included in the base rates for the FPFTY in his testimony (DLC St. No. 16).

## Q. What is the adjustment on Schedule D-5B which is included on Schedule D-5 in column 4?

A. This adjustment shows the calculation of revenues expected to be lost from energy efficiency and conservation activities of the Company and its customers for the years 2023 to 2025 and the average for those years which is included as an adjustment to the FPFTY.

## Q. Please describe the calculations on Schedule D-5B.

A. Schedule D-5B contains variable revenue levels for 2022 to 2025 by customer category on lines 1 to 5. Lines 6 to 20 show the revenue reductions for each year 2023 to 2025 (columns 3, 4 and 5 respectively) compared to the revenue included in the FPFTY base data in column 2. The total difference for each year is shown in column 6 on lines 10,15 and 20 respectively. Line 21 shows the total lost
revenue and line 23 has the average amount to be included as the lost revenue as part of the determination of the FPFTY revenue requirement.
Q. Have you determined these lost revenue amounts?
A. The revenue loss amounts I am presenting were based on forecasts by Mr. Mobley in his testimony (DLC St. No. 3) and calculations made by Mr. Ogden in his testimony (DLC St. No. 16).

## Q. Why should this adjustment be included in this proceeding?

A. This adjustment reflects the reductions in revenue that the Company expects to experience related to the reductions in load required to meet the provisions of Act 129 of 2008 and other efficiencies in customer usage that the Company has been experiencing and will continue to experience through the period the rates set in this proceeding will be in effect. The Company must be able to recover these lost revenues during the period base rates set in theFPFTY are in effect or the Company will not have theopp ortunity to earn therate of return authorized in this proceeding For example, while the revenues projected for 2022, the FPFTY, reflect these lost revenues for 2022, the additional lost revenues that will occur in 2023, 2024 and 2025 will reduce theComp any's revenue and earnings level. Reflecting the average lost revenue amounts determined by Mr. Mobley and Mr. Ogden for those years will provide the Company the opportunity to offset those lost revenues.
Q. What is the adjustment you are proposing for the average lost revenue?
A. The adjustment is the average for the 4 -year period of $\$ 8.451$ million as shown on Schedule D-5B in column 6 on line 23. The use of the four-year period recognizes that the FPFTY of 2022 already includes a reduction for lost revenue as part of the initial revenue requirement and that the Company currently plans to file another general rate case using a FPFTY of 2025.

## Q. Please describe adjustment D-5C.

A. This adjustment annualizes revenues for the projected number of customers at the end of the FPFTY comp ared to the average number of customers for the FPFTY. Line 1 shows the distribution and generation revenue for each customer classification for the FPFTY. These total revenues are reduced by the commodity revenues on line 2 and the resulting non-commodity revenues are shown on line 3 . These non-commodity revenues are divided by the average number of customers for the test year on line 4 to determine the average non-commodity revenue per customer on line 5. The average non-commodity revenue, or margin on line 5 was then multiplied by the difference between the average number of customers (line 4) and the number of customers at the end of the FPFTY (line 6) which difference is shown on line 7 , yielding the revenue annualization adjustment shown on line 8 . For example, the average margin revenue per customer for the residential customer in column 1 on line 5 of $\$ 573$ per y ear was multiplied by the increase in the number of customers of 615 on line 7 for an annualization adjustment for residential customers of $\$ 352,000$, as shown on line 8. The total annualization adjustment of
$\$ 258,000$ for all customer classes is shown on column 5, line 8 and also in column 6 on Schedule D-5C.

## B. Operating Expense Adjustments

## Q. Does the Company budget its operating expenses by FERC account?

A. No, as mentioned previously, it does not. Rather, the Company budgets its operating expenses by cost element or business activity, such as pay roll, employee benefits, rent, etc.
Q. How were the FPFTY data restated by FERC account for purposes of preparing this rate application?
A. The recorded FERC balances for the 12 months ended December 31, 2020 were analyzed to develop a chart showing charges for each cost element within each FERC account. After this process was completed, I then distributed the forecasted FPFTY charges by cost elements to theFERC accounts using the ratios exp erienced in 2020. For example, I determined how much of the pay roll cost center expense in 2020 w as charged to each FERC account in 2020 and then distributed the FPFTY forecasted pay roll to FERC accounts based on those ratios. This process was used for each cost element category to transform the total FPFTY expense by cost element forecast to a FERC account-based forecast.
Q. Why was it necessary to transform the FPFTY cost element forecast to a FERC-account based forecast?
A. Essentially for two basic reasons. First, the Company's annual reports to the Commission reflect recorded amounts and are presented on a FERC-account basis and having the FPFTY forecast presented in the same format facilitates a comparison of the FPFTY forecast data to prior years' exp erience. Second, it is necessary to have the FPFTY data available by FERC account for use by Mr. Gorman in his Jurisdictional Separation Study ("JSS") and also for use in his Cost of Service Study ("COSS").
Q. Is this the same procedure you used in the last rate case for the Company?
A. Yes. Consistent with the procedures used in the last several rate cases, I removed the expenses that are recovered through surcharges that will remain in effect and also those expenses that are charged below -the-line from the Cost Elements before the costs element expenses were distributed to the FERC accounts. This process clearly shows that expenses recovered through surcharges that remain in effect and also those that are charged below-the-line are excluded and are not included in the Company's PA Jurisdictional revenue requirement in this application.
Q. Have you prepared a schedule showing the total expenses by Cost Element for the FPFTY and the removal of the expenses recovered through surcharges as well as the expenses that are charged below-the-line?
A. Yes, I have. Exhibit RLO-1 to my testimony shows expenses by Cost Element for the y ears 2016 through the FPFTY. The total expenses for the FPFTY are shown in column 7 in the amount of $\$ 261.807$ million on line 49 . From this total amount,
the expenses recovered by surcharge (column 8 ) in the amount of $\$ 28.631$ million; the expenses charged below-the-line (column 9) in the amount of $\$ 3.919$ million are removed leaving a net expense for the FPFTY of $\$ 229.257$ million as shown on line 49 in column 10. The amount of each Cost Element is distributed to FERC accounts and therefore, the amount in column 10, after the removal of the expenses recovered through surcharges and the expenses charged below-the-line, is included in the FPFTY expenses. A similar procedure was used for the FTY and HTY as reflected on Exhibits RLO-3 and RLO-4 to my testimony which will be described later in my testimony.
Q. In your opinion, does this process result in a fair presentation of the Company's FPFTY forecast expenses by FERC account?
A. Yes, it does.
Q. Were each of the pro forma adjustments reflected on Schedule D-3 also included in the appropriate FERC accounts?
A. Yes, they were.
Q. Are the various pro forma expense adjustments presented on Schedule D-3 shown by the type of expense and also by the FERC account distribution?
A. Yes, they are. The expense categories are identified in the headers of the columns on pages 1 and 2 of Schedule D-3 and each adjustment is described in connection with a sep arate schedule showingits derivation. These adjustments are shown by

FERC expense category on Schedule D-3 and also on the Section D summary schedules.
Q. What is contained on Schedule D-6A, page 1 of 1 ?
A. Schedule D-6A contains adjustments to remove the expenses, by cost element and FERC account that are related to each of the revenue surcharges removed in adjustment D-5A discussed earlier. The major differences in the amounts for each surcharge reflect the fact that the revenue amounts include gross receipts taxes which are removed in the taxes other than income adjustment. There are also some minor differences resulting from true-up recording periods. The surcharge expense amounts are shown by CE on lines 1 to 13 and by FERC account on lines 14 to 20 . The total of \$28.631 million is shown on Schedule D-5A, line 37 .

## Q. Do these expenses include expenses related to the surcharges that are being rolled-into the base rates in Duquesne Light's application? <br> A. No. Those expenses are included in the FPFTY operating expenses and are not removed from the cost elements or FERC accounts as the remaining surcharge related expenses are in this schedule.

Q. Please describe the adjustment contained on Schedule D-6B, page 1 of 1.
A. This adjustment shows the supply expense and related gross receipts taxes that are removed from the establishment of the FPFTY base rate revenue requirement. The forecast is included in column 3 and in column 4, since there is no adjustment for
lines 1 and 2 the amounts are the same. The adjustment shown on lines 4 to 6 reflects the removal of a cash working capital allow ance included in billed revenue but not part of external pay ments for commodity sold. After adding the costs for sales for resale on line 8 , the total cost is shown in column 4 on line 9 and brought forward to Schedule D-3,

## Q. Please describe Schedule D-7.

A. Schedule D-7 consists of two pages and shows the calculation of the FPFTY annualization adjustments for salaries and wages ("S\&W"). Page 1, column 2 contains the FPFTY forecast data summarized by FERC account categories showing a total to be expensed of $\$ 91.473$ million on line 16 , columns 2 and 4. Column 5 shows the annualization adjustment of $\$ 2.189$ million distributed to the FERC expense categories, while column 6 lists the pro forma amounts for $\mathrm{S} \& \mathrm{~W}$ expense, totaling $\$ 93.662$ million as shown on line 16 and an annualization adjustment to increase $S \& W$ of 2.393 percent as shown on line 17. The adjustment of $\$ 2.189$ million in column 3 on line 16 is reflected on Schedule D-3, column 4 on lines 19 through 24.

## Q. How was the annualization adjustment derived?

A. The calculation is shown on page 2 of Schedule D-7. In short, the adjustment annualizes forecast $\mathrm{S} \& \mathrm{~W}$ expense to reflect the number of employees at the end of the FPFTY and certain pay rate increases to become effective during the FPFTY. More specifically, I have annualized a union pay rate increase forecasted to be
effective on October 31, 2022 (lines 4 to 6 in column 2) based upon historic pay increases and the increase for non-union employees which will be effective on January 1, 2023 (lines 4 to 6 in column 3). As shown on line 6, each of these adjustments reflects the portion of these $\mathrm{S} \& \mathrm{~W}$ increases that was not included in the FPFTY forecast. These adjustments seek to capture the $\mathrm{S} \& \mathrm{~W}$ expense that Duquesne Light will incur at the end of the FPFTY annualized for the full FPFTY.

## Q. Please explain the calculations on lines 12 to 18 of Schedule D-7, page 2.

A. These calculations would normally provide an annualization for an increase in the number of employees during the FPFTY. However, Duquesne has utilized a vacancy factor in the calculation of the employees during and at the end of the FPFTY and therefore there is no need for an annualization adjustment for the number of employees.

## Q. What is the total pro forma adjustment for S\&W for the FPFTY?

A. The amount is $\$ 2.189$ million, which is an adjustment of 2.393 percent as shown on lines 21 and 22 of page 2 respectively.

## Q. Please describe Schedule D-8 of DLC Exhibit 2.

A. Schedule D-8 shows the adjustment to normalize rate case expense. The Company incurred ap proximately $\$ 350,000$ on this filing through December 31, 2020 (line 3) and has estimated an additional $\$ 2.090$ million to complete the case. This total, $\$ 2.440$ million (line 6) is normalized over a period of 3.0 years as shown on lines

7 and 8 , which results in a total estimated normalized cost per year for this case of $\$ 813,000$, as shown on line 8 . This results in an increase of $\$ 28,000$ from the $\$ 785,000$ forecasted expense for the FPFTY as shown on lines 10 and 9 respectively.
Q. Why are you using a 3-year period for the normalization of the rate case expenses related to this proceeding?
A. As of now, the Company plans to file its next rate increase application before the end of April 2024 using a FPFTY ended December 31, 2025. This will be three years after new rates in this proceeding are expected to be effective. The normalization period of 3 years reflects this period.

## Q. Please describe Schedule D-9 of DLC Exhibit 2.

A. Schedule D-9 reflects the calculation of the pension cost adjustment for theFPFTY. The adjustment reflects a three-y ear average of the pension contributions that the Company forecasts that it will make to its pension funds during the three years ending December 31, 2022, December 31, 2023 and December 31,2024, which are supported by the testimony of Ms.Bachota. Thetotal for these three y ears is $\$ 30.0$ million as shown on line 4 which results in a pro forma FPFTY amount for the pension contribution of $\$ 10.0$ million as shown on line 6 . Since a portion of these pension costs are capitalized, the Company has reduced this average contribution amount by 50 percent to reflect the portion of the pension contribution that will be expensed. The amount to be expensed in the FPFTY, $\$ 5.0$ million, is shown on
line 9 . The $\$ 6.004$ million on line 11 is the amount included in the Company's FPFTY forecasted expenses which results in an adjustment of $\$ 1.004$ million as shown on line 13 and therefore no adjustment to the forecast pension expense is included on Schedule D-3, page 1, column 10, line 26.

## Q. What is presented on Schedule D-10 of DLC Exhibit 2?

A. Schedule D-10 calculates an adjustment to the Company's forecasted uncollectible expenses. Lines 2 to 7 show the results of the five-year average rate of net uncollectible accounts charged off to total tariff revenue for the 2016-2020 period of 1.10 percent (column 5, line 7 ), which I would then normally use to determine the level of uncollectible expense at pro forma proposed rates and would be shown in the reference column on line 22 of Schedule D-2.

## Q. Are you recommending a different base calculation period for this case?

A. Yes, I am. The data for 2020, which results in a rate of 0.42 percent should not be used because it is an obvious outlier from the data for the prior five years. This 0.42 percent is substantially below all of the previous four years which range from 0.99 percent to 1.57 percent as show n on lines 2 through 5 . This is likely due to the COVID-19 pandemic and the various orders issued by the Commission regarding uncollectible accounts and customer disconnections.
Q. What period are you proposing for this proceeding?
A. As show $n$ on line 8, I am proposing to use the five-y ear period 2015 to 2019 for the calculation of the average which results in a 1.30 percent as shown in column 5 . This average maintains the five-year calculation period and provides a more consistent base than using the data from 2020, which is unlikely to recur during the y ears the rates established in this case will be in effect.

## Q. Why do you believe that the $\mathbf{1 . 3 0}$ percent reasonable to use in this proceeding?

A. The 1.30 percent average is in line with the actual percentages for the five-y ear period of 2015 to 2019 , which range from 0.99 percent to 1.51 percent as shown on lines 1 to 5 in column 4. This average is more in line with the historic results than the 0.41 percent in 2020 or the resulting 1.10 percent average from the use of the 1996 to 2000 historic data.

## Q. Where is the uncollectible factor of $\mathbf{1 . 3 0}$ percent used?

A. First, it is used to calculate the adjustment for uncollectible expense in the FPFTY as shown on lines 9 to 13 of Schedule D-10. It is also used to provide for uncollectible expenses associated with the required revenue increase and included in the Gross Revenue Conversion Factor described in connection with Schedule D22, page 3 of 3 .

## Q. What is the total uncollectible expense for the FPFTY proposed by the Company?

A. The total pro formaamount for uncollectible expense at present rates for the FPFTY is $\$ 12.215$ million which is a net increase of $\$ 4.760$ million from the forecast as shown on line 11 and brought forward to Schedule D-3 in column 13 on line 55 on page 2.

## Q. Please describe the adjustment contained on Schedule D-11.

A. This adjustment reflects the capitalization for development of cloud-based information sy stems required by Duquesne Light as described in the testimony of Ms. Bachota (DLC St. No. 2). The implementation costs associated with these cloud-based information systems are budgeted by the Company and recorded in accordance with applicable accounting guidance. Column 1 shows expenditures during the y ears 2016 to 2022 while column 2 shows the year when the projects from those expenditures were or are to be completed and placed in service. Column 3 reflects the total amount of the additions to plant while column 4 shows the amortization expense and column 5 the accumulated amortization at theend of each year. Finally, column 6 shows the net amount at the end of the FPFTY.

## Q. What are the specific adjustments related to the investment in these systems?

A. First, as shown on line $8, \$ 694,000$ is removed from the calculations since that amount which was closed to plant in 2017 (line 2) and would be fully amortized by theend of 2022. Second, theComp any is adding $\$ 12.553$ million to plant in service (column 2, line 9) which is shown on DLC Exhibit 2, Schedule C-2, page 1, column 2, line 1. Third, the Company is adding $\$ 7.012$ million to accumulated depreciation
(column 5, line 9) which is shown on DLC Exhibit 2, Schedule C-3, page 1, column 3, line 1. Finally, $\$ 2.511$ million is included as amortization expense (column 4, line 12) as shown on DLC Exhibit 2, Schedule D-3, page 2, column 14, line 59.

## Q. Please describe the adjustment contained on DLC Exhibit 2, S chedule D-12.

A. This adjustment shows the amortization for theFPFTY of the deferred uncollectible expense and related net costs associated with the Commission's orders related to COVID-19 matters, which are described by Ms. Bachota.

## Q. Please describe DLC Exhibit 2, Schedule 12.

A. Lines 1 to 6 show the calculation of the uncollectible expense portion of the adjustment. Lines 7 to 18 show the calculation of the net operating costs to be recovered. The total for the uncollectible and net operating costs of $\$ 12.076$ million on line 19 is divided by 3 years as the recovery period and the $\$ 4.025$ million adjustment on line 21 is included in the FPFTY expense.
Q. Please describe the calculation of the uncollectible expense to be recovered.
A. The calculation begins with the actual uncollectible expenses for 2020 of $\$ 14.658$ million on line 1. This is reduced by the amount of uncollectible expense presumed to be recovered by the Company in rates for 2020 of $\$ 10.471$ million on line 2 for a net amount of uncollectible expense to be recovered in this adjustment of $\$ 4.187$ million on line 3 .
Q. How was the amount of uncollectible expense recovered in rates calculated?
A. Line 2 shows the amount for uncollectible expense of $\$ 10.471$ million which was requested by the Company in its FPFTY in its last rate case in Docket No. 20183000324. Although the Company did not receive the total revenue increase requested as part of the settlement approved by the Commission in that docket, the uncollectible expense was not contested and therefore the Company is using the full pro forma uncollectible expense of $\$ 10.471$ million as the amount of uncollectible expense recovered in rates as part of the calculation of this adjustment.

## Q. What is contained on lines 4 to 6 of the schedule?

A. Lines 4 to 6 show the Company's estimate of the unrecovered uncollectible accounts related to the COVID-19 orders for 2021 that should be included in the balance to be recovered in this proceeding. The Company is using an estimate based on its 2020 experience and a period of 6 months as shown on lines 4 and 5 in columns 2 to 4 . The Company will update this estimate during the proceeding with actual amounts for uncollectible expense in 2021.
Q. How were the operating costs included in the recovery determined?
A. The Company determined incremental costs and revenue losses incurred in 2020 associated with the Commission's COVID-19 orders as described by Ms. Bachota as shown on lines 7 to 13 . The Company also identified cost savings associated with the COVID-19 activities in the total amount of $\$ 750,000$, which is listed on line 15. The net cost of $\$ 5.195$ million is shown on line 18 . In addition, the

Company estimates that it will incur an additional $\$ 600,000$ of net costs in 2021 resulting from additional costs and savings in these same or similar categories. The total costs to be recovered of $\$ 12.076$ million is shown on line 19 .

## Q. O ver what periodis the Company seeking to re cover these costs and expenses?

A. The Company has used the three-y ear period used to normalize rate case expenses, which is also the period that the Company expects the rates from this case to be in effect. The amount of the adjustment of $\$ 4.025$ million is shown on line 21.

## Q. What is contained on DLC Exhibit 2, Schedule D-13?

A Schedule D-13 contains the adjustment to the FPFTY expense for the COVID-19 New Business Stimulus Rate ("NBSR") as proposed in thetestimony of Ms. Krysia Kubiak (DLC St. No. 5). The Company is proposing to establish a NBSR, which, as explained in Ms. Kubiak's testimony, is designed to provide discounts to businesses recovering from the COVID-19 restrictions. As shown on lines 1 to 5, this program will cost $\$ 277,000$, resultingin an annual expense of $\$ 92,000$ per y ear for three y ears.

The second program, the Crisis Recovery Program ("CRP"), has a total cost of $\$ 423,000$, as show $n$ on lines 8 to 12 with an annual cost of $\$ 141,000 \mathrm{when}$ spread over three years. This program, as described in the testimony of Ms. Kubiak, is designed to provide payment assistance to certain nonresidential customers with delinquent electric bills who, prior to the COVID-19 pandemic, did not have a
history of delinquency. The total adjustment for these programs is $\$ 233,000$ as shown on line 15.
Q. Please describe the adjustment on DLC Exhibit 2, Schedule D-14.
A. This adjustment, as discussed by Ms. Bachota, is to recover deferred costs net of offsettingrefunds from programs authorized by theCommission in Docket R-20183000124. The $\$ 414,000$ on line 1 represents payments to customers for infrastructure costs that are "behind the meter" to provide support for the cost of such infrastructure. The customer electric vehicle incentives - not distributed of $\$ 140,000$ represents the estimated remaining amount from revenues collected for this program that will not be distributed to customers by the end of 2021. The net amount of $\$ 275,000$ on line 3 is divided by 3 to reflect the normalization of this item over 3 y ears, similar to the rate case expense normalization.

## Q. Please describe the adjustment proposed on Schedule D-15.

A. This adjustment corrects the depreciation expense included in the Company's recorded depreciation for 2020 and also for the depreciation expense included in its forecasts for 2021 and 2022 for the Electronic Vehicle ("EV") plant additions made or forecasted for those y ears. It also provides for an adjustment to the accumulated depreciation for each year.

## Q. What is the nature of the adjustment?

A. Most of the EV equip ment has a useful life of 10 y ears, while a small portion has a useful life of 5 years, which would be equal to depreciation rates of 10 percent and 20 percent respectively. The EV equip ment was included in plant account number 390 which has depreciation rates of 2.78 percent for 2020, 3.10 percent for 2021 and 3.18 percent for 2022 . The adjustment on Schedule D-15 corrects for the change in depreciation rates for each y ear.

## Q. Please describe the calculations on Schedule D-15.

A. Line 1 shows the plant additions for each year and line 2 shows the depreciation rates that were used to determine the depreciation expense included for each addition in each year. Lines 3 to 5 show the number of months used for the calculation of the depreciation expense in each year. For example, for 2020 as shown in column 1, the plant amount of $\$ 874,000$ was included in service for one month as shown on line 3. The depreciation expense would be the multiple of lines 1 times line 2 divided by 12 for a total of approximately $\$ 2,000$. The depreciation expense for 2021 would be based on the same $\$ 874,000$ times the depreciation rate of 3.10 percent for 2021 (column 2, line 2) or a total of 27,000 . Finally, the depreciation expense for 2022 would be based on the $\$ 874,000$ times the depreciation rate for 2022 of 3.18 percent (column 3, line 2 ). The total accumulated depreciation for the plant addition through 2022 would be the $\$ 57,000$ shown on line 9. The same procedures would be followed for each of the plant additions shown on line 1 and result in an accumulated depreciation included in the Company's recorded and forecasted amounts of $\$ 170,000$ (column 6, line 9). These
calculations also provide the amount of depreciation expense included in the forecast for the FPFTY of $\$ 120,000$ (column 6, line 8).

## Q. What is the correct calculation of depreciation expense and accumulated depreciation for the EV plant?

A. The calculation for the accumulated depreciation is shown on lines 10 to 15 and the calculation of the annualized depreciation expense is shown on lines 16 to 18 . The correct depreciation rates for each addition are shown on lines 10. As an example, using the plant amounts on line 1 and the in-service months on lines 3 to 5 , again, looking at 2020, the $\$ 7,000$ on line 11 replaces the $\$ 2,000$ on line 6 , as do the other amounts for 2021 and 2022. The updated accumulated depreciation on line 14 for each plant addition is reduced by the amount included in the Company's forecast on line 9 , which results in the adjustment on line 15 increasing the accumulated depreciation. The total adjustment of $\$ 384,000$ is shown on DLC Exhibit 2, Schedule C-3, page 4 of 4, column 3, line 34 for account 390.

## Q. What is the adjustment for the pro forma depreciation expense?

A. The depreciation expense adjustment is shown on Schedule D-15, lines 16 to 18 . Line 16 shows the amount of depreciation expense included in the Company's forecasts for each plant item, which is the amount calculated on line 8. The pro forma depreciation expense is calculated on line 17 and the difference on line 18 is the adjustment for depreciation expense.

## Q. Where is that adjustment shown?

A, The adjustment of $\$ 437,000$ is included on Schedule D-21, column 7, line 48.
Q. Is the Company proposing a Residential Crisis Recovery Program?
A. Yes, it is. As described by Ms. Scholl, DLC St. No. 7, the Company is proposing a program to assist certain residential customers with forgiveness of a portion of their arrearage in their electric bills.

## Q. What are the projected costs and how is the Company proposing to recover those costs?

A. As shown on Schedule D-16, lines 1 to 3, the Company is proposing to provide an estimated forgiveness amount of up to $\$ 300$ per customer for at least 10,000 residential customers, for a total of $\$ 3.0$ million. The Company also estimates that it will incur an additional $\$ 500,000$ for implementation and operational costs not currently included in expenses presented in this proceeding. The Company is proposing to recover this total amount of $\$ 3.5$ million over three years, or $\$ 1.167$ million per year, and has included an adjustment to expense for that amount.

## C. Taxes - O ther Than Income Taxes

Q. Please describe Schedule D-20 of DLC Exhibit 2.
A. Schedule D-20 contains 2 pages. Page 1 presents a summary of the forecast amounts for theFPFTY (column 3), adjustments to those amounts in column 4, and the pro forma expense amounts in column 5. The calculations for the increase in

TOTI related to the S\&W related changes are made on Schedule D-20, page 2 while the changes in the gross receipts tax ("GRT") are shown on page 1 , lines 11 to 18 . The calculations for the increase in pay roll taxes, as shown on page 2 , lines 1 to 4 for FICA expense, use the ratio of tax expense to pay roll expense included in the FPFTY forecast times the payroll adjustment for the FPFTY to produce an adjustment to FICA expense for the FPFTY of $\$ 169,000$ as shown on line 4 in column 4. The same procedures were followed for the other related pay roll tax items. The total pro forma increase in pay roll related taxes of $\$ 196,000$ is shown on page 2 , column 5 , line 14 . These amounts are then reflected on page 1 in column 4. The adjustment to decrease GRT in column 4 on line 7 of page 1 in the amount of $\$ 4.497$ million calculated on page 1 , lines 11 to 18 . The total adjustment is a net decrease of $\$ 4.301$ million in pro forma FTY expense for TOTI shown in column 4 on line 10. The pro formaTOTI expense is $\$ 60.288$ million as show n on Schedule D-20, page 1 , line 10 , column 5.
Q. Do you make an adjustment to recognize the additional GRT that will be required to be paid by the Company on the revenue increase allowed by the Commission in this proceeding?
A. Yes. As will be described in connection with DLC Exhibit 2, Schedule D-22, page 4, the incremental GRT is recovered through the gross revenue conversion factor ("GRCF") used to determine the amount of revenue required to provide the net income increase found reasonable in this proceeding.

## D. Depreciation Expense

Q. Please describe DLC Exhibit 2, Schedule D-21, pages 1 to 3.
A. Schedule D-21 contains the depreciation expense for the FPFTY on page 1, the amortization of the cost of removal on page 2 and the total of the two elements is contained on page 3. The pro forma depreciation expense for the FPFTY was calculated on Schedule D-21, page 1, column 7 using the year-end December 31, 2022 plant balance in column 5 times the depreciation rates shown in column 2.
Q. How were the depreciation rates in column 2 determined?
A. All of the rates, except the rates on lines $3,14,15,35,38$ and 42 were determined by Mr. Spanos and supported in his testimony (DLC St. No. 11). The other rates, mainly for intangible, leasehold and transportation plant, were determined using Company data for the FPFTY.
Q. What is the amount of depreciation expense included in the Company's expense claim for the FPFTY?
A. The amount is $\$ 201.477$ million as shown on DLC Exhibit 2, Schedule D-21, column 7, line 47 plus the adjustment for theEV plant discussed in connection with Schedule D-15, which is show n on line 48 of Schedule D-21, page 1 in column 7.
Q. Please describe the calculation of the ave rage net salvage amortization shown on page 2 of DLC Exhibit 2, Schedule D-21.
A. This schedule shows the 5-y ear average for the net salvage that is included as an amortization expense and also as an addition to the accumulated depreciation shown on DLC Exhibit 2, schedule C-3, page 3, column 7. The total of $\$ 16.850$ million is shown on page 2 of Schedule D-21 in column 7 on line 47.

## Q. What is the total for depreciation and net salvage amortization expense for the FPFTY?

A. The total is $\$ 218.327$ million as shown DLC Exhibit 2, Schedule D-21, page 3 column 7, line 47 plus the EV depreciation expense adjustment of $\$ 437,000$ on line 48 in column 7.

## E. Income Taxes

Q. Please describe the income tax calculation shown on DLC Exhibit 2, Schedule D-22.
A. This schedule calculates the pro forma income tax expense for the FPFTY pro forma at present rates for the total Comp any with pro forma adjustments in columns 2 to 5 and for the PA Jurisdiction at present rates, on the proposed increase and at proposed revenue levels in columns 6 to 9 on page 1 of 4 . Pages 2 and 3 contain various elements used in the calculation of income taxes such as state and Federal tax depreciation, repair deductions, cost of removal and deferred income tax expense for both transmission and distribution operations. Finally, page 4 shows the calculation of the gross revenue conversion factor ("GRCF") which is used to calculate the revenue increase required to recover uncollectible expense, fees and
taxes related to revenue once the amount of net operating income increase is determined.
Q. Who is responsible for the calculations and the data contained on Schedule D$22 ?$
A. I am responsible for all of the calculations on Schedule D-22. Mr. Simpson and Mr. Gorman have reviewed them and agree with the calculations on page 1 of the schedule. With regard to the data, I have provided the data related to the total Company shown in columns 2 to $5, \mathrm{Mr}$. Simpson provided the data related to the separate tax components for both total Company and PA Jurisdictional operations shown on pages 2 and 3 and Mr. Gorman provided the data related to the PA Jurisdictional operations shown in columns 6 to 9.
Q. Do the income tax calculations use the tax rate and other requirements of the Tax Cut and Jobs Act of 2017 ("TCJA")?
A. Yes, they do. As further described by Mr. Simpson in his testimony (DLC St. No. 12), the tax calculations use the $21 \%$ Federal income tax rate and other elements of the TCJA.
Q. What is contained on pages 2 and 3 of DLC Exhibit 2, Schedule D-22?
A. Pages 2 and 3 contain the tax depreciation and other tax elements used in the calculation of income tax expense on page 1 of Schedule D-22 for the total Company in columns 2 to 4 and for the PA Jurisdictional operations in column 5.
Q. Please describe page 4 of Schedule D-22.
A. Page 4 shows the calculation of the GRCF on lines 1 to 11 of 1.516558 , which includes provision for uncollectible expenses, the GRT and various assessments on revenue which results in an effective composite income tax rate of $26.792 \%$ of gross revenue. The GRCF for just income taxes of 1.406314 is calculated on lines 13 to 18 with a composite income tax rate of $28.892 \%$.

## V. FUTURE TES T YEAR AND HIS TORIC TES T YEAR

Q. Please describe the process used to prepare the pro forma FTY and HTY presentation contained in DLC Exhibit 3 and DLC Exhibit 4 respectively.
A. The basic process was the same as described in connection with DLC Exhibit 2 for the FPFTY, including the preparation of a Jurisdictional Sep aration Study based on the FTY and HTY data, except that I used budgeted data for the FTY and actual recorded data for the HTY as the starting point for each exhibit. As with the FPFTY, I reviewed the budgeted and recorded data and, where ap propriate, made pro forma adjustments. In addition, I used data from DLC Exhibit 2 as the basis for several of the pro forma amounts used in DLC Exhibits 3 and 4. Mr. Gorman will testify to the Jurisdictional Separation Study and the results which are applicable to the FTY and HTY (DLC St. No. 15).

## Q. What assumptions did you make to determine what pro forma adjustments would be necessary for the FTY and HTY?

A. I included pro formaadjustments that reflected the annualization and normalization of FTY and HTY elements and also adjustments for future events that have impacted the FPFTY. The pro forma adjustments for the FTY and HTY are numbered consistent with the adjustments for the FPFTY. For example, the adjustment for salaries and wages is on Schedule D-7 in all three test years to facilitate reference between the FPFTY, the FTY and the HTY. Where there is no adjustment required for the FTY or the HTY it will simply show that it is not applicable.

## Q. Referring now to DLC Exhibit 3, for the FTY, what is contained on Schedules B-1 to B-8? <br> A. These schedules contain forecast financial data for the year ended December 31, 2021 and are supported by Witnesses Bachota, Simpson, Milligan and Moul as indicated on each schedule.

## Q. Please describe Schedules B-6 to B-8.

A. This contains the pro forma capital structure and rate of return used for the FTY. As shown on lines 1 to 4 , the Company is using the capital structure and cost rates for the FPFTY, which represents the Company's expected capital structure at FPFTY end, and I believe should be used for the FTY presentation and the HTY
presentation as well as for theFPFTY. Schedules B-6, B-7 and B-8 reflect the same data as shown for the FPFTY.

## Q. Please describe Schedule C-1.

A. Schedule C-1, which will be supp orted by me and Mr. Gorman, shows the measures of value and pro forma return at present rates for the total electric utility and for the Pennsylvania jurisdiction. In addition, it shows the pro forma return at proposed rates for the Pennsylvania jurisdiction.

## Q. What is contained in Schedule C-2?

A. Schedule C-2 contains 4 pages and shows the utility plant in service balances at December 31, 2021 as well as the additions, retirements and adjustments for the year ended December 31, 2021. Page 1 a summary of the recorded plant, adjustments and pro forma plant by major FERC plant category. Page 2 contains the projected plant balances pro forma by FERC account at December 31, 2021, while page 3 shows the plant additions, retirements and reclassifications for the y ear 2021. Page 4 reflects any adjustments to plant. The total pro forma plant in service at the end of the FTY, $\$ 5.090$ billion, is shown on line 7 , column 4 of Schedule C-2, page 1 and also on Schedule D-1, page 3, column 1, line 1 for the total Company. The PA Jurisdictional plant amount is $\$ 3.945$ billion as shown on Schedule D-1, page 3, column 2 on line 1.
Q. Please describe Schedule C-3.
A. Schedule C-3 contains 4 pages and presents the accumulated depreciation at December 31, 2021. These pages reflect pro forma balances by FERC account following the same procedures used in the FPFTY. The accumulated depreciation at the end of the FTY is $\$ 1.693$ billion as shown on column 4 , line 7 and also on Schedule D-1, page 3, column 1, line 2 for the total Company. The PA Jurisdictional accumulated depreciation amount is $\$ 1.330$ billion as shown in column 2 on line 2 on page 3 .

## Q. What is contained in Schedule C-4?

A. Schedule C-4 contains 10 pages that show the calculation of the CWC allow ance for the FTY of $\$ 65,978$ million (line 6) and also on Schedule D-1, page 3, column 1, line 4. The PA Jurisdictional CWC is $\$ 44,539$ million as shown on Schedule D1 , page 3 , column 2 , line 4 .

## Q. Please describe page 2 of 10 of Schedule C-4.

A. Page 2 provides a summary of the calculations for each of the elements of the CWC for the FTY. The expenses in column 2 and those included in the determination of the lead-lag amounts for taxes and interest are the pro forma amounts for the FTY while the prepay ment amount is the thirteen-month average through December 31, 2020. The resulting $\$ 65,978$ million of CWC shown on line 19 is brought forward to Schedule D-1, page 3 in the calculation of the measures of value. In addition, theCWC amount for the generation expense calculated on lines 16 to 18 of $\$ 13.189$
million is assigned to the Supply sector by Mr. Gorman in his JSS and is not included in the distribution sector.

## Q. Please describe pages $\mathbf{3}$ to $\mathbf{1 0}$ of Schedule C-4.

A. These pages show the calculations of various leads and lags and working capital requirements for the FTY following the same procedures used for the FPFTY as described in connection with DLC Exhibit 2, Schedule C-4. While the amounts for the FTY expenses and other components may vary from those in the FPFTY, the procedures followed to determine the lead/lag periods applied to those expense levels are the same and were described in connection with the same DLC Exhibit 2 schedules.

## Q. What is contained on Schedule C-5?

A. Schedule C-5 shows the 13-month average month end balance for the period December 2019 to December 2020 for plant materials and operating supplies. The 13-month average of $\$ 33.482$ million is show $n$ on line 22 in column 2 and also on Schedule D-1, page 3, column 1, line 5.

## Q. Please describe the calculations on Schedule C-6.

A. These calculations present the ADIT for the FTY. The procedures followed are the same as those utilized for the ADIT calculation at the end of the FPFTY except that y ear-end December 31, 2021 balances were used. The resulting ADIT of $\$ 693.8$ million for the FTY is shown on line 6 and also on Schedule D-1, page 3, column

1, line 11. The amount for the PA Jurisdiction is $\$ 524.8$ million as shown on Schedule D-1, page 3, column 2, line 11.
Q. Please describe the data presented on Schedule C-7.
A. Schedule C-7 shows the 13-month average month end balance for the period December 2019 to December 2020 customer deposits in column 1 and also for the 12-month total for interest expense related to those customer deposits in column 2. The 13-month average of $\$ 11.163$ million is shown on line 15 in column 1 and also on Schedule D-1, page 3, column 1, line 9. The customer deposit amount is the same for the total Company and for the PA Jurisdictional operations. The interest expense of $\$ 532,000$ is show in column 2 on line 14 and also included on Schedule D-3, page 2, column 19, line 51 as an adjustment to FTY expenses.

## Q. Please describe Schedule C-8.

A. Schedule C-8 shows the FTY amount for the capitalized pension adjustment. As with the presentation for the FPFTY, the amount of $\$ 94.008$ million in column 3 on line 25 is the capitalized pension adjustment and also included on Schedule D1, page 3, column 1, line 6 with the PA Jurisdictional amount of $\$ 72.865$ million shown in column 2.

## Q. What is presented on Schedule D-1?

A. Schedule D-1 contains the jurisdictional distribution amounts which will be supported by Mr. Gorman and shows the net operating income at present rates for
theFTY, the pro forma revenue deficiency and the pro forma required revenue level for the Pennsy lvania Jurisdiction. I support the total company amounts shown in Schedule D-1.

## Q. Please describe Schedule D-2.

A. Schedule D-2 shows revenue and expenses recorded for the FTY, pro forma adjustments and the pro forma revenue and expense amounts at present rates. This schedule summarizes the adjustments that are detailed on Schedules D-3 and D-5 and explained in connection with other supporting schedules to be described later in my testimony.
Q. Did you prepare a schedule showing that the Cost Element expenses related to surcharge revenue and below-the-line expenses were removed from the Cost Element expenses before using the FTY expenses in determining total Company or jurisdictional related expenses?
A. Yes, I did. The schedule is included as Exhibit RLO-2 to my testimony, and it is similar to Exhibit RLO-1 for the FPFTY. The total Company expenses, net of expenses related to the surcharge revenue that is not being rolled into base rates and also net of below-the-line expenses, are shown in column 10 and reflect the base for expenses in the FTY.

## Q. Please describe Schedule D-3.

A. Schedule D-3 contains two pages which present asummary of each of the pro forma adjustments made to revenues and operating expenses, including depreciation and taxes-other than income taxes. Each of the adjustments will be described in connection with the specific schedule containing the calculation of the adjustment.

## Q. Please describe Schedule D-5.

A. Schedule D-5 show s the pro formaadjustments to the FTY recorded revenue. Each of the listed adjustments is discussed in connection with Schedules D -5A to D-5C.
Q. Please describe the adjustment on Schedule D-5A.
A. This adjustment, as with the adjustment to the FPFTY, removes the surcharge revenues from the FTY. Surcharge related expenses were removed from the Cost Elements before those Cost Element amounts were used as a base for the expense adjustments in the FTY.
Q. What is adjustment on Schedule D-5B?
A. This adjustment shows the calculation of revenue losses from activities of the Company and its customers for the years 2023 to 2025 and the average for those years. This adjustment is described in connection with the adjustment to the FPFTY.
Q. Please describe the adjustment on Schedule D-C.
A. This adjustment annualizes revenues for customer growth during the FTY. The process utilized is as described in connection with the same adjustment for the FPFTY on DLC Exhibit 2, Schedule D-5C.
Q. Are the adjustments on Schedules D-6A and D-6B similar to the adjustments included in DLC Exhibit 2 and described in connection with the schedule presented in that exhibit?
A. Yes, they are.
Q. Please describe Schedule D-7.
A. Schedule D-7 annualizes salaries and wages for the FTY. Page 1 shows the budgeted amounts in column 2 and the pro forma adjustment in column 5 by FERC expense category. Page 2 shows the calculation of the annualization adjustment, which follows the same procedures described in connection with the FPFTY using the data from FTY for the wage increases. There was no adjustment to annualize numbers of employees on page 2, lines 12 to 18 because the level of employees was relatively constant during the FTY.
Q. Are the adjustments on Schedules D-8, D-9, D-10,D-11, D-15 and D-20 similar to the adjustments included in DLC Exhibit 2 and describedin connection with the schedules presented in that exhibit?
A. Yes, they are.

## Q. Please describe Schedule D-21.

A. Schedule D-21 presents adjusted depreciation and average cost of removal net of salvage amortization expense for FTY with dep reciation expense annualized using plant balances at the end of the FTY and depreciation rates for the FTY supported by Mr. Spanos or Company determined depreciation rates for the several accounts normally not included in the analyses provided by Mr. Spanos.
Q. Please describe the income tax calculations on Schedule D-22.
A. This schedule shows the calculation of the pro forma income tax expense for the FTY reflecting the total Company revenue, expenses and measures of value included in the pro forma present rate data for the total Company and for the PA Jurisdictional operations at present and proposed revenue levels. As with the FPFTY, these data and calculations are sponsored by me, Mr. Simpson and Mr. Gorman.
Q. Referring now to DLC Exhibit 4, for the HTY, what is contained on Schedules B-1 to B-5?
A. These schedules contain forecast financial data for the year ended December 31, 2020 and are supported by Witnesses Bachota and Simpson, as indicated on each schedule.
Q. Please describe Schedules B-6 to B 8.
A. This contains the pro forma capital structure and rate of return used for the HTY. As shown on lines 1 to 4 , the Company is using the capital structure and cost rates for the FPFTY which represents the Company's expected capital structure at FPFTY end, and I believe should be used for the HTY presentation as well as for the FPFTY. These schedules are supported by Mr. Milligan and Mr. Moul as indicated on each schedule.

## Q. Please describe Schedule C-1.

A. Schedule C-1, which will be supp orted by me and Mr. Gorman, shows the measures of value and pro forma return at present rates for the total electric utility and for the PA Jurisdiction. In addition, it shows the pro forma return at proposed rates for the PA Jurisdiction.

## Q. What is contained in Schedule C-2?

A. Schedule C-2 contains 4 pages and shows the utility plant in service balances at December 31, 2020 as well as additions, retirements and adjustments for the year ended December 31, 2020. Page 1 shows a summary of the recorded plant, adjustments and pro forma plant by major FERC plant category. Page 2 contains the plant balances pro forma by FERC account at December 31, 2020. Page 3 shows the plant additions, retirements and reclassifications for the y ear 2020 while adjustments to plant are reflected on page 4 of Schedule C-2. The total pro forma plant in service at the end of the HTY, $\$ 4.788$ billion is shown on line 7 of Schedule C-2, page 1, column 4 and also on Schedule D-1, page 3, column 1, line 1 for the
total Comp any and $\$ 3.703$ billion for the PA Jurisdiction as shown on Schedule D1 , page 3 , column 2 , line 1 .

## Q. Please describe Schedule C-3.

A. Schedule C-3 contains 4 pages and presents the accumulated depreciation at December 31, 2020. These pages reflect the pro forma balances by FERC account follow ing the same procedures used in the FPFTY for the HTY. The accumulated depreciation at the end of the FTY is $\$ 1.607$ billion as shown in column 4 on line 7 and also on Schedule D-1, page 3, column 1, line 2 for the total Company and $\$ 1.261$ billion for the PA Jurisdiction as shown on Schedule D-1, page 3, column 2 , line 2 .

## Q. What is contained in Schedule C-4?

A. Schedule C-4 contains 10 pages that show the calculation of the CWC allowance for the HTY of $\$ 63.453$ million (line 6) and also on Schedule D-1, page 3, column 1 , line 4 for the total Comp any and $\$ 42.907$ million for the PA Jurisdiction as shown on Schedule D-1, page 3, column 2, line 4.

## Q. Please describe page 2 of 10 of Schedule C-4.

A. Page 2 provides a summary of the calculations for each of theelements of the CWC for the HTY. The expenses in column 2 and those included in the determination of the lead-lag amounts for taxes, interest and preferred dividends are the pro forma amounts for the HTY while the prepay ment amount is the thirteen-month average
through December 31, 2020. The resulting $\$ 63.453$ million of CWC shown on line 19 is brought forw ard to Schedule D-1, page 3 in the calculation of the measures of value. In addition, the CWC amount for the generation expense calculated on lines 16 to 18 of $\$ 13.081$ million is assigned to the Supply sector by Mr. Gorman in his JSS and is not included in the distribution sector.

## Q. Please describe pages $\mathbf{3}$ to $\mathbf{1 0}$ of Schedule C-4.

A. These pages show the calculations of various leads and lags and working capital requirements for the HTY following the same procedures used for the FPFTY as described in connection with DLC Exhibit 2, Schedule C-4. While the amounts for the HTY expenses vary from those in the FPFTY, the procedures followed to determine the lead/lag periods applied to those expense levels are the same and were described in connection with the same DLC Exhibit 2 schedules.

## Q. What is contained on Schedule C-5?

A. Schedule C-5 shows the 13 -month average month end balance for the period December 2019 to December 2020 for plant materials and operating supplies. The 13-month average of $\$ 33.483$ million is shown on line 16 in column 3 and also on Schedule D-1, page 3, column 1, line 5.

## Q. Please describe the calculations on Schedule C-6.

A. These calculations present the ADIT for the HTY. The procedures followed are the same as those utilized for the ADIT calculation at the end of the FPFTY except
that year-end December 31, 2020 balances were used. The resulting ADIT of $\$ 697.610$ million for the HTY is shown on line 6 and also on Schedule D-1, page 3, column 1, line 11 and $\$ 530.082$ million for the PA Jurisdiction as shown on Schedule D-1, page 3, column 2, line 11.

## Q. Please describe the data presented on Schedules C-7.

A. Schedule C-7 shows the 13-month average month end balance for the period December 2019 to December 2020 customer deposits in column 1 and also for the 12-month interest expense related to those customer deposits in column 2. The 13month average of $\$ 11.163$ million is shown on line 15 in column 1 and also on Schedule D-1, page 3, column 1, line 9. The interest expense of $\$ 532,000$ is shown in column 2 on line 14 and also included on Schedule D-3, page 2, column 19, line 51 as an adjustment to HTY expenses.

## Q. Please describe Schedule C-8.

A. Schedule C-8 shows the HTY amount for the capitalized pension adjustment. As with the presentation for the FPFTY, the amount of $\$ 95.822$ million in column 3 on line 25 is total amount for the capitalized pension adjustment.

## Q. What is presented on Schedule D-1?

A. Schedule D-1 contains the PA Jurisdictional distribution amounts which will be supported by Mr. Gorman and shows the net operating income at present rates for the HTY, the pro forma revenue deficiency and the pro forma required revenue
level for the PA Jurisdiction. I support the total company amounts shown in Schedule D-1.

## Q. Please describe Schedule D-2.

A. Schedule D-2 shows revenue and expenses recorded for the HTY, pro forma adjustments and the pro forma revenue and expense amounts at present rates. This schedule summarizes the adjustments that are detailed on Schedules D-3 and D-5 and explained in connection with other supporting schedules to be described later in my testimony.

## Q. Did you prepare a schedule showing that the Cost Element expenses related to surcharge expenses and below-the-line expenses were removed from the Cost Element expenses before using the HTY expenses in determining total Company or jurisdictional related expenses?

A. Yes, I did. The schedule is included as Exhibit RLO-3 to my testimony and is similar to Exhibit RLO-1 for the FPFTY and Exhibit RLO-2 for the FTY. The net expenses shown in column 10 reflect the base for expenses in the HTY, which as shown in columns 8 and 9 exclude expenses related to surcharge revenues that are not being included in base rates as well as excluding expenses recorded below -theline.

## Q. Please describe Schedule D-3.

A. Schedule D-3 contains two pages which present asummary of each of the pro forma adjustments made to revenues and operating expenses, including depreciation and taxes-other than income taxes. Each of the adjustments will be described in connection with the specific schedule containing the calculation of the adjustment.

## Q. Please describe Schedule D-5.

A. Schedule D-5 show s the pro formaadjustments to the HTY recorded revenue. Each of the listed adjustments is discussed in connection with Schedules D-5A to D-5C.
Q. Please describe the adjustment on Schedule D-5A.
A. This adjustment, as with the adjustment to the FPFTY, removes the surcharge revenues from the HTY. Surcharge related expenses were removed from the Cost Elements before those Cost Element amounts were used as a base for the expense adjustments in the HTY.

## Q. What is adjustment on Schedule D-5B?

A. This adjustment shows the calculation of revenue lost from conservation and energy efficiency activities of the Company and its customers for the y ears 2023 to 2025 and the average for those years. This adjustment is described in connection with the adjustment to the FPFTY.
Q. Please describe the adjustment on Schedule D-5C.
A. This adjustment annualizes revenues for customer growth during the HTY. The process utilized is as described in connection with the same adjustment for the FPFTY on DLC Exhibit 2, Schedule D-5C.
Q. Does the data shown on Schedules D-6A and D-6B present the same data for the HTY as shown on similar schedules for the FPFTY and FTY?
A. Yes.
Q. Please describe Schedule D-7.
A. Schedule D-7 annualizes salaries and wages for the HTY. Page 1 shows the budgeted amounts in column 2 and the pro forma adjustment in column 5 by FERC expense category. Page 2 shows the calculation of the annualization adjustment, which follows the same procedures described in connection with the FPFTY using the data from HTY for the wage increases. There was no adjustment to an nualize numbers of employees on page 2 , lines 12 to 18 .
Q. Are the adjustments on Schedules D-8,D-9, D-10,D-11 and D-20 similar to the adjustments included in DLC Exhibit 2 and described in connection with the schedules presented in that exhibit?
A. Yes, they are.
Q. Please describe Schedule D-21.
A. Schedule D-17 presents adjusted depreciation and cost of removal net of salvage amortization expense for HTY annualized for plant amounts at the end of the HTY.
Q. Please describe the income tax calculations on Schedule D-22.
A. This schedule shows the calculation of the pro forma income tax expense for the FTY reflecting the total Company revenue, expenses and measures of value included in the pro forma present rate data for the total Company and for the PA Jurisdictional operations at present and proposed revenue levels. As with the FPFTY, these data and calculations are sponsored by me, Mr. Simpson and Mr. Gorman.
Q. Does this complete your direct testimony at this time?
A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

## BEFORE THE

Docket No. R-2021-3024750

## Duquesne Light Company

Statement No. 11

Direct Testimony of John J. Spanos

Subject: Depreciation

Dated: April 16, 2021

## Direct Testimony of John J. Spanos

Q. Please state your name and address.
A. John J. Spanos. My business address is 207 Senate Avenue, Camp Hill, Pennsylvania.
Q. With what firm are you associated?
A. I am associated with the firm of Gannett Fleming Valuation and Rate Consultants, LLC (Gannett Fleming).
Q. How long have you been associated with Gannett Fleming?
A. I have been associated with the firm since June 1986.
Q. What is your position in the firm?
A. I am President.
Q. What is your educational background?
A. I have Bachelor of Science degrees in Industrial Management and Mathematics from Carnegie Mellon University and a Master of Business Administration from York College of Pennsylvania.

## Q. Are you a member of any professional societies?

A. Yes. I am a member and past President of the Society of Depreciation Professionals and a member of the American Gas Association/Edison Electric Institute Industry Accounting Committee.

## Q. Have you taken the certification examination for depreciation professionals?

A. Yes, I passed the certification examination of the Society of Depreciation Professionals in September 1997 and was recertified in August 2003, February 2008, January 2013 and February 2018.

## Q. Will you outline your experience in the field of depreciation?

A. I have over 34 years of depreciation experience which includes expert testimony in over 350 cases before approximately 41 regulatory commissions, including the Pennsylvania Public Utility Commission. These cases have included depreciation studies in the electric, gas, water, wastewater and pipeline industries. In addition to cases where I have submitted testimony, I have supervised over 700 other depreciation or valuation assignments. Please refer to Appendix A for my qualifications statement, which includes further information with respect to my work history, case experience, and leadership in the Society of Depreciation Professionals.

## Q. What is the purpose of your testimony?

A. My testimony is in support of the depreciation studies conducted under my direction and supervision for the utility plant of Duquesne Light Company .

## Q. Have you prepared exhibits presenting the results of your studies?

A. Yes. Exhibit JJS-1 presents the results of the depreciation study as of December 31, 2020. Exhibit JJS-2 presents the results of the depreciation study as of December 31, 2021. Exhibit JJS-3 presents the results of the depreciation study as of December 31, 2022. In addition, I am responsible for the responses to the following filing requirements pertaining to depreciation under Section 53.53(a)(1) of the Commission's regulations: V-A-2, V-B-1, V-B-2, V-C-1, V-D-1, V-D-2 and V-E-1 which present summaries of the study results as of the historic test year end, December 31, 2020, future test year end, December 31, 2021 and the fully projected future test y ear end, December 31, 2022.

## Q. Please describe Exhibits JJS 1, JJS-2 and JJS-3.

A. Exhibit JJS-1, titled "2020 Depreciation Study - Calculated Annual Depreciation Accruals Related to Electric Plant as of December 31, 2020," includes the results of the depreciation study as related to the original cost at December 31, 2020. The report also includes the detailed depreciation calculations. Exhibit JJS-2, titled "2021 Depreciation Study - Calculated Annual Depreciation Accruals Related to Electric Plant as of December 31, 2021," includes the results of the depreciation study as related to the estimated original cost at December 31, 2021. The report also includes explanatory text, statistics related to the estimation of service life, and the detailed depreciation calculations. Exhibit JJS-3, titled "2022 Depreciation Study - Calculated

Annual Depreciation Accruals Related to Electric Plant as of December 31, 2022," includes the results of the depreciation study as related to the estimated original cost at December 31, 2022.
Q. What was the purpose of your depreciation study?
A. The purpose of the depreciation studies were to estimate the annual depreciation accruals related to utility plant in service for ratemaking purposes and, using Commission-approved procedures, to estimate the Company's book reserve at December 31, 2020, December 31, 2021 and December 31, 2022.
Q. Is the Company's claim for annual depreciation in the current proceeding based on the same methods of depreciation as were used in its most recent electric base rate proceeding in Docket No. 2018-3000124.
A. Yes, it is. For most plant accounts, the current claim for annual depreciation is based on the straight line, remaining life method of depreciation. For Accounts 391, 393, 394, 395, 397 and 398, the claim is based on the straight line, remaining life method of amortization. The annual amortization is based on amortization accounting which distributes the unrecovered cost of fixed capital assets over the remaining amortization period selected for each account.
Q. What group procedure is being used in this proceeding for depreciable
accounts?
A. All depreciable accounts utilize the methods and procedures based on the straight line remaining life method, using remaining lives consistent with the average service life procedure for plant installed prior to 1983 and remaining lives consistent with the equal life group procedure for plant installed in 1983 and in later years.
Q. Please describe briefly the straight line remaining life method of depreciation that you used for depreciable property.
A. The straight line remaining life method of depreciation allocates the original cost less accumulated depreciation in equal amounts to each y ear of remaining service life.
Q. Please describe briefly the average service life procedure that you used in conjunction with the straight line remaining life method for plant installed prior to 1983.
A. In the average service life procedure, the remaining life annual accrual for each vintage is determined by dividing future book accruals (original cost less book reserve) by the average remaining life of the vintage. Their average remaining life is a directly weighted average derived from the estimated survivor curve.
Q. Please describe briefly the equal life group procedure that you used in conjunction with the straight line remaining life method for plant installed in 1983 and in later years.
A. In the equal life group procedure, the remaining life annual accrual for each vintage is determined by dividing future book accruals (original cost less book reserve) by the composite remaining life for the surviving original cost of that vintage. The composite remaining life for the vintage is derived by weighting the individual equal life group remaining lives.

In the equal life group procedure, the property group is subdivided according to service life. That is, each equal life group includes that portion of the property which experiences the life of that specific group. The relative size of each equal life group is determined from the property's life dispersion curve.

## Q. Is the Company's claim for accrued depreciation in the current proceeding

 made on the same basis as has been used in its most recent electric base rate proceeding in Docket No. R-2018-3000124?A. Yes. The current claim for accrued depreciation is the book reserve brought forward from the book reserve utilized by the company in its last base rate proceeding and for the prior rate cases.

## Q. How was the book reserve used in the calculation of annual de preciation?

A. The book reserve by account was allocated to vintages to determine original cost less accrued depreciation by vintage. The total annual accrual is the sum of the results of dividing the original costs less accrued depreciation by the vintage composite remaining lives.
Q. How was the book reserve at December 31, 2021 estimated?
A. The book reserve at December 31, 2021, by account, was projected by adding estimated accruals, salvage and the amortization of net salvage, and subtracting estimated retirements and cost of removal from the book reserve at December 31, 2020. Annual accruals were estimated using the annual accrual rates calculated as of December 31, 2020. For most accounts, salvage and cost of removal were estimated by (1) expressing actual salvage and cost of removal as a percent of retirements by account, for the most recent five-year period, and (2) applying those percents to the projected retirements by account. For the purpose of calculating the annual accruals, the projected book reserve by account was allocated to vintages based on calculated accrued depreciation at December 31, 2021.

## Q. Has a service life study of the Company's electric utility property been performed for this filing?

A. No, but the Company's most recent service life study was performed using data through 2019 because this Commission's regulations only require service life studies to be prepared every 5 years. That 2019 service life study is the basis for the service lives I used to calculate annual accruals.
Q. Briefly outline the procedure used in performing the service life study.
A. The service life study consisted of assembling and compiling historical data from the records related to the electric utility plant of the Company; statistically analy zing such data to obtain historical trends of survivor characteristics; obtaining supplementary information from management and operating personnel concerning Company practices and plans as they relate to plant operations; and interpreting the above data to form judgments of service life characteristics.

Iowa type survivor curves were used to describe the estimated survivor characteristics of the mass property groups. Individual service lives were used for major individual units of plant, such as large service centers, substation structures, and office buildings within Accounts 352, 361 and 390.1. The life span concept was recognized by coordinating the lives of associated plant installed in subsequent years with the probable retirement date defined by the life estimated for the major unit.

## Q. What statistical data were employed in the historical analyses performed for the purpose of estimating service life characteristics?

A. The data consisted of the entries made to record retirements and other transactions related to the electric plant through 2019. These entries were classified by depreciable group, type of transaction, the year in which the transaction took place, and the year in which the plant was installed. Types of transactions included in the data were plant additions, retirements, transfers, and balances. In the presentation of service life statistics, only the significant exposure points that were utilized in determining
survivor curves were plotted. This process is utilized to show my judgment in service life determinations.

## Q. What was the source of these data?

A. They were assembled from Company records related to its utility plant in service.
Q. Were the methods used in the service life study the same as those used in other depreciation studies for electric utility plant presented before this Commission?
A. Yes. The methods are the same ones that have been presented previously for Duquesne Light Company and for other electric companies before the Pennsylvania Public Utility Commission and that have been accepted by the Commission in its past orders concerning electric utilities.
Q. What approach did you use to estimate the lives of significant structures such as substation buildings, office buildings and service centers?
A. I used the life span technique to estimate the lives of significant structures. In this technique, the survivor characteristics of the structures are described by the use of interim survivor curves and estimated probable retirement dates. The interim survivor curve describes the rate of retirement related to the replacement of elements of the structure such as plumbing, heating, doors, windows, roofs, etc. that occur during the life of the facility. The probable retirement date provides the rate of final retirement
for each year of installation for the structure by truncating the interim survivor curve for each installation year at its attained age at the date of probable retirement. The use of interim survivor curves truncated at the date of probable retirement provides a consistent method for estimating the lives of the several years of installation inasmuch as concurrent retirement of all years of installation will occur when the structure is retired.
Q. Has your firm used this approach in other proceedings before this Commission?
A. Yes, we have used the life span technique on many occasions before the Pennsylvania Public Utility Commission.
Q. What are the bases for the probable retirement years that you have estimated
for each structure?
A. The bases for the estimates of probable retirement years are life spans for each structure that are based on judgment and incorporate consideration of the age, use, size, nature of construction, management outlook and typical life spans experienced and used by other electric utilities for similar structures. Most of the life spans result in probable retirement years that are many years in the future. As a result, the retirement of these structures is not yet subject to specific management plans. Such plans would be premature. At the appropriate time, analy sis of the economics of
rehabilitation and continued use or retirement of the structure will be performed and the results incorp orated in the estimation of the structure's life span.

## Q. Are the factors considered in your estimates of service life presented in Exhibit JJS-2?

A. Yes. A discussion of the factors considered in the estimation of service lives is presented by account on pages III-4 through III-7 of Exhibit JJS-2.

## Q. Please outline the contents of Exhibit JJS-2.

A. Exhibit JJS-2 is presented in seven parts. Part I, Introduction, sets forth the scope and basis of the study. Part II, Estimation of Survivor Curves, includes a description of the Iowa Curves and the formulation of the retirement rate method. Part III, Service Life Considerations, and Part IV, Calculation of Annual and Accrued Depreciation, include a description of the judgment utilized for life parameters and the explanation of depreciation procedures.

Part V, Results of Study, presents a description of the results and summaries of the depreciation calculations. Part VI, Service Life Statistics, presents the graphs and tables which relate to the service life study. Part VII, Detailed Depreciation Calculations, sets forth the detailed depreciation calculations by account.

Table 1, pages V-4 and V-5, presents the estimated survivor curve, the original cost as of December 31, 2021, and the book reserve and calculated annual depreciation for each account or subaccount of Electric Plant. Table 2, page V-6, presents the bringforward to December 31, 2021, of the book depreciation reserve as of December 31, 2020. Table 3 on page V-7 sets forth the calculation of the annual accruals used in the bringforward. Table 4, page V-8, presents the experienced and estimated net salvage by function during the five-y ear period, 2017 through 2021.

The section beginning on page VI-1 presents the results of the retirement rate analy ses prepared as the historical bases for the service life estimates. The section beginning on page VII-2 presents the depreciation calculations related to original cost. The tabulations on pages VII-7 through VII-91 present the calculation of annual depreciation by vintage by account for each dep reciable group of utility plant.

## Q. Please outline the contents of Exhibit JJS-3.

A. Exhibit JJS-3 includes a description of the results, summaries of the depreciation calculations, and the detailed depreciation calculations as of December 31, 2022. The descriptions and explanations presented in Exhibit JJS-2 are also applicable to the depreciation calculations presented in Exhibit JJS-3. The graphs and tables related to service life presented in Exhibit JJS-2 also support the service life estimates used in Exhibit JJS-3 inasmuch as the estimates are the same for both test years. The
summary tables and detailed depreciation calculations as of December 31, 2022, are organized and presented in the same manner as those as of December 31, 2021.

## Q. Please outline the contents of Exhibit JJS-1.

A. Exhibit JJS-1 includes a description of the results, summaries of the depreciation calculations, and the detailed depreciation calculations as of December 31, 2020. The descriptions and explanations presented in Exhibit JJS-2 are also applicable to the depreciation calculations presented in Exhibit JJS-1. The graphs and tables related to service life presented in Exhibit JJS-2 also support the service life estimates used in Exhibit JJS-1, inasmuch as the estimates are the same for both test years. The summary tables and detailed depreciation calculations as of December 31, 2020, are organized and presented in the same manner as those as of December 31, 2021.

## Q. Please use an example to illustrate the manner in which the study is presented in Exhibit JJS-2.

A. I will use Account 365.01, Overhead Conductors and Devices, as my example; inasmuch as it is one of the larger depreciable groups and represents 13 percent of the original cost of depreciable utility plant as of December 31, 2021.

The retirement rate method was used to analyze the survivor characteristics of this group. The life table for the 1964-2019 experience band is presented on pages VI-73
through VI-78 of Exhibit JJS-2. The life table, or original survivor curve, is plotted along with the estimated smooth survivor curve, the $50-\mathrm{R} 0.5$, on page VI-72.

The calculation as of December 31, 2021, is presented on pages VII-46 through VII-48 of Exhibit JJS-2 and is based in part on the bringforward of the book reserve. The tabulation in Exhibit JJS-2 sets forth the installation year, the original cost, calculated accrued depreciation, allocated book reserve, future accruals, remaining life and annual accrual. The totals are brought forward to the table on page V-4 in Exhibit JJS-2.
Q. Do you believe Exhibit JJS-2 reflects the appropriate survivor curves for Duquesne Light Company to be adopted in this proceeding?
A. Yes, I do. The methods and procedures utilized in the development of survivor curves are consistent with past practices for Duquesne Light Company and Pennsylvania ratemaking regulations. The service life study was completed as of December 31, 2019.
Q. Do you believe that the annual depreciation rates and the related depreciation expense claims should be adopted in this proceeding?
A. Yes, I do. The depreciation rates and expense claims are based on appropriate survivor curves and the depreciation procedures are the same as those approved in past filings before this Commission.
Q. In what manner is net salvage incorporated in the depreciation calculations?
A. As stated on page I-4 of Exhibit JJS-2, no adjustment for net salvage was made to the calculated annual depreciation amounts. The total calculated annual depreciation set forth on page I-4 of Exhibit JJS-1, page V-5 of Exhibit JJS-2 and on page I-4 of Exhibit JJS-3 should include an addition for the amortization of negative net salvage in accordance with the practice of this Commission. The amortization is based on experience during the period 2016 through 2020 for the calculation as of December 31, 2020, and on experience during the period 2017 through December 31, 2020, plus estimates for the twelve months of 2021 for the calculation as of December 31, 2021.

The amortization for the December 31, 2022 calculation is based on experience during the period 2018 through December 31, 2020, plus estimates for the period January 2021 through December 2022. The amounts of the five-year amortizations are calculated in Table 2 on page I-5 of Exhibit JJS-1, in Table 4 on page V-8 of Exhibit JJS-2 and in Table 4 on page I-7 of Exhibit JJS-3.

## Q. Does this complete your testimony at this time?

A. Yes, it does. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

Appendix A

## JOHN SPANOS

## DEPRECIATION EXPERIENCE

## Q. Please state your name.

A. My name is John J. Spanos.
Q. What is your educational background?
A. I have Bachelor of Science degrees in Industrial Management and Mathematics from Carnegie-Mellon University and a Master of Business Administration from York College.
Q. Do you belong to any professional societies?
A. Yes. I am a member and past President of the Society of Depreciation Professionals and a member of the American Gas Association/Edison Electric Institute Industry Accounting Committee.
Q. Do you hold any special certification as a depreciation expert?
A. Yes. The Society of Depreciation Professionals has established national standards for depreciation professionals. The Society administers an examination to become certified in this field. I passed the certification exam in September 1997 and was recertified in August 2003, February 2008, January 2013 and February 2018.

## Q. Please outline your experience in the field of depreciation.

A. In June 1986, I was employed by Gannett Fleming Valuation and Rate Consultants, Inc. as a Depreciation Analyst. During the period from June 1986 through December 1995, I helped prepare numerous depreciation and original cost studies for utility companies in various industries. I helped perform depreciation studies for the following telephone companies: United Telephone of Pennsylvania, United Telephone of New Jersey, and Anchorage Telephone Utility. I helped perform depreciation studies for the following
companies in the railroad industry: Union Pacific Railroad, Burlington Northern Railroad, and Wisconsin Central Transportation Corporation.

I helped perform depreciation studies for the following organizations in the electric utility industry: Chugach Electric Association, The Cincinnati Gas and Electric Company (CG\&E), The Union Light, Heat and Power Company (ULH\&P), Northwest Territories Power Corporation, and the City of Calgary - Electric System.

I helped perform depreciation studies for the following pipeline companies: TransCanada Pipelines Limited, Trans Mountain Pipe Line Company Ltd., Interprovincial Pipe Line Inc., Nova Gas Transmission Limited and Lakehead Pipeline Company.

I helped perform depreciation studies for the following gas utility companies: Columbia Gas of Pennsylvania, Columbia Gas of Maryland, The Peoples Natural Gas Company, T. W. Phillips Gas \& Oil Company, CG\&E, ULH\&P, Lawrenceburg Gas Company and Penn Fuel Gas, Inc.

I helped perform depreciation studies for the following water utility companies: Indiana-American Water Company, Consumers Pennsylvania Water Company and The York Water Company; and depreciation and original cost studies for Philadelphia Suburban Water Company and Pennsylvania-American Water Company.

In each of the above studies, I assembled and analyzed historical and simulated data, performed field reviews, developed preliminary estimates of service life and net salvage, calculated annual depreciation, and prepared reports for submission to state public utility commissions or federal regulatory agencies. I performed these studies under the general direction of William M. Stout, P.E.

In January 1996, I was assigned to the position of Supervisor of Depreciation Studies. In July 1999, I was promoted to the position of Manager, Depreciation and

Valuation Studies. In December 2000, I was promoted to the position as Vice-President of Gannett Fleming Valuation and Rate Consultants, Inc., in April 2012, I was promoted to the position as Senior Vice President of the Valuation and Rate Division of Gannett Fleming Inc. (now doing business as Gannett Fleming Valuation and Rate Consultants, LLC) and in January of 2019, I was promoted to my present position of President of Gannett Fleming Valuation and Rate Consultants, LLC. In my current position I am responsible for conducting all depreciation, valuation and original cost studies, including the preparation of final exhibits and responses to data requests for submission to the appropriate regulatory bodies.

Since January 1996, I have conducted depreciation studies similar to those previously listed including assignments for Pennsylvania-American Water Company; Aqua Pennsylvania; Kentucky-American Water Company; Virginia-American Water Company; Indiana-American Water Company; Iowa-American Water Company; New Jersey-American Water Company; Hampton Water Works Company; Omaha Public Power District; Enbridge Pipe Line Company; Inc.; Columbia Gas of Virginia, Inc.; Virginia Natural Gas Company National Fuel Gas Distribution Corporation - New York and Pennsylvania Divisions; The City of Bethlehem - Bureau of Water; The City of Coatesville Authority; The City of Lancaster - Bureau of Water; Peoples Energy Corporation; The York Water Company; Public Service Company of Colorado; Enbridge Pipelines; Enbridge Gas Distribution, Inc.; Reliant Energy-HLP; Massachusetts-American Water Company; St. Louis County Water Company; Missouri-American Water Company; Chugach Electric Association; Alliant Energy; Oklahoma Gas \& Electric Company; Nevada Power Company; Dominion Virginia Power; NUI-Virginia Gas Companies; Pacific Gas \& Electric Company; PSI Energy; NUI - Elizabethtown Gas Company; Cinergy Corporation - CG\&E; Cinergy Corporation - ULH\&P; Columbia Gas of Kentucky; South Carolina Electric \& Gas Company; Idaho Power Company; El Paso

Electric Company; Aqua North Carolina; Aqua Ohio; Aqua Texas, Inc.; Aqua Illinois, Inc.; Ameren Missouri; Central Hudson Gas \& Electric; Centennial Pipeline Company; CenterPoint Energy-Arkansas; CenterPoint Energy - Oklahoma; CenterPoint Energy Entex; CenterPoint Energy - Louisiana; NSTAR - Boston Edison Company; Westar Energy, Inc.; United Water Pennsylvania; PPL Electric Utilities; PPL Gas Utilities; Wisconsin Power \& Light Company; TransAlaska Pipeline; Avista Corporation; Northwest Natural Gas; Allegheny Energy Supply, Inc.; Public Service Company of North Carolina; South Jersey Gas Company; Duquesne Light Company; MidAmerican Energy Company; Laclede Gas; Duke Energy Company; E.ON U.S. Services Inc.; Elkton Gas Services; Anchorage Water and Wastewater Utility; Kansas City Power and Light; Duke Energy North Carolina; Duke Energy South Carolina; Monongahela Power Company; Potomac Edison Company; Duke Energy Ohio Gas; Duke Energy Kentucky; Duke Energy Indiana; Duke Energy Progress; Northern Indiana Public Service Company; TennesseeAmerican Water Company; Columbia Gas of Maryland; Maryland-American Water Company; Bonneville Power Administration; NSTAR Electric and Gas Company; EPCOR Distribution, Inc.; B. C. Gas Utility, Ltd; Entergy Arkansas; Entergy Texas; Entergy Mississippi; Entergy Louisiana; Entergy Gulf States Louisiana; the Borough of Hanover; Louisville Gas and Electric Company; Kentucky Utilities Company; Madison Gas and Electric; Central Maine Power; PEPCO; PacifiCorp; Minnesota Energy Resource Group; Jersey Central Power \& Light Company; Cheyenne Light, Fuel and Power Company; United Water Arkansas; Central Vermont Public Service Corporation; Green Mountain Power; Portland General Electric Company; Atlantic City Electric; Nicor Gas Company; Black Hills Power; Black Hills Colorado Gas; Black Hills Kansas Gas; Black Hills Service Company; Black Hills Utility Holdings; Public Service Company of Oklahoma; City of

Dubois; Peoples Gas Light and Coke Company; North Shore Gas Company; Connecticut Light and Power; New York State Electric and Gas Corporation; Rochester Gas and Electric Corporation; Greater Missouri Operations; Tennessee Valley Authority; Omaha Public Power District; Indianapolis Power \& Light Company; Vermont Gas Systems, Inc.; Metropolitan Edison; Pennsylvania Electric; West Penn Power; Pennsylvania Power; PHI Service Company - Delmarva Power and Light; Atmos Energy Corporation; Citizens Energy Group; PSE\&G Company; Berkshire Gas Company; Alabama Gas Corporation; Mid-Atlantic Interstate Transmission, LLC; SUEZ Water; WEC Energy Group; Rocky Mountain Natural Gas, LLC; Illinois-American Water Company; Northern Illinois Gas Company; Public Service of New Hampshire and Newtown Artesian Water Company.

My additional duties include determining final life and salvage estimates, conducting field reviews, presenting recommended depreciation rates to management for its consideration and supporting such rates before regulatory bodies.

## Q. Have you submitted testimony to any state utility commission on the subject of utility plant depreciation?

A. Yes. I have submitted testimony to the Pennsylvania Public Utility Commission; the Commonwealth of Kentucky Public Service Commission; the Public Utilities Commission of Ohio; the Nevada Public Utility Commission; the Public Utilities Board of New Jersey; the Missouri Public Service Commission; the Massachusetts Department of Telecommunications and Energy; the Alberta Energy \& Utility Board; the Idaho Public Utility Commission; the Louisiana Public Service Commission; the State Corporation Commission of Kansas; the Oklahoma Corporate Commission; the Public Service Commission of South Carolina; Railroad Commission of Texas - Gas Services Division; the New York Public Service Commission; Illinois Commerce Commission; the Indiana

Utility Regulatory Commission; the California Public Utilities Commission; the Federal Energy Regulatory Commission ("FERC"); the Arkansas Public Service Commission; the Public Utility Commission of Texas; Maryland Public Service Commission; Washington Utilities and Transportation Commission; The Tennessee Regulatory Commission; the Regulatory Commission of Alaska; Minnesota Public Utility Commission; Utah Public Service Commission; District of Columbia Public Service Commission; the Mississippi Public Service Commission; Delaware Public Service Commission; Virginia State Corporation Commission; Colorado Public Utility Commission; Oregon Public Utility Commission; South Dakota Public Utilities Commission; Wisconsin Public Service Commission; Wyoming Public Service Commission; the Public Service Commission of West Virginia; Maine Public Utility Commission; Iowa Utility Board; Connecticut Public Utilities Regulatory Authority; New Mexico Public Regulation Commission; Commonwealth of Massachusetts Department of Public Utilities; Rhode Island Public Utilities Commission and the North Carolina Utilities Commission.

## Q. Have you had any additional education relating to utility plant depreciation?

A. Yes. I have completed the following courses conducted by Depreciation Programs, Inc.: "Techniques of Life Analysis," "Techniques of Salvage and Depreciation Analysis," "Forecasting Life and Salvage," "Modeling and Life Analysis Using Simulation," and "Managing a Depreciation Study." I have also completed the "Introduction to Public Utility Accounting" program conducted by the American Gas Association.

## Q. Does this conclude your qualification statement?

A. Yes.

## LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY

|  | Year | Jurisdiction | Docket No. |
| :---: | :---: | :---: | :---: |
| 01. | 1998 | PA PUC | R-00984375 |
| 02. | 1998 | PA PUC | R-00984567 |
| 03. | 1999 | PA PUC | R-00994605 |
| 04. | 2000 | D.T.\&E. | DTE 00-105 |
| 05. | 2001 | PA PUC | R-00016114 |
| 06. | 2001 | PA PUC | R-00017236 |
| 07. | 2001 | PA PUC | R-00016339 |
| 08. | 2001 | OH PUC | 01-1228-GA-AIR |
| 09. | 2001 | KY PSC | 2001-092 |
| 10. | 2002 | PA PUC | R-00016750 |
| 11. | 2002 | KY PSC | 2002-00145 |
| 12. | 2002 | NJ BPU | GFO2040245 |
| 13. | 2002 | ID PUC | IPC-E-03-7 |
| 14. | 2003 | PA PUC | R-0027975 |
| 15. | 2003 | INURC | R-0027975 |
| 16. | 2003 | PA PUC | R-00038304 |
| 17. | 2003 | MO PSC | WR-2003-0500 |
| 18. | 2003 | FERC | ER03-1274-000 |
| 19. | 2003 | NJ BPU | BPU 03080683 |
| 20. | 2003 | NV PUC | 03-10001 |
| 21. | 2003 | LA PSC | U-27676 |
| 22. | 2003 | PA PUC | R-00038805 |
| 23. | 2004 | AB En/Util Bd | 1306821 |
| 24. | 2004 | PA PUC | R-00038168 |
| 25. | 2004 | PA PUC | R-00049255 |
| 26. | 2004 | PA PUC | R-00049165 |
| 27. | 2004 | OK Corp Cm | PUC 200400187 |
| 28. | 2004 | OH PUC | 04-680-EI-AIR |
| 29. | 2004 | RR Com of TX | GUD\# |
| 30. | 2004 | NY PUC | 04-G-1047 |
| 31. | 2004 | AR PSC | 04-121-U |
| 32. | 2005 | ILCC | 05-ICC-06 |
| 33. | 2005 | ILCC | 05-ICC-06 |
| 34. | 2005 | KY PSC | 2005-00042 |

City of Bethlehem - Bureau of Water
City of Lancaster
The York Water Company
Massachusetts-American Water Company
City of Lancaster
The York Water Company
Pennsylvania-American Water Company
Cinergy Corp - Cincinnati Gas \& Elect Company
Cinergy Corp - Union Light, Heat \& Power Co.
Philadelphia Suburban Water Company
Columbia Gas of Kentucky
NUI Corporation/Elizabethtown Gas Company Idaho Power Company
The York Water Company
Cinergy Corp - PSI Energy, Inc.
Pennsylvania-American Water Company
Missouri-American Water Company
NSTAR-Boston Edison Company
South Jersey Gas Company
Nevada Power Company
CenterPoint Energy-Arkla
Pennsylvania Suburban Water Company
EPCOR Distribution, Inc.
National Fuel Gas Distribution Corp (PA)
PPL Electric Utilities
The York Water Company
CenterPoint Energy-Arkla
Cinergy Corp. - Cincinnati Gas and
Electric Company
CenterPoint Energy-Entex Gas Services Div.
National Fuel Gas Distribution Gas (NY)
CenterPoint Energy- Arkla
North Shore Gas Company
Peoples Gas Light and Coke Company
Union Light Heat \& Power

## Subject

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LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. |
| :---: | :---: | :---: | :---: |
| 35. | 2005 | ILCC | 05-0308 |
| 36. | 2005 | MO PSC | GF-2005 |
| 37. | 2005 | KS CC | 05-WSEE-981-RTS |
| 38. | 2005 | RR Com of TX | GUD\# |
| 39. | 2005 | US District Court | Cause No. 1:99-CV-1693LJM/VSS |
| 40. | 2005 | OK CC | PUD 200500151 |
| 41. | 2005 | MA Dept Telecom \& Ergy | DTE 05-85 |
| 42. | 2005 | NY PUC | 05-E-934/05-G-0935 |
| 43. | 2005 | AK Reg Com | U-04-102 |
| 44. | 2005 | CA PUC | A05-12-002 |
| 45. | 2006 | PA PUC | R-00051030 |
| 46. | 2006 | PA PUC | R-00051178 |
| 47. | 2006 | NC Util Cm. | G-5, Sub522 |
| 48. | 2006 | PA PUC | R-00051167 |
| 49. | 2006 | PA PUC | R00061346 |
| 50. | 2006 | PA PUC | R-00061322 |
| 51. | 2006 | PA PUC | R-00051298 |
| 52. | 2006 | PUC of TX | 32093 |
| 53. | 2006 | KY PSC | 2006-00172 |
| 54. | 2006 | SC PSC |  |
| 55. | 2006 | AK Reg Com | U-06-6 |
| 56. | 2006 | DE PSC | 06-284 |
| 57. | 2006 | INURC | IURC43081 |
| 58. | 2006 | AK Reg Com | U-06-134 |
| 59. | 2006 | MO PSC | WR-2007-0216 |
| 60. | 2006 | FERC | ISO5-82-002, et al |
| 61. | 2006 | PA PUC | R-00061493 |
| 62. | 2007 | NC Util Com. | E-7 SUB 828 |
| 63. | 2007 | OH PSC | 08-709-EL-AIR |
| 64. | 2007 | PA PUC | R-00072155 |
| 65. | 2007 | KY PSC | 2007-00143 |

Client Utility
MidAmerican Energy Company Depreciation
Laclede Gas Company
Westar Energy
CenterPoint Energy-Entex Gas Services Div.
Cinergy Corporation

Oklahoma Gas and Electric Company NSTAR

Central Hudson Gas \& Electric Company
Chugach Electric Association
Pacific Gas \& Electric
Aqua Pennsylvania, Inc.
T.W. Phillips Gas and Oil Company

Pub. Service Company of North Carolina
City of Lancaster
Duquesne Light Company
The York Water Company
PPL GAS Utilities
CenterPoint Energy- Houston Electric
Duke Energy Kentucky SCANA
Municipal Light and Power
Delmarva Power and Light
Indiana American Water Company
Chugach Electric Association
Missouri American Water Company
TransAlaska Pipeline
National Fuel Gas Distribution Corp. (PA)
Duke Energy Carolinas, LLC
Duke Energy Ohio Gas
PPL Electric Utilities Corporation
Kentucky American Water Company

Subject

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LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. |
| :---: | :---: | :---: | :---: |
| 66. | 2007 | PA PUC | R-00072229 |
| 67. | 2007 | KY PSC | 2007-0008 |
| 68. | 2007 | NY PSC | 07-G-0141 |
| 69. | 2008 | AK PSC | U-08-004 |
| 70. | 2008 | TN Reg Auth | 08-00039 |
| 71. | 2008 | DE PSC | 08-96 |
| 72. | 2008 | PA PUC | R-2008-2023067 |
| 73. | 2008 | KS CC | 08-WSEE1-RTS |
| 74. | 2008 | INURC | 43526 |
| 75. | 2008 | INURC | 43501 |
| 76. | 2008 | MD PSC | 9159 |
| 77. | 2008 | KY PSC | 2008-000251 |
| 78. | 2008 | KY PSC | 2008-000252 |
| 79. | 2008 | PA PUC | 2008-20322689 |
| 80. | 2008 | NY PSC | 08-E887/08-00888 |
| 81. | 2008 | WV TC | VE-080416/VG-8080417 |
| 82. | 2008 | ILCC | ICC-09-166 |
| 83. | 2009 | ILCC | ICC-09-167 |
| 84. | 2009 | DCPSC | 1076 |
| 85. | 2009 | KY PSC | 2009-00141 |
| 86. | 2009 | FERC | ER08-1056-002 |
| 87. | 2009 | PA PUC | R-2009-2097323 |
| 88. | 2009 | NC Util Cm | E-7, Sub 090 |
| 89. | 2009 | KY PSC | 2009-00202 |
| 90. | 2009 | VA St. CC | PUE-2009-00059 |
| 91. | 2009 | PA PUC | 2009-2132019 |
| 92. | 2009 | MS PSC | Docket No. 2011-UA-183 |
| 93. | 2009 | AK PSC | 09-08-U |
| 94. | 2009 | TXPUC | 37744 |
| 95. | 2009 | TX PUC | 37690 |
| 96. | 2009 | PA PUC | R-2009-2106908 |
| 97. | 2009 | KS CC | 10-KCPE-415-RTS |
| 98. | 2009 | PA PUC | R-2009- |

Client Utility
Pennsylvania American Water Company
NiSource - Columbia Gas of Kentucky
National Fuel Gas Distribution Corp (NY)
Anchorage Water \& Wastewater Utility
Tennessee-American Water Company
Artesian Water Company
The York Water Company
Westar Energy
Northern Indiana Public Service Company
Duke Energy Indiana
NiSource - Columbia Gas of Maryland
Kentucky Utilities
Louisville Gas \& Electric
Pennsylvania American Water Co. - Wastewater Central Hudson
Avista Corporation
Peoples Gas, Light and Coke Company
North Shore Gas Company
Potomac Electric Power Company
NiSource - Columbia Gas of Kentucky
Entergy Services
Pennsylvania American Water Company
Duke Energy Carolinas, LLC
Duke Energy Kentucky
Aqua Virginia, Inc.
Aqua Pennsylvania, Inc.
Entergy Mississippi
Entergy Arkansas
EntergyTexas
El Paso Electric Company
The Borough of Hanover
Kansas City Power \& Light
United Water Pennsylvania

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LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. |
| :---: | :---: | :---: | :---: |
| 99. | 2009 | OH PUC |  |
| 100. | 2009 | WI PSC | 3270-DU-103 |
| 101. | 2009 | MO PSC | WR-2010 |
| 102. | 2009 | AK Reg Cm | U-09-097 |
| 103. | 2010 | INURC | 43969 |
| 104. | 2010 | WI PSC | 6690-DU-104 |
| 105. | 2010 | PA PUC | R-2010-2161694 |
| 106. | 2010 | KY PSC | 2010-00036 |
| 107. | 2010 | PA PUC | R-2009-2149262 |
| 108. | 2010 | MO PSC | GR-2010-0171 |
| 109. | 2010 | SC PSC | 2009-489-E |
| 110. | 2010 | NJ BD OF PU | ER09080664 |
| 111. | 2010 | VA St. CC | PUE-2010-00001 |
| 112. | 2010 | PA PUC | R-2010-2157140 |
| 113. | 2010 | MO PSC | ER-2010-0356 |
| 114. | 2010 | MO PSC | ER-2010-0355 |
| 115. | 2010 | PA PUC | R-2010-2167797 |
| 116. | 2010 | PSC SC | 2009-489-E |
| 117. | 2010 | PA PUC | R-2010-22010702 |
| 118. | 2010 | AK PSC | 10-067-U |
| 119. | 2010 | INURC | Cause No. 43894 |
| 120. | 2010 | INURC | Cause No. 43894 |
| 121. | 2010 | PA PUC | R-2010-2166212 |
| 122. | 2010 | NC Util Cn. | W-218,SUB310 |
| 123. | 2011 | OH PUC | 11-4161-WS-AIR |
| 124. | 2011 | MS PSC | EC-123-0082-00 |
| 125. | 2011 | CO PUC | 11AL-387E |
| 126. | 2011 | PA PUC | R-2010-2215623 |
| 127. | 2011 | PA PUC | R-2010-2179103 |
| 128. | 2011 | INURC | 43114 IGCC 4S |
| 129. | 2011 | FERC | IS11-146-000 |
| 130. | 2011 | ILCC | 11-0217 |
| 131. | 2011 | OKCC | 201100087 |
| 132. | 2011 | PA PUC | 2011-2232243 |

Client Utility
Aqua Ohio Water Company
Madison Gas \& Electric Company
Missouri American Water Company
Chugach Electric Association
Northern Indiana Public Service Company
Wisconsin Public Service Corp.
PPL Electric Utilities Corp.
Kentucky American Water Company
Columbia Gas of Pennsylvania
Laclede Gas Company
South Carolina Electric \& Gas Company
Atlantic City Electric
Virginia American Water Company
The York Water Company
Greater Missouri Operations Company
Kansas City Power and Light
T.W. Phillips Gas and Oil Company

SCANA - Electric
Peoples Natural Gas, LLC
Oklahoma Gas and Electric Company
Northern Indiana Public Serv. Company - NIFL
Northern Indiana Public Serv. Co. - Kokomo
Pennsylvania American Water Co. - WW
Aqua North Carolina, Inc.
Ohio American Water Company
Entergy Mississippi
Black Hills Colorado
Columbia Gas of Pennsylvania
City of Lancaster - Bureau of Water
Duke Energy Indiana
Enbridge Pipelines (Southern Lights)
MidAmerican Energy Corporation
Oklahoma Gas \& Electric Company
Pennsylvania American Water Company

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LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. | Client Utility | Subject |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 133. | 2011 | FERC | RP11-__-000 | Carolina Gas Transmission | Depreciation |
| 134. | 2012 | WA UTC | UE-120436/UG-120437 | Avista Corporation | Depreciation |
| 135. | 2012 | AK Reg Cm | U-12-009 | Chugach Electric Association | Depreciation |
| 136. | 2012 | MA PUC | DPU 12-25 | Columbia Gas of Massachusetts | Depreciation |
| 137. | 2012 | TXPUC | 40094 | El Paso Electric Company | Depreciation |
| 138. | 2012 | ID PUC | IPC-E-12 | Idaho Power Company | Depreciation |
| 139. | 2012 | PA PUC | R-2012-2290597 | PPL Electric Utilities | Depreciation |
| 140. | 2012 | PA PUC | R-2012-2311725 | Borough of Hanover - Bureau of Water | Depreciation |
| 141. | 2012 | KY PSC | 2012-00222 | Louisville Gas and Electric Company | Depreciation |
| 142. | 2012 | KY PSC | 2012-00221 | Kentucky Utilities Company | Depreciation |
| 143. | 2012 | PA PUC | R-2012-2285985 | Peoples Natural Gas Company | Depreciation |
| 144. | 2012 | DCPSC | Case 1087 | Potomac Electric Power Company | Depreciation |
| 145. | 2012 | OH PSC | 12-1682-EL-AIR | Duke Energy Ohio (Electric) | Depreciation |
| 146. | 2012 | OH PSC | 12-1685-GA-AIR | Duke Energy Ohio (Gas) | Depreciation |
| 147. | 2012 | PA PUC | R-2012-2310366 | City of Lancaster - Sewer Fund | Depreciation |
| 148. | 2012 | PA PUC | R-2012-2321748 | Columbia Gas of Pennsylvania | Depreciation |
| 149. | 2012 | FERC | ER-12-2681-000 | ITC Holdings | Depreciation |
| 150. | 2012 | MO PSC | ER-2012-0174 | Kansas City Power and Light | Depreciation |
| 151. | 2012 | MO PSC | ER-2012-0175 | KCPL Greater Missouri Operations Company | Depreciation |
| 152. | 2012 | MO PSC | GO-2012-0363 | Laclede Gas Company | Depreciation |
| 153. | 2012 | MN PUC | G007,001/D-12-533 | Integrys - MN Energy Resource Group | Depreciation |
| 154. | 2012 | TX PUC | SOAH 582-14-1051/ <br> TECQ 2013-2007-UCR | Aqua Texas | Depreciation |
| 155. | 2012 | PA PUC | 2012-2336379 | York Water Company | Depreciation |
| 156. | 2013 | NJ BPU | ER12121071 | PHI Service Company- Atlantic City Electric | Depreciation |
| 157. | 2013 | KY PSC | 2013-00167 | Columbia Gas of Kentucky | Depreciation |
| 158. | 2013 | VA St CC | 2013-00020 | Virginia Electric and Power Company | Depreciation |
| 159. | 2013 | IA Util Bd | 2013-0004 | MidAmerican Energy Corporation | Depreciation |
| 160. | 2013 | PA PUC | 2013-2355276 | Pennsylvania American Water Company | Depreciation |
| 161. | 2013 | NY PSC | $\begin{aligned} & \text { 13-E-0030, 13-G-0031, } \\ & 13-\mathrm{S}-0032 \end{aligned}$ | Consolidated Edison of New York | Depreciation |
| 162. | 2013 | PA PUC | 2013-2355886 | Peoples TWP LLC | Depreciation |
| 163. | 2013 | TN Reg Auth | 12-0504 | Tennessee American Water | Depreciation |
| 164. | 2013 | ME PUC | 2013-168 | Central Maine Power Company | Depreciation |
| 165. | 2013 | DCPSC | Case 1103 | PHI Service Company - PEPCO | Depreciation |

LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. |
| :---: | :---: | :---: | :---: |
| 166. | 2013 | WY PSC | 2003-ER-13 |
| 167. | 2013 | FERC | ER13-2428-0000 |
| 168. | 2013 | FERC | ER13- -0000 |
| 169. | 2013 | FERC | ER13-2410-0000 |
| 170. | 2013 | PA PUC | R-2013-2372129 |
| 171. | 2013 | NJ BPU | ER12111052 |
| 172. | 2013 | PA PUC | R-2013-2390244 |
| 173. | 2013 | OK CC | UM 1679 |
| 174. | 2013 | ILCC | 13-0500 |
| 175. | 2013 | WY PSC | 20000-427-EA-13 |
| 176. | 2013 | UT PSC | 13-035-02 |
| 177. | 2013 | OR PUC | UM 1647 |
| 178. | 2013 | PA PUC | 2013-2350509 |
| 179. | 2014 | ILCC | 14-0224 |
| 180. | 2014 | FERC | ER14- -0000 |
| 181. | 2014 | SD PUC | EL14-026 |
| 182. | 2014 | WY PSC | 20002-91-ER-14 |
| 183. | 2014 | PA PUC | 2014-2428304 |
| 184. | 2014 | PA PUC | 2014-2406274 |
| 185. | 2014 | ILCC | 14-0225 |
| 186. | 2014 | MO PSC | ER-2014-0258 |
| 187. | 2014 | KS CC | 14-BHCG-502-RTS |
| 188. | 2014 | KS CC | 14-BHCG-502-RTS |
| 189. | 2014 | KS CC | 14-BHCG-502-RTS |
| 190. | 2014 | PA PUC | 2014-2418872 |
| 191. | 2014 | WV PSC | 14-0701-E-D |
| 192 | 2014 | VA St CC | PUC-2014-00045 |
| 193. | 2014 | VA St CC | PUE-2013 |
| 194. | 2014 | OK CC | PUD201400229 |
| 195. | 2014 | OR PUC | UM1679 |
| 196. | 2014 | INURC | Cause No. 44576 |
| 197. | 2014 | MA DPU | DPU. 14-150 |
| 198. | 2014 | CT PURA | 14-05-06 |
| 199. | 2014 | MO PSC | ER-2014-0370 |

## Client Utility

Cheyenne Light, Fuel and Power Company Kentucky Utilities
MidAmerican Energy Company
PPL Utilities
Duquesne Light Company
Jersey Central Power and Light Company
Bethlehem, City of - Bureau of Water
Oklahoma, Public Service Company of
Nicor Gas Company
PacifiCorp
Pacificorp
PacifiCorp
Dubois, City of
North Shore Gas Company
Duquesne Light Company
Black Hills Power Company
Black Hills Power Company
Borough of Hanover - Municipal Water Works
Columbia Gas of Pennsylvania
Peoples Gas Light and Coke Company
Ameren Missouri
Black Hills Service Company
Black Hills Utility Holdings
Black Hills Kansas Gas
Lancaster, City of - Bureau of Water
First Energy - MonPower/PotomacEdison
Aqua Virginia
Virginia American Water Company
Oklahoma Gas and Electric Company
Portland General Electric
Indianapolis Power \& Light
NSTAR Gas
Connecticut Light and Power
Kansas City Power \& Light

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|  | Year | Jurisdiction | Docket No. | Client Utility | Subject |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 200. | 2014 | KY PSC | 2014-00371 | Kentucky Utilities Company | Depreciation |
| 201. | 2014 | KY PSC | 2014-00372 | Louisville Gas and Electric Company | Depreciation |
| 202. | 2015 | PA PUC | R-2015-2462723 | United Water Pennsylvania Inc. | Depreciation |
| 203. | 2015 | PA PUC | R-2015-2468056 | NiSource - Columbia Gas of Pennsylvania | Depreciation |
| 204. | 2015 | NY PSC | 15-E-0283/15-G-0284 | New York State Electric and Gas Corporation | Depreciation |
| 205. | 2015 | NY PSC | 15-E-0285/15-G-0286 | Rochester Gas and Electric Corporation | Depreciation |
| 206. | 2015 | MO PSC | WR-2015-0301/SR-2015-0302 | Missouri American Water Company | Depreciation |
| 207. | 2015 | OK CC | PUD 201500208 | Oklahoma, Public Service Company of | Depreciation |
| 208. | 2015 | WV PSC | 15-0676-W-42T | West Virginia American Water Company | Depreciation |
| 209. | 2015 | PA PUC | 2015-2469275 | PPL Electric Utilities | Depreciation |
| 210. | 2015 | INURC | Cause No. 44688 | Northern Indiana Public Service Company | Depreciation |
| 211. | 2015 | OH PSC | 14-1929-EL-RDR | First Energy-Ohio Edison/Cleveland Electric/ Toledo Edison | Depreciation |
| 212. | 2015 | NM PRC | 15-00127-UT | El Paso Electric | Depreciation |
| 213. | 2015 | TX PUC | PUC-44941; SOAH 473-15-5257 | El Paso Electric | Depreciation |
| 214. | 2015 | WI PSC | 3270-DU-104 | Madison Gas and Electric Company | Depreciation |
| 215. | 2015 | OK CC | PUD 201500273 | Oklahoma Gas and Electric | Depreciation |
| 216. | 2015 | KY PSC | Doc. No. 2015-00418 | Kentucky American Water Company | Depreciation |
| 217. | 2015 | NCUC | Doc. No. G-5, Sub 565 | Public Service Company of North Carolina | Depreciation |
| 218. | 2016 | WA UTC | Docket UE-17 | Puget Sound Energy | Depreciation |
| 219. | 2016 | NY PSC | Case No. 16-W-0130 | SUEZ Water New York, Inc. | Depreciation |
| 220. | 2016 | MO PSC | ER-2016-0156 | KCPL - Greater Missouri | Depreciation |
| 221. | 2016 | WI PSC |  | Wisconsin Public Service Corporation | Depreciation |
| 222. | 2016 | KY PSC | Case No. 2016-00026 | Kentucky Utilities Company | Depreciation |
| 223. | 2016 | KY PSC | Case No. 2016-00027 | Louisville Gas and Electric Company | Depreciation |
| 224. | 2016 | OH PUC | Case No. 16-0907-WW-AIR | Aqua Ohio | Depreciation |
| 225. | 2016 | MDPSC | Case 9417 | NiSource - Columbia Gas of Maryland | Depreciation |
| 226. | 2016 | KY PSC | 2016-00162 | Columbia Gas of Kentucky | Depreciation |
| 227. | 2016 | DE PSC | 16-0649 | Delmarva Power and Light Company - Electric | Depreciation |
| 228. | 2016 | DEPSC | 16-0650 | Delmarva Power and Light Company - Gas | Depreciation |
| 229. | 2016 | NY PSC | Case 16-G-0257 | National Fuel Gas Distribution Corp - NY Div | Depreciation |
| 230. | 2016 | PA PUC | R-2016-2537349 | Metropolitan Edison Company | Depreciation |
| 231. | 2016 | PA PUC | R-2016-2537352 | Pennsylvania Electric Company | Depreciation |
| 232. | 2016 | PA PUC | R-2016-2537355 | Pennsylvania Power Company | Depreciation |

LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. | Client Utility | Subject |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 233. | 2016 | PA PUC | R-2016-2537359 | West Penn Power Company | Depreciation |
| 234. | 2016 | PA PUC | R-2016-2529660 | NiSource - Columbia Gas of PA | Depreciation |
| 235. | 2016 | KY PSC | Case No. 2016-00063 | Kentucky Utilities / Louisville Gas \& Electric Co | Depreciation |
| 236. | 2016 | MO PSC | ER-2016-0285 | KCPL Missouri | Depreciation |
| 237. | 2016 | AR PSC | 16-052-U | Oklahoma Gas \& Electric Co | Depreciation |
| 238. | 2016 | PSCW | 6680-DU-104 | Wisconsin Power and Light | Depreciation |
| 239. | 2016 | IDPUC | IPC-E-16-23 | Idaho Power Company | Depreciation |
| 240. | 2016 | OR PUC | UM1801 | Idaho Power Company | Depreciation |
| 241. | 2016 | ILLCC | 16- | MidAmerican Energy Company | Depreciation |
| 242. | 2016 | KY PSC | Case No. 2016-00370 | Kentucky Utilities Company | Depreciation |
| 243. | 2016 | KY PSC | Case No. 2016-00371 | Louisville Gas and Electric Company | Depreciation |
| 244. | 2016 | INURC | Cause No. 45029 | Indianapolis Power \& Light | Depreciation |
| 245. | 2016 | AL RC | U-16-081 | Chugach Electric Association | Depreciation |
| 246. | 2017 | MA DPU | D.P.U. 17-05 | NSTAR Electric Company and Western Massachusetts Electric Company | Depreciation |
| 247. | 2017 | TX PUC | PUC-26831, SOAH 973-17-2686 | El Paso Electric Company | Depreciation |
| 248. | 2017 | WA UTC | UE-17033 and UG-170034 | Puget Sound Energy | Depreciation |
| 249. | 2017 | OH PUC | Case No. 17-0032-EL-AIR | Duke Energy Ohio | Depreciation |
| 250. | 2017 | VA SCC | Case No. PUE-2016-00413 | Virginia Natural Gas, Inc. | Depreciation |
| 251. | 2017 | OK CC | Case No. PUD201700151 | Public Service Company of Oklahoma | Depreciation |
| 252. | 2017 | MD PSC | Case No. 9447 | Columbia Gas of Maryland | Depreciation |
| 253. | 2017 | NCUC | Docket No. E-2, Sub 1142 | Duke Energy Progress | Depreciation |
| 254. | 2017 | VA SCC | Case No. PUR-2017-00090 | Dominion Virginia Electric and Power Company | Depreciation |
| 255. | 2017 | FERC | ER17-1162 | MidAmerican Energy Company | Depreciation |
| 256. | 2017 | PA PUC | R-2017-2595853 | Pennsylvania American Water Company | Depreciation |
| 257. | 2017 | OR PUC | UM1809 | Portland General Electric | Depreciation |
| 258. | 2017 | FERC | ER17-217-000 | Jersey Central Power \& Light | Depreciation |
| 259. | 2017 | FERC | ER17-211-000 | Mid-Atlantic Interstate Transmission, LLC | Depreciation |
| 260. | 2017 | MN PUC | Docket No. G007/D-17-442 | Minnesota Energy Resources Corporation | Depreciation |
| 261. | 2017 | ILCC | Docket No. 17-0124 | Northern Illinois Gas Company | Depreciation |
| 262. | 2017 | OR PUC | UM1808 | Northwest Natural Gas Company | Depreciation |
| 263. | 2017 | NY PSC | Case No. 17-W-0528 | SUEZ Water Owego-Nichols | Depreciation |
| 264. | 2017 | MO PSC | GR-2017-0215 | Laclede Gas Company | Depreciation |
| 265. | 2017 | MO PSC | GR-2017-0216 | Missouri Gas Energy | Depreciation |

## LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. | Client Utility | Subject |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 266. | 2017 | ILLCC | Docket No. 17-0337 | Illinois-American Water Company | Depreciation |
| 267. | 2017 | FERC | Docket No. ER18-22-000 | PPL Electric Utilities Corporation | Depreciation |
| 268. | 2017 | IN URC | Cause No. 44988 | Northern Indiana Public Service Company | Depreciation |
| 269. | 2017 | NJ BPU | BPU Docket No. WR17090985 | New Jersey American Water Company, Inc. | Depreciation |
| 270. | 2017 | RIPUC | Docket No. 4800 | SUEZ Water Rhode Island | Depreciation |
| 271. | 2017 | OKCC | Cause No. PUD 201700496 | Oklahoma Gas and Electric Company | Depreciation |
| 272. | 2017 | NJ BPU | ER18010029 \& GR18010030 | Public Service Electric and Gas Company | Depreciation |
| 273. | 2017 | NC Util Com. | Docket No. E-7, SUB 1146 | Duke Energy Carolinas, LLC | Depreciation |
| 274. | 2017 | KY PSC | Case No. 2017-00321 | Duke Energy Kentucky, Inc. | Depreciation |
| 275. | 2017 | MA DPU | D.P.U. 18-40 | Berkshire Gas Company | Depreciation |
| 276. | 2018 | INIURC | Cause No. 44992 | Indiana-American Water Company, Inc. | Depreciation |
| 277. | 2018 | INIURC | Cause No. 45029 | Indianapolis Power and Light | Depreciation |
| 278. | 2018 | NC Util Com. | Docket No. W-218, Sub 497 | Aqua North Carolina, Inc. | Depreciation |
| 279. | 2018 | PA PUC | Docket No. R-2018-2647577 | NiSource - Columbia Gas of Pennsylvania, Inc. | Depreciation |
| 280. | 2018 | OR PUC | Docket UM 1933 | Avista Corporation | Depreciation |
| 281. | 2018 | WA UTC | Docket No. UE-108167 | Avista Corporation | Depreciation |
| 282. | 2018 | ID PUC | AVU-E-18-03, AVU-G-18-02 | Avista Corporation | Depreciation |
| 283. | 2018 | INURC | Cause No. 45039 | Citizens Energy Group | Depreciation |
| 284. | 2018 | FERC | Docket No. ER18- | Duke Energy Progress | Depreciation |
| 285. | 2018 | PA PUC | Docket No. R-2018-3000124 | Duquesne Light Company | Depreciation |
| 286. | 2018 | MD PSC | Case No. 948 | NiSource - Columbia Gas of Maryland | Depreciation |
| 287. | 2018 | MA DPU | D.P.U. 18-45 | NiSource - Columbia Gas of Massachusetts | Depreciation |
| 288. | 2018 | OH PUC | Case No. 18-0299-GA-ALT | Vectren Energy Delivery of Ohio | Depreciation |
| 289. | 2018 | PA PUC | Docket No. R-2018-3000834 | SUEZ Water Pennsylvania Inc. | Depreciation |
| 290. | 2018 | MD PSC | Case No. 9847 | Maryland-American Water Company | Depreciation |
| 291. | 2018 | PA PUC | Docket No. R-2018-3000019 | The York Water Company | Depreciation |
| 292. | 2018 | FERC | ER-18-2231-000 | Duke Energy Carolinas, LLC | Depreciation |
| 293. | 2018 | KY PSC | Case No. 2018-00261 | Duke Energy Kentucky, Inc. | Depreciation |
| 294. | 2018 | NJ BPU | BPU Docket No. WR18050593 | SUEZ Water New Jersey | Depreciation |
| 295. | 2018 | WA UTC | Docket No. UE-180778 | PacifiCorp | Depreciation |
| 296. | 2018 | UT PSC | Docket No. 18-035-36 | PacifiCorp | Depreciation |
| 297. | 2018 | OR PUC | Docket No. UM-1968 | PacifiCorp | Depreciation |
| 298. | 2018 | ID PUC | Case No. PAC-E-18-08 | PacifiCorp | Depreciation |
| 299. | 2018 | WY PSC | 20000-539-EA-18 | PacifiCorp | Depreciation |
| 300. | 2018 | PA PUC | Docket No. R-2018-3003068 | Aqua Pennsylvania, Inc. | Depreciation |

LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

\left.|  | Year |  | Jurisdiction |  |
| :--- | :--- | :--- | :--- | :--- |
| 301. | 2018 |  | ILCC |  |
| Docket No. |  |  |  |  |
| Docket No. 18-1467 |  |  |  |  |$\right]$

## Client Utility

Aqua Illinois, Inc.
Louisville Gas \& Electric Company
Kentucky Utilities Company
Northern Indiana Public Service Company
Virginia American Water Company
Peoples Natural Gas Company, LLC
Oklahoma Gas and Electric Company
FirstEnergy - Potomac Edison
Duke Energy Progress
Duke Energy Carolinas
Public Service of New Hampshire
SUEZ Water New York
Newtown Artesian Water Company
Ameren Missouri
KCP\&L Greater Missouri Operations Company
Minnesota Energy Resource Corp.
New York State Electric and Gas Corporation Rochester Gas and Electric Corporation
Puget Sound Energy
City of Lancaster
Duke Energy Indiana
Duke Energy Kentucky, Inc.
Northeast Ohio Natural Gas Corp
Duke Energy Carolinas
Jersey Central Power \& Light Company
NSTAR Gas Company
Blue Granite Water Company
Duke Energy Progress
NiSource Columbia Gas of Maryland, Inc.
Jersey Central Power \& Light Company
NiSource - Columbia Gas of Pennsylvania, Inc.
Pennsylvania-American Water Company
Pennsylvania-American Water Company
Spire Missouri, Inc.
El Paso Electric Company
Columbia Gas of Maryland, Inc.
Spire Missouri, Inc.
Virginia Natural Gas Company

## Subject

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LIST OF CASES IN WHICH JOHN J. SPANOS SUBMITTED TESTIMONY, cont.

|  | Year | Jurisdiction | Docket No. | Client Utility | Subject |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 339. | 2020 | SC PSC | Docket No. 2020-125-E | Dominion Energy South Carolina, Inc. | Depreciation |
| 340. | 2020 | WV PSC | Case No. 20-0745-G-D | Hope Gas, Inc. d/b/a Dominion Energy West Virginia | Depreciation |
| 341. | 2020 | VA St CC | Case No. PUR-2020-00106 | Aqua Virginia, Inc. | Depreciation |
| 342. | 2020 | PA PUC | Docket No. R-2020-3020256 | City of Bethlehem - Bureau of Water | Depreciation |
| 343. | 2020 | NE PSC | Docket No. NG-109 | Black Hills Nebraska | Depreciation |
| 344. | 2020 | NY PSC | Case No. 20-E-0428 \& 20-G-0429 | Central Hudson Gas \& Electric Corporation | Depreciation |
| 345. | 2020 | FERC | ER20-598 | Duke Energy Indiana | Depreciation |
| 346. | 2020 | FERC | ER20-855 | Northern Indiana Public Service Company | Depreciation |
| 347. | 2020 | OR PSC | UE 374 | Pacificorp | Depreciation |
| 348. | 2020 | MD PSC | Case No. 9490 Phase II | Potomac Edison - Maryland | Depreciation |
| 349. | 2020 | INURC | Case No. 45447 | Southern Indiana Gas and Electric Company | Depreciation |
| 350. | 2020 | INURC | IURCCause No. 45468 | Indiana Gas Company, Inc. d/b/a Vectren Energy | Depreciation |
| 351. | 2020 | KY PSC | Case No. 2020-00349 | Kentucky Utilities Company | Depreciation |
| 352. | 2020 | KY PSC | Case No. 2020-00350 | Louisville Gas and Electric Company | Depreciation |
| 353. | 2020 | FERC | Docket No. ER21-000 | South FirstEnergy Operating Companies | Depreciation |
| 354. | 2020 | OH PUC | Case Nos 20-1651-EL-AIR, 20-1652-EL-AAM \& 20-1653-EL-ATA | Dayton Power and Light Company | Depreciation |
| 355. | 2020 | OR PSC | UE 388 | Northwest Natural Gas Company | Depreciation |
| 356. | 2021 | KY PSC | Case No. 2021-00103 | East Kentucky Power Cooperative | Depreciation |
| 357. | 2021 | MPUC | Docket No. 2021-00024 | Bangor Natural Gas | Depreciation |
| 358. | 2021 | PA PUC | Docket No. R-2021-3024296 | Columbia Gas of Pennsylvania, Inc. | Depreciation |
| 359. | 2021 | NC Util. Com. | Doc. No. G-5, Sub 632 | Public Service of North Carolina | Depreciation |
| 360. | 2021 | MO PSC | ER-2021-0240 | Ameren Missouri | Depreciation |

# BEFORE THE 

PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

## Duquesne Light Company

Statement No. 12

Direct Testimony of Matthew L. Simpson
Subject: Taxes

Dated: April 16, 2021

## I. INTRODUCTION AND QUALIFICIATIONS

Q. Please state your full name, business affiliation and business address.
A. My name is Matthew L. Simpson. I am the Director, Tax at Duquesne Light Company ("Duquesne Light" or "Company"). The Company's business address is 411 Seventh Avenue, Pittsburgh PA 15219.
Q. How long have you worked at Duquesne Light?
A. I have been with Duquesne Light since May 2011.

## Q. What are your current responsibilities?

A. In general, I oversee and manage the overall tax function for DQE Holdings, LLC ("DQE") and its subsidiaries, including Duquesne Light Holdings, Inc. ("DLH") and its wholly owned subsidiary, Duquesne Light. I am responsible for ensuring the accuracy and completeness of the Company's income tax provision for its financial statements and regulatory filings. I am also responsible for all tax compliance filings with the various taxing authorities as well as managing audit examinations.
Q. What are your qualifications, work experience and educational background?
A. I am a Certified Public Accountant and an active member of both the American Institute of Certified Public Accountants and Pennsylvania Institute of Certified

Public Accountants. Prior to joining Duquesne Light, I held the position of Tax Director at a large multi-national construction company headquartered in Pittsburgh, PA. Before joining private industry, I held various positions in public accounting firms where I managed compliance and advisory services for clients in various industries, including the energy, construction and manufacturing sectors. I hold a Bachelor of Science Degree in Accounting from Penn State University as well as a Master of Science Degree in Taxation that I received from Robert Morris University in Pittsburgh.
Q. Have you pre viously testified before this or any other regulatory age ncy?
A. Yes. I provided written testimony to the Pennsylvania Public Utility Commission for Duquesne Light Company's 2013 and 2018 distribution rate filings, Docket Nos. R-2013-2372129 and R-2018-3000124. I have also provided written testimony to the Federal Energy Regulatory Commission, Docket No. ER13-1220000 and Docket No. ER21-1012-000, related to a Monthly Deferred Tax Adjustment charge.
Q. What is the purpose of your direct testimony?
A. The purpose of my testimony is to describe and explain Duquesne Light's income tax expense and other tax expense included in the cost of service.
Q. Are you sponsoring any exhibits as part of your direct testimony?
A. Yes, I am. I am co-sponsoring Duquesne Light's Income Statement as it relates to taxes and the Balance Sheet as it relates to deferred and prepaid taxes. The specific schedule references are DLC Exhibit 2 (FPFTY), Exhibit 3 (FTY) and Exhibit 4 (HTY), Schedules B-1, B-2, B-5, C-6, D-20 and D-22. I am sponsoring all the Data Filing Requirements and Schedules concerning Taxes. Please see Exhibit MLS-1 to my testimony for the listing of data filing requirements that I am sponsoring. My name is at the top of each data filing requirement that I sponsor.

## Q. Please explain how these exhibits were prepared?

A. All were prepared either by me or under my direction or supervision. They were prepared in accordance with Commission requirements and Internal Revenue Service procedures and guidance.
Q. Does your testimony address the impact of the Tax Cuts and Jobs Act of 2017 ("TCJA")?
A. Yes. Among other things, the TCJA lowered the corporate income tax rate from $35 \%$ to $21 \%$, eliminated bonus depreciation for regulated utilities, and provided for the continuation of rate normalization requirements for accelerated depreciation benefits. The Company initially addressed the impacts of the TCJA in its prior base distribution rate case, Docket No. R-2018-3000124. That proceeding resolved distribution rate issues associated with transitioning to the new TCJA framework. I will address the post-transition impacts of the TCJA on the Company's income tax expense and related calculations throughout my testimony.

## II. TAX CALCULATIONS

## A. INCOME TAXES

## Q. Please discuss the Company's claim for income taxes.

A. Income taxes are calculated using the procedures normally followed by the Commission, including the use of debt interest synchronization, the flow through of accelerated tax depreciation and other accelerated tax deductions when computing current state income taxes, and the normalization method for accelerated depreciation used in the calculation of Federal income taxes.

## Q. Could you explain Duquesne Light's income tax expense for the HTY?

A. For the HTY the Company has used its December 31, 2020 financial statement information to calculate its current and deferred income tax expense. The tax expense calculations were made in accordance with federal and state laws, using a federal income tax rate of $21 \%$ and a Pennsylvania income tax rate of $9.99 \%$.

## Q. Could you explain the Company's income tax expense calculation for the FPFTY and FTY?

A. The calculation of federal and state income tax expense is reflected on Schedule D22 within DLC Exhibit 2 (FPFTY) and DLC Exhibit 3 (FTY). These calculations begin with revenue at present and pro forma rates, reduced by operating expenses at present and pro forma rates and further reduced by synchronized interest expense to arrive at base taxable income on line 7. The synchronized interest expense
deduction is calculated by multiplying the average debt cost times the debt ratio times the rate base to synchronize the interest deduction to the portion of the rate base financed by debt. State tax deductions related to property are made to arrive at state taxable income on line 16. The statutory state corporate net income tax rate ( $9.99 \%$ ) was then applied to compute the pro forma state income tax expense shown on line 17. To compute current federal income tax expense, the base taxable income on line 7 was reduced by the calculated current state income tax expense on line 17 and by the federal tax deductions related to property shown on lines 18 through 25 to arrive at the federal taxable income shown on line 26 . The Company applied the current federal statutory corporate tax rate of $21 \%$ to compute the pro forma current federal income tax expense shown on line 27. Federal deferred income taxes on lines 31 and 32 were also computed at the current federal statutory corporate tax rate of $21 \%$. In addition, the deferred income tax expense calculation was reduced to reflect the flow back of excess deferred income taxes (EDIT) due to the reduction in the federal corporate income tax rate from $35 \%$ to $21 \%$ as per the TCJA. No state deferred income taxes have been reflected as the tax benefits of accelerated deductions are flowed-through to customers.

## Q. Please describe the Company's use of accelerated tax depreciation methods in computing its federal tax depreciation?

A. The Company uses accelerated depreciation. From 1971 to 1980 the Company elected to calculate tax depreciation under the provisions of the Class Life Asset Depreciation Range ("ADR") as provided by the Revenue Act of 1971. From 1981
to 1986 the Company elected to calculate tax depreciation under the Accelerated Cost Recovery System ("ACRS") as provided by the Economic Recovery Tax Act of 1981. From 1987 to the present the Company has elected to calculate tax depreciation under the provisions of the Modified Accelerated Cost Recovery System ("MACRS") as originally provided by the Tax Reform Act of 1986 and as modified in subsequent Acts. Prior to 2018, the tax law allowed for additional bonus depreciation deductions. However, with the enactment of the TCJA, regulated utilities are no longer permitted to take bonus depreciation in computing their annual accelerated tax depreciation deductions.

## Q. Please comment on the deferred income taxes of accelerated depreciation presented in your tax expense.

A. In this rate case, Duquesne Light is reflecting deferred income taxes resulting from the adherence to IRS normalization rules and use of accelerated federal tax depreciation associated with Post -1969 Public Utility Property under the following depreciation methods: General Depreciation Rules (pre-1971), Class Life ADR (1971-1980), ACRS (1981-1986), MACRS (1987-Present).

Duquesne Light's continued entitlement to the use of accelerated depreciation provision on Post-1969 Public Utility Property for federal income tax purposes is dependent upon the use of a normalization method of accounting for the resulting deferred income tax activity in determining cost of service (and total accumulated deferred tax balance used in rate base) for rate making.

The Company computes the deferred income taxes used in the cost of service calculation based on the applicable Internal Revenue Service ("IRS") normalization regulations which are primarily based on the original in-service date of the underlying asset. Duquesne Light follows guidance within former IRC Section 167(1) and IRC Section 168(i)(9) in which depreciation timing differences of federal accelerated tax depreciation in excess of the straight line depreciation using the method for calculating the ratemaking depreciation is tax effected at the current federal tax rate. This is implemented by calculating the income tax on the difference between accelerated depreciation and straight line or book depreciation and charging that tax to customers as deferred income taxes. This amount is then added to the accumulated deferred income tax (ADIT) balance, which is deducted from rate base to give customers the benefit of the advance payment of the taxes. When these underlying depreciation timing differences reverse, the customers pay only the taxes based on the higher book depreciation deduction and the ADIT balance is reduced as the Company pays higher taxes to the IRS. Absent normalization accounting for ratemaking purposes, Duquesne Light would be required to use a straight-line method with book lives in determining its depreciation allowance for federal income tax purposes.

In accordance with Commission policy, the benefits of accelerated tax depreciation related to pre-1970 Public Utility Property and state income taxes are flowed through to customers.

## Q. Would you explain the treatment of cost of removal in the income tax calculation?

A. In determining the pro forma operating expenses for the cost of service, the customer is charged with removal costs of retired plant through the net negative salvage adjustment. The customer is also entitled to receive the benefit of any reduction of income taxes which results from including this adjustment in the pro forma income tax calculation. Thus, the current tax deduction for cost of removal, net of salvage, has been reflected as a flow-through benefit to the rate payers in each of the test years.
Q. Are there other items treated as flow-through in the rate-making process used to determine income tax expense?
A. Yes. Based on prior Commission orders, the income tax and thus rate-reducing benefits of the following items have been flowed through to current ratepayers: (1) the state tax effect of timing differences related to book versus state tax method and life depreciation differences on all vintaged property; (2) the federal tax effect of the cumulative timing differences related to book versus federal tax method and life depreciation differences on pre-1971 vintaged property before the adoption of Class Life Asset Depreciation Range ("CLADR"); (3) the federal tax effect of the cumulative timing differences related to the book versus federal tax life on vintage property during tax years 1971 through 1980, prior to adoption of the Accelerated Cost Recovery System ("ACRS") / Modified Accelerated Cost Recovery System ("MACRS"); (4) the state income tax effects associated with basis differences between ratemaking balances and the income tax basis of plant,; and (5) the federal and state tax effects of timing differences related to the book versus tax treatment of cost of removal and salvage.

Q Are there any investment tax cre dits the Company has reflected in the income tax calculations for this rate filing?
A. No. All investment tax credits were fully amortized in 2010.

## B. ACCUMULATED DEFERRED INCOME TAXES

Q. Please explain how you have accounted for deferredincome taxes in this filing.
A. Federal accumulated deferred income taxes ("ADIT") related to plant in service are recorded in account 282 and have been deducted from rate base. Consistent with prior rate case filings, it is appropriate to reduce these amounts by the ADIT related to the prepayments on income taxes related to contributions-in-aid of construction. Consistent with my understanding of Commission practices, there is no ADIT balance related to state income taxes on property because the tax benefits of accelerated depreciation are flowed through to customers.

## Q. Please explain the Accumulated Deferred Income Taxes reflected on Schedule C-6?

A. The ADIT balance at the end of the respective test year reflects the cumulative deferred income taxes on the Company's property that has been reflected in cost of service, including tax deferrals related to Accelerated Cost Recovery System
("ACRS") and Modified Accelerated Cost Recovery System ("MACRS") property. The applicable ACRS/MACRS legislation provides for normalization of federal tax benefits on post-1980 property. In addition, the Company was required by prior rate settlements to normalize the federal tax benefits associated with tax repairs and Section 263A costs related to ACRS/MACRS property. For the fully projected test year ended December 31, 2022, the incremental deferred tax liability arising from items discussed are calculated on a pro rata basis in accordance with Treasury Regulation Sec. 1.167(l)-1(h)(6)(ii).

## Q. How has Duquesne Light provided for tax repairs and 263A costs in the HTY, FTY and FPFTY income tax calculations?

A. The 2010 and 2013 Joint Petition for Settlements stipulated that the ongoing current deductions would be reflected in the same manner as the "catch up" adjustment. Applying the same percentage of tax repairs and 263 A costs to total capital additions obtained from the tax accounting method change calculations, an estimate of the current tax repairs and 263A deductions were computed based on this historical percentage applied to the capital additions for each test year. Federal deferred income taxes were computed on the annual tax repair and 263A deductions; resulting in an increase to account 282 - ADIT and reducing the Company's rate base. The state income tax benefit of the tax repairs and 263A deductions related to distribution property is being flowed through to the ratepayers.

## Q. How has the Duquesne Light provided for accumulated de ferred income taxes related to the pension rate base adjustment?

A. During Duquesne Light's 2010 rate case, the Commission adopted a settlement provision in which the Company would be allowed to include a rate base adjustment for the portion of the $50 \%$ of actual pension contributions that is treated as capitalized in the ratemaking process over the amount that is actually capitalized to plant accounts under the SFAS 87 capitalized pension (hereafter referred to as "Capitalized Pension Adjustment") from 2007 forward, net of related accumulated deferred income taxes. The Company has reflected the Capitalized Pension Adjustment amounts as part of its tax plant and has included all tax depreciation and related ADIT in account 282. The effect is that the offset for tax depreciation deductions on the increase in tax plant is already reflected in the Account 282 ADIT deducted from rate base in the Company's test years. The fact that the Commission is allowing the Company to reflect the Capitalized Pension Adjustment in rate base does not change (increase or decrease) the tax position required by the IRS and reflected on the Company's books and tax records. No separate ADIT adjustment is necessary as the deferred tax impacts of the Capitalized Pension Adjustment are already included in the Company's 282 Account and reflected in rate base.
Q. How did the reduction in the federal income tax rate per the TCJA affect Accumulated Deferred Income Tax (ADIT) balances?
A. Deferred income taxes are recorded to reflect higher income tax payments that will be paid to the Internal Revenue Service (IRS) when the tax benefits of current
accelerated deductions reverse. As I have explained previously, for ratemaking purposes utilities use straight line or book depreciation to determine the depreciation charges that are included in cost of service. For income tax purposes, utilities can use accelerated tax depreciation methods in computing taxes payable to the IRS. These large early deductions result in reduced taxes payable during the early years of an asset's life followed by increases in taxes payable during later years of the asset's life. Over the asset's life, the same amount of asset deductions are used in computing the Company's income tax expense; it's just the timing of these deductions differs between ratemaking and tax reporting. The income tax effect of the book versus tax timing of the asset's deductions represent a deferred income tax expense. Deferred income taxes are computed at statutory tax rates, included in the Company's income tax expense and collected from customers as part of the utility's cost of service. The cumulative amount of deferred taxes collected are reflected in account 282 - Accumulated Deferred Income Taxes ("ADIT"), which is a reduction to the Company's rate base. As the timing of the accelerated tax deductions reverse, the Company will pay its deferred income taxes at $21 \%$, even though it collected deferred income taxes from customers at a higher tax rate. The difference between the deferred income taxes that will be paid at $21 \%$ versus what has been collected from customers represents excess deferred income taxes ("EDIT") that the Company must refund to customers.

## Q. How are the excess deferred taxes being refunded to customers?

A. The TCJA requires regulated public utilities subject to the normalization method of accounting to use the average rate assumption method ("ARAM") to reduce its excess deferred income tax reserve. Under this method, the excess deferred income tax reserve is reduced as the timing differences reverse over the remaining life of the asset and returned as an offset to the annual provision for deferred income taxes in the cost service calculation in rate proceedings. As stated in the 2018 Joint Petition for Settlement, the Company is using ARAM to refund the unamortized EDIT balance recorded in account 282 - Accumulated Deferred Income Taxes and which have reduced the Company's rate base. As shown on Exhibit 2, D-22, line 30, column 9, the Company has lowered its deferred income tax expense by $\$ 8.9$ million for the refund of EDIT to customers in the Fully Projected Future Test Year.

## C. CONSOLIDATED TAX ADJUSTMENT

Q. Was a Consolidated Tax Adjustment (CTA) included in the income tax expense claim?
A. No. With the passage of Act 40 of 2016, Pennsylvania joins a majority of states and the federal government in calculating a utility's federal income tax expense on a standalone basis, so that the recoverable tax expense is based on the utility's operations, and not on its affiliates. It is my understanding that Act 40, which added 66 Pa. C.S. §1301.1 to the Public Utility Code, prohibits including a CTA to the Company's income tax expense. However, Section 1301.1(b) also provides that if a consolidated tax expense differential accrues to the utility resulting from applying ratemaking methods employed prior the enactment of the Act, then $50 \%$ of the
differential shall be used to support reliability or infrastructure construction related to the utility's rate base, with the other $50 \%$ used for general corporate purposes. I have included a calculation of a CTA adjustment that would have been computed under prior ratemaking methods in order to identify the differential; which as explained in the testimony of Mr. Morris in Statement No. 4, has been used to support reliability or infrastructure related capital investment. The federal tax rate of $21 \%$, as provided in the TCJA, was used in the CTA calculation. See Exhibit MLS-2.

## D. TAXES OTHER THAN INCOME TAXES:

## Q. Explain the PA gross receipts tax and property tax adjustments.

A. The PA utility gross receipts tax ("GRT") is levied at the rate of 59 mills $(5.9 \%)$ on the Company's taxable gross receipts. This GRT rate is consistently applied throughout the test years. The public utility realty tax ("PURTA") and locally assessed real estate property taxes were based upon most recent assessments.

## III. FEDERAL TAX ADJUSTMENT CHARGE

Q. Is the Company proposing an adjustment clause which will adjust base rates for changes in federal corporate income tax rates?
A. Yes, the Company is proposing to add Rider No. 4 to its tariff, named the Federal Tax Adjustment Clause ("FTAC"), to provide for adjustments to base rates to reflect the effects of future increase or decreases in the federal corporate income tax rate. The proposed Rider No. 4 is included within Company witness Mr. Ogden's Exhibit DBO-1.

## Q. Why is the Company proposing the FTAC?

A. There several reasons. First, significant changes in the federal corporate income tax rate can dramatically affect the Company's revenue requirement. Second, it is currently difficult to adjust base rates to reflect such changes in a timely manner. Third, the time delay in adjusting base rates under current procedures can result in either significant refunds or significant retroactive recoveries after the effective date of the tax rate change. And, fourth, it is likely that a rate increase is forthcoming as the current federal administration has made numerous statements that an increase in the federal corporate income tax rate from the $21 \%$ rate to $28 \%$, among other revenue enhancers, is critical to offsetting the costs of the upcoming infrastructure bill that is being drafted.
Q. Is the re specific evidence that the federal administration has given to suggest that an increase in the federal corporate tax rate to $\mathbf{2 8 \%}$ is likely to occur?
A. Yes, the White House issued a statement on March 31, 2021. The release, titled "Fact Sheet: The American Jobs Plan", outlines the proposals for signific ant government spending to invest and rebuild the U.S. infrastructure. As part of this plan, the White House has proposed an increase in the corporate tax rate from $21 \%$ to $28 \%$ to help pay for the additional government spending. The corporate tax rate increase is one of several proposals intended to roll back some tax reductions
enacted only a few years ago with the passage of the TCJA, including the reduction in the corporate tax rate from $35 \%$ to the current rate of $21 \%$.

## Q. Can you illustrate the effect that an increase in the federal income tax rate increase from $21 \%$ to $28 \%$ would have on the revenue requirement in this proce eding?

A. Yes, I have done that in Exhibit MLS-3. There are three principal effects. The first is that current federal income taxes on taxable income are increased from $21 \%$ to $28 \%$, resulting in an increase of $\$ 11.012$ million in recoverable income taxes. This is shown on lines 22 to 24 of Exhibit MLS-3, page 1 . The second effect is the increase in the required amount to provide for the annual provision for deferred taxes at the $28 \%$ rate, which is $\$ 0.817$ million as shown on lines 2 and 5 of Exhibit MLS-3, page 2. The increase in the corporate tax rate from $21 \%$ to $28 \%$ represents a $33 \%$ tax increase $[(28 \%-21 \%) / 21 \%=33 \%$ tax increase]. The computed increases in both current and deferred federal income expenses shown on Exhibit MLS-3, page 2, lines 7 and 8 are consistent with the proposed $33 \%$ tax rate increase. The third component is the reduction of the offset to the deferred tax amount to reduce the amount that provides for the flow back of excess deferred taxes (resulting from the reduction of the federal corporate income tax rate from $35 \%$ to $21 \%$ under the TCJA), which was reflected in base rates in the Company's 2018 base rate case.
Q. Please explain the calculation of the reduction of the flow back of excess deferred taxes that would result from an increase in the federal corporate income tax rate from $\mathbf{2 1 \%}$ to $\mathbf{2 8 \%}$ ?
A. When there is a change in the federal corporate income tax rate, the IRS normalization rules require that the Company remeasure the accumulated deferred income tax ("ADIT") reserve as of the date of enactment which results in an excess deferred tax reserve (if the rate decreases) or a deficient deferred tax reserve (if the rate increases). ${ }^{1}$ After the passage of the TCJA, the Company recorded a regulatory liability to reflect the change in the excess deferred tax reserve for the tax rate increase that went into effect $1 / 1 / 18$. The amortization of this excess deferred tax reserve to return the amounts previously collected from customers that is no longer due to the IRS is reflected in the flow back of excess deferred taxes on Exhibit MLS-3, page 2, line 3. When there is subsequent change to the federal corporate income tax rate, another remeasurement occurs and the amount of the deferred income tax reserve is once again adjusted to reflect the new tax rate. In the case of a federal tax rate increase from $21 \%$ to $28 \%$, this would result in a reduction to the previous balance of the excess deferred tax reserve which then causes a reduction in the amount of the flow back excess deferred taxes as shown on Exhibit MLS-3, page 2 , line 6 . The computed reduction in excess flow back is $\$ 5.809$ million as shown on MLS-3, page 2 , line 9 .

[^66]Q. What would be the total income tax effect from an increase in the federal income tax rate from $21 \%$ to $28 \%$ ?
A. Considering the three principal effects described above, the increase in the federal tax rate would increase income tax expense by $\$ 17.638$ million in the FPFTY as shown on Exhibit MLS-3, page 2, line 10.
Q. What would be the required increase in revenues to reflect the increase from $21 \%$ to $28 \%$ in this proceeding?
A. The required additional revenues to cover the increased tax expenses will be taxable to the Company. A tax gross up factor must be applied to the net increase in tax expense. To compute the required increase in revenues, the net tax impact shown on Exhibit MLS-3, page 2, line 10 must be multiplied by an adjusted gross revenue conversion that reflects the higher corporate tax rate. Applying the adjusted gross revenue conversion factor, the revenue increase to cover the incremental income tax expense would be $\$ 28.923$ million as shown on Exhibit MLS-3, page 2, line 12.
Q. Please explain the difficulty of implementing federal corporate tax rate changes under the current system of Pennsylvania rate regulation.
A. The difficulty of implementing federal corporate tax rate changes is illustrated by the implementation of the tax rate reductions created by the TCJA. For companies like Duquesne Light that had planned base rate cases in 2018, the lower tax rate was reflected in those decisions prospectively in early 2019, along with refunds for
2018. The Commission set temporary rates for other companies and implemented surcredits on July 1, 2018 to begin the flow through of the tax rate decrease and required those companies to record regulatory liabilities for the first half of 2018. As noted previously in my testimony, this process delayed receipt of the effects of the tax rate change for some time and required retroactive changes to rates previously charged for service. It is more appropriate to adjust rates as expediently as possible to reflect tax rate changes. The FTAC is designed to accomplish that.

## Q. Is there any precedent for changing base rates for tax rate changes in an adjustment mechanism?

A. Yes, Pennsylvania has had a State Tax Adjustment Surcharge ("STAS") in place for major utility companies for many years. It provides for adjustments to base rates for changes in state taxes and specifically for changes in the tax rate under the Pennsylvania Corporate Net Income Tax.

## Q. Why is the Company proposing the FTAC now?

A. As I have illustrated, the federal corporate tax rate change contemplated by the current federal administration would have a significant effect on the Company's costs and cause the Company to earn less than a reasonable return in the FPFTY if adopted and not reflected in the Company's rates. Such a situation could occur late in 2021 or in 2022 after the record in this case is closed or when the rates set in this proceeding are in effect. In this regard, my understanding is that the current majorities in the federal Congress make it likely that this could happen by the end
of 2022. Adopting the FTAC is an appropriate solution to this potential issue and it would provide symmetrical treatment to the Company to the treatment of the tax rate reduction under the TCJA.

## Q Does this conclude your direct testimony?

A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

Item \#
DFR II-D-14
DFR II-D-15
DFR II-D-16
DFR II-D-17
DFR II-D-18
DFR II-D-19
DFR II-D-20
DFR II-D-21
DFR II-D-22
DFR II-D-23
DFR II-D-24
DFR II-D-25

Subject Matter
Debt Interest for Income Tax Calculation
Schedule of Taxes Other than Income
Schedule of Current and Deferred Tax Expense
Schedule of Income Tax Refunds
Prepaid and Deferred Income Tax Charges
Federal Corporate Graduated Income Tax Rates
Cost of Removal
Income Tax Gain/Loss Carryovers
Elim of Tax Savings by Payment of Interest on CWIP
Consol. Tax Return Election - § 1552
Deferred Taxes Related to Depreciation
Deferred Investment Tax Credits

Duquesne Light Company

|  | Taxable Income 2017 | Taxable Income 2018 | Taxable Income 2019 |  |
| :---: | :---: | :---: | :---: | :---: |
| Tax Loss Companies |  |  |  |  |
| DQE HOLDINGS, LLC | $(1,541)$ | $(2,194)$ | $(5,644)$ |  |
| DUQUESNE LIGHT HOLDINGS, INC. | $(67,768)$ | $(79,717)$ | $(58,444)$ |  |
| TEN CONNECTED SOLUTIONS, INC. | - | - | (33) |  |
| THE EFFICIENCY NETWORK, INC. | - | - | $(2,019)$ |  |
| Total Tax Loss | $(69,308)$ | $(81,910)$ | $(66,140)$ |  |
| Tax Positive Companies |  |  |  |  |
| DUQUESNE LIGHT COMPANY | 5,120 | 93,302 | 153,693 |  |
| MONONGAHELA LIGHT AND POWER | 800 | - | - |  |
| DUQUESNE FIBER COMPANY | 997 | - | - |  |
| DES CORPORATE SERVICES, INC. | 25 | (2) | - |  |
| DQE ENTERPRISES, INC. | 52 | 116 | 143 |  |
| DQE CAPITAL CORPORATION | 2 | 77 | (1) |  |
| DQE SYSTEMS, INC. | 10,214 | - | - |  |
| Total Taxable Income | 17,209 | 93,494 | 153,834 |  |
| Total Consolidated Income/(Loss) | $(52,099)$ | 11,583 | 87,695 |  |
| \% of Total | 29.75\% | 99.80\% | 99.91\% |  |
| Total Allocated Tax Loss | $(20,618)$ | $(81,743)$ | $(66,079)$ | $(56,147)$ |
| Distribution allocation |  |  |  | 49.290\% [a] |
| Loss allocated to Distribution |  |  |  | $(27,675)$ |
| Federal Tax rate |  |  |  | 21.0\% |
| Consolidated Tax Adjustment |  |  |  | $(5,812)$ |

[a] Source: Mr. Gorman testimony, Statement \#15, Jurisdictional Separation Study Exhibit 6-8A, JSS Factors - FedTax_Pres Distribution percentage

## DUQUESNE LIGHT COMPANY

## CALCULATION OF STATE AND FEDERAL INCOME TAXES

(\$ in Thousands )
INCOME TAXES

| Line \# $\qquad$ | Description [1] | [2] Reference | [3] <br> Pro torma Proposed Rates FPFTY |  | [4] <br> Ratemaking <br> Adjustments |  | [5] <br> Pro torma Proposed Rates FPFTY |  | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Operating Revenues |  | \$ | 654,141 |  |  | \$ | 654,141 |  |
| 2 | Less: O\&M Expenses \& TOTI |  | \$ | 271,825 |  |  |  | 271,825 |  |
| 3 | Book Depreciation |  |  | 162,106 |  |  |  | 162,106 |  |
| 4 | Interest Expense |  |  | 45,529 |  |  |  | 45,529 |  |
| 5 | Operating Income before Taxes |  | \$ | 174,681 | \$ | - | \$ | 174,681 | Exhibit 2, D-22, L 7, col 9 |
| 6 | Add: Premature Property Losses/ Amortizations |  |  | - |  |  |  |  |  |
| 7 | Depr- Straight Line Book Depr - Remaining Life |  |  | 162,106 |  |  | \$ | 162,106 | Exhibit 2, D-22, L 13, col 6 |
| 8 | Taxable Meals \& Entertainment |  |  | - |  |  |  |  |  |
| 9 | Total |  | \$ | 162,106 | \$ | - | \$ | 162,106 |  |
| Deduct: |  |  |  |  |  |  |  |  |  |
| 10 | State Tax Depreciation |  |  | 123,435 |  | - |  | 123,435 | Exhibit 2, D-22, L 14, col 6 |
| 11 | Normalized Tax Repairs and 263A |  |  | 59,913 |  |  |  | 59,913 | Exhibit 2, D-22, L $8+9, \mathrm{col} 9$ |
| 12 | Cost of Removal, net Salvage Amort |  |  | 1,951 |  |  |  | 1,951 | Exhibit 2, D-22, L $10+11, \operatorname{col} 9$ |
| 13 | Total |  | \$ | 185,299 | \$ | - | \$ | 185,299 |  |
| 14 | State Taxable Income | L 5-9-13 |  | 151,488 |  | - |  | 151,488 | Agrees to Exhibit 2, D-22, L 16, col 9 |
|  | State Income At: |  |  |  |  |  |  |  |  |
| 15 | Historic, Future and Fully Projected At 9.99\% | L $14 \times 9.99 \%$ |  | 15,134 |  | - |  | 15,134 | Exhibit 2, D-22, L 17, col 9 |
| 16 | Taxable Income after State Income Tax | L 15-L 16 |  | 136,354 |  | - |  | 136,354 |  |
| 17 | Add: Cost Of Removal Non Adr Property |  |  |  |  |  |  |  |  |
| 18 | ACRS On Post 1980 Assets |  |  | - |  | - |  | - |  |
| 19 | Add: State Tax Depreciation |  |  | 123,435 |  | - |  | 123,435 | Exhibit 2, D-22, L 14, col 6 |
| 20 | Deduct: Federal Tax Depreciation |  |  | 102,474 |  | - |  | 102,474 | Exhibit 2, D-22, L 24, col 6 |
| 21 | Income Subject To Federal Income Tax | L 16-19-20 | \$ | 157,315 | \$ | - | \$ | 157,315 | Agrees to Exhibit 2, D-22, L 26, col 9 |
| 22 | Federal Income Tax at 21\% | L $21 \times 21 \%$ |  |  |  |  | \$ | 33,036 | [a] |
| 23 | Federal Income Tax at 28\% | L $21 \times 28 \%$ |  |  |  |  | \$ | 44,048 | [b] |
| 24 | Increase in Federal income tax expense | Line 23-22 |  |  |  |  | \$ | 11,012 |  |

DUQUESNE LIGHT COMPANY
CALCULATION OF STATE AND FEDERAL INCOME TAXES
(\$ in Thousands )
INCOME TAXES

|  | [1] [2] | [3] |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| \# | Description Reference | Net Tax Effect | Source / Notes: |  |  |
| 1 | Federal- Current (Page 1, Column 4, Line 23) | 33,036 | [a] |  |  |
| 2 | Federal- Deferred | 2,456 | Exhibit 2, D-22, | L 31+32, col 9 |  |
| 3 | Federal- EDIT amortization | $(8,857)$ | Exhibit 2, D-22, | L 30, col 9 |  |
|  | Adjust: at 28\% |  |  |  |  |
| 4 | Federal- Current (Page 1, Column 4, Line 24) | 44,048 | [b] |  |  |
| 5 | Federal- Deferred | 3,273 | Calculated |  |  |
| 6 | Federal- EDIT amortization | $(3,048)$ | Calculated |  |  |
|  | Total Tax Increase |  |  |  |  |
| 7 | Federal- Current L 4-L1 | 11,012 | Line $1 \times 33 \%$ |  |  |
| 8 | Federal- Deferred L5-L2 | 817 | Line $2 \times 33 \%$ |  |  |
| 9 | Federal- EDIT amortization L9-L6 | 5,809 |  |  |  |
| 10 | Effect of 28\% Tax Increase On Income (A) Sum L 7 to 9 | 17,638 |  |  |  |
| 11 | Gross Revenue Conversion Factor L 22, 28\% Rate | 1.639785 |  |  |  |
| 12 | Revenue Deficiency L $14 \times 15$ | 28,923 |  |  |  |
|  |  | 21\% Rate | 28\% Rate | DIFFERENCE | Rate Increase \% |
| 13 | Statutory State Tax Rate | 9.99\% | 9.99\% | 0.00\% |  |
| 14 | Statutory Federal Tax Rate | 21.00\% | 28.00\% | 7.00\% | 33.3\% |
| 15 | 1 minus State Tax Rate | 90.010\% | 90.010\% | 0.00\% |  |
| 16 | Federal Rate multiplied by (1 minus State Tax Rate) | 18.902\% | 25.203\% | 6.30\% |  |
| 17 | Effective Tax Rate | 28.892\% | 35.193\% | 6.30\% |  |
| 18 | 1 minus Effective Tax Rate (Complement Tax Rate) | 0.711079 | 0.648072 | -6.30\% |  |
| 19 | Reciprocal Tax Gross Up Factor | 1.406314 | 1.543038 |  |  |
| 20 | Effective Tax Rate with GRT | 33.088\% | 39.016\% |  |  |
| 21 | Income Tax Factor for Gross Revenue (includes GRT) | 0.669125 | 0.609836 |  |  |
| 22 | Gross Revenue Conversion Factor | 1.494489 | 1.639785 |  |  |

# BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Duquesne Light Company<br>)<br>Docket No. R-2021-3024750

## DIRECT TESTIMONY OF PAUL R. MOUL

Dated: April 16, 2021

Duquesne Light Company<br>Direct Testimony of Paul R. Moul Table of Contents

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Appendix A - Educational Background, Business Experience and Qualifications

| GLOSSARY OF ACRONYMS AND DEFINED TERMS |  |
| :---: | :---: |
| ACRONYM | DEFINED TERM |
| ADIT | Accumulated Deferred Income Taxes |
| AFUDC | Allowance for Funds Used During Construction |
| $\beta$ | Beta |
| b | Represents the retention rate that consists of the fraction of earnings that are not paid out as dividends |
| b x r | Represents internal growth |
| CAPM | Capital Asset Pricing Model |
| CCR | Corporate Credit Rating |
| CE | Comparable Earnings |
| CWIP | Construction Work in Progress |
| DCF | Discounted Cash Flow |
| DSIC | Distribution System Improvement Charge |
| EE\&C | Energy Efficiency and Conservation Program |
| FOMC | Federal Open Market Committee |
| IGF | Internally Generated Funds |
| g | Growth rate |
| lev | Leverage modification |
| LT | Long Term |
| M\&M | Modigliani \& Miller |
| MPL | Minimum pension liability |
| OCI | Other Comprehensive Income |
| POLR | Provider of last resort |
| PPUC | Pennsylvania Public Utility Commission |
| r | represents the expected rate of return on common equity |
| Rf | Risk-free rate of return |
| Rm | Return on the market |
| RP | Risk Premium |
| RTO | Regional Transmission Organizations |


| GLOSSARY OF ACRONYMS AND DEFINED TERMS |  |
| :--- | :--- |
| ACRONYM | DEFINED TERM |
| s | Represents the new common shares expected to be issued by a <br> firm |
| s x v | Represents external growth |
| S\&P | Standard \& Poor's |
| v | Represents the value that accrues to existing shareholders from <br> selling stock at a price different from book value |
| ytm | Yield to maturity |
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## DIRECT TESTIMONY OF PAUL R. MOUL

## INTRODUCTION AND SUMMARY OF RECOMMENDATION

Q. Please state your name, occupation and business address.
A. My name is Paul Ronald Moul. My business address is 251 Hopkins Road, Haddonfield, New Jersey 08033-3062. I am Managing Consultant at the firm P. Moul \& Associates, an independent financial and regulatory consulting firm. My educational background, business experience and qualifications are provided in Appendix A, which follows my direct testimony.

## Q. What is the purpose of your testimony?

A. My testimony presents evidence, analysis and a recommendation concerning the appropriate rate of return that the Pennsylvania Public Utility Commission ("PPUC" or the "Commission") should recognize in the determination of the revenues that Duquesne Light Company ("Duquesne Light" or the "Company") should realize as a result of this proceeding. My analysis and recommendation are supported by the detailed financial data contained in Exhibit PRM-1, which is a multi-page document divided into fourteen (14) schedules.
Q. Based upon your analysis, what is your conclusion concerning the appropriate cost of common equity and rate of return for the Company?
A. My conclusion is that the Company's appropriate rate of return on common equity is $10.95 \%$. This return falls within the range of results of the cost of equity models. In determining the rate of return on common equity, the Commission should consider the Company's system security, commitment to safety, infrastructure investment, and high quality of customer service. The Company's superior performance in these areas are described in the testimony of Mr. Davis and should

## DIRECT TESTIMONY OF PAUL R. MOUL

be recognized by the Commission in its determination of the Company's rate of return. With this return, I have presented on page 1 of Schedule 1 the weighted average cost of capital, which is $7.84 \%$. The Company's proposed rate of return is shown below:

| Type of Capital | Ratios |  | Cost <br> Rate |  |
| :--- | ---: | ---: | ---: | ---: | | Weighted |
| :---: |
| Cost Rate |

The resulting overall cost of capital, which is the product of weighting the individual capital costs by the proportion of each respective type of capital, should, if adopted by the Commission, establish a compensatory level of return for the use of capital and provide the Company with the ability to attract capital which is essential to maintaining a safe, reliable and resilient network.

## Q. Are there unusual factors that you included in your analysis of the cost of equity for Duquesne Light that make this case unique?

A. Yes. My cost of equity analysis reflects the impact of the coronavirus pandemic. This event had a significant impact on the capital markets -- both debt and equity. Extraordinary events around the COVID-19 pandemic produced significant turmoil that has rocked the stock and bond markets beginning in the February-March 2020 time frame. During this period, we saw abrupt reaction to the coronavirus pandemic and declines in the price of crude oil. These events led to the end of the record-setting 128-month economic expansion. As a recession began in February

## DIRECT TESTIMONY OF PAUL R. MOUL

2020, extraordinary actions were taken by the Federal Open Market Committee ("FOMC") to address these disruptions. I have considered these events as they impact the inputs that I used in the various models of the cost of equity. That is to say, I have applied the cost of equity models using input data that follows the beginning of the economic recession.
Q. What background information have you considered in reaching a conclusion concerning the Company's cost of capital?
A. Duquesne Light is wholly-owned subsidiary of Duquesne Light Holdings, Inc. ("DLH" or the "Parent Company"). The Company provides electric delivery service to approximately 605,000 customers in Allegheny and Beaver counties. In 2019, electric sales in MWh for Duquesne Light were comprised of approximately $32 \%$ to residential, $48 \%$ to commercial, $20 \%$ to industrial customers. The Company is also the default service provider, or provider of last resort ("POLR"), and obtains the energy needs of its customers that use POLR service from third party suppliers.

## Q. How have you de te rmined the cost of common equity in this case?

A. The cost of common equity is established using capital market and financial data relied upon by investors to assess the relative risk, and hence the cost of equity, for an electric utility, such as Duquesne Light. In this regard, I relied on four wellrecognized measures of the cost of equity: The Discounted Cash Flow ("DCF") model, the Risk Premium ("RP") analysis, the Capital Asset Pricing Model ("CAPM"), and the Comparable Earnings ("CE") approach. The results of a variety of approaches indicate that the Company's rate of return on common equity is 10.95\%.

## DIRECT TESTIMONY OF PAUL R. MOUL

Q. In your opinion, what factors should the Commission consider when determining the Company's cost of capital in this proceeding?
A. The Commission's rate of return allowance must be set to cover the Company's interest and dividend payments, provide a reasonable level of earnings retention, produce an adequate level of internally generated funds to meet increasing capital requirements, be commensurate with the risk to which the Company's capital is exposed, assure confidence in the financial integrity of the Company, support reasonable (i.e. investment grade) credit quality, and allow the Company to raise capital on reasonable terms. The return that I propose fulfills these established standards of a fair rate of return set forth by the landmark Bluefield and Hope cases. ${ }^{1}$ That is to say, my proposed rate of return is commensurate with returns available on investments having corresponding risks.
Q. What factors have you conside red in meas uring the cost of equity in this case?
A. The models that I used to measure the cost of common equity for the Company were applied with market and financial data developed from my proxy group of eleven (11) electric companies. The criteria that I used to assemble the proxy group will be described later in my testimony. The companies in the electric proxy group are identified on page 2 of Schedule 3. I will refer to these companies as the "Electric Group" throughout my testimony.

## Q. How have you performed your cost of equity analysis with the market data for the Electric Group?

[^67]
## DIRECT TESTIMONY OF PAUL R. MOUL

A. I have applied the models/methods for estimating the cost of equity using the average data for the Electric Group. I have not measured separately the cost of equity for the individual companies within the Electric Group. By employing group average data, rather than individual Company's analysis, I have helped to minimize the effect of extraneous influences on the market data for an individual company.

## Q. Please summarize your cost of equity analysis.

A. My cost of equity determination was derived from the results of the methods/models identified above, and revealed on page 2 of Schedule 1. In general, the use of more than one method provides a superior foundation to arrive at the cost of equity. At any point in time, reliance on a single method can provide an incomplete measure of the cost of equity. The specific application of these methods/models will be described later in my testimony. The following table, derived from the model results presented on page 2 of Schedule 1 , provides a summary of the indicated costs of equity using each of these approaches.

## Electric Group

DCF

RP

CAPM

Comparable Earnings
$10.52 \%$
$10.10 \%$
$12.54 \%$
$12.60 \%$
These returns that provide the range of the cost of equity from $10.10 \%$ to $12.54 \%$ using the market-based models, i.e., Discounted Cash Flow ("DCF"), Risk Premium, and Capital Asset Pricing Model ("CAPM"). Furthermore, the

## DIRECT TESTIMONY OF PAUL R. MOUL

Comparable Earnings method confirms the reasonableness of the range defined by the market based models. From these measures of the cost of equity, I recommend that the Company's rate of return on common equity be set at $10.95 \%$, which is within the range of results reflected in the above table. The testimony of Mr. Davis and Mr. Morris summarize the many initiatives that the Company has undertaken, which have produced high quality service, along with superior customer service and an exceptional safety record. The Commission should consider these factors when setting the Company's cost of equity in this case. The Company should be granted an opportunity to earn a rate of return on common equity of at least $10.95 \%$. I also believe my recommended cost of equity is appropriate in this case because there is always the potential that the Company may not actually achieve its allowed rate of return in the current economic environment. Uncertainty in this regard is related to unanticipated increases in operating and maintenance expenses and the impact on commercial and industrial sales during this recessionary period. My recommendation should be viewed as the minimum necessary to satisfy investors' expectations. It is important that the Company have a reasonable opportunity to earn is cost of capital and that way, sustain its ability to attract and retain capital at the level needed to support the increased demand for capital investment.

## ELECTRIC UTILITY RISK FACTORS

## Q. Please identify some of the factors that make the electric utility industry generally different today than it was in the past.

A. Aside from its traditional responsibility to maintain reliability and comply with the mandates of the Commission, a different set of risks now exists for the electric

## DIRECT TESTIMONY OF PAUL R. MOUL

delivery business in Pennsylvania. The potential expansion of distributed generation will have an increasing influence on the business of electric-delivery utilities. The obligation to serve represents a key risk factor for the local delivery of electricity. The risks facing the electric utilities are clearly different from those that existed in the past. Investors generally are risk-averse, and with increased uncertainty will require compensation for higher risk.

## Q. Have these changes brought about increases in the risks facing electric utilities generally?

A. Electric utilities generally are faced with meaningful changes in the fundamentals that affect their operations, while retaining the obligation to serve under cost of service pricing that continues to dominate its business profile. The risk of distributed generation is a concern, and could have an increasing influence on the business of electric delivery utilities. With technological advances in microturbines, potential commercialization of battery systems, development of wind and solar power, and the creation of micro-grids, utilities face the potential for bypass and the resulting declines in transmission and distribution revenues. That is to say, the development of distributed generation and local alternative energy has the potential to displace delivery revenue that can impact the incumbent utility's financial profile. This risk is exacerbated by net metering rules that require offsets against distribution rates even though distribution costs may not be reduced as a result of the installation of distributed generation.

The cost to replace aging infrastructure and to enhance reliability and resiliency, and address cyber threats, also adds to the risk of electric delivery

## DIRECT TESTIMONY OF PAUL R. MOUL

utilities, such as Duquesne Light, because these expenditures increase costs without any concomitant increase in revenues, except through regulatory approved rate increases, such as the Distribution System Improvement Charge ("DSIC"). The Company continues to make substantial investments to harden its system and expand its vegetation management practices to reduce the number and duration of storm-related outages experienced by customers. The DSIC contains a variety of limitations that will not eliminate the need for periodic rate cases to cover the significant new investment that is being made by Duquesne Light. Duquesne Light has also been engaged in an energy efficiency and conservation ("EE\&C") program, pursuant the programs mandated by Act 129 of 2008, P.L. 1592 ("Act 129"). Reductions in revenues resulting from reductions in usage and demand the Company is required to achieve under its Commission-mandated EE\&C program can be reflected only on a prospective basis in base rate cases, which can have an adverse impact on the Company between rate cases.

## Q. Are there other specific risk issues facing the Company?

A. Yes. Energy deliveries to commercial and industrial customers, which represent $68 \%$ of the Company's energy deliveries, are usually thought to be of higher risk than to residential customers. Success in this segment of the Company's market is subject to the business cycle and pressures from alternative providers. Moreover, external factors also can influence deliveries to these customers, which face competitive pressure on their own operations from other facilities outside the utility's service territory.

In addition, significant efforts to encourage conservation pursuant to the

## DIRECT TESTIMONY OF PAUL R. MOUL

requirements of Act 129 create a risk that Duquesne Light's distribution revenues will likely decline between base rate cases.
Q. Please indicate how the Company's risk profile is affected by its construction program.
A. The Company is faced with the requirement to undertake investment to maintain and upgrade existing facilities in its service territory and to meet growth. Over the next five years (i.e., 2021 through 2025), the Company's total capital expenditures are expected to be approximately $\$ 1,826.1$ million. These expenditures will represent approximately $52.4 \%$ ( $\$ 1,826.1$ million $\div \$ 3,487.3$ million) of the net utility plant at December 31, 2020. A fair rate of return for the Company represents a key to a financial profile that will provide the Company with the ability to raise the capital, in all market conditions to meet its needs, and to satisfy investor requirements. In the situation where additional capital is required, as shown by the construction expenditures indicated above, the regulatory process must establish a return on equity that provides a reasonable opportunity for the Company to actually achieve its cost of capital. This is especially important for Duquesne Light due to its smaller size and the magnitude of its construction program.

## FUNDAMENTAL RISK ANALYSIS

Q. Is it necessary to conduct a fundamental risk analysis to provide a frame work for a determination of a utility's cost of equity?
A. Yes. It is necessary to establish a company's relative risk position within its industry through a fundamental analysis of various quantitative and qualitative factors that bear upon investors' assessment of overall risk. The qualitative factors

## DIRECT TESTIMONY OF PAUL R. MOUL

that bear upon the Company's risk have already been discussed. The quantitative risk analysis follows. The items that influence investors' evaluation of risk and their required returns were described above. For this purpose, I compared Duquesne Light to the S\&P Public Utilities, an industry-wide proxy consisting of various regulated businesses, and to the Electric Group.

## Q. What are the components of the S\&P Public Utilities?

A. The S\&P Public Utilities is a widely recognized index that is comprised of electric power and natural gas companies. These companies are identified on page 3 of Schedule 4.

## Q. What criteria did you employ to assemble the Electric Group?

A. The Electric Group companies have the following common characteristics: (i) have publicly-traded common stock, (ii) are contained in The Value Line Investment Survey and are classified in the Electric Utility East group, along with additional companies that are relatively small, (iii) are not currently the target of an announced merger or acquisition, (iv) are not engaged in the construction of a nuclear generating plant, and (v) have not recently reduced their common dividend. It would be inappropriate to include a company that is a target of a takeover in a proxy group because the stock price of that company usually does not reflect its underlying fundamentals. This situation is different from the company that initiates the acquisition, which will be the surviving entity. My Electric Group obtained from the Value Line Investment Survey consists of the following companies:

AVANGRID, Inc., Consolidated Edison, Duke Energy, Eversource Energy, Exelon Corp., FirstEnergy Corp., MGE Energy, NextEra Energy, Otter Tail Corp., PPL

## DIRECT TESTIMONY OF PAUL R. MOUL

Corp., and Public Service Enterprise Group.

## Q. Is knowledge of a utility's bond rating an important factor in assessing its risk and cost of capital?

A. Yes. Knowledge of a company's credit quality rating is important because the cost of each type of capital is directly related to the associated risk of the firm. So, while a company's credit quality risk is shown directly by the rating and yield on its bonds, these relative risk assessments also bear upon the cost of equity. This is because a firm's cost of equity is represented by its borrowing cost plus compensation to recognize the higher risk of an equity investment compared to debt.

## Q. How do the bond ratings compare for Duquesne Light, the Electric Group, and the S\&P Public Utilities?

A. For Duquesne Light, its Long Term ("LT") issuer rating is A3 from Moody's Investors Service ("Moody's") and the corporate credit rating ("CCR") is BBB+ from Standard \& Poor's Corporation ("S\&P"). The LT issuer rating by Moody's and the CCR designation by $\mathrm{S} \& \mathrm{P}$ focuses upon the credit quality of the issuer of the debt, rather than upon the debt obligation itself. The testimony of Mr. James Milligan, the Company's Treasurer, provides further detail on the Company's credit ratings. For the Electric Group, the average LT issuer rating is A2 from Moody's and the average CCR is $\mathrm{A}-$ from $\mathrm{S} \& \mathrm{P}$. For the $\mathrm{S} \& \mathrm{P}$ Public Utilities, the average composite rating is A3 by Moody's and BBB+ by S\&P. Many of the financial indicators that I will subsequently discuss are considered during the rating process. In this regard, the Company's credit quality is similar to the Electric Group (e.g.

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Duquesne Light's Moody's rating is one notch weaker than the Electric Group and its $\mathrm{S} \& \mathrm{P}$ rating is also one notch weaker).
Q. How do the financial data compare for Duquesne Light, the Electric Group, and the S\&P Public Utilities?
A. The broad categories of financial data that I will discuss are shown on Schedules 2, 3, and 4. The data cover the five-year period 2015-2019. The important categories of relative risk may be summarized as follows:

Size. In terms of capitalization, Duquesne Light is much smaller than the average size of the Electric Group and the S\&P Public Utilities. All other things being equal, a smaller company is riskier than a larger company because a given change in revenue and expense has a proportionately greater impact on a small firm. In addition, Duquesne Light serves a concentrated geographic area, and in particular, an urban area that is often more costly to service. As I will demonstrate later, the size of a firm can impact its cost of equity. This is the case for Duquesne Light.

Market Ratios. Market-based financial ratios provide a partial indication of the investor-required cost of equity. If all other factors are equal, investors will require a higher rate of return on equity for companies that exhibit greater risk, in order to compensate for that risk. That is to say, a firm that investors perceive to have higher risks will experience a lower price per share in relation to expected

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earnings. ${ }^{2}$
There are no market ratios available for Duquesne Light because the Company's stock is not traded. The five-year average price-earnings multiple for the Electric Group was similar to the $\mathrm{S} \& \mathrm{P}$ Public Utilities. The five-year average dividend yield was slightly higher for the Electric Group than the S\&P Public Utilities. The average market-to-book ratio for the Electric Group was lower than the S\&P Public Utilities.

Common Equity Ratio. The level of financial risk is measured by the proportion of long-term debt and other senior capital that is contained in a company's capitalization. Financial risk is also analyzed by comparing common equity ratios (the complement of the ratio of debt and other senior capital). That is to say, a firm with a high common equity ratio has lower financial risk, while a firm with a low common equity ratio has higher financial risk. The five-year average common equity ratios, based on permanent capital, were $52.5 \%$ for Duquesne Light, $49.8 \%$ for the Electric Group, and $42.2 \%$ for the S\&P Public Utilities. The average common equity ratio in 2019 was $48.1 \%$ for the Electric Group and reflected a range of common equity ratios from $25.8 \%$ to $66.3 \%$. The common equity ratio proposed by Duquesne Light in this case of $53.35 \%$, is within the range of common equity ratios for the Electric Group.

Return on Book Equity. Greater variability (i.e., uncertainty) of a firm's

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earned returns signifies relatively greater levels of risk, as shown by the coefficient of variation (standard deviation $\div$ mean) of the rate of return on book common equity. The higher the coefficients of variation, the greater degree of variability. For the five-year period, the coefficients of variation were $0.132(1.5 \% \div 11.4 \%)$ for Duquesne Light, $0.084(0.8 \% \div 9.5 \%)$ for the Electric Group, and $0.049(0.5 \% \div$ $10.2 \%$ ) for the S\&P Public Utilities. The earnings variability for Duquesne Light was significantly higher than the Electric Group and the S\&P Public Utilities, indicating that the Company has higher risk.

Operating Ratios. I have also compared operating ratios (the percentage of revenues consumed by operating expense, depreciation and taxes other than income taxes). ${ }^{3}$ The complement of the operating ratio is the operating margin which provides a measure of profitability. The higher the operating ratio, the lower the operating margin. The five-year average operating ratios were $72.3 \%$ for Duquesne Light, $77.7 \%$ for the Electric Group, and $78.8 \%$ for the S\&P Public Utilities. The operating risk for Duquesne Light is below that for to the Electric Group and the S\&P Public Utilities, thus indicating lower risk.

Coverage. The level of fixed charge coverage (i.e., the multiple by which available earnings cover fixed charges, such as interest expense) provides an indication of the earnings protection for creditors. Higher levels of coverage, and hence earnings protection for fixed charges, are usually associated with superior grades of creditworthiness. The five-year average interest coverage (excluding

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Allowance for Funds Used During Construction ("AFUDC")) was 4.92 times for Duquesne Light, 3.81 times for the Electric Group, and 3.22 times for the S\&P Public Utilities. The higher interest coverage for Duquesne Light can be traced to its lower proportion of debt in its capital structure.

Quality of Earnings. Measures of earnings quality usually are revealed by the percentage of AFUDC related to income available for common equity, the effective income tax rate, and other cost deferrals. These measures of earnings quality usually influence a firm's internally generated funds because poor quality of earnings would not generate high levels of cash flow. Quality of earnings has not been a significant concern for Duquesne Light, the Electric Group, and the $\mathrm{S} \& \mathrm{P}$ Public Utilities.

Internally Generated Funds. Internally generated funds ("IGF") provide an important source of new investment capital for a utility and represent a key measure of credit strength. Historically, the five-year average percentage of IGF to capital expenditures was $80.0 \%$ for Duquesne Light, $77.7 \%$ for the Electric Group, and $74.1 \%$ for the S\&P Public Utilities. The IGF percentages were fairly similar for Duquesne Light, the Electric Group, and the S\&P Public Utilities, albeit the Company's ratio was higher.

Betas. The financial data that I have been discussing relate primarily to company-specific risks. Market risk for firms with publicly-traded stock is measured by beta coefficients. Beta coefficients attempt to identify systematic risk,

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i.e., the risk associated with changes in the overall market for common equities. ${ }^{4}$

Value Line publishes such a statistical measure of a stock's relative historical volatility to the rest of the market. A comparison of market risk is shown by the Value Line beta of .88 as the average for the Electric Group (see page 2 of Schedule 3), and .91 as the average for the S\&P Public Utilities (see page 3 of Schedule 4). The systematic risk was slightly lower for the Electric Group as compared to the S\&P Public Utilities.

## Q. Please summarize your risk evaluation of the Company and the Electric Group.

A. The risk of Duquesne Light parallels that of the Electric Group in certain respects. However, Duquesne Light is much smaller than the average size of the Electric Group and its earnings are much more variable. The Company's lower financial risk (i.e., higher common equity ratio) provides a partial offset to these high-risk factors. Lower risk indicators for the Company are its operating ratio and interest coverages. Its quality of earnings and IGF to construction has been similar to the Electric Group. Overall, the results from the Electric Group provide a conservative, albeit an understatement, of the Company's cost of equity. Indeed, the size of Duquesne Light, its much more variable returns, and the somewhat weaker credit rating suggests that the Electric Group provides an understatement of the

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Company's cost of equity.
CAPITAL STRUCTURE RATIOS
Q. Please explain the selection of capital structure ratios for Duquesne Light.
A. In the situation where the operating public utility raises its own long-term debt directly in the capital markets, as is the case for Duquesne Light, it is proper to employ the capital structure ratios and senior capital cost rates of the regulated public utility for rate of return purposes. Furthermore, consistency requires that the embedded cost rate of the Company's senior securities also be employed. This procedure is consistent with the procedures used by the Commission in prior rate cases.
Q. Does Schedule 5 provide the capitalization and capital structure ratios you have considered?
A. Yes. Schedule 5 presents Duquesne Light's capitalization and related capital structure at December 31, 2020, the end of the historic test year ("HTY"). Also shown on Schedule 5 is the Duquesne Light's estimated capital structure at December 31, 2021, which is the end of the future test year ("FTY"), and at December 31, 2022, which is the end of the fully projected future test year ("FPFTY"). During the FPFTY, the Company's capital structure reflects the projected issuance of $\$ 150$ million of first mortgage bonds and the Company's projection of retained earnings growth.

Also reflected on Schedule 5 are several adjustments to the capital structure. The first adjustment is related to the call premiums on the early redemption or

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refunding of high cost long-term debt. The second adjustment relates to the elimination of accumulated Other Comprehensive Income ("OCI").

## Q. Please describe the first adjustment.

A. I have adjusted the principal amounts of long-term debt to exclude the amounts used to finance premiums on the early redemption of high cost long-term debt. To do otherwise would deny Duquesne Light the full return on the premiums paid to redeem this high cost capital since additional amounts of capital were issued to pay the call premiums. The amounts issued to finance the call premiums do not increase the Company's rate base. That is to say, no additional rate base was created through additional debt that was necessary to finance these transactions, and therefore an adjustment is required to provide the return necessary to service the additional capital. Hence, Duquesne Light's long-term debt amounts must be adjusted for this disparity in order that the return necessary to service the capitalization is produced from rate base investment times the overall rate of return.

This adjustment is equitable since customers receive the cost savings resulting from these refinancing in the form of a lower overall rate of return, and Duquesne Light recovers all costs incurred in providing these benefits to the customers. To accomplish these savings, the Company paid the debt holders a premium for surrendering its securities prior to maturity. These premiums represented an investment made by Duquesne Light to reduce its overall cost of capital. Since the reduced interest costs are reflected in the lower cost of capital to ratepayers, it is appropriate that the Company recover the costs incurred to produce these savings. This includes both a return of and return on the unamortized

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premiums. Adjusting the principal amounts in the capital structure provides a return on the premium as a part of the embedded cost rates of capital.

## Q. Please explain the second adjustment.

A. The accumulated OCI must be eliminated from the capital structure for ratesetting purposes. OCI arises from a variety of sources, including: minimum pension liability ("MPL"), foreign currency hedges, unrealized gains and losses on securities available for sale, interest rate swaps, and other cash flow hedges. The accumulated OCI associated with the Company's pension and postretirement plans must be excluded from the common equity because it does not represent funds available to the Company that could be used to finance its rate base.

## Q. What capital structure ratios do you recommend be adopted for rate of return purposes in this proceeding?

A. Since ratemaking is prospective, the rate of return should reflect known changes that will occur during the course of the fully projected future test year, at a minimum, and should consider conditions that will exist during the period of time the proposed rates will be effective. As a result, I will adopt the Company's FPFTY capital structure ratios of $46.65 \%$ long-term debt and $53.35 \%$ common equity. These capital structure ratios are the best approximation of the mix of capital the Company will employ to finance its rate base during the period new rates are in effect. Short-term debt has been excluded from these ratios because the Commission's approved practice is to assign short-term debt to CWIP in the calculation of AFUDC. Hence, the cost of short-term debt is capitalized through AFUDC and plays no role in setting base rates. For example, the short-term debt

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for the fully projected future test year shown on Schedule 5 (i.e., $\$ 104.3$ million average short-term debt in 2022 with an $\$ 11.0$ million short-term debt balance at December 31, 2022) is less than the associated CWIP balances of $\$ 339.7$ million at December 31, 2022. This means that all short-term debt is being used by the Company to finance CWIP.

## COST OF SENIOR CAPITAL

## Q. What cost rate have you assigned to the debt portion of Duquesne Light's capital structure?

A. Consistency with the capital structure ratios for the Company requires that the embedded cost rates of Duquesne Light's senior securities must also be employed. This procedure is consistent with the ratesetting procedures used by the Commission in prior Duquesne Light rate cases. The determination of the cost of debt is essentially an arithmetic exercise. This is due to the fact that the Company has contracted for the use of this capital for a specific period of time at a specified cost rate. As shown on page 1 of Schedule 6, the actual embedded cost rate of longterm debt was $4.39 \%$ at December 31, 2020. By December 31, 2022, the embedded debt cost rate is estimated to be $4.29 \%$, as shown on page 3 of Schedule 6 . For the new issue of debt in the FPFTY, the Company expects this issue to have a $3.50 \%$ coupon rate. The details leading to the development of the individual effective cost rates for each series of long-term debt, using the cost rate to maturity technique, are shown on page 4 of Schedule 6. The cost rate, or yield to maturity ("ytm"), used on page 4 of Schedule 6 is the rate of discount that equates the present value of all future interest and principal payments with the net proceeds of the bond.

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I will adopt the $4.29 \%$ embedded cost of long-term debt at December 31, 2022, as shown on page 3 of Schedule 6 . This rate is related to the amount of longterm debt shown on Schedule 5 which provides the basis for the $46.65 \%$ long-term debt ratio. In my calculation of the embedded cost of long-term debt, I have recognized the costs associated with the Company's early redemption of high cost debt. As previously explained, it is necessary to compensate Duquesne Light for the costs incurred to lower the embedded debt cost rate which reduces the cost of capital charged to ratepayers.

## COST OF EQUITY - GENERAL APPROACH

## Q. Please describe how you determined the cost of equity for the Company.

A. Although my fundamental financial analysis provides the required framework to establish the risk relationships among Duquesne Light, the Electric Group, and the S\&P Public Utilities, the cost of equity must be measured by standard financial models that I identified above. Differences in risk traits, such as size, business diversification, geographical diversity, regulatory policy, financial leverage, and bond ratings must be considered when analyzing the cost of equity.

It is also important to reiterate that no one method or model of the cost of equity can be applied in an isolated manner. Rather, informed judgment must be used to take into consideration the relative risk traits of the firm. It is for this reason that I have used more than one method to measure the Company's cost of equity. As I describe below, each of the methods used to measure the cost of equity contains certain incomplete and/or overly restrictive assumptions and constraints that are not optimal. Therefore, I favor considering the results from a variety of

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methods. In this regard, I applied each of the methods with data taken from the Electric Group and arrived at a cost of equity of $10.95 \%$ for Duquesne Light.

## DISCOUNTED CASH FLOW

## Q. Please describe the Discounted Cash Flow model.

A. The DCF model seeks to explain the value of an asset as the present value of future expected cash flows discounted at the appropriate risk-adjusted rate of return. In its simplest form, the DCF-determined return on common stock consists of a current cash (dividend) yield and future price appreciation (growth) of the investment. The dividend discount equation is the familiar DCF valuation model, which assumes that future dividends are systematically related to one another by a constant growth rate. The DCF formula is derived from the standard valuation model: $\mathrm{P}=\mathrm{D} /(\mathrm{k}-\mathrm{g})$, where $\mathrm{P}=$ price, $\mathrm{D}=$ dividend, $\mathrm{k}=$ the cost of equity, and $\mathrm{g}=$ growth in cash flows. By rearranging the terms, we obtain the familiar DCF equation: $\mathrm{k}=\mathrm{D} / \mathrm{P}+\mathrm{g}$. All of the terms in the DCF equation represent investors' assessment of expected future cash flows that they will receive in relation to the value that they set for a share of stock (P). The DCF equation is sometimes referred to as the "Gordon" model. ${ }^{5}$ My DCF results are provided on Schedule 1, page 2, for the Electric Group. The DCF return is $10.52 \%$ with the leverage adjustment and $9.06 \%$ without the leverage adjustment for the Electric Group. It is apparent that without the leverage adjustment to the DCF that the result is unrealistic. This is obvious due to the

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results of the other models of the cost of equity that provide a considerably higher result.

Among other limitations of the model, there is a certain element of circularity in the DCF method when applied in rate cases. This is because investors' expectations for the future depend upon regulatory decisions. In turn, when regulators depend upon the DCF model to set the cost of equity, they rely upon investor expectations that include an assessment of how regulators will decide rate cases. Due to this circularity, the DCF model may not fully reflect the true risk of a utility.

## Q. What is the dividend yield component of a DCF analysis?

A. The dividend yield reveals the portion of investors' cash flow that is generated by the return provided by the dividends an investor receives. It is measured by the dividends per share relative to the price per share. The DCF methodology requires the use of an expected dividend yield to establish the investor-required cost of equity. For the twelve months ended December 2020, the monthly dividend yields are shown on Schedule 7. The month-end prices were adjusted to reflect the buildup of the dividend in the price that has occurred since the last ex-dividend date (i.e., the date by which a shareholder must own the shares to be entitled to the dividend payment - usually about two to three weeks prior to the actual payment).

For the twelve months ended December 2020 the average dividend yield was $3.72 \%$ for the Electric Group based upon a calculation using annualized dividend payments and adjusted month-end stock prices. The dividend yields for the more recent six-month and three-month periods were $3.80 \%$ and $3.73 \%$,

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respectively. For applying the DCF model, I have used the six-month average dividend yield of $3.80 \%$ for the Electric Group. The use of this dividend yield will reflect current capital costs, while avoiding spot yields. For the purpose of a DCF calculation, the average dividend yield must be adjusted to reflect the prospective nature of the dividend payments, i.e., the higher expected dividends for the future. Recall that the DCF is an expectational model that must reflect investors' anticipated cash flows. I have adjusted the six-month average dividend yield in three different, but generally accepted, manners and used the average of the three adjusted values as calculated in the lower panel of data presented on Schedule 7. This adjustment adds eleven basis points to the six-month average historical yield, thus producing the $3.91 \%$ adjusted dividend yield for the Electric Group.

## Q. What factors influence investors' growth expectations?

A. As noted previously, investors are interested principally in the dividend yield and future growth of their investment (i.e., the price per share of the stock). Future growth in earnings per share is the DCF model's primary focus because, under the model's assumption that the price-earnings multiple remains constant, the price per share of stock will grow at the same rate as earnings per share. A growth rate analysis considers a variety of variables to reach a consensus of prospective growth, including historical data and widely available analysts' forecasts of earnings, dividends, book value, and cash flow (all stated on a per-share basis). A fundamental growth rate analysis is frequently based upon internal growth ("b x r"), where " $r$ " is the expected rate of return on common equity and "b" is the retention rate (a fraction representing the proportion of earnings not paid out as dividends).

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To be complete, the internal growth rate should be modified to account for sales of new common stock (external growth), which is represented by the formula s x v , where " $s$ " is the number of new common shares the firm expects to issue and " $v$ " is the value that accrues to existing shareholders from selling stock at a price above book value. Fundamental growth, which combines internal and external growth, encompasses the factors that cause book value per share to grow over time.

Growth also can be expressed in multiple stages. This expression of growth consists of an initial "growth" stage where a firm enjoys rapidly expanding markets, high profit margins, and abnormally high growth in earnings per share. Thereafter, a firm enters a "transition" stage where fewer technological advances and increased product saturation begin to reduce the growth rate and profit margins come under pressure. During the "transition" phase, investment opportunities begin to mature, capital requirements decline, and a firm begins to pay out a larger percentage of earnings to shareholders. Finally, the mature or "steady-state" stage is reached when a firm's earnings growth, payout ratio, and return on equity stabilize at levels where they remain for the life of a firm. The three stages of growth assume a step-down of high initial growth to lower sustainable growth. Even if these three stages of growth can be envisioned for a firm, the third "steadystate" growth stage, which is assumed to remain fixed in perpetuity, represents an unrealistic expectation because the three stages of growth can be repeated. That is to say, the stages can be repeated where growth for a firm ramps-up and rampsdown in cycles over time. For these reasons, there is no need to analyze growth

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rates individually for each cycle, but rather to rely upon analysts' growth forecasts, which are those used by investors when pricing common stocks.

## Q. How did you determine an appropriate growth rate?

A. The growth rate used in a DCF calculation should measure investor expectations. Investors consider both company-specific variables and overall market sentiment (i.e., level of inflation rates, interest rates, economic conditions, etc.) when balancing their capital gains expectations with their dividend yield requirements. Investors are not influenced solely by a single set of company-specific variables weighted in a formulaic manner. Therefore, all relevant growth rate indicators should be evaluated using a variety of techniques when formulating a judgment of investor-expected growth.

## Q. What data for the Electric Group have you conside red in your growth rate analysis?

A. I considered the growth in the financial variables shown on Schedules 8 and 9 , which reflect historical (Schedule 8) and projected (Schedule 9) rates of growth in earnings per share, dividends per share, book value per share, and cash flow per share for the Electric Group. While analysts will review all measures of growth, as I have done, earnings per share growth directly influences the expectations of investors for the future performance of utility stocks. Forecasts of earnings growth are required because the DCF model is forward-looking, and, with the constant price-earnings multiple and constant payout ratio that the DCF model assumes, all other measures of growth will mirror earnings growth. The historical growth rates were obtained from the Value Line publication that provides those data. While

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historical data cannot be ignored, it is much less significant in applying the DCF model than projections of future growth. Investors cannot purchase the past earnings of a utility. To the contrary, they are only entitled to future earnings, which are the focus of growth projections. Furthermore, if significant weight is assigned to historical performance, the historical data are double counted because they are already factored into analysts' forecasts of earnings growth.

## Q. Is a five-ye ar investment horizon as sociated with the analysts' fore casts consistent with the traditional DCF model?

A. Yes, it is. Although the constant form of the DCF model assumes an infinite stream of cash flows, investors do not expect to hold an investment indefinitely. Rather than viewing the DCF in the context of an endless stream of growing dividends (e.g., a century of cash flows), the growth in the share value (i.e., capital appreciation, or capital gains yield) is most relevant to investors' total return expectations. Hence, the sale price of a stock can be viewed as a liquidating dividend that can be discounted along with the annual dividend receipts during the investment-holding period to arrive at the investors' expected return. The growth in the price per share will equal the growth in earnings per share if, as the DCF model assumes, there is no change in the price-earnings ("P-E") multiple. As such, my company-specific growth analysis, which focuses principally upon five-year forecasts of earnings per share growth, conforms with the type of analysis that influences investors' expectations of their actual total return. Moreover, academic research focuses also on five-year growth rates specifically because market outcomes occurring over that investment horizon are what influence stock prices.

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Indeed, if investors required forecasts beyond five years in order to properly value common stocks, then it would be reasonable to expect that some investment advisory service would begin publishing that information for individual stocks in order to meet the demands of the marketplace. The absence of such a publication suggests that there is no market for this information because investors do not require forecasts for an infinite series of future data points in order to make informed decisions to purchase and sell stocks.

## Q. What are the analys ts' forecasts of future growth that you considered?

A. Schedule 9 provides projected earnings per share growth rates taken from analysts' five-year forecasts compiled by IBES/First Call, Zacks, and Value Line. These are all reliable authorities of projected growth that investors use to make buy, sell and hold decisions. The IBES/First Call and Zacks estimates are obtained from the Internet and are widely available to investors. The growth rates reported by IBES/First Call and Zacks are consensus forecasts taken from a survey of analysts that make growth projections for these companies. Notably, First Call's earnings forecasts are frequently quoted in the financial press. The Value Line forecasts also are widely available to investors and can be obtained by subscription or free-ofcharge at most public and collegiate libraries. The IBES/First Call and Zacks forecasts are limited to earnings per share growth, while Value Line makes projections of other financial variables. The Value Line forecasts of dividends per share, book value per share, and cash flow per share for the Electric Group are also included on Schedule 9.
Q. What are the projected growth rates published by the sources you discussed?

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A. Schedule 9 shows the prospective five-year earnings per share growth rates projected for the Electric Group by IBES/First Call (4.94\%), Zacks (4.35\%), and Value Line (5.18\%).

## Q. Are certain growth rate fore casts entitled to greater weight in de veloping a growth rate for use in the DCF model?

A. Yes. While a variety of factors should be examined to reach a reasonable conclusion on the DCF growth rate, growth in earnings per share should receive the greatest emphasis. Growth in earnings per share is the primary determinant of investors' expectations of the total returns they will obtain from stocks because the capital gains yield (i.e., price appreciation) will track earnings growth if the P-E multiple remains constant, as the DCF model assumes. Moreover, earnings per share (derived from net income) are the source of dividend payments and are the primary driver of retention growth and its surrogate, i.e., book value per share growth. As such, under these circumstances, greater emphasis must be placed upon projected earnings per share growth. In fact, Professor Myron Gordon, the foremost proponent of the use of the DCF model in setting utility rates, concluded that the best measure of growth for use in the DCF model is a forecast of earnings per-share growth. ${ }^{6}$ Consistent with Professor Gordon's findings, projections of earnings per share growth, such as those published by IBES/First Call, Zacks, and Value Line, provide the best indication of investor expectations.

## Q. What growth rate do you use in your DCF model?

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#### Abstract

A. The forecasts shown on Schedule 9 for the Electric Group exhibit a range of average earnings per share growth rates from $4.35 \%$ to $5.18 \%$. DCF growth rates should not be established by mathematical formulation, and I have not done so. In my opinion, a growth rate of $5.15 \%$ is a reasonable estimate of investor-expected growth for the Electric Group. This value is within the array of analysts' forecasts of five-year earnings per share growth rates. The reasonableness of this growth rate is also supported by the expected continuation of accelerated electric utility infrastructure spending.


Q. Are the dividend yield and growth components of the DCF adequate to accurately depict the rate of return on common equity when it is used to calculate a utility's weighted ave rage overall cost of capital?
A. The components of the DCF model are adequate for that purpose only if the capital structure ratios are measured by the market value of debt and equity. In the case of the Electric Group, average capital structure ratios are $37.60 \%$ long-term debt, $0.03 \%$ preferred stock, and $62.36 \%$ common equity, as shown on Schedule 10. If book values are used to compute the capital structure ratios, then a leverage adjustment is required.

## Q. What is a leverage adjustment?

A. If a firm's capitalization, as measured by its stock price, diverges from its capitalization, measured at book value, the potential exists for a financial risk difference. Such a risk difference arises because a market-valued capitalization contains more equity and less debt than a book-value capitalization and, therefore, has less risk than the book-value capitalization. A leverage adjustment properly

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accounts for the risk differential between market-value and book-value capital structures.

## Q. Why is a leverage adjustment necessary?

A. In order to make the DCF results relevant to the capitalization measured at book value (as is done for rate setting purposes), the market-derived cost rate must be adjusted to account for this difference in financial risk. The only perspective that is important to investors is the return that they can realize on the market value of their investment. As I have measured the DCF, the simple yield (D/P) plus growth (g) provides a return applicable strictly to the price $(\mathrm{P})$ that an investor is willing to pay for a share of stock. The need for the leverage adjustment arises when the results of the DCF model (k) are to be applied to a capital structure that is different from the capital structure indicated by the market price (P). From the market perspective, the financial risk of the Electric Group is accurately measured by the capital structure ratios calculated from the market-valued capitalization of a firm. If the rate setting process utilized the market capitalization ratios, then no additional analysis or adjustment would be required, and the simple yield (D/P) plus growth (g) components of the DCF would satisfy the financial risk associated with the market value of the equity capitalization. Because the rate-setting process uses ratios calculated from a firm's book value capitalization, further analysis is required to synchronize the financial risk of the book capitalization with the required return on the book value of the firm's equity. This adjustment is developed through precise mathematical calculations, using well recognized analytical procedures that are widely accepted in the financial literature. To arrive at that return, the rate of return

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on common equity is the unleveraged cost of capital (or equity return at $100 \%$ equity) plus one or more terms reflecting the increase in financial risk resulting from the use of leverage in the capital structure. The calculations presented in the lower panel of data shown on Schedule 10, under the heading "M\&M," provides a return of $7.31 \%$ when applicable to a capital structure with $100 \%$ common equity.

## Q. Are there specific factors that influence market-to-book ratios that determine whe ther the leverage adjustment should be made?

A. No. The leverage adjustment is not intended, nor was it designed, to address the reasons that stock prices vary from book value. Hence, any observations concerning market prices relative to book are not on point. The leverage adjustment deals with the issue of financial risk and does not transform the DCF result to a book value return through a market-to-book adjustment. Again, the leverage adjustment that I propose is based on the fundamental financial precept that the cost of equity is equal to the rate of return for an unleveraged firm (i.e., where the overall rate of return equates to the cost of equity with a capital structure that contains $100 \%$ equity) plus the additional return required for introducing debt and/or preferred stock leverage into the capital structure.

Further, as noted previously, the relatively high market prices of utility stocks cannot be attributed solely to the notion that these companies are expected to earn a return on the book value of equity that differs from their cost of equity determined from stock market prices. Stock prices above book value are common for utility stocks, and indeed the stock prices of non-regulated companies exceed book values by even greater margins. It is difficult to accept that the vast majority

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of all firms operating in our economy are generating returns far in excess of their cost of capital. Certainly, in our free-market economy, competition should contain such "excesses" if they actually existed.

Finally, the leverage adjustment adds stability to the final DCF cost rate. That is to say, as the market capitalization increases relative to its book value, the leverage adjustment increases while the simple yield (D/P) plus growth (g) result declines. The reverse is also true: when the market capitalization declines, the leverage adjustment also declines as the simple yield (D/P) plus growth (g) result increases.
Q. Is the leverage adjustment that you propose designed to transform the market return into one that is designed to produce a particular market-to-book ratio?
A. No, it is not. What I label a "leverage adjustment" is merely a convenient way of showing the amount that must be added to (or subtracted from) the result of the simple DCF model (i.e., $\mathrm{D} / \mathrm{P}+\mathrm{g}$ ) when the DCF return applies to a capital structure used for ratemaking that is computed with book-value weighting rather than market-value weighting. Although I specify a separate factor, which I call the leverage adjustment, there is no need to do so other than to identify this factor. If I expressed my return solely in the context of the book value weighting that we use to calculate the weighted average cost of capital and ignore the familiar $\mathrm{D} / \mathrm{P}+\mathrm{g}$ expression entirely, then a separate element in the DCF cost of equity determination would not be needed to reflect the differential in financial leverage between a market-value and book-value capitalization. As shown in the bottom panel of data on Schedule 10, the equity return applicable to the book value common equity ratio

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is equal to $7.31 \%$, which is the return for the Electric Group appropriate for a capital structure with no debt (i.e., a $100 \%$ equity ratio) plus $3.20 \%$ to compensate investors for the risk of a $52.07 \%$ debt ratio and $0.01 \%$ associated with the $0.22 \%$ preferred stock ratio. Under this approach, the parts sum to $10.52 \%(7.31 \%+$ $3.20 \%+0.01 \%$ ), and there is no need to even address the cost of equity in terms of $\mathrm{D} / \mathrm{P}+\mathrm{g}$. To express this same return in the context of the familiar DCF model, I summed the $3.91 \%$ dividend yield, the $5.15 \%$ growth rate, and $1.46 \%$ for the leverage adjustment in order to arrive at the same $10.52 \%(3.91 \%+5.15 \%+$ $1.46 \%$ ) return. I know of no means to mathematically solve for the $1.46 \%$ leverage adjustment by expressing it in the terms of any particular relationship of market price to book value. The $1.46 \%$ adjustment is merely a convenient way to compare the $10.52 \%$ return computed using the Modigliani \& Miller formulas to the $9.06 \%$ return generated by the DCF model (i.e., $\mathrm{D}_{1} / \mathrm{P}_{0}+\mathrm{g}$, or the traditional form of the DCF shown on Schedule 7, page 1) based on a market-value capital structure. A $9.06 \%$ return assigned to anything other than the market value of equity cannot equate to a reasonable return on book value that has higher financial risk. My point is that when we use a market-determined cost of equity developed from the DCF model, it reflects a level of financial risk that is different (in this case, lower) from the capital structure stated at book value. This process has nothing to do with targeting any particular market-to-book ratio.

## Q. Please provide the DCF return based upon your preceding discussion of divide nd yield, growth, and leverage.

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A. As explained previously, I have utilized a six-month average dividend yield ( $\mathrm{D}_{1 /} \mathrm{P}_{0}$ ") adjusted in a forward-looking manner for my DCF calculation. This dividend yield is used in conjunction with the growth rate ("g") previously developed. The DCF also includes the leverage modification ("lev.") required when the book value equity ratio is used in determining the weighted average cost of capital in the rate-setting process rather than the market value equity ratio related to the price of stock. The resulting DCF cost rate is $10.52 \%$, computed as follows:

$$
\begin{array}{rllll}
D_{1} / P_{0}+g & +l e v . & = & K \\
\text { Electric Group } & 3.91 \%+5.15 \% & +1.46 \% & = & 10.52 \%
\end{array}
$$

The DCF result shown above represents the simplified (i.e., Gordon) form of the model that contains a constant-growth assumption. I should reiterate, however, that the DCF-indicated cost rate provides an explanation of the rate of return on common stock market prices without regard to the prospect of a change in the priceearnings multiple. An assumption that there will be no change in the price-earnings multiple is not supported by the realities of the equity market because priceearnings multiples do not remain constant. This is one of the constraints of this model that makes it important to consider the results of other models when determining a company's cost of equity. In fact, the DCF result is clearly understated if it is viewed without the leverage adjustment when compared to the results of other models of the cost of equity. Indeed, the Commission has often referenced other models of the cost of equity when deciding the rate of return in rate

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cases. And when it sets the equity return in the DSIC proceedings, the DSIC return today significantly exceeds the simple yield plus growth formulation of the DCF.

## RISK PREMIUM ANALYSIS

## Q. Please describe your use of the risk premium approach to determine the cost of equity.

A. With the Risk Premium approach, the cost of equity capital is determined by corporate bond yields plus a premium to account for the fact that common equity is exposed to greater investment risk than debt capital. The result of my Risk Premium study is shown on Schedule 1, page 2. That result is $10.10 \%$.
Q. What long-term public utility debt cost rate did you use in your risk premium analysis?
A. In my opinion, and as I will explain in more detail further in my testimony, a 3.35\% yield represents a reasonable estimate of the prospective yield on long-term A-rated public utility bonds.
Q. What historical data are shown by the Moody's data?
A. I have analyzed the historical yields on the Moody's index of long-term public utility debt as shown on Schedule 11, page 1. For the twelve months ended December 2020, the average monthly yield on Moody's index of A-rated public utility bonds was $3.02 \%$. For the six and three-month periods ended December 2020, the yields were $2.81 \%$ and $2.86 \%$, respectively. During the twelve-months ended December 2020, the range of the yields on A-rated public utility bonds was $2.73 \%$ to $3.50 \%$. Page 2 of Schedule 11 shows the long-run spread in yields between A-rated public utility bonds and long-term Treasury bonds. As shown on

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page 3 of Schedule 11, the yields on A-rated public utility bonds have exceeded those on Treasury bonds by $1.45 \%$ on a twelve-month average basis, $1.32 \%$ on a six-month average basis, and $1.24 \%$ on a three-month average basis. Giving greater emphasis to the three-month average spread, which reflects the downtrend, $1.25 \%$ represents a reasonable spread for the yield on A-rated public utility bonds over Treasury bonds.

## Q. What forecasts of interest rates have you considered in your analysis?

A. I have determined the prospective yield on A-rated public utility debt by using the Blue Chip Financial Forecasts ("Blue Chip") along with the spread in the yields that I describe below. Blue Chip is a reliable authority and contains consensus forecasts of a variety of interest rates compiled from a panel of banking, brokerage, and investment advisory services. In early 1999, Blue Chip stopped publishing forecasts of yields on A-rated public utility bonds because the Federal Reserve deleted these yields from its Statistical Release H.15. To independently project a forecast of the yields on A-rated public utility bonds, I have combined the forecast yields on long-term Treasury bonds published on January 1, 2021, and a yield spread of $1.25 \%$, derived from historical data. I should note that after these data were assembled, there was a runup of yields on long-term Treasury bonds beginning in mid-February 2021.

## Q. How have you used these data to project the yield on A-rated public utility bonds for the purpose of your Risk Premium analyses?

A. Shown below is my calculation of the prospective yield on A-rated public utility bonds using the building blocks discussed above, i.e., the Blue Chip forecast of

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1

2

| Year | Quarter | Blue Chip Financial Forecasts |  |  | A-rated Public Utility |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Corporate |  | 30-Year <br> Treasury |  |  |
|  |  | Aaa-rated | Baa-rated |  | Spread | Yield |
| 2021 | First | 2.5\% | 3.5\% | 1.7\% | 1.25\% | 2.95\% |
| 2021 | Second | 2.5\% | 3.6\% | 1.8\% | 1.25\% | 3.05\% |
| 2021 | Third | 2.6\% | 3.7\% | 1.9\% | 1.25\% | 3.15\% |
| 2021 | Fourth | 2.7\% | 3.8\% | 2.0\% | 1.25\% | 3.25\% |
| 2022 | First | 2.8\% | 3.8\% | 2.1\% | 1.25\% | 3.35\% |
| 2022 | Second | 2.8\% | 3.8\% | 2.1\% | 1.25\% | 3.35\% |

Treasury bond yields and the public utility bond yield spread. For comparative purposes, I also have shown the Blue Chip forecasts of Aaa-rated and Baa-rated corporate bonds. These forecasts are:

## Blue Chip Financial Forecasts

Q. Are the re additional forecasts of interest rates that extend be yond those shown above?
A. Yes. Twice yearly, Blue Chip provides long-term forecasts of interest rates. In its December 1, 2020 publication, Blue Chip published longer-term forecasts of interest rates, which were reported to be:

| Averages | Blue Chip Financial Forecasts |  |  |
| :---: | :---: | :---: | :---: |
|  | Corporate |  | 30-Year |
|  | Aaa-rated | Baa-rated | Treasury |
| 2022-2026 | 3.6\% | 4.6\% | 2.8\% |
| 2027-2031 | 4.5\% | 5.4\% | 3.6\% |

The longer-term forecasts by Blue Chip suggest that interest rates will move up from the levels revealed by the near-term forecasts. A 3.35\% yield on A-rated public utility bonds represents a reasonable benchmark for measuring the cost of equity in this case. All the data I used to formulate my conclusion as to a

## DIRECT TESTIMONY OF PAUL R. MOUL

prospective yield on A-rated public utility debt are available to investors, who regularly rely upon those data to make investment decisions.

## Q. What equity risk premium have you determined for public utilities?

A. To develop an appropriate equity risk premium, I analyzed the results from $\underline{2020}$ SBBI Yearbook, Stocks, Bonds, Bills and Inflation. My investigation reveals that the equity risk premium varies according to the level of interest rates. That is to say, the equity risk premium increases as interest rates decline, and it declines as interest rates increase. This inverse relationship is revealed by the summary data presented below and shown on Schedule 12, page 1.

Common Equity Risk Premiums

| Low Interest Rates | $6.70 \%$ |
| :--- | :--- |
| Average Across All Interest Rates | $5.69 \%$ |
| High Interest Rates | $4.69 \%$ |

Based on my analysis of the historical data, the equity risk premium was $6.70 \%$ when the marginal cost of long-term government bonds was low (i.e., $2.88 \%$, which was the average yield during periods of low rates). Conversely, when the yield on long-term government bonds was high (i.e., $7.09 \%$ on average during periods of high interest rates), the spread narrowed to $4.69 \%$. Over the entire spectrum of interest rates, the equity risk premium was $5.69 \%$ when the average government bond yield was $4.99 \%$. I have utilized a $6.75 \%$ equity risk premium. The equity risk premium of $6.75 \%$ that I employed is near the risk premiums associated with low interest rates.

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Q. What common equity cost rate did you determine based on your risk premium analysis?
A. The cost of equity (i.e., " $k$ ") is represented by the sum of the prospective yield for long-term public utility debt (i.e., "i"), and the equity risk premium (i.e., "RP"). The Risk Premium approach provides a cost of equity of $10.10 \%$, computed as follows:

$$
\begin{array}{rr}
i & +R P=k \\
\text { Electric Group } 3.35 \% & +6.75 \%
\end{array}
$$

## CAPITAL ASSET PRICING MODEL

## Q. How is the CAPM used to measure the cost of equity?

A. The CAPM uses the yield on a risk-free interest-bearing obligation plus a rate of return premium that is proportional to the systematic risk of an investment. As shown on page 2 of Schedule 1, the result of the CAPM is $12.54 \%$ for the Electric Group. To compute the cost of equity with the CAPM, three components are necessary: a risk-free rate of return ("Rf"), the beta measure of systematic risk (" $\beta$ "), and the market risk premium ("Rm-Rf") derived from the total return on the market of equities reduced by the risk-free rate of return. The CAPM specifically accounts for differences in systematic risk (i.e., market risk as measured by the beta) between an individual firm or group of firms and the entire market of equities.

## Q. What betas have you considered in the CAPM?

A. For my CAPM analysis, I initially considered the Value Line betas. As shown on page 2 of Schedule 3, the average beta is 0.88 for the Electric Group.

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## Q. Did you use the Value Line betas in the CAPM determine d cost of equity?

A. I used the Value Line betas as a foundation for the leverage adjusted betas that I used in the CAPM. The betas must be reflective of the financial risk associated with the rate-setting capital structure that is measured at book value. Therefore, Value Line betas cannot be used directly in the CAPM, unless the cost rate developed using those betas is applied to a capital structure measured with market values. To develop a CAPM cost rate applicable to a book-value capital structure, the Value Line (market value) betas have been unleveraged and re-leveraged for the book value common equity ratios using the Hamada formula, ${ }^{7}$ as follows:

$$
\beta l=\beta u[1+(1-t) D / E+P / E]
$$

where $\beta 1=$ the leveraged beta, $\beta u=$ the unleveraged beta, $t=$ income tax rate, $D=$ debt ratio, $\mathrm{P}=$ preferred stock ratio, and $\mathrm{E}=$ common equity ratio. The betas published by Value Line have been calculated with the market price of stock and are related to the market value capitalization. By using the formula shown above and the capital structure ratios measured at market value, the beta would become 0.63 for the Electric Group if it employed no leverage and was $100 \%$ equity financed. Those calculations are shown on Schedule 10 under the section labeled "Hamada," who is credited with developing those formulas. With the unleveraged beta as a base, I calculated the leveraged beta of 1.08 for the book value capital structure of the Electric Group.

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## Q. What risk-free rate have you used in the CAPM?

A. As shown on page 1 of Schedule 13, I provided the historical yields on Treasury notes and bonds. For the twelve months ended December 2020, the average yield on 30 -year Treasury bonds was $1.56 \%$. For the six- and three-months ended December 2020, the yields on 30-year Treasury bonds were $1.49 \%$ and $1.62 \%$, respectively. During the twelve-months ended December 2020, the range of the yields on 30 -year Treasury bonds was $1.27 \%$ to $2.22 \%$. The low yields that existed during recent years can be traced to weakness in business fixed investment and exports due in part to the U.S.'s trade war with China. Thereafter, extraordinary events associated with the COVID-19 pandemic induced significant turmoil that jolted the capital markets in the February-May 2020 time frame. During this period, we saw abrupt reaction to the coronavirus pandemic and significant declines in the price of crude oil. These events led to the end of the record-setting 128month economic expansion. As the recession unfolded in February 2020, the Federal Open Market Committee ("FOMC") acted to address these disruptions. Presently, the Fed Funds rate is near zero. The FOMC continues to support the money and capital markets during the coronavirus pandemic.

As shown on page 2 of Schedule 13, forecasts published by Blue Chip on January 1, 2021 indicate that the yields on long-term Treasury bonds are expected to be in the range of $1.7 \%$ to $2.1 \%$ during the next six quarters. The forecast for the FPFTY is $2.1 \%$ for 30 -year Treasury Bonds. The longer-term forecasts described previously show that the yields on 30-year Treasury bonds will average $2.8 \%$ from 2022 through 2026 and $3.6 \%$ from 2027 to 2031. For the reasons explained

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previously, forecasts of interest rates should be emphasized at this time in selecting the risk-free rate of return in CAPM. Hence, I have used a $2.10 \%$ risk-free rate of return for CAPM purposes, which considers the Blue Chip forecasts and the trend toward higher Treasury yields that developed in mid-February 2021.

## Q. What market premium have you used in the CAPM?

A. As shown in the lower panel of data presented on Schedule 13, page 2 the market premium is derived from historical data and the forecast returns. For the historically based market premium, I have used the arithmetic mean obtained from the data presented on Schedule 12, page 1. On that schedule, the market return was $11.92 \%$ on large stocks during periods of low interest rates. During those periods, the yield on long-term government bonds was $2.88 \%$ when interest rates were low. As such, I carried over to Schedule 13, page 2, the average large common stock returns of $11.92 \%$ and the average yield on long-term government bonds of $2.88 \%$. The resulting market premium is $9.04 \%(11.92 \%-2.88 \%)$ based on historical data, as shown on Schedule 13, page 2. As also shown on Schedule 13, page 2, I calculated the forecast returns, which show a $10.50 \%$ total market return. With this forecast, I calculated a market premium of $8.40 \%$ ( $10.50 \%-2.10 \%$ ) using forecast data. The resulting market premium applicable to the CAPM derived from these sources equals $8.72 \%(8.40 \%+9.04 \%=17.44 \% \div 2)$.

## Q. Are the re adjustments to the CAPM that are necessary to fully reflect the rate of return on common equity?

A. Yes. The technical literature supports an adjustment relating to the size of the company or portfolio for which the calculation is performed. As the size of a firm

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decreases, its risk and required return increases. Moreover, in his discussion of the cost of capital, Professor Brigham has indicated that smaller firms have higher capital costs than otherwise similar larger firms. Also, the Fama/French study (see "The Cross-Section of Expected Stock Returns"; The Journal of Finance, June 1992) established that the size of a firm helps explain stock returns. In an October 15, 1995 article in Public Utility Fortnightly, entitled "Equity and the Small-Stock Effect," it was demonstrated that the CAPM could understate the cost of equity significantly according to a company's size. Indeed, it was demonstrated in the SBBI Yearbook that the returns for stocks in lower deciles (i.e., smaller stocks) had returns in excess of those shown by the simple CAPM. As noted previously, Duquesne Light is relatively smaller than the Electric Group. To recognize this fact, I used the mid-cap adjustment of $1.02 \%$, as revealed on page 3 of Schedule 13, for the CAPM calculation.

## Q. What does your CAPM analysis show?

A. Using the $2.10 \%$ risk-free rate of return, the leverage adjusted beta of 1.08 for the Electric Group, the $8.72 \%$ market premium, and the $1.02 \%$ size adjustment, the following result is indicated.

$$
R f+\beta x(R m-R f)+\text { size }=k
$$

Electric Group $2.10 \%+1.08 \times(8.72 \%)+1.02 \%=12.54 \%$

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## COMPARABLE EARNINGS APPROACH

## Q. What is the Comparable Earnings approach?

A. The Comparable Earnings approach estimates a fair return on equity by comparing returns realized by non-regulated companies to returns that a public utility with similar risks characteristics would need to realize in order to compete for capital. Because regulation is a substitute for competitively determined prices, the returns realized by non-regulated firms with comparable risks to a public utility provide useful insight into investor expectations for public utility returns. The firms selected for the Comparable Earnings approach should be companies whose prices are not subject to cost-based price ceilings (i.e., non-regulated firms) so that circularity is avoided.

There are two avenues available to implement the Comparable Earnings approach. One method involves the selection of another industry (or industries) with comparable risks to the public utility in question, and the results for all companies within that industry serve as a benchmark. The second approach requires the selection of parameters that represent similar risk traits for the public utility and the comparable risk companies. Using this approach, the business lines of the comparable companies become unimportant. The latter approach is preferable with the further qualification that the comparable risk companies exclude regulated firms in order to avoid the circular reasoning implicit in the use of the achieved earnings/book ratios of other regulated firms. The United States Supreme Court has held that:

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> A public utility is entitled to such rates as will permit it to earn a return on the value of the property which it employs for the convenience of the public equal to that generally being made at the same time and in the same general part of the country on investments in other business undertakings which are attended by corresponding risks and uncertainties. The return should be reasonably sufficient to assure confidence in the financial soundness of the utility and should be adequate, under efficient and economical management, to maintain and support its credit and enable it to raise the money necessary for the proper discharge of its public duties. Bluefield Water Works vs. Public Service Commission, 262 U.S. 668 (1923).

It is important to identify the returns earned by firms that compete for capital with a public utility. This can be accomplished by analyzing the returns of non-regulated firms that are subject to the competitive forces of the marketplace.
Q. Did you compare the results of your DCF and CAPM analyses to the results indicated by a Comparable Earnings approach?
A. Yes. I selected companies from The Value Line Investment Survey for Windows that have six categories of comparability designed to reflect the risk of the Electric Group. These screening criteria were based upon the range as defined by the rankings of the companies in the Electric Group. The items considered were:

Timeliness Rank, Safety Rank, Financial Strength, Price Stability, Value Line betas, and Technical Rank. The definition for these parameters is provided on Schedule 14, page 3. The identities of the companies comprising the Comparable Earnings group and their associated rankings within the ranges are identified on Schedule 14, page 1.

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I relied upon Value Line data because they provide a comprehensive basis for evaluating the risks of the comparable firms. As to the returns calculated by Value Line for these companies, there is some downward bias in the figures shown on Schedule 14, page 2, because Value Line computes the returns on year-end rather than average book value. If average book values had been employed, the rates of return would have been slightly higher. Nevertheless, these are the returns considered by investors when taking positions in these stocks. Because many of the comparability factors, as well as the published returns, are used by investors in selecting stocks, and the fact that investors rely on the Value Line service to gauge returns, it is an appropriate database for measuring comparable return opportunities.

## Q. What data did you consider in your Comparable Earnings analysis?

A. I used both historical realized returns and forecasted returns for non-utility companies. As noted previously, I have not used returns for utility companies in order to avoid the circularity that arises from using regulatory-influenced returns to determine a regulated return. It is appropriate to consider a relatively long measurement period in the Comparable Earnings approach in order to cover conditions over an entire business cycle. A ten-year period (five historical years and five projected years) is sufficient to cover an average business cycle. Unlike the DCF and CAPM, the results of the Comparable Earnings method can be applied directly to the book value capitalization. In other words, the Comparable Earnings approach does not contain the potential misspecification contained in market models when the market capitalization and book value capitalization diverge significantly. A point of demarcation was chosen to eliminate the results of highly

## DIRECT TESTIMONY OF PAUL R. MOUL

profitable enterprises, which the Bluefield case stated were not the type of returns that a utility was entitled to earn. For this purpose, I used $20 \%$ as the point where those returns could be viewed as highly profitable and should be excluded from the Comparable Earnings approach. The average historical rate of return on book common equity was $12.2 \%$ using only the returns that were less than $20 \%$, as shown on Schedule 14, page 2. The average forecasted rate of return as published by Value Line is $13.0 \%$ also using values less than $20 \%$, as provided on Schedule 14, page 2. Using the average of these data my Comparable Earnings result is $12.60 \%$, as shown on Schedule 1, page 2.

## CONCLUSION ON COST OF EQUITY

## Q. What is your conclusion regarding the Company's cost of common equity?

A. Based upon the application of a variety of methods and models described previously, it is my opinion that a reasonable rate of return on common equity is $10.95 \%$ for Duquesne Light. My cost of equity recommendation is obtained from a range of the market based models (i.e., $10.10 \%$ to $12.54 \%$ ) and should be considered in the context of the Company's risk characteristics, as well as the general condition of the capital markets. Indeed, as the economy recovers from the pandemic-induced recession, business activity will increase, which will place upward pressure on interest rates. It is essential that the Commission employ a variety of techniques to measure the Company's cost of equity because of the limitations/infirmities that are inherent in each method.

## Q. Does this complete your direct testimony?

## DIRECT TESTIMONY OF PAUL R. MOUL

1 A. Yes. However, I reserve the right to supplement my testimony, if necessary, and to respond to witnesses presented by other parties.

# APPENDIX A TO DIRECT TESTIMONY OF PAUL R. MOUL EDUCATIONAL BACKGROUND, B USINESS EXPERIENCE AND QUALIFICATIONS 

I was awarded a degree of Bachelor of Science in Business Administration by Drexel University in 1971. While at Drexel, I participated in the Cooperative Education Program which included employment, for one year, with American Water Works Service Company, Inc., as an internal auditor, where I was involved in the audits of several operating water companies of the American Water Works System and participated in the preparation of annual reports to regulatory agencies and assisted in other general accounting matters.

Upon graduation from Drexel University, I was employed by American Water Works Service Company, Inc., in the Eastern Regional Treasury Department where my duties included preparation of rate case exhibits for submission to regulatory agencies, as well as responsibility for various treasury functions of the thirteen New England operating subsidiaries.

In 1973, I joined the Municipal Financial Services Department of Betz Environmental Engineers, a consulting engineering firm, where I specialized in financial studies for municipal water and wastewater systems.

In 1974, I joined Associated Utility Services, Inc., now known as AUS Consultants. I held various positions with the Utility Services Group of AUS Consultants, concluding my employment there as a Senior Vice President.

In 1994, I formed P. Moul \& Associates, an independent financial and regulatory consulting firm. In my capacity as Managing Consultant and for the past twenty-nine years, I have continuously studied the rate of return requirements for cost of service-

## APPENDIX A TO DIRECT TESTIMONY OF PAUL R. MOUL

regulated firms. In this regard, I have supervised the preparation of rate of return studies, which were employed, in connection with my testimony and in the past for other individuals. I have presented direct testimony on the subject of fair rate of return, evaluated rate of return testimony of other witnesses, and presented rebuttal testimony.

My studies and prepared direct testimony have been presented before thirty-seven (37) federal, state and municipal regulatory commissions, consisting of: the Federal Energy Regulatory Commission; state public utility commissions in Alabama, Alaska, California, Colorado, Connecticut, Delaware, Florida, Georgia, Hawaii, Illinois, Indiana, Iowa, Kentucky, Louisiana, Maine, Maryland, Massachusetts, Michigan, Minnesota, Missouri, New Hampshire, New Jersey, New York, North Carolina, Ohio, Oklahoma, Pennsylvania, Rhode Island, South Carolina, Tennessee, Texas, Virginia, West Virginia, Wisconsin, and the Philadelphia Gas Commission, and the Texas Commission on Environmental Quality. My testimony has been offered in over 200 rate cases involving electric power, natural gas distribution and transmission, resource recovery, solid waste collection and disposal, telephone, wastewater, and water service utility companies. While my testimony has involved principally fair rate of return and financial matters, I have also testified on capital allocations, capital recovery, cash working capital, income taxes, factoring of accounts receivable, and take-or-pay expense recovery. My testimony has been offered on behalf of municipal and investor-owned public utilities and for the staff of a regulatory commission. I have also testified at an Executive Session of the State of New Jersey Commission of Investigation concerning the BPU regulation of solid waste collection and disposal.

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I was a co-author of a verified statement submitted to the Interstate Commerce Commission concerning the 1983 Railroad Cost of Capital (Ex Parte No. 452). I was also co-author of comments submitted to the Federal Energy Regulatory Commission regarding the Generic Determination of Rate of Return on Common Equity for Public Utilities in 1985, 1986 and 1987 (Docket Nos. RM85-19-000, RM86-12-000, RM87-35000 and RM88-25-000). Further, I have been the consultant to the New York Chapter of the National Association of Water Companies, which represented the water utility group in the Proceeding on Motion of the Commission to Consider Financial Regulatory Policies for New York Utilities (Case 91-M-0509). I have also submitted comments to the Federal Energy Regulatory Commission in its Notice of Proposed Rulemaking (Docket No. RM99-2-000) concerning Regional Transmission Organizations and on behalf of the Edison Electric Institute in its intervention in the case of Southern California Edison Company (Docket No. ER97-2355-000). Also, I was a member of the panel of participants at the Technical Conference in Docket No. PL07-2 on the Composition of Proxy Groups for Determining Gas and Oil Pipeline Return on Equity.

In late 1978, I arranged for the private placement of bonds on behalf of an investor-owned public utility. I have assisted in the preparation of a report to the Delaware Public Service Commission relative to the operations of the Lincoln and Ellendale Electric Company. I was also engaged by the Delaware P.S.C. to review and report on the proposed financing and disposition of certain assets of Sussex Shores Water Company (P.S.C. Docket Nos. 24-79 and 47-79). I was a co-author of a Report on Proposed Mandatory Solid Waste Collection Ordinance prepared for the Board of County Commissioners of Collier County, Florida.

## APPENDIX A TO DIRECT TESTIMONY OF PAUL R. MOUL

I have been a consultant to the Bucks County Water and Sewer Authority concerning rates and charges for wholesale contract service with the City of Philadelphia. My municipal consulting experience also included an assignment for Baltimore County, Maryland, regarding the City/County Water Agreement for Metropolitan District customers (Circuit Court for Baltimore County in Case 34/153/87-CSP-2636).

# DUQUESNE LIGHT COMPANY 

EXHIBIT<br>TO ACCOMPANY<br>THE DIRECT TESTIMONY<br>OF<br>PAUL R. MOUL<br>CONCERNING<br>RATE OF RETURN

## Duquesne Light Company Index of Schedules

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## Duquesne Light Company

Proposed Rate of Return
Estimated at December 31, 2022

| Type of Capital |  |  | $\begin{array}{c}\text { Cost } \\ \text { Rate }\end{array}$ |  |
| :--- | ---: | :--- | ---: | :--- | \(\left.\begin{array}{c}Weighted <br>

Cost <br>
Rate\end{array}\right]\)

Indicated levels of fixed charge coverage assuming that
the Company could actually achieve its proposed rate of return:

Pre-tax coverage of interest expense based upon a 28.8921\% composite federal and state income tax rate ( $10.21 \% \div 2.00 \%$ )

Post-tax coverage of interest expense

$$
(7.84 \% \div 2.00 \%) \quad 3.92 \times
$$

## Duquesne Light Company

## Cost of Equity

as of December 31, 2020


| Duquesne Light Company Capitalization and Financial Statistics 2015-2019, Inclusive |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2019 | 2018 | 2017 | 2016 | 2015 |  |
|  |  |  | (Millions of Dollars) |  |  |  |
| Amount of Capital Employed |  |  |  |  |  |  |
| Permanent Capital | \$ 2,589.0 | \$ 2,498.1 | \$ 2,352.4 | \$ 2,236.0 | \$ 2,207.3 |  |
| Short-Term Debt | \$ - | \$ | \$ | \$ - | \$ - |  |
| Total Capital | \$2,589.0 | \$2,498.1 | \$ 2,352.4 | \$2,236.0 | \$2,207.3 |  |
|  |  |  |  |  |  | Average |
| Capital Structure Ratios |  |  |  |  |  |  |
| Based on Permanent Capital: |  |  |  |  |  |  |
| Long-Term Debt | 45.1\% | 48.5\% | 48.5\% | 46.0\% | 46.5\% | 46.9\% |
| Preferred Stock | 0.0\% | 0.0\% | 0.0\% | 1.5\% | 1.5\% | 0.6\% |
| Common Equity | 54.9\% | 51.5\% | 51.5\% | 52.5\% | 52.0\% | 52.5\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Based on Total Capital: |  |  |  |  |  |  |
| Total Debt, incl. Short Term | 45.1\% | 48.5\% | 48.5\% | 46.0\% | 46.5\% | 46.9\% |
| Preferred Stock | 0.0\% | 0.0\% | 0.0\% | 1.5\% | 1.5\% | 0.6\% |
| Common Equity | 54.9\% | 51.5\% | 51.5\% | 52.5\% | 52.0\% | 52.5\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Rate of Return on Book Common Equity | 13.6\% | 12.2\% | 10.7\% | 10.1\% | 10.3\% | 11.4\% |
| Operating Ratio (1) | 70.5\% | 73.6\% | 71.2\% | 73.6\% | 72.8\% | 72.3\% |
| Coverage incl. AFUDC (2) |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 5.26 x | 4.38 x | 5.36 x | 5.03 x | 4.59 x | 4.92 x |
| Post-tax: All Interest Charges | 4.38 x | 3.73 x | 3.62 x | 3.43 x | 3.12 x | 3.66 x |
| Overall Coverage: All Int. \& Pfd. Div. | 4.38 x | 3.73 x | 3.46 x | 3.34 x | 2.89 x | 3.56 x |
| Coverage excl. AFUDC (3) |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 5.26 x | 4.38 x | 5.36 x | 5.03 x | 4.59 x | 4.92 x |
| Post-tax: All Interest Charges | 4.38 x | 3.73 x | 3.62 x | 3.43 x | 3.12 x | 3.66 x |
| Overall Coverage: All Int. \& Pfd. Div. | 4.38 x | 3.73 x | 3.46 x | 3.34 x | 2.89 x | 3.56 x |
| Quality of Earnings \& Cash Flow |  |  |  |  |  |  |
| AFC/Income Avail. for Common Equity | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% |
| Effective Income Tax Rate | 20.7\% | 19.4\% | 39.9\% | 39.7\% | 41.0\% | 32.1\% |
| Internal Cash Generation/Construction (4) | 92.6\% | 71.4\% | 60.1\% | 98.6\% | 77.1\% | 80.0\% |
| Gross Cash Flow/ Avg. Total Debt(5) | 29.4\% | 27.6\% | 23.8\% | 33.1\% | 29.8\% | 28.7\% |
| Gross Cash Flow Interest Coverage(6) | 7.42 x | 6.75 x | 6.15 x | 7.94 x | 5.88 x | 6.83 x |
| Common Dividend Coverage (7) | 6.97 x | 4.15 x | 2.89 x | 3.72 x | 3.04 x | 4.15 x |

See Page 2 for Notes.

Duquesne Light Company
Capitalization and Financial Statistics
2015-2019, Inclusive
Notes:
(1) Total operating expenses, maintenance, depreciation and taxes other than income as a percentage of operating revenues.
(2) Coverage calculations represent the number of times available earnings including AFUDC (allowance for funds used during construction), as reported in its entirety, cover fixed charges.
(3) Coverage calculations represent the number of times available earnings excluding AFUDC (allowance for funds used during construction), as reported in its entirety, cover fixed charges.
(4) Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally generated funds from operations after payment of all cash dividends.
(5) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less AFUDC) as a percentage of average total debt.
(6) Gross Cash Flow plus interest charges divided by interest charges.
(7) Common dividend coverage is the relationship of internally generated funds from operations after payment of preferred stock dividends to common dividends paid.

Source of Information: Company provided data

Electric Group
Capitalization and Financial Statistics ${ }^{(1)}$ 2015-2019, Inclusive

|  | 2019 | 2018 | 2017 | 2016 | 2015 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Amount of Capital Employed |  |  |  |  |  |  |
| Permanent Capital | \$ 41,223.1 | \$ 37,589.8 | \$ 35,582.8 | \$ 33,139.8 | \$ 31,162.5 |  |
| Short-Term Debt | \$ 1,257.6 | \$ 1,754.9 | \$ 865.8 | \$ 960.4 | \$ 988.5 |  |
| Total Capital | \$ 42,480.7 | \$ 39,344.7 | \$ 36,448.6 | \$ 34,100.2 | \$ 32,151.0 |  |
| Market-Based Financial Ratios |  |  |  |  |  | Average |
| Price-Earnings Multiple | $21 \times$ | 20 x | 20 x | 21 x | 19 x | 20 x |
| Market/Book Ratio | 209.6\% | 194.7\% | 198.5\% | 175.8\% | 156.5\% | 187.0\% |
| Dividend Yield | 3.3\% | 3.6\% | 3.5\% | 3.7\% | 3.4\% | 3.5\% |
| Dividend Payout Ratio | 67.9\% | 72.4\% | 67.1\% | 74.1\% | 59.5\% | 68.2\% |
| Capital Structure Ratios |  |  |  |  |  |  |
| Based on Permanent Captial: |  |  |  |  |  |  |
| Long-Term Debt | 50.6\% | 49.5\% | 50.6\% | 49.3\% | 46.9\% | 49.4\% |
| Preferred Stock | 1.3\% | 1.0\% | 0.6\% | 0.5\% | 0.4\% | 0.8\% |
| Common Equity ${ }^{(2)}$ | 48.1\% | 49.5\% | 48.9\% | 50.2\% | 52.7\% | 49.8\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Based on Total Capital: |  |  |  |  |  |  |
| Total Debt incl. Short Term | 51.8\% | 51.3\% | 52.1\% | 50.6\% | 48.5\% | 50.9\% |
| Preferred Stock | 1.3\% | 1.0\% | 0.5\% | 0.5\% | 0.4\% | 0.7\% |
| Common Equity ${ }^{(2)}$ | 46.9\% | 47.7\% | 47.4\% | 49.0\% | 51.1\% | 48.4\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Rate of Return on Book Common Equity ${ }^{(2)}$ | 9.5\% | 10.2\% | 10.5\% | 8.6\% | 8.8\% | 9.5\% |
| Operating Ratio ${ }^{(3)}$ | 78.9\% | 78.5\% | 75.5\% | 77.3\% | 78.4\% | 77.7\% |
| Coverage incl. AFUDC ${ }^{(4)}$ |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 3.43 x | 3.88 x | 3.88 x | 4.17 x | 4.11 x | 3.89 x |
| Post-tax: All Interest Charges | 3.02 x | 3.28 x | 3.55 x | 3.12 x | 3.08 x | 3.21 x |
| Overall Coverage: All Int. \& Pfd. Div. | 3.01 x | 3.23 x | 3.54 x | 3.12 x | 3.08 x | 3.20 x |
| Coverage excl. AFUDC ${ }^{(4)}$ |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 3.35 x | 3.79 x | 3.79 x | 4.09 x | 4.03 x | 3.81 x |
| Post-tax: All Interest Charges | 2.94 x | 3.20 x | 3.45 x | 3.03 x | 3.01 x | 3.13 x |
| Overall Coverage: All Int. \& Pfd. Div. | 2.93 x | 3.14 x | 3.45 x | 3.03 x | 3.01 x | 3.11 x |
| Quality of Earnings \& Cash Flow |  |  |  |  |  |  |
| AFC/Income Avail. for Common Equity | 4.4\% | 5.4\% | 4.0\% | 4.8\% | 5.7\% | 4.9\% |
| Effective Income Tax Rate | 17.1\% | 20.0\% | 14.9\% | 33.2\% | 30.7\% | 23.2\% |
| Internal Cash Generation/Construction ${ }^{(5)}$ | 65.9\% | 75.6\% | 79.2\% | 83.0\% | 85.0\% | 77.7\% |
| Gross Cash Flow/ Avg. Total Debt ${ }^{(6)}$ | 19.1\% | 21.0\% | 23.0\% | 24.2\% | 24.0\% | 22.3\% |
| Gross Cash Flow Interest Coverage ${ }^{(7)}$ | 5.22 x | 5.79 x | 6.14 x | 6.21 x | 5.88 x | 5.85 x |
| Common Dividend Coverage ${ }^{(8)}$ | 3.44 x | 3.69 x | 4.04 x | 4.20 x | 4.01 x | 3.88 x |

[^74]Electric Group<br>Capitalization and Financial Statistics<br>2015-2019, Inclusive

Notes:
(1) All capitalization and financial statistics for the group are the arithmetic average of the achieved results for each individual company in the group.
(2) Excluding Accumulated Other Comprehensive Income ("OCl") from the equity account.
(3) Total operating expenses, maintenance, depreciation and taxes other than income taxes as a percent of operating revenues.
(4) Coverage calculations represent the number of times available earnings, both including and excluding AFUDC (allowance for funds used during construction) as reported in its entirety, cover fixed charges. Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally-generated funds from operations after payment of all cash dividends divided by gross construction expenditures.
(6) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) plus interest charges, divided by interest charges. Gross Cash Flow plus interest charges divided by interest charges.
Common dividend coverage is the relationship of internally-generated funds from operations after payment of preferred stock dividends to common dividends paid.

## Basis of Selection:

The Electric Group includes companies that: (i) have publicly-traded common stock, (ii) are contained in The Value Line Investment Survey and are classified in the Electric Utility East group along with additional companies that are relatively small, (iii) are not currently the target of an announced merger or acquisition, (iv) are not engaged in the construction of a nuclear generating plant or have not recently cancelled the construction of a nuclear generating plant, and (v) have not recently reduced its common dividend.

| Ticker | Company | Corporate Credit Ratings |  | Stock <br> Traded | Value Line Beta |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Moody's | S\&P |  |  |
| AGR | Avangrid, Inc. | A3 | BBB+ | NYSE | 0.85 |
| ED | Consol. Edison | Baa1 | A- | NYSE | 0.75 |
| DUK | Duke Energy | A1 | BBB+ | NYSE | 0.85 |
| ES | Eversource Energy | A3 | A | NYSE | 0.90 |
| EXC | Exelon Corp. | A2 | BBB+ | NASDQ | 0.95 |
| FE | FirstEnergy Corp. | A3 | $\mathrm{BB}+$ | NYSE | 0.85 |
| MGEE | MGE Energy | A1 | AA- | NASDQ | 0.70 |
| NEE | NextEra Energy | A1 | A | NYSE | 0.90 |
| OTTR | Otter Tail Corp. | A3 | BBB+ | NASDQ | 0.85 |
| PPL | PPL Corp. | A3 | A- | NYSE | 1.15 |
| PEG | Public Serv. Enterprise | A2 | A- | NYSE | 0.90 |
|  | Average | A2 | A- |  | 0.88 |

Note: Ratings are those of utility subsidiaries

[^75]|  |  | ard \& Poor's P | c Utilities |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Capit | zation and Finan 2015-2019, Inc | Statistics ${ }^{(1)}$ sive |  |  |  |
|  | 2019 | 2018 | 2017 | 2016 | 2015 |  |
|  |  |  | (Millions of Dollars) |  |  |  |
| Amount of Capital Employed |  |  |  |  |  |  |
| Permanent Capital | \$ 36,567.1 | \$ 32,871.6 | \$ 30,827.6 | \$ 29,173.1 | \$ 26,655.9 |  |
| Short-Term Debt | \$ 1,221.9 | \$ 1,420.3 | \$ 1,076.1 | \$ 1,032.2 | \$ 875.5 |  |
| Total Capital | \$ 37,789.0 | \$ 34,291.9 | \$ 31,903.7 | \$ 30,205.3 | \$ 27,531.4 |  |
| Market-Based Financial Ratios |  |  |  |  |  | Average |
| Price-Earnings Multiple | 20 x | 21 x | 21 x | 21 x | 18 x | 20 x |
| Market/Book Ratio | 220.8\% | 204.7\% | 214.4\% | 196.0\% | 181.1\% | 203.4\% |
| Dividend Yield | 3.2\% | 3.5\% | 3.3\% | 3.5\% | 3.6\% | 3.4\% |
| Dividend Payout Ratio | 62.7\% | 71.7\% | 74.4\% | 74.6\% | 68.8\% | 70.4\% |
| Capital Structure Ratios |  |  |  |  |  |  |
| Based on Permanent Captial: |  |  |  |  |  |  |
| Long-Term Debt | 56.7\% | 55.0\% | 56.8\% | 56.6\% | 54.7\% | 55.9\% |
| Preferred Stock | 2.2\% | 2.5\% | 1.4\% | 1.9\% | 1.6\% | 1.9\% |
| Common Equity ${ }^{(2)}$ | 41.1\% | 42.5\% | 41.8\% | 41.6\% | 43.8\% | 42.2\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Based on Total Capital: |  |  |  |  |  |  |
| Total Debt incl. Short Term | 58.2\% | 57.0\% | 58.4\% | 58.2\% | 56.1\% | 57.6\% |
| Preferred Stock | 2.1\% | 2.4\% | 1.4\% | 1.8\% | 1.5\% | 1.8\% |
| Common Equity ${ }^{(2)}$ | 39.7\% | 40.7\% | 40.3\% | 40.1\% | 42.4\% | 40.6\% |
|  | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |
| Rate of Return on Book Common Equity ${ }^{(2)}$ | 10.3\% | 10.3\% | 10.8\% | 9.7\% | 9.7\% | 10.2\% |
| Operating Ratio ${ }^{(3)}$ | 79.3\% | 79.8\% | 77.0\% | 78.2\% | 79.7\% | 78.8\% |
| Coverage incl. AFUDC ${ }^{(4)}$ |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 3.05 x | 2.94 x | 3.42 x | 3.38 x | 3.80 x | 3.32 x |
| Post-tax: All Interest Charges | 3.10 x | 2.59 x | 2.86 x | 2.55 x | 2.79 x | 2.78 x |
| Overall Coverage: All Int. \& Pfd. Div. | 3.04 x | 2.55 x | 2.84 x | 2.52 x | 2.75 x | 2.74 x |
| Coverage excl. AFUDC ${ }^{(4)}$ |  |  |  |  |  |  |
| Pre-tax: All Interest Charges | 2.95 x | 2.84 x | 3.31 x | 3.28 x | 3.70 x | 3.22 x |
| Post-tax: All Interest Charges | 3.00 x | 2.48 x | 2.75 x | 2.44 x | 2.69 x | 2.67 x |
| Overall Coverage: All Int. \& Pfd. Div. | 2.94 x | 2.44 x | 2.73 x | 2.41 x | 2.65 x | 2.63 x |
| Quality of Earnings \& Cash Flow |  |  |  |  |  |  |
| AFC/Income Avail. for Common Equity | 5.8\% | 7.3\% | 7.3\% | 6.5\% | 5.5\% | 6.5\% |
| Effective Income Tax Rate | 12.2\% | 19.0\% | 28.2\% | 29.0\% | 32.5\% | 24.2\% |
| Internal Cash Generation/Construction ${ }^{(5)}$ | 66.0\% | 75.7\% | 78.7\% | 78.0\% | 71.9\% | 74.1\% |
| Gross Cash Flow/ Avg. Total Debt ${ }^{(6)}$ | 17.5\% | 17.4\% | 19.9\% | 20.5\% | 20.0\% | 19.1\% |
| Gross Cash Flow Interest Coverage ${ }^{(7)}$ | 4.97 x | 4.98 x | 5.57 x | 5.54 x | 5.41 x | 5.29 x |
| Common Dividend Coverage ${ }^{(8)}$ | 5.56 x | 4.80 x | 4.33 x | 4.31 x | 4.24 x | 4.65 x |

See Page 2 for Notes.

## Standard \& Poor's Public Utilities

## Capitalization and Financial Statistics

 2015-2019, InclusiveNotes:
(1) All capitalization and financial statistics for the group are the arithmetic average of the achieved results for each individual company in the group.
(2) Excluding Accumulated Other Comprehensive Income ("OCl") from the equity account
(3) Total operating expenses, maintenance, depreciation and taxes other than income taxes as a percent of operating revenues.
(4) Coverage calculations represent the number of times available earnings, both including and excluding AFUDC (allowance for funds used during construction) as reported in its entirety, cover fixed charges.
(5) Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally-generated funds from operations after payment of all cash dividends divided by gross construction expenditures.
(6) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) as a percentage of average total debt.
(7) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) plus interest charges, divided by interest charges.
(8) Common dividend coverage is the relationship of internally-generated funds from operations after payment of preferred stock dividends to common dividends paid.

Source of Information: Annual Reports to Shareholders
Utility COMPUSTAT

## Standard \& Poor's Public Utilities

Company Identities

|  | Ticker | Credit Rating ${ }^{(1)}$ |  | Common Stock | Value Line |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Moody's | S\&P | Traded | Beta |
| Alliant Energy Corporation | LNT | Baa1 | A- | NYSE | 0.85 |
| Ameren Corporation | AEE | Baa1 | BBB+ | NYSE | 0.85 |
| American Electric Power | AEP | Baa1 | A- | NYSE | 0.75 |
| American Water Works | AWK | Baa1 | A | NYSE | 0.85 |
| CenterPoint Energy | CNP | Baa1 | BBB+ | NYSE | 1.15 |
| CMS Energy | CMS | A3 | A- | NYSE | 0.80 |
| Consolidated Edison | ED | Baa1 | A- | NYSE | 0.75 |
| Dominion Energy | D | A2 | BBB+ | NYSE | 0.80 |
| DTE Energy Co. | DTE | A2 | A- | NYSE | 0.95 |
| Duke Energy | DUK | A1 | BBB+ | NYSE | 0.85 |
| Edison Int'l | EIX | Baa2 | BBB | NYSE | 0.95 |
| Entergy Corp. | ETR | Baa1 | A- | NYSE | 0.95 |
| Evergy, Inc. | EVRG | Baa1 | A- | NYSE | 1.00 |
| Eversource | ES | A3 | A | NYSE | 0.90 |
| Exelon Corp. | EXC | A2 | BBB+ | NYSE | 0.95 |
| FirstEnergy Corp. | FE | A3 | BB+ | NYSE | 0.85 |
| NextEra Energy Inc. | NEE | A1 | A | NYSE | 0.90 |
| NiSource Inc. | N | Baa2 | BBB+ | NYSE | 0.85 |
| NRG Energy Inc. | NRG | Ba1 | BB+ | NYSE | 1.25 |
| Pinnacle West Capital | PNW | A2 | A- | NYSE | 0.90 |
| PPL Corp. | PPL | A3 | A- | NYSE | 1.15 |
| Public Serv. Enterprise Inc. | PEG | A2 | A- | NYSE | 0.90 |
| Sempra Energy | SRE | Baa1 | BBB+ | NYSE | 1.00 |
| Southern Co. | SO | Baa1 | A- | NYSE | 0.90 |
| WEC Energy Corp. | WEC | A2 | A- | NYSE | 0.80 |
| Xcel Energy Inc | XEL | A2 | A- | NYSE | 0.80 |
| Average for S\&P Utilities |  | A3 | BBB+ |  | 0.91 |

Note: $\quad{ }^{(1)}$ Ratings are those of utility subsidiaries
Source of Information: SNL Financial LLC
Standard \& Poor's Stock Guide
Value Line Investment Survey for Windows

## Duquesne Light Company <br> Capitalization and Related Capital Structure Ratios

Actual at December 31, 2020 and Estimated at December 31, 2021 and December 31, 2022

|  | Actual at December 31, 2020 |  |  | Estimated at December 31, 2021 |  |  | Estimated at December 31, 2022 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Amount | Ratios |  | Amount | Ratios |  | $\begin{gathered} \text { Amount } \\ \text { Outstanding } \\ \hline \end{gathered}$ | Ratios |  |
|  | Outstanding | Excl. S-T Debt | Incl. S-T Debt | Outstanding | Excl. S-T Debt | $\underline{\text { Incl. S-T Debt }}$ |  | Excl. S-T Debt | $\underline{\text { Incl. S-T Debt }}$ |
| Long-Term Debt | \$ 1,377,771,607 | 47.71\% | 47.55\% | \$ 1,379,800,430 | 46.39\% | 46.03\% | \$ 1,506,814,759 | 46.65\% | 46.30\% |
| Common Equity |  |  |  |  |  |  |  |  |  |
| Common Stock | - |  |  | - |  |  | - |  |  |
| Capital Surplus | 988,426,521 |  |  | 988,426,521 |  |  | 988,426,521 |  |  |
| Retained earnings ${ }^{(1)}$ | 521,503,160 |  |  | 606,171,160 |  |  | 734,862,160 |  |  |
| Total Common Equity | 1,509,929,681 | 52.29\% | 52.11\% | 1,594,597,681 | 53.61\% | 53.19\% | 1,723,288,681 | 53.35\% | 52.95\% |
| Total Permanent Capital | 2,887,701,288 | 100.00\% | 99.66\% | 2,974,398,111 | 100.00\% | 99.22\% | 3,230,103,440 | 100.00\% | 99.25\% |
| Short-term Debt | 10,000,000 |  | 0.34\% | 23,400,000 |  | 0.78\% | 24,200,000 |  | 0.75\% |
| Total Capital Employed | \$ 2,897,701,288 |  | 100.00\% | \$ 2,997,798,111 |  | 100.00\% | \$ 3,254,303,440 |  | 100.00\% |

Notes:
${ }^{(1)}$ Excluding Accumulated Other Comprehensive Income ("OCI") of:

## $\$ \quad(2,690,662)$

${ }^{(2)}$ Reflects changes in the principal amount of long-term debt of 1st Mortgage Bond 3.38\% due 3/31/52 Net change in Loss on Reacquired Deb
\$ 2,028,822
${ }^{(3)}$ Projection of retained earnings consisting of Net Income
Distributions
\$ 158,668,000
$(74,000,000)$
$\$ \quad(2,690,662)$
\$ 125,000,000
2,014,329
\$ 173,191,000 $(44,500,000)$

Source of Information: Company provided data

## Duquesne Light Company

Calculation of the Embedded Cost of Long-Term Debt
Actual at December 31, 2020

| Series |  | Principal <br> Amount Outstanding | (1) | Percent to Total | Effective Cost Rate | Weighted Cost Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1st Mortgage Bond 4.76\% due 2/3/42 | \$ | 200,000,000 |  | 14.34\% | 4.81\% | 0.69\% |
| 1st Mortgage Bond 4.97\% due 11/14/43 |  | 160,000,000 |  | 11.47\% | 5.01\% | 0.57\% |
| 1st Mortgage Bond 5.02\% due 2/4/44 |  | 45,000,000 |  | 3.23\% | 5.06\% | 0.16\% |
| 1st Mortgage Bond 5.12\% due 2/4/54 |  | 85,000,000 |  | 6.09\% | 5.16\% | 0.31\% |
| 1st Mortgage Bond 3.78\% due 3/2/45 |  | 100,000,000 |  | 7.17\% | 3.81\% | 0.27\% |
| 1st Mortgage Bond 3.93\% due 3/2/55 |  | 200,000,000 |  | 14.34\% | 3.95\% | 0.57\% |
| 1st Mortgage Bond 3.93\% due 7/15/45 |  | 160,000,000 |  | 11.47\% | 3.96\% | 0.45\% |
| 1st Mortgage Bond 3.82\% due 10/3/47 |  | 60,000,000 |  | 4.30\% | 3.86\% | 0.17\% |
| 1st Mortgage Bond 3.89\% due 2/1/48 |  | 60,000,000 |  | 4.30\% | 3.93\% | 0.17\% |
| 1st Mortgage Bond 4.04\% due 2/1/58 |  | 125,000,000 |  | 8.96\% | 4.07\% | 0.36\% |
| 1st Mortgage Bond 3.11\% due 5/5/50 |  | 200,000,000 |  | 14.34\% | 3.14\% | 0.45\% |
| Total Long -Term Debt |  | 1,395,000,000 |  | 100.00\% |  | 4.19\% |
| Unamortized Call Premium |  | $(17,228,393)$ |  |  |  |  |
| Long Term- Debt |  | 1,377,771,607 |  |  |  |  |
| Annualized Cost | \$ | 58,387,136 |  |  |  |  |
| Amortization of Loss on Reacquired Debt |  | 2,033,556 |  |  |  |  |
| Total Cost | \$ | 60,420,692 |  |  |  | 4.39\% |

Notes: ${ }^{(1)}$ Includes current portion of long-term debt.
${ }^{(2)}$ As calculated on page 4 of this schedule.
Source of Information: Company provided data

## Duquesne Light Company

Calculation of the Embedded Cost of Long-Term Debt
Estimated at December 31, 2021

| Series | Principal Amount Outstanding |  | (1) | $\begin{aligned} & \text { Percent } \\ & \text { to } \\ & \text { Total } \\ & \hline \end{aligned}$ | Effective <br> Cost <br> Rate | Weighted Cost Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1st Mortgage Bond 4.76\% due 2/3/42 | \$ | 200,000,000 |  | 14.34\% | 4.81\% | 0.69\% |
| 1st Mortgage Bond 4.97\% due 11/14/43 |  | 160,000,000 |  | 11.47\% | 5.01\% | 0.57\% |
| 1st Mortgage Bond 5.02\% due 2/4/44 |  | 45,000,000 |  | 3.23\% | 5.06\% | 0.16\% |
| 1st Mortgage Bond 5.12\% due 2/4/54 |  | 85,000,000 |  | 6.09\% | 5.16\% | 0.31\% |
| 1st Mortgage Bond 3.78\% due 3/2/45 |  | 100,000,000 |  | 7.17\% | 3.81\% | 0.27\% |
| 1st Mortgage Bond 3.93\% due 3/2/55 |  | 200,000,000 |  | 14.34\% | 3.95\% | 0.57\% |
| 1st Mortgage Bond 3.93\% due 7/15/45 |  | 160,000,000 |  | 11.47\% | 3.96\% | 0.45\% |
| 1st Mortgage Bond 3.82\% due 10/3/47 |  | 60,000,000 |  | 4.30\% | 3.86\% | 0.17\% |
| 1st Mortgage Bond 3.89\% due 2/1/48 |  | 60,000,000 |  | 4.30\% | 3.93\% | 0.17\% |
| 1st Mortgage Bond 4.04\% due 2/1/58 |  | 125,000,000 |  | 8.96\% | 4.07\% | 0.36\% |
| 1st Mortgage Bond 4.04\% due 2/1/58 |  | 200,000,000 |  | 14.34\% | 3.14\% | 0.45\% |
| Total Long -Term Debt |  | 1,395,000,000 |  | 100.00\% |  | 4.19\% |
| Unamortized Call Premium |  | $(15,199,570)$ |  |  |  |  |
| Long Term- Debt |  | 1,379,800,430 |  |  |  |  |
| Annualized Cost | \$ | 58,387,136 |  |  |  |  |
| Amortization of Loss on Reacquired Debt |  | 2,028,823 |  |  |  |  |
| Total Cost |  | 60,415,959 |  |  |  | 4.38\% |

Notes: (1) Includes current portion of long-term debt.
${ }^{(2)}$ As calculated on page 4 of this schedule.
Source of Information: Company provided data

## Duquesne Light Company

Calculation of the Embedded Cost of Long-Term Debt
Estimated at December 31, 2022

| Series |  | Principal <br> Amount Outstanding | ${ }^{(1)}$ | $\begin{gathered} \text { Percent } \\ \text { to } \\ \text { Total } \\ \hline \end{gathered}$ | Effective Cost Rate | Weighted Cost Rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1st Mortgage Bond 4.76\% due 2/3/42 | \$ | 200,000,000 |  | 13.16\% | 4.81\% | 0.63\% |
| 1st Mortgage Bond 4.97\% due 11/14/43 |  | 160,000,000 |  | 10.53\% | 5.01\% | 0.53\% |
| 1st Mortgage Bond 5.02\% due 2/4/44 |  | 45,000,000 |  | 2.96\% | 5.06\% | 0.15\% |
| 1st Mortgage Bond 5.12\% due 2/4/54 |  | 85,000,000 |  | 5.59\% | 5.16\% | 0.29\% |
| 1st Mortgage Bond 3.78\% due 3/2/45 |  | 100,000,000 |  | 6.58\% | 3.81\% | 0.25\% |
| 1st Mortgage Bond 3.93\% due 3/2/55 |  | 200,000,000 |  | 13.16\% | 3.95\% | 0.52\% |
| 1st Mortgage Bond 3.93\% due 7/15/45 |  | 160,000,000 |  | 10.53\% | 3.96\% | 0.42\% |
| 1st Mortgage Bond 3.82\% due 10/3/47 |  | 60,000,000 |  | 3.95\% | 3.86\% | 0.15\% |
| 1st Mortgage Bond 3.89\% due 2/1/48 |  | 60,000,000 |  | 3.95\% | 3.93\% | 0.16\% |
| 1st Mortgage Bond 4.04\% due 2/1/58 |  | 125,000,000 |  | 8.22\% | 4.07\% | 0.33\% |
| 1st Mortgage Bond 3.11\% due 5/5/50 |  | 200,000,000 |  | 13.16\% | 3.14\% | 0.41\% |
| 1st Mortgage Bond 3.38\% due 3/31/52 |  | 125,000,000 |  | 8.22\% | 3.41\% | 0.28\% |
| Total Long -Term Debt |  | 1,520,000,000 |  | 100.00\% |  | 4.12\% |
| Unamortized Call Premium |  | $(13,185,241)$ |  |  |  |  |
| Long Term- Debt |  | 1,506,814,759 |  |  |  |  |
| Annualized Cost | \$ | 62,648,995 |  |  |  |  |
| Amortization of Loss on Reacquired Debt |  | 2,014,329 |  |  |  |  |
| Total Cost |  | 64,663,324 |  |  |  | 4.29\% |

Notes: (1) Includes current portion of long-term debt.
${ }^{(2)}$ As calculated on page 4 of this schedule.
Source of Information: Company provided data

| Series | Duquesne Light Company |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Calculation of the Effective Cost of Long-Term Debt by Series |  |  |  |  |  |  |  |  |
|  | Coupon Rate | Date of Issue | Date of Maturity | Term in Years | Principal Amount Outstanding | Premium/ Discount \& Expense | Net <br> Proceeds | Net Proceeds Ratio | Effective <br> Cost Rate ${ }^{(1)}$ |
| 1st Mortgage Bond 4.76\% due 2/3/42 | 4.76\% | 02/03/12 | 02/03/42 | 30.0 | \$ 200,000,000 | \$ 1,685,878 | \$ 198,314,122 | 99.16\% | 4.81\% |
| 1st Mortgage Bond 4.97\% due 11/14/43 | 4.97\% | 11/14/13 | 11/14/43 | 30.0 | 160,000,000 | 962,455 | 159,037,545 | 99.40\% | 5.01\% |
| 1st Mortgage Bond 5.02\% due 2/4/44 | 5.02\% | 02/04/14 | 02/04/44 | 30.0 | 45,000,000 | 273,501 | 44,726,499 | 99.39\% | 5.06\% |
| 1st Mortgage Bond $5.12 \%$ due 2/4/54 | 5.12\% | 02/04/14 | 02/04/54 | 40.0 | 85,000,000 | 543,463 | 84,456,537 | 99.36\% | 5.16\% |
| 1st Mortgage Bond 3.78\% due 3/2/45 | 3.78\% | 03/02/15 | 03/02/45 | 30.0 | 100,000,000 | 446,281 | 99,553,719 | 99.55\% | 3.81\% |
| 1st Mortgage Bond 3.93\% due 3/2/55 | 3.93\% | 03/02/15 | 03/02/55 | 40.0 | 200,000,000 | 891,394 | 199,108,606 | 99.55\% | 3.95\% |
| 1st Mortgage Bond 3.93\% due 7/15/45 | 3.93\% | 07/15/15 | 07/15/45 | 30.0 | 160,000,000 | 781,258 | 159,218,742 | 99.51\% | 3.96\% |
| 1st Mortgage Bond 3.82\% due 10/3/47 | 3.82\% | 10/03/17 | 10/03/47 | 30.0 | 60,000,000 | 437,811 | 59,562,189 | 99.27\% | 3.86\% |
| 1st Mortgage Bond 3.89\% due 2/1/48 | 3.89\% | 02/01/18 | 02/01/48 | 30.0 | 60,000,000 | 377,534 | 59,622,466 | 99.37\% | 3.93\% |
| 1st Mortgage Bond $4.04 \%$ due 2/1/58 | 4.04\% | 02/01/18 | 02/01/58 | 40.0 | 125,000,000 | 786,529 | 124,213,471 | 99.37\% | 4.07\% |
| 1st Mortgage Bond $3.11 \%$ due 5/5/50 | 3.11\% | 05/01/20 | 05/05/50 | 30.0 | 200,000,000 | 1,114,869 | 198,885,131 | 99.44\% | 3.14\% |
| 1st Mortgage Bond $3.38 \%$ due $3 / 31 / 52$ | 3.38\% | 03/31/22 | 03/31/52 | 30.0 | 125,000,000 | 750,000 | 124,250,000 | 99.40\% | 3.41\% |

Notes: ${ }^{(1)}$ The effective cost for each issue is the yield to maturity using as inputs the average term of issue, coupon rate, and net proceeds ratio.

[^76]| Company | Monthly Dividend Yields for Electric Group <br> for the Twelve Months Ending December 2020 |  |  |  |  |  |  |  |  |  |  |  | 12-Month Average | 6-Month Average | 3-Month Average |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\xrightarrow{\text { Jan-20 }}$ | Feb-20 | Mar-20 | Apr-20 | May-20 | Jun-20 | Jul-20 | Aug-20 | Sep-20 | Oct-20 | Nov-20 | Dec-20 |  |  |  |
| AVANGRID, Inc (AGR) | 3.32\% | 3.57\% | 4.03\% | 4.12\% | 3.99\% | 4.21\% | 3.56\% | 3.66\% | 3.50\% | 3.59\% | 3.82\% | 3.88\% |  |  |  |
| Consolidated Edison Inc (ED) | 3.28\% | 3.89\% | 3.94\% | 3.91\% | 4.09\% | 4.28\% | 4.02\% | 4.30\% | 3.95\% | 3.93\% | 4.02\% | 4.26\% |  |  |  |
| Duke Energy Corporation (DUK) | 3.90\% | 4.13\% | 4.70\% | 4.51\% | 4.42\% | 4.76\% | 4.60\% | 4.82\% | 4.38\% | 4.23\% | 4.17\% | 4.24\% |  |  |  |
| Eversource Energy (ES) | 2.46\% | 2.64\% | 2.91\% | 2.83\% | 2.71\% | 2.73\% | 2.53\% | 2.67\% | 2.72\% | 2.61\% | 2.61\% | 2.63\% |  |  |  |
| Exelon Corp (EXC) | 3.24\% | 3.55\% | 4.18\% | 4.16\% | 4.00\% | 4.24\% | 4.00\% | 4.15\% | 4.30\% | 3.87\% | 3.73\% | 3.64\% |  |  |  |
| FirstEnergy Corp (FE) | 3.09\% | 3.51\% | 3.92\% | 3.81\% | 3.70\% | 4.05\% | 5.45\% | 5.48\% | 5.48\% | 5.31\% | 5.90\% | 5.14\% |  |  |  |
| MGE Energy Inc (MGEE) | 1.77\% | 1.98\% | 2.16\% | 2.19\% | 2.08\% | 2.19\% | 2.24\% | 2.28\% | 2.37\% | 2.28\% | 2.16\% | 2.12\% |  |  |  |
| NextEra Energy Inc (NEE) | 2.10\% | 2.22\% | 2.33\% | 2.43\% | 2.20\% | 2.34\% | 2.00\% | 2.01\% | 2.02\% | 1.92\% | 1.90\% | 1.82\% |  |  |  |
| Otter Tail Corp (OTTR) | 2.78\% | 3.05\% | 3.34\% | 3.36\% | 3.45\% | 3.83\% | 3.90\% | 3.82\% | 4.11\% | 3.89\% | 3.72\% | 3.49\% |  |  |  |
| PPL Corp (PPL) | 4.62\% | 5.60\% | 6.75\% | 6.59\% | 6.02\% | 6.45\% | 6.29\% | 6.09\% | 6.12\% | 6.09\% | 5.92\% | 5.91\% |  |  |  |
| Public Service Enterprise Group Inc (PEG) | 3.33\% | 3.85\% | 4.38\% | 3.89\% | 3.87\% | 4.00\% | 3.52\% | 3.78\% | 3.58\% | 3.39\% | 3.39\% | 3.37\% |  |  |  |
| Average | 3.08\% | 3.45\% | 3.88\% | 3.80\% | 3.68\% | 3.92\% | 3.83\% | 3.91\% | 3.87\% | 3.74\% | 3.76\% | 3.68\% | 3.72\% | 3.80\% | 3.73\% |
| Note: | Monthly divid the fractio | idend yield of the ex- | s are calcu ividend. | ated by $d$ | iding the | nualized | arterly div | dend by th | month-en | closing | ck price a | usted by |  |  |  |

Source of Information: https://finance.yahoo.com
https://www.nasdaq.com

| Forward-looking Dividend Yield | 1/2 Growth | $\begin{aligned} & \mathrm{D}_{0} / \mathrm{P}_{0} \\ & 3.80 \% \end{aligned}$ | $\begin{gathered} (.5 \mathrm{~g}) \\ 1.025750 \end{gathered}$ | $\begin{gathered} \mathrm{D}_{1} / \mathrm{P}_{0} \\ 3.90 \% \end{gathered}$ | $K=\frac{D_{0}(1+g)^{0}+D_{0}(1+g)^{0}+D_{0}(1+g)^{1}+D_{0}(1+g)^{1}}{P_{0}}+g$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Discrete | $\begin{aligned} & \mathrm{D}_{0} / \mathrm{P}_{0} \\ & 3.80 \% \end{aligned}$ | $\begin{gathered} \text { Adj. } \\ 1.031985 \end{gathered}$ | $\begin{aligned} & \mathrm{D}_{1} / \mathrm{P}_{0} \\ & 3.92 \% \end{aligned}$ | $K=\frac{D_{0}(1+g)^{25}+D_{0}(1+g)^{50}+D_{0}(1+g)^{75}+D_{0}(1+g)^{1.00}}{P_{0}}+g$ |
|  | Quarterly | $\begin{gathered} \mathrm{D}_{0} / \mathrm{P}_{0} \\ 0.9500 \% \end{gathered}$ | $\begin{gathered} \text { Adj. } \\ 1.012634 \end{gathered}$ | $\begin{aligned} & \mathrm{D}_{1} / \mathrm{P}_{0} \\ & 3.90 \% \\ & \hline \end{aligned}$ | $K=\left[\left(1+\frac{D_{0}(1+g)^{25}}{P_{0}}\right)^{1}-1\right]+g$ |
|  | Average |  |  | 3.91\% |  |
|  | Growth rat |  |  | 5.15\% |  |
|  | K |  |  | 9.06\% |  |

## Historical Growth Rates

Earnings Per Share, Dividends Per Share, Book Value Per Share, and Cash Flow Per Share

| Electric Group | Earnings per Share |  | Dividends per Share |  | Book Value per Share |  | Cash Flow per Share |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Value Line |  | Value Line |  | Value Line |  | Value Line |  |
|  | 5 Year | 10 Year | 5 Year | 10 Year | 5 Year | 10 Year | 5 Year | 10 Year |
| AVANGRID, Inc. | - | - | - | - | - | - | - | - |
| Consol. Edison | 2.00\% | 2.50\% | 3.00\% | 2.00\% | 4.50\% | 4.00\% | 4.00\% | 4.00\% |
| Duke Energy | 2.50\% | 3.00\% | 3.00\% | 3.00\% | 1.00\% | 2.00\% | 6.00\% | 3.50\% |
| Eversource Energy | 7.00\% | 6.00\% | 7.00\% | 9.00\% | 3.50\% | 6.50\% | 6.50\% | 2.00\% |
| Exelon Corp. | 4.50\% | -4.50\% | -3.00\% | -3.50\% | 4.00\% | 6.50\% | 5.00\% | 1.00\% |
| FirstEnergy Corp. | - | -7.00\% | -2.00\% | -3.00\% | -17.50\% | -8.50\% | -3.00\% | -6.00\% |
| MGE Energy | 2.50\% | 4.50\% | 4.00\% | 3.50\% | 5.50\% | 5.50\% | 5.00\% | 4.50\% |
| NextEra Energy | 7.00\% | 6.50\% | 11.00\% | 9.50\% | 10.50\% | 9.00\% | 7.00\% | 6.50\% |
| Otter Tail Corp. | 9.00\% | 5.50\% | 2.50\% | 1.50\% | 4.50\% | - | 6.00\% | 2.50\% |
| PPL Corp. | -1.00\% | 1.00\% | 2.00\% | 2.00\% | -3.50\% | 1.00\% | -3.50\% | -1.00\% |
| Public Serv. Enterprise | 4.00\% | 1.00\% | 4.50\% | 3.50\% | 4.50\% | 6.00\% | 2.00\% | 2.00\% |
| Average | 4.17\% | 1.85\% | 3.20\% | 2.75\% | 1.70\% | 3.56\% | 3.50\% | 1.90\% |

Source of Information: Value Line Investment Survey November 13, $2020 \square$

# Analysts' Five-Year Projected Growth Rates <br> Earnings Per Share, Dividends Per Share, Book Value Per Share, and Cash Flow Per Share 

| Electric Group | I/B/E/S <br> First <br> Call | Zacks | Value Line |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Earnings <br> Per Share | Dividends <br> Per Share | Book Value Per Share | Cash <br> Flow <br> Per Share | Percent Retained to Common Equity |
| AVANGRID, Inc. | 4.00\% | 4.70\% | 4.00\% | 0.50\% | 1.00\% | 4.50\% | 1.50\% |
| Consol. Edison | 2.54\% | 2.00\% | 3.00\% | 3.50\% | 3.00\% | 4.00\% | 2.50\% |
| Duke Energy | 2.80\% | 3.60\% | 5.00\% | 2.50\% | 2.50\% | 5.00\% | 2.50\% |
| Eversource Energy | 6.51\% | 6.50\% | 5.50\% | 6.00\% | 5.50\% | 5.50\% | 3.50\% |
| Exelon Corp. |  | 2.40\% | 3.50\% | 5.50\% | 3.50\% | 4.00\% | 4.00\% |
| FirstEnergy Corp. |  | NA | 8.50\% | 2.00\% | 10.00\% | 3.00\% | 6.50\% |
| MGE Energy | 4.80\% | 4.80\% | 4.00\% | 5.50\% | 5.00\% | 5.00\% | 4.00\% |
| NextEra Energy | 8.73\% | 7.90\% | 9.50\% | 10.50\% | 6.50\% | 7.50\% | 4.00\% |
| Otter Tail Corp. | 9.00\% | NA | 6.50\% | 5.00\% | 5.00\% | 5.00\% | 4.50\% |
| PPL Corp. |  | NA | 2.50\% | 2.00\% | 4.50\% | 4.00\% | 4.00\% |
| Public Serv. Enterprise | 1.10\% | 2.90\% | 5.00\% | 4.00\% | 5.00\% | 5.00\% | 5.00\% |
| Average | 4.94\% | 4.35\% | 5.18\% | 4.27\% | 4.68\% | 4.77\% | 3.82\% |

Note: Negative growth rates removed for Exelon of -2.40\%, FirstEnergy of -2.40\%, and PPL Corp. of -16.20\%

Source of Information :
Yahoo Finance, January 5, 2021
Zacks, January 5, 2021
Value Line Investment Survey, November 13, 2020 口

| AVANGRID Inc (AGR) | Consolidated Edison Inc (ED) | Duke Energy Corporation (DUK) | Eversource <br> Energy (ES) | $\begin{gathered} \text { Exelon } \\ \text { Corp(EXC) } \end{gathered}$ | FirstEnergy <br> Corp (FE) | MGE Energy linc. (MGEE) | NextEra Energy Inc (NEE) | Otter Tail Corp. (OTTR) | PPL Corp (PPL) | Public Service Enterprise Group Inc |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/19 | 12/31/1 | 12/31/19 |
| $\begin{array}{r} 8,168,000 \\ 0 \end{array}$ | 22,738,000 0 | $\begin{array}{r} 63,062,000 \\ 0 \end{array}$ | $\begin{array}{r} 15,796,100 \\ 162,000 \end{array}$ | 41,516,000 0 | 22,928,000 | 611,909 | $42,928,000$ 0 | $\begin{array}{r} 742,279 \\ 0 \end{array}$ | $\begin{array}{r} 25,481,000 \\ 0 \end{array}$ | $\begin{array}{r} 16,723,000 \\ 0 \end{array}$ |
| 15,846,919 | 28,045,700 | 66,856,930 | 28,062,946 | 44,267,890 | 26,275,698 | 2,732,532 | 118,416,240 | 2,059,683 | 27,528,320 | 29,761,200 |
| $\underline{\underline{24,014,919}}$ | 50,783,700 | 129,918,930 | 44,021,046 | $\underline{\underline{85,783,890}}$ | 49,203,698 | 3,344,441 | $\underline{161,344,240}$ | $\underline{\underline{2,801,962}}$ | 53,009,320 | 46,484,200 |
| 34.01\% | 44.77\% | 48.54\% | 35.88\% | 48.40\% | 46.60\% | 18.30\% | 26.61\% | 26.49\% | 48.07\% | 35.98\% |
| 0.00\% | 0.00\% | 0.00\% | 0.37\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 65.99\% | 55.23\% | 51.46\% | 63.75\% | 51.60\% | 53.40\% | 81.70\% | 73.39\% | 73.51\% | 51.93\% | 64.02\% |
| 100.00\% | $\underline{\text { 100.00\% }}$ | 100.00\% | 100.00\% | 100.00\% | 100.00\% | 100.00\% | 100.00\% | 100.00\% | 100.00\% | 100.00\% |


| Fiscal Year |
| :---: |
| Capitalization at Fair Values |
| Debt(D) |
| Preferred(P) |
| Equity(E) |
| Total |
| Capital Structure Ratios |
| Debt(D) |
| Preferred(P) |
| Equity(E) |
| Total |
| Common Stock |
| Issued |
| Treasury |
| Outstanding |
| Market Price |

Capitalization at Carrying Amoun
Debt(D)
Preferred(P)
Equity(E)
Total

| Capital Structure Ratios |
| :---: |
| Debt(D) |
| Preferred(P) |
| Equity(E) |
| Total |

Betas Value Line

| 333,000.000 |  |  |  | 973,000.000 |  |  |  |  |  | $\begin{array}{r} 534,000.000 \\ 30,000.000 \end{array}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 23,000.000 |  |  | 2,000.000 |  | 34,668.000 | 489,000.000 | 40,157.591 | 767,233.000 |  |
| 309,752.140 | 310,000.000 | 733,000.000 | 329,880.645 |  |  | 504,000.000 |  |  |  |  |
| \$51.16 | \$90.47 | \$91.21 | \$85.07 | \$45.59 | \$48.60 |  | \$78.82 | \$242.16 | \$51.29 | \$35.88 | \$59.05 |
| 7,446,000 | 19,973,000 | 58,126,000 | 14,681,500 | 37,628,000 | 20,074,000 | 547,879 | 39,667,000 | 689,764 | 21,893,000 | 15,108,000 |
| 0 | 0 | 1,962,000 | 155,600 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 15,237,000 | 18,022,000 | 44,860,000 | 12,629,994 | 32,224,000 | 6,975,000 | 855,676 | 37,005,000 | 781,482 | 12,991,000 | 15,089,000 |
| $\underline{22,683,000}$ | 37,995,000 | 104,948,000 | $\underline{27,467,094}$ | 69,852,000 | 27,049,000 | 1,403,555 | 76,672,000 | 1,471,246 | 34,884,000 | 30,197,000 |


| ke | = | ku |  | ( ( | ku | - | i | ) | 1-t | ) | D | 1 | E | ) + | ku | d | P | E |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 10.52\% | = | 7.31\% |  | ( $(1$ | 7.31\% | - | 2.81\% | ) | 0.65 | ) | 52.07\% | 1 | 47.71\% | ) + | 7.31\% | - 5.68\% ) | 0.22\% | / 47.71\% |
| 10.52\% | = | 7.31\% |  | ( $(1$ | 4.50\% |  |  | ) | 0.65 | ) | 1.0914 |  |  | ) +( | 1.63\% | ) | 0.0046 |  |
| 10.52\% | = | 7.31\% | + | ( | 2.93\% |  |  |  |  | ) | 1.0914 |  |  | ) +( | 1.63\% | ) | 0.0046 |  |
| 10.52\% | = | 7.31\% | + |  | 3.20\% |  |  |  |  |  |  |  |  | $+$ | 0.01\% |  |  |  |

Interest Rates for Investment Grade Public Utility Bonds Yearly for 2015-2019 and the Twelve Months Ended December 2020

| $\underline{\text { Years }}$ | Aa Rated | A Rated | Baa Rated | Average |
| :---: | :---: | :---: | :---: | :---: |
| 2015 | 4.00\% | 4.12\% | 5.03\% | 4.38\% |
| 2016 | 3.73\% | 3.93\% | 4.68\% | 4.11\% |
| 2017 | 3.82\% | 4.00\% | 4.38\% | 4.07\% |
| 2018 | 4.09\% | 4.25\% | 4.67\% | 4.34\% |
| 2019 | 3.61\% | 3.77\% | 4.19\% | 3.86\% |

Five-Year
Average $\quad \underline{\underline{3.85 \%} \quad 4.01 \%}$

Months

| Jan-20 | $3.12 \%$ | $3.29 \%$ | $3.60 \%$ | $3.34 \%$ |
| ---: | ---: | ---: | ---: | ---: |
| Feb-20 | $2.96 \%$ | $3.11 \%$ | $3.42 \%$ | $3.16 \%$ |
| Mar-20 | $3.30 \%$ | $3.50 \%$ | $3.96 \%$ | $3.59 \%$ |
| Apr-20 | $2.93 \%$ | $3.19 \%$ | $3.82 \%$ | $3.31 \%$ |
| May-20 | $2.89 \%$ | $3.14 \%$ | $3.63 \%$ | $3.22 \%$ |
| Jun-20 | $2.80 \%$ | $3.07 \%$ | $3.44 \%$ | $3.10 \%$ |
| Jul-20 | $2.46 \%$ | $2.74 \%$ | $3.09 \%$ | $2.77 \%$ |
| Aug-20 | $2.49 \%$ | $2.73 \%$ | $3.06 \%$ | $2.76 \%$ |
| Sep-20 | $2.62 \%$ | $2.84 \%$ | $3.17 \%$ | $2.88 \%$ |
| Oct-20 | $2.72 \%$ | $2.95 \%$ | $3.27 \%$ | $2.98 \%$ |
| Nov-20 | $2.63 \%$ | $2.85 \%$ | $3.17 \%$ | $2.89 \%$ |
| Dec-20 | $2.57 \%$ | $2.77 \%$ | $3.05 \%$ | $2.80 \%$ |

Twelve-Month
Average $\quad \underline{\underline{2.79 \%} \quad 3.02 \%} \quad \underline{\underline{3.39 \%}}$
Six-Month
Average $\xlongequal{2.58 \%} \xlongequal{2.81 \%} \quad \underline{ }$
Three-Month
Average $\xlongequal{2.64 \%} \quad \underline{\underline{2.86 \%}}$

## Yields on <br> A-rated Public Utility Bonds and Spreads over 30-Year Treasuries




## Common Equity Risk Premiums

Years 1926-2019

|  | Large Common Stocks | Long- <br> Term Corp. Bonds | Equity Risk Premium | Long- <br> Term <br> Govt. <br> Bonds <br> Yields |
| :---: | :---: | :---: | :---: | :---: |
| Low Interest Rates | 11.92\% | 5.22\% | 6.70\% | 2.88\% |
| Average Across All Interest Rates | 12.09\% | 6.40\% | 5.69\% | 4.99\% |
| High Interest Rates | 12.26\% | 7.57\% | 4.69\% | 7.09\% |

Source of Information: 2020 SBBI Yearbook Stocks, Bonds, Bills, and Inflation

| Basic SeriesAnnual Total Returns (except yields) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Large Common Stocks | Long- <br> Term Corp. Bonds | Long- <br> Term <br> Govt. <br> Bonds <br> Yields |
| 1940 | -9.78\% | 3.39\% | 1.94\% |
| 1945 | 36.44\% | 4.08\% | 1.99\% |
| 1941 | -11.59\% | 2.73\% | 2.04\% |
| 1949 | 18.79\% | 3.31\% | 2.09\% |
| 1946 | -8.07\% | 1.72\% | 2.12\% |
| 1950 | 31.71\% | 2.12\% | 2.24\% |
| 2019 | 31.49\% | 19.95\% | 2.25\% |
| 1939 | -0.41\% | 3.97\% | 2.26\% |
| 1948 | 5.50\% | 4.14\% | 2.37\% |
| 1947 | 5.71\% | -2.34\% | 2.43\% |
| 1942 | 20.34\% | 2.60\% | 2.46\% |
| 1944 | 19.75\% | 4.73\% | 2.46\% |
| 2012 | 16.00\% | 10.68\% | 2.46\% |
| 2014 | 13.69\% | 17.28\% | 2.46\% |
| 1943 | 25.90\% | 2.83\% | 2.48\% |
| 1938 | 31.12\% | 6.13\% | 2.52\% |
| 2017 | 21.83\% | 12.25\% | 2.54\% |
| 1936 | 33.92\% | 6.74\% | 2.55\% |
| 2011 | 2.11\% | 17.95\% | 2.55\% |
| 2015 | 1.38\% | -1.02\% | 2.68\% |
| 1951 | 24.02\% | -2.69\% | 2.69\% |
| 1954 | 52.62\% | 5.39\% | 2.72\% |
| 2016 | 11.96\% | 6.70\% | 2.72\% |
| 1937 | -35.03\% | 2.75\% | 2.73\% |
| 1953 | -0.99\% | 3.41\% | 2.74\% |
| 1935 | 47.67\% | 9.61\% | 2.76\% |
| 1952 | 18.37\% | 3.52\% | 2.79\% |
| 2018 | -4.38\% | -4.73\% | 2.84\% |
| 1934 | -1.44\% | 13.84\% | 2.93\% |
| 1955 | 31.56\% | 0.48\% | 2.95\% |
| 2008 | -37.00\% | 8.78\% | 3.03\% |
| 1932 | -8.19\% | 10.82\% | 3.15\% |
| 1927 | 37.49\% | 7.44\% | 3.17\% |
| 1957 | -10.78\% | 8.71\% | 3.23\% |
| 1930 | -24.90\% | 7.98\% | 3.30\% |
| 1933 | 53.99\% | 10.38\% | 3.36\% |
| 1928 | 43.61\% | 2.84\% | 3.40\% |
| 1929 | -8.42\% | 3.27\% | 3.40\% |
| 1956 | 6.56\% | -6.81\% | 3.45\% |
| 1926 | 11.62\% | 7.37\% | 3.54\% |
| 2013 | 32.39\% | -7.07\% | 3.78\% |
| 1960 | 0.47\% | 9.07\% | 3.80\% |
| 1958 | 43.36\% | -2.22\% | 3.82\% |
| 1962 | -8.73\% | 7.95\% | 3.95\% |
| 1931 | -43.34\% | -1.85\% | 4.07\% |
| 2010 | 15.06\% | 12.44\% | 4.14\% |
| 1961 | 26.89\% | 4.82\% | 4.15\% |
| 1963 | 22.80\% | 2.19\% | 4.17\% |
| 1964 | 16.48\% | 4.77\% | 4.23\% |
| 1959 | 11.96\% | -0.97\% | 4.47\% |
| 1965 | 12.45\% | -0.46\% | 4.50\% |
| 2007 | 5.49\% | 2.60\% | 4.50\% |
| 1966 | -10.06\% | 0.20\% | 4.55\% |
| 2009 | 26.46\% | 3.02\% | 4.58\% |
| 2005 | 4.91\% | 5.87\% | 4.61\% |
| 2002 | -22.10\% | 16.33\% | 4.84\% |
| 2004 | 10.88\% | 8.72\% | 4.84\% |
| 2006 | 15.79\% | 3.24\% | 4.91\% |
| 2003 | 28.68\% | 5.27\% | 5.11\% |
| 1998 | 28.58\% | 10.76\% | 5.42\% |
| 1967 | 23.98\% | -4.95\% | 5.56\% |
| 2000 | -9.10\% | 12.87\% | 5.58\% |
| 2001 | -11.89\% | 10.65\% | 5.75\% |
| 1971 | 14.30\% | 11.01\% | 5.97\% |
| 1968 | 11.06\% | 2.57\% | 5.98\% |
| 1972 | 18.99\% | 7.26\% | 5.99\% |
| 1997 | 33.36\% | 12.95\% | 6.02\% |
| 1995 | 37.58\% | 27.20\% | 6.03\% |
| 1970 | 3.86\% | 18.37\% | 6.48\% |
| 1993 | 10.08\% | 13.19\% | 6.54\% |
| 1996 | 22.96\% | 1.40\% | 6.73\% |
| 1999 | 21.04\% | -7.45\% | 6.82\% |
| 1969 | -8.50\% | -8.09\% | 6.87\% |
| 1976 | 23.93\% | 18.65\% | 7.21\% |
| 1973 | -14.69\% | 1.14\% | 7.26\% |
| 1992 | 7.62\% | 9.39\% | 7.26\% |
| 1991 | 30.47\% | 19.89\% | 7.30\% |
| 1974 | -26.47\% | -3.06\% | 7.60\% |
| 1986 | 18.67\% | 19.85\% | 7.89\% |
| 1994 | 1.32\% | -5.76\% | 7.99\% |
| 1977 | -7.16\% | 1.71\% | 8.03\% |
| 1975 | 37.23\% | 14.64\% | 8.05\% |
| 1989 | 31.69\% | 16.23\% | 8.16\% |
| 1990 | -3.10\% | 6.78\% | 8.44\% |
| 1978 | 6.57\% | -0.07\% | 8.98\% |
| 1988 | 16.61\% | 10.70\% | 9.19\% |
| 1987 | 5.25\% | -0.27\% | 9.20\% |
| 1985 | 31.73\% | 30.09\% | 9.56\% |
| 1979 | 18.61\% | -4.18\% | 10.12\% |
| 1982 | 21.55\% | 42.56\% | 10.95\% |
| 1984 | 6.27\% | 16.86\% | 11.70\% |
| 1983 | 22.56\% | 6.26\% | 11.97\% |
| 1980 | 32.50\% | -2.76\% | 11.99\% |
| 1981 | -4.92\% | -1.24\% | 13.34\% |

## Yields for Treasury Constant Maturities <br> Yearly for 2015-2019 <br> and the Twelve Months Ended December 2020

| Years | 1-Year | 2-Year | 3-Year | 5-Year | 7-Year | 10-Year | 20-Year | 30-Year |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2015 | 0.32\% | 0.69\% | 1.03\% | 1.53\% | 1.89\% | 2.14\% | 2.55\% | 2.84\% |
| 2016 | 0.61\% | 0.84\% | 1.01\% | 1.34\% | 1.64\% | 1.84\% | 2.23\% | 2.60\% |
| 2017 | 1.20\% | 1.40\% | 1.58\% | 1.91\% | 2.16\% | 2.33\% | 2.65\% | 2.90\% |
| 2018 | 2.33\% | 2.53\% | 2.63\% | 2.75\% | 2.85\% | 2.91\% | 3.02\% | 3.11\% |
| 2019 | 2.05\% | 1.97\% | 1.94\% | 1.96\% | 2.05\% | 2.14\% | 2.40\% | 2.58\% |



## Months

| Jan-20 | $1.53 \%$ | $1.52 \%$ | $1.52 \%$ | $1.56 \%$ | $1.67 \%$ | $1.76 \%$ | $2.07 \%$ | $2.22 \%$ |
| ---: | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Feb-20 | $1.41 \%$ | $1.33 \%$ | $1.31 \%$ | $1.32 \%$ | $1.42 \%$ | $1.50 \%$ | $1.81 \%$ | $1.97 \%$ |
| Mar-20 | $0.33 \%$ | $0.45 \%$ | $0.50 \%$ | $0.59 \%$ | $0.78 \%$ | $0.87 \%$ | $1.26 \%$ | $1.46 \%$ |
| Apr-20 | $0.18 \%$ | $0.22 \%$ | $0.28 \%$ | $0.39 \%$ | $0.55 \%$ | $0.66 \%$ | $1.06 \%$ | $1.27 \%$ |
| May-20 | $0.16 \%$ | $0.17 \%$ | $0.22 \%$ | $0.34 \%$ | $0.53 \%$ | $0.67 \%$ | $1.12 \%$ | $1.38 \%$ |
| Jun-20 | $0.18 \%$ | $0.19 \%$ | $0.22 \%$ | $0.34 \%$ | $0.55 \%$ | $0.73 \%$ | $1.27 \%$ | $1.49 \%$ |
| Jul-20 | $0.15 \%$ | $0.15 \%$ | $0.17 \%$ | $0.28 \%$ | $0.46 \%$ | $0.62 \%$ | $1.09 \%$ | $1.31 \%$ |
| Aug-20 | $0.13 \%$ | $0.14 \%$ | $0.16 \%$ | $0.27 \%$ | $0.46 \%$ | $0.65 \%$ | $1.14 \%$ | $1.36 \%$ |
| Sep-20 | $0.13 \%$ | $0.13 \%$ | $0.16 \%$ | $0.27 \%$ | $0.46 \%$ | $0.68 \%$ | $1.21 \%$ | $1.42 \%$ |
| Oct-20 | $0.13 \%$ | $0.15 \%$ | $0.19 \%$ | $0.34 \%$ | $0.55 \%$ | $0.79 \%$ | $1.34 \%$ | $1.57 \%$ |
| Nov-20 | $0.12 \%$ | $0.17 \%$ | $0.22 \%$ | $0.39 \%$ | $0.63 \%$ | $0.87 \%$ | $1.40 \%$ | $1.62 \%$ |
| Dec-20 | $0.10 \%$ | $0.14 \%$ | $0.19 \%$ | $0.39 \%$ | $0.66 \%$ | $0.93 \%$ | $1.47 \%$ | $1.67 \%$ |



## Measures of the Risk-Free Rate \& Corporate Bond Yields

The forecast of Treasury and Corporate yields
per the consensus of nearly 50 economists
reported in the Blue Chip Financial Forecasts dated December 1, 2020 and January 1, 2021

| Year | Quarter | Treasury |  |  |  |  | Corporate |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { 1-Year } \\ \text { Bill } \end{gathered}$ | 2-Year <br> Note | 5-Year Note | 10-Year Note | 30-Year Bond | Aaa Bond | Baa Bond |
| 2021 | First | 0.1\% | 0.2\% | 0.4\% | 0.9\% | 1.7\% | 2.5\% | 3.5\% |
| 2021 | Second | 0.2\% | 0.2\% | 0.5\% | 1.0\% | 1.8\% | 2.5\% | 3.6\% |
| 2021 | Third | 0.2\% | 0.3\% | 0.6\% | 1.1\% | 1.9\% | 2.6\% | 3.7\% |
| 2021 | Fourth | 0.2\% | 0.3\% | 0.6\% | 1.2\% | 2.0\% | 2.7\% | 3.8\% |
| 2022 | First | 0.2\% | 0.4\% | 0.7\% | 1.3\% | 2.1\% | 2.8\% | 3.8\% |
| 2022 | Second | 0.3\% | 0.4\% | 0.8\% | 1.4\% | 2.1\% | 2.8\% | 3.8\% |
| Long-range CONSENSUS |  |  |  |  |  |  |  |  |
| 2022 |  | 0.3\% | 0.4\% | 0.8\% | 1.3\% | 2.1\% | 2.8\% | 3.9\% |
| 2023 |  | 0.6\% | 0.8\% | 1.2\% | 1.7\% | 2.4\% | 3.2\% | 4.3\% |
| 2024 |  | 1.0\% | 1.2\% | 1.6\% | 2.0\% | 2.8\% | 3.6\% | 4.7\% |
| 2025 |  | 1.4\% | 1.6\% | 2.0\% | 2.4\% | 3.1\% | 4.0\% | 5.0\% |
| 2026 |  | 1.8\% | 1.9\% | 2.3\% | 2.6\% | 3.4\% | 4.2\% | 5.2\% |
| Averages: |  |  |  |  |  |  |  |  |
|  | 2-2026 | 1.0\% | 1.2\% | 1.5\% | 2.0\% | 2.8\% | 3.6\% | 4.6\% |
|  | 7-2031 | 2.1\% | 2.3\% | 2.5\% | 2.8\% | 3.6\% | 4.5\% | 5.4\% |
| Measures of the Market Premium |  |  |  |  |  |  |  |  |


| Value Line Return |  |  |
| :---: | :---: | :---: |
| As of: Dividend <br> Yield <br>  $2.0 \%$ | Median <br> Appreciation$+\frac{\text { Potential }}{7.79 \%}=$ | Median <br> Total <br> Return <br> $9.79 \%$ |
| DCF Result for the S\&P 500 Composite |  |  |
| $\begin{array}{cccc} \hline \mathrm{D} / \mathrm{P} & (1+.5 \mathrm{~g} & ) & + \\ 1.73 \% & (1.0470 & ) & + \end{array}$ | $\begin{gathered} \mathrm{g} \\ 9.40 \% \end{gathered}$ | $\begin{gathered} \hline k \\ 11.21 \% \end{gathered}$ |
| Summary |  |  |
| Value Line |  | 9.79\% |
| S\&P 500 |  | 11.21\% |
| Average |  | 10.50\% |
| Risk-free Rate of Return (Rf) |  | 2.10\% |
| Forecast Market Premium |  | 8.40\% |
| Historical Market Premium |  |  |
| Low Interest Rates (Rm) | (Rf) |  |
| 1926-2019 Arith. mean $11.92 \%$ | 2.88\% | 9.04\% |
| Average - Forecast/Historical |  | 8.72\% |

Exhibit 7.8: Size-Decile Portfolios of the NYSE/NYSE MKT/NASDAQ Long-Term Returns in Excess of CAPM
1926-2016

| Size Grouping | OLS Beta | Arithmetic <br> Mean | Return in Excess of Risk-free Rate (actual) | Return in Excess of Risk-free Rate (as predicted by CAPM) | $\begin{array}{r} \text { Size } \\ \text { Premium } \\ \hline \end{array}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Mid-Cap (3-5) | 1.12 | 13.82\% | 8.80\% | 7.79\% | 1.02\% |
| Low-Cap (6-8) | 1.22 | 15.26\% | 10.24\% | 8.49\% | 1.75\% |
| Micro-Cap (9-10) | 1.35 | 18.04\% | 13.02\% | 9.35\% | 3.67\% |
| Breakdown of Deciles 1-10 |  |  |  |  |  |
| 1-Largest | 0.92 | 11.05\% | 6.04\% | 6.38\% | -0.35\% |
| 2 | 1.04 | 12.82\% | 7.81\% | 7.19\% | 0.61\% |
| 3 | 1.11 | 13.57\% | 8.55\% | 7.66\% | 0.89\% |
| 4 | 1.13 | 13.80\% | 8.78\% | 7.80\% | 0.98\% |
| 5 | 1.17 | 14.62\% | 9.60\% | 8.09\% | 1.51\% |
| 6 | 1.17 | 14.81\% | 9.79\% | 8.14\% | 1.66\% |
| 7 | 1.25 | 15.41\% | 10.39\% | 8.67\% | 1.72\% |
| 8 | 1.30 | 16.14\% | 11.12\% | 9.04\% | 2.08\% |
| 9 | 1.34 | 16.97\% | 11.96\% | 9.28\% | 2.68\% |
| 10-Smallest | 1.39 | 20.27\% | 15.25\% | 9.66\% | 5.59\% |

Betas are estimated from monthly returns in excess of the 30-day U.S. Treasury bill total return, January 1926-December 2016. Historical riskless rate measured by the 91 -year arithmetic mean income return component of 20 -year government bonds ( $5.02 \%$ ). Calculated in the context of the CAPM by multiplying the equity risk premium by beta. The equity risk premium is estimated by the arithmetic mean total return of the S\&P 500 ( $11.95 \%$ ) minus the arithmetic mean income return component of 20-year government bonds ( $5.02 \%$ ) from 1926-2016. Source: Morningstar Direct and CRSP. Calculated based on data from CRSP US Stock Database and CRSP US Indices Database ©2017 Center for Research. Used with permission. All calculations performed by Duff \& Phelps, LLC

| Comparable Earnings Approach Using Non－Utility Companies with Timeliness of 1， 2 \＆3；Safety Rank of 1， 2 \＆3；Financial Strength Price Stability of 75 to 95 ；Betas of .75 to 1.15 ；and Techni |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Company | Industry | Timeliness Rank | $\begin{aligned} & \text { Sety } \\ & \text { Rank } \end{aligned}$ | Financial Strength | $\begin{gathered} \text { Price } \\ \text { Stability } \\ \hline \end{gathered}$ | Beta | $\begin{gathered} \text { Technical } \\ \text { Rank } \\ \hline \end{gathered}$ |
| Abbott Laboratories | Med Supp Non－Invasive | ${ }^{3}$ | 1 |  | 85 | 0.95 | 3 |
|  | Comuter sotware | 2 | 2 |  | 85 <br> 95 <br> 8 |  | 3 3 3 |
| Agient Technologies | ${ }^{\text {Precision Instume }}$ |  |  |  |  |  |  |
| Alleghany Corr | Insurance（iprooplas．） | 1 | 2 | A | ${ }_{85}$ | ${ }_{1.10}$ | 4 |
| Allstate Corooration | Insurance（Prop／Cas．） | 2 | 1 |  | ${ }^{95}$ | 1.00 | ${ }_{4}^{4}$ |
| Attria Group lic | Tobacco | ${ }_{2}$ | ${ }^{3}$ |  | ${ }^{90}$ | 0.90 |  |
| ${ }_{\text {Amazon com }}$ | Internet | 1 | 1 | A | ${ }_{90}$ | － 0.75 | 3 |
| AMETEK Inc． | Diversified Co | 3 | 2 |  | 90 | 0．95 | ${ }^{3}$ |
| Amgen Inc | Biotechnology | 2 | 1 | A | ${ }_{95}$ | 0.75 | 3 |
| Analog Devices inc | Semiconductor | 2 | 1 |  | ${ }^{90}$ | 0.95 | 3 |
| ANSYS Inc | Computer Software | 2 | ${ }^{2}$ |  | ${ }^{90}$ | 0.85 | 4 |
|  | Computers Periopherals | 2 | 1 | A | －${ }_{95}^{80}$ | 0.90 1.00 | 3 3 |
| Balchem Corp． | Chemical（Specialty） | 1 | 3 | 硡 | ${ }^{80}$ | 0.75 | 4 |
|  | Bank | ${ }_{3}^{2}$ | 3 2 | 厚 | ${ }_{75}^{75}$ | ${ }^{1.05}$ | ${ }_{3}^{4}$ |
| Beecon Dickinison and Company | Med Sup Invasive | 2 | 1 | A | 95 | 0.80 | 5 |
| Bio Rad Laboratoreses Inc | Med Supp Non－IVvasive | 1 | 2 |  | ${ }^{90}$ | 0.80 | 3 |
| ${ }^{\text {Bio Techne Corp，}}$ Bioso | Siolechnology | ${ }_{2}$ | ${ }_{3}^{2}$ | A | ${ }_{85}^{85}$ | 0.80 <br> 1.05 | 3 5 |
| Broariode Fin＇ | Information Serives | 2 | 2 |  | ${ }_{95}$ | ${ }_{0.85}$ | 3 |
| Brown Forman Corr（Class B） | Beverae | $3_{3}$ | 1 | A | ${ }^{95}$ | 0.85 | 3 |
|  | ${ }^{17}$ Senvices ${ }^{\text {Compures Sofware }}$ | ${ }^{3}$ | 3 2 |  | ${ }_{85}^{80}$ | 0.95 | 3 5 |
| Cadise Companies | Computirsofware | 3 | ${ }_{2}$ | A | ${ }_{80}$ | 1.10 | ${ }_{3}$ |
| Caseys General Stores Inc | RetailWholesale Food | ${ }^{3}$ | ${ }_{3}$ |  | 85 | 0.85 | ${ }^{3}$ |
| ${ }_{\text {Come }}^{\text {Cboe Giobal Markets }}$ Cemer Corp |  | ${ }_{3}$ | 2 | A | ${ }_{85}^{85}$ | ${ }_{0}^{0.95}$ | ${ }_{3}^{5}$ |
| Chareter Communic． | Cable TV | 1 | ${ }_{3}$ | A | ${ }_{85}$ | ${ }_{0.90}$ | 3 |
| Chemed Corporation | Diverssified CO ． | 3 | ${ }^{2}$ | A | ${ }^{95}$ | 0．85 | 4 |
| Ciscossystems Inc | Telecom．Equipment | ${ }_{2}$ | 1 |  | ${ }_{80}^{95}$ | 0.95 | 5 |
| Cognizant Technology Solutions Corp | IT Serices | 2 | 2 | A | ${ }_{80}$ | 1.05 | 3 |
| Cooper Companies inc | Med Sup Non－Invasive | 2 | 2 | A | ${ }^{85}$ | 0．95 | ${ }^{3}$ |
| ${ }_{\text {Coparat inc }}^{\text {Costar Grup lnc }}$ | Retal Automotive | ${ }_{3}$ | ${ }_{2}^{2}$ | A | ${ }_{80}$ | ${ }_{0}^{1.95}$ | ${ }_{3}^{4}$ |
| CSG Systems International nc | 1 T Senices | 3 | ${ }_{3}$ | A | ${ }_{85}$ | ${ }_{0.75}$ | 5 |
| CVS Caremark Corporation | Retail Store | 1 | ${ }_{2}$ | A | ${ }^{80}$ | ${ }^{0.90}$ | 3 |
|  | Heaw Truck \＆Equip | ${ }_{3}$ | 2 | A | ${ }_{90}^{75}$ | ＋1．15 | ${ }^{3}$ |
| Donaldson $\mathrm{Co}_{0}$ | Machinery | $3_{3}$ | ${ }_{2}$ | A | ${ }^{80}$ | ${ }^{1.15}$ | 3 |
| Eillily and Co |  | ${ }_{3}^{3}$ | 1 | A | ${ }_{90}^{95}$ | 0.75 1.00 | 3 3 |
| Estee Lauder Companies inc | Toiletries／Cosmetics | 2 | 2 | A | ${ }_{90}$ | 0.90 | 3 |
| Expeditors intermational of Washington | Industrial Serices | ${ }^{2}$ | 1 |  | ${ }_{90} 9$ | 0.95 | 3 4 4 |
|  | Intormaion Sevices | ${ }^{3}$ | 3 | A | 75 | ${ }_{0}^{0.90}$ | ${ }_{3}$ |
| Faciset Research Systems lnc | Information Serices | 3 | 2 | A | ${ }_{85} 8$ | ${ }^{1.00}$ | 3 |
| Prasienal First Republic Bank | ${ }_{\text {Rex }}^{\text {Reark }}$ Buluing Supply | ${ }_{1}$ | ${ }_{3}$ | A | ${ }_{80}^{80}$ | ${ }_{1}^{0.00}$ | ${ }_{3}$ |
| Frankiin leatric Co inc | Electrical Eavioment | ${ }^{3}$ | 3 | A | ${ }^{75}$ | 1.00 | 3 |
|  | （Intiormaion services | ${ }_{3}$ | ${ }_{3}$ |  | ${ }_{75}^{75}$ | 1.150 1.00 | ${ }_{3}$ |
| General Dymamics Corporation | Aerospac／Defense | 2 | 1 |  | 85 | 1.15 | 3 |
| Genter Corp | Auto parts | ${ }_{3}$ | 3 | 㤑 | 85 | 0．95 |  |
| Graco Inc | Mastinery | ${ }_{2}^{2}$ | ${ }_{2}^{2}$ | A | ${ }_{90}$ | ${ }_{1}^{1.05}$ | ${ }_{4}$ |
| Graphic Packaging | Packaging \＆Container | 3 | 3 |  | ${ }^{80}$ | 1.00 | 3 |
| Hanover Insurance Group lic | Insurance（Proop Cas．） |  | 2 | A |  | － |  |
| Hershey Company | Food Processing | 3 | 1 | A | ${ }_{95}$ | 0.85 | 3 |
| Huntington Ingals Industries lo | Aerospace／Defense | 3 | 3 | B | ${ }^{75}$ | ${ }_{1}^{1.05}$ | ${ }_{3}$ |
| IDEXCororoation | Machinery ${ }_{\text {Med Sup No－Invasive }}$ | ${ }_{1}^{3}$ | ${ }_{3}$ |  | ${ }_{75}$ | ${ }_{1}^{1.05}$ | 4 |
| Integr Lifiesciences Holdings Corporat | Med Supp Invasive | 3 | 3 | B | 75 | 1.00 | 4 |
| Intel Corporaion Interontinental Exch． |  | ${ }_{3}$ | ${ }_{2}^{1}$ | A | ${ }_{95}^{80}$ | ${ }_{0}^{0.85}$ | ${ }_{4}^{4}$ |
| Internaional Business Machines Corp | Computers／Peripherals | ${ }^{3}$ | 1 | A | 90 | 1.05 | 4 |
| Intut thc | Computer Sotware | 2 | 2 |  | 85 | 1.00 | 3 |
| Investors Bancorp lnc |  | ${ }^{3}$ | 3 | 厚 | ${ }_{80}^{80}$ | ${ }^{1.10}$ | ${ }_{4}^{5}$ |
| Jack Henny and Associates Inc | ${ }^{\text {IT }}$ ITsustrices | 2 | 1 | A | ${ }_{95}^{85}$ | ${ }_{0}^{0.85}$ | 3 |
| JPM Morgan Chase and Co | ${ }_{\substack{\text { Bank } \\ \text { Telcoom．Equipment }}}^{\text {a }}$ | 2 | 1 | A | ${ }_{80}^{85}$ | 1．10 |  |
| Kadant lnc | Diversified Co． | 3 | 3 | A | ${ }_{75}$ | 1.05 | 3 |
| Lindsay Corpora | ${ }_{\text {Machinery }}^{\substack{\text { Electical Equiment }}}$ | 1 | 3 | B | ${ }_{75}^{75}$ | ${ }^{0.85}$ | ${ }^{5}$ |
| Lockheed Martin Corp | Aerssaceidefense | 2 | 1 | A | 90 | 0.95 | 3 |
| ManTech International Corporation | ${ }_{\text {In Sersices }}^{\text {Insunce（Prop／Cas．）}}$ | ${ }_{1}^{3}$ | 3 2 | A | ${ }_{85}^{85}$ | ${ }_{1}^{0.155}$ | 3 3 |
| Masimo Corporation | Med Supp Non－Invasive | 1 | 3 | A | ${ }^{75}$ | 0.80 | 3 |
| Masterarard Incorporated MAXIMUS Inc | Financial Sves（Div．） | ${ }_{2}$ | 1 | A | ${ }_{85}^{90}$ | 1．05 | 3 3 |
| McCoormick and $C_{0}$ | Food Processing | 2 | 1 | A | ${ }_{95}$ | ${ }_{0.85}$ | 3 |
| Mercury General Corp | Insurance（Prop／Cas．） | ${ }^{3}$ | ${ }^{3}$ |  | 75 | 0.95 | 5 |
| Menter Toledol Interational lnc | ${ }_{\text {Prectision }}^{\substack{\text { Pstrument } \\ \text { Semicondutoror }}}$ | ${ }_{3}$ | ${ }_{3}$ | A | ${ }_{75}^{95}$ | －${ }_{1.90}$ | 3 4 |
| Monster Beverage Corporation | Beverage | 3 | 2 |  | 80 | 0.85 | 4 |
| Moootys Corp | Intiormation Serives | 3 | 3 | ， | ${ }^{80}$ | ${ }^{1.15}$ | ${ }^{3}$ |
|  | ，Intormation Serices | ${ }_{3}$ | ${ }_{3}^{3}$ | A | ${ }_{85}^{85}$ | ${ }_{1}^{0.95}$ | ${ }_{3}^{4}$ |
| New York $\mathrm{Times}_{\text {Co }}$ | Pubishing | ${ }_{3}^{3}$ | 3 | B | ${ }^{75}$ | 0.80 | 3 |
| Nike Inc | Shoe | ${ }^{3}$ | 1 |  | 75 | ${ }_{1.15}$ | ${ }^{3}$ |
|  |  | ${ }_{2}^{2}$ | 1 | ${ }^{\text {A }}$ | 90 | ${ }^{1.105}$ | 3 |
| Old National Bancorp | Bank（Midwest） | 2 | 3 3 3 | B | 80 | － | ${ }_{4}^{4}$ |
| Old Repubic Interational Corp |  |  | ${ }_{2}^{3}$ | A | ${ }_{80}^{80}$ | ${ }^{1.15}$ |  |
| Peoples United Financial Inc | Thrit | 2 | ${ }^{3}$ | B | ${ }^{80}$ | 1.00 | 4 |
| PeekinEImer Inc | ${ }_{\text {Prection }}^{\text {Pobaco }}$ Instrument | 1 | ${ }_{3}$ | 厚 | ${ }_{80}^{90}$ | ${ }_{0}^{0.95}$ | ${ }_{3}^{3}$ |
| Plexus Corp | Electronics | 3 | 3 | 8 | 75 | 1.05 | 3 |
|  | ${ }_{\text {Reocreation }}^{\text {Food Proessing }}$ | ${ }_{3}^{2}$ | ${ }_{3}$ |  | ${ }_{85}^{85}$ | ${ }_{0}^{0.95}$ |  |
| Progressive Corp． | Insurance（Prop／Cas．） | 1 | 1 | A | ${ }_{95}$ | 0.80 | 4 |
| Rayonier Inc | Paperl Forest Products | 3 | 3 | B | ${ }_{75}^{85}$ | ${ }_{105}^{1.05}$ | 3 |
| ${ }_{\text {Regil }}$ | Maschiner（Prop／Cas．） | 3 | ${ }_{2}$ | A | 95 | 0.75 | 3 |
|  | Maustria Senices | 1 | ${ }_{1}^{2}$ | A | ${ }_{95}^{90}$ | 0.85 1.00 0 | 3 3 |
| RPM Interational Inc | Chemical（Specialty） | 2 | ${ }_{3}^{3}$ |  | 75 | 1.10 | 3 |
| Selective Insurance Group lic Shewwi Wilims | Insurane（Piopol Cas．） | ${ }_{1}^{2}$ | ${ }_{1}^{3}$ | A | ${ }_{90}^{90}$ | ${ }_{0}^{0.85}$ | ${ }_{3}^{3}$ |
| Startucks Corporation | Restaurant | 2 | 1 | A | 90 | 0.95 | 3 |
| Sturke Corp | Med Sup I Invasive | 1 | 1 | A | 9080 | 1.10 <br> 0.95 | 3 4 |
| Telesme Technologies | Aerospaceldiefense | 2 | 3 | A | 80 | 1.15 | 3 |
| Texas instuments incorororated |  | 3 2 2 | 1 | A | ${ }_{95}^{95}$ | ${ }_{1}^{0.85}$ | ${ }_{3}^{3}$ |
| TJX Companies inc | Retail（Sottines） | 2 | ${ }_{3}^{3}$ | ， | ${ }_{80}^{80}$ | 1．15 | 3 |
| ${ }_{\text {Trach Co }}^{\text {Tractor Supoly }}$ Co | Machiner Retail suiding Supply | ${ }_{2}^{2}$ | ${ }_{2}^{2}$ | A | 75 | ${ }_{0.80}^{1.05}$ | 3 |
| Transmission Holdings inc | ${ }^{\text {Autuo Parts }}$ O | ${ }_{3}^{3}$ | 3 | B | ${ }_{80}^{80}$ | 1．10 | ${ }_{3}^{4}$ |
| Trimas corporation | linersitiod Co | 3 3 | 3 2 2 | A | 90 ${ }_{90}$ | ${ }_{0}^{0.95}$ | 3 4 |
| Unitedteath Group | Medical Serices | ${ }_{3}^{3}$ | 1 | A | ${ }_{85}^{80}$ | ${ }_{1}^{1.05}$ | ${ }_{3}^{3}$ |
| Us Bancorp ${ }_{\text {Vamont }}$ | Bank（Micwest） Diversfied Co． | ${ }_{3}^{3}$ | ${ }_{2}^{2}$ | A | ${ }_{80}^{85}$ | 1.05 | ${ }_{3}^{4}$ |
| Verisign Inc | Internet | ${ }^{3}$ | 3 | B | ${ }^{90}$ | 0.95 | 4 |
|  |  | ${ }_{2}^{3}$ | ${ }^{1}$ | A | ${ }_{95}^{95}$ | ${ }_{0}^{1.005}$ | ${ }_{4}^{3}$ |
| Waters Corp | Preacision nstrument | 2 | 2 | ${ }^{\text {A }}$ | ${ }_{9}^{90}$ | ＋1．95 | ${ }_{3}^{4}$ |
| Waits Waier Tectnologies Inc | Med Supe Non－Invasive |  | ${ }_{2}^{2}$ | A |  |  |  |
| Western Union Company | Financial Svos．（Div．） | 2 | 3 | A | ${ }_{95}$ | ${ }_{0} .80$ | 3 |
| Wile John and Sons inc（Class A） | Publishing Machinery | ${ }_{2}^{2}$ | 3 2 | 8 | ${ }_{85}^{85}$ | 0.90 1.05 | ${ }_{3}^{5}$ |
| Yum Brands inc | Restaurant | 3 | 3 |  | ${ }_{85}^{85}$ | 1.05 |  |
| Zoetis inc |  | 3 | 2 |  | 90 | 1.00 | 3 |
| Average |  | 2 | 2 | A | 85 | 0.96 | 3 |
| Electic Group | Average | 3 | 2 | A | 87 | 0.90 | 4 |



## Comparable Earnings Approach <br> Screening Parameters

Timeliness Rank
The rank for a stock's probable relative market performance in the year ahead. Stocks ranked 1 (Highest) or 2 (Above Average) are likely to outpace the yearahead market. Those ranked 4 (Below Average) or 5 (Lowest) are not expected to outperform most stocks over the next 12 months. Stocks ranked 3 (Average) will probably advance or decline with the market in the year ahead. Investors should try to limit purchases to stocks ranked 1 (Highest) or 2 (Above Average) for Timeliness.

| Safety Rank |
| :--- |
| A measure of potential risk associated with individual common stocks rather |
| than large diversified portfolios (for which Beta is good risk measure). Safety |
| is based on the stability of price, which includes sensitivity to the market (see |
| Beta) as well as the stock's inherent volatility, adjusted for trend and other |
| factors including company size, the penetration of its markets, product market |
| volatility, the degree of financial leverage, the earnings quality, and the overall |
| condition of the balance sheet. Safety Ranks range from 1 (Highest) to 5 |
| (Lowest). Conservative investors should try to limit purchases to equities |
| ranked 1 (Highest) or 2 (Above Average) for Safety. |

## Financial Strength

The financial strength of each of the more than 1,600 companies in the VS II data base is rated relative to all the others. The ratings range from $\mathrm{A}++$ to C in nine steps. (For screening purposes, think of an A rating as "greater than" a B). Companies that have the best relative financial strength are given an A++ rating, indicating ability to weather hard times better than the vast majority of other companies. Those who don't quite merit the top rating are given an A+ grade, and so on. A rating as low as $\mathrm{C}++$ is considered satisfactory. A rating of $\mathrm{C}+$ is well below average, and C is reserved for companies with very serious financial problems. The ratings are based upon a computer analysis of a number of key variables that determine (a) financial leverage, (b) business risk, and (c) company size, plus the judgment of Value Line's analysts and senior editors regarding factors that cannot be quantified across-the-board for companies. The primary variables that are indexed and studied include equity coverage of debt, equity coverage of intangibles, "quick ratio", accounting methods, variability of return, fixed charge coverage, stock price stability, and company size.

Price Stability Index

An index based upon a ranking of the weekly percent changes in the price of the stock over the last five years. The lower the standard deviation of the changes, the more stable the stock. Stocks ranking in the top $5 \%$ (lowest standard deviations) carry a Price Stability Index of 100; the next $5 \%, 95$; and so on down to 5 . One standard deviation is the range around the average weekly percent change in the price that encompasses about two thirds of all the weekly percent change figures over the last five years. When the range is wide, the standard deviation is high and the stock's Price Stability Index is low.

Beta
A measure of the sensitivity of the stock's price to overall fluctuations in the New York Stock Exchange Composite Average. A Beta of 1.50 indicates that a stock tends to rise (or fall) $50 \%$ more than the New York Stock Exchange Composite Average. Use Beta to measure the stock market risk inherent in any diversified portfolio of, say, 15 or more companies. Otherwise, use the Safety Rank, which measures total risk inherent in an equity, including that portion attributable to market fluctuations. Beta is derived from a least squares regression analysis between weekly percent changes in the price of a stock and weekly percent changes in the NYSE Average over a period of five years. In the case of shorter price histories, a smaller time period is used, but two years is the minimum. The Betas are periodically adjusted for their long-term tendency to regress toward 1.00 .

Technical Rank
A prediction of relative price movement, primarily over the next three to six months. It is a function of price action relative to all stocks followed by Value Line. Stocks ranked 1 (Highest) or 2 (Above Average) are likely to outpace the market. Those ranked 4 (Below Average) or 5 (Lowest) are not expected to outperform most stocks over the next six months. Stocks ranked 3 (Average) will probably advance or decline with the market. Investors should use the Technical and Timeliness Ranks as complements to one another.

BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

## Duquesne Light Company

Statement No. 14

Direct Testimony of James Milligan

Subjects: Capital Structure, Cost of Long-Term Debt, Credit Ratings, Liability Driven Investment Strategy for Pension Asse ts

Dated: April 16, 2021
Q. Please state your full name and business address.
A. James H. Milligan, 411 Seventh Avenue MD 7-3, Pittsburgh PA 15219.
Q. On whose behalf are you testifying?
A. Duquesne Light Company ("Duquesne Light" or "Company").

## Q. What is your position at Duquesne Light?

A. I am the Treasurer.
Q. What are your current responsibilities?
A. I am responsible for cash management, corporate insurance, capital markets transactions, pension administration, bank and rating agency relationship management, and financial planning, analysis, and valuation.
Q. Please describe your professional experience and educational background.
A. I received a Bachelor of Science in Marketing and Economics from Indiana University of Pennsylvania and a Master of Business Administration from the University of Pittsburgh. I am also a Certified Treasury Professional. I have been employed at Duquesne Light since February 2008 and in my current role since 2018. Prior to joining Duquesne Light, I served in various finance positions at Strategic Energy LLC and FirstEnergy Corp.
Q. Have you pre viously testified before the Commission or other regulatory agencies?
A. Yes, I testified in Duquesne Light's 2013 distribution rate case Docket No. R- 2013-2372129 and Duquesne Light's 2018 distribution rate case Docket No. 20183000124.

## Q. What is the purpose of your testimony?

A. I will explain the Company's current and future capital structure, cost of long-term debt, current credit ratings and the importance of maintaining Duquesne Light's credit ratings, which are challenged by the economic impacts related to the COVID-19 pandemic. Finally, I will discuss the Company’s Liability Driven Investment ("LDI") strategy for the Company's pension assets.
Q. Are you sponsoring any data filing requirements as part of your testimony?
A. Yes, I am sponsoring Duquesne Light's capitalization and cost of capital schedules. Please see Exhibit JHM-1 to see a list of data filing requirements that I am sponsoring.

## Company's Current and Future Capital Structure

## Q. Please review Duquesne Light's current and future capital structure.

A. The capital structure as of December 31, 2020 was approximately $47.7 \%$ debt and $52.3 \%$ equity. In May 2020, Duquesne Light issued $\$ 200.0$ million of $3.11 \%$ 30-year first mortgage bonds ("FMB") to fund capital expenditures, repay existing indebtedness and other general corporate purposes. During 2021, the Company plans to use $\$ 131.7$ million of retained earnings, or nearly $82 \%$ of projected net income, and short-term borrowings to support the Company's funding needs. During 2022, the Company anticipates further using retained earnings of $\$ 109.5$ million, or nearly $79 \%$ of projected net income, as well as issuing $\$ 150$ million of long-term debt to fund its needs. Funding needs during 2021 and 2022 include capital expenditures, some of which are directly related to the Company's long-term infrastructure improvement plan (LTIIP). In addition, the proceeds from the 2022 long-term debt issuance will be used to repay outstanding short-term borrowings accumulated during 2021. As a result of the increased retained earnings balances expected during the FTY and FPFTY, partially offset by the increased long-term debt, the Company's equity as a percentage of total capitalization is projected to increase to $53.35 \%$ by the end of the FPFTY. The increased retained earnings and higher equity capitalization will provide further credit support to the Company through the impacts of the COVID-19 pandemic.

## Q. What capital structure ratios did the Company use to calculate the revenue requirement in this proceeding?

A. For calculating the revenue requirement, the Company used a capital structure ratio of $46.65 \%$ debt and $53.35 \%$ equity, which represents the Company's estimated equity capitalization on December 31, 2022. This capital structure is largely in line with the average of the prior three years, as provided in DFR III A-2, and is consistent with Duquesne Light's capital structure in the FPFTY. Further, as described by Mr. Paul Moul in his testimony, DLC St. No. 13, this capital structure is within a range of capital structures employed by Duquesne Light's peers. This capital structure is also supportive of the increased equity required to be retained for the Company's capital program and for maintaining the Company's investment grade credit ratings in the wake of the COVID-19 pandemic.

## Cost of Long-term Debt

## Q. What is the cost of long-term debt for Duquesne Light?

A. The total adjusted long-term cost of debt requested in the Company's 2018 distribution rate case was $4.60 \%$. Given current rates, future anticipated long-term debt issuances, and the amortization of certain issuance and redemption expenses during the FTY and FPFTY, the total adjusted long-term cost of debt is expected to further decrease to approximately $4.29 \%$ by the end of the FPFTY.

## Importance of Maintaining Duquesne Light's Credit Ratings

Q. Why is it important for the Company to maintain its creditworthiness?
A. Duquesne Light's creditworthiness is used to determine whether, and at what cost, capital should be lent to the Company. The Company's credit ratings are a generally accepted indication of creditworthiness used by the capital markets. A low credit rating reduces the availability of capital and makes capital more expensive. A company with a noninvestment grade rating may have a smaller universe of buyers for its bonds, which increases the execution risk of issuing debt and increases the interest rate. Duquesne Light has ongoing needs to access the capital markets to fund many uses, most notably its capital expenditures needed to maintain reliable service to its customers. The Company must be able to attract this needed capital at reasonable terms in order to fund these requirements.

## Q. Please describe Duques ne Light's credit ratings.

A. Duquesne Light's current issuer or corporate credit rating is A3 and BBB+ as rated by Moody's and Standard \& Poor's, respectively. In its Credit Opinion released on June 29, 2020, Moody's noted that Duquesne Light's A3 rating reflects the Company's strong financial metrics and low risk, stable and predictable regulated business model. Moody's also notes that Duquesne Light is operating in the credit supportive Pennsylvania regulatory environment.

Standard and Poor's upgraded Duquesne Light's rating on December 19, 2019 from BBB to BBB+. On November 20, 2020, Standard \& Poor's affirmed the BBB+ issuer credit rating noting the Company's excellent business risk profile and stable credit metrics. Standard \& Poor's also notes that the Company operates in a constructive regulatory environment, noting the existence of several regulatory mechanisms, including future test years and distribution system improvement charge rider.

Please see Attachment DFR III-F-4c - Rating Agency Reports for a table illustrating Duquesne Light's credit ratings relative to the entire ratings table of Moody's and Standard \& Poor's. Duquesne Light's current issuer credit ratings from Moody's and Standard \& Poor's are at the lower end of the investment grade spectrum. A3 is four notches above non-investment grade and BBB is three notches above non-investment rating. As indicated in Attachment DFR III-F-4c - Rating Agency Reports, ratings below Baa3 for Moody's and BBB- for Standard \& Poor's are considered "non-investment" grade and certain investors are not permitted or are limited in the amount they may invest in bonds with noninvestment grade ratings.

## Q. Do you believe that Duquesne Light's current credit ratings provide the Company with the financial flexibility it requires to meet customer needs at reas onable rates?

A. Yes, Duquesne Light's current investment grade ratings are adequate to allow the Company to efficiently access the capital markets and do so at reasonable cost. However, the Company must be able to continue to show cash flows sufficient to recover costs and earn a reasonable return in the future to maintain these ratings. Any downward pressure on the rating agency's credit metrics could result in a downgrade of the issuer rating to noninvestment grade by one or both agencies, which, in turn, could result in higher financing costs and greater execution risk when accessing the capital markets. A one notch downgrade in credit ratings by both agencies could cost the Company an interest rate increase of approximately 25 basis points under the terms of its current Credit Agreement and 50 to 100 basis points on new long-term debt issued, depending on the tenor, or time to maturity, and other relevant factors. Maintaining current credit ratings ensures lower borrowing costs for Duquesne Light. Lower borrowing costs for Duquesne Light benefits ratepayers in the form of lower rates.

In addition to maintaining financial credit metrics consistent with the expectations for investment grade ratings, the rating agencies also consider qualitative factors, such as the regulatory environment in which Duquesne Light operates. As noted above, both Moody's and Standard \& Poor's view Pennsylvania as supportive and constructive. The Company's ability to earn a fair and reasonable return and reduce regulatory lag is supportive to the Company's existing investment grade credit ratings.

## Q. What impact did the COVID-19 pandemic have on the Company's creditworthiness and how have the rating agencies reacted to these negative consequences?

A. The Company's credit metrics were harmed by both the lower revenue as a result of lower customer usage and an increase in customer payment delinquency. Moody's and Standard \& Poor's are closely monitoring these developments, including the regulatory response to the challenges created by the pandemic. In its June 29, 2020 Credit Opinion, Moody's noted that it "is monitoring customer usage declines, utility bill payment delinquency, and the regulatory response to counter any negative impacts on earnings and cash flow. The effects of the pandemic could result in financial metrics that are temporarily weaker than expected but not reflective of the companies' core operations or long-term financial or credit profile." In short, the rating agencies are remaining patient with utilities to improve their lower than expected financial metrics in anticipation of a supportive regulatory response to the COVID-19 pandemic.

## Q. Are the results of this rate procee ding important to the Company's ability to maintain its current credit ratings?

A. Yes, as noted, the ability to recover costs and earn a reasonable return is an important criterion used by the rating agencies in determining the Company's creditworthiness. As noted, the support of the regulatory bodies is an important qualitative factor considered by the rating agencies. Regulatory support is always an important piece of rating agencies' creditworthiness criteria for utilities and is even more important during this period of uncertainty as utilities respond to the challenges created by the COVID-19 pandemic.

In addition to the regulatory environment, the rating agencies assess the Company's market position, and its overall financial strength. Using these criteria, Duquesne Light's small size and lack of geographic and market diversification require it to have stronger financial metrics and lower overall business risk in order to attain a similar rating as a larger, more geographically diverse utility. These risks are further exacerbated by the negative impacts of the COVID-19 pandemic. Stronger financial metrics would include having a capital structure with higher equity capitalization and stronger cash flows compared to interest and debt levels. As I noted previously, Duquesne Light plans to modestly increase its equity ratio from December 31, 2020 levels in response to these developments.

## Liability Driven Investment Strategy for the Company's Pension Assets

Q. Has Duquesne Light faced any challenges related to pension funding requirements as a result of market volatility and the economy in general over that past se veral years?
A. Yes, Duquesne Light's pension plan was more than fully funded at year-end 2007, but by year-end 2008 the funded status had deteriorated due to the sharp decline in the equity markets during that time period. The deterioration in the funded status resulted in higher required contributions to be made to the plan, as prescribed by The Pension Protection Act of 2006 ("PPA").
Q. Has the Company taken any steps to manage the funding risks presented by the pension plan?
A. Yes, the Company closed entry into its defined benefit plan for new management hires in 2007 and new union hires in 2010. The tangible benefits of closing the plan take several years to realize. It took until 2020 to reach the point at which less than half of the active employees were in the pension plan and accruing benefits. The risks associated with the pension liability related to active membership will continue to decrease as these members retire or are no longer employed by Duquesne Light. The Company also executed two lump sum buyouts of terminated and vested employees over the last five years. These lump sum buyouts reduced the size of the pension plan liability, while providing a beneficial option to those former employees.

## Q. Are there any additional strategies for managing the volatility of the pension's funded status and, the reby, manage the volatility of the pension funding requirements, which the Company is pursuing?

A. Yes, the Company began implementing a Liability Driven Investment ("LDI") strategy in 2012 to mitigate the volatility associated with pension plan funding. LDI is an investment strategy that focuses on managing pension assets in relation to pension liabilities. This investment strategy is not new, as insurance companies have been using it for many years under the name of Asset Liability Management. The strategy has been adopted by pension plan sponsors with a significant motivation to manage volatility of the pension funded status. Reduced volatility in pension plan funded status and pension plan funding can provide greater predictability to the Company's cash management and capital planning and ultimately provide for more stable rates for customers.

## Q. How does LDI mitigate funded status and funding requirement risks of the pension plan?

A. LDI is a risk and volatility mitigation strategy, but it does not eliminate risk and volatility. The overall goal of LDI is to minimize the volatility of Plan funded status, and thus contribution volatility, by investing in long duration fixed income strategies that attempt to better match the duration of the Plan's liabilities. To see how the volatility of the funding status is reduced by LDI, consider the following example. Assume interest rates decline. The discount rate used to calculate the present value of the pension plan liabilities declines, which results in the present value of the pension plan liabilities increasing due to the discounting of future benefit payments at lower rates. Simultaneously, as interest rates decline the market value of the pension plan fixed income assets increases due to the discounting of future coupon payments at lower rates. With perfect correlation, which is unattainable, the changes in the pension plan liability would move dollar for dollar with a change in the pension plan assets and vice versa. Nevertheless, the offsetting effects of the LDI strategy on assets and liabilities should dampen variations in the funded status of the Plan.

## Q. Are there any negative aspects of an LDI strategy?

A. An underfunded plan that switches to an LDI strategy could have higher funding contributions to return the plan to a fully funded status due to the plan's investments earning less. To offset this need for higher contributions, Duquesne Light has transitioned from its former return seeking strategy to an LDI strategy over time as funded status of the pension improves. This implementation plan balanced the near-term need for assets with
higher expected returns with a longer-term recognition that lower funded status volatility strategies is a more suitable investment strategy for the pension plan. As funded status improves, the plan has and will continue to increase the amount of assets invested in LDI mandate investments which will help to preserve the improved funded status. At present, the plan is more than $93 \%$ funded and has nearly $65 \%$ of its pension assets in an LDI mandate. A limit on the effectiveness of LDI is that even after LDI has been fully implemented by the Company, the pension plan will still not be perfectly hedged from movement in its liabilities, as interest-rate movements do not compose all variables that impact liabilities. In addition, it is never possible to perfectly match the liability discount rate with returns from fixed income of the same duration, so all of the risks associated with funding status will never be eliminated.

The market volatility at the beginning of the pandemic created a good test for the funded status of the pension plan and the Company's LDI strategy. Despite the S\&P 500 index decreasing in value by nearly $23 \%$ from December 31, 2019 to March 30, 2020, the funded status of the Duquesne Light pension plan decreased less than 5\% from 92.1\% to $87.3 \%$. Since that time, the funded status has more than fully recovered to $93.8 \%$ at yearend 2020.

## Q. Is LDI a common investment strategy for pension plans?

A. Yes, and it is increasing in popularity, especially with companies that are seeking to manage funded status volatility in order to avoid a recurrence of the large pension funding status deteriorations that have occurred in the past.

1 Q. Does that conclude your testimony?
2 A. Yes, it does.

| 53.53-II | PRIMARY STATEMENTS OF RATE BASE AN |
| :---: | :---: |
| 53.53-II-B | Rate Base Schedules |
| 53.53-II-B-4 | Cash working capital |
| 53.53-II-B-5 | Bank balances |
| 53.53-III | RATE OF RETURN |
| 53.53-III-A | Claimed Rate of Return |
| 53.53-III-A-1 | Embedded Cost of Long-term Debt |
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| 53.53-III-B | Embedded Cost of Long-term Debt |
| 53.53-III-B-1 | Detailed Schedule of claimed Long-term Debt |
| 53.53-III-B-2 | True/Economic cost if claimed |
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| 53.53-III-B-4 | Short term debt |
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| 53.53-III-C | Embedded Cost of Preferred Stock |
| :---: | :---: |
| 53.53-III-C-1 | Detailed Schedule of Preferred Stock |
| 53.53-III-D | Cost of Common Equity |
| 53.53-III-D-1 | Support of ROE |
| 53.53-III-D-2 | Stock dividends/splits |
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| 53.53-III-E-1 | Capital costs of parent if claimed |
| 53.53-III-E-2 | Historic Test Year \& 2 years prior capitalization of parent |
| 53.53-III-F | General Financial Data |
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## BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 15

Direct Testimony of Howard S. Gorman
Subjects: Jurisdictional Se paration and Allocated Cost of Service

Dated: April 16, 2021

## SECTION I - INTRODUCTION AND PURPOSE OF TESTIMONY

Q. Please state your name and occupation.
A. My name is Howard Gorman. I am the President of HSG Group, Inc., a consulting firm that I started in 2010.
Q. Please summarize your educational background and professional experience.
A. My educational background, professional experience and summary of testimony are presented in Attachment A.
Q. On whose behalf are you testifying in this proceeding?
A. I am testifying on behalf of Duquesne Light Company ("Duquesne Light" or "Company") in this proceeding before the Pennsylvania Public Utility Commission ("Commission").
Q. What is the scope of your testimony in this proceeding?
A. My testimony describes the Jurisdictional Separation Studies (each a "JSS") and the unbundled, Allocated Cost of Service Study ("ACOS") I have prepared for Duquesne Light with the Commission's Data Filing Requirements ("DFR"), specifically DFR IV-E-1.

The purpose of the JSS is to separate Duquesne Light's total annual revenue requirement among the following:

- Supply service,
- Portion subject to the jurisdiction of the Federal Energy Regulatory Commission ("FERC"), i.e., the transmission revenue requirement,
- Borough of Pitcairn, which is discussed below, and
- Portion subject to the jurisdiction of the Commission, i.e., the distribution revenue requirement.

In my testimony, "jurisdiction" means jurisdiction, or regulation, only as to rates.

Separate Jurisdictional Separation Studies were prepared for the year ended December 31, 2020 (Historic Test Year or HTY), for the year ended December 31, 2021 (Future Test Year or FTY) and for the year ended December 31, 2022 on a fully projected basis (Fully Projected Future Test Year or FPFTY).

The purpose of the ACOS is to assign, on a cost-causation basis, Duquesne Light's distribution revenue requirement (determined in the JSS) among the rate classes in its Tariff. The ACOS was prepared for the FPFTY.

## Q. Which study was used in revenue allocation and rate design?

A. The ACOS for the FPFTY, which assigns the distribution revenue requirement among the rate classes in the Tariff, was the basis for revenue allocation and rate design. In the FPFTY ACOS, the revenue requirement resulting from the ACOS for each rate class was compared to the revenue produced by the present Tariff rates, and this information was used for guidance by Duquesne Light in designing the rates it is proposing in this proceeding.

The HTY JSS and the FTY JSS were not used in determining the distribution portion of the total revenue requirement.

## Q. How is your testimony organized?

A. My testimony is organized as follows:

Section I (this section)- Introduction and purpose of testimony
Section II- Overview of ACOS

Section III- Identification and discussion of exhibits included with my testimony Section IV- Jurisdictional Separation Studies

Section V- Allocated Cost of Service Study
Section VI- Development of Allocators for FPFTY ACOS

## SECTION II - OVERVIEW OF JURISDICTIONAL SEPARATION STUDIES

AND ALLOCATED CLASS COST OF SERVICE STUDIES

## Q. Please describe the purpose of the JSS and how it is prepared.

A. The Company's filing in this proceeding is based on the investments made and to be made, and costs to be incurred, to provide distribution delivery service to its Pennsylvania jurisdictional customers. Company witness Mr. O’Brien has determined the Company's total revenue requirement for the FPFTY (Duquesne Light Exhibit No. 2). The purpose of the JSS is to separate the total revenue requirement, after first eliminating revenues and costs to provide supply service, between the portion subject to the jurisdiction of the FERC, i.e., transmission
revenue requirement, and the portion subject to the jurisdiction of the Commission, i.e., the distribution revenue requirement.

In addition, a portion of the total revenue requirement is assigned or allocated to the Borough of Pitcairn, which I discuss below.

In performing the JSS, each component of the total annual revenue requirement, including plant and other rate base items, operating expenses, depreciation and taxes, is analyzed, in order to directly assign or to allocate that item between transmission and distribution. The distribution revenue requirement amount determined in the JSS, is then allocated among the rate classes in the ACOS.

## Q. Please discuss how distribution service provided to the Borough of Pitcairn is reflected in the JSS.

A. The Borough of Pitcairn was historically a "sales for resale" customer of the Company and subject to the jurisdiction of the FERC. Subsequent to electric restructuring in Pennsylvania, Pitcairn now purchases its energy requirements from a wholesale provider, receives transmission service under the PJM Open Access Transmission Tariff and uses delivery service provided by the Company at 23 kV . The Company's distribution Tariff does not provide for this service (to a wholesale customer), therefore the costs associated with providing the service are removed in determining the distribution revenue requirement. To accomplish this, Pitcairn is represented as a separate jurisdictional column in the JSS.

## Q. Please describe the purpose of the ACOS and how it is prepared.

A. As discussed above, the Company's filing is based on its investments and costs incurred to provide distribution delivery service to its Pennsylvania jurisdictional customers. The purpose of the ACOS is to directly assign or allocate among the rate classes each component of the distribution revenue requirement, including plant and other rate base items, operating expenses, depreciation and taxes, in order to determine the cost of providing service to each rate class. Each component of the total revenue requirement must be analyzed and assigned or allocated among the rate classes, so that the utility can establish rates that, based on assumptions such as sales volumes and the number of customers, provide it with a fair opportunity to recover its costs and to earn an appropriate return.

A three-step process is traditionally used to analyze each component of the revenue requirement. The first step is Functionalization of each component; for Duquesne Light these functions are Primary Distribution, Secondary Distribution and Billing.

The second step is Classification of each functionalized component as Demand, Energy or Customer.

The final step, Class allocation, is the allocation of each functionalized, classified component among the rate classes.

The results of the ACOS, that is, the distribution revenue requirement determined for each rate class, are compared to the revenue produced by the present Tariff rates; this information was used by Duquesne Light for guidance in designing the rates it is proposing in this proceeding.

## Q. What is meant by "direct assignment?"

A. The term "direct assignment" means identifying plant investments or costs incurred exclusively to serve a specific customer or group of customers. Direct assignments best reflect the cost causation of serving particular customers or rate classes. Therefore, direct assignments should be used whenever possible.

## Q. What are External allocators and Internal allocators.

A. Two types of allocators are used in performing a JSS or ACOS: external allocators and internal allocators. External allocators are based on special studies derived from the utility's accounting, operating and other records. For example, the allocator 'NCP-Primary" measures each class' peak, not necessarily coincident with the system peak, and is used to allocate certain demand costs. Other examples of external allocators are the number of customers in each rate class, meter costs for each rate class and historical bad debt experience for each rate class.

Internal allocators are based on some combination of external allocators, previously directly assigned costs and other internal allocators. For example, the allocators for property insurance costs are based on plant investments; it is necessary to allocate plant investments before property insurance costs can be allocated. Both external and internal allocators are used in each of the functionalization, classification and allocation steps.

## Q. What is the FPFTY total revenue requirement?

A. The FPFTY total revenue requirement was determined by Duquesne Light witness O'Brien to be $\$ 1,036.279$ million, which includes a return on distribution rate base, as well as overall total company rate base, of $7.84 \%$. The exhibits that I am sponsoring show, by FERC account, the composition of the total revenue requirement for the JSS, and the composition of the distribution revenue requirement for the ACOS.

## Q. What are the revenue at present rates in the FTY and the FPFTY?

A. The supply, transmission and distribution revenue at present rates for the FTY and the FPFTY were computed by Duquesne Light witness Ogden, as shown on Attachment DFR IV-A Fully Projected Future (page 2, columns I, J and K). This information was used in the JSS and the ACOS; the distribution revenue at present rates was also used in the ACOS.

## Q. What rate classes are represented in the ACOS?

A. The ACOS includes the following rate classes:

Residential (RS)
Residential Heating (RH)
Residential Add-on Heat (RA)
General Service Small (GS)
General Service Medium<25 (GM<25)
General Service Medium>25 (GM>25)
General Service Medium Heating<25 (GMH<25)
General Service Medium Heating>25 (GMH>25)
General Service Large (GL)
General Service Large Heating (GLH)
Large (L)
High-Voltage Power Service (HVPS)

Street Lighting Energy (SE)
Street Lighting (SM)
Unmetered Service (UMS)

## Q. Are these the rate classes that are currently in the Tariff?

A. Yes, with the following explanations and exceptions:

1. The current Tariff class GSGM includes a separate set of rates for each of the following customer load profiles: a) GS No Demand; b) GM Demand under $25 \mathrm{~kW}(\mathrm{GM}<25)$ and c$) \mathrm{GM}$ Demand 25 kW and greater $(\mathrm{GM}>25)$. Because there is a different set of rates for each customer load profile, they are represented separately in the ACOS.
2. The current Tariff class GMH was split into two groups in the ACOS, because they are represented as separate customer load profiles in the Company's supply tariff: a) GMH Demand under 25 kW (GMH<25) and b) GMH Demand 25 kW and greater (GMH<25).
3. The ACOS rate class group Street Lighting (SLM) comprises four Tariff rate classes: Street Lighting Municipal (SLM), Street Lighting Highway (SLH), Private Area Lighting (PAL) and Architectural Lighting (AL). SLM, SLH and PAL have the same load and usage profiles. AL is very small and was included in the group for convenience. The current Lighting classes will remain separate classes in the Tariff.
Q. Please describe the functions that are included in Distribution.
A. Distribution comprises the functions Primary Distribution, Secondary Distribution and Billing. The distribution system, Primary Distribution and Secondary

Distribution, moves power from distribution substations to the Company's customers. The distribution system includes operating facilities rated below 69 kV ; Primary Distribution includes assets rated 4 kV through 23 kV and Secondary Distribution includes all other distribution assets related to moving power to customers, including service drops and excluding meters. Billing includes metering, billing and customer accounting and service.
Q. Did you pre pare the Company's JSS and ACOS in its most prior recent base rate case before this Commission, Docket No. R-2018-3000124?
A. Yes, I prepared the Company's JSS and ACOS in that proceeding.
Q. Did you use the same methodology to prepare the JSS and ACOS that you are presenting today, as in Docket No. R-2018-3000124?
A. Yes, the same methodology was used.

SECTION III- IDENTIFICATION AND DESCRIPTION OF EXHIBITS
Q. Please identify the exhibits that are included with your testimony.
A. My testimony includes exhibits identified in the Index to Exhibit 6. The JSS for the FPFTY, FTY and HTY are presented in Exhibits 6-1, 6-1A and 6-1B respectively. The ACOS for the FPFTY is presented in Exhibits 6-2 through 6-9, including Development of Allocator values on Exhibit 6-9. Exhibit 6-10 shows the proposed Revenue Allocation, which is described in Mr. Ogden's testimony,
including Distribution ROR at Proposed Revenue Allocation. Exhibit 6-11 presents the SL- Distribution-only Component.

## Q. Please describe Exhibits 6-1, 6-1A and 6-1B.

A. Exhibit $6-1$ presents the jurisdictional separation for the FPFTY. The exhibit shows each item in the total revenue requirement, the direct assignment or allocator selected for that item, and the result of the allocation (or assignment) among supply, transmission, Pitcairn and distribution.

The components of the revenue requirement are: plant and other rate base (lines 1-76), operating expenses (lines 77-137), depreciation expense (lines 138159) and taxes (lines 160-177). Revenues (lines 181-189) are compared to total expenses (line 179, also line 191) to compute net income at present rates (line 192, also line 210) and return on rate base (line 212).

The distribution revenue required to produce a rate of return of $7.84 \%$ in the FPFTY is computed on lines 214-230, and the difference between the revenue requirement and revenue at present rates is shown on line 233.

The distribution revenue requirement for the FPFTY is $\$ 654.1$ million, an increase of $\$ 85.76$ million over Distribution revenue at present rates.

Exhibit 6-1A and Exhibit 6-1B present the JSS for the HTY and the FTY, respectively. The line references are the same as for Exhibit 6-1.

## Q. Please describe Exhibit 6-2.

A. Exhibit 6-2 summarizes the results of the ACOS for the FPFTY. The exhibit presents, for each rate class, the return on rate base at present rates for the FPFTY, and the FPFTY revenue requirement assuming each class provides the rate of return on rate base requested by the Company in this proceeding, $7.84 \%$.

The exhibit shows revenue at present rates (lines $1-4$ ), expenses (line 6), net income (line 7) and rate base (line 9) for each rate class, and computes return on rate base at present rates (line 11). The revenue requirement for each rate class to produce a rate of return of $7.84 \%$ is on line 13 , and the corresponding net income and rate of return for each rate class are computed on lines 15-25. The exhibit computes the increase or decrease in distribution revenue for each class to produce the $7.84 \%$ return (line 27), and the percentage of total revenue (line 28) and distribution tariff revenue (line 29 ) this increase represents.

The exhibit demonstrates that to produce the return on rate base of $7.84 \%$ an increase in distribution revenue of $\$ 85.76$ million, or $15.58 \%$ of distribution tariff revenue ( $15.09 \%$ of total distribution revenue), is needed.

## Q. Please describe Exhibit 6-3.

A. Exhibit 6-3 presents the results of the ACOS, summarized by functional classification (primary distribution, secondary distribution- demand related, secondary distribution- customer related and billing) and also shows unitized revenue requirements. This information is useful in rate design.

## Q. Please describe Exhibits 6-4 through 6-4F.

A. Exhibits 6-4 through 6-4F compute the costs to be considered in determining the customer charge, based on PUC precedent, for the following rate classes: RS (Exhibit 6-4A); GS (Exhibit 6-4B), GM<25 (Exhibit 6-4C); GM>25 (Exhibit 64D); GMH (Exhibit 6-4E); and L (Exhibit 6-4F), with a summary on Exhibit 6-4. The amounts on these exhibits are based on the results of the ACOS.

## Q. Please describe Exhibit 6-4G.

A. Exhibit 6-4G computes the credit for untransformed service.

## Q. Please describe Exhibit 6-5.

A. Exhibit 6-5 shows how each component of the FPFTY revenue requirement has been functionalized in this study, among one or more of the following functions: Primary Distribution, Secondary Distribution and Billing. The exhibit shows the allocator selected for each component, and the result of the allocation. The line references are the same as for Exhibit 6-1.

## Q. Please describe Exhibit 6-6.

A. Exhibit 6-6 shows how each component of the Secondary Distribution function has been classified to either Demand or Customer. Classification schedules are not needed for Primary Distribution because it is classified $100 \%$ to Demand or for Billing because it is classified $100 \%$ to Customer. The exhibit shows the
classification allocator selected for each component, and the result of the allocation. The line references are the same as for Exhibit 6-1.

## Q. Please describe Exhibits 6-7 through 6-7D.

A. Exhibits $6-7$ through $6-7 D$ show how each component of the functionalized, classified costs has been allocated among the rate classes. This includes Primary Distribution Demand (Exhibit 6-7A), Secondary Distribution Demand (Exhibit 67B), Secondary Distribution Customer (Exhibit 6-7C) and Billing Customer (Exhibit 6-7D). The information is summarized on Exhibit 6-7. The Balance totals for Primary Distribution Demand and Billing Customer are from Exhibit 6-5 (Functionalization), and the balance totals for Secondary Distribution Demand and Secondary Distribution Customer are from Exhibit 6-6 (Classification- Secondary distribution). Each exhibit shows the allocation factor selected to allocate each component among the rate classes, and the result of the allocation. The line references are the same as for Exhibit 6-1.

## Q. Please describe Exhibits 6-8 through 6-8D.

A. Exhibit $6-8$ shows the allocator used for each account. The exhibit includes columns for JSS, Functionalization; Classification (Secondary Distribution) and Class Allocation (Primary Distribution Demand, Secondary Distribution Demand, Secondary Distribution Customer and Billing Customer).

Exhibits 6-8A through 6-8D show the allocator values for, respectively, JSS, Functionalization, Classification and Class Allocation.
Q. Please describe Exhibit 6-9.
A. Exhibit $6-9$ shows the development of the external allocator values. I will discuss each exhibit in detail later in my testimony.

## SECTION IV- JURISDICTIONAL SEPARATION STUDIES

Q. Referring to Exhibit 6-1, the JSS for the FPFTY, how did you determine the appropriate direct assignment or allocator for the jurisdictional separation of each item in the total revenue requirement?
A. Selection of the appropriate direct assignment or allocator for the jurisdictional separation of each component of the total revenue requirement was based on careful consideration of cost causality, as well as prior Duquesne Light methodology, Commission precedent and utility practice as stated in the Electric Utility Cost Allocation Manual (January 1992) of the National Association Of Regulatory Utility Commissioners ("NARUC Manual"). Cost causality means the cause and effect relationships between customer requirements, load profiles and usage characteristics on one hand, and the costs incurred to serve those requirements on the other hand.
Q. How did you directly assign or allocate the components of rate base for the purpose of jurisdictional se paration?
A. Intangible assets is primarily software, and the components of this asset were allocated according to their use for customer-related activities, AMI initiative and other activities.

Transmission plant and distribution plant were directly assigned to their respective functions based on the FERC accounts, except for the distribution assets that serve Pitcairn, which were directly assigned to it. The Company's FERC accounts reflect the 7 -factor test (separating Transmission and Distribution assets) completed in connection with its filing in Docket R-00061346.

General plant was allocated based on the labor content of operating and maintenance ("O\&M") accounts.

Depreciation reserve followed the plant and asset accounts to which it related.

Other rate base items were provided by function (Accumulated deferred income tax, Materials \& supplies) or were directly assigned (Customer deposits) or allocated (Cash working capital, Capitalized pension).
Q. How did you directly assign or allocate costs for the purpose of jurisdictional separation?
A. Supply costs and Transmission $O \& M$ were directly assigned to their respective functions. Distribution $O \& M$ was directly assigned to the distribution function, except for a small portion that was allocated to Pitcairn based on its share of the
distribution assets that serve Pitcairn. Customer accounts and customer service costs were directly assigned to Distribution.

Most Administrative \& general costs were allocated based on labor content of O\&M accounts. Customer-related items were directly assigned to distribution; and property insurance was allocated based on plant cost.

Depreciation expense followed the plant or assets accounts to which it related.

Taxes were allocated based on labor (payroll taxes), plant cost (PURPA tax), revenue subject to Pennsylvania gross receipts tax; or taxable income (Pennsylvania and Federal income tax).
Q. How did you directly assign or allocate revenue for the purpose of juris dictional separation?
A. Each revenue component was directly assigned to one jurisdictional column. Supply and Transmission revenue were directly assigned to their respective functions; these amounts include miscellaneous revenues directly identified to those functions. Distribution revenue, including delivery revenue and other revenues included in this proceeding, were directly assigned to distribution.
Q. How did you compute the Pennsylvania jurisdictional distribution revenue requirement?
A. The Pennsylvania jurisdictional distribution revenue requirement is computed on lines 214-230. It is the amount required to recover all jurisdictional costs, and to provide an after-tax return on jurisdictional rate base of $7.84 \%$.
Q. Do the JSS for the HTY, presented in Exhibit 6-1A, and the JSS for the FTY, presented in Exhibit 6-1B, compute the respective jurisdictional revenue requirement in the same manner as the JSS for the FPFTY, presented in Exhibit 6-1?
A. Yes.

## SECTION V - ALLOCATED COST OF SERVICE (ACOS) STUDY

Q. Referring to Exhibits 6-2 through 6-8D, the ACOS for the FPFTY, how did you determine the appropriate allocators for functionalizing, classifying and allocating the components of the distribution revenue requirement?
A. Selection of the appropriate approach for functionalizing, classifying and allocating each component of the revenue requirement was based on careful consideration of cost causality, as well as prior Duquesne Light methodology, Commission precedent and utility practice as stated in the NARUC Manual. Cost causality means the cause and effect relationships between customer requirements, load profiles and usage characteristics on one hand, and the costs incurred to serve those requirements on the other hand.

## Functionalization

Q. Please describe the functionalization step in preparing the ACOS.
A. In the functionalization step, costs are separated by the utility's basic service functions; for Duquesne Light, these are Primary Distribution, Secondary

Distribution and Billing. There are separate functions for Primary Distribution and Secondary Distribution because some customers take service at Primary voltages; therefore it is necessary to separate the assets so that only the customers that use each portion of the system are allocated the costs attributed to that portion. Billing refers to activities starting at the meter on the customer's premises, and includes metering activities and customer care, as well as activities intrinsic to the utility function.

## Q. Were any assets refunctionalized?

A. For the most part, functionalization follows costs as recorded in the FERC Uniform System of Accounts. However, some accounts were split into more than one cost component. For example, a portion of Station Equipment (Account 362) representing assets used to serve customers in the downtown network was split out in order to allocate the cost among the appropriate rate classes.

Underground Conduits (Account 366) and Underground Conductors (Account 367) were split into separate components representing three different portions of the underground system- Radial; Network; and Underground Residential Development ("URD"), based on Company engineering estimates and judgments.

Exhibit 6-5 shows the amount for each FERC account and other components included in the revenue requirement (in the column "Balance"), the functional allocator used for each (in the column "Allocator"), and the amounts assigned to each function (in the columns "Primary Distribution" and "Secondary

Distribution" and "Billing"). The revenue requirement for each function is shown on line 230. Exhibit 6-8B shows the values for each functional allocator.

## Q. How were assets functionalized between the Primary Distribution and Secondary Distribution functions?

A. Duquesne Light's Primary Distribution system operates at voltages of 4 kV up to 23 kV . In recent years, Duquesne Light has converted much of the 4 kV system to 23 kV , and has expanded the 23 kV portion of the system.

Structures (Account 361) and Station Equipment (Account 362) are part of the Primary Distribution system.

Overhead Conductors and Devices (Account 365) were functionalized between Primary Distribution and Secondary Distribution based on a review of purchases over the period 1999-2019.

Poles, Towers and Fixtures (Account 364) were allocated proportionately to the Overhead Conductors and Devices they support.

Each component (Radial, Network, and URD) of Underground Conduits (Account 366) and Underground Conductors (Account 367) was functionalized between Primary Distribution and Secondary Distribution based on a review of purchases over the period 1999-2019.

Line Transformers (Account 368) has subaccounts for Overhead, Radial, Network and URD. Almost all transformers are part of the Secondary Distribution system, except for some of the larger Overhead transformers which are part of the Primary Distribution system.

Services (Account 369) are also part of the Secondary Distribution system, and Meters (Account 370) are part of the Billing function. Street Lighting Equipment (Account 373) is part of the Secondary Distribution system.

Exhibit 6-9B summarizes the results of the functionalization of distribution assets (accounts 360-373 in the USA) between Primary Distribution and Secondary distribution. Exhibit 6-9C shows the supporting calculations.

## Classification

## Q. Please describe the classification step in preparing the ACOS.

A. In the classification step, the previously functionalized accounts are separated into Customer, Energy or Demand, according to the system design or operating characteristics that cause them to be incurred.

Customer-related costs are incurred to attach a customer to the distribution system, to operate and maintain the Company's distribution plant, to meter usage, and to maintain the customer's account. Customer-related costs are primarily a function of the number of customers served and continue to be incurred whether or not a particular customer uses any electricity, and typically do not vary with usage or load profile. They include capital costs associated with the customer portion of the distribution system, services and meters, and operating costs such as customer service, field service, billing and accounting.

Energy-related costs would vary with the amount of electricity sold to or delivered to customers. In the ACOS, no costs or rate base were allocated on the basis of energy (MWh).

Demand-, or capacity-, related costs are associated with plant that is designed, constructed and operated to meet system peak demand or non-coincident class peak demand.

## Q. How were assets and costs classified?

A. Most assets and costs fit into one of the three classifications, but some are split between Demand and Customer based upon special studies or based on the classification of related assets or other related costs.

On the Duquesne Light system, Primary Distribution plant is designed to meet localized peak demands; these functions are classified $100 \%$ to Demand. The Billing function is classified $100 \%$ to Customer.

Secondary Distribution plant has two purposes- to connect the customer in order to carry electricity to the customer regardless of use, and to meet localized peak demands. Most Secondary Distribution assets (i.e., Overhead Conductors; Underground Conduits; Underground Conductor; and Line Transformers) were classified as Demand or Customer using a Minimum System approach. In the Minimum System approach, for each Secondary Distribution asset class, the Minimum Size Ratio was computed, equal to the ratio of $x$ ) the cost of the minimum size of that asset necessary to provide reliable distribution service to y) the average cost of that asset. The utility must install the minimum size asset, and incur the cost for that asset, simply to connect the customer, regardless of usage or load profile, and the cost of the minimum size asset is not related to usage ( kWh ) or peak demand. Therefor the portion of total asset cost represented by the Minimum

System Ratio is classified as Customer-related. The balance of each Secondary Distribution asset account is classified as Demand-related.

Investments in Poles, Towers and Fixtures are classified as Customer proportionately to Overhead Conductors. Services, Meters and Meter Communications Equipment, and Street Lighting assets are classified as Customer. Secondary Distribution costs that are related to particular assets were classified in proportion to those assets. For example, Maintenance of Overhead Lines (Account 593) was classified using the same classification allocator as Overhead Lines. Other costs, such as general plant and administrative and general expenses, are related to more than one function. Therefor each item in Other costs was analyzed to determine the appropriate classification allocator.

Exhibit 6-6 shows the classification of each component in the Secondary Distribution function by FERC account. Primary Distribution is classified $100 \%$ to Demand and Billing is classified $100 \%$ to Customer, so there is no need to show the classification by FERC account. Exhibit 6-8C shows the values for each classification allocator.

## Q. Please describe the Minimum System approach used in the ACOS.

A. The Minimum System approach was used for Secondary system Line Transformers, Overhead Conductors and Underground Conductors.

For Line Transformers, Duquesne Light provided detailed historical records by size and by cost for each of Overhead transformers (Account 368.1), Underground Radial transformers (Account 368.3), Underground Network
transformers (Account 368.5) and URD transformers (Account 368.7). For each of these accounts, the Minimum System Ratio, equal to the ratio of ( x ) the cost of the minimum size transformer to (y) the average cost of all transformers, was computed, using recent costs. The Minimum System Ratio represents the Customer component of cost, and is computed by dividing (a) what the account balance would be if all units in the account were equivalent to the minimum size unit, by (b) the total account balance.

For Overhead Conductors and Underground Conductors, historical information by size and by cost was not available. For each item, the ratio of (x) the estimated current cost if the minimum size (voltage rated) unit would be installed to (y) the estimated average current cost of all units, was computed; this ratio equals the Customer component of cost. Separate minimum size computations were made for Overhead Conductors and each component of Underground Conductors (Radial, Network and URD).

Exhibit 6-9B summarizes the classification of distribution assets (Accounts 360-373 in the FERC USA) based on the Minimum System Study, and Exhibit 69 C shows the supporting calculations.

The demand-classified portions of certain of these assets were adjusted to reflect the ability of the minimum size system to carry a portion of peak load (Peak Load Carrying Capacity, or "PLCC"). I will discuss the PLCC adjustment below.

## Q. Please describe the class allocation step in preparing the ACOS.

A. In the class allocation step, the functionalized, classified costs are allocated among the rate classes, based on causal relationships. These relationships are determined by analyzing the Company's system design and operations, its accounting records and its system and customer load data. Based on those analyses, direct assignments of costs, as well as cost allocators, can be chosen for each asset and cost.
Q. How were the components of the rate base in the Distribution revenue requirement allocated among the rate classes in the ACOS?
A. Demand-related assets, or the demand-related portions of assets, were allocated based on the appropriate class non-coincident peak ("NCP") allocator. Exhibit 69D identifies the demand allocator selected for the demand component of each type of asset (Distribution Substations; Poles, Tower and Fixtures and Overhead Conductors; Underground Conduits and Underground Conductors; and Line Transformers). Separate NCP allocators were developed for the different configurations of the distribution system, as described in Exhibit 6-9D.

Customer-related assets, or the customer-related portions, were allocated based on the number of customers that use the asset, or special studies for Services (Account 369- based on the comparative costs of installing residential and commercial services), Meters (Account 370-based on the number and types of meters used by each rate class) and related assets.

The total Meter cost in Account 370 reflects the installed costs of meters, which include the costs of Automated Metering Infrastructure ("AMI"). The installed costs of meters was allocated based on whether the class uses
predominantly single-phase meters (residential classes and GS), both single phase and poly-phase meters ( $\mathrm{GM}<25$ and $\mathrm{GMH}<25$ ) or predominantly poly-phase meters (all other classes except Lighting and unmetered). A separate allocator was developed for AMI costs, which are included in Intangible Assets. This is consistent with the methodology used for the current Smart Meter surcharge pursuant to the Commission's Order in Docket M-2009-2123948.

General plant was allocated based on the labor content of O\&M accounts. Depreciation reserve and Accumulated deferred income tax followed the plant and asset accounts to which they related.

Cash Working Capital, Materials \& supplies and Capitalized pension were allocated using internal allocators, and Customer deposits was directly assigned Each of Exhibits 6-7A though 6-7D shows the allocator used for each component of the rate base functionally classified as Primary Demand, Secondary Demand, Secondary Customer and Billing Customer, respectively.

## Q. How were costs in the Distribution revenue requirement allocated among the rate classes in the ACOS ?

A. The demand-related and customer-related components of O\&M costs followed the allocation of the particular assets to which they related. For example, Maintenance of Overhead Lines (Account 593) was allocated using the same allocators as the plant asset Overhead Conductors, (Account 365) and Maintenance of Underground Lines (Account 594) was allocated in proportion to the total of the plant assets Underground Lines- Radial, Network and URD (Account 367). A special study was used to develop the allocator for Meter Expenses (Account 586) and Maintenance of Meters (Account 597).

Miscellaneous Distribution Expenses (Account 588) and Maintenance of Miscellaneous Plant (Account 599) were functionalized, classified and allocated in proportion to distribution plant.

Customer accounts and services (Accounts 901-908) were analyzed to determine the activities charged to each account, and each activity was allocated based on the appropriate causal relationship. The analysis is shown on Exhibit 691.

Administrative and general expenses (Accounts 920-935) were allocated primarily based on the labor content of OM accounts.

Depreciation expense followed the plant accounts to which it related.
Payroll taxes were allocated based on labor; PURPA tax was allocated based on plant cost, Pennsylvania gross receipts tax was allocated based on revenue subject to the tax; and income tax expense was allocated based on pretax income.

Each of Exhibits 6-7A through 6-7D show the allocator used for each component of costs functionally classified as Primary Demand, Secondary Demand, Secondary Customer and Billing Customer, respectively.

## Q. How was revenue at present rates applicable to the Distribution revenue

 requirement allocated among the rate classes in the ACOS?A. Distribution delivery revenue was directly assigned based on Attachment DFR IVA Fully Projected Future (page 2, columns E through H, which includes the DSIC
and STAS charges that are being rolled into base rates, and the adjustments for Energy Efficiency and revenue annualization). Forfeited discounts revenue was allocated based on historical net write-offs. Rent from Electric Property was allocated in the same manner as Overhead Conductors. Miscellaneous Service revenue was allocated based on Distribution delivery revenue.

## Q. How did you develop the revenue requirement for each class?

A. The revenue requirements for each class are computed in the same manner as that used by witness Mr. O'Brien to compute the overall revenue requirement for the FPFTY, and that I used to calculate the Pennsylvania jurisdictional (i.e., Distribution) revenue requirement. Class revenue requirements are the sum of each class' allocated operating expenses, depreciation expense, general taxes, required return and the income tax and gross receipts tax. The Distribution service revenue requirement for each rate class is shown on Exhibit 6-7, line 230, and also on Exhibit 6-2, line 13.

## Q. How did you determine the revenue deficiency for each rate class?

A. The class revenue deficiency is computed by comparing the revenue requirements for each class to the revenue that is forecast at present rates for that class.

## SECTION VI- DEVELOPMENT OF ALLOCATORS FOR ACOS

## Q. How were the allocators used in the ACOS developed?

A. Exhibit 6-9 shows the development of the external allocators used in the ACOS. Exhibit 6-9 includes Exhibits 6-9A through 6-9K.

## Q. Please describe Exhibit 6-9.

A. Exhibit 6-9A shows the allocator values for each external class allocator. The allocator values are developed in the remaining pages of Exhibit 6-9.
Q. Please describe Exhibit 6-9B and Exhibit 6-9C.
A. Exhibit 6-9B summarizes the results of the functionalization of distribution assets (accounts 360-373 in the FERC USA) betweenPrimary Distribution and Secondary Distribution and the Minimum System Study.

Exhibit 6-9C shows the calculations for the functionalization of distribution assets between Primary Distribution and Secondary Distribution and the Minimum System Study.
Q. Please describe Exhibit 6-9D, Exhibit 6-9E and Exhibit 6-9E-1.
A. Exhibit 6-9D identifies the demand allocator selected for the demand component of each type of asset (Distribution Substations; Poles, Tower and Fixtures and Overhead Conductors; Underground Conduits and Underground Conductors; and Line Transformers). Separate allocators were developed for the Radial, Network and URD components of Underground Conduits and Underground Conductors and

Line Transformers. Exhibit 6-9D also discusses how each demand allocator was developed.

Exhibit 6-9E presents the computation of the demand allocators, by applying the approach discussed in Exhibit 6-9D. Exhibit 6-9E-1 presents the PLCC adjustment.

## Q. Please discuss the PLCC adjustment.

A. The minimum size components developed for the Secondary Distribution system have the ability to carry a portion of peak load (Peak Load Carrying Capacity, or "PLCC"). The PLCC of certain of these assets was removed in computing the allocator for the Secondary-Demand classified portion of those assets.

For example, the minimum system for OH Transformers (based on the 25 kVA minimum size component) have capacity equal to 3.2 kW per customer; therefore in computing the allocator NCP-Secondary-Xfmr which is used for the demand component of OH Transformers, peak demands above 3.2 kW per customer is deducted from the demands for each class.

The PLCC adjustment was made for OH Transformers and Radial Transformers, comprising approximately $57 \%$ of Secondary Demand plant; the effect on the results of the ACOS was insignificant. The PLCC adjustment was not made for other Secondary Demand plant because the detailed information needed was not readily available and effect on the results of the ACOS would not be justified.

## Q. Please describe Exhibit 6-9F.

A. Exhibit 6-9F presents the values for revenue and physical (MWh) allocators, and number of customers, as shown on Attachment DFR IV-A Fully Projected Future (page 1, columns C and D).

## Q. Please describe Exhibit 6-9G.

A. Exhibit 6-9G presents the calculation of service costs based on current installed costs for typical residential and commercial services.
Q. Please describe Exhibit 6-9H.
A. Exhibit 6-9H presents the calculation of the meter cost allocator, the AMI cost allocator and related allocators, based on the types of meters installed, meter costs and other information.

## Q. Please describe Exhibit 6-9I.

A. Exhibit 6-9I presents the allocation of Customer Accounts Supervision (account 901) and Customer Records and Collections (account 903), based on analyses of activities charged to each account. It includes a supporting analysis of Call Center activity.

## Q. Please describe Exhibit 6-9J.

A. Exhibit 6-9J allocates among the rate classes Write-off Dollars, based on historic al information.

## Q. Please describe Exhibit 6-9K.

A. Exhibit $6-9 \mathrm{~K}$ presents Customer deposits by rate class.

## SECTION VII- RATES OF RETURN AT PROPOSED REVENUE ALLOCATION

## Q. Please describe Exhibit 6-10.

A. Exhibit 6-10 computes the Distribution Rates of Return for each rate class based on the revenue allocation proposed by Mr . Ogden, as well as the progress towards unity for each rate class. The revenue that would be produced under proposed rates for the FPFTY was computed by Mr. Ogden, as shown on Attachment DFR IV-A Fully Projected Future (page 6).

## Q. Please describe Exhibit 6-11.

A. Exhibit 6-11 computes the Distribution component of the cost of providing Street Light service. The right-most column, labelled "Distribution to Support SL, No SL O\&M", is the revenue requirement allocated to Street Lighting excluding Street Lighting assets in account 373, related depreciation reserve and depreciation expense, Street Lighting maintenance in account 596, and allocated costs that follow; this is the distribution revenue requirement for customers that own and maintain their Street Lighting assets.

The column to the left, labelled "Additional for SL O\&M", reflects Street Lighting maintenance in account 596 and allocated costs that follow; this is the distribution revenue requirement to O\&M on Street Lighting. The column labelled
"Total Distribution" is the total revenue requirement for customers that own their Street Lighting assets and maintenance is performed by the Company.

## Q. Does this conclude your direct testimony today?

A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.
RESUME OF
HOWARD S. GORMAN
PRESIDENT - HSG GROUP, INC.

Mr. Gorman has more than 30 years of experience in the energy industry, including 20 years in rate and regulatory proceedings. His areas of expertise include embedded class cost of service studies, marginal cost studies, revenue allocation, rate design and revenue requirements, for both electric and gas utilities. He has testified as an expert witness before the Massachusetts Department of Public Utilities, New Jersey Board of Public Utilities, New Hampshire Public Utilities Commission, New York State Public Service Commission, Ontario Energy Board, Pennsylvania Public Utility Commission and Rhode Island Public Utilities Commission. Mr. Gorman also has experience in financial modeling, financial analysis and forecasting, developing accounting systems, and treasury and financial management.

Professional Employment

| 2010 - Present | HSG Group, Inc. President |
| :---: | :---: |
| 1997-2010 | Black \& Veatch Corporation (R.J. Rudden Associates, Inc. before 2005) |
|  | Principal Consultant |
| 1995-1997 | Independent Consultant |
| 1987-1995 | Trigen Energy Corporation |
|  | 1987-1993 Corporate Controller; Trigen was formed in 1987 |
|  | 1993-1995 Treasurer; IPO with NYSE listing in 1994 |
| 1982-1987 | Coleco Industries, Inc. |
|  | Director, Treasury |
| 1976-1979 | Touche Ross \& Co. |
|  | Staff Accountant |

Professional Experience

## Utility Accounting and Costing

Mr. Gorman has performed numerous class cost of service studies, and has developed and supported revenue requirements, revenue allocation, rate designs and marginal cost studies, in rate cases before regulatory commissions in several jurisdictions, for electric and gas utilities. These assignments included development of test year data, forecasts for the rate year, establishment of cost causality, selection of allocation bases, development of allocators, and analysis of customer impacts and policy considerations.

## Energy Project Financing and Analysis

Mr. Gorman has negotiated and completed transactions including construction and term loans, tax-exempt bonds, taxable bonds, subordinated debt and asset-backed (receivables and inventory) revolving credit facilities. He has worked successfully with lenders and borrowers to source and structure transactions, and was instrumental in
negotiating loan documents and in designing power sale and supply procurement contracts to be financed. Mr. Gorman has performed financial analyses of energy-related assets, including electric and gas distribution companies, power plants and transmission operators. These analyses included development of cash flows and financial statements based on both regulatory and accounting presentations, and included review of assumptions, analysis of data, modeling and forecasting, sensitivity testing and stress testing.

## Accounting and Financial Management

Mr. Gorman has extensive experience in financial accounting. As controller of Trigen Energy Corporation, he founded and built the finance and accounting function; developed reports, procedures and management tools; and managed subsidiary controllers across North America, including an IPO with NYSE listing. He managed the corporate insurance portfolios and the benefit plans for Trigen Energy Corporation and for Coleco Industries, and has bought and sold interest rate and currency forward contracts for the purpose of managing risk.

Publications And Presentations
"What Wall Street Needs FromFERC," published in R. J. Rudden Financial, LLC's Energy Capital Markets Report, September 2002
"A Balanced Look at Balance Sheets," published in R.J. Rudden Financial, LLC's Energy CapitalMarkets Report, June 2002
"From Wires To Riches: Shareholder Value Creation In The T\&D Business," April 2002 (co-authored).
"Assessment of Retail Choice Programs," presented at the American Gas Association Rate and Strategic Is sues Committee Conference, March 2002
"Value Creation With Transmission Assets," quoted in Electrical World's Special Edition Quarter 1, 2002, March 2002
"The Remarkable Story on Enron," published in Scudder's Annual End of Year Issue, December 2001

## Education

New York University, B.S., Accounting, 1976
Harvard Business School, MBA, 1981

| Relevant Projects |  |  |  |
| :---: | :---: | :---: | :---: |
| Utility | Jurisdiction | Docket | Subject Matter |
| Niagara Mohawk (Gas) | New York $2020$ | 20-G-0381 | Gas class cost of service; revenue allocation; rate design; marginal cost |
| Niagara Mohawk (Electric) | New York 2020 | 20-E-0380 | Electric class cost of service; revenue allocation; rate design; marginal cost |
| Citizens' Electric of Lewis burg, PA | Pennsylvania 2019 | $\begin{aligned} & \hline \text { R-2019- } \\ & 3008212 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Wellsboro Electric Company | Pennsylvania 2019 | $\begin{aligned} & \hline \text { R-2019- } \\ & 3008208 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Valley Energy, Inc. | Pennsylvania 2019 | $\begin{aligned} & \hline \text { R-2019- } \\ & 3008209 \end{aligned}$ | Gas revenuerequirements, rate design |
| Brooklyn Union Gas / KeySpan Gas East | New York 2019 | $\begin{array}{\|l\|} \hline \text { 19-G-0309 } \\ \text { /0310 } \end{array}$ | Gas class cost of service; revenue allocation; rate design; marginal cost |
| Mas sachusetts / Nantucket Electric | Mas sachusetts 2018 | DPU 18-150 | Electric class cost of service; revenue allocation; rate design; marginal cost Monthly MinimumReliability Contribution |
| Duquesne Light | Pennsylvania 2018 | $\begin{array}{\|l\|} \hline \text { R-2018- } \\ 30000124 \end{array}$ | Electric class cost of service; revenue allocation; rate design |
| Narragansett Electric | Rhode Island 2017 | RIPUC 4770 | Electric class cost of service; revenue allocation; rate design |
| Veolia Energy Philadelphia | Pennsylvania 2017 | $\begin{aligned} & \text { R-2017- } \\ & 2593142 \end{aligned}$ | Steamsystemrevenue requirements; sales forecast |
| Niagara Mohawk (Gas) | New York 2017 | 17-G-0239 | Gas class cost of service; revenue allocation; rate design; marginal cost |
| Niagara Mohawk (Electric) | New York 2017 | 17-E-0238 | Electric class cost of service; revenue allocation; rate design; marginal cost |
| Citizens'Electric of Lewis burg, PA | Pennsylvania 2016 | $\begin{aligned} & \text { R-2016- } \\ & 2531550 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Wellsboro Electric Company | Pennsylvania 2016 | $\begin{aligned} & \text { R-2016- } \\ & 2531551 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Granite State Electric | New Hampshire 2016 | DE 16-383 | Electric revenue requirement |
| Brooklyn Union Gas / KeySpan Gas East | New York 2016 | $\begin{array}{\|l\|} \hline \text { 16-G-0058 } \\ / 0059 \\ \hline \end{array}$ | Gas class cost of service; revenue allocation; rate design; marginal cost |
| Mas sachusetts / Nantucket Electric | Mas sachusetts 2015 | DPU 15-155 | Marginalcost |
| Jamestown Board of Public Utilities | New York 2015 | 15-E-0184 | Electric revenue requirements |
| Energy North Natural Gas | New Hampshire 2015 | DE14-180 | Gas revenuerequirements |
| Village of Freeport | New York 2014 | 14-E-0035 | Electric revenue requirements; sales forecast; rate design |
| Veolia Energy Philadelphia | Pennsylvania 2014 | $\begin{aligned} & \hline \text { R-2013- } \\ & 2386293 \end{aligned}$ | Steamsystemrevenue requirements and sales forecast |


| Relevant Projects |  |  |  |
| :---: | :---: | :---: | :---: |
| Utility | Jurisdiction | Docket | Subject Matter |
| Duquesne Light | Pennsylvania 2014 | $\begin{aligned} & \hline \text { R-2013- } \\ & 2372129 \end{aligned}$ | Electric class cost of service;revenue allocation; rate design |
| Granite State Electric | New Hampshire 2013 | DE13-063 | Electric class cost of service (marginal cost); revenue allocation; rate design |
| Hydro One Networks Inc. | $\begin{aligned} & \text { Ontario } \\ & \text { 2005-2013 } \end{aligned}$ | $\begin{array}{\|l} \text { EB-2005- } \\ 0378 \text { et al } \end{array}$ | Electric Transmis sion and Distribution cost allocation; OH capitalization rates (2013, 2012, 2010, 2009, 2008, 2006, 2005) |
| Ontario Power Generation | $\begin{aligned} & \hline \text { Ontario } \\ & 2006-2013 \end{aligned}$ | $\begin{array}{\|l} \hline \text { EB-2007- } \\ 0905 \text { et al } \end{array}$ | Electric cost allocation methodology (2013, 2010, 2006) |
| Niagara Mohawk (Electric) | New York $2012$ | 12-E-0201 | Electric class cost of service; revenue allocation |
| Narragansett Electric | Rhode Island 2012 | RIPUC 4323 | Electric class cost of service |
| Village of Rockville Centre | New York 2011 | 11-E-0590 | Electric revenue requirements; rate design; sales forecast |
| Chautauqua Utilities, Inc. | New York 2011 | 11-G-0142 | Gas revenuerequirements, rate design |
| Kellogg (intervenor) | Pennsylvania $2010$ | $\begin{aligned} & \text { R-2010- } \\ & 2179103 \end{aligned}$ | Water class costof service; revenue allocation |
| Duquesne Light | Pennsylvania 2010 | $\begin{aligned} & \hline \text { R-2010- } \\ & 2179522 \end{aligned}$ | Electric class cost of service;revenue allocation; rate design |
| WellsboroElectric | Pennsylvania 2010 | $\begin{aligned} & \hline \text { R-2010- } \\ & 2172662 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Citizens'Electric of Lewisburg, PA | Pennsylvania 2010 | $\begin{aligned} & \text { R-2010- } \\ & 2172665 \end{aligned}$ | Electric revenue requirements, class cost of service, revenue allocation, rate design |
| Valley Energy, Inc. | Pennsylvania 2010 | $\begin{aligned} & \hline \text { R-2010- } \\ & 2174470 \end{aligned}$ | Gas revenue requirements, rate design |
| PECO Energy (Gas) | Pennsylvania 2010 | $\begin{aligned} & \hline \text { R-2010- } \\ & 2161592 \end{aligned}$ | Gas class costof service; revenue allocation; rate design |
| PECO Energy (Electric) | Pennsylvania 2010 | $\begin{aligned} & \text { R-2010- } \\ & 2161575 \end{aligned}$ | Electric class cost of service;revenue allocation; rate design |
| Niagara Mohawk (Electric) | $\begin{aligned} & \text { New York } \\ & 2010 \end{aligned}$ | 10-E-0050 | Electric class cost of service |
| Jamestown Board of Public Utilities | $\begin{aligned} & \text { New York } \\ & 2009 \end{aligned}$ | 09-E-0862 | Electric revenue requirements |
| Philadelphia Gas Works | Pennsylvania 2001-2009 | R-2139884 R-00061931 M-00021612 R- 00017034 R- 00006042 | Gas class cost of service; revenue allocation; rate design; rate unbundling; recovery of fixed costs (2006, 2002, 2001) |
| Narragansett Electric | Rhode Island 2009 | RIPUC 4065 | Electric class cost of service;revenue allocation; rate design |


| Relevant Projects |  |  |  |
| :--- | :--- | :--- | :--- |
| Utility | Jurisdiction | Docket | Subject Matter |
| Mas sachusetts / NantucketElectric | Mas sachusetts <br> 2009 | DPU 09-39 | Electric revenue requirements; <br> adjustment mechanisms;class cost of <br> service; revenue allocation; ratedesign |
| PECO Energy (Gas) | Pennsylvania <br> 2008 | R-2008- <br> 2028394 | Gas class costof service; revenue <br> allocation; rate design |
| WellsboroElectric | Pennsylvania <br> 2007 | R-00072350 | Electric revenue requirements; rate <br> design |
| Citizens' Electric of Lewisburg, PA | Pennsylvania <br> 2007 | R-00072348 | Electric revenue requirements; rate <br> design |
| Valley Energy, Inc. | Pennsylvania <br> 2007 | R-00072349 | Gas revenuerequirements; rate design |
| Village of Freeport | New York <br> 2006 | 06-E-0911 | Electric revenue requirements; rate <br> design |
| Duquesne Light | Pennsylvania <br> 2006 | R-00061346 | Electric class cost of service; revenue <br> allocation; rate design |
| Village of Rockville Centre | New York <br> 2003 | 03-E-1568 | Electric revenue requirements; rate <br> design; sales forecast |
| AmeriSteelaka Co-Steel (intervenor) | New Jersey <br> 2002 | ER02080506, <br> ER02050303 et <br> al | Electric cost allocation and rate design; <br> industrial rates |

BEFORE THE

## PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 16

Direct Testimony of David B. Ogden
Subjects: Revenue Allocation, Rate Design, Bill Impact, Proof of Revenue, and Tariff Changes

Date: April 16, 2021
Q. Please state your full name and business address.
A. My name is David B. Ogden. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Manager, Rates and Tariff Services.
Q. How long have you worked at Duquesne Light?
A. I have been employed by Duquesne Light Company for over twelve (12) years.
Q. What are your current responsibilities?
A. I am responsible for overseeing the Company's retail rates and wholesale transmission rates, which includes supervising the preparation, development and implementation of the distribution rates proposed in this proceeding.
Q. What are your qualifications, work experience and educational background?
A. I received a Bachelor of Science in Business Administration Degree with a major in Accounting from Clarion University of Pennsylvania in 2001. I am a Certified Public Accountant. I began my career at the Company in 2008 as the Supervisor of Derivative Accounting and Special Projects. Over the last twelve years, I have held supervisory and
managerial positions within Accounting, Financial Planning and Analysis and currently the Rates department.

Prior to joining Duquesne Light, I was a senior audit associate in the Pittsburgh office of PricewaterhouseCoopers LLP, a public accounting firm, where I performed attestation, advisory and compliance services for clients throughout the United States. Prior to joining PricewaterhouseCoopers, I held audit positions within the Allegheny County Controllers Office.

## Q. Have you pre viously testified before the Pennsylvania Utility Commission?

A. Yes. I have testified in the Company's Default Service Plan VIII ("DSP VIII") proceeding at Docket No. P-2016-2543140, the Company's Distribution System Improvement Charge ("DSIC") proceeding at Docket No. P-2016-2540046, the Company's 2018 base rate proceeding atDocket No. R-2018-3000124, the Company's Default Service Plan IX ("DSP IX') proceeding at Docket No. P-2020-3019522, and the Company's Energy Efficiency and Conservation ("EEC") Phase IV Plan at Docket No. M-2020-3020818.
Q. Are you sponsoring any exhibits, parts of exhibits or responses to the Commission's filing requirements as part of your direct testimony?
A. Yes. I am sponsoring the following exhibits:

- Exhibit DBO-1, which is the proposed tariff supplement to the currently effective Tariff Electric Pa. P.U.C. No. 25 implementing the proposed rates, riders and tariff revisions in this proceeding. Certain of the tariff revisions included in Exhibit DBO-1 are addressed by other Company witnesses, namely:
- Rule No. 41.1 (Residential Master Metering for New Low-Income Supportive Housing) is addressed by Ms. Phillips at DLC Statement No. 6.
- Revised Rider No. 16 - Service to Non-Utility Generating Facilities, Rider No. 7 - Residential Subscription Rate Pilot, and Rider No. 19
- Community Development are addressed by Ms. Everett at DLC Statement No. 17.
- Rider No. 23 - Home Charging Pilot Program and Rider No. 24 Fleet Charging Pilot Program are addressed by Ms. Olexsak at DLC Statement No. 8.
- Rider No. 25 - New Business Stimulus and Rider No. 26 - Crisis Recovery Program are addressed by Ms. Kubiak at DLC Statement No. 5.
- Exhibit DBO-2, which is a redline version of Exhibit DBO-1
- Exhibit DBO-3, which is the Digest of Proposed Changes contained within Duquesne Light's proposed tariff supplement
- Exhibit DBO-4, which contains the calculations supporting the proposed LED street light rates
- Exhibit DBO-5, which contains an updated unbundling schedule
- Exhibit DBO-6, which contains an illustrative example to calculate the Federal Tax Adjustment Charge ("FTAC") rate

I am sponsoring Schedule D-5D of Duquesne Light Exhibits 2, 3 and 4 and also sponsoring the Company's responses to the following filing requirements:

- IV-A 1-4: Summary of Individual Rate Effects
- IV-B: Description of Proposed Tariff Changes
- IV-C: Revenue Effects and Billing Analysis for Changed Rates
- IV-D 1 and 2: Monthly Billing Effects Charts and Data
- IV-E 2: Comparisons Showing Cost and Proposed Base Rate Revenues for Residential and Demand/Energy Rate Schedules


## Q. Please explain how these filing requirements were prepared.

A. These filing requirements were prepared either by me or under my direct supervision. They were prepared, to the best of my knowledge, in accordance with Commission requirements and practice.
Q. What is the purpose of your direct testimony regarding Duquesne Light's request for increased rates?
A. The purpose of my testimony is to address the following:

1. The allocation of the proposed revenue increase among the rate classes.
2. The proposed rate design for base distribution charges.
3. The revenue impact by rate schedule.
4. The proof of revenue at current and proposed rates.
5. Proposed tariff changes.
Q. How is your testimony organized?
A. First, I will explain the Company's goals and objectives in allocating the proposed revenue increase. I will show how the proposed revenue increase was allocated among the rate classes and the resulting relative rate class returns. These items are discussed in the "Allocation of Proposed Revenue Increase" section.

Second, I will describe the rate design principles and how they were used to determine the proposed rates. I will then discuss how the proposed rates, when applied to forecasted billing units, achieve the target allocated revenue for each rate class. These two items are discussed in the "Rate Design" section.

Third, I will address the proposed revenue impact by rate schedule and how the proof of revenue at current and proposed rates was developed to demonstrate that the proposed rates produce the target revenue for each class. These items are discussed in two sections, "Revenue Impact by Rate Schedule" and "Proof of Revenue," respectively.

Finally, I will discuss the proposed changes to the Company's retail tariff to implement these new rates, as well as describe those proposed changes to the Rules and Regulations section and Riders of the tariff that are not addressed by other Company witnesses, as discussed above.
Q. Were all of the proposed rate design changes and tariff changes also pre pared under your direction or supervision?
A. Yes. All of the rate design work was prepared by me or under my direct supervision as well as all tariff changes as presented in Exhibit DBO-3, with the exception of the changes to Rules 41 and 41.1 and Rider Nos. 7, 16, 19, and 23 through 26, as discussed above.

## I. ALLOCATION OF PROPOSED REVENUE INCREASE

## Q. What were the Company's goals and objectives in allocating the revenue increase?

A. The Company proposes to continue the revenue allocation objectives it established in its 2006, 2010, 2013 and 2018 distribution rate case proceedings. The Company's primary goal in this rate case, as in its 2006, 2010, 2013 and 2018 rate cases, is for the proposed revenue allocation to move each rate class closer to the proposed overall return of $7.84 \%$, which would recover the class's full cost of service (including return). Each class's return at present rates is determined in the class cost allocation study ("ACOS") prepared by Mr. Gorman in Exhibit 6 at DLC Statement No. 15. Each class relative return is equal to its return at present rates (Exhibit 6-2, line 11) divided by the overall return at present rates of $5.36 \%$. The proposed revenue allocation moves a class closer to recovering its full cost of service, when its relative return moves closer to 1.0 , or unity.

The second overall revenue allocation objective is to mitigate the rate impact both on rate classes and on individual customer subgroups, while continuing to progress to the rate class's fully allocated cost of service. In this proceeding, the Company's goal was to limit the distribution revenue increase to any one rate class to no more than 1.50 times the overall system average increase on a distribution bill basis. This limitation balances the shift to cost of service with concerns regarding customer bill impact.
Q. Have the revenue impacts to each rate class been calculated using the fully allocated class cost of service results?
A. Yes. As described by Mr. Gorman at DLC Statement No. 15, cost allocation principles were used to functionalize, classify and allocate the revenue requirement among the rate
classes in order to determine the fully allocated cost of service and return at present rates, which set the base parameters for revenue allocation and rate design. The rate class revenue requirements that reflect cost causation and serve as the starting point for revenue allocation and rate design are shown in Exhibit 6-2 and 6-3. Exhibit 6-2, line 27 shows the revenue increases or decreases that would be required if rates were set to recover each class' fully allocated cost of service (at the Company's proposed distribution rate of return of $7.84 \%$ ).

## Q. Is there an exhibit that presents the Company's proposed revenue allocation?

A. Yes, Exhibit 6-10 presents the proposed distribution revenue increase by rate class.

The results of the ACOS, including returns at present rates and placement within the tolerance band, are on lines 1-12. The revenue allocation, including the tolerance band increases, the judgmental changes and the re-allocation of the net overage, is presented on lines 13-20. The class returns at proposed revenue are computed on lines 21-32. The relative returns at proposed revenue and progress toward unity are on lines 34-38.

Class distribution revenue at proposed rates is shown on line 40 . These are the revenue targets that the proposed new rates will be designed to produce.

## Q. Please explain how the revenue increase has been allocated across rate classes.

A. The Company has established a tolerance band, representing returns from 75 to 125 percent of the overall system return of $5.36 \%$ at current rates, equal to returns of 4.02 to 6.70 percent. The use of the tolerance band allows the Company to rely on the class cost allocation study results as a guide to allocate the increased revenue requirement fairly,
while also promoting the goal of gradualism. The use of the tolerance band is also intended to avoid conflicts resulting from minor disagreements about the allocations of costs in the ACOS.

An overall average distribution increase of $\$ 85.76$ million, or $15.58 \%$ of distribution revenue at present rates, is required to produce the proposed return of $7.84 \%$. In Step 1 of the revenue allocation (Exhibit 6-10, line 16), classes within the tolerance band but above the average (i.e. RS, GS, GM<25, GMH<25, GL) received an initial increase of $15.03 \%$ ( 0.965 X average); $\mathrm{GM}<25$ was included in this group because it is just above the tolerance band, at 1.29 X . Classes within the tolerance band but below average (i.e. GM>25, L) received an initial increase of $16.50 \%$ (1.059X average). Classes below the tolerance band (i.e. $\mathrm{RH}, \mathrm{RA}, \mathrm{GMH}>25$, GLH, UMS) received an initial increase of $21.5 \%$ ( 1.38 X average). Classes above the tolerance band (i.e. SE and SL) received an initial increase of $5.0 \%$ ( 0.321 X average). HVPS class received an initial increase of zero because it had a very high return at present rates. The use of the tolerance band results in a revenue increase of $\$ 85.76$ million (line 17), which equals the required increase.

In Step 2 of the revenue allocation, the Company judgmentally reduced the allocation to RS in order to move it closer to unity at proposed rates, and also adjusted GS and L (line 19). The difference was spread among the classes in proportion to the initial increase (line 20).

## Q. Is there an exhibit that presents the Company's proposed revenue allocation?

A. Yes, Exhibit 6-10 presents the proposed distribution revenue increase by rate class.

The results of the ACOS, including returns at present rates and placement within the tolerance band, are on lines 1-12. The revenue allocation, including the tolerance band increases, the judgmental changes and the re-allocation of the net overage, is presented on lines 13-20. The class returns at proposed revenue are computed on lines 21-32. The relative returns at proposed revenue and progress toward unity are on lines 34-38.

Class distribution revenue at proposed rates is shown on line 40 . These are the revenue targets that the proposed new rates will be designed to produce.

## Q. Does the proposed revenue allocation achieve the goals?

A. The Company substantially achieved its goals. Except for RS and L, each class moves closer to unity (line 35), which compares relative return at present (line 4) and relative return at proposed (line 34 ). Both RS and L will be very close to unity at both present and proposed rates; to move RS closer to unity would have required a further net decrease of $\$ 2.05 \mathrm{M}$, and to move L to unity would have required a further net increase of $\$ 0.4$ million. In addition, no class received an increase greater than 1.5 X average (line 38), which meets the constraint which I described earlier.

## Q. Why does RS not make progress toward the system ave rage return?

A. RS is currently producing a return 1.01X average, and the proposed rates produce a return for RS of 1.028 X average. When classes are so close to the average, it can be challenging to move the returns even closer. In the case of RS, the proposed increase is $14.35 \%$ compared to the average proposed increase of $15.58 \%$; reducing the RS revenue allocation any further would raise the targets for other classes. The proposed revenue allocation fairly
balances moving most classes closer to average return, mitigating increases and keeping RS very close to its present relative return.
Q. Why does $L$ not make progress toward the system average return?
A. L is currently producing a return 0.98 X average, and the proposed rates produce a return for L of 0.94 X average. As discussed above regarding class RS , when classes are so close to the average, it can be challenging to move the returns even closer. In the case of L , the proposed increase is $18.25 \%$ compared to the average proposed increase of $15.58 \%$. The proposed revenue allocation fairly balances moving most classes closer to average return, mitigating increases and keeping $L$ close to its present relative return.
Q. Was a schedule prepared showing the proposed targeted re venues for each rate class resulting from this revenue allocation?
A. Yes. The proposed targeted revenues for each rate class that result from application of the above principles are shown in DFR IV-A, Pages 1-3 and Schedule D-5D, Exhibit 2.

## II. RATE DESIGN

Q. Please describe the goals and objectives used in designing the proposed base distribution rates.
A. The primary goal was to design rates that, when applied to forecasted billing determinants, produce the proposed revenue increase and the proposed targeted revenues for each rate class for the fully projected future test year. In addition, the Company continued its plan described in recent rate cases to migrate toward rates that reflect the services provided by
a delivery company, and that also reflect the way in which fixed costs are incurred. To achieve these goals, the Company proposes to maintain its goal of designing rates that emphasize fixed monthly charges and demand based charges, where appropriate, to recover costs. At the same time, the Company recognizes the potential impact on individual customers by eliminating familiar rate structures, and the overall goal to keep rates transparent and easy for the customer to understand. Finally, the Company has tried to mitigate extreme bill impacts on customers within each class. The Company developed rates for each rate class that balance these objectives.

## Q. Please describe the proposed rate design for customers on Rate RS.

A. The Company proposes to continue to use a combination of fixed and energy-based rates for all of the residential rate classes, i.e. Residential Service Rate RS, Residential Heating Service Rate RH, and Residential Service Add-On Heat Pump Rate RA. The Company proposes to increase the fixed monthly charge to $\$ 16.25$ per month, which is supported by the fixed cost analysis of serving a residential customer identified in Exhibit 6-4A. I also note that a higher fixed charge provides some revenue stability for the Company and cost stability for customers.

Recovery of the remaining revenue (that is, target revenue less the amount recovered through the fixed monthly charge) will be through a single volumetric charge per kWh .

## Q. Please describe the rate design for customers on Rates RH and RA.

A. Rate RH and Rate RA are the Company's residential space heating rates. The current rate structures use a combination of fixed and energy-based variable charges similar to Rate

RS, except that Rates RH and RA have a lower usage charge during the November to April heating season (which is off-peak for most of the Company's customers). Currently, Rates RH and RA have the same rates as Rate RS during the May through October non-heating season.

For Rates RH and RA, the Company proposes the same fixed monthly charge as Rate RS and the same usage charge as Rate RS during the non-heating months since there is not a material difference in average customer load or usage of these rate classes during those months.

The Company recognizes space heating customers use considerably more electricity during the heating season than customers on basic residential service Rate RS, although the costs of providing service are fixed. The Company proposes to retain the lower kWh charge during the heating season, which reflects the fixed costs spread over a larger number of kWh .

## Q. Please describe how the rate design objectives we re imple mented for commercial and industrial customers on General Service Small and Medium Rate GS/GM.

A. This rate represents a diverse group of over 51,900 commercial and industrial ("C\&I") customers. This group consists of approximately 24,900 non-demand-billed customers on Rate GS, approximately 20,200 customers on Rate GM with monthly demand less than 25 kW and approximately 6,800 customers on Rate GM with monthly demand equal to or greater than 25 kW . The categorization of customers at less than 25 kW and equal to or greater than 25 kW was established and approved in the Company's 2007 default service filing and continued and approved for the distribution business in the Company's 2010, 2013 and 2018 base rate proceedings. The Company proposes to continue this separation point in this proceeding.
Q. What is the distribution rate design that is being proposed in this proceeding for Rate GS non-demand customers?
A. For Rate GS, the Company is proposing the same rate design as implemented in the previous base rate proceeding. The Company is proposing to bill non-demand commercial customers the same fixed monthly charge as residential customers, and a single volumetric charge per kWh , similar to how these customers are billed at present rates, to recover the balance of the target revenues.
Q. What is the distribution rate design that is being proposed in this proceeding for customers on Rate GM under $25 \mathbf{k W}$ and Rate GM equal to or over $25 \mathbf{k W}$ ?
A. The Company is proposing to maintain the same distribution rate structures that exist today. The Company first used the customer-charge costs identified in Exhibits 6-4C and 6-4D and the demand-related costs identified in Exhibit 6-3, to establish the fixed monthly charges. The charges include the first 5 kW of demand.

For each class, the balance of the revenue target is recovered through a combination of demand and kWh charges. Demand is the customer's peak 15-minute usage eachmonth. For Rate GM under 25 kW , the kWh charge is increased by approximately the same percentage as the fixed charge (when including the surcharges being rolled into each component) which will mitigate intra-class shifts. For Rate GM above 25 kW demand, the
demand charge is the same as Rate GM under 25 kW ( $\$ 7.89$ per kW -month of billed demand) and the kWh charge is the rate needed to produce the revenue target.
Q. What is the distribution rate design that is being proposed for customers on Rate GMH under 25 kW and Rate GMH equal to or over 25 kW ?
A. Rate GMH under 25 kW and Rate GMH over 25 kW are the complementary electric space heating rates of rate schedules GM under 25 kW and GM over 25 kW , and apply to approximately 3,200 commercial and industrial customers. The Company is proposing to maintain the same distribution rate structures that exist today. The fixed monthly charges include 5 kW of demand and are based on the customer-related costs identified in Exhibit 6-4E and the demand-related costs identified in Exhibit 6-3. The proposed $\$ 63.00$ fixed monthly charge is the same as proposed for Rate GM under 25 kW .

For the heating months (October to May), customers will not be billed for demand, only for usage, the same as today's rate structure. The summer rates per kW and per kWh rates are the same as for Rate GM under 25 kW . The winter kWh charge is designed to recover the balance of the target revenue.
Q. Please describe the current distribution rate design for large commercial and industrial customers on Rate GL.
A. Rate GL is applicable to approximately 730 customers. Currently, the rate schedule contains a fixed charge for the first 300 kW of demand and a demand charge for each additional kW of demand. There are no distribution kWh charges associated with this rate schedule.

## Q. What is the distribution rate design that is being proposed for Rate GL?

A. The Company is proposing to continue the same rate structure for Rate GL. The fixe d charge, which includes the first block of demand ( $300 \mathrm{~kW} \mathrm{)}$, approximately the rate class revenue percentage increase. The balance of the target revenues is recovered through the charge for demand over 300 kW .
Q. What is the rate design that is being proposed in this proceeding for Rate GLH?
A. Rate GLH is the complementary electric space heating rate to Rate GL and applies to approximately 90 customers. The Company proposes to continue the existing rate structure and proposes rate design principles similar in concept to those used Rate GMH in this proceeding. For the non-heating season months (June to September), these customers will be billed the same charges as Rate GL. For the heating months (October to May), the Company is proposing to bill a single volumetric charge per kilowatt-hour.
Q. Please describe the current distribution rate design for large commercial and industrial customers on Rate $L$.
A. Rate L is currently applicable to 20 customers. These customers represent some of the largest customers served by the Company and are diverse in size (demand). The Company offers the Rate L Service Voltage Less than 138 kW using a fixed monthly charge that includes the first $5,000 \mathrm{~kW}$ of demand, and an additional per kW charge for monthly demand in excess of $5,000 \mathrm{~kW}$.
Q. What is the distribution rate design that is being proposed for Rate $L$ ?
A. The Company is proposing to continue the same rate structure for Rate L . The existing rate structure uses a fixed monthly charge that includes the first $5,000 \mathrm{~kW}$ of demand, and an additional per kW charge for monthly demand in excess of $5,000 \mathrm{~kW}$. The fixed charge, which includes the first block of demand $(5,000 \mathrm{~kW})$, was increased by approximately the rate class revenue percentage increase. The balance of the target revenues is recovered through the charge for demand over $5,000 \mathrm{~kW}$.
Q. Please describe the current distribution rate design for Rate HVPS.
A. There are currently nine (9) customers on Rate HVPS each served at 69 kV or more and with a monthly demand greater than $5,000 \mathrm{~kW}$ in accordance with the tariff. The rate schedule contains a monthly three-tiered fixed distribution charge and there are no variable demand distribution charges or variable usage distribution charges.
Q. What is the distribution rate design that is being proposed for Rate HVPS?
A. The Company is proposing to continue the same rate structure currently in place using a monthly fixed charge which was approved in the Company's last distribution rate case proceeding. Each of the fixed monthly charges have been increased by the same percentage, as needed to produce the class revenue target.
Q. What changes are being proposed to the distribution rates of the lighting and unmetered rate classes?
A. The Company has aggregated Rates AL, SM, SH and PAL for cost of service and revenue allocation purposes. Rate SE and Rate UMS (Unmetered Service) are treated individua lly. The Company is proposing to retain the same rate structure for these rate classes.

For Rates AL, SM, SH and PAL, the Company is proposing an across-the-board percentage increase to each rate. These changes, when combined with the elimination of surcharges that are being rolled into rates (e.g. DSIC) will produce the revenue targets.

For Rate SE, the Company is proposing a rate which, when combined with the elimination of surcharges that are being rolled into rates (e.g. DSIC) will produce the revenue target.

For Rate UMS, the Company is proposing to continue the same rate structure for Rate UMS. The fixed charge was increased by approximately the rate class revenue percentage increase. Recovery of the remaining revenue (that is, target revenue less the amount recovered through the fixed monthly charge) will be through a single volumetric charge per kWh .

## Q. Is the Company proposing any changes to its transmission rates in this proceeding?

A. No, the Company is not proposing to change transmission rates in this proceeding. The Company has adopted the FERC formula rate making process to establish an annual revenue requirement and the associated wholesale network integrated transmission service rate that changes June 1 every year. The current wholesale rate is not affected by this proceeding.
Q. Is the Transmission Service Charge ("TSC") changing because of this filing?
A. No. The Company submitted and the Commission approved the TSC in the Company's 2006 distribution rate case. The purpose of the TSC is to enable the Company to recover, on a dollar-for-dollar basis, the expenses it incurs from PJM as a provider of transmission service to retail customers who receive default service from the Company. Electric generation suppliers are responsible for transmission charges for shopping customers. The Company's retail transmission rates were redesigned to reflect the FERC formula and the method of providing and paying for transmission service through PJM. The TSC is updated June 1 every year in conjunction with the update to the FERC formula rate. The TSC has worked successfully since it was implemented, and the Company is not proposing changes to the TSC or changes to the TSC retail rates in this proceeding.

## III. REVENUE IMPACT BY RATE SCHEDULE

Q. Have the annual revenue effects of the new proposed rates been calculated?
A. Yes. Schedule D-5D of Duquesne Light's Exhibit No. 2 was prepared in accordance with PA PUC Data Filing Requirement IV-A. The pages in this schedule provide the rate class revenue impact and the overall revenue effect for the fully projected future test year period.
Q. Please explain Schedule D-5D for the fully projected future test year.
A. Schedule D-5D Page 1 identifies the forecasted customers, sales and retail revenue by rate class for distribution, transmission and generation. The customers, sales and revenues are based on the billing determinants provided in Mr. Mobley's forecast at DLC Statement No. 3. Also shown are the forecasted revenues the Company plans to collect at current rates through tariff riders for Rider No. 1 - Retail Market Enhancement Surcharge ("RMES"),

Rider No. 5 - Universal Service Charge ("USC"), Rider No. 15A - Phase IV Energy Efficiency and Conservation Surcharge ("EEC IV"), Rider No. 20 - SMC, Rider No. 22 DSIC and Rider No. 10 - State Tax Adjustment ("STAS"). The Customer Assistance Program ("CAP") revenue credit is the billing deficiency associated with CAP customers that is recovered through the USC charge.

Page 2 reflects the forecasted revenue at current rates with certain surcharge revenue removed and only the DSIC and STAS, revenue shown. The STAS is proposed to be set at $0 \%$ with the associated taxes recovered in the proposed distribution charges. Schedule D-5D, Line 29, Page 2 reflects the reduction in revenue that the Company expects to experience related to the decrease in retail sales load that the Company is forecasting. Mr. O'Brien at DLC Statement No. 10 describes the retail sales load revenue reduction that is calculated in Exhibit No. 2, Schedule D-5B, and Mr. Mobley's Exhibit TM-2 identifies the Company's forecasted retail sales forecast that was utilized in calculating the reduction in revenue. The distribution revenue in Schedule D-5D, Column G, Page 2 is the base distribution revenue from which the requested increase is measured. The total revenue on Page 2 ties to the total revenue described by Mr. O'Brien with his revenue adjustments in Exhibit No. 2, Schedule D-1, Page 1.

Page 3 of Schedule D-5D shows the distribution revenue and total revenue at the requested revenue increase and the respective increases on a percentage basis.

For illustrative purposes, Pages 4-6 provide similar calculations assuming 100\% default service supply load.

## IV. PROOF OF REVENUE

## Q. Was a bill frequency analysis or proof of revenue calculation prepared?

A. Yes. Attachment DFR IV-C-Proof was prepared in accordance with the Commission's Data Filing Requirement IV-C and provides the calculation of revenues at current and proposed rates. Attachment DFR IV-C-Proof provides a calculation for each retail tariff rate schedule. For each rate schedule, the first column identifies the type of charge, i.e. customer charge, demand charge or energy charge for distribution, transmission and generation and for each rider, if applicable to that rate schedule. The second column provides the annual billing determinants for each charge forecasted by Mr. Mobley. The third column identifies the current and proposed rates for each block. The fourth column identifies the revenues derived by multiplying the billing determinants in the second column by the rates in the third column. The revenues computed on these pages produce the revenues shown on the respective pages of Schedule D-5D (Fully Projected Future Test Year).
Q. Do the fore casted revenues at current and proposed rates reflect reduced sales from the effects of energy efficiencies?
A. Yes. In developing the Company's sales forecast, Mr. Mobley at DLC Statement No. 3 accounts for the reduced sales due to energy efficiencies and other factors projected through the end of the fully projected future test year. The proposed rates and fully projected future test year revenue were calculated based on Mr. Mobley's sales forecast.

## V. PROPOSED RETAIL TARIFF CHANGES

Q. Please describe the contents of Exhibit DBO-3.
A. This exhibit sets forth in detail the modifications being proposed to the Company's tariff provided in Exhibit DBO-1, including the changes in rates and rate design previously described in my testimony, to recover the proposed distribution revenue requirement that is being requested. The proposed modifications are also shown in a redline version of the tariff supplement provided in Exhibit DBO-2.
Q. Are you proposing changes to the Rules and Regulation section of the proposed tariff supplement?
A. Yes. The Company is proposing certain ministerial changes as well as changes to reflect current business practices that are described in the list of modifications within Exhibit DBO-2, as well as in Exhibit DBO-3, the Digest of Proposed Changes contained within Duquesne Light's proposed supplement.
Q. Are you proposing changes to the tariff rate schedules section of the proposed tariff supplement?
A. Yes. The distribution rates identified in each rate schedule in Exhibit DBO-1 have been modified to achieve the allocated revenue increase previously described in my testimony. The Company is not proposing changes to the base distribution rate structure in this proceeding.
Q. Please describe the proposed revisions to Rate AL - Architectural Lighting Service and Rate SH - Street Lighting Highway options to the tariff.
A. Beginning January 1, 2022, Rate AL and Rate SH will no longer be available to new customers, applicants and/or for new installations. The Company will continue to maintain and replace defective or broken fixtures for existing customers.

## Q. Please describe the proposed revisions to the LED street light rate options to the tariff.

A. Rate SM, Street Lighting Municipal, Rate SH, Street Lighting Highway and Rate PAL, Private Area Lighting, offer street lighting rates to municipal, highway, and non-municipal customers, respectively. The street light rates correspond to mercury vapor, high pressure sodium ("HPS") fixtures and LED fixture options. The Company closed the mercury vapor rate and stopped installing new mercury vapor fixtures in 2019, and proposes to do the same for HPS fixtures in this proceeding. Moving forward, the Company will install only LED street lighting fixtures. The Company proposes to add one new LED fixture option and remove one LED fixture option to/from Rate SM, Rate SH and Rate PAL, and update the supporting calculations for the existing LED fixtures as described below.
Q. Please describe the proposed revisions to the tariff to implement the new LED street light rate?
A. Rate SM, Rate SH and Rate PAL have been revised to include, in tabular format, the new LED fixture option and applicable distribution rates. These rates are a fixed charge per fixture per month similar to the existing LED fixtures. The updated rate is based on the calculations in Exhibit DBO-4.

In addition, Rider No. 8, Default Service Supply ("DSS"), has been revised to show the new LED fixture option. The default service rates are monthly fixed charges based on the monthly kWh for each lamp size.

Finally, Appendix A, TSC has also been modified to add the LED fixture option.
Q. What DSS and TSC rate will the new LED street lighting fixture reflect?
A. The Company proposes to charge the new 30 watt LED street lighting option the same rate as the 45 wattage LED option until such time as new rates are updated. DSS street lighting rates are updated biannually effective June $1^{\text {st }}$ and December 1st, and TSC rates are updated annually effective June $1^{\text {st }}$.
Q. How did the Company calculate the fixed charges for the new and existing LED street lighting options?
A. Exhibit DBO-4 contains the supporting calculations and data used to determine the monthly fixture cost for each lighting option offered. Page 1 contains the cost of service for each new offering. Pages 2 through 11 evidence the rate calculations for the new and existing LED fixture offerings.
Q. How were the fixed kWh usages in the proposed tariff schedules determined for this unmetered service?
A. The lighting units will operate from dusk to dawn, which results in approximately 4,200 hours of operation per year. The respective lamp wattage is multiplied by the 4,200 hours of operation per year, divided by twelve months, and then divided by 1,000 to be converted
into kilowatt-hour. This calculation establishes the fixed monthly kWh usage for each fixture.

## Q. Are there any changes to existing riders in the tariff?

A. Yes, in addition to the above-mentioned changes to rules and riders that are sponsored by Ms. Kubiak, Ms. Phillips, Ms. Olexsak, and Ms. Everett, there are four (4) riders and one (1) appendix that the Company is proposing to revise. First, the Company is proposing to update the tables in the lighting sections of Rider No. 8 - DSS to accommodate the revised LED street light fixture in Rate Schedules SM, SH and PAL. Second, the Company is proposing to update the unbundling costs that are currently recovered in default service rates within Rider No. 8- Default Service Supply and Rider No. 9 - Day-Ahead Hourly Price Service. Third, the Company is proposing to reset Rider No. 10 - STAS to zero to reflect recovery of these charges in base rates. Fourth, the Company is proposing to reset Rider No. 22 - DSIC to zero to reflect recovery of these charges in base rates. Finally, the Company is proposing to update Appendix A - TSC accommodate the revised LED street lighting fixtures offered.

## Q. Please explain the change to Rider No. 8 - DSS.

A. Rider No. 8 provides residential, commercial, industrial and lighting customers on the applicable rate schedules with a default service supply rate that is determined based on a request for proposal to acquire the energy to serve the load of customers taking service under the provisions of the rider. The Company is proposing to update the tables in the
lighting section of the rider in order to accommodate the new LED street lighting fixture that is offered.

The Company further proposes to update the unbundled costs that are currently recovered in default service rates for residential, small and medium procurement groups that was approved by the Commission as part of the Petition of Duquesne Light Company for Approval of a Default Service Plan for the Period June 1, 2021 to May 31, 2025 at Docket No. P-2020-3019522. Exhibit DBO-5 reflects the updated unbundling costs. These updated unbundled costs will be fixed and reconciled only for differences between projected and actual consumption. The Company would reflect the updated unbundled costs in rates effective June 1, 2022, the first effective default service supply rate change for all classes after new distribution rates become effective January 15, 2022.
Q. Please explain the change to Rider No. 9 - Day-Ahead Hourly Price Service ("HPS")
A. Rider No. 9 provides eligible C\&I customers with the ability to purchase their electric supply requirements on a day-ahead hourly basis. Similar to Rider No. 8 above, the Company is proposing to update the unbundling costs that are recovered through a fixed retail administrative ("FRA") rate in Rider No. 9 for the HPS eligible procurement group. Exhibit DBO-5 reflects the updated unbundling costs. These updated unbundling expenses will be fixed and reconciled only for differences between projected and actual consumption. The Company would reflect the updated unbundled costs in rates effective June 1, 2022, the first effective FRA rate change after new distribution rates become effective January 15, 2022.
Q. Please explain the change to Rider No. 10 - STAS.
A. Rider No. 10 is a two-part surcharge to recover changes in taxes of the Commonwealth. Part 1 of the STAS reflects changes in tax rates for the Capital Stock Tax, Corporate Net Income Tax and Public Realty Tax, and is applicable only to the distribution charges of customer bills. Part 2 of the STAS reflects changes in the Gross Receipts Tax and is applicable to the distribution, transmission and generation charges for customers taking service from the Company. For presentation purposes in this filing, both parts of the STAS have been set at $0 \%$. The Company will submit its annual STAS reconciliation filing in December 2021, for any state tax changes not reflected in the base rate filing.

## Q. Please briefly describe the Company's DSIC.

A. The purpose of the DSIC is to recover the reasonable and prudent capital costs incurred to repair, improve, or replace eligible property which is completed and placed in service between base rate cases. The DSIC provides public utilities, such as Duquesne Light, with the resources to accelerate the replacement of aging infrastructure.

## Q. Please explain the proposed changes to Rider No. 22 - DSIC.

A. In this distribution base rate filing, the Company has included the costs recovered under its existing DSIC in base rates, as required by Section 1358(b) of the Public Utility Code. The Company is proposing to include the capital investment and associated depreciation and tax effects for the DSIC in base rates. With the exception of prior period over/under collections ("E-Factor"), the Company will reset Rider No. 22 to zero as of the effective date of the base rates determined in this case. Rider No. 22 will remain at zero, with the
exception of E-Factor, until Duquesne Light has added plant within DSIC eligible accounts in excess of the total claimed amount included in its estimated December 31, 2022, rate base in the present case.

The Company is proposing to roll-in the DSIC in two steps. The first step includes rolling the projected DSIC surcharge revenue into present distribution rates as evidenced in Exhibit 2, Schedule D-5D, Column F, Page 2. As described earlier, the distribution revenues in Schedule D-5D, Column G, Page 2 are the base distribution revenues from which the requested increase is measured. The total revenue on Page 2 ties to the total revenue described by Mr. O'Brien with his revenue adjustments on Exhibit No. 2, Schedule D-1, Page 1. The second step includes rolling DSIC assets into the base distribution rate base, which is included in DSIC eligible FERC accounts within each of Mr. O'Brien's Exhibits (2 through 4), Schedule C-2, Page 3. Mr. O'Brien explains these adjustments in more detail within DLC Statement No. 10.

## Q. Please explain the proposed changes to Appendix A - TSC.

A. Appendix A provides the Company the mechanism to charge default service customers for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the FERC. The Company is proposing to update the table for the lighting rate classes in order to accommodate the new LED street lighting fixture offered.

## Q. Are there any new or revised riders in the tariff?

A. Including the Riders sponsored by other witnesses, as discussed above, the Company is proposing the following additional riders to the tariff:

- Rider No. 4 - Federal Tax Adjustment Charge ("FTAC")
- Rider No. 7 - Residential Subscription Rate Pilot
- Rider No. 16 - Service to Non-Utility Generating Facilities
- Rider No. 19 - Community Development
- Rider No. 23 - Home Charging Pilot Program
- Rider No. 24 - Fleet Charging Pilot Program
- Rider No. 25 - New Business Stimulus
- Rider No. 26 - Crisis Recovery Program


## Q. Please explain the new Rider No. 4 - FTAC.

A. As Company witness Simpson describes in further detail in his direct testimony, DLC Statement No. 12, the Federal Tax Adjustment Charge (FTAC) will provide for adjustments to base distribution revenue to reflect the effects of future increases or decreases in the federal corporate income tax rate.

## Q. Please describe the Company's proposed FTAC.

A. The FTAC is a reconcilable Section 1307(e) adjustment clause that will function similar to the Company's existing STAS that provides for adjustments to base rates for changes in state taxes and specifically for changes in the tax rate under the Pennsylvania Corporate Net Income Tax. The Company's proposed methodology to quantify the federal income tax adjustment ("FITA") before and after implementing the federal corporate income tax rate change is presented in an illustrative example within witness Simpson's Exhibit MLS3.

The increase/decrease in required revenues will be divided by the estimated annual base distribution revenues to develop the FTAC that will be applied to customers' bills for service rendered during the applicable twelve-month period. The difference between the actual increase/decrease in required revenue and the increase/decrease produced by the FTAC as applied will be subject to refund or recovery in an annual true-up to the FTAC.

An annual reconciliation statement will be submitted to the Commission each year, and a final reconciliation statement will be filed within 30 days after the completion of the final over/under collection. The Company may file interim rate adjustments to eliminate any over or under recovery of the surcharge outside of their respective filing periods. The FTAC revenues and reconciliation will be subject to audit by the Commission's Bureau of Audits. The FTAC has been included in the Company's proposed Tariff within Exhibits DBO-1 and DBO-2.
Q. Please describe the computation of the FTAC.
A. The computation of the FTAC is as follows:

$$
\begin{aligned}
& \text { FTAC }=\frac{(((\text { FITA } * \mathrm{GRCF})+\mathrm{e}) * \mathrm{GRT})}{\text { PAR }} \\
& \mathrm{GRCF}=(1 /((1-\mathrm{SIT}) *(1-\mathrm{FIT}))) \\
& \mathrm{GRT}=1 /(1-\mathrm{T})
\end{aligned}
$$

Where:
FITA $=$ Reflects the federal income tax adjustment, if any, and may be a positive or negative value.
GRCF $=$ Gross Revenue Conversion Factor
SIT = State Income Tax rate in effect at the time of the filing

FIT $=$ Federal income tax rate in effect at the time of the filing $\mathrm{T}=$ Pennsylvania gross receipts tax rate in effect during the billing month $\mathrm{e}=$ Amount calculated (+/-) under the annual reconciliation feature or Commission audit. PAR $=$ Projected annual revenues for base distribution service (excluding all applicable clauses and riders) from existing customers

## Q. What constitutes distribution re venue for purposes of the FTAC calculation?

A. For purposes of calculating the FTAC charge, distribution revenue includes all amounts that are billed to customers for distribution service (i.e. fixed customer charge, $\mathrm{kWh}, \mathrm{kW}$ ), excluding all applicable clauses and riders. As a result, the FTAC, expressed as a percentage, will be applied to the total base distribution charges of a customer's bill, before all other clauses and riders have been calculated.

## Q. What customers will be charged the FTAC?

A. The Company's FTAC will be applied as an equal percentage to all distribution customers.

## Q. Will the FTAC appear as a separate charge on customers' bills?

A. Yes. The Company is proposing to present the FTAC mechanism as a separate line item, distinct from the other customer charges.
Q. What is the projected impact of the FTAC on customers' rates?
A. Per the illustrative FTAC rate calculation provided in Exhibit DBO-6, Duquesne Light estimates that a change in the federal corporate income tax rate from $21 \%$ to $28 \%$ would be approximately $4.49 \%$ increase in distribution charges. This is based on the illustrative FITA example within witness Mr. Simpson's Exhibit MLS-3. The incremental total bill
impact to the average residential default service customer would be $\$ 2.63$ or $2.44 \%$ on a total bill basis.

## Q. When would the FTAC go into effect?

A. The Company is requesting permission to implement its FTAC on January 15, 2022. The FTAC would be filed to become effective on 10 days' notice as soon as practicable following the effective date of any federal corporate income tax change. After the initial filing, the FTAC shall be filed with the Commission by April 1st of each year that it is in place. The FTAC will be reset to zero upon application of new base rates. Thereafter, only the residual over/under collection or E-factor amount can continue to be collected or credited, until a subsequent change occurs in the future that impacts the federal corporate income tax rate.
Q. The Commission's Policy Statement on alternative distribution ratemaking mechanisms, 52 Pa . Code §§ $\mathbf{6 9 . 3 3 0 1}$ and 69.3302 , identifies a number of factors the Commission may consider when evaluating an alternative distribution rate mechanism. Has the Company considered these factors with respect to the FTAC?
A. Yes. I address each of them below.
(1) How the ratemaking mechanism and rate design align revenues with cost causation principles as to both fixed and variable costs.

The FTAC advances cost-causation principles because it aligns the Company's incurrence and recovery of federal tax liability, as Mr. Simpson explains in his direct testimony.
(2) How the ratemaking mechanism and rate design impact the fixed utility's capacity utilization.
(3) Whether the ratemaking mechanism and rate design reflect the level of demand associated with the customer's anticipated consumption levels.
(4) How the ratemaking mechanism and rate design limit or eliminate interclass and intraclass cost shifting.
(5) How the ratemaking mechanism and rate design limit or eliminate disincentives for the promotion of efficiency programs.
(6) How the ratemaking mechanism and rate design impact customer incentives to employ efficiency measures and distributed energy resources.
(7) How the ratemaking mechanism and rate design impact low-income customers and support consumer assistance programs.

Items \#2 through \#7 are not applicable to the FTAC. The FTAC adjusts the Company's total revenue requirement, but does not affect customer programs, rate design, or revenue allocation among or within any customer groups.
(8) How the ratemaking mechanism and rate design impact customer rate stability principles.

The FTAC supports customer rate stability by reducing regulatory lag between a change in federal tax rates and the corresponding adjustment in distribution rates. Absent the FTAC, a change in federal tax rates could cause the Company to over- or under-collect until its distribution rates are reset. The longer these over- or under-collections accumulate, the more rate disruption they will produce when ultimate refunded or recouped from customers. The FTAC mitigates the accumulation of over- or under-collections by adjusting the Company's distribution rates in tandem with federal corporate income tax rates.
(9) How weather impacts utility revenue under the ratemaking mechanism and rate design.

Item \#9 is not applicable to the FTAC.
(10) How the ratemaking mechanism and rate design impact the frequency of rate case filings and affect regulatory lag.

Please see my response to item \#8 above. As discussed, the FTAC mitigates regulatory lag associated with changes in federal corporate income tax rates, and thereby may reduce the need for or frequency of future rate case filings.
(11) If or how the ratemaking mechanism and rate design interact with other revenue sources, such as Section 1307 automatic adjustment surcharges, 66 Pa.C.S. § 1307 (relating to sliding scale of rates; adjustments), riders such as 66 Pa.C.S. § 2804(9) (relating to standards for restructuring of electric industry) or system improvement charges, 66 Pa.C.S. § 1353 (relating to distribution system improvement charge). Item \#11 is not applicable. As described above, the FTAC is being proposed as a reconcilable Section 1307(e) adjustment clause, but it will only interact with base distribution revenue, and will not apply to any other revenue sources.
(12) Whether the alternative ratemaking mechanism and rate design include appropriate consumer protections.

The FTAC includes appropriate customer protections. Any adjustment to the Company's rates via the FTAC is subject to prior Commission review and approval. As Mr. Simpson explains in his direct testimony, and as the proposed FTAC Rider indicates, the Company must provide full factual support for any proposed rate adjustment through the FTAC, which will be provided to statutory advocates as well as the Commission. In addition, as described above, the FTAC revenues and reconciliation will be subject to audit by the Commission's Bureau of Audits.
(13) Whether the alternative ratemaking mechanism and rate design are understandable to consumers.

This item is not directly applicable to the FTAC, as the FTAC only modifies the Company's revenue requirement, not any customers' rate design. However, it is intuitive that as federal corporate income tax rates change, the Company's costs recovered through rates must also change.
(14) How the ratemaking mechanism and rate design will support improvements in utility reliability.

The FTAC advances the Company's ongoing efforts to improve reliability by reducing regulatory lag, as I discussed above. By aligning tax liability incurrence with recovery thereof, the FTAC helps to ensure the Company can continue to invest in programs that support system reliability and resiliency.

## Q. Please explain the new Rider No. 7 - Residential Subscription Rate Pilot.

A. As sponsored by Company witness Everett, she describes in further detail in her direct testimony, DLC Statement No. 17, the Company's proposal to implement a pilot to test the feasibility and acceptance of a Residential Subscription tariff. This subscription rate would offer customers the option to select a specified level of grid access for a set monthly charge.
Q. Please explain the new Rider No. 16 - Service to Non-Utility Generating Facilities.
A. As sponsored by Company witness Everett, which she describes in further detail in her direct testimony, DLC Statement No. 17, the Company is proposing to change the structure of Rider No. 16.
Q. Please explain the new Rider No. 19 - Community Development Rider.
A. As sponsored by Company witness Everett, which she describes in further detail in her direct testimony, DLC Statement No. 17, the Company is proposing to provide incentives for customers to bring operations to the Company's service territory.
Q. Please explain the new Rider No. 23 - Home Charging Pilot Program and Rider No. 24 - Fleet Charging Pilot Program.
A. As sponsored by Company witness Olexsak (DLC Statement No. 8) and Everett (DLC Statement No. 17), the Company's pilot proposals include rates charged to participating customers to recover the costs of the chargers, and some of the costs incurred to establish charging solutions, for customers who are using electric vehicles.
Q. Please explain the new Rider No. 25 - New Business Stimulus Rider.
A. As sponsored by Company witness Kubiak, which she describes in further detail in her direct testimony, DLC Statement No. 5, the Company is proposing to help support the rebuilding of small communities' business districts by incentivizing new businesses to occupy and operate from vacant storefronts in certain communities in Duquesne Light's service territory by providing them with a reduced distribution rate for 2 years.

## Q. Please explain the new Rider No. 26 - Crisis Recovery Program.

A. As sponsored by Company witness Kubiak, which she describes in further detail in her direct testimony, DLC Statement No. 5, the Company is proposing to provide a relief program for existing nonresidential customers who have accumulated a delinquent balance because of COVID-19 business restrictions.

## Q. Does this conclude your direct testimony?

A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

## PR DUQUESNE LIGHT CO.

## SCHEDULE OF RATES

For Electric Service in Allegheny and Beaver Counties
(For List of Communities Served, see Pages No. 4 and 5)
Issued By

## DUQUESNE LIGHT COMPANY

411 Seventh Avenue
Pittsburgh, PA 15219
Mark E. Kaplan
Interim President and Chief Executive Officer

ISSUED: April 16, 2021
EFFECTIVE: June 15, 2021

Filed at Docket No. R-2021-3024750

# LIST OF MODIFICATIONS MADE BY THIS TARIFF 

## CHANGES

## List of Modifications Made by this Tariff

First Revised Pages No. 2A through Original Page No. 2G
Cancelling Original Pages No. 2A-2G
Original Pages No. 2H-2L
Original Page No. 2H through Original Page No. 2L have been added to Tariff No. 25 to accommodate the List of Modifications.

Original Page No. 3A has been added to the Table of Contents and therefore to Tariff No. 25.
Original Page No. 26A has been added to the rules section and therefore to Tariff No. 25.
Original Page No. 34A has been added to the rules section and therefore to Tariff No. 25.
Original Page No. 87A has been added to the Rider Matrix section and therefore to Tariff No. 25.
Original Page No. 92A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 92B has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 97A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 124A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 128A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 141A through Original Page No. 141G have been added to the rider section and therefore to Tariff No. 25.

## Table of Contents

Fourth Revised Page No. 3 Cancelling Third Revised Page No. 3

Original Page No. 2H through Original Page No. 2L have been added to Tariff No. 25 to accommodate the List of Modifications.

Rider No. 4 - Federal Tax Adjustment Clause has been added to Tariff No. 25 and to the Table of Contents.
Original Page No. 87A has been added to the Table of Contents to reflect the additional page added to the Rider Matrix (Pages No. 87-87A).

Original Page No. 92B has been added to the Table of Contents to reflect the addition of Rider No. 4 - Federal Tax Adjustment Clause (Pages No. 92-92B).

Rider No. 7 - Residential Subscription Service Pilot has been added to Tariff No. 25 and to the Table of Contents.
Original Page No. 97A has been added to the Table of Contents to reflect the additional page added to Rider No. 7 - Residential Subscription Service Pilot (Pages No. 97-97A).

# LIST OF MODIFICATIONS MADE BY THIS TARIFF 

## CHANGES - (Continued)

Table of Contents
Fourth Revised Page No. 3
Cancelling Third Revised Page No. 3
Table of Contents information previously found on Third Revised Page No. 3, Cancelling Second Revised Page No. 3 has been moved to Original Page No. 3A to accommodate the additional Riders added to Tariff No. 25.

## Table of Contents

Original Page No. 3A
Table of Contents information previously found on Third Revised Page No. 3, Cancelling Second Revised Page No. 3 has been moved to Original Page No. 3A to accommodate the additional Riders added to Tariff No. 25.

Original Page No. 124A has been added to the Table of Contents to reflect the additional page added to Rider No. 16 - Service to Non-Utility Generating Facilities (Pages No. 123-124A).

Rider No. 19 - Community Development for New Load has been added to Tariff No. 25 and to the Table of Contents.
Administerial update to the page numbering on the Table of Contents page. Rider No. 21 - Net Metering Service now reflects the addition of Page No. 136A which was added and approved in the Company's DSP IX proceeding at Docket No. P-2020-3019522, Order entered January 14, 2021.

Rider No. 23 - Home Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 24 - Fleet Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 25 - New Business Stimulus has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 26 - Crisis Recovery Program has been added to Tariff No. 25 and to the Table of Contents.

## Rules and Regulations

First Revised Page No. 7
The Electric Service Tariff
Cancelling Original Page No. 7
3.1 Definitions
(2) Applicant

Language has been added to clarify that the definition of "Applicant" includes non-residential applicants.

Rules and Regulations
Contracts, Deposits and Advance Payments Rule No. 5 - Deposits and Advance Payments

Language has been modified to reflect that residential customers/applicants are permitted to pay their deposit in four (4) twenty-five percent ( $25 \%$ ) installments.

Language has been modified to clarify security deposits for non-residential customers/applicants.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

Rules and Regulations<br>Installation of Service<br>Rule No. 6.1-Service Point

First Revised Page No. 13
Cancelling Original Page No. 13

Language has been revised to accommodate the Company's proposed transportation electrification programs.

Rules and Regulations
Installation of Service
Rule No. 7 - Supply Line Extensions

First Revised Page No. 14
Cancelling Original Page No. 14
First Revised Page No. 15
Cancelling Original Page No. 15
First Revised Page No. 16
Cancelling Original Page No. 16

Language has been modified to clarify that both customers and applicants for service are subject to tariff cost commitment requirements.

Language has been modified to allow applicants (e.g., developers) to pay Contribution in Aid of Construction ("CIAC") on behalf of the ultimate customer.

## Rules and Regulations

First Revised Page No. 19
Installation of Service
Rule No 10 - One Service of A Kind
Language has been modified to remove obsolete cross-reference.

## Rules and Regulations

Second Revised Page No. 26
Measurement and Use of Service
Cancelling First Revised Page No. 26
Rule No. 16.1- Interconnection, Safety and Reliability Requirements
New Rule No. 16.1 Interconnection, Safety and Reliability Requirements has been added to the tariff to clarify and memorialize the Company's existing process for customer generation interconnection (including facilities not eligible for net metering).

Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements on Second Revised Page No. 26, Cancelling First Revised Page No. 26.

# LIST OF MODIFICATIONS MADE BY THIS TARIFF 

## CHANGES - (Continued)

## Rules and Regulations <br> Measurement and Use of Service

Original Page No. 26A

Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements.

Rules and Regulations
Company Property on Customer's Premises
Rule No. 22.1 - Vegetation Management and Right-of-Way
Language has been added to clarify a customer's responsibility to manage vegetation around the Company's service facilities.

## Rules and Regulations <br> Discontinuance, Curtailment or Interruption of Electric Service Rule No. 40 - Reconnection Charge

Language has been added to expand reconnection charge applicability to customers who apply for reconnection at the same premises more than thirty (30) days following disconnection (i.e., when then former customer now constitutes an "applicant").

## Rules and Regulations <br> Discontinuance, Curtailment or Interruption of Electric Service Rule No. 41 - Prohibition of Residential Master Metering

Language has been modified to allow residential master metering for certain low-income supportive housing pursuant to Rule No. 41.1.

## Rules and Regulations

Discontinuance, Curtailment or Interruption of Electric Service
First Revised Page No. 34
Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing
New Rule No. 41.1 Residential Master Metering for New Low-Income Supportive Housing has been added to the tariff to establish eligibility and conditions for master metering of certain low-income supportive housing.

## Rules and Regulations <br> General Provisions

First Revised Page No. 34
Cancelling Original Page No. 34
Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing on First Revised Page No. 34, Cancelling Original Page No. 34.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

## Rules and Regulations <br> General Provisions

Original Page No. 34A

Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing.

Rate RS - Residential Service
First Revised Page No. 38 Cancelling Original Page No. 38

Administerial revision to add the word "cents" back to the Energy Charge line to indicate "cents per kilowatt hour."

Rate GS/GM - General Service Small and Medium
First Revised Page No. 46
Cancelling Original Page No. 46
Language has been added to clarify eligibility.

Rate GS/GM - General Service Small and Medium
First Revised Page No. 48 Cancelling Original Page No. 48

Language has been modified to reflect current business practice.

Rate GL - General Service Large
First Revised Page No. 53 Cancelling Original Page No. 53

Language has been added to clarify eligibility.

Rate GLH - General Service Large Heating
First Revised Page No. 56
Cancelling Original Page No. 56
Language has been reorganized on the Rate Schedule to clarify that the Customer Distribution Charge is only applicable to the billing months of October through May.

Rate L -Large Power Service
First Revised Page No. 60
Cancelling Original Page No. 60
Language has been modified to reflect current business practice.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

## Rate HVPS -High Voltage Power Service

First Revised Page No. 62
Cancelling Original Page No. 62
Language has been added to clarify eligibility.

Rate HVPS -High Voltage Power Service
First Revised Page No. 63
Cancelling Original Page No. 63
Language has been modified to reflect current business practice.

Rate AL - Architectural Lighting Service
First Revised Page No. 66
Cancelling Original Page No. 66
Language has been added to reflect that beginning January 15, 2022, Rate AL will no longer be available to new customers or applicants, or to new installations for existing customers.

Rate SE - Street Lighting Energy
Special Provisions - No. 5
First Revised Page No. 71
Cancelling Original Page No. 71
Language has been modified to replace the word "men" with "workers."

## Rate SM - Street Lighting Municipal

First Revised Page No. 72
Cancelling Original Page No. 72
Language has been added to reflect that beginning January 15, 2022, only LED lighting options will be installed for customers being served under Rate SM.

Language has been added to reflect that beginning January 15, 2022, the Company may replace existing high pressure sodium lights with LED lights or that a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

## Rate SM - Street Lighting Municipal

First Revised Page No. 73
Cancelling Original Page No. 73
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

## Rate SM - Street Lighting Municipal

First Revised Page No. 74
Cancelling Original Page No. 74
Language has been modified to replace the word "his" with "its."

# LIST OF MODIFICATIONS MADE BY THIS TARIFF 

## CHANGES - (Continued)

## Rate SH - Street Lighting Highway

First Revised Page No. 76
Cancelling Original Page No. 76
Language has been added to reflect that beginning January 15, 2022, Rate SH will no longer be available to new customers or applicants, or to new installations for existing customers.

Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Rate SH - Street Lighting Highway
First Revised Page No. 76
Cancelling Original Page No. 76
New LED lamp wattages have been inserted under Cobra Head fixtures.

## Rate PAL - Private Area Lighting

First Revised Page No. 82
Cancelling Original Page No. 82
Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Rate PAL - Private Area Lighting
First Revised Page No. 82
Cancelling Original Page No. 82
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

## Rate PAL - Private Area Lighting

First Revised Page No. 84
Cancelling Original Page No. 84
Language has been modified to replace the word "his" with "its."

# LIST OF MODIFICATIONS MADE BY THIS TARIFF 

## CHANGES - (Continued)

## Standard Contract Riders Rider Matrix

Second Revised Page No. 87
Cancelling First Revised Page No. 87

The Rider Matrix has been updated to reflect the addition of the following Riders:
Rider No. 4 - Federal Tax Adjustment Clause
Rider No. 7 - Residential Subscription Service Pilot
Rider No. 19 - Community Development for New Load

## Standard Contract Riders <br> Rider Matrix

Second Revised Page No. 87
Cancelling First Revised Page No. 87
Riders No. 20 through Appendix A, previously found in the Rider Matrix on First Revised Page No. 87, Cancelling Original Page No. 87, have been moved to Original Page No. 87A to accommodate the additional Riders placed into the Tariff.
"Continued on Original Page No. 87A" has been added to the bottom of Second Revised Page No. 87, Cancelling First Revised Page No. 87, to indicate that the Rider Matrix continues onto the next page.

## Standard Contract Riders <br> Rider Matrix

A Rider Matrix for Riders No. 20 through Appendix A, previously found on First Revised Page No. 87, Cancelling Original Page No. 87, has been created and is now found on Original Page No. 87A to accommodate the additional Riders placed into the Tariff.

## Standard Contract Riders <br> Rider Matrix

The Rider Matrix has been updated to reflect the addition of the following Riders:
Rider No. 23 - Home Charging Pilot Program
Rider No. 24 - Fleet Charging Pilot Program
Rider No. 25 - New Business Stimulus
Rider No. 26 - Crisis Recovery Program

Standard Contract Riders
Rider No. 4 - Federal Tax Adjustment Clause

First Revised Page No. 92
Cancelling Original Page No. 92
Original Page No. 92A
Original Page No. 92B

Rider No. 4 - Federal Tax Adjustment Clause ("FTAC") is being added to Tariff No. 25 to provide for adjustments to base distribution revenue to reflect the effects of future increases or decreases in the federal corporate income tax rate.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

Standard Contract Riders<br>Rider No. 5 - Universal Service Charge

First Revised Page No. 94
Cancelling Original Page No. 94
The CAP participation level has been reset as per the provisions of Rider No. 5.

Standard Contract Riders
First Revised Page No. 97
Rider No. 7 - Residential Subscription Service Pilot
Cancelling Original Page No. 97
Rider No. 7 - Residential Subscription Service Pilot is being added to Tariff No. 25 to offer eligible customers the option to select a specified level of grid access for a set monthly charge.

Standard Contract Riders
Second Revised Page No. 100
Rider No. 8 - Default Service Supply
Fourth Revised Page No. 101
Cancelling First Revised Page No. 101
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Standard Contract Riders<br>Rider No. 8 - Default Service Supply

Second Revised Page No. 103
Cancelling First Revised Page No. 103
In the "Calculation of Rates" section, the Docket No. has been updated in DSSa.

## Standard Contract Riders

Third Revised Page No. 108
Rider No. 9 - Day-Ahead Hourly Price Service
Cancelling Second Revised Page No. 108
Under the "Fixed Retail Administrative Charge" section, the Docket No. has been updated in FRA.

Standard Contract Riders
Rider No. 10 - State Tax Adjustment

Third Revised Page No. 112
Cancelling Second Revised Page No. 112

Rider No. 10 - State Tax Adjustment has been modified to reflect that Part 1 of the STAS has been set to zero.

Standard Contract Riders
Rider No. 16 - Service to Non-Utility Generating Facilities

First Revised Page No. 123
Cancelling Original Page No. 123
First Revised Page No. 124
Cancelling Original Page No. 124

Rider No. 16 - Service to Non-Utility Generating Facilities has been modified to reflect changes in applicable terms, rules, and rates.

## CHANGES - (Continued)

Standard Contract Riders<br>Rider No. 19 - Community Development

First Revised Page No. 128
Cancelling Original Page No. 128
Original Page No. 128A
Rider No. 19 - Community Development for New Load is being added to Tariff No. 25 to provide incentives to eligible customers to move and/or expand their operations within the Company's service territory.

Standard Contract Riders
Rider No. 21 - Net Metering Service

First Revised Page No. 133
Cancelling Original Page No. 133
First Revised Page No. 134
Cancelling Original Page No. 134
Second Revised Page No. 135
Cancelling First Revised Page No. 135
Second Revised Page No. 136
Cancelling First Revised Page No. 136
First Revised Page No. 136A
Cancelling Original Page No. 136A
Rider No. 21 - Net Metering Service has been revised to include Rate Schedule GLH and Rate Schedule L.

Standard Contract Riders
Rider No. 21 - Net Metering Service

First Revised Page No. 134
Cancelling Original Page No. 134

Language has been modified to reflect current business practice.

Standard Contract Riders
Rider No. 22 - Distribution System Improvement Charge

Seventh Revised Page No. 137 Cancelling Sixth Revised Page No. 137

Rider No. 22 - Distribution System Improvement Charge ("DSIC") has been modified to reflect that it has been set to zero.

## Standard Contract Riders

Original Page No. 141A-141B
Rider No. 23 - Home Charging Pilot Program
Rider No. 23 - Home Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to residential customers participating in the Company's voluntary Home Charging Pilot.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

## Standard Contract Riders <br> Rider No. 24 - Fleet Charging Pilot Program

Original Page No. 141C-141E

Rider No. 24 - Fleet Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to non-residential customers participating in the Company's voluntary Fleet Charging Pilot.

## Standard Contract Riders

Original Page No. 141F
Rider No. 25 - New Business Stimulus
Rider No. 25 - New Business Stimulus is being added to Tariff No. 25 to incent eligible new small or medium businesses by providing them with a reduced distribution rate for two (2) years.

## Standard Contract Riders <br> Rider No. 26 - Crisis Recovery Program

Original Page No. 141G

Rider No. 26 - Crisis Recovery Program is being added to Tariff No. 25 to provide a relief program for eligible existing small or medium business customers who have accumulated a delinquent balance because of COVID-19 business restrictions.

Appendix A - Transmission Service Charges
Second Revised Page No. 143
Cancelling First Revised Page No. 143
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

INCREASES

| Rate RS - Residential ServiceFirst Revised Page No. 38 <br> Cancelling Original Page No. 38 |  |
| :--- | ---: |
| Rate RH - Residential Service Heating | First Revised Page No. 40 |
| Rate RA - Residential Service Add-On Heat Pump | Cancelling Original Page No. 40 |
| Rate GS/GM - General Service Small and Medium | First Revised Page No. 43 |
| Cancelling Original Page No. 43 |  |
| First Revised Page No. 46 |  |
|  | Cancelling Original Page No. 46 |

## INCREASES - (Continued)

Rate GMH - General Service Medium Heating
Rate GL - General Service Large

Rate GLH - General Service Large Heating

Rate L - Large Power Service

Rate HVPS - High Voltage Power Service

Rate AL - Architectural Lighting Service

Rate SE - Street Lighting Energy

Rate SM - Street Lighting Municipal

Rate SH - Street Lighting Highway

Rate UMS - Unmetered Service

Rate PAL - Private Area Lighting

First Revised Page No. 50 Cancelling Original Page No. 50

First Revised Page No. 51 Cancelling Original Page No. 51

First Revised Page No. 53 Cancelling Original Page No. 53

First Revised Page No. 56
Cancelling Original Page No. 56
First Revised Page No. 57
Cancelling Original Page No. 57
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Cancelling Original Page No. 59
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Cancelling Original Page No. 62
First Revised Page No. 66 Cancelling Original Page No. 66

First Revised Page No. 69 Cancelling Original Page No. 69

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Cancelling Original Page No. 72
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Cancelling Original Page No. 74
First Revised Page No. 76
Cancelling Original Page No. 76
First Revised Page No. 80 Cancelling Original Page No. 80

First Revised Page No. 82 Cancelling Original Page No. 82

First Revised Page No. 84
Cancelling Original Page No. 84

Unit pricing has changed resulting in increases.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## INCREASES - (Continued)

Rider No. 10 - State Tax Adjustment
Third Revised Page No. 112 Cancelling Second Revised Page No. 112

Rider No. 10 - State Tax Adjustment has been modified to reflect that Part 1 of the STAS has been set to zero.

## DECREASES

Rate SM - Street Lighting Municipal

Rate PAL - Private Area Lighting

First Revised Page No. 73 Cancelling Original Page No. 73

First Revised Page No. 82 Cancelling Original Page No. 82

Unit pricing has changed resulting in decreases.

Rider No. 22 - Distribution System Improvement Charge

Rider No. 22 - Distribution System Improvement Charge has been modified to reflect that it has been set to zero.

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## RULES AND REGULATIONS - (Continued)

## THE ELECTRIC SERVICE TARIFF - (Continued)

## 3. APPLICATION - (Continued

The supply of electricity may be provided by the Company or by an alternative Electric Generation Supplier ("EGS"). Rates for the supply of electricity shall apply per applicable tariffs of the Company or the EGS.

### 3.1 DEFINITIONS

(1) Aggregator or Market Aggregator - An entity, licensed by the Commission, which purchases electric energy and takes title to electric energy as an intermediary for sale to retail customers.
(2) Applicant - An entity that applies for service provided by the Company. With respect to residential applicants, "applicant" means a natural person not currently receiving service who applies for residential service provided by a public utility or any adult occupant whose name appears on the mortgage, deed or lease of the property for which the residential utility service is requested. The term does not include a person who, within thirty (30) days after service termination or discontinuance of service, seeks to have service reconnected at the same location or transferred to another location within the service territory of the Company.
(3) Basic Services - The services necessary for the physical delivery of electricity service such as supply, including default service, transmission and distribution. Unless directed otherwise, "electric service" or "service" used throughout this tariff have the same meaning.
(4) Bill Ready - A form of consolidated billing where Duquesne Light provides a customer's usage to its electric generation supplier ("EGS") and the EGS then calculates the customer's charges and sends the line item(s) back to the Company to be presented on the supplier portion of the bill.
(5) Broker or Marketer - An entity, licensed by the Commission, which acts as an agent or intermediary in the sale and purchase of electric energy but does not take title to electric energy.
(6) Commission - The Pennsylvania Public Utility Commission.
(7) Company - Duquesne Light Company.
(8) Customer -Any person, partnership, association, corporation or other legal entity lawfully receiving service from the Company. Unless indicated otherwise, "retail customer" and "customer" used throughout this tariff shall have the same meaning. A residential customer is a natural person in whose name a residential service account is listed and who is primarily responsible for payment of bills rendered for the service or any adult occupant whose name appears on the mortgage, deed or lease of the property of which the residential utility service is requested. The term includes a person who, within thirty (30) days after service termination or discontinuance of service, seeks to have service reconnected at the same location or transferred to another location within the service territory of the public utility.
(9) Default Service - The Company will provide electricity to the customer in the event that a customer: 1) elects not to obtain electricity from an EGS; 2) elects to have the Company supply electricity after having previously purchased electricity from an EGS; 3) contracts with an EGS who fails to supply electricity, or 4) has been returned to Default Service by the EGS under circumstances as described in Rule No. 45.2 of this tariff.

## RULES AND REGULATIONS - (Continued)

## CONTRACTS, DEPOSITS AND ADVANCE PAYMENTS - (Continued)

## 5. DEPOSITS AND ADVANCE PAYMENTS - (Continued)

The Company may also use an applicant or customer credit score from a third party credit agency as a means to establish creditworthiness. The credit score in the report will be based in part on previous utility billing history and will use a commercially recognized credit scoring methodology that is within the range of generally accepted industry practices to determine whether security or advance payments are required to establish service. The Company may request a government issued photo ID of any applicant to verify the application.

Where the Company requires a deposit from a residential customer or applicant, the amount of the deposit will be based on Company charges in an amount that is equal to one-sixth of the applicant's estimated annual bill or onesixth of the actual average annual bill for existing customers at the premises. The minimum deposit amount for non-residential customers and applicants shall be $\$ 250.00$. When the Company determines a deposit is required for new service or for reconnection of service as described in Rule No. 40, such deposit shall be payable within a reasonable time period after commencing or reconnecting electric service. Failure to pay a required deposit may result in termination of service consistent with Commission regulations. An applicant or existing customer may furnish a third party guarantor in lieu of a cash deposit, with the provision of a written guaranty setting forth the terms therein. The guarantor will be responsible for all missed payments of the applicant or customer.

The Company will pay interest on residential cash deposits computed at the simple annual interest rate determined by the Commonwealth of Pennsylvania's Secretary of Revenue. The interest rate in effect when the deposit is required to be paid shall remain in effect until the later of the date the deposit is refunded or credited or December 31. On January 1 of each year, the new interest rate for that year will apply to the deposit. For all other cash deposits, the Company will pay interest at the lower of the average of 1 -year Treasury Bills for September, October and November of the previous year beginning May 1, 1995 and January 1, 1996 and each year thereafter, or six percent per annum without deduction for any taxes thereon, provided that interest accrued prior to April 14, 1995 shall be calculated at $6 \%$. On deposits held for more than one year, accrued interest will be paid at the end of each anniversary year. Upon the return of a deposit, any unpaid interest accrued thereon will be paid.

Deposits secured from a residential applicant or customer shall be returned to the depositor when a timely payment history has been established. A timely payment history is established when a customer has paid undisputed bills in full and on time for twelve (12) consecutive months. Should a customer become delinquent prior to establishing a timely payment history, the Company may deduct the outstanding balance from the deposit. Deposits secured from other than residential customers shall be returned to the depositor upon annual review provided such depositor shall have paid undisputed bills during those consecutive twelve (12) months without having service terminated and without having paid the bill subsequent to the due date so long as the customer is not currently delinquent. Payment of any disputed bill, where the payment is withheld beyond the due date set forth on the face of the bill at issue and the dispute over which is terminated substantially in favor of the customer, shall be made by the customer within fifteen (15) days following the termination of that dispute in order to be deemed timely. Where service is discontinued, the deposit and unpaid interest accrued thereon to the date of discontinuance of service, less the amount of all bills due the Company, will promptly be paid to the customer.

For purposes of all of the provisions of this Rule No. 5, when a customer resides at a place of business or commercial establishment, legitimately served pursuant to a commercial or industrial rate schedule, that is not a residential dwelling unit attached thereto, the customer is not thereby entitled to any of the protections in the Pennsylvania Public Utility Code or the Commission's regulations implementing the Pennsylvania Public Utility Code, or to any of the provisions of these rules or this Tariff, that apply exclusively to deposits for residential customers.

## RULES AND REGULATIONS - (Continued)

## INSTALLATION OF SERVICE - (Continued)

6.1 SERVICE POINT The Service Point for the customer's service installation shall depend on the customer's type of service. The Service Point shall generally be designated as follows:

| Type of Service | Service Point |
| :--- | :--- |
| Service voltage greater than 600V | Metering terminals, or for transformed service, <br> secondary transformer terminals |
|  | Service drop |
| Overhead service at voltage less than 600V | For underground service from overhead secondary <br> lines: the service lateral connection to Company <br> pole. |
| Underground service at voltage less than <br> 600 V | For underground service from underground spot <br> networks: the network protector spade(s). |
|  | For underground service from street secondary <br> underground networks: the collector bus. |
| For three-phase transformed underground service: <br> the secondary transformer terminal. |  |
| In Underground Residential Developments covered <br> by Rule No. 13.2: the meter base. |  |
| For other underground service from underground <br> secondary lines: the terminal box. |  |
| customer-owned pole or structure | Point of service line connection to the first customer- <br> owned pole or structure to which Company facilities <br> connect |

The Company reserves the right to designate an alternative Service Point, at its sole discretion, for customers with atypical or specialized service configurations, or customers participating in the Company's electric vehicle pilot program(s) for electric vehicle charging stations.

The Company shall not be required to install or maintain any conductors, meter base, equipment or apparatus beyond the Service Point except meter and meter accessories, as applicable; and electric vehicle charging stations and/or make-ready infrastructure, as applicable, for customers participating in the Company's applicable electric vehicle pilot program(s).

## 7. SUPPLY LINE EXTENSIONS

## A. Definitions

For the purposes of this rule, the following definitions are applicable:
(1) Contractor cost - The amount paid to a contractor for work performed on a line extension.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## A. Definitions - (Continued)

(2) Direct labor cost - The pay and expenses of public utility employees directly attributable to work performed on line extensions, but does not include construction overheads or payroll taxes, workers' compensation expenses, or similar expenses.
(3) Direct material cost - The purchase price of materials used for a line extension, but does not include the related stores expenses. In computing direct material costs, proper allowance should be made for unused materials recovered from temporary structures, and discounts allowed and realized in the purchase of materials.
(4) Total construction cost - The contractor cost, direct labor cost, direct material cost, stores expense, construction overheads, payroll taxes, workers' compensation expenses, or similar expenses.
(5) Current Year - For purposes of calculating a revenue guarantee, current year shall be each consecutive period of twelve (12) calendar months following the date permanent electric delivery service was first provided to a customer or applicant.
(6) Income Tax - Federal and State tax relating to the tax liability of contributions in aid-ofconstruction ("CIAC").

## B. Overhead Areas

(1) In areas where the existing supply lines are overhead, the Company will construct and maintain extensions of all single-phase overhead supply lines operating at 23,000 volts or less to approximately 100 feet within the customer's or applicant's property line without a guarantee of revenue.
(2) In areas where the existing supply lines are overhead, the Company will construct and maintain extensions of all three-phase overhead supply lines, operating at 23,000 volts or less, which are usable as a part of its general supply system without a guarantee of revenue. When the three-phase supply line extension is to supply service exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant over a period of five years which is sufficient to recover the actual total construction cost of the three-phase overhead line extension, less the estimated total construction cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## C. Underground Areas

(1) In areas where the existing supply lines are underground outside the limits of a residential development covered by Tariff Rule 13.2, the Company will construct and maintain extensions of all single-phase underground supply lines operating at 23,000 volts or less which are usable as part of its general supply system without a guarantee of revenue. When the single-phase supply line extension is to supply electricity exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant, over a period of five years which is sufficient to recover the actual total contractor cost, direct labor cost and direct material cost for the full length of the single-phase underground line extension, less the estimated total contractor cost, direct labor cost, and direct material cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.
(2) In areas where the existing supply lines are underground outside of the limits of a residential development covered by Tariff Rule 13.2, the Company will construct and maintain extensions of all three-phase underground supply lines operating at 23,000 volts or less which are usable as part of its general supply system without a guarantee of revenue. When the three-phase supply line extension is to supply service exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant over a period of five years which is sufficient to recover the actual total construction cost of the three-phase underground line extension, less the estimated total construction cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.

## D. Rights-of-Way

Before construction of a line extension, satisfactory rights of way and other necessary permits must be granted to the Company for the construction of the supply line extension along the route selected by the Company. The customer or applicant agrees to pay the Company any initial and recurring rights-of-way or license fees in excess of an amount normally incurred by the Company in constructing and maintaining the supply line extension.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## E. Revenue Guarantees

The revenue guarantee amount shall be the estimated combined cost of (i) the line extension and (ii) other new Company facilities necessary to serve the customer or applicant. The annual revenue guarantee amount shall be the revenue guarantee amount, divided by the number of years in the guarantee period. The annual revenue guarantee amount will be reviewed yearly and will be adjusted to the minimum charges as provided in the applicable rate schedule on the following basis:
(1) When the total of the monthly Company delivery charges at the end of the current year is less than the annual revenue guarantee amount, a payment equal to the difference plus the related income tax where applicable shall be immediately due and payable.
(2) When the total of the monthly Company delivery charges within the number of years in the guarantee period equals or exceeds the revenue guarantee amount, no further payments toward the revenue guarantee amount are required. Any prior payments in excess of the revenue guarantee amount, except for otherwise-applicable charges for electric service, will be refunded with accrued interest.
(3) If an additional customer is served from the line extension, the revenue guarantee amount will be reduced to the cost of the line extension which is used exclusively to serve the single customer. If the cost of the line extension to serve the new customer would increase the revenue guarantee amount for an existing customer, the extension shall be considered as a new line extension.
(4) In the event the customer discontinues or cancels service before the end of the guarantee period, the balance of the revenue guarantee amount plus the related income tax where applicable shall be immediately due and payable.

## F. Contributions in Aid of Construction

The Contribution in Aid of Construction (CIAC) will be refunded to the customer over the five-year revenue guarantee period to the extent that the revenue from the customer satisfies the revenue guarantee.
(1) When the total of the monthly Company delivery charges at the end of the current year is greater than or equal to one-fifth of the CIAC, a refund of one-fifth of the CIAC will be made to the customer.
(2) When the total of the monthly Company delivery charges at the end of the current year is less than one-fifth of the CIAC, a refund of one-fifth of the CIAC less the revenue shortfall will be made to the customer.

## RULES AND REGULATIONS - (Continued)

## INSTALLATION OF SERVICE - (Continued)

## 9. RELOCATIONS OF FACILITIES - (Continued)

## C. Other Company Facilities for all Customers

When requested or required by the action of a customer or a third party, relocation of Company facilities, except those covered under Section A of this Rule, will be performed by the Company upon receipt, in advance, of the Company's estimated total direct and indirect costs including the related income tax of such relocations from the customer or such third party. The Company may waive charges under this rule if, in the Company's judgment, the location of the Company's existing supply line and/or service line on the customer's property restricts the growth of the customer's operations and the potential increase in the Company's revenues.
10. ONE SERVICE OF A KIND Only one service of each type as to voltage and phase will be provided to a customer under one contract; provided, however, that when, in the judgment of the Company, standard electric service may be most economically effected by establishing a separate service connection for a portion of the customer's load, such separate service connection may, at the option of the customer, be combined, notwithstanding similarity as to voltage and phase, with other service connections under a single contract for the customer's entire electric delivery service requirements at the affected location. Electric service at different premises, regardless of voltage or phase, shall never be combined for billing under one account for the purpose of reducing Company charges.
11. METER SUPPORTS The customer shall provide on the premises, at a location satisfactory to the Company, proper space, supports, and enclosures for metering equipment.
12. TRANSFORMERS AND CONTROL EQUIPMENT Where, in the judgement of the Company, it is necessary to install transformers and other control or protective equipment on the customer's premises, the customer shall provide a suitable place, foundation and housing for such installation, in accordance with the Company's "Electric Service Installation Rules."
13. CUSTOMER'S FACILITIES The installation and maintenance of the customer's wiring and equipment shall be in accordance with the Company's "Electric Service Installation Rules" and shall be subject to the approval of the proper authorities. The Company is not required to provide electric service thereto unless so approved, but does not assume any responsibility for securing such approval. The Company shall not be liable for damages or injuries resulting from any defects in the customer's wiring or equipment.

### 13.1 UNDERGROUND DISTRIBUTION

A. When the Company is required by governmental order or enters into agreements with redevelopment authorities, a private real estate developer or a group of customers to change its distribution supply lines from overhead to underground, customers receiving or to receive electric service at voltages of 600 volts or less from these supply lines shall provide at their own expense the necessary facilities for receiving such underground service.

## RULES AND REGULATIONS - (Continued)

## MEASUREMENT AND USE OF SERVICE - (Continued)

16.1 INTERCONNECTION, SAFETY AND RELIABILITY REQUIREMENTS In order to assure the integrity and safe operation of the Company's system and to permit the continuation of reliable service to other customers, the following requirements and standards apply to all types of Generating Facilities, including customer owned generation and customer owned energy storage systems, desiring to interconnect with the Company's system.

All generation operations shall be performed in a safe, reasonable and competent manner in accordance with prudent electric practices in order to, among other things, preserve and protect the Company's electric system.

All Generating Facilities shall submit a written application to the Company for acceptance of interconnected operation of their facilities with the Company's system prior to engaging in such interconnected operations. The Company may require, among other things, the following as part of any application submitted by an Applicant/Customer for service under this Rule No. 16.1.

1. Plans, specifications and location of the proposed installation.
2. Single line diagrams and details, including relay settings, of the proposed protection schemes.
3. Instruction manuals for all protective components.
4. Component specifications and internal wiring diagrams of protective components, if not provided in instruction manuals.
5. Generator data required to analyze fault contributions and load current flows including, but not limited to, equivalent impedances, time constants and harmonic distortions.
6. The rating of all protective equipment if not provided in instruction manuals.
7. All such other information that may be required by the Company.

Paralleling customer generation with the Company's system, including closed transition of customer back-up generation, shall be permitted only upon the written consent of the Company.
17. FLUCTUATIONS AND UNBALANCES The customer's use of electric service shall not cause fluctuating loads or unbalanced loads of sufficient magnitude to impair the service to other customers or to interfere with the proper operation of the Company's facilities. The Company may require the customer to make such changes in his equipment or use thereof, or to install such corrective equipment, as may be necessary to eliminate fluctuating or unbalanced loads; or, where the disturbances caused thereby may be eliminated more economically by changes in or additions to the Company's facilities, the Company will, at the request of the customer, provide the necessary corrective facilities at a reasonable charge. Payment will be made in full in advance for supplying special equipment installed under this Rule.
18. REDISTRIBUTION All electric energy shall be consumed by the customer to whom the Company supplies and delivers such energy, except that (1) the customer owning and operating a separate office building, and (2) any other customer who, upon showing that special circumstances exist, obtains the written consent of the Company may redistribute electric energy to tenants of such customer, but only if such tenants are not required to make a specific payment for such energy.

This Rule shall not affect any practice undertaken prior to June 1, 1965. See Rule No. 41 for special requirements for residential dwelling units in a building.

## RULES AND REGULATIONS - (Continued)

## MEASUREMENT AND USE OF SERVICE - (Continued)

18.1 ELECTRIC VEHICLE CHARGING Electricity sales by a person, corporation or other entity, not a public utility, owning and operating an electric vehicle charging facility for the sole purpose of recharging an electric vehicle battery for compensation are not construed to be sales to residential consumers and therefore do not fall under the pricing requirements of 66 Pa.C.S. § 1313. Further, for purposes of third party-owned electric vehicle charging stations, charging the electric vehicle shall not be considered redistribution as defined in Rule No. 18 Redistribution. For the purposes of this Rule No. 18.1, electric vehicles are defined as any vehicle licensed to operate on public roadways that are propelled in whole or in part by electrical energy stored on-board for the purpose of propulsion. Types of electric vehicles include, but are not limited to, plug-in hybrid electric vehicles and battery electric vehicles. Electric vehicle charging stations shall be made in accordance with the Company's "Electric Service Installation Rules," a copy of which may be found at www.duquesnelight.com. The station must be designed to protect for back flow of electricity to the Company's electrical distribution circuit as required by Company rules. The Company shall not be liable for any damages associated with operation of the charging station. For stations dedicated solely for the purpose of charging electric vehicles wherein a third party owns the charger and allows an electric vehicle owner to use their facility to charge an electric vehicle, the owner of the charging facility shall notify the Company at least one hundred twenty (120) days in advance of the planned installation date and may be required to install metering for the station as determined by the Company. The third party owner of the station shall be responsible for all applicable Tariff rates, fees and charges. For such installations, the electric vehicle owner shall be responsible for all fees imposed by the owner of the station for charging the electric vehicle.
19. CONTINUITY AND SAFETY The Company will use all reasonable care to provide safe and continuous delivery of electricity but shall not be liable for any damages arising through interruption of the delivery of electricity or for injury to persons or property resulting from the use of the electricity delivered.

## RULES AND REGULATIONS - (Continued)

## COMPANY PROPERTY ON CUSTOMER'S PREMISES - (Continued)

22.1. VEGETATION MANAGEMENT AND RIGHT-OF-WAY The customer, applicant, or property owner shall provide, without charge to the Company, right-of-way and access across property owned or controlled by customer/applicant/property owner, and locations and housings which are suitable, in the opinion of Company, for the construction, reconstruction, maintenance or operation of Company facilities that serve the customer/applicant/property owner. Suitable right-of-way includes, but is not limited to, the right of ingress and egress to and from the electric facilities for any of the purposes aforesaid; and also the right to prune, cut or remove trees, underbrush and other obstructions which, in the judgment of Company, may at any time interfere with the construction, reconstruction, maintenance or operation of the electric facilities, and in connection therewith, the right to treat with herbicides approved for the removal and control of trees, brush and undergrowth. The Company shall also have all of the aforesaid rights related to its provision of underground service to a customer/applicant/property owner, even if the Company does not require the customer/applicant/property owner to execute a formal right-ofway document. Notwithstanding the foregoing, the customer/applicant/property owner shall be responsible for vegetation management on the customer/applicant/property owner's property, as necessary, to prevent vegetation from interfering with the service line(s) on the premises. Any vegetation management within ten (10) feet of an energized electric utility line must be performed by qualified line clearance personnel.
(C)
(C)
23. CUSTOMER'S RESPONSIBILITY The customer shall protect the property of the Company on the premises and shall not permit access thereto except by authorized representatives of the Company.
24. TAMPERING Where evidence is found that the service wires, meters, switch box or other appurtenances on the customer's premises have been tampered with, the customer shall be required to bear all costs incurred by the Company for investigations and inspections, and for such protective equipment as, in the judgment of the Company, may be necessary (including the relocation of inside metering equipment to an accessible outside location); and in addition, where the tampering has resulted in improper measurement of the electricity delivered, the customer shall be required to pay for such electric delivery service, and any Company supplied electricity, including interest at the Late Payment Charge rate, as the Company may estimate, from available information to have been used but not registered by the Company's meters.

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE

25. REPAIRS OR LOSSES The customer shall pay the Company for any repairs to or any loss of the Company's property on the premises when such repairs are necessitated, or loss occasioned, by negligence on the part of the customer or failure to comply with the rules and regulations under which service is furnished.
26. ARREARS The Company upon reasonable notice may terminate electric service and remove its equipment from the premises for nonpayment of undisputed Company service charges, Company charges as the default service charges or EGS receivables purchased by the Company up to the amount that the customer would have paid under Default Service rates during the non-payment period, pursuant to Duquesne's Electric Generation Supplier Coordination Tariff Rule No. 12.1.7. When a residential customer or a residence is involved, the Company will comply with the provisions of 52 Pa. Code Chapter 56, "Standards and Billing Practices for Residential Utility Service" and 66 Pa.C.S. § 1406, "Termination of Utility Service."
26.1 COLLECTION REVIEW The Company shall review accounts for collection purposes as reasonable and appropriate. The Company may pursue all lawful means of collection of accounts as permitted by applicable law.

## RULES AND REGULATIONS - (Continued)

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE - (Continued)

### 39.2 EMERGENCY ENERGY CONSERVATION - (Continued)

When a state of emergency is declared by the Governor, or other appropriate governmental authority, and during the period of that emergency, upon notification of the customer by the Company, the customer shall take the actions required by the procedures for emergency energy conservation. During the period of that emergency the appropriate customers will be billed under the provisions of Rider No. 17 - Emergency Energy Conservation.

The Company may revise such procedures from time to time, and shall revise them if so required by the Pennsylvania Public Utility Commission. A copy of such procedures or of the revision thereof currently in effect shall be kept available for public inspection at each office at which the Company maintains a copy of its tariff for public inspection, and another such copy shall be kept on file with the Commission's Bureau of Conservation, Economics and Energy Planning.
40. RECONNECTION CHARGE Where service has been discontinued under the terms of Rules No. 26 through 36 , inclusive, the Company reserves the right as a condition precedent to the reconnection of service to require the payment of all arrearages for Company charges and payment of a deposit as described in Rule No. 5, and to require the payment of the following appropriate reconnection charge:
A. $\$ 50.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the meter.
B. $\$ 250.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the pole.
C. $\$ 250.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination when the connection is an aerial tap.
D. $\$ 89.00$ for reconnection of a transformer to the same General Service customer or applicant within a year of the service disconnection or termination.
E. $\$ 20.00$ for resumption of electric service where a remote capable meter has been installed and in which resumption of service is to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the meter.

When a residential customer or residence or residential applicant is involved, the Company will comply with the provisions of 52 Pa . Code Chapter 56, "Standards and Billing Practices for Residential Utility Service" and 66 Pa.C.S. § 1406, "Termination of Utility Service."

Where electric service has been discontinued upon the request of the customer or applicant and where the customer or applicant requests that service be reconnected at the same location within a period of one year from the date that electric service was discontinued, the Company reserves the right as a condition precedent to the reconnection of service to require the payment of all arrearages for Company charges which will consist of the minimum charge applicable to such customer's or applicant's service during the period of discontinuance.


Where electric service to a non-residential customer or applicant has been terminated under the terms of Rules No. 30 and/or 34, and such condition was the direct result of tampering, the Company reserves the right as a condition precedent to the reconnection of service to require payment of all costs incurred by the Company for investigations and inspections, and for such protective equipment deemed necessary by the Company.

## RULES AND REGULATIONS - (Continued)

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE - (Continued)

41. PROHIBITION OF RESIDENTIAL MASTER METERING Except as provided in Rule No. 41.1 herein, each residential dwelling unit in a building must be individually metered by the Company for buildings connected after January 1, 1981. For the purposes of the Rule, a dwelling unit is defined as:

One or more rooms for the use of one or more persons as a housekeeping unit with space for eating, living, and sleeping, and permanent provisions for cooking and sanitation.

This Rule does not preclude the use of a single meter for the common areas and common facilities of a multi-tenant building.

This Rule shall not affect any practice undertaken prior to January 1, 1981.
41.1 RESIDENTIAL MASTER METERING FOR NEW LOW-INCOME SUPPORTIVE HOUSING Notwithstanding anything in Rule No. 41 to the contrary, a single meter may be used for certain multi-tenant premises ("master metering"), where the premises:

1. Is a new service;
2. Is master-metered through entire premises (i.e., no individual tenant meters);
3. Has a minimum of four (4) dwelling units; and
4. Is low-income supportive housing (i.e., housing that is permanently available to low-income tenants where the housing provider is responsible for utility bills).

To be eligible to master-meter a given residential building, in addition to satisfying the other criteria herein, a provider of low-income housing must either:

1. Show that the building is a Public Housing Authority development, or
2. Certify that all tenants are (i) eligible for a Housing Choice Voucher (HCV), available to residents who make $50 \%$ or less of the median family income, or (ii) have household incomes equal to or less than $150 \%$ of federal poverty guidelines.

Customers permitted to use master metering under this Rule must also, on a continuing basis:

1. Annually certify their on-going conformance to the above criteria; and
2. Participate in each of the Company's applicable energy efficiency, conservation, and/or usage reduction programs.

The Company may retain the customer's security deposit, paid pursuant to Rule No. 5, for the entire duration of the master metering arrangement.

If a customer using master metering under this Rule fails to comply with any of the foregoing eligibility criteria or ongoing requirements, the Company may require the customer to reconfigure the customer's electrical equipment, at customer expense, to allow the Company to separately meter each dwelling unit.

RULES AND REGULATIONS - (Continued)

## GENERAL PROVISIONS

42. METER TESTING The Company will inspect or test the accuracy of a meter at the request of the customer or an EGS for whom the meter registers service, but reserves the right to require payment of the fees set forth in 52 Pa . Code § 57.22 for such test.
43. OTHER SERVICES The Company may, where possible, provide and charge a reasonable fee for services including, but not limited to, energy audits, equipment inspections, technical reports and other similar services, at the request of the customer. Where possible, the Company will give an advanced, written estimate of the cost to provide the service.

## 44. THIS RULE INTENTIALLY LEFT BLANK

45. SUPPLIER SWITCHING The Company will accommodate requests by customers to switch EGSs in accordance with 52 Pa. Code, Chapter 57, Subchapter M "Standards for Changing a Customers Electricity Generation Supplier."

Customers who elect to return to the Company from an EGS will return at the charges of the applicable rate.
In compliance with the Commission's Order at Docket No. L-2014-2409383, the Company shall preserve all records relating to unauthorized change of EGS or change to Default Service disputes for three (3) years from the date the customer filed the dispute. These records shall be made available to the Commission or its staff upon request.

Switching by customers shall occur in accordance with the direct access procedures and in accordance with the provisions contained in this Tariff and the Company's EGS Coordination Tariff.

## RATE RS - RESIDENTIAL SERVICE

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, and general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$
Energy Charge 7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

## RATE RH - RESIDENTIAL SERVICE HEATING

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise, and as the sole primary method of space heating except that the space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$

Winter Monthly Rate — For the Billing Months of November through April:
Energy Charge
6.3410 cents per kilowatt hour

Summer Monthly Rate - For the Billing Months of May through October:
Energy Charge
. 7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

## RATE RA - RESIDENTIAL SERVICE ADD-ON HEAT PUMP

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise, and an add-on heat pump for space heating. Other energy sources may be used to supplement the add-on heat pump provided that the supplemental energy source is thermostatically controlled to operate only when the outdoor temperature falls to at least $40^{\circ} \mathrm{F}$ and the add-on heat pump cannot provide the total heating requirements.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

Customer Charge ... \$16.25

Winter Monthly Rate — For the Billing Months of November through April:
Energy Charge ...................................................................................... 2.7631 cents per kilowatt hour

Summer Monthly Rate - For the Billing Months of May through October:
$\qquad$
Energy Charge
7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

## (I) - Indicates Increase

## RATE GS/GM - GENERAL SERVICE SMALL AND MEDIUM

## AVAILABILITY

Available for all the standard electric service taken on a small or medium general service customer's premises for which a residential rate is not available and where the demand is less than 300 kW .

## MONTHLY RATE FOR NON-DEMAND CUSTOMERS

## DISTRIBUTION CHARGES - RATE GS

$\qquad$
Customer Charge \$16.25

Energy Charge - All kWh
8.4241 cents per kilowatt-hour

## MONTHLY RATE FOR DEMAND CUSTOMERS

## DISTRIBUTION CHARGES - RATE GM < 25 kW

$\qquad$
Customer Charge $\$ 63.00$

Energy Charge - All kWh 1.8390 cents per kilowatt-hour
$\qquad$

- Additional kilowatts of Demand.
$\$ 7.89$ per kilowatt
$\qquad$


## DISTRIBUTION CHARGES - RATE GM $\mathbf{\geq} \mathbf{2 5} \mathbf{~ k W}$

$\qquad$
Customer Charge
$\$ 76.00$
Energy Charge - All kWh $\qquad$ 1.2661 cents per kilowatt-hour

Demand Charge - First five (5) kilowatts or less $\qquad$ No Charge

- Additional kilowatts of Demand. $\qquad$ $\$ 7.89$ per kilowatt


## MONTHLY RATE FOR NON-DEMAND AND DEMAND CUSTOMERS

## DISTRIBUTION RATE ASSIGNMENT

A new customer or a customer with limited or no historical data shall be eligible for and assigned to the applicable rate based on Duquesne Light's estimate of the customer's monthly usage and/or peak monthly demand for the next twelve (12) month period. In no instance shall a customer be eligible for more than one of Rate GS, Rate GM $<25 \mathrm{~kW}$ or Rate $\mathrm{GM} \geq 25 \mathrm{~kW}$ at a time.

## RATE GS/GM - GENERAL SERVICE SMALL AND MEDIUM - (Continued)

# MONTHLY RATE FOR NON-DEMAND AND DEMAND CUSTOMERS - (Continued) 

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity at the above Distribution and Supply Charges and the Transmission Service Charges in Appendix A.
Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

The Minimum Charge shall be the sum of the Customer Distribution Charge plus a Demand Charge based on 30\% of the highest Billing Demand during the preceding eleven months plus the current billing period charges for Company supplied transmission and supply service, if any. The Demand Charge shall be determined using the Distribution Charge only, but shall not be less than the Customer Distribution Charge.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## RATE GMH - GENERAL SERVICE MEDIUM HEATING

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises for which a residential rate is not available, where the Company's service is the sole method of space heating, and where the heat loss of the customer's premises is calculated in accordance with the ASHRAE* Handbook of Fundamentals, and where such calculated heat loss converted into kilowatt-hour consumption during the heating season is determined by the Company to be at least $25 \%$ of the customer's entire electric energy requirements during the heating season. The space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.
*American Society of Heating, Refrigerating and Air Conditioning Engineers

## MONTHLY RATE

## WINTER MONTHLY RATE - FOR THE BILLING MONTHS OF OCTOBER THROUGH MAY

## DISTRIBUTION CHARGES

$\qquad$
Customer Charge $\$ 63.00$

Energy Charge - All kWh $\qquad$ 3.8382 cents per kilowatt-hour

## SUMMER MONTHLY RATE - FOR THE BILLING MONTHS OF JUNE THROUGH SEPTEMBER

## DISTRIBUTION CHARGES

$\qquad$
Customer Charge $\$ 63.00$

Energy Charge - All kWh $\qquad$ 1.8390 cents per kilowatt-hour
Demand Charge — First five (5) kilowatts or less ................................................................No Charge

- Additional kilowatts of Demand. $\qquad$ \$7.89 per kilowatt


## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply or Rider No. 9 - Day-Ahead Hourly Price Service, as applicable, and will be billed in accordance with the terms contained therein.

Rider No. 8 - Default Service Supply - Applicable to customers with monthly demand less than 25 kW and customers with monthly demand greater than or equal to 25 kW but less than 200 kW , on average, who elect to purchase their electric supply requirements from the Company. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Supply Charges will be updated through competitive requests for proposal and will be effective for the periods as defined and described in Rider No. 8.

# RATE GMH - GENERAL SERVICE MEDIUM HEATING - (Continued) 

MONTHLY RATE - (Continued)

## SUPPLY CHARGES - (Continued)

Rider No. 9 - Day-Ahead Hourly Price Service - Customers with monthly demand of 200 kW , on average, or greater and elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 9 and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

For purposes of determining the monthly rate for demand customers, Duquesne Light shall evaluate the customer's twelve (12) most recent months of monthly billing demand for that customer available in October of the preceding year. If the customer's average monthly billing demand is less than 25 kW in the twelve (12) months, then that customer shall be charged the monthly rate for demand customers less than 25 kW for the next calendar year and automatically assigned to that rate effective with their January billing. If the customer's average monthly demand is 25 kW or greater in the twelve (12) month period, then that customer shall be charged the monthly rate for demand customers equal to or greater than 25 kW for the next calendar year and automatically assigned to that rate as their default service rate effective with their January billing. In no instance shall a customer be eligible for more than one default service offering at a time. A new customer or a customer with limited or no historical data shall be eligible for and assigned to the applicable rate based on Duquesne Light's estimate of the customer's average monthly billing demand for the next twelve (12) month period.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity at the above Distribution and Supply Charges and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

For the months of October through May, the Minimum Charge shall be the Customer Distribution Charge for the first kilowatt, plus a Distribution Charge of $\$ 7.89$ per kW, plus the current billing period charges for Company supplied transmission and supply service, if any. The Minimum Charge shall not be less than the Customer Distribution Charge. For the months of June through September, the Minimum Charge shall be calculated in accordance with the Minimum Charge provisions in Rate GS/GM.

## RATE GL - GENERAL SERVICE LARGE

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises where the demand is greater than or equal to 300 kilowatts ( $\geq 300 \mathrm{~kW}$ ) and less than 5,000 kilowatts ( $<5,000 \mathrm{~kW}$ ).

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## DEMAND CHARGES

First 300 kilowatts or less of Demand
\$3,675.00
Additional kilowatts of Demand
\$10.66 per kW

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE GLH - GENERAL SERVICE LARGE HEATING

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises for which a residential rate is not available, where the Company's service is the sole method of space heating, and where the heat loss of the customer's premises is calculated in accordance with the ASHRAE* Handbook of Fundamentals, and where such calculated heat loss converted into kilowatt-hour consumption during the heating season is determined by the Company to be at least $25 \%$ of the customer's entire electric energy requirements during the heating season. The space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.
*American Society of Heating, Refrigerating and Air Conditioning Engineers

## MONTHLY RATE

## DISTRIBUTION

For the Billing Months of October through May:

## CUSTOMER CHARGE

Customer Distribution Charge................................................................................................ \$77.50

## ENERGY CHARGES

All kilowatt-hours
3.0162 cents per kWh

## DISTRIBUTION

For the Billing Months of June through September:

Rate GL shall apply.

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

# RATE GLH - GENERAL SERVICE LARGE HEATING - (Continued) 

MONTHLY RATE - (Continued)

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

For the months of October through May, the Minimum Charge shall be the Customer Distribution Charge for the first kilowatt plus a Distribution Charge of $\$ 10.66$ per kW and the charges for Company supplied transmission and supply, if any. For Company supplied transmission and supply, the transmission charges shall be calculated as set forth in Appendix A and the supply charges shall be calculated as set forth under Rider No. 9. The Minimum Charge shall not be less than the Customer Distribution Charge. For the months of June through September, the Minimum Charge shall be calculated in accordance with the Minimum Charge provisions contained in Rate GL.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## RATE L - LARGE POWER SERVICE

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises where the Contract Demand is not less than 5,000 kilowatts.

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## DEMAND CHARGES

Service Voltage Less than 138 kV :
First 5,000 kilowatts or less of Demand
$\$ 41,800.00$
Additional kilowatts of Demand

$$
\$ 16.63 \text { per kW }
$$

## ELECTRIC CHARGES

The Company will provide and charge for Transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE L - LARGE POWER SERVICE - (Continued)

MONTHLY RATE - (Continued)

## UNTRANSFORMED SERVICE CREDIT

Where the customer furnishes all necessary equipment to take untransformed service at 11,500 volts or higher, in strict accordance with the Company's standards and specifications, a credit of $\$ 0.75$ per kW based upon the individual demand of the untransformed circuit shall be applied to the customer's account.

## MINIMUM CHARGE

The Minimum Charge shall be the sum of a Demand Charge based on $70 \%$ of the Contract On-Peak Demand for distribution plus the charges for Company supplied transmission and supply, if any. The Demand Charge shall be determined using the Distribution Charge, and, in total, shall not be less than the demand charges associated with the first $5,000 \mathrm{kWs}$ or less of demand. For Company supplied transmission and supply, the transmission charges shall be calculated as set forth in Appendix A - Transmission Service Charges and the supply charges shall be calculated as set forth under Rider No. 9 - Day-Ahead Hourly Price Service.
(C)

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the average kilowatts during the fifteen-minute period of greatest kilowatt-hour use during the billing period. Individual demands which exceed 30 kilowatts will be adjusted for power factor by multiplying by

$$
\left\{0.8+\left[0.6 \frac{\text { Reactive Kilovolt - ampere hours }}{\text { Kilowatt - hours }}\right]\right\},
$$

where such multiplier will be not less than 1.00 nor more than 2.00 . The Billing Demand will be the sum of the individual demands of each metered service adjusted for power factor as defined above, but not less than 70\% of the Contract On-Peak Demand nor less than 5,000 kilowatts, whichever is the greater.

## STANDARD CONTRACT RIDERS

For modifications of the above rate under special conditions, see "Standard Contract Riders".

## RATE HVPS - HIGH VOLTAGE POWER SERVICE

## AVAILABILITY

Available to customers with Contract On-Peak Demands greater than or equal to 5,000 kilowatts ( $\geq 5,000 \mathrm{~kW}$ ) where service is supplied at 69,000 volts or higher.

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## FIXED MONTHLY CHARGE

$$
\begin{array}{ll}
\text { Up to and Including } 50,000 \mathrm{~kW} \text { Billing Demand } & \$ 2,503.20 \\
50,001 \mathrm{~kW} \text { to } 100,000 \mathrm{~kW} \text { Billing Demand } & \$ 3,910.17 \\
\text { Greater than } 100,000 \mathrm{~kW} \text { Billing Demand } & \$ 5,545.24
\end{array}
$$

## ELECTRIC CHARGES

The Company will provide and charge for Transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE HVPS - HIGH VOLTAGE POWER SERVICE - (Continued)

MONTHLY RATE - (Continued)

## MINIMUM CHARGE

The Minimum Charge shall be the customer's Fixed Distribution Monthly Charge. For Company supplied transmission and supply, the transmission charges shall be calculated as set forth in Appendix A - Transmission Service Charges and the supply charges shall be calculated as set forth under Rider No. 9 - Day-Ahead Hourly Price Service.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the average kilowatts during the fifteen-minute period of greatest kilowatt-hour use during the billing period. Individual demands will be adjusted for power factor by multiplying by

$$
\left\{0.8+\left[0.6 \frac{\text { Reactive Kilovolt - ampere hours }}{\text { Kilow att - hours }}\right]\right\},
$$

where such multiplier will be not less than 1.00 nor more than 2.00 . The Billing Demand will be the sum of the individual demands of each metered service adjusted for power factor as defined above, but not less than $70 \%$ of the Contract On-Peak Demand, nor less than $331 / 3 \%$ of the Contract Off-Peak Demand nor less than 5,000 kilowatts, whichever is the greater.

## ON-PEAK AND OFF-PEAK CONTRACT DEMAND

The Contract On-Peak Demand is the maximum electrical capacity in kilowatts that the Company shall be required by the contract to deliver during the On-Peak hours to the customer.

## RATE AL - ARCHITECTURAL LIGHTING SERVICE

## AVAILABILITY

Beginning January 15, 2022, Rate AL will no longer be available to new customers or applicants, or to new installations for existing customers.

Available for separately metered circuitry connected solely to outdoor architectural lighting equipment, with demand of 5 kilowatts or greater, to be operated during non-peak periods.

## MONTHLY RATE

## DISTRIBUTION CHARGES


#### Abstract

Customer Charge ........................................................................................................................ $\$ 8.00$ Demand Charge $\$ 1.83$ per kilowatt Energy Charge 0.2396 cents per kilowatt hour


## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate AL - Architectural Lighting Service customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate AL customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE SE - STREET LIGHTING ENERGY

## AVAILABILITY

Available for the entire electric energy requirements of municipal street lighting systems where the municipality has not less than 15,000 street lamp installations and provides for the ownership, operation, and maintenance of its own street lamp installations and takes its entire energy requirements for street lighting under this rate.

## MONTHLY RATE

## DISTRIBUTION CHARGE

Monthly charge per lamp $\$ 3.23$

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate SE - Street Lighting Energy customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate SE customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charge, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

# RATE SE - STREET LIGHTING ENERGY - (Continued) 

MONTHLY RATE - (Continued)

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before thirty days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## SPECIAL PROVISIONS

1. Ballasts for multiple mercury vapor street lights, when installed by the customer, shall be power factor corrected, having a power factor of not less than 90 percent. For ballasts not so corrected, the wattage of each lamp plus ballasts shall be increased by the following ratio: $90 \%$ divided by the actual power factor, expressed in percent, of the lamp plus the ballast.
2. Series street lighting circuits will be energized and de-energized in accordance with an agreed upon schedule of burning hours, except where such circuits are controlled by photo electric cells. During other hours, circuits will not be energized except upon sufficient notice to the customer.
3. On all poles, except ornamental poles used exclusively for street lighting purposes, the Company will terminate its facilities at the bracket to which the lighting fixture is attached. On ornamental poles, used exclusively for street lighting purposes, the Company will terminate its facilities at the top of the pole if served from overhead circuits or at the bottom of the pole if served from the underground system.
4. The Company, to protect continuity of service, the general public, and the safety of workers engaged in work on poles, reserves the right to install insulating transformers between the Company's circuit and the wiring of the customer's installation. Where insulating transformers are installed, charges will be made therefore as herein before specified.
5. The customer upon request shall supply the Company periodically, but not more often than at six month intervals, with certified tests made by the Electrical Testing Laboratories, Inc. of New York, or a similar accredited organization, showing the mean life input in watts for each size and type of lamp, and the wattage and power factor for each size and type of mercury vapor ballast used by the customer in street lamp installations served under this rate.
6. Energy will normally be supplied under this rate by overhead circuits, but if the Company is required to supply or the customer requests delivery service from underground facilities, the specified unit charges for underground facilities will apply.
7. All installations, on and after July 1, 1969, of standard junction boxes used for street lighting service and of conduit and multiple service cable used exclusively for street lighting service will be installed, owned and maintained by the customer.

## TERM OF CONTRACT

Contracts under this rate shall be for a term of not less than ten years.

## RATE SM - STREET LIGHTING MUNICIPAL

## AVAILABILITY

Available for mercury vapor, high pressure sodium and light-emitting diode (LED) lighting of public streets, highways, bridges, parks and similar public places, for normal dusk to dawn operation of approximately 4,200 hours per year.

Beginning January 15, 2022, only LED lighting options will be installed. Replacement of mercury vapor or high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available.

Beginning January 15, 2022, the Company may replace existing high pressure sodium lights with LED lights, and place the customer on the corresponding rate schedule, at the Company's discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

| Minimum | Nominal kWh <br> Energy Usage | Company Owned and <br> Maintained Equipment | Customer Owned and <br> Maintained Equipment |
| :---: | :---: | :---: | :---: |
| Nominal Lamp Wattage | per Unit per Month | per Unit | Distribution Charge |
| per Unit |  |  |  |

Mercury Vapor

| Vapor |  |  |  |
| :---: | :---: | :---: | :---: |
| 100 | 44 | $\$ 14.19$ | $\$ 3.03$ |
| 175 | 74 | $\$ 14.48$ | $\$ 3.03$ |
| 250 | 102 | $\$ 14.76$ | $\$ 3.03$ |
| 400 | 161 | $\$ 15.36$ | $\$ 3.03$ |
| 1,000 | 386 | $\$ 17.66$ | $\$ 3.03$ |

Sodium Vapor

| apor |  |  |  | (I)(I) |
| :---: | :---: | :---: | :---: | :---: |
| 70 | 29 | $\$ 14.66$ | (I) (I) |  |
| 100 | 50 | $\$ 14.77$ | $\$ 3.03$ | (I)(I) |
| 150 | 71 | $\$ 14.99$ | (I)(I) |  |
| 250 | 110 | $\$ 15.38$ | (I)(I) |  |
| 400 | 170 | $\$ 18.39$ | $\$ 3.03$ | (I)(I) |
| 1,000 | 387 | $\$ 3.03$ |  |  |

## RATE SM - STREET LIGHTING MUNICIPAL - (Continued)

## MONTHLY RATE - (Continued)

## DISTRIBUTION CHARGE - Monthly Rate Per Unit - (Continued)

| Minimum Nominal Lamp Wattage | Nominal kWh Energy Usage per Unit per Month | Company Owned and Maintained Equipment <br> Distribution Charge per Unit | Customer Owned and Maintained Equipment <br> Distribution Charge per Unit |  |
| :---: | :---: | :---: | :---: | :---: |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |
| 30 | 11 | \$12.91 | \$3.03 | (C) |
| 45 | 16 | \$12.91 | \$3.03 | (D)(I) |
| 60 | 21 | \$13.33 | \$3.03 | (D)(I) |
| 95 | 34 | \$14.71 | \$3.03 | (I)(I) |
| 139 | 49 | \$15.37 | \$3.03 | (I)(I) |
| 219 | 77 | \$15.65 | \$3.03 | $\begin{aligned} & \text { (D)(I) } \\ & \text { (C) } \end{aligned}$ |
| Light-Emitting Diode (LED) - Colonial |  |  |  |  |
| 20 | 7 | \$16.89 | \$3.03 | (C) |
| 45 | 16 | \$17.23 | \$3.03 | (C) |
| Light-Emitting Diode (LED) - Contemporary |  |  |  |  |
| 40 | 14 | \$15.59 | \$3.03 | (C) |
| 55 | 20 | \$15.59 | \$3.03 | (C) |

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate SM - Street Lighting Municipal customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate SM customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

## RATE SM - STREET LIGHTING MUNICIPAL - (Continued)

## MONTHLY RATE - (Continued)

## ELECTRIC CHARGES - (Continued)

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charge, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before thirty days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## POLES

No charge is made for wood poles used jointly for street lighting and the support of the Company's general distribution system or for tubular steel poles, trolley type, used jointly for street lighting and the support of trolley span wires.

Where the installation of one (1) or more wood poles is required to serve the customer, the customer has the option to install the pole(s) at its own expense in accordance with SPECIAL TERM AND CONDITION NO. 2 or the Company will install, own and maintain the pole(s) and bill the customer at the monthly rate of $\$ 11.54$ for each pole required.

## CUSTOMER OWNED AND MAINTAINED EQUIPMENT CHARGE

A per unit monthly charge whenever the customer or an agent of the customer owns the entire street lighting system, including, but not limited to, the fixture, pole, circuit, controls, and all other related equipment on the load side of the Company's service point or when such facility is provided by a public agency and the customer and/or agent is obligated to operate and maintain such facility.

The street lighting system equipment must be approved by and installed in a manner acceptable to the Company and must be equipped with photocells or other such equipment that permit only dusk-to-dawn operation.

## RATE SH - STREET LIGHTING HIGHWAY

## AVAILABILITY

Beginning January 15, 2022, Rate SH will no longer be available to new customers or applicants, or to new installations for existing customers.

Available for high intensity discharge lighting of state highways for normal dusk to dawn operation of approximately 4,200 hours per year where the highway lighting system acceptable to Duquesne Light Company is installed by the State and ownership of the entire highway lighting system has been transferred to the Company for a nominal consideration.

Beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options listed below.

Due to the limited availability of high pressure sodium lighting, the Company will be replacing existing high pressure sodium lights with LED lights at its discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

| Minimum Nominal Lamp Wattage | Nominal kWh Energy Usage per Unit per Month | Company Owned and Maintained Equipment <br> Distribution Charge per Unit | Customer Owned and Maintained Equipment <br> Distribution Charge per Unit |  |
| :---: | :---: | :---: | :---: | :---: |
| Sodium Vapor |  |  |  |  |
| 100 | 50 | \$14.02 | \$3.03 | (I)(I) |
| 150 | 71 | \$14.22 | \$3.03 | (I)(1) |
| 200 | 95 | \$14.42 | \$3.03 | (I)(I) |
| 400 | 170 | \$15.99 | \$3.03 | (I)(1) |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |
| 30 | 11 | \$12.91 | \$3.03 | (C) |
| 45 | 16 | \$12.91 | \$3.03 | (C) |
| 60 | 21 | \$15.12 | \$3.03 | (I)(1) |
| 95 | 34 | \$15.65 | \$3.03 | (I)(1) |
| 139 | 49 | \$16.87 | \$3.03 | (I)(1) |
| 219 | 77 | \$19.62 | \$3.03 | (I)(1) |

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## RATE UMS - UNMETERED SERVICE

## AVAILABILITY

Available to customers using unmetered standard service at each point of connection for customer-owned and maintained equipment such as traffic signals, communication devices and billboard lighting.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$
Energy Charge
2.7761 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate UMS - Unmetered Service customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate UMS customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE PAL - PRIVATE AREA LIGHTING

## AVAILABILITY

Available for high pressure sodium lighting and flood lighting of residential, commercial and industrial private property installations including parking lots, for normal dusk to dawn operation of approximately 4,200 hours per year.

Beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options listed below.

Due to the limited availability of high pressure sodium lighting, the Company will be replacing existing high pressure sodium lights with LED lights at its discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

\section*{Company Owned and Customer Owned and Maintained Equipment Maintained Equipment <br> | Distribution Charge | Distribution Charge |
| :---: | :---: |
| per Unit | per Unit |}


| $\$ 14.66$ | $\$ 3.03$ | (I)(I) |
| :--- | :--- | :--- |
| $\$ 14.77$ | $\$ 3.03$ | (I)(I) |
| $\$ 14.99$ | $\$ 3.03$ | (I)(I) |
| $\$ 15.38$ | $\$ 3.03$ | (I)(I) |
| $\$ 15.99$ | $\$ 3.03$ | (I)(I) |

Flood Lighting

| 100 | 46 |
| :--- | :--- |
| 250 | 100 |

$400 \quad 155$

Light-Emitting Diode (LED) — Cobra Head

| 30 | 11 |
| :--- | ---: |
| 45 | 16 |
| 60 | 21 |
| 95 | 34 |
| 139 | 49 |
| 219 | 77 |
|  |  |
|  |  |
| ing Diode (LED) - Colonial |  |

$20 \quad 7$
$45 \quad 16$
\$16.89
\$17.23
$\$ 3.03$
\$3.03
$\begin{array}{ll}\$ 15.59 & \$ 3.03 \\ \$ 15.59 & \$ 3.03\end{array}$
(C)
(D)(I)
(D)(I)
(I)(I)
(I)(I)
(D)(I)
(C)
(C)
(C)
(C)
(C)

## RATE PAL - PRIVATE AREA LIGHTING - (Continued)

MONTHLY RATE - (Continued)

## POLES - (Continued)

Where the installation of one (1) or more wood poles is required to serve the customer, the customer has the option to install the pole(s) at its own expense in accordance with SPECIAL TERM AND CONDITION NO. 2 or the Company will install, own and maintain the pole(s) and bill the customer at the monthly rate of $\$ 11.54$ for each pole required.

## CUSTOMER OWNED AND MAINTAINED EQUIPMENT CHARGE

A per unit monthly charge whenever the customer or an agent of the customer owns the entire street lighting system, including, but not limited to, the fixture, pole, circuit, controls, and all other related equipment on the load side of the Company's service point or when such facility is provided by a public agency and the customer and/or agent is obligated to operate and maintain such facility.

The street lighting system equipment must be approved by and installed in a manner acceptable to the Company and must be equipped with photocells or other such equipment that permit only dusk-to-dawn operation.

The customer/agent must provide the Company with a written inventory of all street lighting fixtures. This inventory shall include the location, type and wattage rating for each fixture. The customer/agent will update its inventory of lighting fixtures by informing the Company in writing of changes in type, rating, location, and quantity of lighting fixtures as such changes occur and billings will be adjusted accordingly.

The Company reserves the right to inspect the equipment at each location and make prospective adjustments in billing as indicated by such inspections. The Company shall be under no obligation to conduct such inspections for the purpose of determining accuracy of billing or otherwise. The Company's decision not to conduct such inspections shall not release the customer/agent from the obligation to provide to the Company, and to update, an accurate inventory of the types, ratings, and quantities of lighting equipment upon which billing is based.

As this service is a per unit monthly charge, the customer/agent agrees to pay amounts billed in accordance with the current inventory, regardless of whether any of the equipment was electrically operable during the period in question and regardless of the cause of any such equipment's failure to operate.

The contract period is as covered by any existing contract now in effect with the customer/agent. All new contracts shall be for a period of one year.

## SPECIAL TERMS AND CONDITIONS

1. The above charges include installation of standard Company facilities including lamps, fixtures or luminaries, brackets and ballasts, all when installed on the overhead distribution system. The above charges include normal operation and maintenance. Normal operation and maintenance does not include periodic tree trimming around the fixture or luminaire.
2. Where it is necessary to install wood, metal, or ornamental poles, or other special facilities or services not in conformance with the Company's standard overhead practice, the additional cost shall be borne by the customer. Title to all facilities, except as noted below, shall vest in the Company.

## STANDARD CONTRACT RIDERS - (Continued)

RIDER MATRIX

|  | RS | RH | RA | GS/GM | GMH | GL | GLH | L | HVPS | AL | SE | SM | SH | UMS | PAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Rider No. 1 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 2 |  |  |  | X | X | X | X |  |  |  |  |  |  |  |  |
| Rider No. 3 |  |  |  | X | X | X | X | X |  |  |  |  |  |  |  |
| Rider No. 4 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 5 | X | X | X |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 6 |  |  |  | X |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 7 | X |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 8 | X | X | X | X | X |  |  |  |  | X | X | X | X | X | X |
| Rider No. 9 |  |  |  | X | X | X | X | X | X |  |  |  |  |  |  |
| Rider No. 10 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 11 |  |  |  | X |  | X |  |  |  |  |  |  |  |  |  |
| Rider No. 12 |  |  |  | X | X |  |  |  |  |  |  |  |  |  |  |
| Rider No. 13 |  |  |  | X |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 14 | X |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 15 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 15A | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 16 |  |  |  | X | X | X | X | X |  |  |  |  |  |  |  |
| Rider No. 17 |  |  |  |  |  | X | X | X | X |  |  |  |  |  |  |
| Rider No. 18 | X | X | X | X | X | X | X |  |  |  |  |  |  |  |  |
| Rider No. 19 |  |  |  | X |  | X |  | X |  |  |  |  |  |  |  |

## Rider Titles:

Rider No. 1 - Retail Market Enhancement Surcharge
Rider No. 2 - Untransformed Service
Rider No. 3 - School and Government Service Discount Period
Rider No. 4 - Federal Tax Adjustment Clause
Rider No. 5 - Universal Service Charge
Rider No. 6 - Temporary Service
Rider No. 7 - Residential Subscription Service Pilot
Rider No. 8 - Default Service Supply
Rider No. 9 - Day-Ahead Hourly Price Service
Rider No. 10 - State Tax Adjustment
Rider No. 11 - Street Railway Service
Rider No. 12 - Billing Option - Volunteer Fire Companies and Nonprofit Senior Citizen Centers
Rider No. 13 - General Service Separately Metered Electric Space Heating Service
Rider No. 14 - Residential Service Separately Metered Electric Space and Water Heating
Rider No. 15 - Intentionally Left Blank
Rider No. 15A - Phase IV Energy Efficiency and Conservation Surcharge
Rider No. 16 - Service to Non-Utility Generating Facilities
Rider No. 17 - Emergency Energy Conservation
Rider No. 18 - Rates for Purchase of Electric Energy from Customer-Owned Renewable Resources Generating Facilities
Rider No. 19 - Community Development for New Load

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER MATRIX - (Continued)

|  | RS | RH | RA | GS/GM | GMH | GL | GLH | L | HVPS | AL | SE | SM | SH | UMS | PAL |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Rider No. 20 | X | X | X | X | X | X | X | X | X | X |  |  |  |  |  |
| Rider No. 21 | X | X | X | X | X | X |  |  |  |  |  |  |  |  |  |
| Rider No. 22 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 23 | X | X | X |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 24 |  |  |  | X | X | X | X | X |  |  |  |  |  |  |  |
| Rider No. 25 |  |  |  | X | X |  |  |  |  |  |  |  |  |  |  |
| Rider No. 26 |  |  |  | X | X |  |  |  |  |  |  |  |  |  |  |
| Appendix A | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |

(C)

Rider Titles:
Rider No. 20 - Smart Meter Charge
Rider No. 21 - Net Metering Service
Rider No. 22 - Distribution System Improvement Charge ("DSIC")
Rider No. 23 - Home Charging Pilot Program
Rider No. 24 - Fleet Charging Pilot Program
Rider No. 25 - New Business Stimulus
Rider No. 26 - Crisis Recovery Program
Appendix A - Transmission Service Charges

## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE

## (Applicable to all Rates)

The Federal Tax Adjustment Clause ("FTAC") is instituted as a mechanism to adjust for changes in the federal corporate income tax rate that are not reflected in the Company's most recent general base rate proceeding. The FTAC is applicable to all base distribution rates under this Tariff. The amount of the adjustment will be determined as provided below.
A. Determination of the Change in Recoverable Federal Income Taxes Resulting from Increases or Decreases in the Federal Corporate Income Tax Rate ("FITA").

1. FITA shall include the effect of the increase or decrease in the federal corporate income tax rate on:
a. the provision in rates for recovery of current federal income taxes;
b. the provision in rates for recovery of deferred federal income taxes; and
c. any provision in rates for adjustment of previously deferred federal income taxes recorded at a different federal income tax rate.
2. The increases/decreases in annual revenues under this Rider will be calculated based on either the federal tax amounts associated with distribution utility investments, revenues and expenses allowed in the Company's most recent general base rate proceeding if fully determined in a Final Order, if available, or on the federal tax amounts associated with distribution utility investments, revenues and expenses incurred by the Company in the calendar year preceding the effective date of the tax rate change. If any base distribution rate revenue increase is granted during such calendar year or thereafter, the actual federal tax amounts will be adjusted to reflect the annualized increase in federal corporate income taxes resulting from the allowed increase in base distribution rate revenues.
B. Allocation of Increased/ Decreased Revenues to Rate Classes
3. The required increase/decrease in revenues to reflect the change in the federal corporate income tax rate calculated pursuant to this Rider shall be applied by equal percentage to all base distribution rates.
C. Calculation and Filing of Adjusted Rates For Changes in the Federal Corporate Income Tax Rate
4. To calculate the FTAC, the required increase/decrease in revenues will be divided by the Company's projected annual revenue for base distribution service for the period during which the charge will be collected, exclusive of State Tax Adjustment Surcharge (STAS) and automatic adjustment clause revenues.
5. The surcharge will be expressed as a percentage carried to two decimal places and will be applied to the total base distribution charges that are billed to each customer for distribution service.
6. The surcharge will be filed to become effective on ten (10) days' notice as soon as practicable following the effective date of the federal corporate income tax change, including appropriate supporting data demonstrating the calculation of the revenue adjustment and determination of the surcharge.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE - (Continued)

## (Applicable to all Rates)

C. Calculation and Filing of Adjusted Rates For Changes in the Federal Corporate Income Tax Rate (Continued)
4. After the initial filing, the FTAC surcharge shall be filed with the Commission by April 1 of each year that it is in place.
5. The FTAC shall be applied on a bills rendered basis.
D. Formula

The computation of the FTAC is as follows:

$$
\begin{aligned}
& \left.\left.\left.\mathrm{FTAC}=\frac{(((\mathrm{FITA}}{}{ }^{*} \mathrm{GRCF}\right)+\mathrm{e}\right)^{*} \mathrm{GRT}\right) \\
& \mathrm{GRCF}=\left(1 /\left((1-\mathrm{SIT})^{*}(1-\mathrm{FIT})\right)\right) \\
& \mathrm{GRT}=1 /(1-\mathrm{T})
\end{aligned}
$$

## Where:

FITA = Reflects the federal income tax adjustment, if any, as defined in Part A of this Rider and may be a positive or negative value.

GRCF = Gross Revenue Conversion Factor.
SIT = State Income Tax rate in effect at the time of the filing.
FIT $=$ Federal income tax rate in effect at the time of the filing.
$\mathrm{T}=$ Pennsylvania gross receipts tax rate in effect during the billing month.
$\mathrm{e}=$ Amount calculated (+/-) under the annual reconciliation feature or Commission audit.
PAR = Projected annual revenues for base distribution service (excluding all applicable clauses and riders) from existing customers plus netted revenue from any customers which will be acquired or lost by the beginning of the applicable service period.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE - (Continued) 

## (Applicable to all Rates)

## E. Reconciliation

1. The surcharge shall be reconciled on an annual basis to provide for over/under-recoveries of the revised revenues to be recovered. The revenue received under the FTAC for the reconciliation period will be compared to the Company's required increase/decrease in revenues as defined in Part A. The difference will be recouped or refunded, as appropriate, over a one-year period commencing on April 1 of each year. The surcharge will be reconciled at the end of each calendar year and will remain in place until the Company files and the Commission approves new base distribution rates for the Company pursuant to Section 1308(d).
2. Under- or over-recoveries of the required revenue changes to reflect a delay in implementation of the surcharge following the effective date of the federal corporate income tax rate, including the effect of implementation of a federal corporate income tax rate change on a retroactive basis, will be reconciled in the first annual reconciliation filing.
3. Upon determination that the surcharge, if left unchanged, would result in a material over- or undercollection, the Company may file with the Commission, on at least ten (10) days' notice, for an interim revision of the FTAC.
4. Interest will not be applied to reconciled amounts.
5. The FTAC will not be included in the calculation of the Distribution System Improvement Charge ("DSIC").

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 5 - UNIVERSAL SERVICE CHARGE - (Continued) 

(Applicable to Rate Schedules RS, RH and RA)

## CALCULATION OF CHARGE - (Continued)

- Customer Assistance Program ("CAP"): CAP costs will be calculated to include the projected CAP discount and CAP program costs for the Computational Year. The total CAP discount will be based on the annual average discount from the previous year, the Reconciliation Year, multiplied by the projected average number of CAP program participants during the Computational Year. The projected customer additions to the CAP program during the Computational Year will be based on the number of CAP customers receiving a discount at the end of the Reconciliation Year plus a projection of the average monthly number of CAP customers during the Computational Year. The projected number of CAP customers will include net additions to the program (additions minus exits), and a projection of customers enrolled through expected changes in policy (e.g. changes in the definition of poverty, changes in regulatory mandates). The projected CAP program costs will include the estimated costs for new applications, maintenance and annual recertification, and the projected CAP pre-program arrearages to be forgiven and written off during the USC Computational Year.
- Smart Comfort Program [Low Income Usage Reduction Program ("LIURP")]: LIURP costs will be calculated based on the projected number of homes that participate in the usage reduction program and the average cost per visit.
- Customer Assistance and Referral Evaluation Services ("CARES"): CARES costs will be calculated based on the projected annual Community Based Organization ("CBO") program costs and CBO costs for administering the program.
- Hardship Fund: Hardship Fund costs will be calculated based on the projected annual program costs and CBO costs for administering the program.
- Any other replacement or Commission-mandated Universal Service Program or low income program that is implemented during the Reconciliation or Computational Year.
$\mathrm{Cr}=\quad \mathrm{A}$ credit to reduce CAP customer discounts included in the USC to the extent that the monthly CAP enrollment level exceeds 35,853 customers. Specifically, the recoverable CAP discounts will be reduced by the number of CAP participants in excess of 35,853 times the average CAP credit and arrearage forgiveness costs times $10.43 \%$. The participation level above which the offset shall be applied will be reset in each distribution rate case.
$\mathrm{E}=\quad$ The over- or under- collection of actual Universal Service Program costs and revenue that result from the billing of the USC during the USC Reconciliation Year (an over-collection is denoted by a positive E and an under-collection by a negative E ), including applicable interest. Interest shall be computed monthly at the statutory legal rate of interest, from the month the over or under collection occurs to the effective month that the over collection is refunded or the under collection is recouped.

STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 7 - RESIDENTIAL SUBSCRIPTION SERVICE PILOT 

## (Applicable to Rate Schedule RS)


#### Abstract

AVAILABILITY

Available to customers served under Rate RS - Residential Service who are not enrolled in the Customer Assistance Program (CAP) and are not billed under Rider No. 21 (Net Energy Metering). Enrollment in the Residential Subscription Service Pilot ("Pilot") provided under this Rider will be limited to 2,000 customers who request enrollment during the period January 15, 2022, through December 31, 2022. The Company may decline to enroll a customer at its sole discretion.

This Rider applies only to base distribution services. All other applicable charges and Riders will be charged as designed.


## DEFINITIONS

Subscription Unit. Incremental size of subscription that is equal to 1 kW .
Subscribed Units. Total number of Subscription Units chosen by customer. (For example, a customer who wants to cover 5 kW of demand will choose 5 Subscription Units.)

Subscription Level. Total demand (kW) of subscription based on the Subscribed Units chosen by customer times the Subscription Unit, plus 1 kW minimum subscription included in the Customer Charge.

Overage Bandwidth. Amount by which customer can exceed their Subscription Level without incurring Overage Fees. This is set to one-half of one Subscription Unit, or 0.5 kW .

Overage Amount. The positive amount of customer's monthly maximum billed demand less Subscription Level less Overage Bandwidth.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$
Customer Charge \$28.48

Subscription Unit Charge $\$ 12.23$ per unit

# RIDER NO. 7 - RESIDENTIAL SUBSCRIPTION SERVICE PILOT - (Continued) 

## (Applicable to Rate RS)

## SUBSCRIPTION SERVICE LEVEL

Upon enrollment in the Pilot, customers shall select the number of Subscription Units the customer will purchase every month to cover their electric distribution needs. The Company will provide the customer with information regarding their previous peak energy use in the past year to aid the customer in selecting the appropriate Subscription Service Level. The customer's Distribution Charges will then be computed as the Customer Charge, plus the Subscribed Units multiplied by the Subscription Unit Charge, plus any applicable Overage Amount or other charges.

Where a customer's demand exceeds their Subscription Level plus the Overage Bandwidth, the customer shall pay an overage fee equal to the Overage Amount multiplied by two times the Subscription Unit Charge. If a customer has an Overage Amount more than three times during the previous six billing periods, or the customer's Overage Amount exceeds 3 kW , the customer's Subscribed Units will automatically be reset to the customer's maximum demand from the past six months rounded up to the nearest 1 kW .

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the sixty-minute period of greatest kilowatt-hour use during the billing period.

## SPECIAL PROVISIONS

## CUSTOMER ENROLLMENT

A customer may exit the Pilot and this Rider at any time for any reason. A customer who exits the Pilot will be removed from this Rider effective with the billing cycle that commences three (3) business days after the date the customer notified the Company of their election to leave the Pilot.

## BILL PROTECTION

A customer who exits the Pilot may request a refund for the positive difference between their billed distribution charges under this Rider and the amount of such charges if billed under Rate Schedule RS for up to three months prior to exiting, but no longer than the customer's actual enrollment in the program. The Company will provide such refund within 60 days of customer request.

## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued)
(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL)
DEFAULT SERVICE SUPPLY RATE - (Continued)
Lighting
(Rate Schedules SM, SH and PAL)
Lamp wattage as available on applicable rate schedule.

|  |  | Application Period |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Wattage | Nominal kWh Energy Usage per Unit per Month | 06/01/2021 through 11/30/2021 | $\begin{aligned} & \text { 12/01/2021 } \\ & \text { through } \\ & 05 / 31 / 2022 \end{aligned}$ | 06/01/2022 through 11/30/2022 | $\begin{gathered} \text { 12/01/2022 } \\ \text { through } \\ 05 / 31 / 2023 \end{gathered}$ | $\begin{gathered} \text { 06/01/2023 } \\ \text { through } \\ 11 / 30 / 2023 \end{gathered}$ | $\begin{aligned} & \text { 12/01/2023 } \\ & \text { through } \\ & 05 / 31 / 2023 \end{aligned}$ |
| Supply Charge ¢ per kWh |  | 3.0953 | X. XXXX | X.XXXX | X.XXXX | X.XXXX | X.XXXX |
| Mercury Vapor |  | Fixture Charge - \$ per Month |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| 100 | 44 | 1.36 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 175 | 74 | 2.29 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 102 | 3.16 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 161 | 4.98 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 1000 | 386 | 11.95 | X.XX | X.XX | X.XX | X.XX | X.XX |
| High Pressure Sodium |  |  |  |  |  |  |  |
| 70 | 29 | 0.90 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 100 | 50 | 1.55 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 150 | 71 | 2.20 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 200 | 95 | 2.94 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 110 | 3.40 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 170 | 5.26 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 1000 | 387 | 11.98 | X.XX | X.XX | X.XX | X.XX | X.XX |
| Flood Lighting - Unmetered |  |  |  |  |  |  |  |
| 70 | 29 | 0.90 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 100 | 46 | 1.42 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 150 | 67 | 2.07 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 100 | 3.10 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 155 | 4.80 | X.XX | X.XX | X.XX | X.XX | X.XX |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |  |  |  |
| 30 | 11 | X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| 45 | 16 | 0.50 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 60 | 21 | 0.65 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 95 | 34 | 1.05 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 139 | 49 | 1.52 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 219 | 77 | 2.38 | X.XX | X.XX | X.XX | X.XX | X.XX |
|  |  |  |  |  |  |  |  |
| Light-Emitting Diode (LED) - Colonial |  |  |  |  |  |  |  |
| 20 | 7 | X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| 45 | 16 | X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| Light-Emitting Diode (LED) - Contemporary |  |  |  |  |  |  |  |
|  |  |  | X.XX | X.XX | X.XX | X.XX | X.XX |
| 55 | 20 | X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |

(C)

STANDARD CONTRACT RIDERS - (Continued)
RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued)
(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL)
DEFAULT SERVICE SUPPLY RATE - (Continued)
Lighting - (Continued)
(Rate Schedules SM, SH and PAL)
Lamp wattage as available on applicable rate schedule.


## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued) 

(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL)

## CONTINGENCY PLAN

In the event Duquesne receives bids for less than all Tranches or the Commission does not approve all or some of the submitted bids or in the event of supplier default, then Duquesne will provide the balance of the default supply for commercial and industrial customers through purchases in the PJM spot markets until such time that a different contingency plan is approved by the Commission. Duquesne will submit to the Commission within fifteen (15) days after any such occurrence an emergency plan to handle any default service shortfall. All costs associated with implementing the contingency plan will be included as part of the DSS described in the section below, "Calculation of Rate."

## CALCULATION OF RATE

DSS rates shall be determined based on the formula described in this section. The DSS shall be filed with the Commission no less than sixty (60) days prior to the start of the next Application Period as defined under the Default Service Supply Rate section of this Rider. Rates are reconciled on a semi-annual basis in accordance with the Default Service Supply Rate section of this Rider. The rates shall include an adjustment to reconcile revenue and expense for each Application Period. The DSS shall be determined to the nearest one-thousandth of one (1) mill per kilowatt-hour in accordance with the formula set forth below and shall be applied to all kilowatt-hours billed for default service provided during the billing month:

$$
\text { DSS }=\left[\left(C A+S L R+\left(\text { DSS }_{a}+E\right) / S\right) * F+\left(D S S_{b} / S\right)\right] *[1 /(1-T)]
$$

## Where:

DSS = Default Service Supply rate, converted to cents per kilowatt-hour, to be applied to each kilowatthour supplied to customers taking default service from the Company under this Rider.

CA $\quad=\quad$ The weighted average of the winning bids received in a competitive auction for each customer class identified above and described in the "Default Service Supply Rate" section and adjusted for customer class transmission and distribution line losses. The competitive auction shall be conducted as described in "Procurement Process."

DSS $_{\mathbf{a}} \quad=\quad$ The total estimated direct and indirect costs incurred by the Company to acquire DSS from any source on behalf of customers described above in the "Procurement Process." The Application Period shall be for each period over which the DSS, as computed, will apply. Projections of the Company's costs to acquire default supply for the Application Period shall include all direct and indirect costs of generation supply to be acquired by the Company from any source plus any associated default service supply-related procurement and administration costs. Default service supply-related costs shall include the cost of preparing the company's default service plan filing and working capital costs associated with default service supply. The Company will recover these costs over the default service plan period as defined in the Commission's order at Docket No. R-2021-3024750.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 9 - DAY-AHEAD HOURLY PRICE SERVICE - (Continued)

## (Applicable to Rates GS/GM, GMH, GL, GLH, L and HVPS and Generating Station Service)

MONTHLY CHARGES - (Continued)
PJM Ancillary Service Charges and Other PJM Charges - (Continued)
$\mathbf{P J M}_{\mathbf{S}}=$ PJM Surcharge is a pass-through of the charges incurred by the Company for grid management and administrative costs associated with membership and operation in PJM. These are the charges incurred by the Company under PJM Schedules 9 and 10 to provide hourly price service.
$\mathbf{R}_{\mathrm{D}}=\quad$ Reactive supply service charge in $\$ / \mathrm{MW}$-day to serve the customer's load as calculated under the PJM Tariff Schedule 2.
$B_{D}=\quad$ Blackstart service charge in $\$ / M W$-day to serve the customer's load as calculated under the PJM Tariff Schedule 6A.

## Fixed Retail Administrative Charge

FRA $=\quad$ The Fixed Retail Administrative Charge in $\$$ per MWH. The Fixed Retail Administrative Charge consists of the sum of administrative charges for the suppliers providing hourly price service (as determined by a competitive solicitation process) and for the Company to obtain supply and administer this service. Default service supply-related costs shall include the cost of preparing the company's default service plan filing and working capital costs associated with default service supply. The Company will recover these costs over the default service plan period as defined in the Commission's order at Docket No. R-20213024750.

The supplier charges shall be based on the winning bids in the Company's most recent solicitation for supply of hourly price default service.

The Company's administrative charges shall be based on an amortization of the costs incurred by the Company to acquire generation supply from any source for the Medium ( $\geq 200 \mathrm{~kW}$ ) Customer Class and Large C\&I Customer Class during the most recent twelvemonth (12-month) period ended May 31st (as determined by amortizing such costs over a 12-month period) plus the amortization of the cost of administering the hourly price service over the duration of the default service plan, including any unbundled costs of preparing the Company's default service plan filing and working capital costs associated with default service supply.

This charge shall also include the Company's costs associated with any Commission approved solar contracts and its administration, if applicable, in \$ per MWh. The proceeds of any solar energy, capacity, ancillary services and solar AECs that are acquired and in excess of those allocated to default service suppliers, and sold into the market, will be netted against solar contract costs.

| Application Period | FRA \$/MWH |
| :---: | :---: |
| June 1, 2021 through May 31, 2022 | $\$ 3.60$ |
| June 1, 2022 through May 31, 2023 | $\$ . . X X$ |
| June 1, 2023 through May 31, 2024 | $\$ X . X X$ |
| June 1, 2024 through May 31, 2025 | $\$ X . X X$ |

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 10 - STATE TAX ADJUSTMENT

## (Applicable to All Rates)

In addition to the charges provided in this Tariff, a two-part surcharge will apply to all bills rendered by the Company, pursuant to the Pennsylvania Public Utility Commission authorization of March 10, 1970, to compensate the Company for new and increased taxes imposed by the General Assembly.

Part 1 of the surcharge, at a rate of $0.0000 \%$ will include Capital Stock Tax, Corporate Net Income Tax, and Public Utility Realty Tax, which will be applied to the distribution charges of customer bills.

Part 2 of the surcharge, at a rate of $0.0000 \%$ will include Gross Receipts Tax and will be applied to all portions of customer bills.

The Company will recompute the surcharge using the elements prescribed by the Commission's March 10, 1970, authorization:

1. Whenever any of the tax rates used in computing the surcharge is changed, in which case the recomputation shall take into account the changed tax rate.
2. Whenever the Company makes effective increased or decreased rates (other than net energy clause), in which case the recomputation shall take into account the adjustments prescribed by the Commission's March 10, 1970, authorization.
3. On December 22, and each year thereafter.

Every recomputation made pursuant to the above paragraph shall be submitted to the Commission within ten (10) days after the occurrence of the event or date which occasions such recomputation: and if the recomputed surcharge is less than the one then in effect the Company will, and if the recomputed surcharge is more than the one then in effect the Company may, accompany such recomputation with a Tariff or supplement to reflect such recomputed surcharge, the effective date of which, shall be ten (10) days after filing.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES 

(Applicable to Rates GM $<\mathbf{2 5}, \mathbf{G M} \mathbf{2 5} \mathbf{2 5}$ GMH, GL, GLH and L)

The following applies to non-utility generating facilities including, but not limited to cogeneration and small power production facilities that are qualified in accord with Part 292 of Chapter I, Title 18, Code of Federal Regulations (qualifying facility). Electric energy will be delivered to a non-utility generating facility in accord with the following:

## A. DEFINITIONS

Contract is the signed agreement between the customer and the Company that is executed upon the customer's request to select Rider No. 16 service. Among other things, the Contract specifies the contractual demand levels for Back-Up Service and Supplementary Service that are defined below.

Supplementary Service is distribution service provided by the Company, inclusive of distribution services included in the applicable monthly customer charge, to a non-utility generating facility and regularly used in addition to that electric energy which the non-utility generating facility generates itself. The Company's regular and appropriate General Service Rates will be utilized for billing for Supplementary Service.

Back-Up Service is distribution services provided by the Company to a non-utility generating facility during any outage of the non-utility generating facility's electric generating equipment or otherwise, to replace electric energy ordinarily generated by the non-utility generating facility's generating equipment.

Base Period is the twelve consecutive monthly billing periods applicable to the customer ending one month prior to the installation of new on-site generation or increase in capacity to existing on-site supply.

Supplementary Contract Demand may be established and represents the threshold demand for Supplementary Service to the customer's facility.

Maintenance Contract Demand is the maximum electrical capacity in kilowatts that the Company shall be required by the contract to deliver to the customer for Back-Up Service and is in addition to Supplementary Contract Demand.

Peak Period is the period between 12pm and 10pm EST on all days in the months of June through September.
Supplementary Service Billing Determinants is the kW specified in the Contract with the customer for Supplementary Service.

Maintenance Demand Service Billing Determinants is the kW specified in the Contract as Maintenance Contract Demand with the customer for Back-Up Service. This Billing Determinant applied every billing period regardless of whether the customer calls upon Back-Up Service during the billing period.

As-Used Demand Billing Determinant is the kW specified in the Contract as Maintenance Contract Demand that applies if the customer calls upon Back-Up Services during the Peak Period. As-Used Demand Billing Determinant will be set to the Maintenance Contact Demand level if the customer's maximum demand during the Peak Period of the billing period exceeds the Supplementary Contract Demand specified in the Contract.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES - (Continued) 

(Applicable to Rates GM $<\mathbf{2 5}, \mathrm{GM} \mathbf{2 5} \mathbf{2 5}, \mathrm{GMH}, \mathrm{GL}, \mathrm{GLH}$ and L)

## A. DEFINITIONS - (Continued)

Distribution Base Period Billing Determinants are the billing demand (kW) for the month in the Base Period corresponding to the current billing month under which the on-site generation is operable. For new customers, the Company will use existing procedures to estimate Base Period Billing Determinants.

Supply Billing Determinants for customers not being served by an Electric Generation Supplier ("EGS"). Rate GL, GLH, and L shall be the billing determinates for the current billing month then in effect under Rider No. 9 - DayAhead Hourly Price Service. Supply Billing Determinants for customers for customers on Rate GS/GM and GMH shall be the billing determinants for the current billing month then in effect under Rider No. 8 - Default Service Supply or Rider No. 9 - Day-Ahead Hourly Price Service, as applicable.

## B. BACK-UP SERVICE

The Company will supply Back-Up Service at the following rates:
(C)

## DISTRIBUTION

A distribution charge of $\$ 3.09$ per kW shall be applied to the Back-Up Service Maintenance Demand Billing Determinants.

The Maintenance Contract Demand distribution charges will be applied in each month based on the customer's Maintenance Contract Demand without regard to actual usage.

An additional distribution charge of $\$ 6.79$ per kW shall be applied to the Back-Up Service As-Used Contract Demand Billing Determinants. The As-Used Contract Demand distribution charge will be applied in each month based on the customer's As-Used Contract Demand if the customer calls upon Back-Up service during the Peak Period.

Overage charges will also apply if the customer exceeds Maintenance Demand by $10 \%$ or more. The Maintenance Overage Charge of $\$ 9.88$ per kW shall be applied to the difference in actual maximum kW during the billing period and the customer's Maintenance Contact Demand. No additional charges will apply to the As-Used Contract Demand Charge.

If actual usage of Back-Up Service exceeds zero for more than $15 \%$ of the hours in any Base Period, then those hours above the $15 \%$ threshold will be counted toward the billing on the customer's applicable general service rates, including all ratchets applicable.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES - (Continued) 

(Applicable to Rates GM $<\mathbf{2 5}, \mathbf{G M} \geq \mathbf{2 5}, \mathrm{GMH}, \mathrm{GL}, \mathrm{GLH}$ and L)

## B. BACK-UP SERVICE - (Continued)

If a customer's Back-Up Service requirement at any time exceeds the customer's Maintenance Contract Demand by $5 \%$ or more, the actual Back-Up Service requirement provided, measured in kW demand will become the customer's new Maintenance Contract Demand for the remaining term of the back-up contract. If a customer's actual Back-Up Service requirement provided at any time exceeds the customer's Maintenance Contract Demand by $10 \%$ or more, the customer will be assessed a fee equal to the difference between the actual Back-Up Service provided at the time during the billing period and the Maintenance Contract Demand multiplied by the Overage Charge (\$9.88).

## C. INTERCONNECTION

Each non-utility generating facility will be required to install at its expense or pay in advance to have the Company install interconnection equipment and facilities which are over and above that equipment and facilities required to provide electric service to the non-utility generating facility according to the Company's General Service Rates, except as noted below. Any such equipment to be installed by the non-utility generating facility must be reviewed and approved in writing by the Company prior to installation. Nothing in this Rider shall exempt a new customer from the application of Rule No. 7 and Rule No. 9 regarding Supply Line Extensions and Relocation of Facilities.

However, customers may elect to pay the cost of existing or newly required transformation equipment that is over and above that equipment necessary for the Company to supply the customer with its contracted Supplemental Power via a monthly charge rather than in total at the onset of the contract. The monthly charge for transformation equipment for customers with contract demand under this rider of $5,000 \mathrm{~kW}$ or more will be determined by the Company on a case-by-case basis.
(C)
(C)
(C)
(C)
(C)
(C)

)


## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 19 - COMMUNITY DEVELOPMENT FOR NEW LOAD 

(Applicable to Rate Schedules GS/GM, GL, and L)


#### Abstract

AVAILABILITY

This Rider is available to customers taking distribution service under Rate $\mathrm{GM}<25, \mathrm{GM} \geq 25$, GL , or L . For new services, the customer or applicant must have a projected load of at least 10 kW and must apply for the Rider prior to the service being energized. For existing services, the customer must reasonably project a peak load increase of at least 10 kW and apply for the Rider before the load growth occurs. The Rider will apply no sooner than thirty (30) days after the customer provides to the Company written notice of its desire to be placed on the Rider. The Company reserves the right to decline to enroll any customer or applicant in this Rider, at the Company's sole discretion. Customers taking service under this Rider are not eligible for any other distribution rate discount.


## DEFINITIONS

Service Location. A single or contiguous premises that has or will have one or more delivery points for distribution service billed by the Company under a single account.

Brownfield Site. A Service Location where the expansion, redevelopment, or reuse of which may be complicated by the presence or potential presence of a hazardous substance, pollutant, or contaminant. Requires documentation either by providing a copy of the pertinent sections of the ASTM E1903-97 Phase II Site Assessment documenting the site contamination or by providing a letter from a local, state or federal regulatory agency confirming the site is classified as a Brownfield by that agency.

Site Expansion. A Service Location where the Company has not previously provided service, or where the service previously provided by the Company was not used for substantially the same type of operation or was terminated at least twelve (12) months before the customer's contractually specified effective date for service under this rider. This condition is waived for existing Service Locations where an entity has assumed operation of a Service Location from a customer which has ceased operations as a result of dissolution, so long as the formation of the entity did not occur as a result of merger, joint venture, acquisition and/or any other variation of combined business structures with the former customer at the service location. In any event, the completed application for the rider must be made within six (6) months from the later of the date: (1) the customer first received service from the Company; or (2) the date the customer received its sales tax exemption certificate from the Commonwealth of Pennsylvania.

Manufacturing Sales Tax Exemption Certificate. Pennsylvania Sales Tax Blanket Exemption Certificate filed by the customer with the Company showing the address of the Service Location and certifying that more than fifty (50) percent (on an annual basis) of the service purchased by the customer for the Service Location is exempt from sales tax because it is used in manufacturing operations, shipbuilding operations, or ship cleaning operations.

Employment Report. The "Employer's Report for Unemployment Compensation" (PA Form UC-2) as filed by the customer with the Office of Employment Security, Department of Labor and Industry, Commonwealth of Pennsylvania and as defined by 43 P.S. 753 [d].

STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 19 - COMMUNITY DEVELOPMENT FOR NEW LOAD - (Continued) 

(Applicable to Rate Schedules GS/GM, GL, and L)

MONTHLY RATE

## DISTRIBUTION CHARGES

Rider No. 19 provides a percent discount to monthly demand charges for base distribution services included in Rates $\mathrm{GM}<25, \mathrm{GM} \geq 25$, GL, and L during the months of January through May and October through November. The percent discount declines ratably over five years as follows.
2022 Percent Discount ..... 25\%
2023 Percent Discount ..... 20\%
2024 Percent Discount ..... 15\%
2025 Percent Discount ..... 10\%
2026 Percent Discount ..... 5\%

This Rider applies only to base distribution services. All other applicable charges and Riders will be charged as designed.

## QUALIFICATIONS

Customers and applicants requesting service under this Rider shall file with the Company, before the effective date of the Rider for the Service Location, a Manufacturing Sales Tax Exemption Certificate, as defined above, for the Service Location. Customer also files with the Company copies of the Employment Reports, as defined above, for the Service Location at the time of application.

## TRANSFER OF OWNERSHIP

The Company will only apply the Rider to the customer's base distribution charges for the term of contract. If, during the term of contract, the ownership of the Service Location changes, the Company may continue to apply the Rider to the new owner's bills for the Service Location. If the Company continues to apply the Rider in such circumstances, the Company shall apply the Rider to the new owner's bills for the Service Location as if the new owner had been on the Rider for the Service Location for the same period of time as was the previous owner.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 21 - NET METERING SERVICE 

(Applicable to Rates RS, RH, RA, GS/GM, GMH, GL, GLH and L)

PURPOSE

This Rider sets forth the eligibility, terms and conditions applicable to Customers with installed qualifying renewable customer-owned generation using a net metering system.


#### Abstract

APPLICABILITY This Rider applies to renewable customer-generators served under Rate Schedules RS, RH, RA, GS/GM, GMH, GL, GLH and L who install a device or devices which are, in the Company's judgment, subject to Commission review, a bona fide technology for use in generating electricity from qualifying Tier I or Tier II alternative energy sources pursuant to Alternative Energy Portfolio Standards Act No. 2004-213 (Act 213) or Commission regulations and which will be operated in parallel with the Company's system. This Rider is available to installations where any portion of the electricity generated by the renewable energy generating system offsets part or all of the customergenerator's requirements for electricity. A renewable customer-generator is a non-utility owner or operator of a net metered generation system with a nameplate capacity of not greater than 50 kilowatts if installed at a residential service (Rate RS, RH or RA) or not larger than 3,000 kilowatts at other customer service locations (Rate GS/GM, GMH, GL, GLH and L), except for Customers whose systems are above three megawatts and up to five megawatts who make their systems available to operate in parallel with the Company during grid emergencies as defined by the regional transmission organization or where a micro grid is in place for the primary or secondary purpose of maintaining critical infrastructure such as homeland security assignments, emergency services facilities, hospitals, traffic signals, wastewater treatment plants or telecommunications facilities provided that technical rules for operating generators interconnected with facilities of the Company have been promulgated by the Institute of Electrical and Electronic Engineers ("IEEE") and the Commission.

Qualifying renewable energy installations are limited to Tier I and Tier II alternative energy sources as defined by Act 213 and Commission Regulations. The Customer's equipment must conform to the Commission's Interconnection Standards and Regulations pursuant to Act 213. This Rider is not applicable when the source of supply is service purchased from a neighboring electric utility under Borderline Service.

Service under this Rider is available upon request to renewable customer-generators on a first come, first served basis so long as the total rated generating capacity installed by renewable customer-generator facilities does not adversely impact service to other Customers and does not compromise the protection scheme(s) employed on the Company's electric distribution system.


## METERING PROVISIONS

A Customer may select one of the following metering options in conjunction with service under applicable Rate Schedule RS, RH, RA, GS/GM, GMH, GL, GLH and L.

1. A customer-generator facility used for net metering shall be equipped with a single bi-directional meter that can measure and record the flow of electricity in both directions at the same rate. A dual meter arrangement may be substituted for a single bi-directional meter at the Company's expense.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 21 - NET METERING SERVICE - (Continued) 

(Applicable to Rates RS, RH, RA, GS/GM, GMH, GL, GLH and L)

## METERING PROVISIONS - (Continued)

2. If the customer-generator's existing electric metering equipment does not meet the requirements under option (1) above, the Company shall install new metering equipment for the customergenerator at the Company's expense. Any subsequent metering equipment change necessitated by the customer-generator shall be paid for by the customer-generator. The customer-generator has the option of utilizing a qualified meter service provider to install metering equipment for the measurement of generation at the customer-generator's expense. Additional metering equipment for the purpose of qualifying alternative energy credits owned by the customer-generator shall be paid for by the customer-generator. The Company shall take title to the alternative energy credits produced by a customer-generator where the customer-generator has expressly rejected title to the credits. In the event that the Company takes title to the alternative energy credits, the Company will pay for and install the necessary metering equipment to qualify the alternative energy credits. The Company shall, prior to taking title to any alternative energy credits, fully inform the customergenerator of the potential value of those credits and options available to the customer-generator for their disposition.
3. Meter aggregation on properties owned or leased and operated by a customer-generator shall be allowed for purposes of net metering. Meter aggregation shall be limited to meters located on properties within two (2) miles of the boundaries of the customer-generator's property. Meter aggregation shall only be available for properties located within the Company's service territory. Physical meter aggregation shall be at the customer-generator's expense. The Company shall provide the necessary equipment to complete physical aggregation. If the customer-generator requests virtual meter aggregation, it shall be provided by the Company at the customergenerator's expense. The customer-generator shall be responsible only for any incremental expense entailed in processing his account on a virtual meter aggregation basis.

## BILLING PROVISIONS

The following billing provisions apply to customer-generators in conjunction with service under applicable Rate Schedule RS, RH, RA, GS/GM, GMH, GL, GLH and L:

1. The customer-generator will receive a credit for each kilowatt-hour received by the Company up to the total amount of electricity delivered to the Customer during the billing period at the full retail rate consistent with Commission regulations. If a customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the customer-generator's usage in subsequent billing periods at the full retail rate. Any excess kilowatt hours shall continue to accumulate for the 12 month period ending May 31. On an annual basis, the Company will compensate the customer-generator for kilowatt-hours received from the customer-generator in excess of the kilowatt hours delivered by the Company to the customer-generator during the preceding year at the Company's Price To Compare consistent with Commission regulations. For customer-generators on Rider No. 9 - Day-Ahead Hourly Price Service, the Price To Compare shall be determined as an average for the twelve (12) month period in accordance with Rider No. 9 and Appendix A - Transmission Service Charges. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 21 - NET METERING SERVICE - (Continued) 

(Applicable to Rates RS, RH, RA, GS/GM, GMH, GL, GLH and L)

BILLING PROVISIONS - (Continued)
2. If the Company supplies more kilowatt-hours of electricity than the customer-generator facility feeds back to the Company's system during the billing period, all charges of the appropriate rate schedule shall be applied to the net kilowatt-hours of electricity that the Company supplied. The customergenerator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
3. For customer-generators involved in virtual meter aggregation programs, a credit shall be applied first to the meter through which the generating facility supplies electricity to the distribution system, then through the remaining meters for the customer-generator's account equally at each meter's designated rate. Virtual meter aggregation is the combination of readings and billing for all meters regardless of rate class on properties owned or leased and operated by a customer-generator by means of the Company's billing process, rather than through physical rewiring of the customergenerator's property for a physical, single point of contact. The customer-generators are responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## BILLING PROVISIONS FOR

## ELECTRIC VEHICLE TIME-OF-USE PILOT PROGRAM ("EV-TOU") CUSTOMER GENERATORS

## (Applicable to Rates RS, RH, RA, GS/GM and GMH)

The following billing provisions apply to customer-generators that take service on Rider No 8 - Default Service Supply and are on EV-TOU rates.

1. The EV-TOU customer-generator will receive a credit for each kilowatt-hour received by the Company up to the total amount of electricity delivered to the Customer during the billing period at the full retail rate consistent with Commission regulations. If an EV-TOU customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the Company will maintain an active record of the excess kilowatt hours produced at the customer-generators premise in a "bank". If an EV-TOU customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the EV-TOU customer generator's usage in a subsequent billing period at the full retail rate. If, in a subsequent billing period, a customer consumes more electricity than produced, kilowatt-hours will be pulled from the customer's bank on a first in first out basis. Any excess kilowatt hours shall continue to accumulate and credit against usage for the 12 month period ending May $31^{\text {st }}$. On an annual basis, the Company will compensate the customer-generator for kilowatt-hours remaining in the bank on May 31st, at the applicable Price To Compare at the time the excess kilowatt-hours were banked. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 21 - NET METERING SERVICE - (Continued)

(Applicable to Rates RS, RH, RA, GS/GM, GMH, GL, GLH and L)
(C)

# BILLING PROVISIONS FOR ELECTRIC VEHICLE TIME-OF-USE PILOT PROGRAM ("EV-TOU") CUSTOMER GENERATORS 

(Applicable to Rates RS, RH, RA, GS/GM and GMH)

- (Continued)

1. If the Company supplies more kilowatt-hours of electricity than the customer-generator supplies during the billing period, all charges of the appropriate rate schedule shall be applied to the net kilowatt-hours of electricity that the Company supplied. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
2. If an eligible customer-generator wishes to no longer be enrolled in the EV-TOU Pilot Program and switches to the standard default service supply product, any excess kilowatt hours banked and remaining from the EV-TOU period will be used, as applicable, for the remaining portion of the 12 month period ending May 31 and the Company shall compensate for any excess kilowatt hours that are banked at the Price To Compare in effect at the time.

## NET METERING PROVISIONS FOR SHOPPING CUSTOMERS

1. Customer-generators may take net metering services from EGSs that offer such services.
2. If a net-metering customer takes service from an EGS, the Company will credit the customer for distribution charges for each kilowatt hour produced by the customer-generator, up to the total amount of kilowatt-hours delivered to the customer by the Company during the billing period. If a customer-generator supplies more electricity to the electric distribution system than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the customer-generator's usage in subsequent billing periods at the Company's distribution rates. Any excess kilowatt hours shall continue to accumulate for the 12 month period ending May 31. Any excess kilowatt hours at the end of the 12 month period will not carry over to the next year for distribution charge purposes. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
3. If the Company delivers more kilowatt-hours of electricity than the customer-generator facility feeds back to the Company's system during the billing period, all charges of the applicable rate schedule shall be applied to the net kilowatt-hours of electricity that the Company delivered. The customergenerator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 21 - NET METERING SERVICE - (Continued)

(Applicable to Rates RS, RH, RA, GS/GM, GMH, GL, GLH and L)

## NET METERING PROVISIONS FOR SHOPPING CUSTOMERS - (Continued)

4. Pursuant to Commission regulations, the credit or compensation terms for excess electricity produced by customer-generators who are customers of EGSs shall be stated in the service agreement between the customer-generator and the EGS. The Company will provide the customer-generator with a statement of monthly kilowatt hour usage for the 12 month period ending May 31 for the purpose of the customer-generator seeking credit or compensation from the EGS.
5. If a customer-generator switches electricity suppliers, the Company shall treat the end of the service period as if it were the end of the year.

## APPLICATION

Customer-generators seeking to receive service under the provisions of this Rider must submit a written application to the Company demonstrating compliance with the Net Metering Rider provisions and quantifying the total rated generating capacity of the customer-generator facility.

## MINIMUM CHARGE

The Minimum Charges under Rate Schedule RS, RH, RA, GS/GM, GMH, GL, GLH and L apply for installations under this Rider.

## RIDERS

Bills rendered by the Company under this Rider shall be subject to charges stated in any other applicable Rider.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 22 - DISTRIBUTION SYSTEM IMPROVEMENT CHARGE 

## (Applicable to All Rates)

In addition to the net charges provided for in this Tariff, a charge of $0.00 \%$ will apply consistent with the Commission Order entered September 15, 2016, at Docket No. P-2016-2540046 approving the Distribution System Improvement Charge ("DSIC").

## GENERAL DESCRIPTION

## PURPOSE

To recover the reasonable and prudent costs incurred to repair, improve, or replace eligible property which is completed and placed in service and recorded in the individual accounts, as noted below, between base rate cases and to provide the Company with the resources to accelerate the replacement of aging infrastructure, to comply with evolving regulatory requirements and to develop and implement solutions to regional supply problems.

The costs of extending facilities to serve new customers are not recoverable through the DSIC.

## ELIGIBLE PROPERTY

The DSIC-eligible property will consist of the following:

- Poles and towers (account 364);
- Overhead conductors (account 365) and underground conduit and conductors (accounts 366 and 367);
- Line transformers (account 368) and substation equipment (account 362);
- Any fixture or device related to eligible property listed above including insulators, circuit breakers, fuses, reclosers, grounding wires, cross arms and brackets, relays, capacitors, converters and condensers;
- Unreimbursed costs related to highway relocation projects where an electric distribution company must relocate its facilities; and
- Other related capitalized costs.


## EFFECTIVE DATE

The DSIC will become effective October 1, 2016.

## RIDER NO. 23 - HOME CHARGING PILOT PROGRAM

## (Applicable to Rates RS, RH and RA)

## PURPOSE

This Rider sets forth the eligibility, terms, and conditions applicable to customers participating in the Company's voluntary residential Home Charging Pilot (the "Program").

## APPLICABILITY

Available to residential customers served under Rate Schedules RS, RH and RA who:
a. own a single-family home, defined as a detached single-family home, townhome/row house, or duplex ("Service Address");
b. have an active Duquesne Light residential electric service account with no past due bills at the Service Address;
c. have a personal garage or private driveway at Service Address suitable, in the Company's sole judgment, for the installation and operation of an electric vehicle ("EV") level 2 charging station ("Charging Station") and related equipment; and
d. own or lease an EV which is registered to the customer's Service Address.

The Program is available to up to 125 new participants per calendar year on a first-come, first-served basis. The Company may decline to enroll any customer at the Company's sole discretion.

## MONTHLY RATE

In addition to any applicable charges for electric delivery and supply, participating customers shall pay a monthly Program Charge of \$21.17.

## PROGRAM DESCRIPTION

Through the Program, Duquesne Light shall provide, own, and maintain a Charging Station at the participating customer's Service Address for the duration of the customer's participation in the Program. The customer shall select the Charging Station from a list of options approved by Duquesne Light. The Charging Station shall be installed at a mutually-agreeable location at the Service Address by Duquesne Light's third-party contractor(s). The Company shall pay the Covered Amount (as defined below) toward costs associated with installing the Charging Station. Any costs above the Covered Amount shall be at the customer's expense.

# RIDER NO. 23 - HOME CHARGING PILOT PROGRAM - (Continued) 

(Applicable to Rates RS, RH and RA)

PROGRAM DESCRIPTION - (Continued)
"Covered Amount:" The Covered Amount shall be up to $\$ 2,000$ for customers with household incomes equal to or less than $150 \%$ of the Federal Poverty Level, or up to $\$ 500$ for all other customers. For customers with household incomes equal to or less than $150 \%$ of the Federal Poverty Level, the Covered Amount may apply to Charging Station installation costs, as well as costs of electrical upgrades at the customer's residence (e.g., new electrical panel or breakers) necessary to support Charging Station installation and operation. For all other customers, the Covered Amount may apply only to Charging Station installation costs.

In addition to the foregoing requirements, participating customers shall:
a. Execute and abide by the Home Charging Pilot Customer Agreement, with a minimum term of five years.
b. Have and maintain wireless internet ("Wi-Fi") service at the Service Address with sufficient signal at the Charging Station location.
c. Share charging data with Duquesne Light (and provide any authorizations required to accommodate such sharing) via the applicable Charging Station vendor.
d. Promptly notify Duquesne Light in the event the Charging Station fails to operate or otherwise requires repair, except for minor issues remedied by the customer pursuant to (e) herein.
e. Make reasonable efforts to remedy minor issues with the Charging Station that do not require qualified technicians to address, including but not limited to, the resetting of a tripped circuit breaker or assisting with software or Wi-Fi interconnectivity issues.
f. Establish and maintain an account with the applicable Charging Station vendor and for wireless internet connectivity to enable communication between the Charging Station and Charging Station vendor's hardware and software.
g. Use the Charging Station only in accordance with the manufacturer's applicable recommendations.
h. Maintain the area surrounding the Charging Station. See also Rule No. 23 herein.
i. Provide Duquesne Light with reasonable access to the Charging Station. See also Rule No. 22 herein.
j. Upon Duquesne Light's request, participate in surveys and provide feedback about the Program.

Upon conclusion of the Home Charging Pilot Customer Agreement Term, except in the event of customer default or early termination as discussed below, ownership of the Charging Station shall pass automatically to customer.

In the event of customer default or early termination, the customer shall pay a sum equal to the number of months remaining in the Home Charging Pilot Customer Agreement Term multiplied by the Monthly Charge per Charging Station, plus a one-time fee of $\$ 200$; and Duquesne Light may remove the Charging Station from the Service Address.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PURPOSE

This Rider sets forth the eligibility, terms, and conditions applicable to customers participating in the Company's voluntary Fleet Charging Pilot (the "Program").

## APPLICABILITY

Available to customers served under Rate Schedules GS/GM, GMH, GL GLH, and L that:
a. own, lease, or operate a fleet of at least six on-road vehicles;
b. demonstrate that electric vehicles are currently in-use or have been purchased for use at the customer's premises ("Service Address");
c. own or lease the Service Address, and demonstrate site control, suitable, in the Company's sole judgement, for the installation and operation of level 2 electric vehicle charging stations ("Charging Stations") and related equipment.

The Program is available to up to twelve (12) new customers per calendar year on a first-come, first-served basis. The Company may decline to enroll any customer at the Company's sole discretion.

## MONTHLY RATE

In addition to any applicable charges for electric delivery and supply, participating customers shall pay the following applicable monthly charge per charging station port:

- Bundled Option: $\$ 63.24$
- Pre-Pay Option: \$28.82
- Customer-Supplied Charging Station Option: No charge

Customers will select one Program Option for all charging ports subject to the Program at the Service Address for the duration of the customer's participation in the Program.

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM - (Continued) 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PROGRAM DESCRIPTION

Through the Program, Duquesne Light shall provide electric vehicle charging services consistent with the Program Option selected by the customer.

- For customers participating in the Bundled Option and the Pre-Pay Option, Duquesne Light shall provide, own, and maintain Charging Stations at the Service Address, as well as electrical equipment reasonably necessary to connect the Charging Stations to the customer's Service Point ("Make-Ready Infrastructure"), for the duration of the customer's participation in the Program. The customer shall select the Charging Stations from a list of options approved by Duquesne Light. The Charging Stations shall be installed at a mutually-agreeable location at the Service Address by Duquesne Light's third-party contractor(s). Additionally, for customers participating in the Pre-Pay Option, the customer shall pay the Company's costs of the Charging Station in addition to the applicable monthly charge identified herein.
- For customers participating in the Customer-Supplied Charging Station Option, the customer shall provide, install, own, and maintain the Charging Stations at a mutually-agreeable location at the Service Address; and the Company shall own and maintain the Make-Ready Infrastructure.

In addition to the foregoing requirements, participating customers shall:
a. Execute and abide by the Fleet Charging Pilot Customer Agreement, with a minimum term of ten (10) years.
b. Host Charging Stations with a minimum total of four (4) charging station ports per participating Service Address.
c. Share charging data with Duquesne Light (and provide any authorizations required to accommodate such sharing) via the applicable Charging Station vendor.
d. Promptly notify Duquesne Light in the event the Charging Station fails to operate or otherwise requires repair, except for minor issues remedied by the customer pursuant to (e) herein.
e. Make reasonable efforts to remedy minor issues with the Charging Station that do not require qualified technicians to address, including but not limited to, the resetting of a tripped circuit breaker or assisting with software or Wi-Fi interconnectivity issues.
f. Use the Charging Station only in accordance with the manufacturer's applicable recommendations.
g. Grant Duquesne Light any rights-of-way or easements deemed necessary. See also Rule No. 22.1 herein.
h. Maintain the area surrounding the Charging Station. See also Rule No. 23 herein.
i. Provide Duquesne Light with reasonable access to the Charging Station. See also Rule No. 22 herein.
j. Upon Duquesne Light's request, participate in surveys and provide feedback about the Program.

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM - (Continued) 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PROGRAM DESCRIPTION - (Continued)

For customers participating in the Bundled and Pre-Pay Options: Upon conclusion of the Fleet Charging Pilot Agreement Term, except in the event of customer default or early termination as discussed below, ownership of the Charging Station and Make Ready shall pass automatically to customer.

For all customers: Customers that leave the program prematurely will be required to purchase the Make Ready and Charging Stations, as applicable, at the remaining undepreciated value of the equipment; or alternatively, to have the Company remove the infrastructure, and reimburse the Company's costs of removal and stranded equipment (if any).

STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 25 - NEW BUSINESS STIMULUS

## (Applicable to Rates GS/GM and GMH)


#### Abstract

AVAILABILITY

The New Business Stimulus Rider ("NBSR") is available to new small and medium business customers who start new electric service for a retail business in a Vacant Retail Storefront located within a Local Neighborhood Commercial (LNC) district, a Qualified Low-Income Census Tracts (QCT) district, and/or a Neighborhood Assistance Program (NAP) district.


## PROGRAM TERMS

Enrolled customers will receive a $30 \%$ discount on variable base distribution charges for a period of no more than two (2) years from commencing service or until December 31, 2024, whichever occurs earlier. Customers taking service under the NBSR are not eligible for any other distribution rate discount.

## DEFINITIONS

Vacant Retail Storefront: a brick-and-mortar location intended for retail business operations that: (a) will be open to the public, (b) has not received active electric service for thirty (30) or more days prior to the request to commence service, and (c) will receive service at the same voltage and phase as the previous customer. For the purposes of the NBSR, retail business operations will include businesses that offer goods and/or services using in-person storefront locations. These businesses will include boutiques, cafes, restaurants, bars or taverns, gyms, fitness centers, professional services providers, childcare and early education centers, salons and barber shops, and other retailers which are typically found in Main Street business districts.

Local Neighborhood Commercial (LNC) District: area(s) identified as LNC by the City of Pittsburgh Code of Ordinances.

Qualified Low-Income Census Tracts (QCT) District: area(s) identified as QCT by the United States Department of Housing and Urban Development.

Neighborhood Assistance Program (NAP) District: area(s) identified as NAP by the United States Department of Housing and Urban Development.

# STANDARD CONTRACT RIDERS - (Continued) 

## RIDER NO. 26 - CRISIS RECOVERY PROGRAM

## (Applicable to Rates GS/GM and GMH)


#### Abstract

AVAILABILITY

The Crisis Recovery Program ("CRP") is available to existing small and medium business customers that meet the eligibility requirements listed in the Program Terms and Conditions of this Rider. The CRP provides eligible customers with a $25 \%$ waiver of their delinquent account balance and/or an 18-month payment arrangement on the delinquent account balance.


## DEFINITIONS

COVID-19 pandemic: The World Health Organization (WHO) and the Centers for Disease Control and Prevention's (CDC) declaration of a novel coronavirus (COVID-19), which resulted in a state-wide disaster emergency proclamation by the Pennsylvania Governor pursuant to 35 Pa . C.S. § 7301 (c) on or about March 6, 2020.

Frozen period: The time in which the customer's delinquent balance will not become due, beginning with the first bill issued six (6) or more days following enrollment, and ending the calendar day following the due date of the sixth bill issued since enrollment.

## PROGRAM TERMS AND CONDITIONS

Eligible customers are required to demonstrate that they accumulated an account balance as a result of the COVID19 pandemic.

Enrolled customers will have their delinquent account balance frozen at the time of enrollment, which will remain frozen for six (6) billing cycles.

If the enrolled customer pays the non-frozen portion of their account balance in full by the due date of the sixth bill issued during the frozen period, $25 \%$ of the customer's delinquent account balance will be waived, and the customer will be issued an 18 -month payment arrangement on the remaining account balance. Customers can agree to shorter payment arrangement terms.

Failure to pay the non-frozen portion in full by the due date of the sixth bill issued during the frozen period will result in the customer receiving an 18 -month payment arrangement on the full delinquent balance. Customers can agree to shorter payment arrangement terms.

Enrollment into the CRP shall end on June 30, 2022.
Customers who are actively enrolled into the CRP are not eligible for any other rate discount.

## APPENDIX A - (Continued)

## TRANSMISSION SERVICE CHARGES - (Continued)

(Applicable to All Rates)

MONTHLY RATES - (Continued)

| Rate Class | Energy Charge \$/kWh | Demand Charge \$/kW | Monthly Charge Per Fixture | Monthly Charge Per Fixture | Monthly Charge Per Fixture | (C) (C) (C) <br> (C) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Rate Class |  |  |  |
| By Wattage |  |  | SH | PAL | SM |  |
| Flood Lighting - Unmetered |  |  |  |  |  |  |
| 70 |  |  | - | \$0.01 | - |  |
| 100 |  |  | - | \$0.02 | - |  |
| 150 |  |  | - | \$0.02 | - |  |
| 250 |  |  | - | \$0.04 | - |  |
| 400 |  |  | - | \$0.06 | - |  |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |  |  |
| 30 |  |  | \$0.00 | \$0.00 | \$0.00 |  |
| 45 |  |  | \$0.00 | \$0.01 | \$0.01 |  |
| 60 |  |  | \$0.02 | \$0.01 | \$0.01 |  |
| 95 |  |  | \$0.03 | \$0.01 | \$0.01 |  |
| 139 |  |  | \$0.04 | \$0.02 | \$0.02 |  |
| 219 |  |  | \$0.06 | \$0.03 | \$0.03 |  |
|  |  |  |  |  |  |  |
| Light-Emitting Diode (LED) - Colonial |  |  |  |  |  | (C) (C) |
| 20 |  |  | - | \$0.00 | \$0.00 |  |
| 45 |  |  | - | \$0.00 | \$0.00 | (C) (C) |
| Light-Emitting Diode (LED) - Contemporary |  |  |  |  |  |  |
| 40 |  |  | - | \$0.00 | \$0.00 | (C) (C) |
| 55 |  |  | - | \$0.00 | \$0.00 | (C) (C) |

## BILLING DEMAND

Billing Demand subject to Transmission Service Charges for customers taking service under Rate Schedules GS/GM and GMH shall be the same as that determined for distribution and supply charges under the applicable rate schedules.

Billing Demand subject to Transmission Service Charges for Customers taking service under Rate Schedules GL, GLH, L, HVPS and UMS shall be the customer's daily network service coincident peak load contribution in kW. This quantity is determined based on the customer's load coincident with the annual peak of the Duquesne Zone (single coincident peak) as defined in the PJM Tariff Section 34.1.

## ANNUAL UPDATE

The Transmission Service Charges (TSC) defined herein will be updated effective June $1^{\text {st }}$ of each calendar year or more often upon determination that the rates then in effect would result in a significant over or under collection. On or about May $1^{\text {st }}$, the Company will file revised TSC rates with the PA Public Utility Commission (Commission) defining rates in effect from June 1 to May 31 of the following year, the computation year. These rates shall be determined based on the projected revenue requirement for the computation year, the projected cost of PJM charges and the over or under collection of expenses based on actual TSC revenue and expense incurred up to March 1 of each filing year. The revenue

## DUQUESNE LIGHT CO.

## SCHEDULE OF RATES

For Electric Service in Allegheny and Beaver Counties
(For List of Communities Served, see Pages No. 4 and 5)
Issued By
DUQUESNE LIGHT COMPANY
411 Seventh Avenue
Pittsburgh, PA 15219
Mark E. Kaplan
Interim President and Chief Executive Officer

ISSUED: April 16, 2021
EFFECTIVE: June 15, 2021

Filed at Docket No. R-2021-3024750

## NOTICE

THIS TARIFF SUPPLEMENT ADDS PAGES AND RIDERS, MAKES CHANGES TO THE TABLE OF CONTENTS, RULES AND REGULATIONS, RATE SCHEDULES, RIDER MATRIX, RIDERS AND APPENDIX A AND MAKES INCREASES AND DECREASES TO THE RATES CONTAINED IN THE RATE SCHEDULES AND RIDERS.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES

List of Modifications Made by this
First Revised Pages No. 2A through Original Page No. 2G Tariff Cancelling Original Pages No. 2A - 2G

Original Pages No. 2H - 2L
Original Page No. 2H through Original Page No. 2 L have been added to Tariff No. 25 to accommodate the List of Modifications.

Original Page No. 3A has been added to the Table of Contents and therefore to Tariff No. 25.
Original Page No. 26A has been added to the rules section and therefore to Tariff No. 25.

Original Page No. 34A has been added to the rules section and therefore to Tariff No. 25.
Original Page No. 87A has been added to the Rider Matrix section and therefore to Tariff No. 25.
Original Page No. 92A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 92B has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 97A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 124A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 128A has been added to the rider section and therefore to Tariff No. 25.
Original Page No. 141A through Original Page No. 141G have been added to the rider section and therefore to Tariff No. 25.

## Table of Contents

Fourth Revised Page No. 3
Cancelling Third Revised Page No. 3
Original Page No. 2H through Original Page No. 2 L have been added to Tariff No. 25 to accommodate the List of Modifications.

Rider No. 4 - Federal Tax Adjustment Clause has been added to Tariff No. 25 and to the Table of Contents.
Original Page No. 87A has been added to the Table of Contents to reflect the additional page added to the Rider Matrix (Pages No. 87-87A).

Original Page No. 92B has been added to the Table of Contents to reflect the addition of Rider No. 4 - Federal Tax Adjustment Clause (Pages No. 92-92B).

Rider No. 7 - Residential Subscription Service Pilot has been added to Tariff No. 25 and to the Table of Contents.
Original Page No. 97A has been added to the Table of Contents to reflect the additional page added to Rider No.
7 - Residential Subscription Service Pilot (Pages No. 97-97A).

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

> CHANGES - (Continued)

Table of Contents
Fourth Revised Page No. 3
Cancelling Third Revised Page No. 3
Table of Contents information previously found on Third Revised Page No. 3, Cancelling Second Revised Page No. 3 has been moved to Original Page No. 3A to accommodate the additional Riders added to Tariff No. 25.

Table of Contents
Original Page No. 3A
Table of Contents information previously found on Third Revised Page No. 3, Cancelling Second Revised Page No. 3 has been moved to Original Page No. 3A to accommodate the additional Riders added to Tariff No. 25.

Original Page No. 124A has been added to the Table of Contents to reflect the additional page added to Rider No. 16 - Service to Non-Utility Generating Facilities (Pages No. 123-124A).

Rider No. 19 - Community Development for New Load has been added to Tariff No. 25 and to the Table of Contents.
Administerial update to the page numbering on the Table of Contents page. Rider No. 21 - Net Metering Service now reflects the addition of Page No. 136A which was added and approved in the Company's DSP IX proceeding at Docket No. P-2020-3019522, Order entered January 14, 2021.

Rider No. 23 - Home Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 24 - Fleet Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 25 - New Business Stimulus has been added to Tariff No. 25 and to the Table of Contents.
Rider No. 26 - Crisis Recovery Program has been added to Tariff No. 25 and to the Table of Contents.

Rules and Regulations
First Revised Page No. 7
The Electric Service Tariff
3.1 Definitions
(2) Applicant

Language has been added to clarify that the definition of "Applicant" includes non-residential applicants.

Rules and Regulations
First Revised Page No. 11
Contracts, Deposits and Advance Payments Cancelling Original Page No. 11 Rule No. 5 - Deposits and Advance Payments

Language has been modified to reflect that residential customers/applicants are permitted to pay their deposit in four (4) twenty-five percent (25\%) installments.

Language has been modified to clarify security deposits for non-residential customers/applicants.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

Rules and Regulations
First Revised Page No. 13
Installation of Service
Cancelling Original Page No. 13
Rule No. 6.1-Service Point
Language has been revised to accommodate the Company's proposed transportation electrification programs.

Rules and Regulations
First Revised Page No. 14
Installation of Service
Cancelling Original Page No. 14
Rule No. 7 - Supply Line Extensions
First Revised Page No. 15
Cancelling Original Page No. 15
First Revised Page No. 16
Cancelling Original Page No. 16
Language has been modified to clarify that both customers and applicants for service are subject to tariff cost commitment requirements.

Language has been modified to allow applicants (e.g., developers) to pay Contribution in Aid of Construction ("CIAC") on behalf of the ultimate customer.

Rules and Regulations
First Revised Page No. 19
Installation of Service Cancelling Original Page No. 19
Rule No 10-One Service of A Kind
Language has been modified to remove obsolete cross-reference.

Rules and Regulations
Second Revised Page No. 26
Measurement and Use of Service Cancelling First Revised Page No. 26
Rule No. 16.1-Interconnection, Safety and Reliability Requirements
New Rule No. 16.1 Interconnection, Safety and Reliability Requirements has been added to the tariff to clarify and memorialize the Company's existing process for customer generation interconnection (including facilities not eligible for net metering).

Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements on Second Revised Page No. 26, Cancelling First Revised Page No. 26.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

> CHANGES - (Continued)

Rules and Regulations
Original Page No. 26A
Measurement and Use of Service
Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements.

Rules and Regulations
First Revised Page No. 29
Company Property on Customer's Premises Cancelling Original Page No. 29
Rule No. 22.1 - Vegetation Management and Right-of-Way
Language has been added to clarify a customer's responsibility to manage vegetation around the Company's service facilities.

Rules and Regulations
First Revised Page No. 33
Discontinuance, Curtailment or Interruption of Electric Service
Cancelling Original Page No. 33
Rule No. 40 - Reconnection Charge
Language has been added to expand reconnection charge applicability to customers who apply for reconnection at the same premises more than thirty (30) days following disconnection (i.e., when then former customer now constitutes an "applicant").

Rules and Regulations
First Revised Page No. 34
Discontinuance, Curtailment or Interruption of Electric Service Cancelling Original Page No. 34
Rule No. 41 - Prohibition of Residential Master Metering
Language has been modified to allow residential master metering for certain low-income supportive housing pursuant to Rule No. 41.1.

Rules and Regulations
First Revised Page No. 34
Discontinuance, Curtailment or Interruption of Electric Service Cancelling Original Page No. 34
Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing
New Rule No. 41.1 Residential Master Metering for New Low-Income Supportive Housing has been added to the tariff to establish eligibility and conditions for master metering of certain low-income supportive housing.

Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing on First Revised Page No. 34, Cancelling Original Page No. 34.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

CHANGES - (Continued)

Rules and Regulations
Original Page No. 34A
General Provisions
Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing.

Rate RS - Residential Service
First Revised Page No. 38
Cancelling Original Page No. 38
Administerial revision to add the word "cents" back to the Energy Charge line to indicate "cents per kilowatt hour."

Rate GS/GM - General Service Small and Medium
First Revised Page No. 46
Cancelling Original Page No. 46
Language has been added to clarify eligibility.

Rate GS/GM - General Service Small and Medium
First Revised Page No. 48
Cancelling Original Page No. 48
Language has been modified to reflect current business practice.

Rate GL - General Service Large
First Revised Page No. 53
Cancelling Original Page No. 53
Language has been added to clarify eligibility.

Rate GLH - General Service Large Heating
First Revised Page No. 56 Cancelling Original Page No. 56

Language has been reorganized on the Rate Schedule to clarify that the Customer Distribution Charge is only applicable to the billing months of October through May.

Rate L -Large Power Service
First Revised Page No. 60 Cancelling Original Page No. 60

Language has been modified to reflect current business practice.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

CHANGES - (Continued)

| Rate HVPS -High Voltage Power Service | First Revised Page No. 62 |
| :---: | :---: |
|  | Cancelling Original Page No. 62 |
| Language has been added to clarify eligibility. |  |
| Rate HVPS -High Voltage Power Service | First Revised Page No. 63 Cancelling Original Page No. 63 |
| Language has been modified to reflect current business practice. |  |
| Rate AL - Architectural Lighting Service | First Revised Page No. 66 |
|  | Cancelling Original Page No. 66 |
| Language has been added to reflect that beginning January 15, 2022, Rate AL will no longer be available to new customers or applicants, or to new installations for existing customers. |  |
|  |  |
| Rate SE - Street Lighting Energy | First Revised Page No. 71 |
| Special Provisions - No. 5 | Cancelling Original Page No. 71 |
| Language has been modified to replace the word "men" with "workers." |  |
| Rate SM - Street Lighting Municipal | First Revised Page No. 72 |
|  | Cancelling Original Page No. 72 |
| Language has been added to reflect that beginning January 15, 2022, only LED lighting options will be installed for customers being served under Rate SM. |  |
|  |  |
| Language has been added to reflect that beginning January 15, 2022, the Company may replace existing high |  |
|  |  |
| sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of |  |
|  |  |

Rate SM - Street Lighting Municipal
First Revised Page No. 73
Cancelling Original Page No. 73
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Rate SM - Street Lighting Municipal
First Revised Page No. 74 Cancelling Original Page No. 74

Language has been modified to replace the word "his" with "its."

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

CHANGES - (Continued)
Rate SH - Street Lighting Highway $\quad$ First Revised Page No. 76

Language has been added to reflect that beginning January 15, 2022, Rate SH will no longer be available to new customers or applicants, or to new installations for existing customers.

Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Rate SH - Street Lighting Highway
First Revised Page No. 76 Cancelling Original Page No. 76

New LED lamp wattages have been inserted under Cobra Head fixtures.

Rate PAL - Private Area Lighting
First Revised Page No. 82
Cancelling Original Page No. 82
Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Rate PAL - Private Area Lighting
First Revised Page No. 82 Cancelling Original Page No. 82

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Rate PAL - Private Area Lighting
First Revised Page No. 84
Cancelling Original Page No. 84
Language has been modified to replace the word "his" with "its."

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

## CHANGES - (Continued)

Standard Contract Riders
Second Revised Page No. 87
Rider Matrix Cancelling First Revised Page No. 87
The Rider Matrix has been updated to reflect the addition of the following Riders:
Rider No. 4 - Federal Tax Adjustment Clause
Rider No. 7 - Residential Subscription Service Pilot
Rider No. 19 - Community Development for New Load

Standard Contract Riders
Second Revised Page No. 87
Rider Matrix
Cancelling First Revised Page No. 87
Riders No. 20 through Appendix A, previously found in the Rider Matrix on First Revised Page No. 87, Cancelling Original Page No. 87, have been moved to Original Page No. 87A to accommodate the additional Riders placed into the Tariff.
"Continued on Original Page No. 87A" has been added to the bottom of Second Revised Page No. 87, Cancelling First Revised Page No. 87, to indicate that the Rider Matrix continues onto the next page.

A Rider Matrix for Riders No. 20 through Appendix A, previously found on First Revised Page No. 87, Cancelling Original Page No. 87, has been created and is now found on Original Page No. 87A to accommodate the additional Riders placed into the Tariff.

Standard Contract Riders
Original Page No. 87A

## Rider Matrix

The Rider Matrix has been updated to reflect the addition of the following Riders:
Rider No. 23 - Home Charging Pilot Program
Rider No. 24 - Fleet Charging Pilot Program
Rider No. 25 - New Business Stimulus
Rider No. 26 - Crisis Recovery Program

Standard Contract Riders
First Revised Page No. 92
Rider No. 4 - Federal Tax Adjustment Clause Cancelling Original Page No. 92

Original Page No. 92A
Original Page No. 92B
Rider No. 4 - Federal Tax Adjustment Clause ("FTAC") is being added to Tariff No. 25 to provide for adjustments to base distribution revenue to reflect the effects of future increases or decreases in the federal corporate income tax rate.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

> CHANGES - (Continued)

Standard Contract Riders
First Revised Page No. 94
Rider No. 5 - Universal Service Charge Cancelling Original Page No. 94

The CAP participation level has been reset as per the provisions of Rider No. 5.

Standard Contract Riders
First Revised Page No. 97
Rider No. 7 - Residential Subscription Service Pilot
Cancelling Original Page No. 97
Rider No. 7 - Residential Subscription Service Pilot is being added to Tariff No. 25 to offer eligible customers the option to select a specified level of grid access for a set monthly charge.

Standard Contract Riders
Second Revised Page No. 100
Rider No. 8 - Default Service Supply
Cancelling First Revised Page No. 100
Fourth Revised Page No. 101
Cancelling First Revised Page No. 101
Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Standard Contract Riders
Second Revised Page No. 103
Rider No. 8 - Default Service Supply
Cancelling First Revised Page No. 103
In the "Calculation of Rates" section, the Docket No. has been updated in DSSa.

Standard Contract Riders
Third Revised Page No. 108
Rider No. 9 - Day-Ahead Hourly Price Service Cancelling Second Revised Page No. 108

Under the "Fixed Retail Administrative Charge" section, the Docket No. has been updated in FRA.

Standard Contract Riders
Third Revised Page No. 112
Rider No. 10 - State Tax Adjustment Cancelling Second Revised Page No. 112

Rider No. 10 - State Tax Adjustment has been modified to reflect that Part 1 of the STAS has been set to zero.

Standard Contract Riders
First Revised Page No. 123
Rider No. 16 - Service to Non-Utility Generating Facilities
Cancelling Original Page No. 123
First Revised Page No. 124
Cancelling Original Page No. 124
Rider No. 16 - Service to Non-Utility Generating Facilities has been modified to reflect changes in applicable terms, rules, and rates.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

> CHANGES - (Continued)

Standard Contract Riders
First Revised Page No. 128
Rider No. 19 - Community Development
Cancelling Original Page No. 128
Original Page No. 128A
Rider No. 19 - Community Development for New Load is being added to Tariff No. 25 to provide incentives to eligible customers to move and/or expand their operations within the Company's service territory.

Standard Contract Riders
First Revised Page No. 133
Rider No. 21 - Net Metering Service
Cancelling Original Page No. 133
First Revised Page No. 134
Cancelling Original Page No. 134
Second Revised Page No. 135
Cancelling First Revised Page No. 135
Second Revised Page No. 136
Cancelling First Revised Page No. 136
First Revised Page No. 136A
Cancelling Original Page No. 136A
Rider No. 21 - Net Metering Service has been revised to include Rate Schedule GLH and Rate Schedule L.

Standard Contract Riders
First Revised Page No. 134
Rider No. 21 - Net Metering Service
Cancelling Original Page No. 134
Language has been modified to reflect current business practice.

Standard Contract Riders
Seventh Revised Page No. 137
Rider No. 22 - Distribution System Improvement Charge Cancelling Sixth Revised Page No. 137

Rider No. 22 - Distribution System Improvement Charge ("DSIC") has been modified to reflect that it has been set to zero.

Standard Contract Riders
Original Page No. 141A-141B
Rider No. 23 - Home Charging Pilot Program
Rider No. 23 - Home Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to residential customers participating in the Company's voluntary Home Charging Pilot.

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

> CHANGES - (Continued)

Standard Contract Riders
Original Page No. 141C-141E
Rider No. 24 - Fleet Charging Pilot Program
Rider No. 24 - Fleet Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to non-residential customers participating in the Company's voluntary Fleet Charging Pilot.

Standard Contract Riders
Original Page No. 141F
Rider No. 25 - New Business Stimulus
Rider No. 25 - New Business Stimulus is being added to Tariff No. 25 to incent eligible new small or medium businesses by providing them with a reduced distribution rate for two (2) years.

Standard Contract Riders
Original Page No. 141G
Rider No. 26 - Crisis Recovery Program
Rider No. 26 - Crisis Recovery Program is being added to Tariff No. 25 to provide a relief program for eligible existing small or medium business customers who have accumulated a delinquent balance because of COVID-19 business restrictions.

Appendix A - Transmission Service Charges
Second Revised Page No. 143 Cancelling First Revised Page No. 143

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

INCREASES

Rate RS - Residential Service
First Revised Page No. 38 Cancelling Original Page No. 38

Rate RH - Residential Service Heating
First Revised Page No. 40 Cancelling Original Page No. 40

Rate RA - Residential Service Add-On Heat Pump
First Revised Page No. 43 Cancelling Original Page No. 43

Rate GS/GM - General Service Small and Medium
First Revised Page No. 46
Cancelling Original Page No. 46

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

INCREASES - (Continued)

| Rate GMH - General Service Medium Heating | First Revised Page No. 50 |
| :---: | :---: |
|  | Cancelling Original Page No. 50 |
|  | First Revised Page No. 51 |
|  | Cancelling Original Page No. 51 |
| Rate GL - General Service Large | First Revised Page No. 53 |
|  | Cancelling Original Page No. 53 |
| Rate GLH - General Service Large Heating | First Revised Page No. 56 |
|  | Cancelling Original Page No. 56 |
|  | First Revised Page No. 57 |
|  | Cancelling Original Page No. 57 |
| Rate L-Large Power Service | First Revised Page No. 59 |
|  | Cancelling Original Page No. 59 |
| Rate HVPS - High Voltage Power Service | First Revised Page No. 62 |
|  | Cancelling Original Page No. 62 |
| Rate AL - Architectural Lighting Service | First Revised Page No. 66 |
|  | Cancelling Original Page No. 66 |
| Rate SE - Street Lighting Energy | First Revised Page No. 69 |
|  | Cancelling Original Page No. 69 |
| Rate SM - Street Lighting Municipal | First Revised Page No. 72 |
|  | Cancelling Original Page No. 72 |
|  | First Revised Page No. 73 |
|  | Cancelling Original Page No. 73 |
|  | First Revised Page No. 74 |
|  | Cancelling Original Page No. 74 |
| Rate SH - Street Lighting Highway | First Revised Page No. 76 |
|  | Cancelling Original Page No. 76 |
| Rate UMS - Unmetered Service | First Revised Page No. 80 |
|  | Cancelling Original Page No. 80 |
| Rate PAL - Private Area Lighting | First Revised Page No. 82 |
|  | Cancelling Original Page No. 82 |
|  | First Revised Page No. 84 |
|  | Cancelling Original Page No. 84 |

## LIST OF MODIFICATIONS MADE BY THIS TARIFF

INCREASES - (Continued)

Rider No. 10 - State Tax Adjustment
Third Revised Page No. 112
Cancelling Second Revised Page No. 112
Rider No. 10 - State Tax Adjustment has been modified to reflect that Part 1 of the STAS has been set to zero.

DECREASES

Rate SM - Street Lighting Municipal
First Revised Page No. 73 Cancelling Original Page No. 73

Rate PAL - Private Area Lighting First Revised Page No. 82 Cancelling Original Page No. 82

Unit pricing has changed resulting in decreases.

Rider No. 22 - Distribution System Improvement Charge

Rider No. 22 - Distribution System Improvement Charge has been modified to reflect that it has been set to zero.

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## RULES AND REGULATIONS - (Continued)

## THE ELECTRIC SERVICE TARIFF - (Continued)

## 3. APPLICATION - (Continued

The supply of electricity may be provided by the Company or by an alternative Electric Generation Supplier ("EGS"). Rates for the supply of electricity shall apply per applicable tariffs of the Company or the EGS.

### 3.1 DEFINITIONS

(1) Aggregator or Market Aggregator - An entity, licensed by the Commission, which purchases electric energy and takes title to electric energy as an intermediary for sale to retail customers.
(2) Applicant - An entity that applies for service provided by the Company. With respect to residential applicants, "applicant" means a A-natural person not currently receiving service who applies for residential service provided by a public utility or any adult occupant whose name appears on the mortgage, deed or lease of the property for which the residential utility service is requested. The term does not include a person who, within thirty (30) days after service termination or discontinuance of service, seeks to have service reconnected at the same location or transferred to another location within the service territory of the Company.
(3) Basic Services - The services necessary for the physical delivery of electricity service such as supply, including default service, transmission and distribution. Unless directed otherwise, "electric service" or "service" used throughout this tariff have the same meaning.
(4) Bill Ready - A form of consolidated billing where Duquesne Light provides a customer's usage to its electric generation supplier ("EGS") and the EGS then calculates the customer's charges and sends the line item(s) back to the Company to be presented on the supplier portion of the bill.
(5) Broker or Marketer - An entity, licensed by the Commission, which acts as an agent or intermediary in the sale and purchase of electric energy but does not take title to electric energy.
(6) Commission - The Pennsylvania Public Utility Commission.
(7) Company - Duquesne Light Company.
(8) Customer -Any person, partnership, association, corporation or other legal entity lawfully receiving service from the Company. Unless indicated otherwise, "retail customer" and "customer" used throughout this tariff shall have the same meaning. A residential customer is a natural person in whose name a residential service account is listed and who is primarily responsible for payment of bills rendered for the service or any adult occupant whose name appears on the mortgage, deed or lease of the property of which the residential utility service is requested. The term includes a person who, within thirty (30) days after service termination or discontinuance of service, seeks to have service reconnected at the same location or transferred to another location within the service territory of the public utility.
(9) Default Service - The Company will provide electricity to the customer in the event that a customer: 1) elects not to obtain electricity from an EGS; 2) elects to have the Company supply electricity after having previously purchased electricity from an EGS; 3) contracts with an EGS who fails to supply electricity, or 4) has been returned to Default Service by the EGS under circumstances as described in Rule No. 45.2 of this tariff.

## RULES AND REGULATIONS - (Continued)

## CONTRACTS, DEPOSITS AND ADVANCE PAYMENTS - (Continued)

## 5. DEPOSITS AND ADVANCE PAYMENTS - (Continued)

The Company may also use an applicant or customer credit score from a third party credit agency as a means to establish creditworthiness. The credit score in the report will be based in part on previous utility billing history and will use a commercially recognized credit scoring methodology that is within the range of generally accepted industry practices to determine whether security or advance payments are required to establish service. The Company may request a government issued photo ID of any applicant to verify the application.

Where the Company requires a deposit from a residential customer or applicant, the amount of the deposit will be based on Company charges in an amount that is equal to one-sixth of the applicant's estimated annual bill or onesixth of the actual average annual bill for existing customers at the premises, provided that_ tine minimum deposit amount for non-residential customers and applicants shall be $\$ 250.00$. In accordance with Commission regulations, the doposit shall be payable during the 90 -day period commencing wWhen the Company determines a deposit is required whether-for new service or for deposits required upon-reconnection of service as described in Rule No. $40_{2-\text { - such }}$ deposit shall be payable within a reasonable time period after commencing or reconnecting electric service. Failure to pay a required deposit within the time period noted above-may result in termination of service consistent with Commission regulations. An applicant or existing customer may furnish a third party guarantor in lieu of a cash deposit, with the provision of a written guaranty setting forth the terms therein. The guarantor will be responsible for all missed payments of the applicant or customer.

The Company will pay interest on residential cash deposits computed at the simple annual interest rate determined by the Commonwealth of Pennsylvania's Secretary of Revenue. The interest rate in effect when the deposit is required to be paid shall remain in effect until the later of the date the deposit is refunded or credited or December 31. On January 1 of each year, the new interest rate for that year will apply to the deposit. For all other cash deposits, the Company will pay interest at the lower of the average of 1 -year Treasury Bills for September, October and November of the previous year beginning May 1, 1995 and January 1, 1996 and each year thereafter, or six percent per annum without deduction for any taxes thereon, provided that interest accrued prior to April 14, 1995 shall be calculated at $6 \%$. On deposits held for more than one year, accrued interest will be paid at the end of each anniversary year. Upon the return of a deposit, any unpaid interest accrued thereon will be paid.

Deposits secured from a residential applicant or customer shall be returned to the depositor when a timely payment history has been established. A timely payment history is established when a customer has paid undisputed bills in full and on time for twelve (12) consecutive months. Should a customer become delinquent prior to establishing a timely payment history, the Company may deduct the outstanding balance from the deposit. Deposits secured from other than residential customers shall be returned to the depositor upon annual review provided such depositor shall have paid undisputed bills during those consecutive twelve (12) months without having service terminated and without having paid the bill subsequent to the due date so long as the customer is not currently delinquent. Payment of any disputed bill, where the payment is withheld beyond the due date set forth on the face of the bill at issue and the dispute over which is terminated substantially in favor of the customer, shall be made by the customer within fifteen (15) days following the termination of that dispute in order to be deemed timely. Where service is discontinued, the deposit and unpaid interest accrued thereon to the date of discontinuance of service, less the amount of all bills due the Company, will promptly be paid to the customer.

For purposes of all of the provisions of this Rule No. 5, when a customer resides at a place of business or commercial establishment, legitimately served pursuant to a commercial or industrial rate schedule, that is not a residential dwelling unit attached thereto, the customer is not thereby entitled to any of the protections in the Pennsylvania Public Utility Code or the Commission's regulations implementing the Pennsylvania Public Utility Code, or to any of the provisions of these rules or this Tariff, that apply exclusively to deposits for residential customers.

## RULES AND REGULATIONS - (Continued)

## INSTALLATION OF SERVICE - (Continued)

6.1 SERVICE POINT The Service Point for the customer's service installation shall depend on the customer's type of service. The Service Point shall generally be designated as follows:

| Type of Service | Service Point |
| :--- | :--- |
| Service voltage greater than 600V | $\begin{array}{l}\text { Metering terminals, or for transformed service, } \\ \text { secondary transformer terminals }\end{array}$ |
|  | Service drop |
| Overhead service at voltage less than 600V | $\begin{array}{l}\text { For underground service from overhead secondary } \\ \text { lines: the service lateral connection to Company } \\ \text { pole. }\end{array}$ |
| $\begin{array}{l}\text { Underground service at voltage less than } \\ 600 \mathrm{~V}\end{array}$ | $\begin{array}{l}\text { For underground service from underground spot } \\ \text { networks: the network protector spade(s). }\end{array}$ |
|  | $\begin{array}{l}\text { For underground service from street secondary } \\ \text { underground networks: the collector bus. }\end{array}$ |
| $\begin{array}{l}\text { For three-phase transformed underground service: } \\ \text { the secondary transformer terminal. }\end{array}$ |  |
| In Underground Residential Developments covered |  |
| by Rule No. 13.2: the meter base. |  |$\}$| For other underground service from underground |
| :--- |
| secondary lines: the terminal box. |

The Company reserves the right to designate an alternative Service Point, at its sole discretion, for customers with atypical or specialized service configurations, or customers participating in the Company's EV ChargoUp-electric vehicle pilot program(s) for electric vehicle charging stations.

The Company shall not be required to install or maintain any conductors, meter base, equipment or apparatus beyond the Service Point except meter and meter accessories, as applicable; ,boyond the Service Point and electric vehicle charging stations and/or make-ready infrastructure, as applicable, for customers participating in the Company's applicable electric vehicle pilot program(s).

## 7. SUPPLY LINE EXTENSIONS

## A. Definitions

For the purposes of this rule, the following definitions are applicable:
(1) Contractor cost - The amount paid to a contractor for work performed on a line extension.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## A. Definitions - (Continued)

(2) Direct labor cost - The pay and expenses of public utility employees directly attributable to work performed on line extensions, but does not include construction overheads or payroll taxes, workers' compensation expenses, or similar expenses.
(3) Direct material cost - The purchase price of materials used for a line extension, but does not include the related stores expenses. In computing direct material costs, proper allowance should be made for unused materials recovered from temporary structures, and discounts allowed and realized in the purchase of materials.
(4) Total construction cost - The contractor cost, direct labor cost, direct material cost, stores expense, construction overheads, payroll taxes, workers' compensation expenses, or similar expenses.
(5) Current Year - For purposes of calculating a revenue guarantee, current year shall be each consecutive period of twelve (12) calendar months following the date permanent electric delivery service was first provided to a customer or applicant.
(6) Income Tax - Federal and State tax relating to the tax liability of contributions in aid-ofconstruction ("CIAC").

## B. Overhead Areas

(1) In areas where the existing supply lines are overhead, the Company will construct and maintain extensions of all single-phase overhead supply lines operating at 23,000 volts or less to approximately 100 feet within the customer's or applicant's property line without a guarantee of revenue.
(2) In areas where the existing supply lines are overhead, the Company will construct and maintain extensions of all three-phase overhead supply lines, operating at 23,000 volts or less, which are usable as a part of its general supply system without a guarantee of revenue. When the three-phase supply line extension is to supply service exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant over a period of five years which is sufficient to recover the actual total construction cost of the three-phase overhead line extension, less the estimated total construction cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## C. Underground Areas

(1) In areas where the existing supply lines are underground outside the limits of a residential development covered by Tariff Rule 13.2, the Company will construct and maintain extensions of all single-phase underground supply lines operating at 23,000 volts or less which are usable as part of its general supply system without a guarantee of revenue. When the single-phase supply line extension is to supply electricity exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant, over a period of five years which is sufficient to recover the actual total contractor cost, direct labor cost and direct material cost for the full length of the single-phase underground line extension, less the estimated total contractor cost, direct labor cost, and direct material cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.
(2) In areas where the existing supply lines are underground outside of the limits of a residential development covered by Tariff Rule 13.2, the Company will construct and maintain extensions of all three-phase underground supply lines operating at 23,000 volts or less which are usable as part of its general supply system without a guarantee of revenue. When the three-phase supply line extension is to supply service exclusively to a single customer or applicant, such a supply line will be extended to the customer's or applicant's property line only if a guarantee of revenue is provided by the customer or applicant over a period of five years which is sufficient to recover the actual total construction cost of the three-phase underground line extension, less the estimated total construction cost for an equivalent single-phase overhead line extension. In the event that a revenue guarantee is not sufficient to recover the estimated total cost of the construction, or if the Company determines that the extension is speculative, or the customer or applicant represents a credit risk, the Company may require an up-front contribution in aid of construction (CIAC) from the customer or applicant to recover the total cost of construction. A customer or applicant may choose the option to make a CIAC rather than utilize a revenue guarantee. The Company will consider financing alternatives, such as a letter of credit or other payment arrangements, in lieu of a CIAC when appropriate. Any additional CIAC payment required will include the related income tax.

## D. Rights-of-Way

Before construction of a line extension, satisfactory rights of way and other necessary permits must be granted to the Company for the construction of the supply line extension along the route selected by the Company. The customer or applicant agrees to pay the Company any initial and recurring rights-of-way or license fees in excess of an amount normally incurred by the Company in constructing and maintaining the supply line extension.

# RULES AND REGULATIONS - (Continued) 

## INSTALLATION OF SERVICE - (Continued)

## 7. SUPPLY LINE EXTENSIONS - (Continued)

## E. Revenue Guarantees

The revenue guarantee amount shall be the estimated combined cost of (i) the line extension and (ii) other new Company facilities necessary to serve the customer or applicant. The annual revenue guarantee amount shall be the revenue guarantee amount, divided by the number of years in the guarantee period. The annual revenue guarantee amount will be reviewed yearly and will be adjusted to the minimum charges as provided in the applicable rate schedule on the following basis:
(1) When the total of the monthly Company delivery charges at the end of the current year is less than the annual revenue guarantee amount, a payment equal to the difference plus the related income tax where applicable shall be immediately due and payable.
(2) When the total of the monthly Company delivery charges within the number of years in the guarantee period equals or exceeds the revenue guarantee amount, no further payments toward the revenue guarantee amount are required. Any prior payments in excess of the revenue guarantee amount, except for otherwise-applicable charges for electric service, will be refunded with accrued interest.
(3) If an additional customer is served from the line extension, the revenue guarantee amount will be reduced to the cost of the line extension which is used exclusively to serve the single customer. If the cost of the line extension to serve the new customer would increase the revenue guarantee amount for an existing customer, the extension shall be considered as a new line extension.
(4) In the event the customer discontinues or cancels service before the end of the guarantee period, the balance of the revenue guarantee amount plus the related income tax where applicable shall be immediately due and payable.

## F. Contributions in Aid of Construction

The Contribution in Aid of Construction (CIAC) will be refunded to the customer over the five-year revenue guarantee period to the extent that the revenue from the customer satisfies the revenue guarantee.
(1) When the total of the monthly Company delivery charges at the end of the current year is greater than or equal to one-fifth of the CIAC, a refund of one-fifth of the CIAC will be made to the customer.
(2) When the total of the monthly Company delivery charges at the end of the current year is less than one-fifth of the CIAC, a refund of one-fifth of the CIAC less the revenue shortfall will be made to the customer.

## RULES AND REGULATIONS - (Continued)

## INSTALLATION OF SERVICE - (Continued)

## 9. RELOCATIONS OF FACILITIES - (Continued)

## C. Other Company Facilities for all Customers

When requested or required by the action of a customer or a third party, relocation of Company facilities, except those covered under Section A of this Rule, will be performed by the Company upon receipt, in advance, of the Company's estimated total direct and indirect costs including the related income tax of such relocations from the customer or such third party. The Company may waive charges under this rule if, in the Company's judgment, the location of the Company's existing supply line and/or service line on the customer's property restricts the growth of the customer's operations and the potential increase in the Company's revenues.
10. ONE SERVICE OF A KIND Only one service of each type as to voltage and phase will be provided to a customer under one contract; provided, however, that when, in the judgment of the Company, standard electric servicecompliance with Rule No. 17, Fluctuations and Unbalancos; may be most economically effected by establishing a separate service connection for a portion of the customer's load, such separate service connection may, at the option of the customer, be combined, notwithstanding similarity as to voltage and phase, with other service connections under a single contract for the customer's entire electric delivery service requirements at the affected location. Electric service at different premises, regardless of voltage or phase, shall never be combined for billing under one account for the purpose of reducing Company charges.
11. METER SUPPORTS The customer shall provide on the premises, at a location satisfactory to the Company, proper space, supports, and enclosures for metering equipment.
12. TRANSFORMERS AND CONTROL EQUIPMENT Where, in the judgement of the Company, it is necessary to install transformers and other control or protective equipment on the customer's premises, the customer shall provide a suitable place, foundation and housing for such installation, in accordance with the Company's "Electric Service Installation Rules."
13. CUSTOMER'S FACILITIES The installation and maintenance of the customer's wiring and equipment shall be in accordance with the Company's "Electric Service Installation Rules" and shall be subject to the approval of the proper authorities. The Company is not required to provide electric service thereto unless so approved, but does not assume any responsibility for securing such approval. The Company shall not be liable for damages or injuries resulting from any defects in the customer's wiring or equipment.

### 13.1 UNDERGROUND DISTRIBUTION

A. When the Company is required by governmental order or enters into agreements with redevelopment authorities, a private real estate developer or a group of customers to change its distribution supply lines from overhead to underground, customers receiving or to receive electric service at voltages of 600 volts or less from these supply lines shall provide at their own expense the necessary facilities for receiving such underground service.

## RULES AND REGULATIONS - (Continued)

## MEASUREMENT AND USE OF SERVICE - (Continued)

16.1 INTERCONNECTION, SAFETY AND RELIABILITY REQUIREMENTS In order to assure the integrity and safe operation of the Company's system and to permit the continuation of reliable service to other customers, the following requirements and standards apply to all types of Generating Facilities, including customer owned generation and customer owned energy storage systems, desiring to interconnect with the Company's system.

All generation operations shall be performed in a safe, reasonable and competent manner in accordance with prudent electric practices in order to, among other things, preserve and protect the Company's electric system.

All Generating Facilities shall submit a written application to the Company for acceptance of interconnected operation of their facilities with the Company's system prior to engaging in such interconnected operations. The Company may require, among other things, the following as part of any application submitted by an Applicant/Customer for service under this Rule No. 16.1.

1. Plans, specifications and location of the proposed installation.
2. Single line diagrams and details, including relay settings, of the proposed protection schemes.
3. Instruction manuals for all protective components.
4. Component specifications and internal wiring diagrams of protective components, if not provided in instruction manuals.
5. Generator data required to analyze fault contributions and load current flows including, but not limited to, equivalent impedances, time constants and harmonic distortions.
6. The rating of all protective equipment if not provided in instruction manuals.
7. All such other information that may be required by the Company.

Paralleling customer generation with the Company's system, including closed transition of customer back-up generation, shall be permitted only upon the written consent of the Company.
17. FLUCTUATIONS AND UNBALANCES The customer's use of electric service shall not cause fluctuating loads or unbalanced loads of sufficient magnitude to impair the service to other customers or to interfere with the proper operation of the Company's facilities. The Company may require the customer to make such changes in his equipment or use thereof, or to install such corrective equipment, as may be necessary to eliminate fluctuating or unbalanced loads; or, where the disturbances caused thereby may be eliminated more economically by changes in or additions to the Company's facilities, the Company will, at the request of the customer, provide the necessary corrective facilities at a reasonable charge. Payment will be made in full in advance for supplying special equipment installed under this Rule.
18. REDISTRIBUTION All electric energy shall be consumed by the customer to whom the Company supplies and delivers such energy, except that (1) the customer owning and operating a separate office building, and (2) any other customer who, upon showing that special circumstances exist, obtains the written consent of the Company may redistribute electric energy to tenants of such customer, but only if such tenants are not required to make a specific payment for such energy.

This Rule shall not affect any practice undertaken prior to June 1, 1965. See Rule No. 41 for special requirements for residential dwelling units in a building.

## RULES AND REGULATIONS - (Continued)

## MEASUREMENT AND USE OF SERVICE - (Continued)

18.1 ELECTRIC VEHICLE CHARGING Electricity sales by a person, corporation or other entity, not a public utility, owning and operating an electric vehicle charging facility for the sole purpose of recharging an electric vehicle battery for compensation are not construed to be sales to residential consumers and therefore do not fall under the pricing requirements of $66 \mathrm{~Pa} . \mathrm{C} . \mathrm{S} . \S 1313$. Further, for purposes of third party-owned electric vehicle charging stations, charging the electric vehicle shall not be considered redistribution as defined in Rule No. 18 Redistribution. For the purposes of this Rule No. 18.1, electric vehicles are defined as any vehicle licensed to operate on public roadways that are propelled in whole or in part by electrical energy stored on-board for the purpose of propulsion. Types of electric vehicles include, but are not limited to, plug-in hybrid electric vehicles and battery electric vehicles. Electric vehicle charging stations shall be made in accordance with the Company's "Electric Service Installation Rules," a copy of which may be found at www.duquesnelight.com. The station must be designed to protect for back flow of electricity to the Company's electrical distribution circuit as required by Company rules. The Company shall not be liable for any damages associated with operation of the charging station. For stations dedicated solely for the purpose of charging electric vehicles wherein a third party owns the charger and allows an electric vehicle owner to use their facility to charge an electric vehicle, the owner of the charging facility shall notify the Company at least one hundred twenty (120) days in advance of the planned installation date and may be required to install metering for the station as determined by the Company. The third party owner of the station shall be responsible for all applicable Tariff rates, fees and charges. For such installations, the electric vehicle owner shall be responsible for all fees imposed by the owner of the station for charging the electric vehicle.
19. CONTINUITY AND SAFETY The Company will use all reasonable care to provide safe and continuous delivery of electricity but shall not be liable for any damages arising through interruption of the delivery of electricity or for injury to persons or property resulting from the use of the electricity delivered.

## RULES AND REGULATIONS - (Continued)

## COMPANY PROPERTY ON CUSTOMER'S PREMISES - (Continued)

22.1. VEGETATION MANAGEMENT AND RIGHT-OF-WAY The customer, applicant, or property owner shall provide, without charge to the Company, right-of-way and access across property owned or controlled by customer/applicant/property owner, and locations and housings which are suitable, in the opinion of Company, for the construction, reconstruction, maintenance or operation of Company facilities that serve the customer/applicant/property owner. Suitable right-of-way includes, but is not limited to, the right of ingress and egress to and from the electric facilities for any of the purposes aforesaid; and also the right to prune, cut or remove trees, underbrush and other obstructions which, in the judgment of Company, may at any time interfere with the construction, reconstruction, maintenance or operation of the electric facilities, and in connection therewith, the right to treat with herbicides approved for the removal and control of trees, brush and undergrowth. The Company shall also have all of the aforesaid rights related to its provision of underground service to a customer/applicant/property owner, even if the Company does not require the customer/applicant/property owner to execute a formal right-ofway document. Notwithstanding the foregoing, the customer/applicant/property owner shall be responsible for vegetation management on the customer/applicant/property owner's property, as necessary, to prevent vegetation from interfering with the service line(s) on the premises. Any vegetation management within ten (10) feet of an energized electric utility line must be performed by qualified line clearance personnel.
23. CUSTOMER'S RESPONSIBILITY The customer shall protect the property of the Company on the premises and shall not permit access thereto except by authorized representatives of the Company.
24. TAMPERING Where evidence is found that the service wires, meters, switch box or other appurtenances on the customer's premises have been tampered with, the customer shall be required to bear all costs incurred by the Company for investigations and inspections, and for such protective equipment as, in the judgment of the Company, may be necessary (including the relocation of inside metering equipment to an accessible outside location); and in addition, where the tampering has resulted in improper measurement of the electricity delivered, the customer shall be required to pay for such electric delivery service, and any Company supplied electricity, including interest at the Late Payment Charge rate, as the Company may estimate, from available information to have been used but not registered by the Company's meters.

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE

25. REPAIRS OR LOSSES The customer shall pay the Company for any repairs to or any loss of the Company's property on the premises when such repairs are necessitated, or loss occasioned, by negligence on the part of the customer or failure to comply with the rules and regulations under which service is furnished.
26. ARREARS The Company upon reasonable notice may terminate electric service and remove its equipment from the premises for nonpayment of undisputed Company service charges, Company charges as the default service charges or EGS receivables purchased by the Company up to the amount that the customer would have paid under Default Service rates during the non-payment period, pursuant to Duquesne's Electric Generation Supplier Coordination Tariff Rule No. 12.1.7. When a residential customer or a residence is involved, the Company will comply with the provisions of 52 Pa. Code Chapter 56, "Standards and Billing Practices for Residential Utility Service" and 66 Pa.C.S. § 1406, "Termination of Utility Service."
26.1 COLLECTION REVIEW The Company shall review accounts for collection purposes as reasonable and appropriate. The Company may pursue all lawful means of collection of accounts as permitted by applicable law.

## RULES AND REGULATIONS - (Continued)

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE - (Continued)

### 39.2 EMERGENCY ENERGY CONSERVATION - (Continued)

When a state of emergency is declared by the Governor, or other appropriate governmental authority, and during the period of that emergency, upon notification of the customer by the Company, the customer shall take the actions required by the procedures for emergency energy conservation. During the period of that emergency the appropriate customers will be billed under the provisions of Rider No. 17 - Emergency Energy Conservation.

The Company may revise such procedures from time to time, and shall revise them if so required by the Pennsylvania Public Utility Commission. A copy of such procedures or of the revision thereof currently in effect shall be kept available for public inspection at each office at which the Company maintains a copy of its tariff for public inspection, and another such copy shall be kept on file with the Commission's Bureau of Conservation, Economics and Energy Planning.
40. RECONNECTION CHARGE Where service has been discontinued under the terms of Rules No. 26 through 36 , inclusive, the Company reserves the right as a condition precedent to the reconnection of service to require the payment of all arrearages for Company charges and payment of a deposit as described in Rule No. 5, and to require the payment of the following appropriate reconnection charge:
A. $\$ 50.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the meter.
B. $\$ 250.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the pole.
C. $\$ 250.00$ for resumption of electric service to the same customer or applicant within a year of the service disconnection or termination when the connection is an aerial tap.
D. $\$ 89.00$ for reconnection of a transformer to the same General Service customer or applicant within a year of the service disconnection or termination.
E. $\$ 20.00$ for resumption of electric service where a remote capable meter has been installed and in which resumption of service is to the same customer or applicant within a year of the service disconnection or termination where service has been disconnected at the meter.

When a residential customer or residence or residential applicant is involved, the Company will comply with the provisions of 52 Pa . Code Chapter 56, "Standards and Billing Practices for Residential Utility Service" and 66 Pa.C.S. § 1406, "Termination of Utility Service."

Where electric service has been discontinued upon the request of the customer or applicant and where the customer or applicant requests that service be reconnected at the same location within a period of one year from the date that electric service was discontinued, the Company reserves the right as a condition precedent to the reconnection of service to require the payment of all arrearages for Company charges which will consist of the minimum charge applicable to such customer's or applicant's service during the period of discontinuance.

Where electric service to a non-residential customer or applicant has been terminated under the terms of Rules No. 30 and/or 34, and such condition was the direct result of tampering, the Company reserves the right as a condition precedent to the reconnection of service to require payment of all costs incurred by the Company for investigations and inspections, and for such protective equipment deemed necessary by the Company.

## RULES AND REGULATIONS - (Continued)

## DISCONTINUANCE, CURTAILMENT OR INTERRUPTION OF ELECTRIC SERVICE - (Continued)

41. PROHIBITION OF RESIDENTIAL MASTER METERING Except as provided in Rule No. 41.1 herein, Eeach residential dwelling unit in a building must be individually metered by the Company for buildings connected after January 1, 1981. For the purposes of the Rule, a dwelling unit is defined as:

One or more rooms for the use of one or more persons as a housekeeping unit with space for eating, living, and sleeping, and permanent provisions for cooking and sanitation.

This Rule does not preclude the use of a single meter for the common areas and common facilities of a multi-tenant building.

This Rule shall not affect any practice undertaken prior to January 1, 1981.
41.1 RESIDENTIAL MASTER METERING FOR NEW LOW-INCOME SUPPORTIVE HOUSING Notwithstanding anything in Rule No. 41 to the contrary, a single meter may be used for certain multi-tenant premises ("master metering"), where the premises:

1. Is a new service;
2. Is master-metered through entire premises (i.e., no individual tenant meters);
3. Has a minimum of four (4) dwelling units; and
4. Is low-income supportive housing (i.e., housing that is permanently available to low-income tenants where the housing provider is responsible for utility bills).

To be eligible to master-meter a given residential building, in addition to satisfying the other criteria herein, a provider of low-income housing must either:

1. Show that the building is a Public Housing Authority development, or
2. Certify that all tenants are (i) eligible for a Housing Choice Voucher (HCV), available to residents who make $50 \%$ or less of the median family income, or (ii) have household incomes equal to or less than $150 \%$ of federal poverty guidelines.

Customers permitted to use master metering under this Rule must also, on a continuing basis:

1. Annually certify their on-going conformance to the above criteria; and
2. Participate in each of the Company's applicable energy efficiency, conservation, and/or usage reduction programs.

The Company may retain the customer's security deposit, paid pursuant to Rule No. 5 , for the entire duration of the master metering arrangement.

If a customer using master metering under this Rule fails to comply with any of the foregoing eligibility criteria or ongoing requirements, the Company may require the customer to reconfigure the customer's electrical equipment, at customer expense, to allow the Company to separately meter each dwelling unit.

RULES AND REGULATIONS - (Continued)

## GENERAL PROVISIONS

42. METER TESTING The Company will inspect or test the accuracy of a meter at the request of the customer or an EGS for whom the meter registers service, but reserves the right to require payment of the fees set forth in 52 Pa . Code § 57.22 for such test.
43. OTHER SERVICES The Company may, where possible, provide and charge a reasonable fee for services including, but not limited to, energy audits, equipment inspections, technical reports and other similar services, at the request of the customer. Where possible, the Company will give an advanced, written estimate of the cost to provide the service.

## 44. THIS RULE INTENTIALLY LEFT BLANK

45. SUPPLIER SWITCHING The Company will accommodate requests by customers to switch EGSs in accordance with 52 Pa. Code, Chapter 57, Subchapter M "Standards for Changing a Customers Electricity Generation Supplier."

Customers who elect to return to the Company from an EGS will return at the charges of the applicable rate.
In compliance with the Commission's Order at Docket No. L-2014-2409383, the Company shall preserve all records relating to unauthorized change of EGS or change to Default Service disputes for three (3) years from the date the customer filed the dispute. These records shall be made available to the Commission or its staff upon request.

Switching by customers shall occur in accordance with the direct access procedures and in accordance with the provisions contained in this Tariff and the Company's EGS Coordination Tariff.

## RATE RS - RESIDENTIAL SERVICE

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, and general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

Customer Charge $\qquad$
Energy Charge $\qquad$ 6.0233-7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

## RATE RH - RESIDENTIAL SERVICE HEATING

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise, and as the sole primary method of space heating except that the space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

Customer Charge
$\$ 12.50 \$ 16.25$

Winter Monthly Rate — For the Billing Months of November through April:
Energy Charge 4.56776 .3410 cents per kilowatt hour

Summer Monthly Rate - For the Billing Months of May through October:
Energy Charge 6.0233-7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

## RATE RA - RESIDENTIAL SERVICE ADD-ON HEAT PUMP

## AVAILABILITY

Available to residential or combined residential and farm customers using the Company's standard low voltage service for lighting, appliance operation, general household purposes and for commercial or professional activity where associated consumption represents less than $25 \%$ of the total monthly usage at the premise, and an add-on heat pump for space heating. Other energy sources may be used to supplement the add-on heat pump provided that the supplemental energy source is thermostatically controlled to operate only when the outdoor temperature falls to at least $40^{\circ} \mathrm{F}$ and the add-on heat pump cannot provide the total heating requirements.

Available only when supplied at 240 volt (or less) single phase service through a single meter directly by the Company to a single family dwelling or to an individual dwelling unit in a multiple dwelling structure. For the purposes of this rate, a dwelling unit is defined as one or more rooms arranged for the use of one or more individuals for shelter, sleeping, dining, and with permanent provisions for cooking and sanitation.

## MONTHLY RATE

## DISTRIBUTION CHARGES

Customer Charge
$\$ 12.50 \$ 16.25$

Winter Monthly Rate — For the Billing Months of November through April:
Energy Charge ..........................................................................1.6394-2.7631 cents per kilowatt hour

Summer Monthly Rate - For the Billing Months of May through October:
Energy Charge .6.0233-7.0564 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for residential customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to residential customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.
(I) - Indicates Increase

ISSUED: APRIL 16, 2021

## RATE GS/GM - GENERAL SERVICE SMALL AND MEDIUM

## AVAILABILITY

Available for all the standard electric service taken on a small or medium general service customer's premises for which a residential rate is not available and where the demand is less than 300 kW .

MONTHLY RATE FOR NON-DEMAND CUSTOMERS

## DISTRIBUTION CHARGES - RATE GS

$\qquad$
Customer Charge $\$ 12.50 \$ 16.25$

Energy Charge - All kWh
.7.3313-8.4241 cents per kilowatt-hour

## MONTHLY RATE FOR DEMAND CUSTOMERS

## DISTRIBUTION CHARGES - RATE GM < 25 kW

$\qquad$
Customer Charge
$\$ 54.50 \$ 63.00$
Energy Charge - All kWh ...................................................... 1.39611 .8390 cents per kilowatt-hour
Demand Charge - First five (5) kilowatts or less ...............................................................No Charge

- Additional kilowatts of Demand.
\$6.54-\$7.89 per kilowatt
DISTRIBUTION CHARGES - RATE GM $\geq 25 \mathrm{~kW}$
$\qquad$
Energy Charge - All kWh
$0.9685-1.2661$ cents per kilowatt-hour
Demand Charge - First five (5) kilowatts or less $\qquad$ No Charge
- Additional kilowatts of Demand \$6.54 \$7.89 per kilowatt


## MONTHLY RATE FOR NON-DEMAND AND DEMAND CUSTOMERS

## DISTRIBUTION RATE ASSIGNMENT

A new customer or a customer with limited or no historical data shall be eligible for and assigned to the applicable rate based on Duquesne Light's estimate of the customer's monthly usage and/or peak monthly demand for the next twelve (12) month period. In no instance shall a customer be eligible for more than one of Rate GS, Rate GM $<25 \mathrm{~kW}$ or Rate $\mathrm{GM} \geq 25 \mathrm{~kW}$ at a time.

## RATE GS/GM - GENERAL SERVICE SMALL AND MEDIUM - (Continued)

# MONTHLY RATE FOR NON-DEMAND AND DEMAND CUSTOMERS - (Continued) 

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity at the above Distribution and Supply Charges and the Transmission Service Charges in Appendix A.
Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

The Minimum Charge shall be the sum of the Customer Distribution Charge plus a Demand Charge based on $50 \%$ of the current month Billing Domand or $30 \%$ of the highest Billing Demand; during the preceding eleven months; whichever is greater, plus the current billing period charges for Company supplied transmission and supply service, if any. The Demand Charge shall be determined using the Distribution Charge only, but shall not be less than the Customer Distribution Charge.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## RATE GMH - GENERAL SERVICE MEDIUM HEATING

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises for which a residential rate is not available, where the Company's service is the sole method of space heating, and where the heat loss of the customer's premises is calculated in accordance with the ASHRAE* Handbook of Fundamentals, and where such calculated heat loss converted into kilowatt-hour consumption during the heating season is determined by the Company to be at least $25 \%$ of the customer's entire electric energy requirements during the heating season. The space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.
*American Society of Heating, Refrigerating and Air Conditioning Engineers

## MONTHLY RATE

## WINTER MONTHLY RATE - FOR THE BILLING MONTHS OF OCTOBER THROUGH MAY

## DISTRIBUTION CHARGES

$\qquad$
Energy Charge - All kWh $\qquad$
SUMMER MONTHLY RATE - FOR THE BILLING MONTHS OF JUNE THROUGH SEPTEMBER

## DISTRIBUTION CHARGES

$\qquad$Energy Charge - All kWh ...................................................... 1.39611 .8390 cents per kilowatt-hourDemand Charge - First five (5) kilowatts or less ...............................................................No Charge

$$
\text { — Additional kilowatts of Demand ........................................ } \$ 6.54 \text { \$7.89 per kilowatt }
$$

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply or Rider No. 9 - Day-Ahead Hourly Price Service, as applicable, and will be billed in accordance with the terms contained therein.

Rider No. 8 - Default Service Supply - Applicable to customers with monthly demand less than 25 kW and customers with monthly demand greater than or equal to 25 kW but less than 200 kW , on average, who elect to purchase their electric supply requirements from the Company. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Supply Charges will be updated through competitive requests for proposal and will be effective for the periods as defined and described in Rider No. 8.

# RATE GMH - GENERAL SERVICE MEDIUM HEATING - (Continued) 

MONTHLY RATE - (Continued)

## SUPPLY CHARGES - (Continued)

Rider No. 9 - Day-Ahead Hourly Price Service - Customers with monthly demand of 200 kW , on average, or greater and elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 9 and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

For purposes of determining the monthly rate for demand customers, Duquesne Light shall evaluate the customer's twelve (12) most recent months of monthly billing demand for that customer available in October of the preceding year. If the customer's average monthly billing demand is less than 25 kW in the twelve (12) months, then that customer shall be charged the monthly rate for demand customers less than 25 kW for the next calendar year and automatically assigned to that rate effective with their January billing. If the customer's average monthly demand is 25 kW or greater in the twelve (12) month period, then that customer shall be charged the monthly rate for demand customers equal to or greater than 25 kW for the next calendar year and automatically assigned to that rate as their default service rate effective with their January billing. In no instance shall a customer be eligible for more than one default service offering at a time. A new customer or a customer with limited or no historical data shall be eligible for and assigned to the applicable rate based on Duquesne Light's estimate of the customer's average monthly billing demand for the next twelve (12) month period.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity at the above Distribution and Supply Charges and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

For the months of October through May, the Minimum Charge shall be the Customer Distribution Charge for the first kilowatt, plus a Distribution Charge of $\$ 6.54 \$ 7.89$ per kW, plus the current billing period charges for Company supplied transmission and supply service, if any. The Minimum Charge shall not be less than the Customer Distribution Charge. For the months of June through September, the Minimum Charge shall be calculated in accordance with the Minimum Charge provisions in Rate GS/GM.

## RATE GL - GENERAL SERVICE LARGE

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises where the demand is not lessgreater than or equal to 300 kilowatts ( $\geq 300 \mathrm{~kW}$ ) and less than 5,000 kilowatts ( $<5,000 \mathrm{~kW}$ ).

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## DEMAND CHARGES

First 300 kilowatts or less of Demand
$\$ 3,180.00 \$ 3,675.00$
Additional kilowatts of Demand
$\$ 8.41$ \$10.66 per kW

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE GLH - GENERAL SERVICE LARGE HEATING

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises for which a residential rate is not available, where the Company's service is the sole method of space heating, and where the heat loss of the customer's premises is calculated in accordance with the ASHRAE* Handbook of Fundamentals, and where such calculated heat loss converted into kilowatt-hour consumption during the heating season is determined by the Company to be at least $25 \%$ of the customer's entire electric energy requirements during the heating season. The space heating system may be supplemented with renewable energy sources such as solar, wind, wood, or hydro.
*American Society of Heating, Refrigerating and Air Conditioning Engineers

## MONTHLY RATE

## DISTRIBUTION

For the Billing Months of October through May:

## CUSTOMER CHARGE

Customer Distribution Charge
$\$ 67.00 \$ 77.50$

ENERGY CHARGES
All kilowatt-hours
2.3145-3.0162 cents per kWh

## SUPPLY

Gustomers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9-Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

For the Billing Months of October through May:

## ENERGY CHARGES

## Alkilowatt-hours 2.3145cents per kWh

## DISTRIBUTION

For the Billing Months of June through September:
Rate GL shall apply.

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

# RATE GLH - GENERAL SERVICE LARGE HEATING - (Continued) 

MONTHLY RATE - (Continued)

## ELECTRIC CHARGES

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## MINIMUM CHARGE

For the months of October through May, the Minimum Charge shall be the Customer Distribution Charge for the first kilowatt plus a Distribution Charge of $\$ 8.41 \$ 10.66$ per kW and the charges for Company supplied transmission and supply, if any. For Company supplied transmission and supply, the transmission charges shall be calculated as set forth in Appendix A and the supply charges shall be calculated as set forth under Rider No. 9. The Minimum Charge shall not be less than the Customer Distribution Charge. For the months of June through September, the Minimum Charge shall be calculated in accordance with the Minimum Charge provisions contained in Rate GL.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## RATE L - LARGE POWER SERVICE

## AVAILABILITY

Available for all the standard electric service taken on a customer's premises where the Contract Demand is not less than 5,000 kilowatts.

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## DEMAND CHARGES

## Service Voltage Less than 138 kV:

First 5,000 kilowatts or less of Demand
$\$ 34,900.00 \$ 41,800.00$
Additional kilowatts of Demand
$\$ 13.12 \$ 16.63$ per kW

## ELECTRIC CHARGES

The Company will provide and charge for Transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

# RATE L - LARGE POWER SERVICE - (Continued) <br> MONTHLY RATE - (Continued) 

## UNTRANSFORMED SERVICE CREDIT

Where the customer furnishes all necessary equipment to take untransformed service at 11,500 volts or higher, in strict accordance with the Company's standards and specifications, a credit of $\$ 0.75$ per kW based upon the individual demand of the untransformed circuit shall be applied to the customer's account.

## MINIMUM CHARGE

The Minimum Charge shall be the sum of a Demand Charge based on $70 \%$ of the Contract On-Peak Demand for transmission and distribution and plus the charges Demand Charge as calculated under Rider No. 9 for Company supplied transmission and supply, if any. The Demand Charge shall be determined using the Distribution Charge, and ${ }_{2}$ the Transmission and Supply Charges associated with Company supplied transmission and supply, if any, but in total, shall not be less than the demand charges associated with the first $5,000 \mathrm{kWs}$ or less of demand. For Company supplied transmission and supply, the transmission charges shall be calculated as set forth in Appendix A - Transmission Service Charges and the supply charges shall be calculated as set forth under Rider No. 9 - DayAhead Hourly Price Service.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the average kilowatts during the fifteen-minute period of greatest kilowatt-hour use during the billing period. Individual demands which exceed 30 kilowatts will be adjusted for power factor by multiplying by

$$
\left\{0.8+\left[0.6 \frac{\text { Reactive Kilovolt - ampere hours }}{\text { Kilowatt - hours }}\right]\right\},
$$

where such multiplier will be not less than 1.00 nor more than 2.00 . The Billing Demand will be the sum of the individual demands of each metered service adjusted for power factor as defined above, but not less than $70 \%$ of the Contract On-Peak Demand nor less than 5,000 kilowatts, whichever is the greater.

## STANDARD CONTRACT RIDERS

For modifications of the above rate under special conditions, see "Standard Contract Riders".

## RATE HVPS - HIGH VOLTAGE POWER SERVICE

## AVAILABILITY

Available to customers with Contract On-Peak Demands greater than or equal to 5,000 kilowatts $(\geq 5,000 \mathrm{~kW})$ where service is supplied at 69,000 volts or higher.

## MONTHLY RATE

## SUPPLY

Customers who elect to purchase their electric supply requirements from the Company may do so under the provisions of Rider No. 9 - Day-Ahead Hourly Price Service and will be billed in accordance with the terms contained therein.

## DISTRIBUTION

## FIXED MONTHLY CHARGE

> Up to and Including 50,000 kW Billing Demand
\$2,050.31\$2,503.20
$50,001 \mathrm{~kW}$ to $100,000 \mathrm{~kW}$ Billing Demand
Greater than 100,000 kW Billing Demand
$\$ 3,202.72 \$ 3,910.17$
\$4,541.96\$5,545.24

## ELECTRIC CHARGES

The Company will provide and charge for Transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy requirements from an EGS will be charged the full Distribution Charge by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the supplier becomes unavailable or during which the customer has not chosen a supplier, the Company will supply electricity pursuant to Rider No. 9 - Day-Ahead Hourly Price Service.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE HVPS - HIGH VOLTAGE POWER SERVICE - (Continued)

MONTHLY RATE - (Continued)

## MINIMUM CHARGE

The Minimum Charge shall be the customer's Fixed Distribution Monthly ChargeDemand Charge based on $70 \%$ of the Contract On-Peak Demand for transmission and distribution and the Demand Charge as calculated under Rider No. 9 for Company supplied supply. The Demand Charge shall be determined using the Distribution Charge, and the Transmission and Supply Charges associated with-For Company supplied transmission and supply, if any, but in total not less than the demand charges associated with the first $5,000 \mathrm{kWs}$ or less of demand the transmission charges shall be calculated as set forth in Appendix A - Transmission Service Charges and the supply charges shall be calculated as set forth under Rider No. 9 - Day-Ahead Hourly Price Service.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before fifteen days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the average kilowatts during the fifteen-minute period of greatest kilowatt-hour use during the billing period. Individual demands will be adjusted for power factor by multiplying by

$$
\left\{0.8+\left[0.6 \frac{\text { Reactive Kilovolt - ampere hours }}{\text { Kilow att - hours }}\right]\right\}
$$

where such multiplier will be not less than 1.00 nor more than 2.00 . The Billing Demand will be the sum of the individual demands of each metered service adjusted for power factor as defined above, but not less than $70 \%$ of the Contract On-Peak Demand, nor less than $331 / 3 \%$ of the Contract Off-Peak Demand nor less than 5,000 kilowatts, whichever is the greater.

## ON-PEAK AND OFF-PEAK CONTRACT DEMAND

The Contract On-Peak Demand is the maximum electrical capacity in kilowatts that the Company shall be required by the contract to deliver during the On-Peak hours to the customer.

## RATE AL - ARCHITECTURAL LIGHTING SERVICE

## AVAILABILITY

Beginning January 15, 2022, Rate AL will no longer be available to new customers or applicants, or to new installations for existing customers.

Available for separately metered circuitry connected solely to outdoor architectural lighting equipment, with demand of 5 kilowatts or greater, to be operated during non-peak periods.

## MONTHLY RATE

## DISTRIBUTION CHARGES


#### Abstract

$\qquad$ Demand Charge ............................................................................................. \$1.59\$1.83 per kilowatt Energy Charge ...........................................................................0.2110-0.2396 cents per kilowatt hour


## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate AL - Architectural Lighting Service customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate AL customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company, and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE SE - STREET LIGHTING ENERGY


#### Abstract

AVAILABILITY Available for the entire electric energy requirements of municipal street lighting systems where the municipality has not less than 15,000 street lamp installations and provides for the ownership, operation, and maintenance of its own street lamp installations and takes its entire energy requirements for street lighting under this rate.


## MONTHLY RATE

## DISTRIBUTION CHARGE

Monthly charge per lamp
$\$ 2.92 \$ 3.23$

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate SE - Street Lighting Energy customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate SE customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charge, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

# RATE SE - STREET LIGHTING ENERGY - (Continued) 

MONTHLY RATE - (Continued)

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before thirty days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## SPECIAL PROVISIONS

1. Ballasts for multiple mercury vapor street lights, when installed by the customer, shall be power factor corrected, having a power factor of not less than 90 percent. For ballasts not so corrected, the wattage of each lamp plus ballasts shall be increased by the following ratio: $90 \%$ divided by the actual power factor, expressed in percent, of the lamp plus the ballast.
2. Series street lighting circuits will be energized and de-energized in accordance with an agreed upon schedule of burning hours, except where such circuits are controlled by photo electric cells. During other hours, circuits will not be energized except upon sufficient notice to the customer.
3. On all poles, except ornamental poles used exclusively for street lighting purposes, the Company will terminate its facilities at the bracket to which the lighting fixture is attached. On ornamental poles, used exclusively for street lighting purposes, the Company will terminate its facilities at the top of the pole if served from overhead circuits or at the bottom of the pole if served from the underground system.
4. The Company, to protect continuity of service, the general public, and the safety of men workers engaged in work on poles, reserves the right to install insulating transformers between the Company's circuit and the wiring of the customer's installation. Where insulating transformers are installed, charges will be made therefore as herein before specified.
5. The customer upon request shall supply the Company periodically, but not more often than at six month intervals, with certified tests made by the Electrical Testing Laboratories, Inc. of New York, or a similar accredited organization, showing the mean life input in watts for each size and type of lamp, and the wattage and power factor for each size and type of mercury vapor ballast used by the customer in street lamp installations served under this rate.
6. Energy will normally be supplied under this rate by overhead circuits, but if the Company is required to supply or the customer requests delivery service from underground facilities, the specified unit charges for underground facilities will apply.
7. All installations, on and after July 1, 1969, of standard junction boxes used for street lighting service and of conduit and multiple service cable used exclusively for street lighting service will be installed, owned and maintained by the customer.

## TERM OF CONTRACT

Contracts under this rate shall be for a term of not less than ten years.

## RATE SM - STREET LIGHTING MUNICIPAL

## AVAILABILITY

Available for mercury vapor, high pressure sodium and light-emitting diode (LED) lighting of public streets, highways, bridges, parks and similar public places, for normal dusk to dawn operation of approximately 4,200 hours per year.

Mercury vapor street lighting is only available where served prior to January 30, 1983, and continuously thereafter at the same location. Beginning December 29, 2018, replacement of mercury vapor lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available lighting unit options listed below.

Beginning January 15, 2022, only LED lighting options will be installed. Replacement of mercury vapor or high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available.

Beginning January 15, 2022, the Company may replace existing high pressure sodium lights with LED lights, and place the customer on the corresponding rate schedule, at the Company's discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

A minimum of ton (10) LED lights por customer por individual ordor is required and must be installod in a contiguous tocation when roplacing oxisting lighting.

The Company shall not be required to install more than 3,000 LED lights annually.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

## Company Owned and Maintained Equipment

Minimum
Nominal Lamp Wattage

## Nominal kWh <br> Energy Usage per Unit per Month

## Customer Owned and

 Maintained EquipmentDistribution Charge per Unit

Mercury Vapor

| 100 | 44 |  |
| :---: | :---: | :---: |
| 175 | 74 | $\$ 12.69 \$ 14.19$ |
| 250 | 102 | $\$ 12.95 \$ 14.48$ |
| 400 | 161 | $\$ 13.20 \$ 14.76$ |
| 1,000 | 386 | $\$ 13.73 \$ 15.36$ |

$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$
\$2.71\$3.03
$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$

## Sodium Vapor

$70 \quad 29$
$100 \quad 50$
$150 \quad 71$
$250 \quad 110$
$400 \quad 170$
387

$$
\begin{aligned}
& \$ 13.11 \$ 14.66 \\
& \$ 13.21 \$ 14.77 \\
& \$ 13.40 \$ 14.99 \\
& \$ 13.75 \$ 15.38 \\
& \$ 14.30 \$ 15.99 \\
& \$ 16.44 \$ 18.39
\end{aligned}
$$

## RATE SM - STREET LIGHTING MUNICIPAL - (Continued)

## MONTHLY RATE - (Continued)

## DISTRIBUTION CHARGE - Monthly Rate Per Unit - (Continued)

|  | Company Owned and |  |  |
| :---: | :---: | :---: | :---: |
| Minimum | Nominal kWh | Customer Owned and <br> Maintained Equipment |  |
| Energy Usage | Distribution Charge | Distribution Charge |  |
| Nominal Lamp Wattage | per Unit per Month | per Unit | per Unit |

Light-Emitting Diode (LED) — Cobra Head

| $\frac{30}{45}$ | $\frac{11}{16}$ | $\$ 12.91$ |
| :---: | :---: | :---: |
| 60 | 21 | $\$ 13.01 \$ 12.91$ |
| 95 | 34 | $\$ 13.52 \$ 13.33$ |
| 139 | 49 | $\$ 13.99 \$ 14.71$ |
| 219 | 77 | $\$ 15.08 \$ 15.37$ |
| 275 | 97 | $\$ 17.54 \$ 15.65$ |

Light-Emitting Diode (LED) — Colonial

| $48 \underline{20}$ | $\underline{177}$ | $\$ 16.89$ | $\$ 3.03$ |
| :--- | :--- | :--- | :--- |
| $83 \underline{45}$ | 29 | $\$ 17.23$ | $\$ 3.03$ |

Light-Emitting Diode (LED) — Contemporary

| 4740 | $\underline{1714}$ | $\$ 15.59$ | $\$ 3.03$ |
| :--- | :--- | :--- | :--- |
| $62 \underline{55}$ | $22 \underline{20}$ | $\$ 15.59$ | $\$ 3.03$ |

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate SM - Street Lighting Municipal customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate SM customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

## RATE SM - STREET LIGHTING MUNICIPAL - (Continued)

## MONTHLY RATE - (Continued)

## ELECTRIC CHARGES - (Continued)

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charge, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may select Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RIDERS

Bills rendered under this schedule are subject to the charges stated in any applicable rider.

## LATE PAYMENT CHARGE

Bills will be calculated on the rates stated herein, and are due and payable on or before thirty days from the date of mailing of the bill to the ratepayer. The bill is overdue when not paid on or before the due date indicated on the bill. An overdue bill is subject to a Late Payment Charge of $1.25 \%$ interest per month on the full unpaid and overdue balance of the Company charges on the bill. The Charge shall be calculated on the overdue portions of the Company charges on the bill and shall not be charged against any sum that falls due during a current billing period.

## POLES

No charge is made for wood poles used jointly for street lighting and the support of the Company's general distribution system or for tubular steel poles, trolley type, used jointly for street lighting and the support of trolley span wires.

Where the installation of one (1) or more wood poles is required to serve the customer, the customer has the option to install the pole(s) at his its own expense in accordance with SPECIAL TERM AND CONDITION NO. 2 or the Company will install, own and maintain the pole(s) and bill the customer at the monthly rate of $\$ 10.32 \$ 11.54$ for each pole required.

## CUSTOMER OWNED AND MAINTAINED EQUIPMENT CHARGE

A per unit monthly charge whenever the customer or an agent of the customer owns the entire street lighting system, including, but not limited to, the fixture, pole, circuit, controls, and all other related equipment on the load side of the Company's service point or when such facility is provided by a public agency and the customer and/or agent is obligated to operate and maintain such facility.

The street lighting system equipment must be approved by and installed in a manner acceptable to the Company and must be equipped with photocells or other such equipment that permit only dusk-to-dawn operation.

## RATE SH - STREET LIGHTING HIGHWAY

## AVAILABILITY

Beginning January 15, 2022, Rate SH will no longer be available to new customers or applicants, or to new installations for existing customers.

Available for high intensity discharge lighting of state highways for normal dusk to dawn operation of approximately 4,200 hours per year where the highway lighting system acceptable to Duquesne Light Company is installed by the State and ownership of the entire highway lighting system has been transferred to the Company for a nominal consideration.

Beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options listed below.

Due to the limited availability of high pressure sodium lighting, the Company will be replacing existing high pressure sodium lights with LED lights at its discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

## Minimum Nominal Lamp Wattage

Nominal kWh<br>Energy Usage per Unit per Month

## Sodium Vapor

| 100 | 50 |
| :---: | :---: |
| 150 | 71 |
| 200 | 95 |
| 400 | 170 |

Light-Emitting Diode (LED) — Cobra Head

| $\frac{30}{45}$ | $\frac{11}{16}$ |
| :---: | :---: |
| 60 | $\frac{16}{21}$ |
| 95 | 34 |
| 139 | 49 |
| 219 | 77 |

$\frac{11}{16}$
$\frac{16}{21}$
34
49
77

## Company Owned and Maintained Equipment <br> Distribution Charge per Unit

Customer Owned and Maintained Equipment
Distribution Charge per Unit
\$2.71\$3.03
02
$\$ 12.89 \$ 14.42$
$\$ 13.57 \$ 15.99$
\$2.71\$3.03
\$2.71\$3.03
\$2.71\$3.03

$$
\begin{gathered}
\frac{\$ 12.91}{\$ 12.91} \\
\$ 13.52 \$ 15.12 \\
\$ 13.99 \$ 15.65 \\
\$ 15.08 \$ 16.87 \\
\$ 17.54 \$ 19.62
\end{gathered}
$$

$\$ 3.03$
$\$ 3.03$
\$2.71\$3.03
$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.
(C) - Indicates Change
(I) - Indicates Increase

## RATE UMS - UNMETERED SERVICE

## AVAILABILITY

Available to customers using unmetered standard service at each point of connection for customer-owned and maintained equipment such as traffic signals, communication devices and billboard lighting.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$
Energy Charge 1.8171-2.7761 cents per kilowatt hour

## SUPPLY CHARGES

Customers who elect to purchase their electric supply requirements from the Company will do so under the provisions of Rider No. 8 - Default Service Supply and will be billed in accordance with the terms contained therein.

## ELECTRIC CHARGES

The Supply Charges for Rate UMS - Unmetered Service customers will be updated through competitive requests for proposal as described in Rider No. 8 - Default Service Supply. The Supply rate shall be determined based on the formula described in the "Calculation of Rate" section in Rider No. 8. Applicability of the Supply rate to Rate UMS customers shall be as described in Rider No. 8 and for the effective period defined in Rider No. 8.

The Company will provide and charge for transmission service consistent with the PJM Open Access Transmission Tariff approved or accepted by the Federal Energy Regulatory Commission for customers who receive Default Service from the Company. The Transmission Service Charges are included, for informational purposes, in Appendix A of this Tariff.

Customers who elect to purchase their electric energy supply requirements from an EGS will be charged the Distribution Charges by the Company and must purchase their transmission and supply requirements from their selected EGS. Customers may change suppliers or return to the Company for electric supply requirements as defined in Rule No. 45.

For customers who elect to purchase their supply from an EGS, the customer is responsible for any other charges from the EGS. Any month in which the EGS becomes unavailable or during which the customer has not chosen an EGS, the Company will supply electricity at the above Distribution Charges, the Supply Charges in Rider No. 8 and the Transmission Service Charges in Appendix A.

Customers who choose an EGS may elect Consolidated Billing or Separate Billing as defined in Rule No. 20.1.

## RATE PAL - PRIVATE AREA LIGHTING

## AVAILABILITY

Available for high pressure sodium lighting and flood lighting of residential, commercial and industrial private property installations including parking lots, for normal dusk to dawn operation of approximately 4,200 hours per year.

Beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options listed below.

Due to the limited availability of high pressure sodium lighting, the Company will be replacing existing high pressure sodium lights with LED lights at its discretion. The Company may exchange functioning high pressure sodium lights with LEDs upon customer request and upon receipt, in advance, of the Company's estimated removal costs of such replacement. Such elective replacements shall be at the Company's discretion.

## MONTHLY RATE

## DISTRIBUTION CHARGE - Monthly Rate Per Unit

| Company Owned and <br> Maintained Equipment | Customer Owned and <br> Maintained Equipment |
| :---: | :---: |
| Distribution Charge | Distribution Charge |
| per Unit | per Unit |

High Pressure Sodium

| 70 | 29 |
| :---: | ---: |
| 100 | 50 |
| 150 | 71 |
| 250 | 110 |

Flood Lighting

| 100 | 46 |
| :--- | :---: |
| 250 | 100 |

$$
\begin{aligned}
& \$ 13.11 \$ 14.66 \\
& \$ 13.72 \$ 15.34 \\
& \$ 14.34 \$ 16.04
\end{aligned}
$$

| $\$ 13.11 \$ 14.66$ | $\$ 2.71 \$ 3.03$ |
| :--- | :--- |
| $\$ 13.21 \$ 14.77$ | $\$ 2.71 \$ 3.03$ |
| $\$ 13.40 \$ 14.99$ | $\$ 2.71 \$ 3.03$ |
| $\$ 13.75 \$ 15.38$ | $\$ 2.71 \$ 3.03$ |
| $\$ 14.30 \$ 15.99$ | $\$ 2.71 \$ 3.03$ |


| Minimum | Nominal kWh <br> Energy Usage |
| :---: | :---: |
| Nominal Lamp Wattage |  |
| per Unit per Month |  |

$400 \quad 155$

Light-Emitting Diode (LED) — Cobra Head

| $\frac{30}{45}$ | $\frac{11}{16}$ |
| :---: | :---: |
| 60 | 21 |
| 95 | 34 |
| 139 | 49 |
| 219 | 77 |
| 275 | 97 |

$$
\begin{gathered}
\$ 12.91 \\
\$ 13.01 \$ 12.91 \\
\$ 13.52 \$ 13.33 \\
\$ 13.99 \$ 14.71 \\
\$ 15.08 \$ 15.37 \\
\$ 17.54 \$ 15.65 \\
\$ 19.24
\end{gathered}
$$

| \$3.03 | (C) |
| :---: | :---: |
| \$2.71\$3.03 | (D)(I) |
| \$2.71\$3.03 | (D)(I) |
| \$2.71\$3.03 | (1)(1) |
| \$2.71\$3.03 | (I)(I) |
| \$2.71\$3.03 | (D)(1) |
| \$2.71 | (C) |

## Light-Emitting Diode (LED) - Colonial

| $48 \underline{20}$ | $17 \underline{7}$ |
| :--- | :--- |
| $83 \underline{45}$ | $29 \underline{16}$ |

$\$ 16.89$
$\$ 3.03$
(C)
$\$ 17.23$
$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$
$\$ 2.71 \$ 3.03$

Light-Emitting Diode (LED) — Contemporary

| 4740 |  |
| :--- | :--- |
| 6255 | 1714 |
| 2220 |  |

$\$ 15.59$
$\$ 15.59$
$\$ 3.03$
$\$ 3.03$
$\$ 3.03$
(C)
(C)
(C)

## RATE PAL - PRIVATE AREA LIGHTING - (Continued)

MONTHLY RATE - (Continued)

## POLES - (Continued)

Where the installation of one (1) or more wood poles is required to serve the customer, the customer has the option to install the pole(s) at his-its own expense in accordance with SPECIAL TERM AND CONDITION NO. 2 or the Company will install, own and maintain the pole(s) and bill the customer at the monthly rate of $\$ 10.32 \$ 11.54$ for each pole required.

## CUSTOMER OWNED AND MAINTAINED EQUIPMENT CHARGE

A per unit monthly charge whenever the customer or an agent of the customer owns the entire street lighting system, including, but not limited to, the fixture, pole, circuit, controls, and all other related equipment on the load side of the Company's service point or when such facility is provided by a public agency and the customer and/or agent is obligated to operate and maintain such facility.

The street lighting system equipment must be approved by and installed in a manner acceptable to the Company and must be equipped with photocells or other such equipment that permit only dusk-to-dawn operation.

The customer/agent must provide the Company with a written inventory of all street lighting fixtures. This inventory shall include the location, type and wattage rating for each fixture. The customer/agent will update its inventory of lighting fixtures by informing the Company in writing of changes in type, rating, location, and quantity of lighting fixtures as such changes occur and billings will be adjusted accordingly.

The Company reserves the right to inspect the equipment at each location and make prospective adjustments in billing as indicated by such inspections. The Company shall be under no obligation to conduct such inspections for the purpose of determining accuracy of billing or otherwise. The Company's decision not to conduct such inspections shall not release the customer/agent from the obligation to provide to the Company, and to update, an accurate inventory of the types, ratings, and quantities of lighting equipment upon which billing is based.

As this service is a per unit monthly charge, the customer/agent agrees to pay amounts billed in accordance with the current inventory, regardless of whether any of the equipment was electrically operable during the period in question and regardless of the cause of any such equipment's failure to operate.

The contract period is as covered by any existing contract now in effect with the customer/agent. All new contracts shall be for a period of one year.

## SPECIAL TERMS AND CONDITIONS

1. The above charges include installation of standard Company facilities including lamps, fixtures or luminaries, brackets and ballasts, all when installed on the overhead distribution system. The above charges include normal operation and maintenance. Normal operation and maintenance does not include periodic tree trimming around the fixture or luminaire.
2. Where it is necessary to install wood, metal, or ornamental poles, or other special facilities or services not in conformance with the Company's standard overhead practice, the additional cost shall be borne by the customer. Title to all facilities, except as noted below, shall vest in the Company.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER MATRIX

|  | RS | RH | RA | GS/GM | GMH | GL | GLH | L | HVPS | AL | SE | SM | SH | UMS | PAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Rider No. 1 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 2 |  |  |  | X | X | X | X |  |  |  |  |  |  |  |  |
| Rider No. 3 |  |  |  | X | X | X | X | X |  |  |  |  |  |  |  |
| Rider No. 4 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 5 | X | X | X |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 6 |  |  |  | X |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 7 | $\underline{X}$ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 8 | X | X | X | X | X |  |  |  |  | X | X | X | X | X | X |
| Rider No. 9 |  |  |  | X | X | X | X | X | X |  |  |  |  |  |  |
| Rider No. 10 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 11 |  |  |  | X |  | X |  |  |  |  |  |  |  |  |  |
| Rider No. 12 |  |  |  | X | X |  |  |  |  |  |  |  |  |  |  |
| Rider No. 13 |  |  |  | X |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 14 | X |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 15 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 15A | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| Rider No. 16 |  |  |  | X | X | X | X | X |  |  |  |  |  |  |  |
| Rider No. 17 |  |  |  |  |  | X | X | X | X |  |  |  |  |  |  |
| Rider No. 18 | X | X | X | X | X | X | X |  |  |  |  |  |  |  |  |
| Rider No. 19 |  |  |  | X |  | $\underline{\underline{X}}$ |  | $\underline{\underline{X}}$ |  |  |  |  |  |  |  |

## Rider Titles:

Rider No. 1 - Retail Market Enhancement Surcharge
Rider No. 2 - Untransformed Service
Rider No. 3 - School and Government Service Discount Period
Rider No. 4 - Federal Tax Adjustment ClauseIntentionally Left Blank
Rider No. 5 - Universal Service Charge
Rider No. 6 - Temporary Service
Rider No. 7 - Residential Subscription Service Pilotlntentionally Left Blank
Rider No. 8 - Default Service Supply
Rider No. 9 - Day-Ahead Hourly Price Service
Rider No. 10 - State Tax Adjustment
Rider No. 11 - Street Railway Service
Rider No. 12 - Billing Option - Volunteer Fire Companies and Nonprofit Senior Citizen Centers
Rider No. 13 - General Service Separately Metered Electric Space Heating Service
Rider No. 14 - Residential Service Separately Metered Electric Space and Water Heating
Rider No. 15 - Intentionally Left Blank
Rider No. 15A - Phase IV Energy Efficiency and Conservation Surcharge
Rider No. 16 - Service to Non-Utility Generating Facilities
Rider No. 17 - Emergency Energy Conservation
Rider No. 18 - Rates for Purchase of Electric Energy from Customer-Owned Renewable Resources Generating Facilities
Rider No. 19 - Community Development for New Loadlntentionally Loft Blank

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER MATRIX - (Continued)

|  | RS | RH | RA | GS/GM | GMH | GL | GLH | L | HVPS | AL | SE | SM | SH | UMS | PAL |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Rider No. 20 | X | X | X | X | X | X | X | X | X | X |  |  |  |  |  |
| Rider No. 21 | X | X | X | X | X | X |  |  |  |  |  |  |  |  |  |
| Rider No. 22 | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| $\underline{\text { Rider No. 23 }}$ | $\underline{\mathrm{X}}$ | $\underline{\mathrm{X}}$ | $\underline{\mathrm{X}}$ |  |  |  |  |  |  |  |  |  |  |  |  |
| Rider No. 24 |  |  |  | $\underline{\mathrm{X}}$ | $\underline{X}$ | $\underline{X}$ | $\underline{X}$ | $\underline{X}$ |  |  |  |  |  |  |  |
| $\underline{\text { Rider No. 25 }}$ |  |  |  | $\underline{X}$ | $\underline{X}$ |  |  |  |  |  |  |  |  |  |  |
| $\underline{\text { Rider No. 26 }}$ |  |  |  | $\underline{X}$ | $\underline{X}$ |  |  |  |  |  |  |  |  |  |  |
| Appendix X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |

Rider Titles:
Rider No. 20 - Smart Meter Charge
Rider No. 21 - Net Metering Service
Rider No. 22 - Distribution System Improvement Charge ("DSIC")
Rider No. 23 - Home Charging Pilot Program
(C)

Rider No. 24 - Fleet Charging Pilot Program
Rider No. 25 - New Business Stimulus
Rider No. 26 - Crisis Recovery Program
(C)

Appendix A - Transmission Service Charges

## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE THIS RIDER INTENTIONALLY LEFT BLANK

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## (Applicable to all Rates)

The Federal Tax Adjustment Clause ("FTAC") is instituted as a mechanism to adjust for changes in the federal corporate income tax rate that are not reflected in the Company's most recent general base rate proceeding. The FTAC is applicable to all base distribution rates under this Tariff. The amount of the adjustment will be determined as provided below.
A. Determination of the Change in Recoverable Federal Income Taxes Resulting from Increases or Decreases in the Federal Corporate Income Tax Rate ("FITA").

1. FITA shall include the effect of the increase or decrease in the federal corporate income tax rate on:
a. the provision in rates for recovery of current federal income taxes;
b. the provision in rates for recovery of deferred federal income taxes; and
c. any provision in rates for adjustment of previously deferred federal income taxes recorded at a different federal income tax rate.
2. The increases/decreases in annual revenues under this Rider will be calculated based on either the federal tax amounts associated with distribution utility investments, revenues and expenses allowed in the Company's most recent general base rate proceeding if fully determined in a Final Order, if available, or on the federal tax amounts associated with distribution utility investments, revenues and expenses incurred by the Company in the calendar year preceding the effective date of the tax rate change. If any base distribution rate revenue increase is granted during such calendar year or thereafter, the actual federal tax amounts will be adjusted to reflect the annualized increase in federal corporate income taxes resulting from the allowed increase in base distribution rate revenues.
B. Allocation of Increased/ Decreased Revenues to Rate Classes
3. The required increase/decrease in revenues to reflect the change in the federal corporate income tax rate calculated pursuant to this Rider shall be applied by equal percentage to all base distribution rates.
C. Calculation and Filing of Adjusted Rates For Changes in the Federal Corporate Income Tax Rate
4. To calculate the FTAC, the required increase/decrease in revenues will be divided by the Company's projected annual revenue for base distribution service for the period during which the charge will be collected, exclusive of State Tax Adjustment Surcharge (STAS) and automatic adjustment clause revenues.
5. The surcharge will be expressed as a percentage carried to two decimal places and will be applied to the total base distribution charges that are billed to each customer for distribution service.
6. The surcharge will be filed to become effective on ten (10) days' notice as soon as practicable following the effective date of the federal corporate income tax change, including appropriate supporting data demonstrating the calculation of the revenue adjustment and determination of the surcharge.

## RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE - (Continued)

## (Applicable to all Rates)

C. Calculation and Filing of Adjusted Rates For Changes in the Federal Corporate Income Tax Rate (Continued)
4. After the initial filing, the FTAC surcharge shall be filed with the Commission by April 1 of each year that it is in place.
5. The FTAC shall be applied on a bills rendered basis.
D. Formula

The computation of the FTAC is as follows:

$$
\begin{aligned}
& \frac{\mathrm{FTAC}^{2}=\left(\left(\left(\mathrm{FITA} \mathrm{ARCF}^{\mathrm{PAR}}\right)+\mathrm{e}\right)^{*} \mathrm{GRT}\right)}{\underline{\text { PAR }}} \\
& \underline{\mathrm{GRCF}=\left(1 /\left((1-\mathrm{SIT})^{*}(1-\mathrm{FIT})\right)\right)} \\
& \underline{\mathrm{GRT}=1 /(1-\mathrm{T})}
\end{aligned}
$$

Where:
FITA = Reflects the federal income tax adjustment, if any, as defined in Part A of this Rider and may be a positive or negative value.

GRCF = Gross Revenue Conversion Factor.
SIT = State Income Tax rate in effect at the time of the filing.
FIT = Federal income tax rate in effect at the time of the filing.
$\mathrm{T}=$ Pennsylvania gross receipts tax rate in effect during the billing month.
$\mathrm{e}=$ Amount calculated $(+/-)$ under the annual reconciliation feature or Commission audit.
$\mathrm{PAR}=$ Projected annual revenues for base distribution service (excluding all applicable clauses and riders) from existing customers plus netted revenue from any customers which will be acquired or lost by the beginning of the applicable service period.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 4 - FEDERAL TAX ADJUSTMENT CLAUSE - (Continued)

## (Applicable to all Rates)

E. Reconciliation

1. The surcharge shall be reconciled on an annual basis to provide for over/under-recoveries of the revised revenues to be recovered. The revenue received under the FTAC for the reconciliation period will be compared to the Company's required increase/decrease in revenues as defined in Part A. The difference will be recouped or refunded, as appropriate, over a one-year period commencing on April 1 of each year. The surcharge will be reconciled at the end of each calendar year and will remain in place until the Company files and the Commission approves new base distribution rates for the Company pursuant to Section 1308(d).
2. Under- or over-recoveries of the required revenue changes to reflect a delay in implementation of the surcharge following the effective date of the federal corporate income tax rate, including the effect of implementation of a federal corporate income tax rate change on a retroactive basis, will be reconciled in the first annual reconciliation filing.
3. Upon determination that the surcharge, if left unchanged, would result in a material over- or undercollection, the Company may file with the Commission, on at least ten (10) days' notice, for an interim revision of the FTAC.
4. Interest will not be applied to reconciled amounts.
5. The FTAC will not be included in the calculation of the Distribution System Improvement Charge ("DSIC").

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 5 - UNIVERSAL SERVICE CHARGE - (Continued) 

## (Applicable to Rate Schedules RS, RH and RA)

## CALCULATION OF CHARGE - (Continued)

- Customer Assistance Program ("CAP"): CAP costs will be calculated to include the projected CAP discount and CAP program costs for the Computational Year. The total CAP discount will be based on the annual average discount from the previous year, the Reconciliation Year, multiplied by the projected average number of CAP program participants during the Computational Year. The projected customer additions to the CAP program during the Computational Year will be based on the number of CAP customers receiving a discount at the end of the Reconciliation Year plus a projection of the average monthly number of CAP customers during the Computational Year. The projected number of CAP customers will include net additions to the program (additions minus exits), and a projection of customers enrolled through expected changes in policy (e.g. changes in the definition of poverty, changes in regulatory mandates). The projected CAP program costs will include the estimated costs for new applications, maintenance and annual recertification, and the projected CAP pre-program arrearages to be forgiven and written off during the USC Computational Year.
- Smart Comfort Program [Low Income Usage Reduction Program ("LIURP")]: LIURP costs will be calculated based on the projected number of homes that participate in the usage reduction program and the average cost per visit.
- Customer Assistance and Referral Evaluation Services ("CARES"): CARES costs will be calculated based on the projected annual Community Based Organization ("CBO") program costs and CBO costs for administering the program.
- Hardship Fund: Hardship Fund costs will be calculated based on the projected annual program costs and CBO costs for administering the program.
- Any other replacement or Commission-mandated Universal Service Program or low income program that is implemented during the Reconciliation or Computational Year.
$\mathrm{Cr}=\quad \mathrm{A}$ credit to reduce CAP customer discounts included in the USC to the extent that the monthly CAP enrollment level exceeds 39,088 - 35,853 customers. Specifically, the recoverable CAP discounts will be reduced by the number of CAP participants in excess of 39,088-35,853 times
$\mathrm{E}=\quad$ The over- or under- collection of actual Universal Service Program costs and revenue that result from the billing of the USC during the USC Reconciliation Year (an over-collection is denoted by a positive E and an under-collection by a negative E ), including applicable interest. Interest shall be computed monthly at the statutory legal rate of interest, from the month the over or under collection occurs to the effective month that the over collection is refunded or the under collection is recouped.


## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 7 - RESIDENTIAL SUBSCRIPTION SERVICE PILOT

## (Applicable to Rate Schedule RS)

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#### Abstract

AVAILABILITY Available to customers served under Rate RS - Residential Service who are not enrolled in the Customer Assistance Program (CAP) and are not billed under Rider No. 21 (Net Energy Metering). Enrollment in the Residential Subscription Service Pilot ("Pilot") provided under this Rider will be limited to 2,000 customers who request enrollment during the period January 15, 2022, through December 31, 2022. The Company may decline to enroll a customer at its sole discretion.

This Rider applies only to base distribution services. All other applicable charges and Riders will be charged as designed.


## DEFINITIONS

Subscription Unit. Incremental size of subscription that is equal to 1 kW .
Subscribed Units. Total number of Subscription Units chosen by customer. (For example, a customer who wants to cover 5 kW of demand will choose 5 Subscription Units.)

Subscription Level. Total demand (kW) of subscription based on the Subscribed Units chosen by customer times the Subscription Unit, plus 1 kW minimum subscription included in the Customer Charge.

Overage Bandwidth. Amount by which customer can exceed their Subscription Level without incurring Overage Fees. This is set to one-half of one Subscription Unit, or 0.5 kW .

Overage Amount. The positive amount of customer's monthly maximum billed demand less Subscription Level less Overage Bandwidth.

## MONTHLY RATE

## DISTRIBUTION CHARGES

$\qquad$
Subscription Unit Charge $\$ 12.23$ per unit

# RIDER NO. 7 - RESIDENTIAL SUBSCRIPTION SERVICE PILOT - (Continued) 

## (Applicable to Rate RS)

## SUBSCRIPTION SERVICE LEVEL

Upon enrollment in the Pilot, customers shall select the number of Subscription Units the customer will purchase every month to cover their electric distribution needs. The Company will provide the customer with information regarding their previous peak energy use in the past year to aid the customer in selecting the appropriate Subscription Service Level. The customer's Distribution Charges will then be computed as the Customer Charge, plus the Subscribed Units multiplied by the Subscription Unit Charge, plus any applicable Overage Amount or other charges.

Where a customer's demand exceeds their Subscription Level plus the Overage Bandwidth, the customer shall pay an overage fee equal to the Overage Amount multiplied by two times the Subscription Unit Charge. If a customer has an Overage Amount more than three times during the previous six billing periods, or the customer's Overage Amount exceeds 3 kW , the customer's Subscribed Units will automatically be reset to the customer's maximum demand from the past six months rounded up to the nearest 1 kW .

## DETERMINATION OF DEMAND FOR DISTRIBUTION

Individual demand, except in unusual cases, will be determined by measurement of the sixty-minute period of greatest kilowatt-hour use during the billing period.

## SPECIAL PROVISIONS

## CUSTOMER ENROLLMENT

A customer may exit the Pilot and this Rider at any time for any reason. A customer who exits the Pilot will be removed from this Rider effective with the billing cycle that commences three (3) business days after the date the customer notified the Company of their election to leave the Pilot.

## BILL PROTECTION

A customer who exits the Pilot may request a refund for the positive difference between their billed distribution charges under this Rider and the amount of such charges if billed under Rate Schedule RS for up to three months prior to exiting, but no longer than the customer's actual enrollment in the program. The Company will provide such refund within 60 days of customer request.

## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued)
(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL)
DEFAULT SERVICE SUPPLY RATE - (Continued)
Lighting
(Rate Schedules SM, SH and PAL)
Lamp wattage as available on applicable rate schedule.

|  |  | Application Period |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Wattage | Nominal kWh Energy Usage per Unit per Month | $\begin{gathered} \text { 06/01/2021 } \\ \text { through } \\ \text { 11/30/2021 } \end{gathered}$ | $\begin{aligned} & \text { 12/01/2021 } \\ & \text { through } \\ & 05 / 31 / 2022 \end{aligned}$ | 06/01/2022 through <br> 11/30/2022 | $\begin{gathered} \text { 12/01/2022 } \\ \text { through } \\ 05 / 31 / 2023 \end{gathered}$ | $\begin{aligned} & \text { 06/01/2023 } \\ & \text { through } \\ & 11 / 30 / 2023 \end{aligned}$ | $\begin{aligned} & \text { 12/01/2023 } \\ & \text { through } \\ & 05 / 31 / 2023 \end{aligned}$ |
| Supply Charge ¢ per kWh |  | 3.0953 | X.XXXX | X.XXXX | X.XXXX | X. XXXX | X.XXXX |
| Mercury Vapor |  | Fixture Charge - \$ per Month |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| 100 | 44 | 1.36 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 175 | 74 | 2.29 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 102 | 3.16 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 161 | 4.98 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 1000 | 386 | 11.95 | X.XX | X.XX | X.XX | X.XX | X.XX |
| High Pressure Sodium |  |  |  |  |  |  |  |
| 70 | 29 | 0.90 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 100 | 50 | 1.55 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 150 | 71 | 2.20 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 200 | 95 | 2.94 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 110 | 3.40 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 170 | 5.26 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 1000 | 387 | 11.98 | X.XX | X.XX | X.XX | X.XX | X.XX |
| Flood Lighting - Unmetered |  |  |  |  |  |  |  |
| 70 | 29 | 0.90 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 100 | 46 | 1.42 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 150 | 67 | 2.07 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 250 | 100 | 3.10 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 400 | 155 | 4.80 | X.XX | X.XX | X.XX | X.XX | X.XX |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |  |  |  |
| 30 | 11 | X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| 45 | 16 | 0.50 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 60 | 21 | 0.65 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 95 | 34 | 1.05 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 139 | 49 | 1.52 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 219 | 77 | 2.38 | X.XX | X.XX | X.XX | X.XX | X.XX |
| 275 | 97 | 3.00 | X.XX | X.XX | X.XX | X.XX | X.XX |
| Light-Emitting Diode (LED) - Colonial |  |  |  |  |  |  |  |
| 4820 | 177 | 0.53X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| 8345 | 2916 | 0.90X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |
| Light-Emitting Diode (LED) - Contemporary |  |  |  |  |  |  |  |
|  |  |  | X.XX | X.XX | X.XX | X.XX | X.XX |
| 6255 | 2220 | 0.68X.XX | X.XX | X.XX | X.XX | X.XX | X.XX |

## STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued)
(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL) DEFAULT SERVICE SUPPLY RATE - (Continued)

Lighting - (Continued)
(Rate Schedules SM, SH and PAL)
Lamp wattage as available on applicable rate schedule.


## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 8 - DEFAULT SERVICE SUPPLY - (Continued) 

(Applicable to Rate Schedules RS, RH, RA, GS/GM, GMH, AL, SE, SM, SH, UMS and PAL)

## CONTINGENCY PLAN

In the event Duquesne receives bids for less than all Tranches or the Commission does not approve all or some of the submitted bids or in the event of supplier default, then Duquesne will provide the balance of the default supply for commercial and industrial customers through purchases in the PJM spot markets until such time that a different contingency plan is approved by the Commission. Duquesne will submit to the Commission within fifteen (15) days after any such occurrence an emergency plan to handle any default service shortfall. All costs associated with implementing the contingency plan will be included as part of the DSS described in the section below, "Calculation of Rate."

## CALCULATION OF RATE

DSS rates shall be determined based on the formula described in this section. The DSS shall be filed with the Commission no less than sixty ( 60 ) days prior to the start of the next Application Period as defined under the Default Service Supply Rate section of this Rider. Rates are reconciled on a semi-annual basis in accordance with the Default Service Supply Rate section of this Rider. The rates shall include an adjustment to reconcile revenue and expense for each Application Period. The DSS shall be determined to the nearest one-thousandth of one (1) mill per kilowatt-hour in accordance with the formula set forth below and shall be applied to all kilowatt-hours billed for default service provided during the billing month:

$$
\text { DSS }=\left[\left(C A+S L R+\left(\text { DSS }_{a}+E\right) / S\right)^{*} F+\left(\text { DSS }_{b} / S\right)\right] *[1 /(1-T)]
$$

## Where:

DSS = Default Service Supply rate, converted to cents per kilowatt-hour, to be applied to each kilowatthour supplied to customers taking default service from the Company under this Rider.

CA = The weighted average of the winning bids received in a competitive auction for each customer class identified above and described in the "Default Service Supply Rate" section and adjusted for customer class transmission and distribution line losses. The competitive auction shall be conducted as described in "Procurement Process."

DSS $_{\mathbf{a}} \quad=\quad$ The total estimated direct and indirect costs incurred by the Company to acquire DSS from any source on behalf of customers described above in the "Procurement Process." The Application Period shall be for each period over which the DSS, as computed, will apply. Projections of the Company's costs to acquire default supply for the Application Period shall include all direct and indirect costs of generation supply to be acquired by the Company from any source plus any associated default service supply-related procurement and administration costs. Default service supply-related costs shall include the cost of preparing the company's default service plan filing and working capital costs associated with default service supply. The Company will recover these costs over the default service plan period as defined in the Commission's order at Docket No. P-2020-3019522 R-2021-3024750.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 9 - DAY-AHEAD HOURLY PRICE SERVICE - (Continued)

## (Applicable to Rates GS/GM, GMH, GL, GLH, L and HVPS and Generating Station Service)

MONTHLY CHARGES - (Continued)

## PJM Ancillary Service Charges and Other PJM Charges - (Continued)

$\mathbf{P J M}_{\mathbf{S}}=$ PJM Surcharge is a pass-through of the charges incurred by the Company for grid management and administrative costs associated with membership and operation in PJM. These are the charges incurred by the Company under PJM Schedules 9 and 10 to provide hourly price service.
$\mathbf{R}_{\mathrm{D}}=\quad$ Reactive supply service charge in $\$ / \mathrm{MW}$-day to serve the customer's load as calculated under the PJM Tariff Schedule 2.
$B_{D}=\quad$ Blackstart service charge in $\$ / M W$-day to serve the customer's load as calculated under the PJM Tariff Schedule 6A.

## Fixed Retail Administrative Charge

FRA = The Fixed Retail Administrative Charge in \$ per MWH. The Fixed Retail Administrative Charge consists of the sum of administrative charges for the suppliers providing hourly price service (as determined by a competitive solicitation process) and for the Company to obtain supply and administer this service. Default service supply-related costs shall include the cost of preparing the company's default service plan filing and working capital costs associated with default service supply. The Company will recover these costs over the default service plan period as defined in the Commission's order at Docket No. P-2020 3019522 R-2021-3024750.

The supplier charges shall be based on the winning bids in the Company's most recent solicitation for supply of hourly price default service.

The Company's administrative charges shall be based on an amortization of the costs incurred by the Company to acquire generation supply from any source for the Medium ( $\geq 200 \mathrm{~kW}$ ) Customer Class and Large C\&I Customer Class during the most recent twelvemonth (12-month) period ended May 31st (as determined by amortizing such costs over a 12-month period) plus the amortization of the cost of administering the hourly price service over the duration of the default service plan, including any unbundled costs of preparing the Company's default service plan filing and working capital costs associated with default service supply.

This charge shall also include the Company's costs associated with any Commission approved solar contracts and its administration, if applicable, in \$ per MWh. The proceeds of any solar energy, capacity, ancillary services and solar AECs that are acquired and in excess of those allocated to default service suppliers, and sold into the market, will be netted against solar contract costs.

| Application Period | FRA \$/MWH |
| :---: | :---: |
| June 1, 2021 through May 31, 2022 | $\$ 3.60$ |
| June 1, 2022 through May 31, 2023 | $\$ . . X X$ |
| June 1, 2023 through May 31, 2024 | $\$ \times . X X$ |
| June 1, 2024 through May 31, 2025 | $\$ \times . X X$ |

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 10 - STATE TAX ADJUSTMENT

## (Applicable to All Rates)

In addition to the charges provided in this Tariff, a two-part surcharge will apply to all bills rendered by the Company, pursuant to the Pennsylvania Public Utility Commission authorization of March 10, 1970, to compensate the Company for new and increased taxes imposed by the General Assembly.

Part 1 of the surcharge, at a rate of $(0.0080 \%) \underline{0.0000 \%}$ will include Capital Stock Tax, Corporate Net Income Tax, and Public Utility Realty Tax, which will be applied to the distribution charges of customer bills.

Part 2 of the surcharge, at a rate of $0.0000 \%$ will include Gross Receipts Tax and will be applied to all portions of customer bills.

The Company will recompute the surcharge using the elements prescribed by the Commission's March 10, 1970, authorization:

1. Whenever any of the tax rates used in computing the surcharge is changed, in which case the recomputation shall take into account the changed tax rate.
2. Whenever the Company makes effective increased or decreased rates (other than net energy clause), in which case the recomputation shall take into account the adjustments prescribed by the Commission's March 10, 1970, authorization.
3. On December 22, and each year thereafter.

Every recomputation made pursuant to the above paragraph shall be submitted to the Commission within ten (10) days after the occurrence of the event or date which occasions such recomputation: and if the recomputed surcharge is less than the one then in effect the Company will, and if the recomputed surcharge is more than the one then in effect the Company may, accompany such recomputation with a Tariff or supplement to reflect such recomputed surcharge, the effective date of which, shall be ten (10) days after filing.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES

(Applicable to all General Service Rates Except Non-Demand Metered GS/GM Customers)<br>(Applicable to Rates GM $<\mathbf{2 5}, \mathrm{GM} \geq \mathbf{2 5}, \mathrm{GMH}, \mathrm{GL}, \mathrm{GLH}$ and L)

The following applies to non-utility generating facilities including, but not limited to cogeneration and small power production facilities that are qualified in accord with Part 292 of Chapter I, Title 18, Code of Federal Regulations (qualifying facility). Electric energy will be delivered to a non-utility generating facility in accord with the following:

## A. DEFINITIONS

Contract is the signed agreement between the customer and the Company that is executed upon the customer's request to select Rider No. 16 service. Among other things, the Contract specifies the contractual demand levels for Back-Up Service and Supplementary Service that are defined below.

Supplementary Power Service is electric onergy and capacity supplieddistribution service provided by the Company, inclusive of distribution services included in the applicable monthly customer charge, or by an Electric Generation Supplier (EGS)-to a non-utility generating facility and regularly used in addition to that electric energy which the non-utility generating facility generates itself. The Company's regular and appropriate General Service Rates will be utilized for billing for Supplementary PowerService. Gustomers purchasing Supplementary Power from an EGS will be billed for charges according to their applicable rate and billing arrangement with thoir EGS.

Back-Up Power Service is electric energy and capacity supplied-distribution services provided by the Company to a non-utility generating facility during any outage of the non-utility generating facility's electric generating equipment or otherwise, to replace electric energy ordinarily generated by the non-utility generating facility's generating equipment.

Base Period is the twelve consecutive monthly billing periods applicable to the customer ending one month prior to the installation of new on-site generation or increase in capacity to existing on-site supply.

Supplementary Contract Demand may be established and represents the threshold demand for Supplementary Service to the customer's facility.

Maintenance Contract Demand is the maximum electrical capacity in kilowatts that the Company shall be required by the contract to deliver to the customer for Back-Up Power Service and is in addition to Supplementary Contract Demand. A Contract Demand may be established for Supplementary Power to the customer's facility.

Peak Period is the period between 12pm and 10pm EST on all days in the months of June through September.
Supplementary Power Service Billing Determinants are the monthly billing period billing demand in kilowatts (kW) and the energy usage in kilowatt-hours (kWh) foris the kW specified in the Contract with the customer Supplementaryfor Supplementary Power-Service. during the current billing month under which the on-site generation is operable. The Supplementary Power kW shall not exceed the Contract Demand kW for Supplementary Power, if applicable.

## Maintenance Demand Back-Up PowerService Billing Determinants are the monthly billing period billing

 demand in kilowatts (kW) and energy usage (kWh) in excess of those provided as Supplementary Power. If a Contract Domand exists for Supplementary Power, theis the kW specified in the Contract as Maintenance Contract Demand with the customer for -Back-Up Billing DeterminantsService, are the kW and kWh in oxcess of the Supplementary Power Contract Demand-This Billing Determinant applied every billing period regardless of whether the customer calls upon Back-Up Service during the billing period.
## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES - (Continued) 

(Applicable to all General Service Rates Except Non-Demand Metered GS/GM Customers)
(Applicable to Rates GM < 25, GM $\geq \mathbf{2 5}, \mathrm{GMH}, \mathrm{GL}, \mathrm{GLH}$ and L)
(C)
(C)

## A. DEFINITIONS - (Continued)

As-Used Demand Billing Determinant is the kW specified in the Contract as Maintenance Contract Demand that applies if the customer calls upon Back-Up Services during the Peak Period. As-Used Demand Billing Determinant will be set to the Maintenance Contact Demand level if the customer's maximum demand during the Peak Period of the billing period exceeds the Supplementary Contract Demand specified in the Contract.

Distribution Base Period Billing Determinants are the billing demand (kW) and the energy usage (kWh) for the month in the Base Period corresponding to the current billing month under which the on-site generation is operable. For new customers, the Company will use existing procedures to estimate Base Period Billing Determinants.

Supply Billing Determinants for customers not being served by an Electric Generation Supplier ("EGS"). on-Rate Schedules GS/GM (GM $\geq 200 \mathrm{~kW}$ ), GMH (GMH $\geq 200 \mathrm{~kW}$ ), GL, GLH, and L and HVPS-shall be the billing determinates for the current billing month then in effect under Rider No. 9 - Day-Ahead Hourly Price Service. Supply Billing Determinants for customers not being sorved by an Electric Generation Supplier ("EGS") on Rate Schedulefor customers on Rate GS/GM (GM $<200 \mathrm{~kW})$ and GMH (GMH $<200 \mathrm{~kW}$ ) shall be the billing determinants for the current billing month then in effect under Rider No. 8 - Default Service Supply or Rider No. 9 - Day-Ahead Hourly Price Service, as applicable-

## B. BACK-UP POWERSERVICE

The Company will supply Back-Up such sService each month at the following rates:

## DISTRIBUTION

A distribution charge of $\$ 2.50$ - $\$ 3.09$ per kW shall be applied to the Back-Up Power Service maintenance Billing Demand Billing Determinants for Back-Up Power.,

The Maintenance Contract Demand distribution charges will be applied in each month based on the customer's Maintenance Contract Demand without regard to actual usagewhether or not back-up energy is supplied.

An additional distribution charge of $\$ 6.79$ per kW shall be applied to the Back-Up Service As-Used Contract Demand Billing Determinants. The As-Used Contract Demand distribution charge will be applied in each month based on the customer's As-Used Contract Demand if the customer calls upon Back-Up service during the Peak Period.

Overage charges will also apply if the customer exceeds Maintenance Demand by $10 \%$ or more. The

# RIDER NO. 16 - SERVICE TO NON-UTILITY GENERATING FACILITIES - (Continued) 

(Applicable to Rates GM $<\mathbf{2 5}, \mathrm{GM} \geq \mathbf{2 5}, \mathrm{GMH}, \mathrm{GL}, \mathrm{GLH}$ and L)

B. BACK-UP SERVICE - (Continued)


#### Abstract

SUPPLY In any month that the Company provides energy to back up the customer's equipment, supply service shall be supplied and billed under Rider No. 9 - Day-Ahead Hourly Price Service for customers with an average Contract Demand of 200 kW or more. For customers having an average Contract Demand of less than 200 kW , the Company will bill the applicable supply demand and energy charges then in effect under Rider No. 8 - Default Service Supply.

If actual usage of Back-Up Service exceeds zero for more than $15 \%$ of the hours in any Base Period, then those hours above the $15 \%$ threshold will be counted toward the billing on the customer's The use of backup power at this price lovel will be limited to - $15 \%$ usage for all hours in a year. Incromental usage above this limit will be billed on the-applicable general service rates, including all ratchets applicable.


If a customer's Back-Up Service requirement at any time actual kW domand at the time back-up is being supplied exceeds the customer's Maintenance back-up_Contract Demand by 5\% or more, the actual Back-Up Service requirement provided, measured in kW demand as established-will become the customer's new Maintenance backup_Contract Demand for the remaining term of the back-up contract. If a customer's actual kW demand at the time bBack-Uup service-Service requirement provided at any time is being supplied-exceeds the customer's Maintenance back-up_Contract Demand by 10\% or more, the customer will be assessed a fee equal to determined by-the difference between the actual demand established when bBack-up-Up service-Service provided at the time during the billing period is being supplied and the Maintenance backup_Contract Demand multiplied by the Overage Charge (\$9.88). two times the applicablo charge per kilowatt.

## C. INTERCONNECTION

Each non-utility generating facility will be required to install at its expense or pay in advance to have the Company install interconnection equipment and facilities which are over and above that equipment and facilities required to provide electric service to the non-utility generating facility according to the Company's General Service Rates, except as noted below. Any such equipment to be installed by the non-utility generating facility must be reviewed and approved in writing by the Company prior to installation. Nothing in this Rider shall exempt a new customer from the application of Rule No. 7 and Rule No. 9 regarding Supply Line Extensions and Relocation of Facilities.

However, customers may elect to pay the cost of existing or newly required transformation equipment that is over and above that equipment necessary for the Company to supply the customer with its contracted Supplemental Power via a monthly charge rather than in total at the onset of the contract. The monthly charge for transformation equipment for customers with contract demand under this rider of $5,000 \mathrm{~kW}$ or more will be determined by the Company on a case-by-case basis. For all others, the rate of $\$ 0.2523$ per kW per month will apply.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 19 - COMMUNITY DEVELOPMENT FOR NEW LOAD 

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(Applicable to Rate Schedules GS/GM, GL, and L)


#### Abstract

AVAILABILITY This rider is available to customers taking distribution service under Rate $\mathrm{GM}<25, \mathrm{GM} \geq 25, \mathrm{GL}$, or L . For new services, the customer or applicant must have a projected load of at least 10 kW and must apply for the rider prior to the service being energized. For existing services, the customer must reasonably project a peak load increase of at least 10 kW and apply for the rider before the load growth occurs. The rider will apply no sooner than 30 days after the customer provides to the Company written notice of its desire to be placed on the rider. The Company reserves the right to decline to enroll any customer or applicant in this rider, at the Company's sole discretion. Customers taking service under this rider are not eligible for any other distribution rate discount.


## DEFINITIONS

Service Location. A single or contiguous premises that has or will have one or more delivery points for distribution service billed by the Company under a single account.

Brownfield Site. A Service Location where the expansion, redevelopment, or reuse of which may be complicated by the presence or potential presence of a hazardous substance, pollutant, or contaminant. Requires documentation either by providing a copy of the pertinent sections of the ASTM E1903-97 Phase II Site Assessment documenting the site contamination or by providing a letter from a local, state or federal regulatory agency confirming the site is classified as a Brownfield by that agency.

Site Expansion. A Service Location where the Company has not previously provided service, or where the service previously provided by the Company was not used for substantially the same type of operation or was terminated at least twelve (12) months before the customer's contractually specified effective date for service under this rider. This condition is waived for existing Service Locations where an entity has assumed operation of a Service Location from a customer which has ceased operations as a result of dissolution, so long as the formation of the entity did not occur as a result of merger, joint venture, acquisition and/or any other variation of combined business structures with the former customer at the service location. In any event, the completed application for the rider must be made within six (6) months from the later of the date: (1) the customer first received service from the Company; or (2) the date the customer received its sales tax exemption certificate from the Commonwealth of Pennsylvania.

Manufacturing Sales Tax Exemption Certificate. Pennsylvania Sales Tax Blanket Exemption Certificate filed by the customer with the Company showing the address of the Service Location and certifying that more than fifty (50) percent (on an annual basis) of the service purchased by the customer for the Service Location is exempt from sales tax because it is used in manufacturing operations, shipbuilding operations, or ship cleaning operations.

Employment Report. The "Employer's Report for Unemployment Compensation" (PA Form UC-2) as filed by the customer with the Office of Employment Security, Department of Labor and Industry, Commonwealth of Pennsylvania and as defined by 43 P.S. 753 [d].

# RIDER NO. 19 - COMMUNITY DEVELOPMENT FOR NEW LOAD - (Continued) 

(Applicable to Rate Schedules GS/GM, GL, and L)

## MONTHLY RATE

## DISTRIBUTION CHARGES

Rider No. 19 provides a percent discount to monthly demand charges for base distribution services included in Rates $\mathrm{GM}<25, \mathrm{GM} \geq 25, \mathrm{GL}$, and L during the months of January through May and October through November. The percent discount declines ratably over five years as follows.

| 2022 Percent Discount | 25\% |
| :---: | :---: |
| 2023 Percent Discount | 20\% |
| 2024 Percent Discount | 15\% |
| 2025 Percent Discount | 10\% |
|  |  |

This Rider applies only to base distribution services. All other applicable charges and Riders will be charged as designed.

## QUALIFICATIONS

Customers and applicants requesting service under this rider shall file with the Company, before the effective date of the rider for the Service Location, a Manufacturing Sales Tax Exemption Certificate, as defined above, for the Service Location. Customer also files with the Company copies of the Employment Reports, as defined above, for the Service Location at the time of application.

## TRANSFER OF OWNERSHIP

The Company will only apply the rider to the customer's base distribution charges for the term of contract. If, during the term of contract, the ownership of the Service Location changes, the Company may continue to apply the rider to the new owner's bills for the Service Location. If the Company continues to apply the rider in such circumstances, the Company shall apply the rider to the new owner's bills for the Service Location as if the new owner had been on the rider for the Service Location for the same period of time as was the previous owner.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 21 - NET METERING SERVICE

(Applicable to Rates RS, RH, RA, GS/GM, GMH 2 and $G L_{2}$ GLH and L)

## PURPOSE

This Rider sets forth the eligibility, terms and conditions applicable to Customers with installed qualifying renewable customer-owned generation using a net metering system.

## APPLICABILITY

This Rider applies to renewable customer-generators served under Rate Schedules RS, RH, RA, GS/GM, GMH and GL, GLH and L who install a device or devices which are, in the Company's judgment, subject to Commission review, a bona fide technology for use in generating electricity from qualifying Tier I or Tier II alternative energy sources pursuant to Alternative Energy Portfolio Standards Act No. 2004-213 (Act 213) or Commission regulations and which will be operated in parallel with the Company's system. This Rider is available to installations where any portion of the electricity generated by the renewable energy generating system offsets part or all of the customergenerator's requirements for electricity. A renewable customer-generator is a non-utility owner or operator of a net metered generation system with a nameplate capacity of not greater than 50 kilowatts if installed at a residential service (Rate RS, RH or RA) or not larger than 3,000 kilowatts at other customer service locations (Rate GS/GM, $\mathrm{GMH}_{2}$-and GL, GLH and L), except for Customers whose systems are above three megawatts and up to five megawatts who make their systems available to operate in parallel with the Company during grid emergencies as defined by the regional transmission organization or where a micro grid is in place for the primary or secondary purpose of maintaining critical infrastructure such as homeland security assignments, emergency services facilities, hospitals, traffic signals, wastewater treatment plants or telecommunications facilities provided that technical rules for operating generators interconnected with facilities of the Company have been promulgated by the Institute of Electrical and Electronic Engineers ("IEEE") and the Commission.

Qualifying renewable energy installations are limited to Tier I and Tier II alternative energy sources as defined by Act 213 and Commission Regulations. The Customer's equipment must conform to the Commission's Interconnection Standards and Regulations pursuant to Act 213. This Rider is not applicable when the source of supply is service purchased from a neighboring electric utility under Borderline Service.

Service under this Rider is available upon request to renewable customer-generators on a first come, first served basis so long as the total rated generating capacity installed by renewable customer-generator facilities does not adversely impact service to other Customers and does not compromise the protection scheme(s) employed on the Company's electric distribution system.

## METERING PROVISIONS

A Customer may select one of the following metering options in conjunction with service under applicable Rate Schedule RS, RH, RA, GS/GM, GMH 2 -and GL, GLH and L.

1. A customer-generator facility used for net metering shall be equipped with a single bi-directional meter that can measure and record the flow of electricity in both directions at the same rate. A dual meter arrangement may be substituted for a single bi-directional meter at the Company's expense.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 21 - NET METERING SERVICE - (Continued)

(Applicable to Rates RS, RH, RA, GS/GM, GMH ${ }_{2}$ and GL, GLH and L)

METERING PROVISIONS - (Continued)
2. If the customer-generator's existing electric metering equipment does not meet the requirements under option (1) above, the Company shall install new metering equipment for the customergenerator at the Company's expense. Any subsequent metering equipment change necessitated by the customer-generator shall be paid for by the customer-generator. The customer-generator has the option of utilizing a qualified meter service provider to install metering equipment for the measurement of generation at the customer-generator's expense. Additional metering equipment for the purpose of qualifying alternative energy credits owned by the customer-generator shall be paid for by the customer-generator. The Company shall take title to the alternative energy credits produced by a customer-generator where the customer-generator has expressly rejected title to the credits. In the event that the Company takes title to the alternative energy credits, the Company will pay for and install the necessary metering equipment to qualify the alternative energy credits. The Company shall, prior to taking title to any alternative energy credits, fully inform the customergenerator of the potential value of those credits and options available to the customer-generator for their disposition.
3. Meter aggregation on properties owned or leased and operated by a customer-generator shall be allowed for purposes of net metering. Meter aggregation shall be limited to meters located on properties within two (2) miles of the boundaries of the customer-generator's property. Meter aggregation shall only be available for properties located within the Company's service territory. Physical meter aggregation shall be at the customer-generator's expense. The Company shall provide the necessary equipment to complete physical aggregation. If the customer-generator requests virtual meter aggregation, it shall be provided by the Company at the customergenerator's expense. The customer-generator shall be responsible only for any incremental expense entailed in processing his account on a virtual meter aggregation basis.

## BILLING PROVISIONS

The following billing provisions apply to customer-generators in conjunction with service under applicable Rate Schedule RS, RH, RA, GS/GM, GMH ${ }_{2}$, and GL, GLH and L:

1. The customer-generator will receive a credit for each kilowatt-hour received by the Company up to the total amount of electricity delivered to the Customer during the billing period at the full retail rate consistent with Commission regulations. If a customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the customer-generator's usage in subsequent billing periods at the full retail rate. Any excess kilowatt hours shall continue to accumulate for the 12 month period ending May 31 . On an annual basis, the Company will compensate the customer-generator for kilowatt-hours received from the customer-generator in excess of the kilowatt hours delivered by the Company to the customer-generator during the preceding year at the Company's Price To Compare consistent with Commission regulations. For customer-generators on Rider No. 9 - Day-Ahead Hourly Price Service, the Price To Compare shall be determined as an average for the twelve (12) month period in accordance with Rider No. 9 and Appendix A - Transmission Service Charges. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 21 - NET METERING SERVICE - (Continued) 

(Applicable to Rates RS, RH, RA, GS/GM, GMH ${ }_{2}$ and GL, GLH and L)

BILLING PROVISIONS - (Continued)
2. If the Company supplies more kilowatt-hours of electricity than the customer-generator facility feeds back to the Company's system during the billing period, all charges of the appropriate rate schedule shall be applied to the net kilowatt-hours of electricity that the Company supplied. The customergenerator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
3. For customer-generators involved in virtual meter aggregation programs, a credit shall be applied first to the meter through which the generating facility supplies electricity to the distribution system, then through the remaining meters for the customer-generator's account equally at each meter's designated rate. Virtual meter aggregation is the combination of readings and billing for all meters regardless of rate class on properties owned or leased and operated by a customer-generator by means of the Company's billing process, rather than through physical rewiring of the customergenerator's property for a physical, single point of contact. The customer-generators are responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## BILLING PROVISIONS FOR

 ELECTRIC VEHICLE TIME-OF-USE PILOT PROGRAM ("EV-TOU") CUSTOMER GENERATORS
## (Applicable to Rates RS, RH, RA, GS/GM and GMH)

The following billing provisions apply to customer-generators that take service on Rider No 8 - Default Service Supply and are on EV-TOU rates.

1. The EV-TOU customer-generator will receive a credit for each kilowatt-hour received by the Company up to the total amount of electricity delivered to the Customer during the billing period at the full retail rate consistent with Commission regulations. If an EV-TOU customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the Company will maintain an active record of the excess kilowatt hours produced at the customer-generators premise in a "bank". If an EV-TOU customer-generator supplies more electricity to the Company than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the EV-TOU customer generator's usage in a subsequent billing period at the full retail rate. If, in a subsequent billing period, a customer consumes more electricity than produced, kilowatt-hours will be pulled from the customer's bank on a first in first out basis. Any excess kilowatt hours shall continue to accumulate and credit against usage for the 12 month period ending May $31^{\text {st. }}$. On an annual basis, the Company will compensate the customer-generator for kilowatt-hours remaining in the bank on May 31st, at the applicable Price To Compare at the time the excess kilowatt-hours were banked. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 21 - NET METERING SERVICE - (Continued) 

(Applicable to Rates RS, RH, RA, GS/GM, GMH 2 and GL, GLH and L)

# BILLING PROVISIONS FOR <br> ELECTRIC VEHICLE TIME-OF-USE PILOT PROGRAM ("EV-TOU") CUSTOMER GENERATORS 

(Applicable to Rates RS, RH, RA, GS/GM and GMH)

- (Continued)

1. If the Company supplies more kilowatt-hours of electricity than the customer-generator supplies during the billing period, all charges of the appropriate rate schedule shall be applied to the net kilowatt-hours of electricity that the Company supplied. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
2. If an eligible customer-generator wishes to no longer be enrolled in the EV-TOU Pilot Program and switches to the standard default service supply product, any excess kilowatt hours banked and remaining from the EV-TOU period will be used, as applicable, for the remaining portion of the 12 month period ending May 31 and the Company shall compensate for any excess kilowatt hours that are banked at the Price To Compare in effect at the time.

## NET METERING PROVISIONS FOR SHOPPING CUSTOMERS

1. Customer-generators may take net metering services from EGSs that offer such services.
2. If a net-metering customer takes service from an EGS, the Company will credit the customer for distribution charges for each kilowatt hour produced by the customer-generator, up to the total amount of kilowatt-hours delivered to the customer by the Company during the billing period. If a customer-generator supplies more electricity to the electric distribution system than the Company delivers to the customer-generator in a given billing period, the excess kilowatt hours shall be carried forward and credited against the customer-generator's usage in subsequent billing periods at the Company's distribution rates. Any excess kilowatt hours shall continue to accumulate for the 12 month period ending May 31. Any excess kilowatt hours at the end of the 12 month period will not carry over to the next year for distribution charge purposes. The customer-generator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.
3. If the Company delivers more kilowatt-hours of electricity than the customer-generator facility feeds back to the Company's system during the billing period, all charges of the applicable rate schedule shall be applied to the net kilowatt-hours of electricity that the Company delivered. The customergenerator is responsible for the customer charge, demand charge and other applicable charges under the applicable Rate Schedule.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 21 - NET METERING SERVICE - (Continued)

(Applicable to Rates RS, RH, RA, GS/GM, GMH ${ }_{2}$ and $\mathbf{G L}$, GLH and L)

## NET METERING PROVISIONS FOR SHOPPING CUSTOMERS - (Continued)

4. Pursuant to Commission regulations, the credit or compensation terms for excess electricity produced by customer-generators who are customers of EGSs shall be stated in the service agreement between the customer-generator and the EGS. The Company will provide the customer-generator with a statement of monthly kilowatt hour usage for the 12 month period ending May 31 for the purpose of the customer-generator seeking credit or compensation from the EGS.
5. If a customer-generator switches electricity suppliers, the Company shall treat the end of the service period as if it were the end of the year.

## APPLICATION

Customer-generators seeking to receive service under the provisions of this Rider must submit a written application to the Company demonstrating compliance with the Net Metering Rider provisions and quantifying the total rated generating capacity of the customer-generator facility.

## MINIMUM CHARGE

The Minimum Charges under Rate Schedule RS, RH, RA, GS/GM, GMH ${ }_{2}$-and GL, GLH and L apply for installations under this Rider.

## RIDERS

Bills rendered by the Company under this Rider shall be subject to charges stated in any other applicable Rider.

## STANDARD CONTRACT RIDERS - (Continued)

## RIDER NO. 22 - DISTRIBUTION SYSTEM IMPROVEMENT CHARGE

## (Applicable to All Rates)

In addition to the net charges provided for in this Tariff, a charge of $4.01 \% 0.00 \%$ will apply consistent with the Commission Order entered September 15, 2016, at Docket No. P-2016-2540046 approving the Distribution System Improvement Charge ("DSIC").

## GENERAL DESCRIPTION

## PURPOSE

To recover the reasonable and prudent costs incurred to repair, improve, or replace eligible property which is completed and placed in service and recorded in the individual accounts, as noted below, between base rate cases and to provide the Company with the resources to accelerate the replacement of aging infrastructure, to comply with evolving regulatory requirements and to develop and implement solutions to regional supply problems.

The costs of extending facilities to serve new customers are not recoverable through the DSIC.

## ELIGIBLE PROPERTY

The DSIC-eligible property will consist of the following:

- Poles and towers (account 364);
- Overhead conductors (account 365) and underground conduit and conductors (accounts 366 and 367);
- Line transformers (account 368) and substation equipment (account 362);
- Any fixture or device related to eligible property listed above including insulators, circuit breakers, fuses, reclosers, grounding wires, cross arms and brackets, relays, capacitors, converters and condensers;
- Unreimbursed costs related to highway relocation projects where an electric distribution company must relocate its facilities; and
- Other related capitalized costs.


## EFFECTIVE DATE

The DSIC will become effective October 1, 2016.

## RIDER NO. 23 - HOME CHARGING PILOT PROGRAM

## (Applicable to Rates RS, RH and RA)

## PURPOSE

This Rider sets forth the eligibility, terms, and conditions applicable to customers participating in the Company's voluntary residential Home Charging Pilot (the "Program").

## APPLICABILITY

Available to residential customers served under Rate Schedules RS, RH and RA who:
a. own a single-family home, defined as a detached single-family home, townhome/row house, or duplex ("Service Address");
b. have an active Duquesne Light residential electric service account with no past due bills at the Service Address;
c. have a personal garage or private driveway at Service Address suitable, in the Company's sole judgment, for the installation and operation of an electric vehicle ("EV") level 2 charging station ("Charging Station") and related equipment; and
d. own or lease an EV which is registered to the customer's Service Address.

The Program is available to up to 125 new participants per calendar year on a first-come, first-served basis. The Company may decline to enroll any customer at the Company's sole discretion.

## MONTHLY RATE

In addition to any applicable charges for electric delivery and supply, participating customers shall pay a monthly Program Charge of \$21.17.

## PROGRAM DESCRIPTION

Through the Program, Duquesne Light shall provide, own, and maintain a Charging Station at the participating customer's Service Address for the duration of the customer's participation in the Program. The customer shall select the Charging Station from a list of options approved by Duquesne Light. The Charging Station shall be installed at a mutually-agreeable location at the Service Address by Duquesne Light's third-party contractor(s). The Company shall pay the Covered Amount (as defined below) toward costs associated with installing the Charging Station. Any costs above the Covered Amount shall be at the customer's expense.

# RIDER NO. 23 - HOME CHARGING PILOT PROGRAM - (Continued) 

(Applicable to Rates RS, RH and RA)

## PROGRAM DESCRIPTION - (Continued)

"Covered Amount:" The Covered Amount shall be up to $\$ 2,000$ for customers with household incomes equal to or less than $150 \%$ of the Federal Poverty Level, or up to $\$ 500$ for all other customers. For customers with household incomes equal to or less than $150 \%$ of the Federal Poverty Level, the Covered Amount may apply to Charging Station installation costs, as well as costs of electrical upgrades at the customer's residence (e.g., new electrical panel or breakers) necessary to support Charging Station installation and operation. For all other customers, the Covered Amount may apply only to Charging Station installation costs.

In addition to the foregoing requirements, participating customers shall:
a. Execute and abide by the Home Charging Pilot Customer Agreement, with a minimum term of five years.
b. Have and maintain wireless internet ("Wi-Fi") service at the Service Address with sufficient signal at the Charging Station location.
c. Share charging data with Duquesne Light (and provide any authorizations required to accommodate such sharing) via the applicable Charging Station vendor.
d. Promptly notify Duquesne Light in the event the Charging Station fails to operate or otherwise requires repair, except for minor issues remedied by the customer pursuant to (e) herein.
e. Make reasonable efforts to remedy minor issues with the Charging Station that do not require qualified technicians to address, including but not limited to, the resetting of a tripped circuit breaker or assisting with software or Wi-Fi interconnectivity issues.
f. Establish and maintain an account with the applicable Charging Station vendor and for wireless internet connectivity to enable communication between the Charging Station and Charging Station vendor's hardware and software.
g. Use the Charging Station only in accordance with the manufacturer's applicable recommendations.
h. Maintain the area surrounding the Charging Station. See also Rule No. 23 herein.
i. Provide Duquesne Light with reasonable access to the Charging Station. See also Rule No. 22 herein.
j. Upon Duquesne Light's request, participate in surveys and provide feedback about the Program.

Upon conclusion of the Home Charging Pilot Customer Agreement Term, except in the event of customer default or early termination as discussed below, ownership of the Charging Station shall pass automatically to customer.

In the event of customer default or early termination, the customer shall pay a sum equal to the number of months remaining in the Home Charging Pilot Customer Agreement Term multiplied by the Monthly Charge per Charging Station, plus a one-time fee of \$200; and Duquesne Light may remove the Charging Station from the Service Address.

STANDARD CONTRACT RIDERS - (Continued)

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PURPOSE

This Rider sets forth the eligibility, terms, and conditions applicable to customers participating in the Company's voluntary Fleet Charging Pilot (the "Program").


#### Abstract

APPLICABILITY Available to customers served under Rate Schedules GS/GM, GMH, GL GLH, and L that: a. own, lease, or operate a fleet of at least six on-road vehicles; b. demonstrate that electric vehicles are currently in-use or have been purchased for use at the customer's premises ("Service Address"); c. Own or lease the Service Address, and demonstrate site control, suitable, in the Company's sole judgement, for the installation and operation of level 2 electric vehicle charging stations ("Charging Stations") and related equipment.


The Program is available to up to twelve (12) new customers per calendar year on a first-come, first-served basis. The Company may decline to enroll any customer at the Company's sole discretion.

## MONTHLY RATE

In addition to any applicable charges for electric delivery and supply, participating customers shall pay the following applicable monthly charge per charging station port:

- Bundled Option: \$63.24
- Pre-Pay Option: \$28.82
- Customer-Supplied Charging Station Option: No charge

Customers will select one Program Option for all charging ports subject to the Program at the Service Address for the duration of the customer's participation in the Program.

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM - (Continued) 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PROGRAM DESCRIPTION

Through the Program, Duquesne Light shall provide electric vehicle charging services consistent with the Program Option selected by the customer.

- For customers participating in the Bundled Option and the Pre-Pay Option, Duquesne Light shall provide, own, and maintain Charging Stations at the Service Address, as well as electrical equipment reasonably necessary to connect the Charging Stations to the customer's Service Point ("Make-Ready Infrastructure"), for the duration of the customer's participation in the Program. The customer shall select the Charging Stations from a list of options approved by Duquesne Light. The Charging Stations shall be installed at a mutually-agreeable location at the Service Address by Duquesne Light's third-party contractor(s). Additionally, for customers participating in the Pre-Pay Option, the customer shall pay the Company's costs of the Charging Station in addition to the applicable monthly charge identified herein.
- For customers participating in the Customer-Supplied Charging Station Option, the customer shall provide, install, own, and maintain the Charging Stations at a mutually-agreeable location at the Service Address; and the Company shall own and maintain the Make-Ready Infrastructure.

In addition to the foregoing requirements, participating customers shall:
a. Execute and abide by the Fleet Charging Pilot Customer Agreement, with a minimum term of ten (10) years.
b. Host Charging Stations with a minimum total of four (4) charging station ports per participating Service Address.
c. Share charging data with Duquesne Light (and provide any authorizations required to accommodate such sharing) via the applicable Charging Station vendor.
d. Promptly notify Duquesne Light in the event the Charging Station fails to operate or otherwise requires repair, except for minor issues remedied by the customer pursuant to (e) herein.
e. Make reasonable efforts to remedy minor issues with the Charging Station that do not require qualified technicians to address, including but not limited to, the resetting of a tripped circuit breaker or assisting with software or Wi-Fi interconnectivity issues.
f. Use the Charging Station only in accordance with the manufacturer's applicable recommendations.
g. Grant Duquesne Light any rights-of-way or easements deemed necessary. See also Rule No. 22.1 herein.
h. Maintain the area surrounding the Charging Station. See also Rule No. 23 herein.
i. Provide Duquesne Light with reasonable access to the Charging Station. See also Rule No. 22 herein.
j. Upon Duquesne Light's request, participate in surveys and provide feedback about the Program.

# RIDER NO. 24 - FLEET CHARGING PILOT PROGRAM - (Continued) 

## (Applicable to Rates GS/GM, GMH, GL, GLH and L)

## PROGRAM DESCRIPTION - (Continued)

For customers participating in the Bundled and Pre-Pay Options: Upon conclusion of the Fleet Charging Pilot Agreement Term, except in the event of customer default or early termination as discussed below, ownership of the Charging Station and Make Ready shall pass automatically to customer.

For all customers: Customers that leave the program prematurely will be required to purchase the Make Ready and Charging Stations, as applicable, at the remaining undepreciated value of the equipment; or alternatively, to have the Company remove the infrastructure, and reimburse the Company's costs of removal and stranded equipment (if any).
(C) - Indicates Change

STANDARD CONTRACT RIDERS - (Continued)

## (C)

## RIDER NO. 25 - NEW BUSINESS STIMULUS

## (Applicable to Rates GS/GM and GMH)


#### Abstract

AVAILABILITY

The New Business Stimulus Rider ("NBSR") is available to new small and medium business customers who start new electric service for a retail business in a Vacant Retail Storefront located within a Local Neighborhood Commercial (LNC) district, a Qualified Low-Income Census Tracts (QCT) district, and/or a Neighborhood Assistance Program (NAP) district.


## PROGRAM TERMS

Enrolled customers will receive a 30\% discount on variable base distribution charges for a period of no more than two (2) years from commencing service or until December 31, 2024, whichever occurs earlier. Customers taking service under the NBSR are not eligible for any other distribution rate discount.

## DEFINITIONS

Vacant Retail Storefront: a brick-and-mortar location intended for retail business operations that: (a) will be open to the public, (b) has not received active electric service for thirty (30) or more days prior to the request to commence service, and (c) will receive service at the same voltage and phase as the previous customer. For the purposes of the NBSR, retail business operations will include businesses that offer goods and/or services using in-person storefront locations. These businesses will include boutiques, cafes, restaurants, bars or taverns, gyms, fitness centers, professional services providers, childcare and early education centers, salons and barber shops, and other retailers which are typically found in Main Street business districts.

Local Neighborhood Commercial (LNC) District: area(s) identified as LNC by the City of Pittsburgh Code of Ordinances.

Qualified Low-Income Census Tracts (QCT) District: area(s) identified as QCT by the United States Department of Housing and Urban Development.

Neighborhood Assistance Program (NAP) District: area(s) identified as NAP by the United States Department of Housing and Urban Development.

STANDARD CONTRACT RIDERS - (Continued)

RIDER NO. 26 - CRISIS RECOVERY PROGRAM

## (Applicable to Rates GS/GM and GMH)


#### Abstract

AVAILABILITY

The Crisis Recovery Program ("CRP") is available to existing small and medium business customers that meet the eligibility requirements listed in the Program Terms and Conditions of this Rider. The CRP provides eligible customers with a $25 \%$ waiver of their delinquent account balance and/or an 18-month payment arrangement on the delinquent account balance.


## DEFINITIONS

COVID-19 pandemic: The World Health Organization (WHO) and the Centers for Disease Control and Prevention's (CDC) declaration of a novel coronavirus (COVID-19), which resulted in a state-wide disaster emergency proclamation by the Pennsylvania Governor pursuant to 35 Pa . C.S. $\$ 7301$ (c) on or about March 6, 2020.

Frozen period: The time in which the customer's delinquent balance will not become due, beginning with the first bill issued six (6) or more days following enrollment, and ending the calendar day following the due date of the sixth bill issued since enrollment.

## PROGRAM TERMS AND CONDITIONS

Eligible customers are required to demonstrate that they accumulated an account balance as a result of the COVID19 pandemic.

Enrolled customers will have their delinquent account balance frozen at the time of enrollment, which will remain frozen for six (6) billing cycles.

If the enrolled customer pays the non-frozen portion of their account balance in full by the due date of the sixth bill issued during the frozen period, $25 \%$ of the customer's delinquent account balance will be waived, and the customer will be issued an 18-month payment arrangement on the remaining account balance. Customers can agree to shorter payment arrangement terms.

Failure to pay the non-frozen portion in full by the due date of the sixth bill issued during the frozen period will result in the customer receiving an 18-month payment arrangement on the full delinquent balance. Customers can agree to shorter payment arrangement terms.

Enrollment into the CRP shall end on June 30, 2022.
Customers who are actively enrolled into the CRP are not eligible for any other rate discount.

## APPENDIX A - (Continued)

## TRANSMISSION SERVICE CHARGES - (Continued)

(Applicable to All Rates)

MONTHLY RATES - (Continued)

| Rate Class | Energy Charge \$/kWh | Demand Charge \$/kW | $\begin{gathered} \text { Monthly } \\ \text { Charge } \\ \text { Per Fixture } \end{gathered}$ | Monthly Charge Per Fixture | Monthly Charge Per Fixture |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Rate Class |  |  |  |
| By Wattage |  |  | SH | PAL | SM |  |
| Flood Lighting - Unmetered |  |  |  |  |  |  |
| 70 |  |  | - | \$0.01 | - | (1) |
| 100 |  |  | - | \$0.02 | - | (I) |
| 150 |  |  | - | \$0.02 | - | (1) |
| 250 |  |  | - | \$0.04 | - | (I) |
| 400 |  |  | - | \$0.06 | - | (I) |
| Light-Emitting Diode (LED) - Cobra Head |  |  |  |  |  |  |
| 30 |  |  | \$0.00 | \$0.00 | \$0.00 | (C) (C) (C) |
| 45 |  |  | -\$0.00 | \$0.01 | \$0.01 | (C) |
| 60 |  |  | \$0.02 | \$0.01 | \$0.01 | $\begin{aligned} & \text { (I) (I) (I) } \\ & \text { (I) (I) } \\ & \text { (I) (I) (I) } \\ & \text { (I) (I) (I) } \\ & \text { (C) } \end{aligned}$ |
| 95 |  |  | \$0.03 | \$0.01 | \$0.01 |  |
| 139 |  |  | \$0.04 | \$0.02 | \$0.02 |  |
| 219 |  |  | \$0.06 | \$0.03 | \$0.03 |  |
| 275 |  |  | - | \$0.04 | \$0.04 |  |
| Light-Emitting Diode (LED) - Colonial |  |  |  |  |  |  |
| 4820 |  |  | - | \$0.01\$0.00 | \$0.01\$0.00 | $\frac{\text { (C) (C) }}{\text { (C) (C) }}$ |
| 8345 |  |  | - | \$0.01\$0.00 | \$0.01\$0.00 |  |
| Light-Emitting Diode (LED) - Contemporary |  |  |  |  |  |  |
| 4740 |  |  | - | \$0.01\$0.00 | \$0.01\$0.00 | (C) (C) |
| 6255 |  |  | - | \$0.01\$0.00 | \$0.01\$0.00 | (C) (C) |

## BILLING DEMAND

Billing Demand subject to Transmission Service Charges for customers taking service under Rate Schedules GS/GM and GMH shall be the same as that determined for distribution and supply charges under the applicable rate schedules.

Billing Demand subject to Transmission Service Charges for Customers taking service under Rate Schedules GL, GLH, L, HVPS and UMS shall be the customer's daily network service coincident peak load contribution in kW. This quantity is determined based on the customer's load coincident with the annual peak of the Duquesne Zone (single coincident peak) as defined in the PJM Tariff Section 34.1.

## ANNUAL UPDATE

The Transmission Service Charges (TSC) defined herein will be updated effective June $1^{\text {st }}$ of each calendar year or more often upon determination that the rates then in effect would result in a significant over or under collection. On or about May $1^{\text {st }}$, the Company will file revised TSC rates with the PA Public Utility Commission (Commission) defining rates in effect from June 1 to May 31 of the following year, the computation year. These rates shall be determined based on the projected revenue requirement for the computation year, the projected cost of PJM charges and the over or under collection of expenses based on actual TSC revenue and expense incurred up to March 1 of each filing year. The revenue

# Duquesne Light Company 

Digest of Proposed Changes contained in

Tariff Electric - PA. P.U.C. No. 25
Supplement No. 25

Docket No. R-2021-3024750

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## I. General

Duquesne Light Company's Supplement No. 25 to Tariff Electric - PA. P.U.C. No. 25 issued April 16, 2021, to become effective June 15, 2021, results in an overall average increase of $15.6 \%$ in distribution revenues and is expected to produce $\$ 85.8$ million of additional annual distribution revenue under future test year conditions.

All customers will be notified of the proposed rate increase by a news release issued the day of the filing, newspaper advertisements in major service territory newspapers the day of the filing and by a bill insert to be mailed to all customers during the month after the filing is made.

Other modifications to the rules, rates and riders of Duquesne's tariff are being proposed and, together with a presentation of the proposed and current rates, are discussed below.

## II. Proposed Changes to the Table of Contents

List of Modifications - Original Pages No. 2H through 2L were added to Tariff No. 25 and to the Table of Contents.

Table of Contents - Original Page No. 3A has been added to Tariff No. 25 and to the Table of Contents

Rider Matrix - Original Page No. 87A has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 4 - Federal Tax Adjustment Clause has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 4 - Federal Tax Adjustment Clause - Original Pages No. 92A and 92B have been added to Tariff No. 25 and to the Table of Contents.

Rider No. 7 - Residential Subscription Service Pilot has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 7 - Residential Subscription Service Pilot — Original Page No. 97A has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 16 - Service to Non-Utility Generating Facilities - Original Page No. 124A has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 19 - Community Development has been added to Tariff No. 25 and to the Table of Contents.

## II. Proposed Changes to the Table of Contents - (Continued)

Rider No. 19 - Community Development - Original Page No. 128A has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 21 - Net Metering Service - Original Page No. 136A has been added to the Table of Contents as an administerial update. Rider No. 21 - Net Metering Service now reflects the addition of Page No. 136A which was added and approved in the Company's DSP IX proceeding at Docket No. P-2020-3019522, Order entered January 14, 2021.

Rider No. 23 - Home Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 23-Home Charging Pilot Program - Original Pages No. 141A - 141B have been added to Tariff No. 25 and to the Table of Contents.

Rider No. 24 - Fleet Charging Pilot Program has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 24 - Fleet Charging Pilot Program - Original Pages No. 141C - 141E have been added to Tariff No. 25 and to the Table of Contents.

Rider No. 25 - New Business Stimulus has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 25 - New Business Stimulus - Original Page No. 141F has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 26 - Crisis Recovery Program has been added to Tariff No. 25 and to the Table of Contents.

Rider No. 26 - Crisis Recovery Program - Original Page No. 141G has been added to Tariff No. 25 and to the Table of Contents.

## III. Proposed Changes to Tariff Rules

## Rule No. 3.1 Definitions

(2) Applicant - Language has been added to clarify that the definition of "Applicant" includes nonresidential applicants.

## III. Proposed Changes to Tariff Rules - (Continued)

## Rule No. 5 - Deposits and Advance Payments

Language has been modified to reflect that residential customers/applicants are permitted to pay their deposit in four (4) twenty-five percent ( $25 \%$ ) installments.

Language has been modified to clarify security deposits for non-residential customers/applicants.

## Rule No. 6.1-Service Point

Language has been revised to accommodate the Company's proposed transportation electrification programs.

## Rule No. 7 - Supply Line Extensions

Language has been modified to clarify that both customers and applicants for service are subject to tariff cost commitment requirements.

Language has been modified to allow applicants (e.g., developers) to pay Contribution in Aid of Construction ("CIAC") on behalf of the ultimate customer.

## Rule No 10 - One Service of A Kind

Language has been modified to remove obsolete cross-reference.

## Rule No. 16.1 - Interconnection, Safety and Reliability Requirements

New Rule No. 16.1 Interconnection, Safety and Reliability Requirements has been added to the tariff to clarify and memorialize the Company's existing process for customer generation interconnection (including facilities not eligible for net metering).

## Measurement and Use of Service - Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety

Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements on Second Revised Page No. 26, Cancelling First Revised Page No. 26.

## III. Proposed Changes to Tariff Rules - (Continued)

Measurement and Use of Service - Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety

Rule No. 18.1 - Electric Vehicle Charging and Rule No. 19 - Continuity and Safety, previously found on First Revised Page No. 26, Cancelling Original Page No. 26 have been moved to Original Page No. 26A to accommodate the addition of Rule No. 16.1 - Interconnection, Safety and Reliability Requirements.

## Rule No. 22.1 - Vegetation Management and Right-of-Way

Language has been added to clarify a customer's responsibility to manage vegetation around the Company's service facilities.

## Rule No. 40 - Reconnection Charge

Language has been added to expand reconnection charge applicability to customers who apply for reconnection at the same premises more than thirty (30) days following disconnection (i.e., when then former customer now constitutes an "applicant").

## Rule No. 41 - Prohibition of Residential Master Metering

Language has been modified to allow residential master metering for certain low-income supportive housing pursuant to Rule No. 41.1.

## Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing

New Rule No. 41.1 Residential Master Metering for New Low-Income Supportive Housing has been added to the tariff to establish eligibility and conditions for master metering of certain lowincome supportive housing.

General Provisions - Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching

Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing on First Revised Page No. 34, Cancelling Original Page No. 34.

## III. Proposed Changes to Tariff Rules - (Continued)

General Provisions - Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching

Rule No. 42 - Meter Testing, Rule No. 43 - Other Services, Rule No. 44 - This Rule Intentionally Left Blank and Rule No. 45 - Supplier Switching, previously found on Original Page No. 34, have been moved to Original Page No. 34A to accommodate the addition of Rule No. 41.1 - Residential Master Metering for New Low-Income Supportive Housing.

## IV. Proposed Changes to Tariff Rate Schedules

## Rate RS - Residential Service

| Distribution | Current Rates <br> with STAS |  | Proposed Rates <br> with STAS |
| :--- | :---: | :---: | :---: |
| Customer Charge |  | $\$ 12.50$ |  |
| All kWh | $\$ / \mathrm{kWh}$ | $\$ 0.060228$ | $\$ 16.25$ |

Administerial revision to add the word "cents" back to the Energy Charge line to indicate "cents per kilowatt hour."

## Rate RH - Residential Service Heating

Distribution
Customer Charge
Summer:
All kWh
\$/kWh
$\$ 0.060228$
\$0.070564

Winter:
All kWh
\$/kWh
\$0.045673
\$0.063410

## Rate RA - Residential Service Add-on Heat Pump

| Distribution |  | Current Rates with STAS | Proposed Rates with STAS |
| :---: | :---: | :---: | :---: |
| $\begin{array}{ll}\text { Customer Charge } & \text { Summer: }\end{array}$ |  |  |  |
|  |  |  |  |
| All kWh | \$/kWh | \$0.060228 | \$0.070564 |
| Winter: |  |  |  |
| All kWh | \$/kWh | \$0.016393 | \$0.027631 |

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate GS/GM - General Service Small and Medium

Non-Demand - Rate GS

Distribution

| Current Rates <br> with STAS | Proposed Rates <br> with STAS |
| :---: | :---: |

Customer Charge
\$12.50
\$16.25
All kWh \$/kWh \$0.073307 \$0.084241

Demand - Rate GM < 25

Distribution
Customer Charge
Demand over $5 \mathrm{~kW} \$ / \mathrm{kW}$

| Current Rates <br> with STAS | Proposed Rates <br> with STAS |
| :---: | :---: |

All kWh $\quad \$ / \mathrm{kWh}$
\$0.013960
$\$ 0.018390$

Demand - Rate GM $\geq \mathbf{2 5}$

| Distribution | Current Rates with STAS | Proposed Rates with STAS |
| :---: | :---: | :---: |
| Customer Charge | \$65.64 | \$76.00 |
| Demand over 5 kW \$/kW | \$6.54 | \$7.89 |
| All kWh \$/kWh | \$0.009684 | \$0.012661 |

Language has been added under "Availability" to clarify eligibility.
Language has been modified under "Minimum Charge" to reflect current business practice.

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate GMH - General Service Medium Heating

| Distribution | Current Rates <br> with STAS | Proposed Rates <br> with STAS |
| :--- | :---: | :---: |
| Customer Charge | $\$ 54.50$ | $\$ 63.00$ |

Summer:

Demand over $5 \mathrm{~kW} \$ / \mathrm{kW}$
All kWh
\$/kWh
\$6.54
\$0.013960
\$0.018390
Winter:
All kWh \$/kWh \$0.029607 \$0.038382

## Rate GL - General Service Large

Distribution
First 300 kW or less
Additional kW

Current Rates with STAS
\$3,179.75
\$8.41

Proposed Rates with STAS
\$3,675.00
\$10.66

Language has been added under "Availability" to clarify eligibility.

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate GLH - General Service Large Heating

| Distribution | Current Rates <br> with STAS | Proposed Rates <br> with STAS |
| :--- | :---: | :---: |
| Customer Charge | $\$ 66.99$ | $\$ 77.50$ |

Summer:

| First 300 kW or less | $\$ 3,179.75$ | $\$ 3,675.00$ |
| :--- | :--- | :--- |
| Additional kW | $\$ 8.41$ | $\$ 10.66$ |

Winter:
All kWh $\quad \$ / \mathrm{kWh} \quad \$ 0.023143 \quad \$ 0.030162$

Language has been reorganized on the Rate Schedule to clarify that the Customer Distribution Charge is only applicable to the billing months of October through May.

## Rate L-Large Power Service

Service Voltage Less than 138 kV :

| Distribution | Current Rates <br> with STAS |  | Proposed Rates <br> with STAS |
| :--- | :---: | :---: | :---: |
|  |  |  | $\$ 34,897.21$ |

Language has been modified under "Minimum Charge" to reflect current business practice.

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate HVPS - High Voltage Power Service



Language has been added under "Availability" to clarify eligibility.
Language has been modified under "Minimum Charge" to reflect current business practice.

## Rate AL - Architectural Lighting Service

| Distribution |  | $\begin{array}{c}\text { Current Rates } \\ \text { with STAS }\end{array}$ |  |
| :--- | :--- | :--- | :---: | \(\left.\begin{array}{c}Proposed Rates <br>

with STAS\end{array}\right]\)

Language has been added to reflect that beginning January 15, 2022, Rate AL will no longer be available to new customers or applicants, or to new installations for existing customers.

## Rate SE - Street Lighting Energy

| Distribution | Current Rates <br> with STAS | Proposed Rates <br> with STAS |
| :--- | :---: | :---: |
| Customer Charge | $\$ 2.92$ | $\$ 3.23$ |

Language has been modified to replace the word "men" with "workers."

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate SM - Street Lighting Municipal

Distribution $\quad$\begin{tabular}{c}
Current Rates <br>
with STAS

 

Proposed Rates <br>
with STAS
\end{tabular}

Company Owned and Maintained Equipment
Mercury Vapor:

| 100 watt | per month | $\$ 12.69$ | $\$ 14.19$ |
| :--- | :--- | :--- | :--- |
| 175 watt | per month | $\$ 12.95$ | $\$ 14.48$ |
| 250 watt | per month | $\$ 13.20$ | $\$ 14.76$ |
| 400 watt | per month | $\$ 13.73$ | $\$ 15.36$ |
| 1000 watt | per month | $\$ 15.79$ | $\$ 17.66$ |

Sodium Vapor:

| 70 watt | per month | $\$ 13.11$ | $\$ 14.66$ |
| :--- | :--- | :--- | :--- |
| 100 watt | per month | $\$ 13.21$ | $\$ 14.77$ |
| 150 watt | per month | $\$ 13.40$ | $\$ 14.99$ |
| 250 watt | per month | $\$ 13.75$ | $\$ 15.38$ |
| 400 watt | per month | $\$ 14.30$ | $\$ 15.99$ |
| 1000 watt | per month | $\$ 16.44$ | $\$ 18.39$ |


| Light-Emitting Diode (LED) - Cobra Head: |  |  |  |
| :---: | :---: | :--- | :--- |
| 30 watt | per month | $\$ 0.00$ | $\$ 12.91$ |
| 45 watt | per month | $\$ 13.01$ | $\$ 12.91$ |
| 60 watt | per month | $\$ 13.52$ | $\$ 13.33$ |
| 95 watt | per month | $\$ 13.99$ | $\$ 14.71$ |
| 139 watt | per month | $\$ 15.08$ | $\$ 15.37$ |
| 219 watt | per month | $\$ 17.54$ | $\$ 15.65$ |

Light-Emitting Diode (LED) - Colonial:

| 20 watt | per month | $\$ 0.00$ | $\$ 16.89$ |
| :--- | :--- | :--- | :--- |
| 45 watt | per month | $\$ 0.00$ | $\$ 17.23$ |


| Light-Emitting Diode (LED) - Contemporary: |  |  |  |
| :--- | :--- | :--- | :--- |
|  | per month <br> 40 <br> watt | $\$ 0.00$ | $\$ 15.59$ |
|  | 55 watt | per month | $\$ 0.00$ |

Customer Owned and Maintained Equipment
Distribution Charge per Unit $\$ 2.71$
\$3.03

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate SM - Street Lighting Municipal - (Continued)

Language has been added to reflect that beginning January 15, 2022, only LED lighting options will be installed for customers being served under Rate SM.

Language has been added to reflect that beginning January 15, 2022, the Company may replace existing high pressure sodium lights with LED lights or that a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Language has been modified to replace the word "his" with "its."

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate SH - Street Lighting Highway

| Distribution | Current Rates with STAS | Proposed Rates with STAS |
| :---: | :---: | :---: |
| Company Owned and Maintained Equipment |  |  |
| Sodium Vapor: |  |  |
| 100 watt per month | \$12.54 | \$14.02 |
| 150 watt per month | \$12.71 | \$14.22 |
| 200 watt per month | \$12.89 | \$14.42 |
| 400 watt per month | \$13.57 | \$15.99 |
| Light-Emitting Diode (LED) - Cobra Head: |  |  |
| 30 watt per month | \$0.00 | \$12.91 |
| 45 watt per month | \$0.00 | \$12.91 |
| 60 watt per month | \$13.52 | \$15.12 |
| 95 watt per month | \$13.99 | \$15.65 |
| 139 watt per month | \$15.08 | \$16.87 |
| 219 watt per month | \$17.54 | \$19.62 |
| Customer Owned and Maintained Equipment |  |  |
| Distribution Charge per Unit | \$2.71 | \$3.03 |

Language has been added to reflect that beginning January 15, 2022, Rate SH will no longer be available to new customers or applicants, or to new installations for existing customers.

Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

New LED lamp wattages have been inserted under Cobra Head fixtures.

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate UMS - Unmetered Service

| Distribution |  | $\begin{array}{c}\text { Current Rates } \\ \text { with STAS }\end{array}$ |  |
| :--- | :--- | :---: | :---: | \(\left.\begin{array}{c}Proposed Rates <br>

with STAS\end{array}\right]\)

## Rate PAL - Private Area Lighting

Company Owned and Maintained Equipment

Distribution
High Pressure Sodium:

| 70 watt | per month | $\$ 13.11$ | $\$ 14.66$ |
| :--- | :--- | :--- | :--- |
| 100 watt | per month | $\$ 13.21$ | $\$ 14.77$ |
| 150 watt | per month | $\$ 13.40$ | $\$ 14.99$ |
| 250 watt | per month | $\$ 13.75$ | $\$ 15.38$ |
| 400 watt | per month | $\$ 14.30$ | $\$ 15.99$ |

Flood Lighting:

| 100 watt | per month | $\$ 13.11$ | $\$ 14.66$ |
| :--- | :--- | :--- | :--- |
| 250 watt | per month | $\$ 13.72$ | $\$ 15.34$ |

250 watt per month $\quad \$ 13.72$
400 watt per month \$14.34 \$16.04
Light-Emitting Diode (LED) - Cobra Head:
30 watt per month $\$ 0.00 \quad \$ 12.91$

45 watt per month \$13.01 \$12.91
60 watt per month \$13.52 \$13.33
95 watt per month \$13.99 \$14.71
139 watt per month \$15.08 \$15.37
219 watt per month \$17.54 \$15.65
Light-Emitting Diode (LED) - Colonial:

| 20 watt | per month | $\$ 0.00$ | $\$ 16.89$ |
| :--- | :--- | :--- | :--- |
| 45 watt | per month | $\$ 0.00$ | $\$ 17.23$ |

## IV. Proposed Changes to Tariff Rate Schedules - (Continued)

## Rate PAL - Private Area Lighting - (Continued)

Company Owned and Maintained Equipment

| Distribution | Current Rates with STAS | Proposed Rates with STAS |
| :---: | :---: | :---: |
| Light-Emitting Diode (LED) - Contemporary: |  |  |
| 40 watt per month | \$0.00 | \$15.59 |
| 55 watt per month | \$0.00 | \$15.59 |
| Poles per month | \$10.32 | \$11.54 |
| Customer Owned and Maintained Equipment |  |  |
| Distribution Charge per Unit | \$2.71 | \$3.03 |

Language has been added to reflect that beginning January 15, 2022, replacement of high pressure sodium lamps, fixtures or luminaries, including brackets and ballasts, will not be available. In such cases, the customer must take service under one of the available LED lighting options.

Language has been added to reflect that due to the limited availability of high pressure sodium lighting, the Company will replace existing high pressure sodium lights with LED lights or a customer may request to exchange functioning high pressure sodium lights with LEDs with advance payment to cover the costs of the Company's estimated removal costs of such replacement. Both will be at the Company's discretion.

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

Language has been modified to replace the word "his" with "its."

## V. Proposed Changes to Tariff Riders

## Rider Matrix

The Rider Matrix (Second Revised Page No. 87, Cancelling First Revised Page No. 87) has been updated to reflect the addition of the following Riders:

Rider No. 4 - Federal Tax Adjustment Clause
Rider No. 7 - Residential Subscription Service Pilot
Rider No. 19 - Community Development for New Load
"Continued on Original Page No. 87A" has been added to the bottom of Second Revised Page No. 87, Cancelling First Revised Page No. 87 to indicate that the Rider Matrix continues onto the next page.

Riders No. 20 through Appendix A, previously found in the Rider Matrix on First Revised Page No. 87, Cancelling Original Page No. 87, have been moved to Original Page No. 87A to accommodate the additional Riders placed into the Tariff.

The Rider Matrix (Original Page No. 187A) has been updated to reflect the addition of the following Riders:

Rider No. 23 - Home Charging Pilot Program
Rider No. 24 - Fleet Charging Pilot Program
Rider No. 25 - New Business Stimulus
Rider No. 26 - Crisis Recovery Program

## Rider No. 4 - Federal Tax Adjustment Clause

Rider No. 4 - Federal Tax Adjustment Clause ("FTAC") is being added to Tariff No. 25 to provide for adjustments to base distribution revenue to reflect the effects of future increases or decreases in the federal corporate income tax rate.

## Rider No. 5 - Universal Service Charge

The CAP participation level has been reset as per the provisions of Rider No. 5.

## Rider No. 7 - Residential Subscription Service Pilot

Rider No. 7 - Residential Subscription Service Pilot is being added to Tariff No. 25 to offer eligible customers the option to select a specified level of grid access for a set monthly charge.

## V. Proposed Changes to Tariff Riders - (Continued)

## Rider No. 8 - Default Service Supply

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

In the "Calculation of Rates" section, the Docket No. has been updated in DSSa.

## Rider No. 9 - Day-Ahead Hourly Price Service

Under the "Fixed Retail Administrative Charge" section, the Docket No. has been updated in FRA.
Rider No. 10 - State Tax Adjustment
Rider No. 10 - State Tax Adjustment has been modified to reflect that Part 1 of the STAS has been set to zero.

Rider No. 16 - Service to Non-Utility Generating Facilities
Rider No. 16 - Service to Non-Utility Generating Facilities has been modified to reflect changes in applicable terms, rules, and rates.

Rider No. 19 - Community Development for New Load
Rider No. 19 - Community Development for New Load is being added to Tariff No. 25 to provide incentives to eligible customers to move and/or expand their operations within the Company's service territory.

Rider No. 21 - Net Metering Service
Rider No. 21 - Net Metering Service has been revised to include Rate Schedule GLH and Rate Schedule L.

Language has been modified in regard to calculating the price-to-compare ("PTC") to reflect current business practice.

Rider No. 22 - Distribution System Improvement Charge
Rider No. 22 - Distribution System Improvement Charge ("DSIC") has been modified to reflect that it has been set to zero.

## V. Proposed Changes to Tariff Riders - (Continued)

## Rider No. 23 - Home Charging Pilot Program

Rider No. 23 - Home Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to residential customers participating in the Company's voluntary Home Charging Pilot.

## Rider No. 24 - Fleet Charging Pilot Program

Rider No. 24 - Fleet Charging Pilot Program is being added to Tariff No. 25 to set forth the eligibility, terms, and conditions applicable to non-residential customers participating in the Company's voluntary Fleet Charging Pilot.

## Rider No. 25 - New Business Stimulus

Rider No. 25 - New Business Stimulus is being added to Tariff No. 25 to incent eligible new small or medium businesses by providing them with a reduced distribution rate for two (2) years.

## Rider No. 26 - Crisis Recovery Program

Rider No. 26 - Crisis Recovery Program is being added to Tariff No. 25 to provide a relief program for eligible existing small or medium business customers who have accumulated a delinquent balance because of COVID-19 business restrictions.

## VII. Appendix A - Transmission Service Charges

## Appendix A - Transmission Service Charges

Current LED lamp wattages have been removed.
New LED lamp wattages have been inserted under Cobra Head, Colonial and Contemporary fixtures.

## Exhibit DBO-4

Duquesne Light Company
LED Street Lighting Service
Rate Summary

| Line No. | Description | Cobrahead |  |  |  |  |  |  |  |  |  |  |  | Colonial LED |  |  |  | Contemporary LED |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 30 Nominal Watts |  | 45 Nominal Watts |  | 60 Nominal Watts |  | 95 Nominal Watts |  | 139 Nominal Watts |  | 219 Nominal Watts |  | 20 Nominal Watts |  | 45 Nominal Watts |  | 40 Nominal Watts |  | 55 Nominal Watts |  |
| 1 | Total Material Cost | \$ | 291.48 | \$ | 291.48 | \$ | 327.75 | \$ | 448.39 | \$ | 506.32 | \$ | 530.80 | \$ | 640.00 | \$ | 670.00 | \$ | 525.00 | \$ | 525.00 |
| 2 | Total Labor Cost | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 | \$ | 228.59 |
| 3 | Total Capitalized Investment | \$ | 520.07 | \$ | 520.07 | \$ | 556.34 | \$ | 676.98 | \$ | 734.91 | \$ | 759.39 | \$ | 868.59 | \$ | 898.59 | \$ | 753.59 | \$ | 753.59 |
| 4 | Revenue Requirement NPV |  | \$621.72 |  | \$621.72 |  | \$665.07 |  | \$809.29 |  | \$878.54 |  | \$907.81 |  | \$1,038.35 |  | \$1,074.21 |  | \$900.87 |  | \$900.87 |
| 5 | Annualized Levelized Payment |  | \$59.89 |  | \$59.89 |  | \$64.07 |  | \$77.97 |  | \$84.64 |  | \$87.46 |  | \$100.03 |  | \$103.49 |  | \$86.79 |  | \$86.79 |
| 6 | Monthly Fixture Charge | \$ | 4.99 | \$ | 4.99 | \$ | 5.34 | \$ | 6.50 | \$ | 7.05 | \$ | 7.29 | \$ | 8.34 | \$ | 8.62 | \$ | 7.23 | \$ | 7.23 |
| 7 | Gross Receipts Tax | \$ | 0.31 | \$ | 0.31 | \$ | 0.33 | \$ | 0.41 | \$ | 0.44 | \$ | 0.46 | \$ | 0.52 | \$ | 0.54 | \$ | 0.45 | \$ | 0.45 |
| 8 | Monthly Fixture Charge | \$ | 5.30 | \$ | 5.30 | \$ | 5.67 | \$ | 6.91 | \$ | 7.49 | \$ | 7.75 | \$ | 8.86 | \$ | 9.16 | \$ | 7.68 | \$ | 7.68 |
| 10 | Fixed Distribution Charge (1) | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 | \$ | 2.71 |
| 11 | Operating Charge (1) | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 | \$ | 3.64 |
| 12 | 2021 Distribution Increase |  | \$1.26 |  | \$1.26 |  | \$1.31 |  | \$1.45 |  | \$1.53 |  | \$1.55 |  | \$1.68 |  | \$1.72 |  | \$1.56 |  | \$1.56 |
| 13 | Total Monthly Charge | \$ | 12.91 | \$ | 12.91 | \$ | 13.33 | \$ | 14.71 | \$ | 15.37 | \$ | 15.65 | \$ | 16.89 | \$ | 17.23 | \$ | 15.59 | \$ | 15.59 |

(1) As calculated in Howard Gorman Exhibit 6-11

| Financial Input | Input |
| :--- | ---: |
| Capital Investment - Material | $\$ 291.48$ |
| Capitalized Labor | $\$ 228.59$ |
| Total Capitaized Investment | $\$ 520.07$ |


| Capitalized Labor | $\$ 228.59$ |
| :--- | ---: |
| Total Capitalized Investment | $\$ 520.07$ |


| Years for straight line book depreciation |  |  |
| :---: | :---: | :---: |
| Booas fepreciation Rete  <br> Years for straight line tax depreciation $5.00 \%$ |  |  |
|  |  |  |
| Tax Depreciation Rate $5.00 \%$ |  |  |
| Tax Rate | State | 9.99\% |
|  | Federal | 21.00\% |
|  | Combined | 28.89\% |
|  | Gross Revenue Adjustment | 71.11\% |
|  | Gross Revenue Conversion Factor | 1.40631 |

PA Gross Receipts Tax

Monthly Distribution Rate

| Sum of PV of Revenue Requirement | $\$ 621.72$ |
| :--- | ---: |
| Levelized Annual Revenue Requirement | $\$ 59.89$ |
| Annual O\&M / Maintenance Expense | $\$ 0.00$ |
| Annual Revenue Requirement | $\$ 59.89$ |
| Net Monthly Tariff Rate | $\$ 4.99$ |
| PA Gross Receipst Tax | $\$ 0.31$ |
| Total Monthly Distribution Rate | $\$ 5.30$ |


| Weighted Cost of Capital |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Capitalization |  | Weighted |  |
|  | Ratio | Rate | Return | WATCC |
| Debt | 46.65\% | 4.29\% | 2.00\% | 1.42\% |
| Preferred | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Equity | 53.35\% | 10.95\% | 5.84\% | 5.84\% |
|  | 100.00\% |  | 7.84\% | 7.26\% |



| Financial Input <br> Capital Investment - Material | Input <br> $\$ 291.48$ <br> Capitalized Labor |
| :--- | ---: |
| Total Capitalized Investment | $\$ 228.59$ |
| 520.07 |  |


| Years for straight line book depreciation |  |  |
| :---: | :---: | :---: |
| Book Depreciation Rate $5.00 \%$ <br> Years for straight line tax depreciation 20 |  |  |
|  |  |  |
| Tax Depreciation Rate |  |  |
| Tax Rate | State | 9.99\% |
|  | Federal | 21.00\% |
|  | Combined | 28.89\% |
|  | Gross Revenue Adjustment | 71.11\% |
|  | Gross Revenue Conversion Factor | 1.40631 |

5.90\%

Monthly Distribution Rate

| Sum of PV of Revenue Requirement | $\$ 621.72$ |
| :--- | ---: |
| Levelized Annual Revenue Requirement | $\$ 59.89$ |
| Annual O\&M / Maintenance Expense | $\$ 0.00$ |
| Annual Revenue Requirement | $\$ 59.89$ |
| Net Monthly Tariff Rate | $\$ 4.99$ |
| PA Gross Receipst Tax | $\$ 0.31$ |
| Total Monthly Distribution Rate | $\$ 5.30$ |


| Weighted Cost of Capital |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Capitalization | Weighted |  |  |
|  | Ratio | Rate | Return | WATCC |
| Debt | 46.65\% | 4.29\% | 2.00\% | 1.42\% |
| Preferred | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Equity | 53.35\% | 10.95\% | 5.84\% | 5.84\% |
|  | 100.00\% |  | 7.84\% | 7.26\% |


| A | B | c | D | E | F | G | H | 1 | J | K | L | M | $N$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Capital | Return |  |  |  | Deferred Tax on Depreciation |  |  |  | Tax |  | Total | CumulativeNPV |
| Year | B.O.Y.Plant | $\begin{aligned} & \text { Return on } \\ & \text { Debt } \end{aligned}$ | Return on Preferred | Return on Equity | Total Return on Net Plant | Book Deprec. | $\begin{gathered} \text { Tax } \\ \text { Deprec. } \end{gathered}$ | $\begin{gathered} \text { E.O.Y } \\ \text { Def. Inc. Tax } \end{gathered}$ | Income Tax on Preferred | Income Tax on Equity | Total Income Taxes | Revenue Requirement |  |
|  |  |  |  |  |  |  |  | (H-G)*Tax | $\mathrm{D}^{*}(\operatorname{Tax} /(1-\operatorname{Tax}))$ | $\mathrm{E}^{*}(\operatorname{Tax} /(1-\mathrm{Tax}))$ | J+K | F+G+L |  |
| , | 520.07 | 10.40 | 0.00 | 30.38 | 40.78 | 26.00 | 26.00 | 0.00 | 0.00 | 12.34 | 12.34 | 79.13 | 73.77 |
| 2 | 494.07 | 9.88 | 0.00 | 28.86 | 38.74 | 26.00 | 26.00 | 0.00 | 0.00 | 11.73 | 11.73 | 76.48 | 140.24 |
| 3 | 468.07 | 9.36 | 0.00 | 27.34 | 36.70 | 26.00 | 26.00 | 0.00 | 0.00 | 11.11 | 11.11 | 73.82 | 200.06 |
| 4 | 442.06 | 8.84 | 0.00 | 25.82 | 34.67 | 26.00 | 26.00 | 0.00 | 0.00 | 10.49 | 10.49 | 71.16 | 253.81 |
| 5 | 416.06 | 8.32 | 0.00 | 24.31 | 32.63 | 26.00 | 26.00 | 0.00 | 0.00 | 9.88 | 9.88 | 68.51 | 302.06 |
| 6 | 390.06 | 7.80 | 0.00 | 22.79 | 30.59 | 26.00 | 26.00 | 0.00 | 0.00 | 9.26 | 9.26 | 65.85 | 345.29 |
| 7 | 364.05 | 7.28 | 0.00 | 21.27 | 28.55 | 26.00 | 26.00 | 0.00 | 0.00 | 8.64 | 8.64 | 63.19 | 383.97 |
| 8 | 338.05 | 6.76 | 0.00 | 19.75 | 26.51 | 26.00 | 26.00 | 0.00 | 0.00 | 8.02 | 8.02 | 60.54 | 418.52 |
| 9 | 312.04 | 6.24 | 0.00 | 18.23 | 24.47 | 26.00 | 26.00 | 0.00 | 0.00 | 7.41 | 7.41 | 57.88 | 449.31 |
| 10 | 286.04 | 5.72 | 0.00 | 16.71 | 22.43 | 26.00 | 26.00 | 0.00 | 0.00 | 6.79 | 6.79 | 55.22 | 476.70 |
| 11 | 260.04 | 5.20 | 0.00 | 15.19 | 20.39 | 26.00 | 26.00 | 0.00 | 0.00 | 6.17 | 6.17 | 52.57 | 501.01 |
| 12 | 234.03 | 4.68 | 0.00 | 13.67 | 18.35 | 26.00 | 26.00 | 0.00 | 0.00 | 5.56 | 5.56 | 49.91 | 522.52 |
| 13 | 208.03 | 4.16 | 0.00 | 12.15 | 16.31 | 26.00 | 26.00 | 0.00 | 0.00 | 4.94 | 4.94 | 47.25 | 541.51 |
| 14 | 182.03 | 3.64 | 0.00 | 10.63 | 14.27 | 26.00 | 26.00 | 0.00 | 0.00 | 4.32 | 4.32 | 44.60 | 558.22 |
| 15 | 156.02 | 3.12 | 0.00 | 9.11 | 12.23 | 26.00 | 26.00 | 0.00 | 0.00 | 3.70 | 3.70 | 41.94 | 572.87 |
| 16 | 130.02 | 2.60 | 0.00 | 7.60 | 10.20 | 26.00 | 26.00 | 0.00 | 0.00 | 3.09 | 3.09 | 39.29 | 585.67 |
| 17 | 104.01 | 2.08 | 0.00 | 6.08 | 8.16 | 26.00 | 26.00 | 0.00 | 0.00 | 2.47 | 2.47 | 36.63 | 596.79 |
| 18 | 78.01 | 1.56 | 0.00 | 4.56 | 6.12 | 26.00 | 26.00 | 0.00 | 0.00 | 1.85 | 1.85 | 33.97 | 606.40 |
| 19 | 52.01 | 1.04 | 0.00 | 3.04 | 4.08 | 26.00 | 26.00 | 0.00 | 0.00 | 1.23 | 1.23 | 31.32 | 614.66 |
| 20 | 26.00 | 0.52 | 0.00 | 1.52 | 2.04 | 26.00 | 26.00 | 0.00 | 0.00 | 0.62 | 0.62 | 28.66 | 621.72 |
|  |  |  |  |  | PV Tax Shields Tax on shields |  | 269.92 |  |  |  |  |  |  |
|  |  |  |  |  |  |  | 77.99 |  |  |  |  |  |  |
|  |  |  |  |  | After Tax Investment |  | $\frac{520.07}{442.09}$ |  |  |  |  |  |  |
|  |  |  |  |  |  |  | 442.09 |  |  |  |  |  |  |
|  |  |  |  |  | djust for Tax | Gross-Up | 621.72 |  |  | -----------> | Rev Req | 621.72 |  |


| Financial Input | Input |
| :--- | :--- |
| Capital Investment - Material | $\$ 327.75$ |
| Capitalized Labor | $\$ 228.59$ |
| Total Capitalized Investment | $\$ 556.34$ |



| Financial Input <br> Capital Investment - Material | Input <br> $\$ 448.39$ <br> Capitalized Labor |
| :--- | ---: |
| Total Capitalized Investment | $\$ 228.59$ |



## alculation of Monthly Distribution Rate

Duquesne Light Company
ED Installation

| Financial Input | Input |
| :--- | :--- |
| Capital Investment - Material | $\$ 506.32$ <br> Capitalized Labor <br> $\$ 228.59$ <br> Total Capitalized Investment <br> $\$ 734.91$ |


| Total Capitalized Investment \$734.91 |  |  |  |
| :---: | :---: | :---: | :---: |
| Years for straight line book depreciation |  |  |  |
| Book Depreciation Rate $5.00 \%$ |  |  |  |
| Years for straight line tax depreciation 20 |  |  |  |
| Tax Depreciation Rate 5.00\% |  |  |  |
| Tax Rate | State |  | 9.99\% |
|  | Federa |  | 21.00\% |
|  | Combin |  | 28.89\% |
|  | Gross | e Adjustment | 71.11\% |
|  | Gross | e Conversion Factor | 1.40631 |

PA Gross Receipts Tax $5.90 \%$

| Weighted Cost of Capital |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Capitalization |  | Weighted |  |
|  | Ratio | Rate | Return | WATCC |
| Debt | 46.65\% | 4.29\% | 2.00\% | 1.42\% |
| Preferred | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Equity | 53.35\% | 10.95\% | 5.84\% | 5.84\% |
|  | 100.00\% |  | 7.84\% | 7.26\% |

Monthly Distribution Rate

| Sum of PV of Revenue Requirement | $\$ 878.54$ |
| :--- | ---: |
| Levelized Annual Revenue Requirement | $\$ 84.64$ |
| Annual O\&M / Maintenance Expense | $\$ 0.00$ |
| Annual Revenue Requirement | $\$ 84.64$ |
| Net Monthly Tariff Rate | $\$ 7.05$ |
| PA Gross Receipts Tax | $\$ 0.44$ |
| Total Monthly Distribution Rate | $\$ 7.50$ |


| A | B | c | D | E | F | G | H | 1 | J | K | L | M | N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Capital | Return |  |  |  | Deferred Tax on Depreciation |  |  |  | Tax |  | Total | Cumulative NPV |
| Year | B.O.Y. Plant | $\begin{aligned} & \text { Return on } \\ & \text { Debt } \end{aligned}$ | Return on Preferred | Return on Equity | Total Return on Net Plant | Book Deprec. | Tax Deprec. | $\begin{gathered} \text { E.O.Y } \\ \text { Def. Inc. Tax } \end{gathered}$ | Income Tax on Preferred | Income Tax on Equity | Total Income Taxes | Revenue Requirement |  |
|  |  |  |  |  | C+D+E |  |  | (H-G)*Tax | $\mathrm{D}^{*}(\operatorname{Tax} /(1-\mathrm{Tax})) \mathrm{E}^{*}(\operatorname{Tax} /(1-\mathrm{Tax}))$ |  | J+K | F+G+L |  |
| 1 | 734.91 | 14.70 | 0.00 | 42.93 | 57.63 | 36.75 | 36.75 | 0.00 | 0.00 | 17.44 | 17.44 | 111.82 | 104.25 |
| 2 | 698.17 | 13.96 | 0.00 | 40.79 | 54.75 | 36.75 | 36.75 | 0.00 | 0.00 | 16.57 | 16.57 | 108.07 | 198.17 |
| 3 | 661.42 | 13.23 | 0.00 | 38.64 | 51.87 | 36.75 | 36.75 | 0.00 | 0.00 | 15.70 | 15.70 | 104.31 | 282.70 |
| 4 | 624.68 | 12.49 | 0.00 | 36.49 | 48.99 | 36.75 | 36.75 | 0.00 | 0.00 | 14.83 | 14.83 | 100.56 | 358.66 |
| 5 | 587.93 | 11.76 | 0.00 | 34.35 | 46.10 | 36.75 | 36.75 | 0.00 | 0.00 | 13.96 | 13.96 | 96.81 | 426.84 |
| 6 | 551.19 | 11.02 | 0.00 | 32.20 | 43.22 | 36.75 | 36.75 | 0.00 | 0.00 | 13.08 | 13.08 | 93.05 | 487.93 |
| 7 | 514.44 | 10.29 | 0.00 | 30.05 | 40.34 | 36.75 | 36.75 | 0.00 | 0.00 | 12.21 | 12.21 | 89.30 | 542.59 |
| 8 | 477.69 | 9.55 | 0.00 | 27.91 | 37.46 | 36.75 | 36.75 | 0.00 | 0.00 | 11.34 | 11.34 | 85.54 | 591.41 |
| 9 | 440.95 | 8.82 | 0.00 | 25.76 | 34.58 | 36.75 | 36.75 | 0.00 | 0.00 | 10.47 | 10.47 | 81.79 | 634.92 |
| 10 | 404.20 | 8.08 | 0.00 | 23.61 | 31.70 | 36.75 | 36.75 | 0.00 | 0.00 | 9.59 | 9.59 | 78.04 | 673.62 |
| 11 | 367.46 | 7.35 | 0.00 | 21.47 | 28.82 | 36.75 | 36.75 | 0.00 | 0.00 | 8.72 | 8.72 | 74.28 | 707.97 |
| 12 | 330.71 | 6.61 | 0.00 | 19.32 | 25.93 | 36.75 | 36.75 | 0.00 | 0.00 | 7.85 | 7.85 | 70.53 | 738.37 |
| 13 | 293.97 | 5.88 | 0.00 | 17.17 | 23.05 | 36.75 | 36.75 | 0.00 | 0.00 | 6.98 | 6.98 | 66.78 | 765.21 |
| 14 | 257.22 | 5.14 | 0.00 | 15.03 | 20.17 | 36.75 | 36.75 | 0.00 | 0.00 | 6.11 | 6.11 | 63.02 | 788.82 |
| 15 | 220.47 | 4.41 | 0.00 | 12.88 | 17.29 | 36.75 | 36.75 | 0.00 | 0.00 | 5.23 | 5.23 | 59.27 | 809.52 |
| 16 | 183.73 | 3.67 | 0.00 | 10.73 | 14.41 | 36.75 | 36.75 | 0.00 | 0.00 | 4.36 | 4.36 | 55.51 | 827.60 |
| 17 | 146.98 | 2.94 | 0.00 | 8.59 | 11.53 | 36.75 | 36.75 | 0.00 | 0.00 | 3.49 | 3.49 | 51.76 | 843.32 |
| 18 | 110.24 | 2.20 | 0.00 | 6.44 | 8.64 | 36.75 | 36.75 | 0.00 | 0.00 | 2.62 | 2.62 | 48.01 | 856.90 |
| 19 | 73.49 | 1.47 | 0.00 | 4.29 | 5.76 | 36.75 | 36.75 | 0.00 | 0.00 | 1.74 | 1.74 | 44.25 | 868.58 |
| 20 | 36.75 | 0.73 | 0.00 | 2.15 | 2.88 | 36.75 | 36.75 | 0.00 | 0.00 | 0.87 | 0.87 | 40.50 | 878.54 |
|  |  |  |  |  |  | Tax Shields | 381.42 |  |  |  |  |  |  |
|  |  |  |  |  | Tax | on shields | 110.20 |  |  |  |  |  |  |
|  |  |  |  |  | After Ta | vestment hvestment | $\frac{734.91}{624.71}$ |  |  |  |  |  |  |
|  |  |  |  |  | djust for Tax | Gross-Up | 878.54 |  |  | ---------------- | Rev Req | 878.54 |  |

## Calculation of Monthly Distribution Rate

Duquesne Light Company

| Financial Input | Input |
| :--- | :--- |
| Capital Investment - Material | $\$ 530.80$ |
| Capitalized Labor | $\$ 228.59$ |
| Total Capitalized Investment | $\$ 759.39$ |


| Total Capitalized Investment |  |  |
| :--- | ---: | ---: |
| Years for straight line book depreciation |  |  |
| Book Depreciation Rate |  |  |
| Years for straight line tax depreciation | 50 |  |
| Tax Depreciation Rate |  | 20 |
| Tax Rate | State | $5.00 \%$ |
|  | Federal | $9.99 \%$ |
|  | Combined | $21.00 \%$ |
|  | Gross Revenue Adjustment | $28.89 \%$ |
|  | Gross Revenue Conversion Factor | $71.11 \%$ |
|  |  |  |
|  |  |  |

PA Gross Receipts Tax 5.90\%

| Weighted Cost of Capital |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Capitalization |  | Weighted |  |
|  | Ratio | Rate | Return | WATCC |
| Debt | 46.65\% | 4.29\% | 2.00\% | 1.42\% |
| Preferred | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Equity | 53.35\% | 10.95\% | 5.84\% | 5.84\% |
|  | 100.00\% |  | 7.84\% | 7.26\% |


| Sum of PV of Revenue Requirement | $\$ 907.81$ |
| :--- | ---: |
| Levelized Annual Revenue Requirement | $\$ 87.46$ |
| Annual O\&M / Maintenance Expense | $\$ 0.00$ |
| Annual Revenue Requirement | $\$ 87.46$ |
| Net Monthly Tariff Rate | $\$ 7.29$ |
| PA Gross Receipts Tax | $\$ 0.46$ |
| Total Monthly Distribution Rate | $\$ 7.75$ |

## Monthly Distribution Rate



| A | B | c | D | E | F | G | H | 1 | J | K | L | M | $N$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Capital | Return |  |  |  | Deferred Tax on Depreciation |  |  | Tax |  |  | Total | Cumulative NPV |
| Year | B.O.Y. Plant | $\begin{aligned} & \text { Return on } \\ & \text { Debt } \end{aligned}$ | Return on Preferred | Return on Equity | Total Return on Net Plant | Book Deprec. | Tax Deprec. | $\begin{gathered} \text { E.O.Y } \\ \text { Def. Inc. Tax } \end{gathered}$ | Income Tax on Preferred | Income Tax on Equity | Total Income Taxes | Revenue Requirement |  |
|  |  |  | C+D+E |  |  |  |  | (H-G)*Tax | $\mathrm{D}^{*}(\operatorname{Tax} /(1-\operatorname{Tax})) \mathrm{E}^{*}(\operatorname{Tax} /(1-\operatorname{Tax}))$ |  | J+K | F+G+L |  |
| 1 | 759.39 | 15.19 | 0.00 | 44.36 | 59.55 | 37.97 | 37.97 | 0.00 | 0.00 | 18.03 | 18.03 | 115.55 | 107.72 |
| 2 | 721.42 | 14.43 | 0.00 | 42.14 | 56.57 | 37.97 | 37.97 | 0.00 | 0.00 | 17.12 | 17.12 | 111.67 | 204.77 |
| 3 | 683.45 | 13.67 | 0.00 | 39.93 | 53.60 | 37.97 | 37.97 | 0.00 | 0.00 | 16.22 | 16.22 | 107.79 | 292.11 |
| 4 | 645.49 | 12.91 | 0.00 | 37.71 | 50.62 | 37.97 | 37.97 | 0.00 | 0.00 | 15.32 | 15.32 | 103.91 | 370.61 |
| 5 | 607.52 | 12.15 | 0.00 | 35.49 | 47.64 | 37.97 | 37.97 | 0.00 | 0.00 | 14.42 | 14.42 | 100.03 | 441.05 |
| 6 | 569.55 | 11.39 | 0.00 | 33.27 | 44.66 | 37.97 | 37.97 | 0.00 | 0.00 | 13.52 | 13.52 | 96.15 | 504.18 |
| 7 | 531.58 | 10.63 | 0.00 | 31.05 | 41.69 | 37.97 | 37.97 | 0.00 | 0.00 | 12.62 | 12.62 | 92.27 | 560.66 |
| 8 | 493.61 | 9.87 | 0.00 | 28.84 | 38.71 | 37.97 | 37.97 | 0.00 | 0.00 | 11.72 | 11.72 | 88.39 | 611.11 |
| 9 | 455.64 | 9.11 | 0.00 | 26.62 | 35.73 | 37.97 | 37.97 | 0.00 | 0.00 | 10.82 | 10.82 | 84.51 | 656.07 |
| 10 | 417.67 | 8.35 | 0.00 | 24.40 | 32.75 | 37.97 | 37.97 | 0.00 | 0.00 | 9.91 | 9.91 | 80.64 | 696.06 |
| 11 | 379.70 | 7.59 | 0.00 | 22.18 | 29.78 | 37.97 | 37.97 | 0.00 | 0.00 | 9.01 | 9.01 | 76.76 | 731.55 |
| 12 | 341.73 | 6.83 | 0.00 | 19.96 | 26.80 | 37.97 | 37.97 | 0.00 | 0.00 | 8.11 | 8.11 | 72.88 | 762.97 |
| 13 | 303.76 | 6.08 | 0.00 | 17.74 | 23.82 | 37.97 | 37.97 | 0.00 | 0.00 | 7.21 | 7.21 | 69.00 | 790.70 |
| 14 | 265.79 | 5.32 | 0.00 | 15.53 | 20.84 | 37.97 | 37.97 | 0.00 | 0.00 | 6.31 | 6.31 | 65.12 | 815.10 |
| 15 | 227.82 | 4.56 | 0.00 | 13.31 | 17.87 | 37.97 | 37.97 | 0.00 | 0.00 | 5.41 | 5.41 | 61.24 | 836.49 |
| 16 | 189.85 | 3.80 | 0.00 | 11.09 | 14.89 | 37.97 | 37.97 | 0.00 | 0.00 | 4.51 | 4.51 | 57.36 | 855.17 |
| 17 | 151.88 | 3.04 | 0.00 | 8.87 | 11.91 | 37.97 | 37.97 | 0.00 | 0.00 | 3.61 | 3.61 | 53.48 | 871.41 |
| 18 | 113.91 | 2.28 | 0.00 | 6.65 | 8.93 | 37.97 | 37.97 | 0.00 | 0.00 | 2.70 | 2.70 | 49.61 | 885.45 |
| 19 | 75.94 | 1.52 | 0.00 | 4.44 | 5.96 | 37.97 | 37.97 | 0.00 | 0.00 | 1.80 | 1.80 | 45.73 | 897.51 |
| 20 | 37.97 | 0.76 | 0.00 | 2.22 | 2.98 | 37.97 | 37.97 | 0.00 | 0.00 | 0.90 | 0.90 | 41.85 | 907.81 |
|  |  |  |  |  | PV Ta | ax Shields | 394.13 |  |  |  |  |  |  |
|  |  |  |  |  | Tax 0 | on shields | 113.87 |  |  |  |  |  |  |
|  |  |  |  |  |  | nvestment | 759.39 |  |  |  |  |  |  |
|  |  |  |  |  | After Tax In | investment | 645.52 |  |  |  |  |  |  |
|  |  |  |  |  | djust for Tax | Gross-Up | 907.81 | ------- | ------ =---- | ------------------P | Rev Req | 907.81 |  |


| Financial Input <br> Capital Investment - Material | Input <br> $\$ 640.00$ <br> Capitalized Labor |
| :--- | ---: |
| Total Capitalized Investment | $\$ 228.59$ |
| 888.59 |  |



| Financial Input | Input |
| :--- | :--- |
| Capital Investment - Material | $\$ 670.00$ |
| Capitalized Labor | $\$ 228.59$ |
| Total |  |


| Capitalized Labor | $\$ 228.59$ |
| :--- | ---: |
| Total Capitalized Investment | $\$ 898.59$ |



| Financial Input | Input |
| :--- | ---: |
| Capital Investment - Material | $\$ 525.00$ |
| Capitalized Labor | $\$ 228.59$ |
| Total Capitaized Investment | $\$ 753.59$ |


| Capitalized Labor | $\$ 228.59$ |
| :--- | ---: |
| Total Capitalized Investment | $\$ 753.59$ |



## 55 W LED Installation

| Financial Input | Input |
| :--- | :--- |
| Capital Investment - Material | $\$ 525.00$ |
| Capitalized Labor | $\$ 288.59$ |
| Total Capitalized Investment | $\$ 753.59$ |


| \$ |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  | Sum of PV of Revenue Requirement | \$900.87 |
| Years for straight line book depreciation |  | 20 |  |  |
| Book Depreciation Rate |  | 5.00\% | Levelized Annual Revenue Requirement | \$86.79 |
| Years for straight line tax depreciation Tax Depreciation Rate |  | 20 | Annual O\&M / Maintenance Expense | \$0.00 |
|  |  | 5.00\% | Annual Revenue Requirement | \$86.79 |
| Tax Rate | State | 9.99\% | Net Monthly Tariff Rate | \$7.23 |
|  | Federal | 21.00\% | PA Gross Receipts Tax | \$0.45 |
|  | Combined | 28.89\% | Total Monthly Distribution Rate | \$7.69 |




Exhibit DBO-5
Duquesne Light Company
Updated Unbundling Default Service Costs

| Updated Unbundling Default Service Costs |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | $A=(B * 4)$ | $B=(C+D+E+F)$ | c | D | E | F |
|  |  |  |  |  | Total | Annualized | Forecas | Annual Defaul | Service Costs by Cust | omer Class |
| Line | Item | Current Recovery Mechanism | Proposed Recovery Mechanism | Description | Estimated Costs | Estimated Costs | Residential \& Lighting | Small C\& | Medium C\& $<200$ |  |
| 1 | Forecasted POLR Sales (MWh) - 6.1.2021-5.31.2024 |  |  |  |  | 4,048,700 | 2,722,000 | 480,600 | 542,600 | 303,500 |
|  | Unbundled Default Service Costs |  |  |  |  |  |  |  |  |  |
| 2 | Filing Preparation and Approval Process | Default Service <br> Supply Rates | Default Service Supply Rates (Allocated on forecasted | Consulting services and outside counsel to help prepare filing and throughout regulatory | \$844,505 | \$211,126 | \$141,943 | \$25,062 | \$28,295 | \$15,827 |
| 4 | Working Capital for Default Service Supply [1] | Default Service Supply Rates | POLR MWhs) <br> Default Service Supply Rates (Allocated on forecasted POLR MWhs) | nrocess <br> Costs associated with lag in time between the utility's out-of-pocket payment expenses and the collection of revenues for default service. | \$5,638,282 | \$1,409,571 | \$947,675 | \$167,323 | \$188,908 | \$105,665 |
|  | Total (Line $3+$ Line 4) |  |  |  | \$6,482,787 | \$1,620,697 | \$1,089,618 | \$192,384 | \$217,203 | \$121,491 |

$1 /$ Assuming the Company's pre-tax weighted cost of capital of $\sim 10.22 \%$, the revenue requirement (annual expense) associated with DSS working capital is $\$ 1,409,571$ [ $\$ 13,796,655$ multiplied by $\sim 10.22 \%$ return]. The cash working capital cost of $\$ 13,796,655$ is based on the supply related working capital costs excluded from distribution base rates in the Company's current base rate proceeding on Exhibit 6-1, page 2 of 6 , line 66 .

## Duquesne Light Company

## Schedule 1 - Computation of Proposed Federal Tax Adjustment Clause ("FTAC")

Illustrative Example - January 1, 2022 through December 31, 2022

## Line No.

$4 \quad$ PAR $=$ Projected Annual Base Distribution Revenue
Federal Income Tax Adjustment

Amount to be Recovered (w/o GRT)

Amount to be Recovered (w/GRT)

FTAC = Federal Tax Adjustment Clause
Rate \% of Base Distribution Revenues (w/ GRT)

Total
17,638,075 Exhibit 5, Statement No. 12, Exhibit MLS-3, Page 2, Line 10

27,216,228 Line 1 * Note 1

28,922,665 Line 2 * Note 2

644,342,923 Exhibit 2, Schedule D-5D, page 3, Column C, line 19.

Note 1:
(1/((1-SIT)*(1-FIT)))
SIT $=9.99 \%$ State Income Tax
FIT $=28 \%$ Federal Income Tax

Note 2:
$1 /(1-T)=(T=5.9 \%$ Gross Receipts Tax)

## BEFORE THE

# PENNSYLVANIA PUBLIC UTILITY COMMISSION 

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 17

Direct Testimony of Margot Everett<br>Subjects: Rider No. 16, Community Development Rider, Residential Subscription Rate Pilot, and Electric Vehicle Program Rates

## DIRECT TESTIMONY OF MARGOT EVERETT

Q. PLEASE STATE YOUR NAME, BUSINESS ADDRESS, AND OCCUPATION.
A. My name is Margot Everett. My business address is 101 California Street, Suite 4100, San Francisco, California 94111. I am a Director for Guidehouse and will provide testimony on behalf of Duquesne Light Company ("DLC" or the "Company").

## Q. BRIEFLY STATE YOUR EDUCATION, BACKGROUND AND EXPERIENCE.

I have a Master of Science and Bachelor of Arts in Applied Economics from University of California, Santa Cruz. With over thirty-five years in the energy industry, I have held many differing roles from evaluation and design of customer programs, wholesale power contract structuring, market, credit and enterprise risk management and cost of service and rate design. Recently I spent five years leading Pacific Gas and Electric's (PG\&E's) electric and gas rates, load forecasting and cost of service departments. In that role I have led the development and design of alternative rate designs for distributed energy resources, such as a successor to the Net Energy Metering tariff.

## Q. HAVE YOU PREVIOUSLY TESTIFIED BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION (THE "COMMISSION")? <br> A. No, however, I have testified numerous times in California and South Carolina, and on rate design policy and alternative rate designs. Further I supervised all testimony related to rates, cost of service and load forecasting for the five years I served as Senior Director of Rates and Regulatory Analytics at PG\&E.

Q. HAVE YOU INCLUDED ANY EXHIBITS WITH YOUR TESTIMONY?
A. Yes, I have two Exhibits:

- Exhibit ME-1, which summarizes cost-shifting associated with the Company's current Rider No. 16; and
- Exhibit ME-2, which describes the methodologies and inputs for the benefit cost analyses of the Company's proposed Fleet and Home Charging EV programs.


## Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY?

A. The purpose of my testimony is to present new rate options, the justification for those rate designs, and the proposed values for these rates. The rate options are as follows:

1. Revised Rider 16 for standby services;
2. New Rider for Community Development rates; and
3. New Residential Subscription Rate Pilot.

I am also providing testimony supporting rates included in the Fleet Pilot and Home Charging Pilot described in Witness Olexsak's testimony. Lastly, I am sponsoring testimony regarding the benefit and cost analysis (BCA) performed for the Fleet Pilot and Home Charging Pilot to support the adoption of these pilots.

## Q. PLEASE DESCRIBE THE EXISTING RIDER No. 16.

A. Rider No. 16 is an optional rate that applies to non-utility generating facilities ${ }^{1}$. Specifically, it applies to customers who self-generate through use of Combined Heat and Power (CHP) or other technologies and utilize supply and delivery capacity on Duquesne Light Company's distribution system. Rider No. 16 includes provisions for energy supply and delivery and is differentiated by levels of service to cover energy needs not being met by the customer's generator. Specifically, Rider No. 16 differentiates between Supplementary Power and Back-Up Power.

Rider No. 16 is an optional rate. Customers who elect to take service on Rider No. 16 agree to service for a "Base Period" defined as "the twelve consecutive monthly billing periods applicable to the customer ending one month prior to the installation of new onsite generation or increase in capacity to existing on-site supply". The customer also agrees to the level of service that the Company would be required to provide. Specifically, the customer agrees to "Contract Demand" that is defined as "the maximum electrical capacity in kilowatts that the Company shall be required by the contract to deliver to the customer for Back-Up Power." Rider No. 16 also provides that a "Contract Demand may be established for Supplementary Power to the customer's facility."

## Q. PLEASE DESCRIBE SUPPLEMENTARY POWER AND HOW IT APPLIES UNDER THE EXISTING RIDER No. 16.

[^77]A. Supplementary Power refers to distribution services provided by the Company and regularly used by the customer to meet its energy needs that are in excess of the electricity that the customer's generation facility typically produces. Rider No. 16 specifically defines Supplementary Power as the "electric energy and capacity supplied by the Company or by an Electric Generation Supplier (EGS) to a non-utility generating facility and regularly used in addition to that electric energy which the non-utility generating facility generates itself." Also, Rider No. 16 notes that "The Company's regular and appropriate General Service Rates will be utilized for billing charges for Supplementary Power. Customers purchasing Supplementary Power from an EGS will be billed for charges according to their applicable rate and billing arrangement with their EGS." That is, the Company's tariffed General Service Rates (e.g., GM $<25$, GM $\geq 25$, GMH $<25$, GMH $\geq 25$, GL, GLH and L rates) are charged for Supplementary Power services and are based on the customer's actual monthly billing demand (kW) up to the contracted Supplementary Demand levels. If Supplementary Power supply is provided by the Company, the customer is charged for that supply by their Electric Generation Supplier ("EGS") or by the Company under either Rider No. 8 - Default Service Supply (if customer's demand is less than 200kW) or Rider No. 9 - Day-Ahead Hourly Price Service (if customer's demand is equal to or greater than 200kW).

## Q. PLEASE DESCRIBE BACK-UP POWER AND HOW IT APPLIES UNDER THE EXISTING RIDER No. 16.

A. Back-Up Power refers to distribution services provided by the Company to enable a customer to replace electricity ordinarily generated by the customer's on-site equipment during any outage. Rider No. 16 currently defines Back-up Power as "electric energy and
capacity supplied by the Company to a non-utility generating facility during any outage of the non-utility generating facility's electric generating equipment to replace electric energy ordinarily generated by the non-utility generating facility's generating equipment." By its nature, Back-Up Power is used infrequently but still requires the Company to maintain distribution capacity for that customer if the customer needs additional electricity delivered during those outages. To be eligible for Back-Up Power service, the number of hours the customer needs such services must be equal to or less than $15 \%$ of all hours in a year.

Back-up service requires the Company to ensure adequate distribution capacity for those times when the customer's generating facility is not producing adequate electricity for its needs. Examples of when such events occur include but are not limited to planned maintenance outages and forced outages that either reduce output or cause the plant to shut down entirely. When these events occur, the customer requires delivery of energy to meet the customer's electricity needs that are typically provided by their generation equipment. The additional delivery capacity can be required for several hours or for up to several weeks.

## Q. PLEASE DESCRIBE ALL BACK-UP POWER CHARGES CURRENTLY APPLIED UNDER THE EXISTING RIDER No. 16.

A.

As briefly noted above, a customer who selects Rider No. 16 contracts for BackUp Power services for a "Base Period" and establishes a Contract Demand. Contract Demand represents the maximum electrical capacity in kilowatts $(\mathrm{kW})$ that the Company shall be required to deliver to the customer for Back-Up Power. The customer then pays a monthly charge of $\$ 2.50$ per kW of Contract Demand, regardless of whether the customer calls upon Back-Up Power services.

In any billing period during which the Company provides Back-Up Power, the customer is billed additional charges for energy supply. Like energy supplied by the Company under Supplement Power, the customer is charged for that supply by its Electric Generation Supplier ("EGS") or by the Company under either Rider No. 8 - Default Service Supply (if customer's demand is less than 200kW) or Rider No. 9 - Day-Ahead Hourly Price Service (if customer's demand is equal to or greater than 200kW).

Contract Demand is established in cooperation with the Company and set for the "Base Period." However, if a customer exceeds the Contract Demand by 5\% or more in any billing period, the customer's actual maximum kW demand in that billing period becomes the customer's new Contract Demand for the remaining term of the Back-Up Power contract. Therefore, for the remaining term of the "Base Period," the customer's "ratcheted" Contract Demand applies to the $\$ 2.50 / \mathrm{kW}$ rate in the tariff.

Lastly, if the customer's actual demand during the time Back-Up Power is being provided exceeds Contract Demand by $10 \%$ or more, the customer is assessed an additional fee. This fee is equal to the difference between the actual demand and Contract Demand times the Contract Demand charge times two (i.e., $\$ 5.00$ per kW).

## Q. WHY ARE STAND-BY RATES NEEDED?

A. Stand-by rates are a common practice among utilities and are designed to recover distribution costs from those customers that infrequently or intermittently require distribution services over the course of the year. These customers rarely call upon the capacity of the grid for back-up service because they only require delivery during times when their generation is not operating as planned. However, their capacity needs can be dramatic during those occasions and the Company must have distribution services available
to meet this unpredictable load at any time. A customer is only eligible for service under Rider No. 16 where the customer requires back-up service for less than $1,314^{2}$ hours per year. However, the maximum capacity they require during those hours could be significant. Nevertheless, assets to deliver electricity to this customer must be available at all times for how long those assets will be needed by this customer. Put simply, standby rates are necessary to ensure that all other Duquesne Light customers do not pay for the costs the individual customer with a generator creates. Avoiding 'subsidization' of certain customers through 'cost shifts', or costs created by one customer or group of customers being 'shifted' and paid for by other customers or customer groups, is fundamental to costreflective rate design.

## Q. WHY IS THE COMPANY PROPOSING TO CHANGE THE STRUCTURE OF RIDER 16? <br> A. As noted above, the key reason for creating standby rates is to eliminate or minimize the subsidy that other customers pay that should be paid by a customer with an operating generator behind the meter. The current rate structure is not cost-reflective. Therefore, the customers who select this rate (as noted above, Rider No. 16 is an optional rate) are able to avoid paying costs that are incurred to serve them and thus customers not on the rate are picking up the difference.

## Q. PLEASE DESCRIBE HOW YOU CONCLUDED THAT THE CURRENT RIDER NO. 16 IS NOT COST REFLECTIVE AND THUS THERE IS A COST SHIFT.

[^78]A. A review of the bills that a typical customer would pay if they were on the GL General Services Rate, which is cost-reflective, versus the current Standby Rate shows that a typical customer on Rider No. 16 pays far less, up to $12 \%$ less, than if they were on their GL rate. This detail is provided in Exhibit No. ME-1. These differences in bills versus what the typical customer would pay otherwise represents the degree of cost-shifting. To rectify, Rider No. 16 should be redesigned to reflect costs to serve these customers.

## Q. WHAT IS THE PROPOSED STRUCTURE FOR THE UPDATED RIDER 16?

The Company is proposing a new structure to Rider No. 16, hereafter referred to as Revised Rider No. 16, to better align this optional rate to other rates offered by the Company and to create a structure that is more reflective of costs and protects the Company's customers who do not have customer generation from cost shifts as more customer generators are installed in the Company's service territory.

## Q. PLEASE DESCRIBE THE PROPOSED STRUCTURE OF THE REVISED RIDER NO. 16.

The Company is proposing three modifications to Rider No. 16:

1. Creation of Maintenance Contract Demand with a related charge of $\$ 3.09$ per kW of Maintenance Contract Demand.
2. Creation of As-Used Contract Demand with a related charge of $\$ 6.79$ per kW of As-Used Contract Demand.
3. Adjustment of Overage Fees for periods during which Maintenance Contract Demand is exceeded by $10 \%$ or more to $\$ 9.88$ per kW of actual demand in excess of Maintenance Contract Demand.

## Q. PLEASE DESCRIBE YOUR APPROACH TO DESIGNING THE PROPOSED

 RIDER 16.A. The basic approach was to create a rate that could be applied to all customer classes eligible for Back-Up service and have that rate represent cost of service. Specifically, the Company applied a Revenue Neutral Rate design approach across the following General Services Rate schedules: $\mathrm{GM}<25, \mathrm{GMH}<25, \mathrm{GM} \geq 25, \mathrm{GMH} \geq 25$, GL, GLH and L . This approach results in the development of an estimate of the bill that a typical customer would pay if they were on their applicable General Service rate.

The proposed rate design comprises a Maintenance Demand rate and an As-Used Demand rate. It also maintains both the Overage Fees for customers that significantly exceed their contracted Maintenance Demand and the mechanism for adjusting the contracted demands should the customer significantly exceed those agreed to service levels.

## Q. WHAT IS THE PROPOSED COST REFLECTIVE MAINTENANCE DEMAND RATE AND HOW WAS IT COMPUTED?

A. The first step in this process is to estimate the service that would be provided under Back-Up Service, or specifically a level of Maintenance Contract Demand relative to a load shape of expected delivery services, by rate class. Because the Rider No. 16 structure charges customers the same amount for Back-Up or Maintenance Contract Demand every month, despite the actual level of services provided, the rate should reflect that the customer does not always consume the maximum demand every month and thus there is load diversity. That is, if every customer on Rider No. 16 were to pay based on maximum
demand rather than the sum of their monthly demands, they would pay too much for their service relative to other customers. Further, because a customer may choose Supplementary Demand service in addition to Back-Up service, Supplementary Demand can be assumed to be set to the customer's minimum monthly demand and Back-Up services would provide for service above that minimum. Therefore, the Company calculated a Load Diversity factor (LD Factor) for each class based on the billing demands for each class. The LD Factor was calculated as the ratio of the average difference between minimum demand and actual demand and the maximum demand. Table 1 below shows the monthly billing demands by class and the calculation for the LD Factor by class. ${ }^{3}$

[^79]都

|  | GM<25 | GM>25 | GL | $\mathbf{L}$ | GMH <br> $<\mathbf{2 5}$ | GMH <br> $>\mathbf{2 5}$ | GLH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Jan | 9.9 | 73.4 | 683.8 | $7,467.3$ |  |  |  |
| Feb | 9.4 | 68.9 | 644.8 | $7,376.0$ |  |  |  |
| Mar | 10.3 | 77.9 | 739.0 | $7,989.8$ |  |  |  |
| Apr | 9.8 | 73.3 | 709.8 | $7,849.6$ |  |  |  |
| May | 11.7 | 87.7 | 821.9 | $8,764.9$ |  |  |  |
| Jun | 11.9 | 89.3 | 807.1 | $8,729.8$ | 9.5 | 58.8 | 704.0 |
| Jul | 12.4 | 92.9 | 844.0 | $9,137.0$ | 9.0 | 62.1 | 755.4 |
| Aug | 11.5 | 90.1 | 849.9 | $9,093.9$ | 8.6 | 60.9 | 754.0 |
| Sep | 10.6 | 82.5 | 761.9 | $8,234.6$ | 8.4 | 52.7 | 622.9 |
| Oct | 11.0 | 80.2 | 768.0 | $8,295.8$ |  |  |  |
| Nov | 10.8 | 76.5 | 702.7 | $7,835.0$ |  |  |  |
| Dec | 10.3 | 73.8 | 691.2 | $7,592.0$ |  |  |  |
| Total | 129.6 | 966.5 | $9,024.1$ | $98,365.6$ | 35.4 | 234.4 | $2,836.3$ |
| Maximum | 12.4 | 92.9 | 849.9 | $9,137.0$ | 9.5 | 62.1 | 755.4 |
| Minimum | 9.4 | 68.9 | 644.8 | $7,376.0$ | 8.4 | 52.7 | 622.9 |
| Months | 12.0 | 12.0 | 12.0 | 12.0 | 4 | 4 | 4 |
| Average | 10.8 | 80.5 | 752.0 | $8,197.1$ | 8.9 | 58.6 | 709.1 |
| Avg -Min | 1.4 | 11.7 | 107.3 | 821.2 | 0.5 | 5.9 | 86.1 |
| Max-Min | 3.0 | 24.0 | 205.2 | $1,761.0$ | 1.2 | 9.4 | 132.4 |
| LD Factor | $46 \%$ | $49 \%$ | $52 \%$ | $47 \%$ | $42 \%$ | $63 \%$ | $65 \%$ |

Table 1: Average Monthly Maximum Demand by Rate

The LD Factor is multiplied by the applicable demand charge for each rate schedule, representing the cost the customer would impose on the system if its demand could be smoothed out over time. This calculated rate then represents the cost-reflective value for the applicable Maintenance Contract Demand services provided by the Company. Table 2 shows the calculation of the diversified rate by rate schedule. Further, since customers from any of these rate schedules can select Rider No. 16, the rate must be revenue-neutral to the Company on an overall basis. Therefore, the final Back-Up Service rate is established using the load weighted average of each rate schedule, or $\$ 4.88 / \mathrm{kW}$. This calculation is also shown in Table 2.

Table 2: Calculation of Proposed Back-Up Services Cost Reflective Rate

Q. IS THE COMPANY PROPOSING TO IMPLEMENT THE FULL COSTREFLECTIVE MAINTENANCE DEMAND CHARGE AT THIS TIME?
A. No. While the value of $\$ 4.88 / \mathrm{kW}$ represents the revenue-neutral, cost-based rate for back-up service if customers smoothed out their demand, if the Company were to move to this rate level for Contract Demand, the change in the Rider No. 16 rate constitute a $95 \%$ increase over the present rate of $\$ 2.50$ per kW for back-up service. To ensure a gradual change in rates toward a cost-reflective tariff, the Company proposes to increase the current Rider No. 16 rate of $\$ 2.50 / \mathrm{kW}$ to $\$ 3.09$, which results in the rate moving closer to the cost reflective value of $\$ 4.88$ without creating significant rate shock for these customers. This rate increase is particularly modest given that the current $\$ 2.50$ per kW rate has not been adjusted since May 1, 2013, before which the corresponding rates were $\$ 6.45$ per kW (for contract demand less than $5,000 \mathrm{~kW}$ ) and $\$ 6.04$ per kW (for contract demand of $5,000 \mathrm{~kW}$ or more) - or about double the rate proposed in this proceeding.

## Q. WHAT IS THE PROPOSED AS-USED DEMAND RATE AND HOW WAS IT

 COMPUTED?A. The As-Used Demand charge is design to ensure the Back-Up rate is fully cost reflective. The As-Used Demand charge only applies to load during a designated Peak Period, which represents the likely times when loads on the Company's system are highest.

Calculation of the As-Used Demand charge reflects the full costs of providing ondemand cost of service during peak demand periods, basically negating the LD Factor discount during times when demand is greatest across the Company's service territory. To best represent this additional cost, the As-Used Demand charge is applied to the customer maximum demand in that month that occurs during the PeakPeriod. This rate is computed based as the full General Service tariff demand charges less charges toward these costs already recovered under the Maintenance Demand rate. Again, since the proposed Rider No. 16 applies to all customers who choose this option, a weighted average of the demand costs per kW for all applicable rate schedules was calculated (see Table 2) as $\$ 9.88$. Finally, care must be taken to not double count revenues from the Maintenance Contract Demand Charge. Therefore, the As-Used Demand Charge is set to the difference between the cost reflective rate of $\$ 9.88$ and the Maintenance Contract Demand charge (or back-up rate) of $\$ 3.09$, or $\$ 6.79$ per kW . Going forward, as the Maintenance Contract Demand rate is increased in subsequent proceedings to closer to the full cost-recovery rate based on the LD factor, this difference will decline.

## Q. WHAT IS THE "PEAK PERIOD" THAT APPLIES TO THE AS-USED DEMAND CHARGE AND HOW WAS IT DETERMINED?

A. The Company reviewed hourly system loads to determine the season and times of day where load is most pronounced and potentially drives the Company's distribution costs. Figure 1 below shows a heat map that depicts total load by hour by month, with hours on the horizontal and months on the vertical axis. Figure 1 also shows the total load by month. Red indicates high load while green represents low load, relative to all hours. As this figure shows, the high load hours tend to happen in the afternoons between June through September (denoted in red or orange). Further, the red box included in Figure 1 shows that demand during these months are most pronounced from 11am to 8pm. ${ }^{4}$

Unexpected and potentially significant demands on the system during these high load hours could create additional costs and thus the As Used Demand charge, which is the full cost reflective rate for any customer who requires delivery services, should apply rather than a discounted Maintenance Demand Charge that reflects some load diversity benefits. Note that the As Used Demand Charge that applies during the Peak Period is net of the Maintenance Demand Charge to avoid double counting.

While including May as a 'peak month' was considered, the Company elected to be consistent with the current summer months used for established the heating rates for simplicity and ease of implementation.

[^80]Figure 1: Heatmap of Average Weekday 2018 Hourly System Demand


## Q. PLEASE DESCRIBE IN DETAIL THE 'OVERAGE FEE', HOW IT WAS DETERMINED AND HOW WILL OVER-COLLECTION BE ADDRESSED?

A. Under the current Rider No. 16, the overage fee applies to demand that exceeds the customer's Maintenance Contract Demand by $10 \%$ or more. Currently the overage fee is set to two times the Rider No. 16 rate for Back-Up Power (or $\$ 5.00 / \mathrm{kW}$ ). This scaler is not closely linked to cost reflective principles.

The purpose of the overage fee is to incent setting the Maintenance Contract Demand to levels that represent the expected level of service to be provided under BackUp Services. If a customer strategically chose a Back-Up service level that is lower than expected, the customer will not be paying their cost of service and those costs avoided by the customer are paid for by other customers. To ensure the overage fee is cost-reflective, the Company proposes to set an overage fee based on the average cost to serve the demand. As noted above, the computed average cost to serve is $\$ 9.88 / \mathrm{kW}$ and should be the overage rate, as compared to the Revised Rider No. 16 rate after the application of the Diversification factor of $\$ 4.88$. This results in an Overage Charge Multiplier of 2.1 (simply
9.88/4.88). However, the Company is proposing to only increase the Revised Rider No. 16 rate to $\$ 3.09 / \mathrm{kW}$. Since the overage charge should reflect full cost of service, the Company proposes increasing the overage charge to the full cost of service, or $\$ 9.88 / \mathrm{kW}$. This results in a multiplier of 3.3 , but only applies to the difference in the actual monthly demand (kW) and the Maintenance Demand. ${ }^{5}$

## Q. PLEASE DESCRIBE IN DETAIL THE MECHANISM FOR ADJUSTING MAINTENANCE CONTRACT DEMAND?

A. The current Rider No. 16 calls for an increase in the Contract Demand if the customer's maximum demand exceeds $105 \%$ of its Contract Demand. Specifically, the tariff states, "If a customer's actual kW demand at the time back-up is being supplied exceeds the customer's back-up Contract Demand by $5 \%$ or more, the actual kW demand as established will become the customer's new back-up Contract Demand for the remaining term of the back-up contract." The Company proposes to keep this mechanism to ensure customers are incented to choose the correct level of Maintenance Demand relative to their expected demands on the system, therefore ensuring the customer pays their fair share of the costs of serving them. It is important to note that this mechanism only applies to Maintenance Contract Demand.

## Q. PLEASE DESCRIBE THE PROPOSED CHANGES TO RIDER No. 16 TARIFF

 LANGUAGE.[^81][^82]- "Supplementary Contract Demand" to refer to the threshold to which Supplementary Service is contracted and subsequently provided under applicable General Service Rates;
- "Peak Period" to refer to the period of time between 11am and 8pm EST, Mondays through Saturdays during the months of June through September; and
- "As Used Contract Demand" to refer to the maximum electrical capacity in kilowatts ( kW ) that the Company shall be required to deliver to the customer for "Back-Up Delivery Service" during the Peak Period.

3. Introduction of two distinct rate components for Back-Up Demand:

- "Maintenance Rate" of $\$ 3.09$ per kW of Maintenance Contract Demand, and
- "As Used Premium Rate" of $\$ 9.88$ per kW of As Used Contract Demand.

4. Introduction of three distinct billing determinants for Back-Up Demand service:

- "Maintenance Demand Billing Determinant" refers to the contracted kW served under Back-Up Service and will be equal to Maintenance Contract Demand specified in the contract and applies to every month in the contract period;
- "Supplementary Contract Demand Billing Determinant" refers to the contracted kW served under Supplementary Contract Demand and will be equal to the customer's monthly maximum demand up to the level of demand contracted; and
- "As Used Demand Billing Determinant" refers to the kW that applies if the customer called upon Back-Up Service during the PeakPeriod. Because the As Used Demand charge only applies to demand the customer calls upon during the Peak Period, the billing determinant for As Used Demand is zero if the
customer does not call upon Back-Up Service during the Peak Period. If the customer does call upon Back-Up service during the Peak Period, the billing determinant for As-Used Demand is equal to the customer's actual maximum demand, less the customer's Supplementary Contract Demand, during the Peak Period of that billing cycle.


## Q. IS THE COMPANY PROPOSING ANY CHANGES TO THE RIDER NO. 16 ELIGIB ILITY CRITERIA?

A. No. Rider No. 16 will continue to be an optional rate that applies to customers who self-generate through use of Combined Heat and Power (CHP) or other technologies and also utilize supply delivery capacity on DLC's distribution system. Specifically, Rider No. 16 describes eligible customers as "non-utility generating facilities including, but not limited to cogeneration and small power production facilities that are qualified in accord with Part 292 of Chapter I, Title 18, Code of Federal Regulations (qualifying facility)". This proposal does not change these eligibility criteria.

## Q. PLEASE DESCRIBE IN DETAIL THE PROCESS FOR DETERMINING MAINTENANCE CONTRACT DEMAND FOR BILLING PURPOSES.

The process currently used for developing Contract Demand under Rider No. 16 will continue to apply to the revised Rider No. 16. Specifically, the Maintenance Contract Demand is established during the contracting process and is mutually agreed to by the customer and the Company. Rider No. 16 will also continue to have provisions to mitigate any risk of gaming in the setting of the Contract Demand. Currently Rider No. 16 has the provision that, if the customer exceeds the Contract Demand by $5 \%$ or more during the
billing period, the Company can unilaterally adjust the Contract Demand to the actual demand and this adjustment would remain until the end of the contract period. This same provision remains in Rider No. 16, with adjustments to reference Maintenance Contract Demand.

## Q. PLEASE DESCRIBE IN DETAIL THE PROCESS FOR DETERMININGAS USED

 CONTRACT DEMAND FOR BILLING PURPOSES.A. As Used Contract Demand will be a monthly demand that applies only if the customer calls upon Back-Up Services during the Peak Period. Specifically, if a customer consumes capacity in excess of the Supplementary Contract Demand (and equal to or less than Maintenance Contract Demand) during the PeakPeriod, proposed to be between 11am and 8pm EST during the months of June through September, then the As-Used Demand Billing Determinant is set to the customer's actual maximum demand, less the customer's Supplementary Contract Demand, during that the Peak period for that month. Otherwise, the value is set to zero.

## Q. PLEASE PROVIDE EXAMPLES OF HOW THE NEW RATE RIDER WOULD APPLY IN COMPARISON TO THE CURRENT RATE.

A. This example assumes a customer with demand equal to 1 MW and a generator with capacity of 600 kW . The customer's contract under the current rider would specify that the Supplementary Contract Demand is 400 kW and, for purposes of comparison to current rate, the Contract Demand is set to 600 kW . Similarly, the customer's Maintenance Contract Demand under the revised Rider No. 16 would also be 600 kW .

Focusing on the months September through November, the customer experiences a full outage (all hours) in the last week of September and first week of October. Further, in October, the customer's actual demand is $1,100 \mathrm{~kW}$. The monthly charges under the current and revised tariffs are shown in Table 3. Finally, because the customer's actual use resulted in overage of 100 kW in October, the customer has exceeded both the $5 \%$ ratchet threshold ( 30 kW ) and the $10 \%$ overage fee threshold $(60 \mathrm{~kW})$. Therefore the customer is charged the overage fee on the $10 \%$ and the customers Contract Demand (for the current rate) and Maintenance Demand (for the revised rate) is increased to the actual demand level in October.

Table 3: Hypothetical Bill Comparison

|  |  |  | September | October |  |  |  |  |  |
| :--- | :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Current Rate | November |  |  |  |  |  |  |  |
| A | Contract Demand (kW) | 600 | 600 | 700 |  |  |  |  |  |
| B | Rate (\$/kW) | 2.50 | 2.50 | 2.50 |  |  |  |  |  |
| $\mathrm{C}=\mathrm{AxB}$ | Monthly Charge (\$/month) | $1,500.00$ | $1,500.00$ | $1,750.00$ |  |  |  |  |  |
| D | Overage Demand (kW) | - | 100 | - |  |  |  |  |  |
| $\mathrm{E}=\mathrm{Bx} 2$ | Overage Rate (\$/kW) | 5.00 | 5.00 | 5.00 |  |  |  |  |  |
| $\mathrm{~F}=\mathrm{DxE}$ | Overage Charge (\$/Month) |  |  |  |  |  | - | 500.00 | - |
| $\mathrm{G}=\mathrm{C}+\mathrm{D}$ | Total Base Distribution <br> Charges (\$/Month) | $1,500.00$ | $2,000.00$ | $1,750.00$ |  |  |  |  |  |
|  | Revised Rate |  |  |  |  |  |  |  |  |
| H | Maintenance Contract <br> Demand | 600 | 600 | 700 |  |  |  |  |  |
| I | Maintenance Rate | 3.09 | 3.09 | 3.09 |  |  |  |  |  |
| $\mathrm{~J}=\mathrm{HxI}$ | Monthly Maintenance <br> Charge | $1,800.00$ | $1,800.00$ | $2,100.00$ |  |  |  |  |  |
| K | As-Used Contract Demand | 600 | - | - |  |  |  |  |  |
| L | As-Used Rate | 6.79 | - | - |  |  |  |  |  |
| $\mathrm{M}=\mathrm{KxL}$ | Monthly As Used Charge | $4,073.18$ | - | - |  |  |  |  |  |
| N | Overage Demand | - | 100 | - |  |  |  |  |  |
| P | Overage Rate | 9.88 | 9.88 | 9.88 |  |  |  |  |  |
| $\mathrm{Q}=\mathrm{N} * \mathrm{P}$ | Overage Charge | - | 987.89 | - |  |  |  |  |  |
| $\mathrm{R}=\mathrm{J}+\mathrm{M}+\mathrm{Q}$ | Total Base Distribution <br> Charges | 5,873 | 2,788 | 2,100 |  |  |  |  |  |
| $\mathrm{~S}=\mathrm{R}-\mathrm{G}$ | Difference | 4,373 | 788 | 350 |  |  |  |  |  |

As Table 3 shows, the customer's bill reflects the overage fees and the ratchet in demand starting in November triggered by the October load in excess of the contracted demands. Additionally, note that although the customer draws on Maintenance Contract Demand during both September and October, it does not incur a charge for As-Used Demand in October, as that month falls outside the Peak Period.
Q. HOW DOES THIS PROPOSED STRUCTURE ADDRESS THE CHALLENGES AND SHORTCOMINGS OF THE EXISTING RIDER 16?
A. This revised Standby rate structure and calculated rate of $\$ 4.88$ is based on the cost of service, accounting for the fact that these customers pay a fixed amount monthly. Currently the billing determinants used in the Proof of Revenue calculation are 277,609 kW and thus revenues of $\$ 832,825.63$. Although the proposed rate is not the actual cost reflective rate, it does move the rate towards the target by increasing the rate by $20 \%$ toward the cost-reflective rate of $\$ 4.88$.

Further, from a policy perspective, the As-Used Demand Charge provides customers the opportunity to manage their demands on the Company's system to save money while ensuring those customers pay their full cost of service. Specifically, customers who are able to effectively manage their demand needs by scheduling outages during non-peak months or non-peak hours will be able to avoid these additional charges as they are also not contributing to the potential cost increase.

Lastly, the design of this rate was focused on eliminating the subsidization of customers with generation assets behind the meter but that still rely on the Company's system for serving all their delivery needs. It does this by allowing the Company to collect additional revenue towards cost of service for the customers that use the distribution system intermittently during peak times, and thus potentially increase the Company's operating costs.

## Q. PLEASE DESCRIBE THE PROPOSED COMMUNITY DEVELOPMENT RIDER?

A. The proposed Community Development Rider is designed to provide incentives for customers to bring operations to the Company's service territory. The tariff provides a prescribed discount to distribution services demand charges for five years, with the structure providing the most savings in the first years of the offering. Specifically, the Community Development Rider is a prescribed percent discount to the demand charge of any General Services tariff during the months of January through May and October through December. The discount starts at $25 \%$ and decreases by 5 percentage points ( $20 \%$ ) annually until the end of five years after which no discount is applied.

## Q. PLEASE DESCRIBE THE PURPOSE OF THIS RIDER AND WHY IT IS NEEDED NOW?

A. The Company is proposing this Community Development Rider to provide an incentive to attract non-residential customers with beneficial load profiles to the Company's service territory. This proposal offers benefits to many potential customers who can bring new operations to the Pittsburgh area, existing customers looking to substantially increase their operations within the Company's service territory, and former customers that shut down operations in the past year to reopen in the Company's service territory as the area recovers from the economic ramifications of Covid-19. Specifically, this rate would be open to new businesses, businesses considering a substantial expansion of existing operations, and businesses that shuttered during the pandemic and are considering re-opening.

## Q. HOW DOES THIS PROPOSED STRUCTURE PROVIDE THE BENEFITS YOU

 DESCRIBED?A. This discount will provide benefits to the participating customer by lowering their initial costs to reopen, invest in new technologies or establish the new operations while also benefiting the Company's existing customers by increasing sales, which results in downward pressure on rates. The rate discount is designed to only reduce rates for new customers in those months when system peak is unlikely: October through December, and January through May. The Company experiences the highest level of system load in the months of June through September. Figure 1 above shows a heat map that depicts the high load months and hours. The heat map shows hours on the horizontal and months on the vertical axis. As this figure shows, the high load hours tend to happen in the afternoons between June through September (denoted in red or orange). The community development rate discount does not apply during those months, thus selectively encouraging growth amongst customers with loads that are less likely to impact the Company's system peak. By offering the discount only in non-peak months, the rate structure will increase sales with relatively lower increases in costs. Therefore, these new customers may contribute significantly to the recovery of fixed costs without substantially increasing costs, thus mitigating rates for all customers.

## Q. WHAT IS THE PROPOSED STRUCTURE FOR THE COMMUNITY DEVELOPMENT RATE?

A. The structure offers a percent discount to the volumetric demand charge for months of January through May and October through December. The discount would commence
on the effective date of all rates, which is January 15, 2022, and decline by $20 \%$ every year over five years. To align the discount with the period covered by the Company's tariff, the discount will change every January from 2023 through 2026. The following table shows the discount schedule.

Table 4: Community Development Percent Discount

|  | January <br> 2022 | January <br> 2023 | January <br> 2024 | January <br> 2025 | January <br> 2026 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Discount | $25 \%$ | $20 \%$ | $15 \%$ | $10 \%$ | $5 \%$ |

## Q. PLEASE DESCRIBE IN DETAIL THE COMMUNITY DEVELOPMENT RIDER ELIGIB ILITY CRITERIA?

A. The rate discount applies to any customer eligible for service on a $\mathrm{GM}<25, \mathrm{GM} \geq$ 25, GL and L rates who opens a new account related to the establishment of a new business operation or re-opening a business that was shut down after March 1, 2020 (to represent the start of the economic ramifications of Covid-19). Because the discount does not apply to demand during June through September, the heating customer rates (GMH < 25, GMH $\geq 25$, GLH) would not receive a discount.
Q. BASED ON THE REVENUE TO BE COLLECTED AND BILLING DETERMINANTS, PLEASE SUMMARIZE THE ACTUAL COMMUNITY DEVELOPMENT RIDER FOR EACH CUSTOMER CLASS AND RATE COMPONENT.
A. Table 5 below shows the expected demand charges a customer on the Community Development Rider would pay during non-summer months. These values are computed using the proposed demand rates and the applicable rider percent discount for each year.

Table 5: Proposed Demand Charges for Eligible Tariffs

| Rate Class | January <br> $\mathbf{2 0 2 2}$ | January <br> $\mathbf{2 0 2 3}$ | January <br> $\mathbf{2 0 2 4}$ | January <br> $\mathbf{2 0 2 5}$ | January <br> $\mathbf{2 0 2 6}$ |
| :---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{G M}<\mathbf{2 5}$ | $\$ 5.92$ | $\$ 6.31$ | $\$ 6.71$ | $\$ 7.10$ | $\$ 7.50$ |
| $\mathbf{G M}>\mathbf{2 5}$ | $\$ 5.92$ | $\$ 6.31$ | $\$ 6.71$ | $\$ 7.10$ | $\$ 7.50$ |
| $\mathbf{G L}$ | $\$ 8.00$ | $\$ 8.53$ | $\$ 9.06$ | $\$ 9.59$ | $\$ 10.13$ |
| $\mathbf{L}$ | $\$ 12.47$ | $\$ 13.30$ | $\$ 14.14$ | $\$ 14.97$ | $\$ 15.80$ |

## Q. DID YOU COMPUTE THE AVERAGE BILL SAVINGS FOR A CUSTOMER

 UNDER THE PROPOSED RIDER?A. Yes. Table shows average bill savings by year for each rate class that qualifies using the average billing determinants for a customer in that class. In each case, the annual bill savings below were calculated by applying the percentage discount to the standard demand charge for each of the four rate classes, and applying this to the average number of Block 2 kilowatts (the billing determinant to which the demand charge applies) projected per customer during non-summer months by the Company.

Table 6: Average Customer Bill Savings

| Rate Class | January $2022$ | January 2023 | January 2024 | January | January 2026 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| GM<25 | \$93 | \$75 | \$56 | \$37 | \$19 |
| GM>25 | \$1,128 | \$902 | \$677 | \$451 | \$226 |
| GL | \$8,985 | \$7,188 | \$5,391 | \$3,594 | \$1,797 |
| L | \$96,331 | \$77,065 | \$57,798 | \$38,532 | \$19,266 |

Q. DO THE RATES PROPOSED REPRESENT FULL COST OF SERVICE?
A. No, there is a discount to total cost of base distribution service. However, the benefits of increasing revenues that contribute to offsetting fixed costs for a specified period of time provide additional benefits as noted above.
Q. IS A CUSTOMER ELIGIBLE FOR ANY OTHER DISCOUNTS IF THEY ELECT THE COMMUNITY DEVELOPMENT RIDER OPTION?


#### Abstract

A.

No. Specifically, in this rate case the Company has included Covid-19 relief in this filing. Any customer electing that option would not be eligible for this discount, and vice a versa.


## Q. THE COMMISSION'S POLICY STATEMENT ON ALTERNATIVE DISTRIBUTION RATEMAKING MECHANISMS, 52 PA. CODE §§ 69.3301 AND 69.3302, IDENTIFIES A NUMBER OF FACTORS THE COMMISSION MAY CONSIDER WHEN EVALUATING AN ALTERNATIVE DISTRIBUTION RATE MECHANISM. HAS THE COMPANY CONSIDERED THESE FACTORS WITH RESPECT TO THE COMMUNITY DEVELOPMENT RATE?

A. Yes. I address each of them below.
(1) How the ratemaking mechanism and rate design align revenues with cost causation principles as to both fixed and variable costs.

The rate design for the Community Development Rider is based on current rates for all customers on General Service Rates GM $<25$, GM $>25$, GL and L, all of which are based on cost causation principles. The rate is simply a discount to these rates, reducing the customer's contribution to fixed costs for the designated period of time. While the customer receives this discount, the customer continues to make an incremental contribution to fixed costs while paying variable. That is, because a customer must bring additional load to qualify for this rate, the customer is covering variable costs of the new load and paying towards the fixed costs, lowering the burden of recovering fixed costs from all other customers. Further, the discount only applies for five years, and declines over
time, minimizing the amount of the discount and avoiding any challenges of establishing discounts that prove to be inappropriate over time.
(2) How the ratemaking mechanism and rate design impact the fixed utility's capacity utilization.

The discount only applies to months with lower demand. Referring back to Figure 1 above, the system load is highest during the months of June through September. By offering a discount only for months outside that peak load period, the Company is attracting load that would most benefit and thus likely to have significant loads in months other than June through September, potentially improving the utilization of the Company's delivery system and lowering rates for all customers.

Also, with no discount during the summer months, the Company will not experience additional growth during those months without the customer paying rates that are consistent with the cost to serve all other customers from the same class.
(3) Whether the ratemaking mechanism and rate design reflect the level of demand associated with the customer's anticipated consumption levels.

Because the discount is applied only to the demand charges, it is directly reflecting the level of demand associated with the customer's consumption levels.
(4) How the ratemaking mechanism and rate design limit or eliminate interclass and intraclass cost shifting.

The rate only applies to customers that bring additional load to the Company's service territory, and the customer pays variable costs. Further, because the customer's
load is incremental and, even with the discount, the customer is making a contribution to fixed costs, and thus contributing to reducing costs paid for by other customers (e.g., more revenue to offset fixed costs from these customers reduces the amount of revenue needed to collect fixed costs from all other customers).
(5) How the ratemaking mechanism and rate design limit or eliminate disincentives for the promotion of efficiency programs.

While a discount to demand charges could arguably reduce the incentive for energy efficiency programs, the rate design structure mitigates this in two ways. First, the discount is only for five years and declines equally each year, thus a customer remains incented to invest in energy efficiency in the initial investment of operations for the new load (e.g., the customer is increasing operations and the long term incentive for installing energy efficient equipment remains). Second, the discount does not apply during the summer months. Therefore, the customer will still be equally encouraged to invest in energy efficient cooling systems.
(6) How the ratemaking mechanism and rate design impact customer incentives to employ efficiency measures and distributed energy resources.

As noted above, because the discount is applied to demand charges and is only for five years and declines equally each year, a customer is actually incented to invest in energy efficiency that reduces peak demand in the initial investment of operations for the new load (e.g., the customer is increasing operations and the long term incentive for installing energy efficient equipment remains). Further, because the discount does not apply during the
summer months, the customer is be equally encouraged to invest in energy efficient cooling systems as they would under the current General Service rates.
(7) How the ratemaking mechanism and rate design impact low-income customers and support consumer assistance programs.

The program should assist low-income customers because the additional contribution to fixed costs from customers on the Community Development rider would reduce rates for all customers over time. Further, this rate will also support customers returning operations to the Company's service territory after many shuttered due to the pandemic. Therefore, this program is, in part, an assistance program as it makes it more affordable for customers to reopen and recover over the five-year discount period.
(8) How the ratemaking mechanism and rate design impact customer rate stability principles.

The rate design creates a discount to the customer's General Service Rate demand charge. Therefore, it is linked to current rates and thus the customer's rate stability remains the same as if the customer were on their General Service Rate. Further, the discount is explicit and the glidepath to reduce the level of discount over the five year period is predictable and transparent. Therefore, the rate structure is stable and transparent.
(9) How weather impacts utility revenue under the ratemaking mechanism and rate design.

This rate is linked to existing General Services rates and thus experiences similar impacts attributable to weather.
(10) How the ratemaking mechanism and rate design impact the frequency of rate case filings and affect regulatory lag.

This rate design will not impact the frequency of rate case filings or regulatory lag.
(11) If or how the ratemaking mechanism and rate design interact with other revenue sources, such as Section 1307 automatic adjustment surcharges, 66 Pa.C.S. § 1307 (relating to sliding scale of rates; adjustments), riders such as 66 Pa.C.S. § 2804(9) (relating to standards for restructuring of electric industry) or system improvement charges, 66 Pa.C.S. § 1353 (relating to distribution system improvement charge). Not applicable.
(12) Whether the alternative ratemaking mechanism and rate design include appropriate consumer protections.

The rate is an optional rate and provides a discount to the current rates a customer would otherwise be charged, therefore the customer is better off under this rate design (and has the option to not choose the rate). This provides adequate protections as the customer's bill cannot be greater under this tariff than under the otherwise applicable General Services rate.
(13) Whether the alternative ratemaking mechanism and rate design are understandable to consumers.

By applying a simple discount that is transparent and predicable, it is very easy for a customer to understand the rider structure.
(14) How the ratemaking mechanism and rate design will support improvements in utility reliability.

This rate design is based on current General Services rates with a simple discount to the demand charge component to temporarily discount the participating customer's contribution to fixed costs. Further, the customer receives no discount during the summer months when the company experiences its highest loads and the discount is finite with steady decline over the five year period. Lastly, this rate only applies if the customer brings incremental load. All together these provide for full cost recovery of costs planned for by the company for reliability while potentially reducing rates for all customers over time.
(b) In any distribution rate filing by a fixed utility under 66 Pa.C.S. § 1308 (relating to voluntary changes in rates) that proposes an alternative ratemaking mechanism and rate design, the fixed utility shall explain how these factors impact the distribution rates for each customer class.

Table 6 demonstrates the rate impact expected for participating customers. Further, as noted above, these customers continue to pay variable costs and are contributing incrementally to fixed costs, thus other customers are not impacted and may, in fact, benefit from the additional contribution to fixed costs paid by the participating customers.

## Q. PLEASE DESCRIBE THE PROPOSED SUBSCRIPTION RATE PILOT TARIFF?

A. The Company proposes to implement a pilot to test the feasibility and acceptance of a Residential Subscription tariff. This subscription rate would offer customers the option to select a specified level of grid access for a set monthly charge. This subscription applies to base distribution services, regardless of energy, or kWh use, up to a set level of demand, or kW. The level of subscription increases as the amount of demand subscribed to increases. The rate is structured based on incremental levels of demand, starting with a minimum Subscription Level of 1 kW and increasing in increments of 1 kW , based on a customers estimated maximum demand levels over the year.

## Q. PLEASE DESCRIBE THE PURPOSE OF THIS PILOT RATE AND WHY IT IS

 NEEDED NOW?A. Recently subscription rates are gaining interest as possible innovative rate application that simplifies utility pricing for small general service and residential customers. This rate design substitutes the traditional volumetric rate structure, or price per kWh consumed, for a more stable rate structure that is easy to understand and predictable for customers. Analogous to data plans for cell phones or standard pricing for video streaming service, such as Amazon Prime and Netflix, the energy subscription rate is rate design option that may meet pricing needs of customers.

Subscription service rates, particularly for distribution service, is a better rate design than typical energy related volumetric rates to reflect the costs of these services to small general service and residential customers. That is, the cost of distribution delivery
service is driven either by NCP demand or customers. The subscription rate would recover both customer costs and delivery charges included in rate RS, exclusive of Riders. ${ }^{6}$ That is, any Rider as designed, and costs included in rates for RS, are collected via the subscription. This is because the utility must install distribution capacity to meet the customer's demands on their system regardless of the amount of energy the customer consumes. That is, regardless of whether a customer consumes 5 kW from the system for 1 hour or 8760 hours in a year, the distribution system must have the 5 kW of capacity to serve.

As customers start to use energy differently with technology innovation and behavior changes, a subscription rate may also prove to be a customer-centric solution to bill volatility while allowing them to embrace new technologies to help manage their peak demand.

Conducting a pilot before the Company files its next rate case will allow for the opportunity to study this new rate design with willing customers. The results of the pilot will provide both the Company and the Commission with valuable information regarding the potential benefits of such a rate design, the customer tools that are needed to make the design successful, and the acceptance of such a rate by customers. Also, it will serve as a means to understand if and how a subscription rate changes a customer's behavior.

## Q. HOW DOES THIS PROPOSED STRUCTURE PROVIDE THE BENEFITS YOU DESCRIBED?

[^83]A. First, this rate continues to follow cost-of-service principles and reflects the customers' costs. Further, providing customers with a meaningful price signal regarding their demand also creates the incentive for customers to manage their energy in such a way as to flatten their overall load profile. Specifically, with a subscription rate the Company can also inform the customer that the best way to reduce their bills is to reduce their peak use. This can be done with customer education focused on encouraging customers to use selected appliances during times when they are otherwise not using energy. Company witness Neiswonger discusses the Company's plans for customer outreach and education in her direct testimony, DLC St. No. 9. In effect, subscription rates can have the similar implications as TOU rates as both encourage customers to spread their usage across the day, improving utilization of the grid. However it also has the added benefit of smoothing a customer's bill over the year, similar to budget billing options offered by the Company.

## Q. <br> ONE CRITICISM OF SUBSCRIPTION RATES IS THAT IT DOES NOT CREATE

 AN INCENTIVE FOR CONSERVING AND COULD INCREASE CUSTOMER USAGE. PLEASE RESPOND.A.

As noted above, subscription rates can encourage peak shifting and thus provide many of the benefits of conservation programs that also incent this behavior. Also, subscription rate structures can include the introduction of energy efficiency technology as a requirement for participation. For example, a customer may be required to install a smart thermostat to qualify for the subscription rate.

While the Company's proposed pilot rate structure does not require these technologies, the pilot will allow the Company to understand how customers responded to the subscription rate and whether customers invested in these types of technologies to further manage their energy bill. The evaluation can also estimate the degree to which customers conserve or shift their energy usage under the subscription rate.

## Q. WHAT IS THE PROPOSED STRUCTURE FOR THE PROPOSED SUBSCRIPTION RATE PILOT?

A. As noted above, the subscription rate starts with a minimum level of service of 1 kW , which includes customer charges plus delivery charges for up to 1 kW of demand. This is akin to the minimum bills applicable to GL customers. The pilot then prescribes a "Subscription Unit" of 1 kW . Upon enrollment, each customer chooses a Subscription Level, which is the number of Subscription Units the customer needs to cover their annual peak demands plus 1 kW , which is covered with the minimum bill. The customer is then charged the Minimum Subscription plus Subscription Unit Charge times the Subscribed Units monthly. Table 7 below shows the subscription pricing proposed.

Table 7: Subscription Rate Pilot Pricing

| Subscription Component | Subscription Fee |
| :---: | :---: |
| Minimum Subscription | $\$ 28.48$ |
| Subscription Unit Charge (per 1 kW) | $\$ 12.23$ |

Additionally, to ensure that customers' subscription levels best represent their expected use, an overage fee will be applied if the customer's actual monthly demand exceeds the subscribed demand by 0.5 kW , hereafter referred to as "Overage Bandwidth." This threshold creates a fair bandwidth in which a customer may deviate. The Overage Fee is equal to two times the Subscription Unit Charge times the "Overage Amount," which is defined as the difference in actual monthly peak demand and the customer's "Subscription Level," less 0.5 kW (the Overage Bandwidth).

To provide clarity on the Subscription Pilot rate, assume the following example. A customer has a historically experienced maximum demand of 2.9 kW . To cover that level of demand, at enrollment the customer elects a Subscription Level of 3 kW . Each month the customer then pays the Minimum Subscription level of $\$ 28.48$ plus two times the Subscription Unit Charge of $\$ 12.23$ for a total monthly base distribution bill of $\$ 52.94$ a month, regardless of the level of energy, or kWh they have delivered. Throughout the year, as long as the customer's monthly maximum demand remains below their Subscription Level plus 0.5 kW for Overage Bandwidth, the customer only pays the $\$ 52.94$ in base distribution charges.

Assume then in a month the customer's demand is 3.3 kW . In this case the customer's monthly Subscription Charge remains $\$ 52.94$ because the customer is within the 0.5 kW Overage Bandwidth. However, if the customer's demand is 3.8 kW , the customer has a positive Overage Amount of 0.3 kW , computed as the 3.8 kW less the 3 kW Subscription Level less the 0.5 kW Overage Bandwidth. In this case the customer pays an overage fee of $\$ 7.34$, which is two times the Subscription Unit Charge of $\$ 12.23$ times the positive Overage Amount of 0.3 kW .

However, if the customer exceeds their Subscription Level plus Overage Bandwidth more than three times in a year, the customer will be notified that they need to either increase their subscription level to accommodate the peak demands experienced in the past year or exit the pilot.

This approach would mimic a full implementation of a subscription rate where a mechanisms would have to be put in place to mitigate the risk that a customer would choose a subscription level that is habitually just under their expected use while not creating an overly punitive mechanism for a pilot. That is, the goal is to keep customers enrolled in
the pilot to gain the most information regarding the potential issues of such rate options, which would also include the potential for customers to choose the wrong subscription level for their distribution needs.

## Q. PLEASE DESCRIBE IN DETAIL THE PROPOSED SUBSCRIPTION RATE PILOT ELIGIBILITY CRITERIA?

A. The pilot will launch starting in 2022 and will be limited to 2,000 participants who can enroll through December 2022. Customers can remain on the subscription rate after December 2022; however, enrollment will stop such that the program can be thoroughly reviewed before the next rate case. The pilot will be limited to customers on General Services rate RS and excludes customers on the Company's Customer Assistance Program (CAP), as they are already on a payment assistance program that is linked to the customer's income. Any non-CAP customer on the Company's Rate RS will be eligible except for those customers selecting the Rider No. 21, Net Metering Services due to the administrative challenges of applying the NEM rider to the subscription rate (note it is highly unlikely that a customer installing rooftop solar would elect to join a subscription rate because much of the benefit of the NEM tariff is to allow a customer to export energy generated to be 'banked' and credited against future costs. With a subscription rate, the customer is no longer receiving a volumetric rate and thus this benefit would not be available to a NEM customer).
Q. PLEASE DESCRIBE IN DETAIL THE PROCESS FOR ENROLLING CUSTOMERS INTO THE PILOT?
A. The subscription rate is an optional rate that a customer can select. The offering will be publicized, and customers will be invited to request access to the pilot. Not all customers who request enrollment in the pilot will be selected. This is for two reasons. First, the pilot size will be limited to 2,000 customers. Second, in order to create an effective pilot design, certain customers who would elect this service should be used as the 'Control Group'. A 'Control Group' is the group of customers that are not enrolled in the program but represent the pool of customers that were enrolled in the program. The 'Control Group' is used to measure the expected participating customer's behavior had the participating customer not enrolled. This method provides a valid comparison group to ensure no bias in your sampling for comparison.

To create a valid 'Control Group,' the Company may employ a 'recruit and enroll or delay' approach such that a random subset of customers are delayed granted access to the pilot for one year and thus serve as a representative Control Group for the first year. The added benefit is that both the initial participant and the delayed participant groups can also be analyzed on a per customer pre-post basis to further augment the impact assessment. The Company will track whether a customer requests access to the tariff but is not enrolled, to facilitate the pilot evaluation process.

## Q. WILL CUSTOMERS WHO ENROLLED RECEIVE BILL PROTECTION?

A. Yes, customers who enroll in this program will be allowed to terminate their subscription service for any reason at any time. Further, these customers will be eligible to receive a refund, upon request, for the actual difference in the customer's bill under the standard rate versus the subscription pilot rate. This calculation will be performed by the Company upon the request for the refund. Also, the refund would only apply to the shorter
of the number of months since enrollment or the last three months of the customer's bill. For example, if a customer enrolls on February $1^{\text {st }}$ and elects to depart May $1^{\text {st }}$ and receive a rebate, the rebate will cover all the time that the customer has been in the pilot. However, if they chose to leave June $1^{\text {st }}$, they only receive a rebated for bills for March through May. This is to avoid a customer choosing to revert back at the end of the year, choosing the 'best annual' option versus addressing whether a customer can't respond to a subscription rate effectively.

To avoid unnecessary expense, the Company is not proposing to compute 'shadow bills' for all customers enrolled in the subscription pilot and will thus only perform these calculations upon request. If a customer exits the program, the Company will contact the customer to understand the reasons for their withdrawal and include this information in the pilot evaluation study. Also, any customer who exits will not be eligible to re-enroll in the subscription for the remainder of the pilot. This is to avoid customer gaming the rate options.

## Q. PLEASE DESCRIBE YOUR APPROACH TO DESIGNING THE PROPOSED SUBSCRIPTION RATE PILOT?

A. The rate was designed to create a revenue neutral rate assuming an average customer would pay the same amount on the subscription as they would under their residential rate option.

To calculate the rate, the Company took hourly demand profiles from residential customers from February 2020 through January 2021. These data were screened for outliers and included only customers with 12 months of data. This resulted in a sample of 382,096 customers. The Company then calculated monthly the bills for each customer as
if they were on their designated rate to compute the revenue collected from the sample, broken down between revenues from fixed customer charges and volumetric charges. This total revenue from volumetric charges was then divided by the sum of the monthly noncoincident demand for all of these customers. This resulted in a billing determinant much larger than the non-coincident demand of the collective group of customers in this analysis. The ratio of revenues to cumulative non-coincident monthly demands for each customer yields a rate per kW of subscription.

Similarly, the overage rate of two times the rate applied to the amount of $\$ 12.23$ in excess of the bandwidth of 0.5 kW is roughly the amount the customer would have paid had they selected the correct level of subscription. That is, expanding on the example above, the customer would have paid for a Subscription Level of 4 kW versus 3 kW . By charging the overage on the 0.5 kW in excess of the bandwidth times two, the rate results in a payment very close to the amount the customer had chosen the correct subscription level. An amount in excess of the two times the bandwidth creates a monetary incentive for the customer to choose the right level, while the overage fee structure allows for the customer to deviate from their subscription by 0.5 kW without financial penalty.

## Q. HOW DOES THE PROPOSED SUBSCRIPTION RATE PILOT COMPARE TO EXISTING RATES?

A.

Table 8 shows rates and expected monthly bills for both proposed RS rates and the proposed subscription pilot rate (RSS-P).

Table 8. Expected Monthly Bills - RS Rate and Proposed Subscription Rate

| Rate | Proposed Energy Charge (\$/kWh) | Customer Charge (\$/month) | Average Energy per Customer (kWh/month) | Expected Average Bill (\$/month) |
| :---: | :---: | :---: | :---: | :---: |
| RS | \$0.070564 | \$16.25 | 575 | \$56.82 |
|  | Minimum <br> Subs cription (\$month) | Subs cription Unit Charge (\$/Subscription Unit month) | Average Subscription Units (Unitsmonth) | Expected Average Bill (\$/month) |
| RSS-P | 28.48 | 12.23 | 2.3 | \$56.61 |

Q. HOW WILL CUSTOMER BILLS DIFFER WITH DIFFERENT LOAD PROFILES?
A. Using the sample of 382,096 customers noted above, each customer's bill under the subscription rate was also calculated then compared to their rate on the applicable tariff. Figure 2 below shows a series of bill impact heat maps. The first represents the change monthly bills by customer demand (kW), while the second shows the change monthly bills energy use ( kWh ). The third shows the percent change in bills by customer demand ( kW ) and the last shows the percent change in bills by customer energy use.

## Q. DO THE RATES PROPOSED REPRESENT FULL COST OF SERVICE?

A. Yes, as noted above, a customer's maximum delivery demand is the primary driver of delivery capacity. By structuring a rate that is based on the customer's delivered capacity, the rate is more cost reflective. Further the rate is designed to cover the full cost of service, as represented by the existing residential customer rate, of an average residential customer. As described, the rate is designed to collect the same amount of revenue from
an average residential customer on General Service rate RS, thus cost reflective and revenue neutral.

## Q. DO EXISTING AND FUTURE SURCHARGES STILL APPLY TO CUSTOMERS WHO ELECT THE SUBSCRIPTION RATE PILOT?

A.

Yes. The subscription only applies to the customers' delivery services covered in the RS rate. All other applicable Riders (for example, Rider No. 5 - Universal Service Charge; Rider No. 15A - Energy Efficiency Surcharge; etc.) will be applied as designed and added to the customer's monthly bill.

## Q. ARE CUSTOMERS ENROLLED IN THE SUBSCRIPTION RATE PILOT

 ELIGIBLE TO SHOP FOR SUPPLY?A.

Yes. Since the subscription only applies to the customers' delivery services covered in the RS rate, the customer would still need to elect a supply option that would be met through an EGS or by the Company through its default service program.

## Q. PLEASE DESCRIBE THE TOOLS THAT WILL BE DEVELOPED TO ASSIST SUBSCRIPTION CUSTOMERS IN MANAGING THEIR BILLS?

A. There are several aspects of the subscription pilot that are included to protect the participating customer and glean the best information for the pilot. First, customers will be contacted by the Company in the event that the customer exceeds their subscription level to inform the customer of options for adjusting their subscription level. Second, the customer is able to cancel their subscription at any time without penalty. Lastly, the customer can request a refund of the difference between what their bill would have been
had they remained on the standard Rate RS and the subscription rate (as noted above, for up to three months and customer must leave pilot if they receive the refund). This refund will be computed upon request such that the Company does not need to build shadow billing capabilities for this small pilot.

In summary, the pilot focuses on a high touch approach of reaching out to customers to help them adjust to the subscription rate. This will then inform the Company on the customer tools that would have to be developed for a larger roll-out of such a program. This approach saves administrative costs of building tools that prove un-helpful to customers and also allows for more expeditious implementation of the pilot, which results in more information to be gathered during the pilot prior to the next rate case.

## Q. HOW WILL THE COMPANY ASSESS THE SUCCESS OF THE PILOT?

A. The Company will collect data for the pilot over the course of the pilot, to include the tracking of customers who requested enrollment but were not able to enroll for various reasons, thus identifying those likeminded customers for the control group. That is, a control group is used to evaluate what a customer would have done without the program. It is best to select customers who would have enrolled in the program to avoid systematic and unintended bias in the evaluation results.

After two full years of enrollment, to ensure at least one year of customer usage data for late-enrolling customers, the Company will conduct an evaluation. The general approach will be to review how the customers' usage patterns may have changed due to being on the subscription, to include identification of any estimated change in the time or magnitude of the aggregate monthly peak demands of the participant group that may be the result of individual peak shifting to minimize the subscription levels, as well as potential
increases in overall energy use. Although the goal of the rate is to induce shifts in individual customer monthly NCP demands, individual customer hour data typically has too much apparently random variation ("noise") to allow for the robust estimation of statistically significant changes in an individual's demand. Since residential customers tend to have relatively homogenous patterns of use, an evaluation of the average collective impact at times (for example) in which the control group's demand is peaking, will accurately identify the degree to which participants have responded to the price signal. The Company will also conduct customer surveys to gain an understanding of the participating customers' level of satisfaction with, and understanding of, the Pilot Rate, any potential challenges or improvements that could be employed and a review of the customer journey of enrolling and participating. Best practice is to conduct compulsory entrance and exit surveys that are designed to test the participants' understanding of how the rate works as well as perhaps a few additional questions around customer characteristics (e.g., size of home, number of inhabitants and special technologies such as EVs). A full evaluation plan will be developed in parallel to the administrative set up of the program such that the evaluation plan is set prior to implementation, eliminating any perceived conflict in the evaluation of program performance.

## Q. HOW WILL THE SUBSCRIPTION RATE BE SHOWN ON THE CUSTOMER'S BILL?

A. To minimize pilot costs the Subscription Rate will be a rate Rider that:

- Credits the $\$ / \mathrm{kWh}$ charge for base delivery services, set to the level of the customer's applicable rate.
- Credits the base customer charge, set to the level of the customer's applicable rate.
- Adds a fixed monthly charge for the subscription.
- Adds any overage fees as described above.


## Q. THE COMMISSION'S POLICY STATEMENT ON ALTERNATIVE <br> DISTRIB UTION RATEMAKING MECHANISMS, 52 PA. CODE §§ 69.3301 AND 69.3302, IDENTIFIES A NUMBER OF FACTORS THE COMMISSION MAY CONSIDER WHEN EVALUATING AN ALTERNATIVE DISTRIBUTION RATE MECHANISM. HAS THE COMPANY CONSIDERED THESE FACTORS WITH RESPECT TO THE RESIDENTIAL SUBSCRIPTION RATE PILOT?

A. Yes. I address each of them below.
(1) How the ratemaking mechanism and rate design align revenues with cost causation principles as to both fixed and variable costs.

The rate design is based off of the customer's demand, rather than traditionally volume or kWhs of customer use. This change moves the customer closer to cost of service principles as delivery services are more driven by demand than volume. This is demonstrated by the fact that the company's rates for larger customers all have demand charges. Demand charges for residential customers are, historically, uncommon because of the complexity and potential bill volatility that can result. This rate design addresses this issue by providing for the linkage to demand by customers but also creating bill smoothing.

Also, the rate was designed as 'revenue neutral' to the current rates, which represent the cost to service this customer class. Therefore, the rate recovers the fixed and variable costs allocated to this customer class.
(2) How the ratemaking mechanism and rate design impact the fixed utility's capacity utilization.

Subscription rates are a new rate design that has not been widely tested. For this reason, the Company proposes to first pursue a pilot that would allow for the Company to understand the changes in customer behavior, if any, that may result from this rate design. To that end, the pilot will provide information regarding the impact on the capacity utilization and allow both the Company and the Commission understand the potential benefits of a Subscription rate before providing access to such a rate for all residential customers.
(3) Whether the ratemaking mechanism and rate design reflect the level of demand associated with the customer's anticipated consumption levels.

The subscription rate is designed for a customer to choose a level of demand to which they manage their load, creating a direct link between the rate design and level of demand associated with the customer's consumption levels.
(4) How the ratemaking mechanism and rate design limit or eliminate interclass and intraclass cost shifting.

The rate design is a revenue neutral rate design, meaning that the rate is designed to collect all the revenues allocated to the class as if all customers were on the alternative rate. This ensures that, on average, the rate does not produce interclass or intraclass costshifting.
(5) How the ratemaking mechanism and rate design limit or eliminate disincentives for the promotion of efficiency programs.

As noted above, the Subscription rate is a new rate that has not been widely tested, therefore the impact on energy efficiency cannot be directly estimated. However, because the subscription is also based on the customer's demand level, the customer will be incented to reduce their peak usage to lower their bill directly without necessarily reducing their total energy consumption. This can be done through peak shifting or investment in energy efficient equipment used during peak times (e.g., air conditioning). The evaluation of the pilot will provide for the assessment of the impact on energy efficiency and allow both the Company and the Commission understand the potential benefits of a Subscription rate before providing access to such a rate for all residential customers.
(6) How the ratemaking mechanism and rate design impact customer incentives to employ efficiency measures and distributed energy resources.

As noted above, the Subscription rate is a new rate that has not been widely tested, therefore the impact on energy efficiency it cannot be directly estimated. However, because the subscription is also based on the customer's demand level, the customer is now incented to reduce their peak usage to lower their bill directly without necessarily reducing their total energy consumption. Again, the evaluation of the pilot will provide for the assessment of the impact on energy efficiency and allow both the Company and the Commission understand the potential benefits of a Subscription rate before providing access to such a rate for all residential customers
(7) How the ratemaking mechanism and rate design impact low-income customers and support consumer assistance programs.

All residential customers on rate RS not enrolled in Rider No. 21 or the Company's Customer Assistance Program (CAP) are eligible; and thus the rate is available to lowincome customers who choose not to enroll in CAP. The subscription rate offers many of the same benefits of budget billing, which provides steady and predictable rates. However, this rate has two additional benefits. First, there is no true-up with the subscription (e.g., under budget billing a customer's 'average bill' is based on past usage, so is highly subject to impact of the past on current rates; while the Subscription bill provides for bills that reflect the customer's current behavior.) Lastly, unlike budget billing, the customer can choose to manage to a lower level of usage than in the past.

Additionally, with the pilot, customer will be allowed to leave the program and are offered bill protection during the billing. This further protects low-income customers from bill shocks and allows for testing if this rate option is preferable for low-income customers.
(8) How the ratemaking mechanism and rate design impact customer rate stability principles.

The Subscription Rate offers bill stability, particularly if the customer is able to manage their load to the subscription levels.
(9) How weather impacts utility revenue under the ratemaking mechanism and rate design.

With the Subscription Rate, the customer pays the same amount each month unless the customer exceeds the subscription level. As a result, it may mitigate weather impacts
on utility revenue. With a pilot, the Company can research the potential impact on utility revenue under subscription pricing.
(10) How the ratemaking mechanism and rate design impact the frequency of rate case filings and affect regulatory lag.

This rate design will not impact the frequency of rate case filings or regulatory lag.
(11) If or how the ratemaking mechanism and rate design interact with other revenue sources, such as Section 1307 automatic adjustment surcharges, 66 Pa.C.S. § 1307 (relating to sliding scale of rates; adjustments), riders such as 66 Pa.C.S. § 2804(9) (relating to standards for restructuring of electric industry) or system improvement charges, 66 Pa.C.S. § 1353 (relating to distribution system improvement charge). Not applicable.
(12) Whether the alternative ratemaking mechanism and rate design include appropriate consumer protections.

The Subscription Pilot offers appropriate consumer protections in three ways. First, enrollment is optional for the customer and the customer chooses to enroll (e.g., opt-in enrollment). Second, the customer may elect to exit the pilot at any time with no penalty. Third, a customer can request bill protection and thus end up with the same bill payments as if under the customer's default rate. This protection, necessarily, only applies for up to a three month period to ensure customers don't game the rate design.
(13) Whether the alternative ratemaking mechanism and rate design are understandable to consumers.

Many consumer offerings rely on subscriptions, to include but not limited to Netflix, Amazon, and cell phone plans. Customers are generally familiar with these pricing options; a subscription may even be easier to understand than a customer's current energy bill. Nevertheless, the pilot is designed to solicit this information from customers. That is, the pilot study will include gaining insights from the customer on the understanding of the rate and any implications of an alternative rate design.
(14) How the ratemaking mechanism and rate design will support improvements in utility reliability.

The rate design is revenue neutral therefore is expected to the same support for improvements in utility reliability as the current rate options for these customers.
(b) In any distribution rate filing by a fixed utility under 66 Pa.C.S. § 1308 (relating to voluntary changes in rates) that proposes an alternative ratemaking mechanism and rate design, the fixed utility shall explain how these factors impact the distribution rates for each customer class.

I address how the Subscription Rate Pilot rate design impacts participating customers' distribution rates in my testimony above. As discussed, it will only impact rates for up to 2,000 participating customers in Rate RS.

## EV PILOT RATES

## Q. PLEASE BRIEFLY DESCRIBE THE BASIS FOR THE FLEET PILOT AND HOME CHARGING PILOTS?

A. Both the Home Charging Pilot and Fleet Pilot include rates charged to participating customers to recover the costs of the chargers, and some of the costs incurred to establish charging solutions, for Duquesne Light customers who are using electric vehicles (EVs). Specifically and as described in the direct testimony of Company Witness Olexsak, DLC Statement No. 8, the pilots offer Duquesne Light customers EV charging solutions. Pilot program costs include administration, equipment, marketing and outreach, and infrastructure costs. These costs establish the pilots for customers, provide customers with the necessary equipment and installation, and provide ongoing support to administer the pilots.

## Q. PLEASE DESCRIBE THE COSTS FOR THE FLEET PILOT, INCLUDING THE TIMING OF THESE COSTS.

A. As Witness Olexsak describes in her testimony, costs include labor to plan and construct charging equipment, administer IT systems, and manage the administration of the pilots. Costs also relate to the make-ready, charging stations, networking, station commissioning, maintenance and warranties, equipment shipping, and marketing materials. These costs are both expenses and capital investments, with the latter being converted to revenue requirement by taking the sum of the depreciation expense, associated taxes, and the return on capital determined for each year of a given asset's life.
Q. PLEASE DESCRIBE THE COSTS FOR THE HOME CHARGING PILOT, INCLUDING THE TIMING OF THESE COSTS.
A.

As Witness Olexsak describes in her testimony, costs for the Home Charging Pilot relate to the charging system equipment, installation, and ongoing maintenance of charging equipment. The pilot also includes costs for IT systems, marketing, advertising, education, and rebates for low-income participants. Costs also relate to labor for program management, data management, billing, and operations. As with the Fleet Pilot, these costs are both expenses and capital investments, with the latter being converted to revenue requirement by taking the sum of the depreciation expense, associated taxes, and the return on capital determined for each year of a given asset's life.

## Q. HOW IS THE COMPANY PROPOSING TO RECOVER THESE COSTS?

A. The Company proposes to recover charger and charger installation costs, as applicable, from participants through rates specified in each Pilot design. The Company will then recover program implementation and administrative costs, as well as the costs of make-ready infrastructure, from all customers, similar to cost treatment for other customer programs. In other words, the revenue requirement associated with these costs is included in the Company's proposal, but revenues will be collected from both participants through the pilot program and through general rates, consistent with how costs from other customer programs are collected.
Q. WHAT ARE THE TOTAL COSTS TO BE RECOVERED FROM PARTICIPANTS FOR EACH PILOT?
A. Table 9 shows the revenue requirement to be collected by pilot, by cost type and by year.

Table 9: Revenue Requirement Collected Through Participant Charge

|  | 2022 | 2023 | 2024 | Total |
| :---: | :---: | :---: | :---: | :---: |
| Fleet Pilot |  |  |  |  |
| Capital |  |  |  |  |
| Charging Station | \$139,044 | \$211,293 | \$250,825 | \$601,162 |
| Network | \$54,625 | \$83,008 | \$98,538 | \$236,171 |
| Commissioning | \$7,449 | \$11,319 | \$13,437 | \$32,205 |
| Capital Revenue Requirement | \$201,118 | \$305,620 | \$362,801 | \$869,538 |
| Expense |  |  |  |  |
| Maintenance/Warranty | \$109,140 | \$165,850 | \$165,850 | \$440,840 |
| Shipping | \$4,911 | \$7,463 | \$8,860 | \$21,234 |
| Expense Revenue Requirement | \$114,051 | \$173,313 | \$174,710 | \$462,074 |
| Total Fleet Revenue Requirement | \$315,169 | \$478,933 | \$537,510 | \$1,331,613 |
| Home Charging Pilot |  |  |  |  |
| Capital |  |  |  |  |
| Charging Station | \$74,780 | \$74,780 | \$74,780 | \$224,340 |
| Charging Station Installation | \$62,317 | \$62,317 | \$62,317 | \$186,950 |
| Capital Revenue Requirement | \$137,097 | \$137,097 | \$137,097 | \$411,291 |
| Expense |  |  |  |  |
| Charging Station <br> Maintenance/Replacement/Non- <br> Payment | \$4,125 | \$4,125 | \$4,125 | \$12,375 |
| Expense Revenue Requirement | \$4,125 | \$4,125 | \$4,125 | \$12,375 |
| Total Home Charging Revenue Requirement | \$141,222 | \$141,222 | \$141,222 | \$423,666 |

## Q. HOW WAS THE MONTHLY CHARGE FOR EACH PILOT CALCULATED?

## A. <br> Calculation of the revenues to collect from participants required several steps.

 First, all capital investments needed to be converted to annual costs. This was done by taking a straight-line depreciation estimate based on the estimated equipment lifetimes to determine annual depreciation expenses. Generally, annual depreciation expenses are the capital expenditure divided by the equipment lifetime, measured in years. The capitalexpenditures resulting in additional revenue requirement are incurred over 3 to 10 years for the Fleet Pilot, depending on the expected asset life, and over 5 years for the Home Charging Pilot assets. These lifetimes fall within the bounds of each pilot's contract terms; therefore, all costs can be recovered over the intended contract term and capital assets related to these pilots will be fully depreciated at the end of the pilot periods.

Second, the annual return on the capital investment was calculated consistently with how return on rate base is calculated by the Company for all rate base. Specifically, a rate of return of $7.84 \%$ was applied to the remaining balance of capital, or total capital less depreciation, in each year.

With the results of the first two steps as well as the annual expense estimates, a present value of program costs was calculated using a $7.84 \%$ cost of capital. To then develop a per customer charge, these present value costs are then divided by the expected level of participation in the given pilot with enrollment occurring from 2022 through 2024.

## Q. PLEASE DESCRIBE HOW THESE COSTS WILL BE COLLECTED FROM PARTICIPATING FLEET PILOT CUSTOMERS.

A. Customers enrolling in the Fleet Pilot Bundled Option will pay the Company a monthly charge designed to recover all the costs shown in Table 10 over a ten year period. This rate will be set from 2022 through 2024 regardless of enrollment year for the participant. For the Fleet Pilot, 221 customers are expected to enroll during the program pilot from 2022 through 2024. A monthly payment was calculated by taking the previously described total estimated per customer costs and calculating a levelized payment over the contract term, which is expected to be 10 years. This ensures the full costs are collected
over the contract term. Table 10 shows the calculation of the Fleet Pilot Monthly Charge of $\$ 63.24$ for a 10 year contract term. Table 11 shows additional details for the cost drivers of those charges.

Table 10: Fleet Pilot Costs

|  | Present value of <br> Fleet Pilot costs | Total Monthly <br> costs | Monthly costs <br> per billing <br> determinant | Billing <br> determinant |
| :--- | :---: | :---: | :---: | :---: |
| Col <br> Row | B | C | D | E |
| 1 | $\$ 1,157,426$ | $\$ 13,945$ | $\$ 63.24$ | 221 |

Table 11: Fleet Pilot Summary Component Cost Drivers and Related Charges

|  |  | Nominal costs <br> per port | Net present <br> value per-port, <br> levelized over <br> 10 year <br> contract term | Monthly per- <br> port payments <br> levelized over <br> $\mathbf{1 2 0}$ payments |
| :--- | :--- | :--- | :--- | :--- |
| Col <br> Row | A | B | C | D |
| 1 | Charging Station | $\$ 2,726.36$ | $\$ 2,018.95$ | $\$ 24.33$ |
| 2 | Network | $\$ 1,071.07$ | $\$ 793.16$ | $\$ 9.56$ |
| 3 | Commissioning | $\$ 146.06$ | $\$ 108.16$ | $\$ 1.30$ |
| 4 | Total equipment and <br> installation $(\mathbf{1 + 2 + 3})$ | $\mathbf{\$ 3 , 9 4 3 . 4 9}$ | $\mathbf{\$ 2 , 9 2 0 . 2 7}$ | $\$ \mathbf{3 5 . 1 8}$ |
| 5 | Return on capital | $\mathrm{N} / \mathrm{A}$ | $\$ 836.71$ | $\$ 10.08$ |
| 6 | Maintenance/Warranty | $\$ 2,140.00$ | $\$ 1,427.86$ | $\$ 17.20$ |
| 7 | Shipping | $\$ 96.30$ | $\$ 64.25$ | $\$ 0.77$ |
| 8 | Total costs (4+5+6+7) | $\$ \mathbf{6 , 1 7 9 . 7 9}$ | $\mathbf{\$ 5 , 2 4 9 . 1 0}$ | $\$ \mathbf{6 3 . 2 4}$ |

## Q. PLEASE DESCRIBE HOW COSTS WILL BE COLLECTED FROM

 PARTICIPATING HOME CHARGING PILOT CUSTOMERS.A. The monthly charge for Home Charging was computed using a method similar to the one described above for the Fleet Pilot. Customers enrolling in the Home Charging Pilot will pay the Company a monthly charge designed to recover all the costs shown in


Table 12 over a five year period. This rate will be set from 2022 through 2024 regardless of enrollment year for the participant. The only differences are the total costs to be collected, the expected number of enrolled customers and the term over which those costs are collected. Specifically, the Company expects approximately 375 customers will enroll through 2024. Further, the expected contract term is set to five years for the Home Charging Pilot. Table 12 shows the calculation of the Home Charging Pilot Monthly Charge of $\$ 21.17$ for a 5 year contract term. Table 13 shows additional details for the cost drivers of those charges.

Table 12: Home Charging Pilot Costs

|  | Present value of <br> Home Charging <br> Pilot costs | Total Monthly <br> costs | Monthly costs <br> per billing <br> determinant | Billing <br> determinant |
| :--- | :---: | :---: | :---: | :---: |
| Col <br> Row | B | C | D | E |
| 1 | $\$ 392,920$ | $\$ 7,937$ | $\$ 21.17$ | 375 |

$\left.\begin{array}{|l|l|l|l|l|}\hline & & & \begin{array}{l}\text { Nominal costs } \\ \text { per participant }\end{array} & \begin{array}{l}\text { Nalue per- } \\ \text { participant, } \\ \text { levelized over 5 } \\ \text { year contract } \\ \text { term }\end{array}\end{array} \begin{array}{l}\text { Monthly per- } \\ \text { participant } \\ \text { payments } \\ \text { levelized over 60 } \\ \text { payments }\end{array}\right]$

Table 13: Home Charging Pilot Summary Component Cost Drivers and Related Charges
II. FLEET PILOT AND HOME CHARGING PILOT BENEFIT COST ANALYSES
Q. DID YOU ANALYZE THE BENEFITS AND COSTS OF DLC'S FLEET AND HOME CHARGING PILOTS?
A.

Yes, we conducted several benefit and cost tests to review the cost-effectiveness of the Company's pilots. The Benefit Cost Analysis (BCA) is performed from the perspective of several stakeholders: Company's customers who do not participate in the program (Nonparticipating utility customers), the Company's customers who do enroll (Participating customers who enroll in the pilots and install EV charging equipment through the Company's pilots), the Company and all Pennsylvanians.

## Q. WHAT DID THE BCA CONCLUDE FOR THE FLEET AND HOME CHARGING PILOTS?

A.

Both pilots prove to be highly cost-effective from many perspectives. The individual tests, as described below, result in a benefit to cost ratio. All tests for both pilots exceeded a benefit cost ratio of 0.85 and were as high as 1.83 . As a result, these pilots are not only supporting the growth of EVs in the Company's service territory as described by Witness Olexsak, but all stakeholders also benefit to some degree from the programs.

## Q. PLEASE DESCRIBE WHAT BENEFIT COST ANALYSES ARE AND HOW

 THEY ARE USED IN THIS CONTEXT.A. Benefit cost analyses are used to evaluate the relationship between costs and benefits of investments made by utilities or customers to manage electricity use behind
the customer's meter. The methodologies within the benefit cost analyses generate a series of discounted cash flows related to different components of benefits or costs. Whether any of these discounted cashflows are considered benefits or costs is determined by the perspective of the test. For example, if the test is from the perspective of the participating customer, the benefits are the reductions in gasoline fuel costs while costs are any expenditures the customer must make as part of the program as well as increased energy bills resulting from EV charging. Conversely, this same discounted cash flow for increased energy bills is a benefit to non-participating customers and the utility.

The results of a benefit cost analysis are a series of metrics that show the net benefits of an investment, in net present value terms, as well as a ratio of absolute value of benefits to absolute value of costs. The former metric indicates the magnitude net benefits, which are benefits less costs. If the value is positive, the investment is yielding a positive "return" relative to similar investments. The latter metric provides an indication of the level of benefits relative to costs. Specifically, a ratio close to 1 indicates the value of costs and benefits are nearly equal, while a number far greater than 1 provides insights that the costs are much lower than benefits (and conversely a value far less than 1 indicates the costs are much larger than benefits).

## Q. DID YOU USE A STANDARDIZED METHODOLOGY FOR THE BENEFIT COST ANALYSIS?

A. Yes. Our methodology was based on the "California Standard Practice Manual Economic Analysis of Demand-Side Programs and Projects," October 2001 (Standard Practice Manual or "Manual"). The methodology established in that manual is widely used to evaluate customer programs. Additionally, we used the Total Resource Cost
(TRC) Test guidance from the PA PUC for Act 129 Energy Efficiency and Demand Response programs to align with current practices in Pennsylvania. The Commission's guidance was initially established in 2009 and the most recent updates were made in December 2019. (2021 TRC Test Final Order ${ }^{7}$ ). That guidance also refers to and builds on the "California Standard Practice Manual" for Pennsylvania's Act 129 energy efficiency programs.

## Q. WHY IS THIS METHODOLOGY ACCEPTABLE FOR USE IN EVALUATING THE COMPANY'S ELECTRIC VEHICLE PILOTS?

A. The California Standard Practice Manual establishes, on page 2, the definition of

DSM Categories and Programs as follows:
This manual employs the use of general program categories that distinguish between different types of demand-side management programs, conservation, load management, fuel substitution, load building and self-generation. Conservation programs reduce electricity and/or natural gas consumption during all or significant portions of the year. 'Conservation" in this context includes all 'energy efficiency improvements'. An energy efficiency improvement can be defined as reduced energy use for a comparable level of service, resulting from the installation of an energy efficiency measure or the adoption of an energy efficiency practice. Level of service may be expressed in such ways as the volume of a refrigerator, temperature levels, production output of a manufacturing facility, or lighting level per square foot. Load management programs may either reduce electricity peak demand or shift demand from on peak to non-peak periods.

Fuel substitution and load building programs share the common feature of increasing annual consumption of either electricity or natural gas relative to what would have happened in the absence of the program. This effect is accomplished in significantly different ways, by inducing the choice of one fuel over another (fuel substitution), or by increasing sales of electricity, gas, or electricity and gas (load building).

[^84]As noted above, the California Standard Practice Manual contemplated the use of the evaluation methodologies and resulting cost benefit tests for assessment of load building programs such as EV charging. In other words, the methodology we are using is consistent with the methodologies outlined in this manual.

## Q. PLEASE DESCRIBE, AT A HIGH LEVEL, THE BENEFIT COST ANALYSIS

 PERFORMED.A. As noted above, the Company used the methodology for BCA outlined in the California Standard Practice Manual. This approach involves the review of benefits and costs from the perspective of key stakeholders, also noted above. This was done for each of the Benefit Cost tests as defined in Table 14 below. A detailed explanation of these tests, the quantification of benefits and costs to be included in each test and the application of each benefit or cost to each test is included in Exhibit ME-2.

Table 14: Description of Benefit Cost Tests

| Test | Abbreviation | Description |
| :---: | :---: | :--- |
| Participant <br> Cost Test | PCT | The Participant Cost Test (PCT) is the measure of <br> the quantifiable benefits and costs to the <br> participating customer due to their participation in a <br> progam or pilot. |
| Ratepayer <br> Impact <br> Measure Test | RIM | The Ratepayer Impact Measure (RIM) test measures <br> implications on customer bills or rates due to <br> changes in utility revenues and operating costs <br> caused by the program. |
| Total Resource <br> Cost Test | TRC | The Total Resource Cost (TRC) test measures the <br> net costs of a program as a resource option based <br> on the total costs of the program, including both the <br> participants' and the utility's costs. |
| Societal Cost <br> Test | SCT | The Societal Cost Test (SCT) in expanded view <br> of the TRC that includes additional societal costs <br> and benefits, or externalities, such as monetized <br> emissions increases or decreases. |
| Utility Cost |  |  |
| Test | UCT | The Utility Cost Test (UCT) measures the net costs <br> of a customer program as a resource option based <br> on the costs incurred by the program administrator <br> (including incentive costs) and excluding any net <br> costs incurred by the participant. |

## Q. WHY ARE THE TESTS INCLUDED IN THE STANDARD PRACTICE MANUAL

## APPROPRIATE FOR A BENEFIT COST ANALYSIS FOR THE COMPANY'S

## FLEET CHARGING AND HOME CHARGING PILOTS?

A. The tests outlined in the Standard Practice Manual are widely used in evaluation of other customer programs such as Energy Efficiency and Demand Response programs, which have similar characteristics to EV programs, particularly since customers install behind the meter technologies to change their energy bills. Although Energy Efficiency and Demand Response programs aim to reduce energy bills and EV programs generally increase energy bills, the economic implications and evaluation methodologies are consistent. For example, EV program energy bill increases can be viewed as negative energy savings.

Secondly, as noted above, Pennsylvania Act 129 Energy Efficiency and Demand Response programs use the TRC test to determine cost effectiveness of customer programs that impact energy bills.

## Q. PLEASE SUMMARIZE THE IMPLICATIONS OF THE FLEET PILOT BENEFIT COST ANALYSIS.

A.
Table 15 shows the results of the BCA for the Fleet Pilot.

## Table 15: Fleet Pilot BCA Results

|  | PCT | RIM | SCT | TRC | UCT |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Total Benefits | $\$ 32,262$ | $\$ 14,656$ | $\$ 37,072$ | $\$ 32,262$ | $\$ 4,994$ |
| Total Costs | $\$ 38,179$ | $\$ 9,430$ | $\$ 29,420$ | $\$ 28,076$ | $\$ 3,149$ |
| Net Benefits <br> (Benefits - Costs) | $(\$ 5,917)$ | $\$ 5,226$ | $\$ 7,652$ | $\$ 4,186$ | $\$ 1,844$ |
| Ratio <br> (Benefits/Costs) | 0.85 | 1.55 | 1.26 | 1.15 | 1.59 |

The results for the Fleet Pilot analysis show that the PCT is not cost effective for participants who engage in the pilot given that the cost benefit ratio is below 1. Each EV enrolled in the pilot (i.e., as a proxy for each installed charging port) incurs a $\$ 5,917$ net cost to the participant over the life of the EV. This is primarily driven by the increase in electricity sales and the EV incremental vehicle cost that are categorized as costs in the PCT. Note that the BCA is based on one vehicle per charge port. If customers are able to optimize and charge more vehicles per port, the economics improve.

Next, the RIM test is cost effective with a cost benefit ratio of 1.55 . Each EV participant enrolled in the pilot results in a $\$ 5,226$ net benefit for Duquesne Light customers. The increase in electricity sales from EV charging exceeds the additional
capacity costs the Company incurs, which results in a net benefit for pilot non-participant Duquesne Light customers.

The TRC test is also cost effective with a cost benefit ratio of 1.15. Benefits are greater than costs by $\$ 4,186$ per EV. Benefits are similar to the PCT and primarily relate to the benefits of EV ownership that avoid gasoline fuel costs and higher O\&M of a gas vehicle over the vehicle's lifetime. Costs are slightly greater than these benefits and driven by the additional capacity costs, program administration costs, and incremental vehicle purchase costs.

The SCT is cost effective as it is similar to the TRC with the addition of cashflows related to emissions. The benefits from avoided ICEV emissions outweigh the costs of increased emissions from increased generation supply to meet EV charging demands. The SCT cost benefit ratio is 1.26 and each EV results in a net societal benefit of $\$ 7,652$.

Finally, the UCT is cost effective with a cost benefit ratio of 1.59 and a benefit to the Company of $\$ 1,844$ per EV. This is primarily driven by the electricity sales that are greater than the additional capacity costs.
Q. PLEASE SUMMARIZE THE IMPLICATIONS OF THE HOME CHARGING PILOT BENEFIT COST ANALYSIS.
A. Table 16 shows the results of the BCA for the Home Charging Pilot.

Table 16: Home Charging Pilot BCA Results

|  | PCT | RIM | SCT | TRC | UCT |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Total Benefits | $\$ 13,777$ | $\$ 2,482$ | $\$ 15,825$ | $\$ 13,777$ | $\$ 2,042$ |
| Total Costs | $\$ 8,739$ | $\$ 2,653$ | $\$ 8,637$ | $\$ 8,198$ | $\$ 1,580$ |
| Net Benefits <br> (Benefits - Costs) | $\$ 5,037$ | $(\$ 171)$ | $\$ 7,187$ | $\$ 5,579$ | $\$ 462$ |
| Ratio <br> (Benefits/Costs) | 1.58 | 0.94 | 1.83 | 1.68 | 1.29 |

The results for the Home Charging Pilot analysis show that the PCT is cost effective for participants who engage in the pilot given that the cost benefit ratio is above 1 at a value of 1.58 . Each EV enrolled in the pilot results in a $\$ 5,037$ net benefit to the participant over the life of the EV. This is primarily driven by avoiding the costs associated with ICEV ownership, gasoline fuel and higher O\&Mcosts.

Next, the RIM test is not cost effective with a cost benefit ratio of 0.94 , below 1 . Each EV enrolled in the pilot incurs a net cost of $\$ 171$ for Duquesne Light customers. This is driven by the increased capacity costs related to EV charging and pilot administrative costs socialized to the RS rate class (instead of all pilot costs going to pilot participants). These costs are nearly offset by the increase in electric sales resulting from EV charging that are a benefit to rate paying customers.

The TRC test is cost effective with a cost benefit ratio of 1.68. Each EV enrolled in the program results in a net benefit of $\$ 5,579$. Benefits are similar to the PCT and primarily relate to the benefits of EV ownership that avoid gasoline fuel costs and higher O\&M over the vehicle's lifetime. Costs, which are lower in magnitude than the benefits, are driven by the additional capacity costs, program administration costs, and incremental vehicle purchase costs.

The SCT is cost effective as it is similar to the TRC with the addition of cashflows related to emissions. The benefits from avoided ICEV emissions outweigh the costs of increased emissions from increased generation supply to meet EV charging demands. The SCT cost benefit ratio is 1.83 and each EV results in a net societal benefit of $\$ 7,187$.

Finally, the UCT is cost effective with a cost benefit ratio of 1.29 and a net benefit to the Company of $\$ 462$ per EV. This is primarily driven by the electricity sales that are greater than the additional capacity costs.

## Q. DOES THIS CONCLUDE YOUR DIRECT TESTIMONY?

A. Yes, it does. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

## EXHIBIT ME-1

## SUMMARY OF REVIEW OF COST SHIFTING FOR TYPICAL GL CUSTOMER ON RIDER NO. 16

In assessing Rider No. 16, a review of the cost to serve customer with generation was performed. To do this, the Company reviewed what a customer that has generation offsetting behind-the-meter load would pay if on General Service rate GL. This is because the proposed (and current) GL rate is cost reflective and thus a bill of an average customer on that tariff also represents the Company's cost to serve that customer. This first step in this review was to develop the 'typical customer' profile by taking the total billing demand from GL class divided by the number of customers. This profile is shown below in Table 1. Table 1 also shows the calculation of a typical customer's bill, and thus total cost of service, as if that customer were served completely by the Company.

## Table 1: Bill Calculations for 'Typical’ GL Customer

|  | Delivered <br> $\mathbf{k} \mathbf{W}$ <br> $(\mathbf{k} \mathbf{W})$ | Min <br> Load <br> $(\mathbf{k} \mathbf{W})$ | Contract <br> Demand <br> $(\mathbf{k} \mathbf{W})$ | Billed <br> Demand <br> $(\mathbf{k W} \mathbf{~}$ | Min Bill <br> $(\$ / \mathbf{M o n t h})$ | Rate <br> $(\$ / \mathbf{k})$ | Increment <br> al Bill <br> $(\$ /$ Month $)$ | Total Bill <br> $(\$ /$ Month $)$ |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Jan | 684 | 300 | 852 | 384 | 3,675 | 10.66 | 4,091 | 7,766 |
| Feb | 645 | 300 | 852 | 345 | 3,675 | 10.66 | 3,678 | 7,353 |
| Mar | 739 | 300 | 852 | 439 | 3,675 | 10.66 | 4,683 | 8,358 |
| Apr | 710 | 300 | 852 | 410 | 3,675 | 10.66 | 4,375 | 8,050 |
| May | 823 | 300 | 852 | 523 | 3,675 | 10.66 | 5,575 | 9,250 |
| Jun | 808 | 300 | 852 | 508 | 3,675 | 10.66 | 5,420 | 9,095 |
| Jul | 846 | 300 | 852 | 546 | 3,675 | 10.66 | 5,817 | 9,492 |
| Aug | 852 | 300 | 852 | 552 | 3,675 | 10.66 | 5,884 | 9,559 |
| Sep | 764 | 300 | 852 | 464 | 3,675 | 10.66 | 4,945 | 8,620 |
| Oct | 770 | 300 | 852 | 470 | 3,675 | 10.66 | 5,014 | 8,689 |
| Nov | 705 | 300 | 852 | 405 | 3,675 | 10.66 | 4,319 | 7,994 |
| Dec | 694 | 300 | 852 | 394 | 3,675 | 10.66 | 4,198 | 7,873 |
| Total | 9,041 |  |  |  | 44,100 |  | 57,999 | 102,099 |

As Table 1 shows, the customer's peak demand is 852 kW , and thus, per the GL rate structure, the customer's GL Contract Demand would be set at $50 \%$ of that peak, or 426 kW . For this rate case, the GL rate proposed is a fixed charge of $\$ 3,675.00$ and a demand charge of $\$ 10.66 / \mathrm{kW}$ for each additional kilowatt of demand over 300 kilowatts. Using these proposed rates, the customer's bill would total $\$ 102,099$ a year. Further, since the total demand for each month never dips below the minimum (i.e. $50 \%$ of the contract demand), the customer pays the minimum bill plus the demand charge on volumes greater than 300 kW .

To estimate the bill a customer would pay if it installed generation, the Company first assumed the level of generation installed equaled the customer's maximum or 852 kW . This was to create the most direct example to understand the differences in bills between Rider No. 16 and Rate GL. The calculation of a customer's bill on Rate GL with generation of 852 kW is shown in Table 2 .

Table 2: Bill Calculations for 'Typical' GL Customer with On-site Generation

| Month | Generation <br> $(\mathbf{k} \mathbf{W})$ | Delivered <br> $\mathbf{k} \mathbf{W}$ <br> $(\mathbf{k} \mathbf{W})$ | Min <br> $\mathbf{L o a d}$ <br> $(\mathbf{k} \mathbf{W})$ | Contract <br> Demand <br> $(\mathbf{k} \mathbf{W})$ | Billed <br> Demand <br> $(\mathbf{k} \mathbf{W})$ | Min Bill <br> $(\$ / \mathbf{M o n t})$ | Rate <br> $(\$ / \mathbf{k} \mathbf{W})$ | Incremental <br> Bill <br> $(\$ /$ Mont $)$ | Total Bill <br> $(\$ / \mathbf{M o n t h})$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Jan | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 |  |
| Feb | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 |  |
| Mar | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Apr | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| May | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Jun | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Jul | 0 | 846 | 300 | 852 | 546 | 3,675 | 10.66 | 5,817 | 9,492 |
| Aug | 0 | 852 | 300 | 852 | 552 | 3,675 | 10.66 | 5,884 | 9,559 |
| Sep | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Oct | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Nov | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Dec | 852 | 0 | 300 | 852 | 126 | 3,675 | 10.66 | 1,343 | 5,018 |
| Total |  | 1,698 |  |  |  | 44,100 |  | 25,129 | 69,229 |

Table 2 shows the calculation of the customer's bill assuming the customer experiences a maintenance outage in the two highest load months (July and August).

Under the proposed GL rate, the customer would pay $\$ 69,229$ per year. This is driven by the requirement to pay the minimum bill of $\$ 3,675$ per month plus paying additional minimum charges of the difference in $50 \%$ of the GL Contract Demand charges and minimum load of 300 kW times the demand rate of $\$ 10.66$, or $\$ 1,343$ per month. The customer also pays $\$ 10.66 / \mathrm{kW}$ for the actual delivered kW in June and July. Together this results in additional per kW costs of $\$ 25,129$ for those two months.

By comparison, assume this customer selected Rider No. 16. In this case, if a customer takes Supplementary Service under GL rate, they pay a minimum of charge for the first 300 kW . To minimize their bill under Rider No. 16, the customer is unlikely to build a generation facility equal to maximum use but rather target generator size that is equal to the customer's maximum annual demand and the minimum amount to of 300 kW . Therefore, the customer's generation unit would be 552 kW , as would their Contract Demand under Rider No. 16. In this scenario the customer pays minimum bill for Supplementary Services of $\$ 44,100$ and Rider No. 16 charges of $\$ 16,560$ for a total of $\$ 60,660$, or $12 \%$ less than their alternative on GL Rate.

It should be noted that a customer with behind the meter generation can reduce their 'Supplementary Demand' requirements to less than 300 kW . In this case it would install a 645 kW generator and request Supplementary Demand service up to 207 kW under General Service Rate $G M>25$. As a result, the customer would avoid the minimum payment while paying a nominal (\$76/month) customer charge, volumetric charges on energy delivery services $(\$ 0.012661 / \mathrm{kWh})$ as well as a demand charge of $\$ 7.89 \mathrm{~kW}$. In this case the customer would then pay a slightly more annually, or
$\$ 19,350$, for Rider No. 16 service at a contract demand of 645 kW while most likely experiencing a lower bill than receiving 300 kW of Supplementary Service under GL).

Another scenario was run where the customer experiences an outage during the lowest demand months, or February and March. In this example, the customer would pay $\$ 59,887$ a year on Rate GL, the cost reduction coming from paying less for the delivered demand (difference between July and August demand versus February and March) of $\$ 3,339$. In this case the customer pays about the same under Rider No. 16 charges of $\$ 16,560$ for a total of $\$ 60,660$, about the same as if they were on GL rate.

The above examples show that no matter how much the customer on Rider 16 uses the Company's delivery services, they pay the same amount, regardless of whether the customer demands Back-Up service during the higher volume months of June and July or the actual level of demand used (e.g., max of 852 kW in July versus 739 kW in March).

These examples also demonstrate that customers with behind the meter generation have several opportunities to avoid costs to serve. Specifically, in all scenarios the typical customer pays either the same amount or less depending on the operations of their generator and choice of Supplementary Service. The Company acknowledges that there are scenarios where a customer would be better off on the GL rate rather than Rider No. 16. In those cases, the customer would choose GL service rather than Rider No. 16. However, this review presented above does shed light on the fact that these customers can 'select' a rate option that allows them to avoid paying their full cost of service because that optional rate is not reflective of cost of service. That is, because Rider No. 16 does not follow cost causation principles, the offering enables
some customers the opportunity to arbitrage rates and thus avoid costs, shifting those costs to other customers.

## EXHIBIT ME-2

## ELECTRIC VEHICLE BENEFIT COST ASSESSMENT SUMMARY

This exhibit describes, in detail, each benefit cost test, the designation of costs and benefits to each test and the quantification of each benefit and cost.

## BENEFIT COST TEST DESCRIPTIONS

As noted in Witness Everett's testimony, there are five benefit costs test included in this study:

- The Participant Cost Test (PCT) is the measure of the quantifiable benefits and costs to the customer due to participation in a program. Since many customers do not base their decision to participate in a program entirely on quantifiable variables, this test cannot be a complete measure of the benefits and costs of a program to a customer.
- The Ratepayer Impact Measure (RIM) test measures what happens to customer bills or rates due to changes in utility revenues and operating costs caused by the program. Rates will go down if the change in revenues from the program is greater than the change in utility costs. Conversely, rates or bills would go up if revenues collected after program implementation are less than the total costs incurred by the utility in implementing the program. This test indicates the direction and magnitude of the expected change in customer bills or rate levels.
- The Total Resource Cost (TRC) test measures the net benefits or costs of the customer resource option (i.e., EV charging). Using the identified cashflows as the basis for benefits and costs, the benefits calculated in the TRC test are the avoided generation supply costs, the reduction in transmission, distribution, generation, and capacity costs valued at marginal cost for the periods when there is a load reduction. The costs in this test are the program costs paid by both the utility and the participants plus the increase in supply costs for the periods in which load is increased. Thus, all equipment costs,
installation, operation and maintenance (or, changes in O\&M), and administration costs, no matter who pays for them, are included in this test. Any tax credits are considered a reduction to costs in this test, if applicable.
- The Societal Cost Test (SCT). The SCT differs from the TRC test in that it includes the effects of externalities (e.g., environmental, emissions, etc.) and excludes tax credit benefits.
- The Utility Cost Test, also known as the Program Administrator Cost Test, measures the net costs of a demand-side management program as a resource option based on the costs incurred by the program administrator, the utility, (including incentive costs) and excluding any net costs incurred by the participant. Note that the UCT provides a detailed perspective of the costs the utility incurs for the program, and thus customers, to include administrative costs and incentives, that typically pass through to customers. A positive UCT indicates that the benefits exceed costs thus have no impact on customers, while a negative indicates that there are incremental costs, thus revenue requirement, resulting from the test.

Because of the interplay among all these tests, it is most important to review the results as a whole rather than focus on any one test.

## BENEFIT AND COST COMPONENTS

As noted above, the Company used industry best practices and the "California Standard Practice Manual Economic Analysis of Demand-Side Programs and Projects," ${ }^{1}$ Additionally, the Company referred to Total Resource Cost (TRC) Test guidance from the PA PUC for Act

[^85]129 Energy Efficiency and Demand Response programs. ${ }^{2}$ These two sources, in addition to expert judgment, guided the cost benefit analysis approaches. Specifically, these guidance sources identify the perspectives and cashflows that inform the various tests which may include direct or indirect economic benefits.

The first step of the analysis methodology involves developing a framework that outlines each benefit and cost and then quantifying each of these benefits and costs. The second step is determining the impacts on different groups of customers (e.g., pilot participants and non-participants), the utility, and the Commonwealth. The last step is then quantifying each of the components of costs and benefits and then quantifying the net benefits (benefits less costs) and benefit to cost ratio (benefits divided by costs) for each stakeholder group noted above.

The Company looked at costs in five key categories. Depending on the test, these categories are considered costs or benefits. Categories may also be excluded from some tests.

- Additional capacity costs
- Electricity sales costs
- Incremental Revenues
- Pilot administrative costs
- Participant vehicle costs
- Externalities


## Additional Capacity Costs

The Company used the capacity costs that the utility also uses to determine cost effectiveness for Act 129 Energy Efficiency programs. In the Act 129 context, these are

[^86]avoided costs. This analysis uses the recently-developed capacity costs that the PA PUC recently approved within the Company's Phase IV Energy Efficiency and Conservation (EE\&C) plan, Docket No. M-2020-3020818. Additional capacity costs are discussed in detail below.

## Generation Capacity Costs

These are costs to create or procure a kW of capacity to generate energy. Generation related costs include:

- Costs of building capacity to generate the kWh ;
- Cost related to maintaining system reliability and voltage control (e.g., Ancillary Services);
- Cost associated with plant operations, such as Criteria Pollutants, CO2, and other emissions costs; and
- Fuel costs and any related hedging costs.


## Transmission Costs

These are costs to deliver a kWh from a generator to the customer's meter within transmission infrastructure. Transmission related costs include:

- Costs of building transmission capacity; and
- Cost related to transmission line losses resulting from moving electricity across generation to the customer.


## Distribution costs

These are costs to deliver a kWh from a generator to the customer's meter within distribution infrastructure. Distribution related costs include:

- Costs of building distribution capacity; and
- Cost related to distribution line losses resulting from moving electricity across generation to the customer.


## Energy Supply Costs

Energy Supply costs are the costs of the delivered energy supply to the customer's meter. Following Act 129 methodologies, costs are distinguished for six periods during the year: summer peak, summer off-peak, winter peak, winter off-peak, shoulder peak, and shoulder offpeak.

## Incremental Revenues

Because adoption of EVs increases electricity use, customers receiving service from the Company increases sales and thus both pay towards variable costs and fixed costs, much like a Community Development rate. These create a benefit equal to the increase in revenues. The Fleet Pilot analysis uses the GM>25, GMH>25, and GL tariffs and the Home Charging Pilot analysis uses the RS tariff.

## Pilot Administrative Costs

As previously detailed in the revenue requirement recovery discussion. These are costs associated with administering the pilots and include both capital and expense items. Therefore the costs included in the BCA are include both these costs as well as the costs associated with financing capital. These costs are recovered by both the Company's non-participating customers and the participating customers.

## Participant vehicle cost

The costs associated with switching from an internal combustion engine vehicle (ICEV) to an EV. These are separate from pilot monthly charges to participants that are captured under the pilot administrative costs. These include:

- Vehicle costs: The incremental cost of an EV compared to an ICEV.
- O\&M costs: The difference in O\&M cost over the life of an EV compared to an ICEV.
- Fuel costs: The avoided gasoline costs to fuel an ICEV (note electricity costs paid for are included in participant program costs).


## Externalities

The costs associated with changes in vehicle emissions and grid-side generation emissions resulting from changes in consumption. These include:

- Reduced Fuel GHG Emissions: $\mathrm{CO}_{2} \mathrm{e}$ avoided emissions related to avoided ICEV gasoline fuel consumption.
- Reduced Fuel Air Pollutants: Non-methane organic gases (NMOG) and NOx avoided emissions related to avoided ICEV gasoline fuel consumption.
- Increased Electricity GHG Emissions: Incremental $\mathrm{CO}_{2} \mathrm{e}$ emissions related to increased utility energy generation to supply EV charging.
- Increased Electricity Air Pollutants: Incremental NOx emissions related to increased utility energy generation to supply EV charging.

Externalities also include direct impacts from these pilots refer to the creation of economic growth, as measured in conventional economic growth metrics such as an increase in Pennsylvania's Gross Domestic Product ("GDP") and increases in job levels within the Commonwealth. Direct impacts from the pilots implies that the program would be measurably
responsible for creating GDP growth or new jobs while Indirect would be the secondary or tertiary impacts of these pilots on these metrics.

The challenge with including these types of components is that they are extremely difficult to specifically measure and thus must be inferred through economic forecasting methodologies. That is, to measure, one has to be able to determine a "Base Case" what job levels and GDP would have been without the program and then compare that to what the actual job creation and GDP growth. This is not possible for the obvious reason that there is no direct way to compute these metrics for the "Base Case." Second, even if anecdotal evidence points to job growth or GDP growth, such as the increase in "electric vehicle related" jobs, it is not clear that increase is directly attributed to the Company's pilots or program versus other efforts encouraged by the Commonwealth or other stakeholders. Lastly, it is important to remember that there may also be negative direct or indirect economic impacts from these pilots that result in higher rates for customers.

Given these challenges in measuring these impacts it is not possible to develop a credible, defensible, and transparent methodology for estimating these impacts.

## BENEFIT COST ANALYSIS METHODOLOGY

The benefit cost analysis methodology includes defining 25 value components and specifying the methodology for calculating each. Table 1 below shows each of these components, grouped by the five categories noted above. The costs represent the present value per EV for estimated cashflows.

Benefits and costs are derived on a per-electric vehicle basis where the analysis conservatively assumes one EV per installed charging port. Particularly for the Fleet Pilot, the number of EVs may often exceed the number of charging ports installed, which would amplify the benefits of that program beyond the conservative projections shown below.

Table 1: Benefit cost components

|  | Component | Fleet Pilot <br> Levelized <br> cost $(\$ / \mathbf{V V})$ | Home <br> Charging <br> Pilot <br> Levelized <br> cost $\mathbf{( \$ / E V )}$ |
| :--- | :--- | :--- | :--- |
| Col <br> Row | A | B | C |

The component values in Table 1 relied on several sources of information in addition to the previously discussed California Standard Practice Manual, Total Resource Cost (TRC) Test guidance from the Commission for Act 129 Energy Efficiency and Demand Response programs, and the capacity costs sourced from the Company's Act 129 Energy Efficiency program efforts. Additional sources include but are not limited to the following:

[^87]- Company-developed budget assumptions for the pilots. Given that these are pilots, the Company is proposing to cap participant levels, thereby adding more certainty to the overall budget estimations for administrative costs.
- Company-developed throughput assumptions. These include estimated annual energy consumption totals for participating EV charging.
- National Renewable Energy Laboratory (NREL) EV charging profiles. ${ }^{4}$ These profiles are used to distribute the Company's energy consumption estimates to determine peak charging (kW/EV) and what portion of charging occurs during the six previously identified peak periods where energy supply costs vary (summer peak, summer off-peak, winter peak, winter off-peak, shoulder peak, and shoulder off-peak).
- ICEV fuel costs, ${ }^{5}$ fuel efficiency, and estimated year-over-year changes in fuel costs. ${ }^{6}$

For the Fleet sales estimates the Company assumed a blend of GM>25, GMH $>25$, and GL program participants. Additionally, the Company assumed a blend of vehicle types including light duty trucks, light duty fleet vehicles, medium duty fleet vehicles, and school buses.

The Company developed the cost benefit analysis with 13 years of cashflows for both the Fleet Pilot and Home Charging Pilot analyses. This duration determination is primarily informed by the pilot contract terms and conservative vehicle lifetime assumptions. The duration is the same for both pilots to offer a comparison. This thirteen-year time horizon provides a more conservative measure of program benefits than the fifteen-year maximum time

[^88]period allowed in the Total Resource Cost Test analysis for Act 129 Energy Efficiency Programs.

The Company also characterized the different customer groups and vehicle types within the pilot. Specifically, the Company's benefit cost analysis developed results that reflect the benefits and costs for a typical EV serviced by the pilot for a typical pilot participant. The Company developed a typical or average participating customer and a typical or average EV for the Fleet Pilot analysis. Additionally, the Company conservatively assumes one EV is serviced by one charger port installed through the pilot.

For the Fleet pilot, an average participating customer represents an assumed weighted average mix of GM>25, GMH>25, and GL customers. This assumed weighted average informs the creation of blended inputs for certain analysis cashflows. Primarily, for example, cashflows characterizing the increased electricity sales resulting from EV charging are dependent on rate class-specific tariffs. Therefore, the Company created increased electricity sales for a typical pilot participant that represents the weighted average mix of those tariffs.

Similarly for the Fleet pilot, an average vehicle type represents an assumed weighted average mix of light duty trucks, light duty fleet vehicles, medium duty fleet vehicles, and school buses. This assumed weighted average informs the creation of blended inputs for certain analysis cashflows. For example, cashflows representing avoided vehicle fuel costs, avoided vehicle $O \& M$ costs, and increased electricity sales related to differing charging requirements for the different vehicle types. Therefore, the Company created impacts for the given cashflow using weighted average values for the inputs needed to calculate a result. As a final example, the incremental vehicle cost, which is a cost in the PCT, TRC, and SCT, represents the weighted average incremental vehicle cost for the four vehicle types previously mentioned.

It is important to note that the Home Charging Pilot analysis assumes all participating customers are from the RS customer class. Additionally, all EVs are assumed light duty vehicles for personal use.

## ASSIGNMENT OF BENEFITS AND COSTS TO EACH TEST

Benefits and costs are assigned in each BCA test as identified in the chart below. These assignments are consistent and apply to both the Fleet and Home Charging analyses.

|  | Component | PCT | RIM | SCT | TRC | UCT |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Col <br> Row | A | B | C | D | E | F |
| 1 | Additional Capacity Costs | N/A | N/A | Cost | Cost | N/A |
| 2 | Transmission Capacity Costs | N/A | Cost | Cost | Cost | Cost |
| 3 | Distribution Capacity Costs | N/A | Cost | Cost | Cost | Cost |
| 4 | Energy Supply Costs | N/A | N/A | Cost | Cost | N/A |
| 5 | Increased Electricity Sales <br> Revenue Base Distribution | Cost | Benefit | N/A | N/A | Benefit |
| 6 | Increased Electricity Sales <br> Revenue Ancillary Riders | Cost | Benefit | N/A | N/A | N/A |
| 7 | Increased Electricity Sales <br> Revenue Supply | Cost | N/A | N/A | N/A | N/A |
| 8 | Increased Electricity Sales <br> Revenue Transmission | Cost | Benefit | N/A | N/A | N/A |
| 9 | Increased Electricity Sales <br> Revenue Other | Cost | Benefit | N/A | N/A | N/A |
| 10 | Total - Rev Req - Capital - <br> Socialized | N/A | Cost | Cost | Cost | N/A |
| 11 | Total - Rev Req - Return on <br> Capital - Socialized | N/A | Cost | N/A | N/A | Benefit |
| 12 | Total - Rev Req - Gross up <br> for Taxes - Socialized | N/A | Cost | N/A | N/A | N/A |
| 13 | Total - Rev Req - Expense - <br> Socialized | N/A | Cost | Cost | Cost | Cost |
| 14 | Total - Rev Req - Capital | Cost | N/A | Cost | Cost | N/A |
| 15 | Total - Rev Req - Return on <br> Capital | Cost | N/A | N/A | N/A | Benefit |
| 16 | Total - Rev Req - Gross up <br> for Taxes | Cost | N/A | N/A | N/A | N/A |
| 17 | Total - Rev Req - Expense | Cost | N/A | Cost | Cost | Cost |
| 18 | Avoided Fuel Costs | Benefit | N/A | Benefit | Benefit | N/A |


| 19 | Customer O\&M Savings | Benefit | N/A | Benefit | Benefit | N/A |
| :---: | :--- | :---: | :---: | :---: | :---: | :---: |
| 20 | Reduced Fuel GHG <br> Emissions | N/A | N/A | Benefit | N/A | N/A |
| 21 | Reduced Fuel Air Pollutants | N/A | N/A | Benefit | N/A | N/A |
| 22 | Increased Electricity GHG <br> Emissions | N/A | N/A | Cost | N/A | N/A |
| 23 | Increased Electricity Air <br> Pollutants | N/A | N/A | Cost | N/A | N/A |
| 24 | Vehicle Costs | Cost | N/A | Cost | Cost | N/A |
| 25 | Upfront Program Costs ${ }^{7}$ | Cost | N/A | Cost | Cost | N/A |

The final step is to sum up the present value benefits and costs separately for each test and compute two metrics for each. First is the net benefit, which is the difference between benefits and costs. The second is the benefit cost ratio, which divides costs into benefits. In this case, a program is assumed to pass a test if it has a benefit to cost ratio of close to or greater than 1. The final results are contained in the direct testimony of witness Everett, DLC St. No. 17.

[^89]
# Duquesne Light Company 

Docket No. R-2021-3024750

DLC Exhibit 6<br>Jurisdictional Separation Study and<br>Allocated Cost of Service Study

## BOOK 10

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

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## Exhibit 1 - Summary of Filing

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Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation

## Book 4

Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

## Book 5

Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022) Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021)
Book 7
Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

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Statement 3 - Todd A. Mobley
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Statement 9 - Jennifer Neiswonger
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## JSS / Class ACOS Study

## Fully Projected Future Test Year

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## Exhibit

Description
Exhibit 6-Index Index to Exhibit 6- Jurisdictional Separation Study and Allocated Cost of Service Study

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Exhbibit 6-1 Jurisdictional Separation
Exhbibit 6-1A JSS for Historic Test Year
Exhbibit 6-1B JSS for Future Test Year

Allocated Cost of Service (ACOS) for Fully Projected Future Test Year

| Exhibit 6-2 | Summary of Results- Revenue requirement by rate class |  |
| :---: | :---: | :---: |
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| Exhibit 6-4A | Customer-Related Costs- RS |  |
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| Exhibit 6-4G | Transformer Costs |  |
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| Exhibit 6-9 | Development of Allocators | Separate Index |
| Exhibit 6-10 | Revenue Allocation |  |
| Exhibit 6-11 | SL- Distribution Component |  |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 107 | Plant | 0 | 25 | 0 | 82 |
| 4 | SW- Plant/ OM | 303 P | 0 | None | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 219,001 | Dist | 0 | 0 | 0 | 219,001 |
| 6 | SW- Labor-related | 303L | 0 | None | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 62,331 | Dist | 0 | 0 | 0 | 62,331 |
| 8 | Software- RB / CIP/Cyber | 303 F | 115,627 | Plant | 0 | 26,620 | 23 | 88,984 |
| 9 | Intangible Plant |  | 397,066 |  | 0 | 26,645 | 23 | 370,398 |
| 10 |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 1,122,826 | Tran | 0 | 1,122,826 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 1,122,826 |  | 0 | 1,122,826 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | Dist | 0 | 0 | 0 | 23,190 |
| 17 | Structures and Improvements | 361 | 71,327 | Dist | 0 | 0 | 0 | 71,327 |
| 18 | Direct Assignment | 361 | 961 | Pitcairn | 0 | 0 | 961 | 0 |
| 19 | Station Equipment | 362 | 523,748 | Dist | 0 | 0 | 0 | 523,748 |
| 20 | Station Equipment- Network | 362 | 13,188 | Dist | 0 | 0 | 0 | 13,188 |
| 21 | Poles, Towers and Fixtures | 364 | 624,016 | Dist | 0 | 0 | 0 | 624,016 |
| 22 | OH Conductors and Devices | 365 | 629,457 | Dist | 0 | 0 | 0 | 629,457 |
| 23 | UG Conduits- Radial | 366 | 157,950 | Dist | 0 | 0 | 0 | 157,950 |
| 24 | UG Conduits- Network | 366 | 30,713 | Dist | 0 | 0 | 0 | 30,713 |
| 25 | UG Conduits- URD | 366 | 30,713 | Dist | 0 | 0 | 0 | 30,713 |
| 26 | UG Conductors- Radial | 367 | 331,382 | Dist | 0 | 0 | 0 | 331,382 |
| 27 | UG Conductors- Network | 367 | 64,435 | Dist | 0 | 0 | 0 | 64,435 |
| 28 | UG Conductors- URD | 367 | 64,435 | Dist | 0 | 0 | 0 | 64,435 |
| 29 | Line Transformers- OH | 368 | 300,124 | Dist | 0 | 0 | 0 | 300,124 |
| 30 | Line Transformers- Radial | 368 | 95,034 | Dist | 0 | 0 | 0 | 95,034 |
| 31 | Line Transformers- Network | 368 | 44,726 | Dist | 0 | 0 | 0 | 44,726 |
| 32 | Line Transformers- URD | 368 | 50,903 | Dist | 0 | 0 | 0 | 50,903 |
| 33 | Services | 369 | 114,962 | Dist | 0 | 0 | 0 | 114,962 |
| 34 | Meters | 370 | 151,169 | Dist | 0 | 0 | 0 | 151,169 |
| 35 | Street Lighting | 373 | 44,730 | Dist | 0 | 0 | 0 | 44,730 |
| 36 | ARO- Dist Plant | ARO | 0 | Dist | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 3,367,163 |  | 0 | 0 | 961 | 3,366,202 |

JSS
Jurisdictional Separation
JSS
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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 424,855 | Labor | 0 | 73,716 | 62 | 351,077 |
| 41 | General Plant-EV | 390EV | 1,081 | EV | 0 | 0 | 0 | 1,081 |
| 42 | General Plant | 389-399 | 425,936 |  | 0 | 73,716 | 62 | 352,158 |
| 43 |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 5,312,991 |  | 0 | 1,223,187 | 1,046 | 4,088,758 |
| 45 |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 256,846 | Intang | 0 | 17,236 | 15 | 239,596 |
| 48 | Transmission Plant | 108.3 | 335,205 | Tran | 0 | 335,205 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 43,772 | Dist | 0 | 0 | 0 | 43,772 |
| 50 | Direct Assignment | 108.5 | 255 | Pitcairn | 0 | 0 | 255 | 0 |
| 51 | Station Equipment | 108.5 | 189,703 | Dist | 0 | 0 | 0 | 189,703 |
| 52 | Poles, Towers and Fixtures | 108.5 | 192,716 | Dist | 0 | 0 | 0 | 192,716 |
| 53 | OH Conductors and Devices | 108.5 | 184,533 | Dist | 0 | 0 | 0 | 184,533 |
| 54 | UG Conduits | 108.5 | 53,228 | Dist | 0 | 0 | 0 | 53,228 |
| 55 | UG Conductors | 108.5 | 136,278 | Dist | 0 | 0 | 0 | 136,278 |
| 56 | Line Transformers | 108.5 | 140,769 | Dist | 0 | 0 | 0 | 140,769 |
| 57 | Services | 108.5 | 28,630 | Dist | 0 | 0 | 0 | 28,630 |
| 58 | Meters | 108.5 | 42,906 | Dist | 0 | 0 | 0 | 42,906 |
| 59 | Street Lighting | 108.5 | 25,853 | Dist | 0 | 0 | 0 | 25,853 |
| 60 | EV Assets | 108EV | 143 | EV | 0 | 0 | 0 | 143 |
| 61 | General | 108.6 | 178,887 | Labor | 0 | 31,038 | 26 | 147,822 |
| 62 | Depreciation Reserve | 108 | 1,809,724 |  | 0 | 383,479 | 296 | 1,425,949 |
| 63 |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 54,267 | OMxSupp | 0 | 8,098 | 8 | 46,162 |
| 66 | Cash Working Capital- Supp | 131 | 13,797 | Supp | 13,797 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 33,482 | M\&S | 0 | 7,425 | 0 | 26,057 |
| 68 | Capitalized Pension |  | 96,687 | Plant | 0 | 22,260 | 19 | 74,408 |
| 69 | Customer Deposits |  | $(11,163)$ | Dist | 0 | 0 | 0 | $(11,163)$ |
| 70 | ADIT-EV |  | (53) | EV | 0 | 0 | 0 | (53) |
| 71 | ADIT- Transmission | 154 | $(166,107)$ | Tran | 0 | $(166,107)$ | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(501,992)$ | PlantxTrans | 0 | 0 | (128) | $(501,864)$ |
| 73 | ADIT- General | 182 | $(24,073)$ | Labor | 0 | $(4,177)$ | (4) | $(19,893)$ |
| 74 | Other Rate Base | 131-283 | $(505,155)$ |  | 13,797 | $(132,501)$ | (105) | $(386,345)$ |
| 75 |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,998,112 |  | 13,797 | 707,206 | 645 | $\underline{2,276,464}$ |

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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 214,471 | Supp | 214,471 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 12,640 | Tran | 0 | 12,640 | 0 | 0 |
| 82 | Transmission Expense |  | 227,111 |  | 214,471 | 12,640 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 9,224 | PlantxTrans | 0 | 0 | 2 | 9,222 |
| 86 | Load Dispatching | 581 | 1,050 | Dist | 0 | 0 | 0 | 1,050 |
| 87 | Station Expenses | 582 | 352 | PlantxTrans | 0 | 0 | 0 | 352 |
| 88 | OH Line Expenses | 583 | 544 | PlantxTrans | 0 | 0 | 0 | 544 |
| 89 | UG Line Expenses | 584 | 607 | PlantxTrans | 0 | 0 | 0 | 607 |
| 90 | Meter Expenses | 586 | 4,052 | PlantxTrans | 0 | 0 | 1 | 4,051 |
| 91 | Customer Installation Expenses | 587 | 2 | PlantxTrans | 0 | 0 | 0 | 2 |
| 92 | Misc. Distribution Expenses | 588 | 10,298 | PlantxTrans | 0 | 0 | 3 | 10,295 |
| 93 | Rents | 589 | 0 | PlantxTrans | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (190) | PlantxTrans | 0 | 0 | (0) | (190) |
| 95 | Maint of Structures | 591 | 99 | PlantxTrans | 0 | 0 | 0 | 99 |
| 96 | Maint of Station Equip | 592 | 2,660 | PlantxTrans | 0 | 0 | 1 | 2,659 |
| 97 | Maint of OH Lines | 593 | 23,726 | PlantxTrans | 0 | 0 | 6 | 23,720 |
| 98 | Maint of UG Lines | 594 | 2,243 | PlantxTrans | 0 | 0 | 1 | 2,242 |
| 99 | Maint of Line Transformers | 595 | 29 | PlantxTrans | 0 | 0 | 0 | 29 |
| 100 | Maint of Lighting | 596 | 555 | Dist | 0 | 0 | 0 | 555 |
| 101 | Maint of Meters | 597 | 391 | Dist | 0 | 0 | 0 | 391 |
| 102 | Maint of Misc. Plant | 599 | 74 | PlantxTrans | 0 | 0 | 0 | 74 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 55,716 |  | 0 | 0 | 14 | 55,702 |
| 104 |  |  | 55,716 |  | 0 | 0 | 14 | 55,702 |
| 105 | D. CUSTOMER ACCOUNTS AND | ERVICE |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,049 | Dist | 0 | 0 | 0 | 13,049 |
| 107 | Meter Reading Exp | 902 | 335 | Dist | 0 | 0 | 0 | 335 |
| 108 | Customer Records \& Coll | 903 | 1,216 | Dist | 0 | 0 | 0 | 1,216 |
| 109 | Uncollectible Accounts | 904 | 14,309 | Dist | 0 | 0 | 0 | 14,309 |
| 110 | COVID Uncol, LPC | 904 | 2,951 | Dist | 0 | 0 | 0 | 2,951 |
| 111 | Customer Acets. Exp. | 901-905 | 31,860 |  | 0 | 0 | 0 | 31,860 |
| 112 |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 165 | Dist | 0 | 0 | 0 | 165 |
| 114 | COVID Relief | 908 CV | 1,453 | Dist | 0 | 0 | 0 | 1,453 |
| 115 | Customer Service Exp. | 908-916 | 1,618 |  | 0 | 0 | 0 | 1,618 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 33,478 |  | 0 | 0 | 0 | 33,478 |

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Jurisdictional Separation
JSS
Exh 6-1

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GENERAL |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 63,866 | Labor | 0 | 11,081 | 9 | 52,775 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Dist | 0 | 0 | 0 | 2,928 |
| 121 | Office Supp \& Exp- Other | 921 | 5,517 | Labor | 0 | 957 | 1 | 4,559 |
| 122 | Outside Services- Cust Care | 923 CC | 2,017 | Dist | 0 | 0 | 0 | 2,017 |
| 123 | Outside Services- HR | 923M | 1,960 | Labor | 0 | 340 | 0 | 1,620 |
| 124 | Outside Services- Other | 923 | 26,462 | Labor | 0 | 4,591 | 4 | 21,867 |
| 125 | Property Insurance | 924 | 6,676 | Plant | 0 | 1,537 | 1 | 5,138 |
| 126 | Injuries \& Damages | 925 | 230 | Labor | 0 | 40 | 0 | 190 |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 0 | 868 | 1 | 4,132 |
| 128 | Regulatory Commission | 928 | 813 | Dist | 0 | 0 | 0 | 813 |
| 129 | A\&G-EV | 930 EV | 350 | EV | 0 | 0 | 0 | 350 |
| 130 | Marketing, Communications | 930.1 | 34 | Dist | 0 | 0 | 0 | 34 |
| 131 | Misc. General Plant | 930.2 | 7,437 | Labor | 0 | 1,290 | 1 | 6,146 |
| 132 | General Plant Rent | 931 | 3,925 | Labor | 0 | 681 | 1 | 3,243 |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Dist | 0 | 0 | 0 | 833 |
| 134 | Misc Genl Plant- Other | 935P | 11,450 | Labor | 0 | 1,987 | 2 | 9,461 |
| 135 | Admin \& Genl. Exp. | 920-932 | 139,498 |  | 0 | 23,372 | 20 | 116,105 |
| 136 _ _ _ - |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 455,803 |  | 214,471 | 36,012 | 34 | 205,286 |
| 138 |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 18,101 | Plant | 0 | 4,167 | 4 | 13,930 |
| 141 | Intangible- Customers | 403 | 34,285 | Dist | 0 | 0 | 0 | 34,285 |
| 142 | Intangible- AMI | 403 | 9,758 | Dist | 0 | 0 | 0 | 9,758 |
| 143 | Transmission Plant | 403 | 27,084 | Tran | 0 | 27,084 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,593 | Dist | 0 | 0 | 0 | 1,593 |
| 145 | Direct assignment | 403 | 26 | Pitcairn | 0 | 0 | 26 | 0 |
| 146 | Station Equipment | 403 | 11,383 | Dist | 0 | 0 | 0 | 11,383 |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | Dist | 0 | 0 | 0 | 13,229 |
| 148 | OH Conductors and Devices | 403 | 16,681 | Dist | 0 | 0 | 0 | 16,681 |
| 149 | UG Conduits | 403 | 3,071 | Dist | 0 | 0 | 0 | 3,071 |
| 150 | UG Conductors | 403 | 12,519 | Dist | 0 | 0 | 0 | 12,519 |
| 151 | Line Transformers | 403 | 16,932 | Dist | 0 | 0 | 0 | 16,932 |
| 152 | Services | 403 | 2,403 | Dist | 0 | 0 | 0 | 2,403 |
| 153 | Meters | 403 | 10,613 | Dist | 0 | 0 | 0 | 10,613 |

JSS
Jurisdictional Separation
JSS
Exh 6-1

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | Dist | 0 | 0 | 0 | 1,279 |
| 155 | General / Common Plant | 364 | 25,324 | Labor | 0 | 4,394 | 4 | 20,926 |
| 156 | Depr / Amort-EV | 403 EV | 143 | EV | 0 | 0 | 0 | 143 |
| 157 | Amort Exp- Reg Assets- Tran |  | 4,286 | Tran | 0 | 4,286 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 12,564 | Dist | 0 | 0 | 0 | 12,564 |
| 159 | Depreciation Expense | 403 | 221,274 |  | 0 | 39,931 | 33 | 181,309 |
| 160 |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 8,346 | Labor | 0 | 1,448 | 1 | 6,897 |
| 164 | PURTA, Real estate | 408.16 | 1,664 | Plant | 0 | 383 | 0 | 1,281 |
| 165 | Capital stock |  | 0 | Plant | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | Plant | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 10,010 |  | 0 | 1,831 | 2 | 8,177 |
| 168 |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 50,278 | GRT_Rev | 13,505 | 3,848 | 0 | 32,924 |
| 171 | Gross Receipts Tax |  | 50,278 |  | 13,505 | 3,848 | 0 | 32,924 |
| 172 |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 12,296 | PATax_Pres | 57 | 5,957 | (7) | 6,290 |
| 175 | Federal Income Tax Expense |  | 25,299 | FedTax_Pres | 132 | 12,714 | (16) | 12,470 |
| 176 | Income Taxes | 409-411 | 37,595 |  | 189 | 18,670 | (24) | 18,759 |
| 177 | Total Taxes | 408-411 | 97,883 |  | 13,694 | 24,350 | (22) | 59,861 |
| 178 |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 774,959 |  | 228,165 | 100,293 | 45 | 446,456 |
| 180 |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | ent Rat |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 550,379 | Dist | 0 | 0 | 0 | 550,379 |
| 183 | Transmission Revenue |  | 160,861 | Tran | 0 | 160,861 | 0 | 0 |
| 184 | POLR Revenue |  | 227,343 | Supp | 227,343 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,916 | Dist | 0 | 0 | 0 | 3,916 |
| 186 | Misc Service Revenue |  | 2,299 | Dist | 0 | 0 | 0 | 2,299 |
| 187 | Rent For Electric Property |  | 11,788 | Dist | 0 | 0 | 0 | 11,788 |
| 188 | Other Electric Revenues |  | 2,579 | Other_Rev | 1,560 | 1,019 | 0 | 0 |
| 189 | Operating Revenues |  | 959,165 |  | 228,903 | 161,880 | 0 | 568,382 |
| 190 |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 774,959 |  | 228,165 | 100,293 | 45 | 446,456 |
| 192 | V. NET INCOME at Present Rates |  | 184,206 |  | 738 | 61,587 | (45) | 121,926 |
| 193 |  |  | 184,206 | Check |  |  |  |  |

JSS
Jurisdictional Separation
JSS
Exh 6-1

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 942,499 |  | 227,343 | 160,861 | 0 | 554,295 |
| 197 | Other Operating Revenues | 450-456 | 16,666 |  | 1,560 | 1,019 | 0 | 14,087 |
| 198 | Total Operating Revenues |  | 959,165 |  | 228,903 | 161,880 | 0 | 568,382 |
| 199 |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 282,827 |  | 214,471 | 12,640 | 14 | 55,702 |
| 202 | Customer Acctg \& Service | 901-919 | 33,478 |  | 0 | 0 | 0 | 33,478 |
| 203 | Admin \& General | 920-932 | 139,498 |  | 0 | 23,372 | 20 | 116,105 |
| 204 | Total Operating Expenses |  | 455,803 |  | 214,471 | 36,012 | 34 | 205,286 |
| 205 |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 221,274 |  | 0 | 39,931 | 33 | 181,309 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 60,288 |  | 13,505 | 5,680 | 2 | 41,102 |
| 208 | INCOME BEFORE INCOME TAXES |  | 221,801 |  | 927 | 80,257 | (68) | 140,685 |
| 209 | Income Taxes | 409-411 | 37,595 |  | 189 | 18,670 | (24) | 18,759 |
| 210 | NET INCOME |  | 184,206 |  | 738 | 61,587 | (45) | 121,926 |
| 211 | RATE BASE |  | 2,998,112 |  | 13,797 | 707,206 | 645 | 2,276,464 |
| 212 | Return on Rate Base |  | 6.1441\% |  | 5.3\% | 8.7\% | (6.9\%) | 5.4\% |
| 213 |  |  | 16.9\% |  | 20.4\% | 23.3\% | 34.6\% | 13.3\% |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.840\% |  |  |  |  | 7.84\% |
| 216 | Rate Base |  | 2,998,112 |  |  |  |  | 2,276,464 |
| 217 |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 440,681 |  |  |  |  | 190,164 |
| 219 | Uncollectibles expense |  | 15,312 |  |  |  |  | 15,437 |
| 220 | Depreciation expense |  | 221,274 |  |  |  |  | 181,309 |
| 221 | Regulatory Commission Expenses |  | 926 |  |  |  |  | 926 |
| 222 | General taxes / Other |  | 10,010 |  |  |  |  | 8,177 |
| 223 | Subtotal- Operating Costs to recover |  | 688,202 |  |  |  |  | 396,013 |
| 224 |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxes |  | 235,052 |  |  |  |  | 178,475 |
| 226 | Income taxes to recover | 23.38\% | 58,256 |  | Gross up factor |  | 40.63\% | 41,736 |
| 227 |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 981,510 |  |  |  |  | 616,224 |
| 229 | GRT needed | 6.30\% | 54,769 |  | Gross up factor |  | 6.18\% | 37,918 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 1,036,279 |  |  |  |  | 654,142 |
| 231 |  |  |  |  |  |  |  |  |
| 232 | Revenue at Present rates |  | 959,165 |  |  |  |  | 568,382 |
| 233 | Revenue Excess (Deficiency) |  | $\underline{(77,114)}$ |  |  |  |  | $\underline{(85,760)}$ |



| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 379,379 | Labor | 0 | 64,719 | 64 | 314,597 |
| 41 | General Plant-EV | 390EV | 0 | EV | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 379,379 |  | 0 | 64,719 | 64 | 314,597 |
| 43 |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 4,787,518 |  | 0 | 1,083,133 | 1,046 | 3,703,339 |
| 45 |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 200,604 | Intang | 0 | 13,230 | 13 | 187,361 |
| 48 | Transmission Plant | 108.3 | 305,119 | Tran | 0 | 305,119 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 41,102 | Dist | 0 | 0 | 0 | 41,102 |
| 50 | Direct Assignment | 108.5 | 255 | Pitcairn | 0 | 0 | 255 | 0 |
| 51 | Station Equipment | 108.5 | 175,564 | Dist | 0 | 0 | 0 | 175,564 |
| 52 | Poles, Towers and Fixtures | 108.5 | 175,714 | Dist | 0 | 0 | 0 | 175,714 |
| 53 | OH Conductors and Devices | 108.5 | 167,483 | Dist | 0 | 0 | 0 | 167,483 |
| 54 | UG Conduits | 108.5 | 52,161 | Dist | 0 | 0 | 0 | 52,161 |
| 55 | UG Conductors | 108.5 | 118,212 | Dist | 0 | 0 | 0 | 118,212 |
| 56 | Line Transformers | 108.5 | 125,297 | Dist | 0 | 0 | 0 | 125,297 |
| 57 | Services | 108.5 | 39,909 | Dist | 0 | 0 | 0 | 39,909 |
| 58 | Meters | 108.5 | 20,532 | Dist | 0 | 0 | 0 | 20,532 |
| 59 | Street Lighting | 108.5 | 24,870 | Dist | 0 | 0 | 0 | 24,870 |
| 60 | EV Assets | 108EV | 0 | EV | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 159,894 | Labor | 0 | 27,277 | 27 | 132,591 |
| 62 | Depreciation Reserve | 108 | 1,606,716 |  | 0 | 345,626 | 295 | 1,260,796 |
| 63 |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 50,372 | OMxSupp | 0 | 7,456 | 8 | 42,907 |
| 66 | Cash Working Capital- Supp | 131 | 13,081 | Supp | 13,081 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 33,482 | M\&S | 0 | 7,425 | 0 | 26,057 |
| 68 | Capitalized Pension |  | 95,822 | Plant | 0 | 21,679 | 21 | 74,122 |
| 69 | Customer Deposits |  | $(11,163)$ | Dist | 0 | 0 | 0 | $(11,163)$ |
| 70 | ADIT-EV |  | 0 | EV | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | $(161,208)$ | Tran | 0 | $(161,208)$ | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(500,216)$ | PlantxTrans | 0 | 0 | (141) | $(500,075)$ |
| 73 | ADIT- General | 182 | $(36,186)$ | Labor | 0 | $(6,173)$ | (6) | $(30,007)$ |
| 74 | Other Rate Base | 131-283 | $(516,016)$ |  | 13,081 | $(130,821)$ | (118) | $(398,158)$ |
| 75 |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,664,786 |  | 13,081 | 606,687 | 633 | 2,044,385 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 203,351 | Supp | 203,351 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 11,917 | Tran | 0 | 11,917 | 0 | 0 |
| 82 | Transmission Expense |  | 215,268 |  | 203,351 | 11,917 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 8,378 | PlantxTrans | 0 | 0 | 2 | 8,376 |
| 86 | Load Dispatching | 581 | 1,079 | Dist | 0 | 0 | 0 | 1,079 |
| 87 | Station Expenses | 582 | 377 | PlantxTrans | 0 | 0 | 0 | 377 |
| 88 | OH Line Expenses | 583 | 554 | PlantxTrans | 0 | 0 | 0 | 554 |
| 89 | UG Line Expenses | 584 | 505 | PlantxTrans | 0 | 0 | 0 | 505 |
| 90 | Meter Expenses | 586 | 4,022 | PlantxTrans | 0 | 0 | 1 | 4,021 |
| 91 | Customer Installation Expenses | 587 | 3 | PlantxTrans | 0 | 0 | 0 | 3 |
| 92 | Misc. Distribution Expenses | 588 | 9,640 | PlantxTrans | 0 | 0 | 3 | 9,637 |
| 93 | Rents | 589 | 0 | PlantxTrans | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (368) | PlantxTrans | 0 | 0 | (0) | (368) |
| 95 | Maint of Structures | 591 | 93 | PlantxTrans | 0 | 0 | 0 | 93 |
| 96 | Maint of Station Equip | 592 | 3,181 | PlantxTrans | 0 | 0 | 1 | 3,180 |
| 97 | Maint of OH Lines | 593 | 25,588 | PlantxTrans | 0 | 0 | 7 | 25,581 |
| 98 | Maint of UG Lines | 594 | 2,710 | PlantxTrans | 0 | 0 | 1 | 2,709 |
| 99 | Maint of Line Transformers | 595 | 26 | PlantxTrans | 0 | 0 | 0 | 26 |
| 100 | Maint of Lighting | 596 | 623 | Dist | 0 | 0 | 0 | 623 |
| 101 | Maint of Meters | 597 | 343 | Dist | 0 | 0 | 0 | 343 |
| 102 | Maint of Misc. Plant | 599 | 81 | PlantxTrans | 0 | 0 | 0 | 81 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 56,835 |  | 0 | 0 | 15 | 56,820 |
| 104 |  |  | 56,835 |  | 0 | 0 | 15 | 56,820 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,710 | Dist | 0 | 0 | 0 | 13,710 |
| 107 | Meter Reading Exp | 902 | 375 | Dist | 0 | 0 | 0 | 375 |
| 108 | Customer Records \& Coll | 903 | 1,226 | Dist | 0 | 0 | 0 | 1,226 |
| 109 | Uncollectible Accounts | 904 | 11,748 | Dist | 0 | 0 | 0 | 11,748 |
| 110 | COVID Uncol, LPC | 904 | 0 | Dist | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 27,059 |  | 0 | 0 | 0 | 27,059 |
| 112 |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | (947) | Dist | 0 | 0 | 0 | (947) |
| 114 | COVID Relief | 908 CV | 0 | Dist | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | (947) |  | 0 | 0 | 0 | (947) |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 26,112 |  | 0 | 0 | 0 | 26,112 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GENERAL |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 53,035 | Labor | 0 | 9,047 | 9 | 43,979 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,353 | Dist | 0 | 0 | 0 | 2,353 |
| 121 | Office Supp \& Exp- Other | 921 | 2,732 | Labor | 0 | 466 | 0 | 2,265 |
| 122 | Outside Services- Cust Care | 923 CC | 2,004 | Dist | 0 | 0 | 0 | 2,004 |
| 123 | Outside Services- HR | 923 M | 1,947 | Labor | 0 | 332 | 0 | 1,615 |
| 124 | Outside Services- Other | 923 | 26,292 | Labor | 0 | 4,485 | 4 | 21,802 |
| 125 | Property Insurance | 924 | 5,597 | Plant | 0 | 1,266 | 1 | 4,330 |
| 126 | Injuries \& Damages | 925 | 228 | Labor | 0 | 39 | 0 | 189 |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 0 | 853 | 1 | 4,146 |
| 128 | Regulatory Commission | 928 | 813 | Dist | 0 | 0 | 0 | 813 |
| 129 | A\&G-EV | 930 EV | 0 | EV | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | (54) | Dist | 0 | 0 | 0 | (54) |
| 131 | Misc. General Plant | 930.2 | 9,422 | Labor | 0 | 1,607 | 2 | 7,813 |
| 132 | General Plant Rent | 931 | 3,888 | Labor | 0 | 663 | 1 | 3,224 |
| 133 | Misc Genl Plant- Metering | 935M | 806 | Dist | 0 | 0 | 0 | 806 |
| 134 | Misc Genl Plant- Other | 935P | 11,084 | Labor | 0 | 1,891 | 2 | 9,192 |
| 135 | Admin \& Genl. Exp. | 920-932 | 125,148 |  | 0 | 20,650 | 20 | 104,477 |
| 136 |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 423,363 |  | 203,351 | 32,567 | 36 | 187,409 |
| 138 |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 16,877 | Plant | 0 | 3,818 | 4 | 13,055 |
| 141 | Intangible- Customers | 403 | 31,965 | Dist | 0 | 0 | 0 | 31,965 |
| 142 | Intangible- AMI | 403 | 9,098 | Dist | 0 | 0 | 0 | 9,098 |
| 143 | Transmission Plant | 403 | 23,356 | Tran | 0 | 23,356 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,462 | Dist | 0 | 0 | 0 | 1,462 |
| 145 | Direct assignment | 403 | 28 | Pitcairn | 0 | 0 | 28 | 0 |
| 146 | Station Equipment | 403 | 10,803 | Dist | 0 | 0 | 0 | 10,803 |
| 147 | Poles, Towers and Fixtures | 403 | 13,245 | Dist | 0 | 0 | 0 | 13,245 |
| 148 | OH Conductors and Devices | 403 | 15,683 | Dist | 0 | 0 | 0 | 15,683 |
| 149 | UG Conduits | 403 | 2,022 | Dist | 0 | 0 | 0 | 2,022 |
| 150 | UG Conductors | 403 | 12,236 | Dist | 0 | 0 | 0 | 12,236 |
| 151 | Line Transformers | 403 | 14,951 | Dist | 0 | 0 | 0 | 14,951 |
| 152 | Services | 403 | 1,713 | Dist | 0 | 0 | 0 | 1,713 |
| 153 | Meters | 403 | 11,516 | Dist | 0 | 0 | 0 | 11,516 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,246 | Dist | 0 | 0 | 0 | 1,246 |
| 155 | General / Common Plant | 364 | 20,030 | Labor | 0 | 3,417 | 3 | 16,610 |
| 156 | Depr / Amort-EV | 403EV | 0 | EV | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 1,462 | Tran | 0 | 1,462 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 7,824 | Dist | 0 | 0 | 0 | 7,824 |
| 159 | Depreciation Expense | 403 | 195,517 |  | 0 | 32,053 | 35 | 163,429 |
| 160 |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 7,015 | Labor | 0 | 1,197 | 1 | 5,817 |
| 164 | PURTA, Real estate | 408.16 | 1,539 | Plant | 0 | 348 | 0 | 1,190 |
| 165 | Capital stock |  | 0 | Plant | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 118 | Plant | 0 | 27 | 0 | 91 |
| 167 | General Taxes |  | 8,672 |  | 0 | 1,572 | 2 | 7,099 |
| 168 |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 48,766 | GRT_Rev | 12,870 | 8,400 | 0 | 27,496 |
| 171 | Gross Receipts Tax |  | 48,766 |  | 12,870 | 8,400 | 0 | 27,496 |
|  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 7,784 | PATax_Pres | 129 | 4,454 | (7) | 3,207 |
| 175 | Federal Income Tax Expense |  | 27,405 | FedTax_Pres | 337 | 11,113 | (17) | 15,972 |
| 176 | Income Taxes | 409-411 | 35,189 |  | 466 | 15,568 | (24) | 19,179 |
| 177 | Total Taxes | 408-411 | 92,627 |  | 13,336 | 25,539 | (23) | 53,774 |
| 178 |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 711,507 |  | 216,687 | 90,160 | 48 | 404,612 |
| 180 |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | ent Rat |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 545,406 | Dist | 0 | 0 | 0 | 545,406 |
| 183 | Transmission Revenue |  | 140,552 | Tran | 0 | 140,552 | 0 | 0 |
| 184 | POLR Revenue |  | 216,735 | Supp | 216,735 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 1,050 | Dist | 0 | 0 | 0 | 1,050 |
| 186 | Misc Service Revenue |  | 1,548 | Dist | 0 | 0 | 0 | 1,548 |
| 187 | Rent For Electric Property |  | 11,098 | Dist | 0 | 0 | 0 | 11,098 |
| 188 | Other Electric Revenues |  | 2,428 | Other_Rev | 1,393 | 1,035 | 0 | 0 |
| 189 | Operating Revenues |  | 918,817 |  | 218,128 | 141,587 | 0 | 559,102 |
| 190 |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 711,507 |  | 216,687 | 90,160 | 48 | 404,612 |
| 192 | V. NET INCOME at Present Rates |  | 207,310 |  | 1,441 | 51,427 | (48) | 154,490 |
| 193 |  |  | 207,310 | heck |  |  |  |  |

Duquesne Light Company
Jurisdictional Separation
JSS / Class ACOS Study
JSS
Historic Test Year
Exh 6-1A

## Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 903,743 |  | 216,735 | 140,552 | 0 | 546,456 |
| 197 | Other Operating Revenues | 450-456 | 15,074 |  | 1,393 | 1,035 | 0 | 12,646 |
| 198 | Total Operating Revenues |  | 918,817 |  | 218,128 | 141,587 | 0 | 559,102 |
| 199 ( 10 |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 272,103 |  | 203,351 | 11,917 | 15 | 56,820 |
| 202 | Customer Acctg \& Service | 901-919 | 26,112 |  | 0 | 0 | 0 | 26,112 |
| 203 | Admin \& General | 920-932 | 125,148 |  | 0 | 20,650 | 20 | 104,477 |
| 204 | Total Operating Expenses |  | 423,363 |  | 203,351 | 32,567 | 36 | 187,409 |
| 205 |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 195,517 |  | 0 | 32,053 | 35 | 163,429 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 57,438 |  | 12,870 | 9,972 | 2 | 34,595 |
| 208 | INCOME BEFORE INCOME TAXES |  | 242,499 |  | 1,907 | 66,995 | (73) | 173,669 |
| 209 | Income Taxes | 409-411 | 35,189 |  | 466 | 15,568 | (24) | 19,179 |
| 210 | NET INCOME |  | 207,310 |  | 1,441 | 51,427 | (48) | 154,490 |
| 211 | RATE BASE |  | 2,664,786 |  | 13,081 | 606,687 | 633 | 2,044,385 |
| 212 | Return on Rate Base |  | 7.7796\% |  | 11.0\% | 8.5\% | (7.6\%) | 7.6\% |
| 213 |  |  | 14.5\% |  | 24.5\% | 23.2\% | 33.3\% | 11.0\% |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.840\% |  |  |  |  | 7.84\% |
| 216 | Rate Base |  | 2,664,786 |  |  |  |  | 2,044,385 |
| 217 |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 410,802 |  |  |  |  | 174,848 |
| 219 | Uncollectibles expense |  | 11,780 |  |  |  |  | 11,863 |
| 220 | Depreciation expense |  | 195,517 |  |  |  |  | 163,429 |
| 221 | Regulatory Commission Expenses |  | 817 |  |  |  |  | 817 |
| 222 | General taxes / Other |  | 8,672 |  |  |  |  | 7,099 |
| 223 | Subtotal- Operating Costs to recover |  | 627,588 |  |  |  |  | 358,055 |
| 224 |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxes |  | 208,919 |  |  |  |  | 160,280 |
| 226 | Income taxes to recover | 13.43\% | 35,842 |  | Gross up factor |  | 40.63\% | 21,532 |
| 227 |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 872,349 |  |  |  |  | 539,867 |
| 229 | GRT needed | 5.31\% | 48,910 |  | Gross up factor |  | 6.18\% | 28,007 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 921,259 |  |  |  |  | 567,874 |
| 231 |  |  |  |  |  |  |  |  |
| 232 | Revenue at Present rates |  | 918,817 |  |  |  |  | 559,102 |
| 233 | Revenue Excess (Deficiency) |  | $(2,442)$ |  |  |  |  | $(8,772)$ |

## JSS / Class ACOS Study

Future Test Year
Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 107 | Plant | 0 | 24 | 0 | 83 |
| 4 | SW- Plant/ OM | 303P | 0 | None | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 220,145 | Dist | 0 | 0 | 0 | 220,145 |
| 6 | SW- Labor-related | 303L | 0 | None | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 62,656 | Dist | 0 | 0 | 0 | 62,656 |
| 8 | Software- RB / CIP/Cyber | 303F | 116,231 | Plant | 0 | 26,117 | 24 | 90,090 |
| 9 | Intangible Plant |  | 399,139 |  | 0 | 26,141 | 24 | 372,974 |
| 10 |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 1,046,778 | Tran | 0 | 1,046,778 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 1,046,778 |  | 0 | 1,046,778 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | Dist | 0 | 0 | 0 | 23,190 |
| 17 | Structures and Improvements | 361 | 70,130 | Dist | 0 | 0 | 0 | 70,130 |
| 18 | Direct Assignment | 361 | 961 | Pitcairn | 0 | 0 | 961 | 0 |
| 19 | Station Equipment | 362 | 516,860 | Dist | 0 | 0 | 0 | 516,860 |
| 20 | Station Equipment- Network | 362 | 13,188 | Dist | 0 | 0 | 0 | 13,188 |
| 21 | Poles, Towers and Fixtures | 364 | 597,387 | Dist | 0 | 0 | 0 | 597,387 |
| 22 | OH Conductors and Devices | 365 | 603,286 | Dist | 0 | 0 | 0 | 603,286 |
| 23 | UG Conduits- Radial | 366 | 141,870 | Dist | 0 | 0 | 0 | 141,870 |
| 24 | UG Conduits- Network | 366 | 27,586 | Dist | 0 | 0 | 0 | 27,586 |
| 25 | UG Conduits- URD | 366 | 27,586 | Dist | 0 | 0 | 0 | 27,586 |
| 26 | UG Conductors- Radial | 367 | 319,874 | Dist | 0 | 0 | 0 | 319,874 |
| 27 | UG Conductors- Network | 367 | 62,198 | Dist | 0 | 0 | 0 | 62,198 |
| 28 | UG Conductors- URD | 367 | 62,198 | Dist | 0 | 0 | 0 | 62,198 |
| 29 | Line Transformers- OH | 368 | 286,517 | Dist | 0 | 0 | 0 | 286,517 |
| 30 | Line Transformers- Radial | 368 | 90,726 | Dist | 0 | 0 | 0 | 90,726 |
| 31 | Line Transformers- Network | 368 | 42,699 | Dist | 0 | 0 | 0 | 42,699 |
| 32 | Line Transformers- URD | 368 | 48,596 | Dist | 0 | 0 | 0 | 48,596 |
| 33 | Services | 369 | 111,371 | Dist | 0 | 0 | 0 | 111,371 |
| 34 | Meters | 370 | 145,983 | Dist | 0 | 0 | 0 | 145,983 |
| 35 | Street Lighting | 373 | 43,887 | Dist | 0 | 0 | 0 | 43,887 |
| 36 | ARO- Dist Plant | ARO | 0 | Dist | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 3,236,093 |  | 0 | 0 | 961 | 3,235,132 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 407,908 | Labor | 0 | 70,763 | 62 | 337,083 |
| 41 | General Plant-EV | 390EV | 0 | EV | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 407,908 |  | 0 | 70,763 | 62 | 337,083 |
| 43 |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 5,089,918 |  | 0 | 1,143,682 | 1,047 | 3,945,189 |
| 45 |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 226,582 | Intang | 0 | 14,839 | 14 | 211,729 |
| 48 | Transmission Plant | 108.3 | 318,882 | Tran | 0 | 318,882 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 42,457 | Dist | 0 | 0 | 0 | 42,457 |
| 50 | Direct Assignment | 108.5 | 255 | Pitcairn | 0 | 0 | 255 | 0 |
| 51 | Station Equipment | 108.5 | 179,163 | Dist | 0 | 0 | 0 | 179,163 |
| 52 | Poles, Towers and Fixtures | 108.5 | 183,777 | Dist | 0 | 0 | 0 | 183,777 |
| 53 | OH Conductors and Devices | 108.5 | 175,283 | Dist | 0 | 0 | 0 | 175,283 |
| 54 | UG Conduits | 108.5 | 51,775 | Dist | 0 | 0 | 0 | 51,775 |
| 55 | UG Conductors | 108.5 | 127,615 | Dist | 0 | 0 | 0 | 127,615 |
| 56 | Line Transformers | 108.5 | 131,617 | Dist | 0 | 0 | 0 | 131,617 |
| 57 | Services | 108.5 | 33,146 | Dist | 0 | 0 | 0 | 33,146 |
| 58 | Meters | 108.5 | 31,971 | Dist | 0 | 0 | 0 | 31,971 |
| 59 | Street Lighting | 108.5 | 25,364 | Dist | 0 | 0 | 0 | 25,364 |
| 60 | EV Assets | 108EV | 0 | EV | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 165,211 | Labor | 0 | 28,661 | 25 | 136,525 |
| 62 | Depreciation Reserve | 108 | 1,693,098 |  | 0 | 362,382 | 294 | 1,330,422 |
| 63 |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 52,789 | OMxSupp | 0 | 8,242 | 8 | 44,539 |
| 66 | Cash Working Capital- Supp | 131 | 13,189 | Supp | 13,189 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 33,482 | M\&S | 0 | 7,425 | 0 | 26,057 |
| 68 | Capitalized Pension |  | 94,008 | Plant | 0 | 21,123 | 19 | 72,865 |
| 69 | Customer Deposits |  | $(11,163)$ | Dist | 0 | 0 | 0 | $(11,163)$ |
| 70 | ADIT-EV |  | 0 | EV | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | $(164,256)$ | Tran | 0 | $(164,256)$ | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(503,113)$ | PlantxTrans | 0 | 0 | (133) | $(502,980)$ |
| 73 | ADIT- General | 182 | $(26,423)$ | Labor | 0 | $(4,584)$ | (4) | $(21,835)$ |
| 74 | Other Rate Base | 131-283 | $(511,487)$ |  | 13,189 | $(132,050)$ | (110) | $(392,516)$ |
| 75 |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,885,333 |  | 13,189 | 649,250 | 643 | 2,222,251 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 205,022 | Supp | 205,022 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 12,762 | Tran | 0 | 12,762 | 0 | 0 |
| 82 | Transmission Expense |  | 217,784 |  | 205,022 | 12,762 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 9,264 | PlantxTrans | 0 | 0 | 2 | 9,262 |
| 86 | Load Dispatching | 581 | 1,035 | Dist | 0 | 0 | 0 | 1,035 |
| 87 | Station Expenses | 582 | 354 | PlantxTrans | 0 | 0 | 0 | 354 |
| 88 | OH Line Expenses | 583 | 537 | PlantxTrans | 0 | 0 | 0 | 537 |
| 89 | UG Line Expenses | 584 | 596 | PlantxTrans | 0 | 0 | 0 | 596 |
| 90 | Meter Expenses | 586 | 3,995 | PlantxTrans | 0 | 0 | 1 | 3,994 |
| 91 | Customer Installation Expenses | 587 | 2 | PlantxTrans | 0 | 0 | 0 | 2 |
| 92 | Misc. Distribution Expenses | 588 | 10,397 | PlantxTrans | 0 | 0 | 3 | 10,394 |
| 93 | Rents | 589 | 0 | PlantxTrans | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (187) | PlantxTrans | 0 | 0 | (0) | (187) |
| 95 | Maint of Structures | 591 | 98 | PlantxTrans | 0 | 0 | 0 | 98 |
| 96 | Maint of Station Equip | 592 | 2,658 | PlantxTrans | 0 | 0 | 1 | 2,657 |
| 97 | Maint of OH Lines | 593 | 24,972 | PlantxTrans | 0 | 0 | 7 | 24,965 |
| 98 | Maint of UG Lines | 594 | 2,282 | PlantxTrans | 0 | 0 | 1 | 2,281 |
| 99 | Maint of Line Transformers | 595 | 29 | PlantxTrans | 0 | 0 | 0 | 29 |
| 100 | Maint of Lighting | 596 | 546 | Dist | 0 | 0 | 0 | 546 |
| 101 | Maint of Meters | 597 | 384 | Dist | 0 | 0 | 0 | 384 |
| 102 | Maint of Misc. Plant | 599 | 76 | PlantxTrans | 0 | 0 | 0 | 76 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 57,038 |  | 0 | 0 | 15 | 57,023 |
| 104 |  |  | 57,038 |  | 0 | 0 | 15 | 57,023 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,043 | Dist | 0 | 0 | 0 | 13,043 |
| 107 | Meter Reading Exp | 902 | 335 | Dist | 0 | 0 | 0 | 335 |
| 108 | Customer Records \& Coll | 903 | 1,284 | Dist | 0 | 0 | 0 | 1,284 |
| 109 | Uncollectible Accounts | 904 | 11,947 | Dist | 0 | 0 | 0 | 11,947 |
| 110 | COVID Uncol, LPC | 904 | 0 | Dist | 0 | 0 | 0 | 0 |
| 111 | Customer Acets. Exp. | 901-905 | 26,609 |  | 0 | 0 | 0 | 26,609 |
| 112 |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | $(4,708)$ | Dist | 0 | 0 | 0 | $(4,708)$ |
| 114 | COVID Relief | 908 CV | 0 | Dist | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | $(4,708)$ |  | 0 | 0 | 0 | $(4,708)$ |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 21,901 |  | 0 | 0 | 0 | 21,901 |

## JSS / Class ACOS Study

Future Test Year
Jurisdictional Separation

| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GENERAL |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 59,612 | Labor | 0 | 10,341 | 9 | 49,262 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,764 | Dist | 0 | 0 | 0 | 2,764 |
| 121 | Office Supp \& Exp- Other | 921 | 5,894 | Labor | 0 | 1,022 | 1 | 4,871 |
| 122 | Outside Services- Cust Care | 923CC | 2,140 | Dist | 0 | 0 | 0 | 2,140 |
| 123 | Outside Services- HR | 923M | 2,079 | Labor | 0 | 361 | 0 | 1,718 |
| 124 | Outside Services- Other | 923 | 28,073 | Labor | 0 | 4,870 | 4 | 23,199 |
| 125 | Property Insurance | 924 | 6,394 | Plant | 0 | 1,437 | 1 | 4,956 |
| 126 | Injuries \& Damages | 925 | 256 | Labor | 0 | 44 | 0 | 212 |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 0 | 867 | 1 | 4,132 |
| 128 | Regulatory Commission | 928 | 813 | Dist | 0 | 0 | 0 | 813 |
| 129 | A\&G-EV | 930 EV | 0 | EV | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 36 | Dist | 0 | 0 | 0 | 36 |
| 131 | Misc. General Plant | 930.2 | 7,165 | Labor | 0 | 1,243 | 1 | 5,921 |
| 132 | General Plant Rent | 931 | 3,955 | Labor | 0 | 686 | 1 | 3,268 |
| 133 | Misc Genl Plant- Metering | 935M | 853 | Dist | 0 | 0 | 0 | 853 |
| 134 | Misc Genl Plant- Other | 935P | 11,723 | Labor | 0 | 2,034 | 2 | 9,688 |
| 135 | Admin \& Genl. Exp. | 920-932 | 136,757 |  | 0 | 22,906 | 20 | 113,831 |
| 136 |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 433,480 |  | 205,022 | 35,668 | 35 | 192,755 |
| 138 |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 19,840 | Plant | 0 | 4,458 | 4 | 15,378 |
| 141 | Intangible- Customers | 403 | 37,577 | Dist | 0 | 0 | 0 | 37,577 |
| 142 | Intangible- AMI | 403 | 10,695 | Dist | 0 | 0 | 0 | 10,695 |
| 143 | Transmission Plant | 403 | 25,520 | Tran | 0 | 25,520 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,473 | Dist | 0 | 0 | 0 | 1,473 |
| 145 | Direct assignment | 403 | 27 | Pitcairn | 0 | 0 | 27 | 0 |
| 146 | Station Equipment | 403 | 11,661 | Dist | 0 | 0 | 0 | 11,661 |
| 147 | Poles, Towers and Fixtures | 403 | 12,605 | Dist | 0 | 0 | 0 | 12,605 |
| 148 | OH Conductors and Devices | 403 | 16,168 | Dist | 0 | 0 | 0 | 16,168 |
| 149 | UG Conduits | 403 | 2,759 | Dist | 0 | 0 | 0 | 2,759 |
| 150 | UG Conductors | 403 | 12,173 | Dist | 0 | 0 | 0 | 12,173 |
| 151 | Line Transformers | 403 | 16,399 | Dist | 0 | 0 | 0 | 16,399 |
| 152 | Services | 403 | 2,205 | Dist | 0 | 0 | 0 | 2,205 |
| 153 | Meters | 403 | 10,965 | Dist | 0 | 0 | 0 | 10,965 |


| Line | Account | No. | Balance | Allocator | Supply | Transmission | Pitcairn | Distribution |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,255 | Dist | 0 | 0 | 0 | 1,255 |
| 155 | General / Common Plant | 364 | 23,853 | Labor | 0 | 4,138 | 4 | 19,711 |
| 156 | Depr / Amort-EV | 403EV | 0 | EV | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 2,439 | Tran | 0 | 2,439 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 10,056 | Dist | 0 | 0 | 0 | 10,056 |
| 159 | Depreciation Expense | 403 | 217,670 |  | 0 | 36,555 | 35 | 181,080 |
| 160 |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 8,446 | Labor | 0 | 1,465 | 1 | 6,980 |
| 164 | PURTA, Real estate | 408.16 | 1,607 | Plant | 0 | 361 | 0 | 1,246 |
| 165 | Capital stock |  | 0 | Plant | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | Plant | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 10,053 |  | 0 | 1,826 | 2 | 8,225 |
| 168 |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 49,501 | GRT_Rev | 12,913 | 9,262 | 0 | 27,326 |
| 171 | Gross Receipts Tax |  | 49,501 |  | 12,913 | 9,262 | 0 | 27,326 |
| 172 ( 10 |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 10,502 | PATax_Pres | 58 | 5,140 | (7) | 5,311 |
| 175 | Federal Income Tax Expense |  | 24,681 | FedTax_Pres | 133 | 10,471 | (17) | 14,093 |
| 176 | Income Taxes | 409-411 | 35,183 |  | 191 | 15,611 | (24) | 19,405 |
| 177 | Total Taxes | 408-411 | 94,737 |  | 13,104 | 26,699 | (23) | 54,956 |
| 178 |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 745,887 |  | 218,126 | 98,922 | 47 | 428,792 |
| 180 |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | ent Rat |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 548,551 | Dist | 0 | 0 | 0 | 548,551 |
| 183 | Transmission Revenue |  | 152,150 | Tran | 0 | 152,150 | 0 | 0 |
| 184 | POLR Revenue |  | 217,302 | Supp | 217,302 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,750 | Dist | 0 | 0 | 0 | 3,750 |
| 186 | Misc Service Revenue |  | 2,008 | Dist | 0 | 0 | 0 | 2,008 |
| 187 | Rent For Electric Property |  | 11,650 | Dist | 0 | 0 | 0 | 11,650 |
| 188 | Other Electric Revenues |  | 2,579 | Other_Rev | 1,560 | 1,019 | 0 | 0 |
| 189 | Operating Revenues |  | 937,990 |  | 218,862 | 153,169 | 0 | 565,959 |
| 190 |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 745,887 |  | 218,126 | 98,922 | 47 | 428,792 |
| 192 | V. NET INCOME at Present Rates |  | 192,103 |  | 736 | 54,247 | (47) | 137,167 |
| 193 |  |  |  |  |  |  |  |  |


| Line Account | No. | Balance | Allocator | Supply | Trans- <br> mission | Pitcairn |
| :--- | :--- | ---: | :--- | ---: | ---: | ---: |
| Distribution |  |  |  |  |  |  |

Sum
Summary of Results- Revenue requirement by rate class
Tot
Exh 6-2

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Summary of Results- Revenue requirement by rate class

| Line | Account | Balance | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Distribution Revenue | 550,379 | 292,161 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| 2 | Forfeited Discounts | 3,916 | 3,099 | 524 | 16 | 62 | 61 | 115 | 10 | 15 |
| 3 | Other Revenue | 14,087 | 7,101 | 802 | 100 | 228 | 738 | 2,001 | 81 | 179 |
| 4 | Total Revenue | 568,382 | 302,360 | 29,361 | 3,346 | 11,964 | 33,959 | 71,588 | 3,692 | 6,083 |
| 5 ( 5 - |  |  |  |  |  |  |  |  |  |  |
| 6 | Expenses | 446,456 | 246,288 | 26,536 | 2,873 | 9,582 | 24,782 | 54,913 | 2,843 | 5,014 |
| 7 | Net income | 121,926 | 56,072 | 2,825 | 473 | 2,382 | 9,177 | 16,675 | 849 | 1,069 |
| 8 |  |  |  |  |  |  |  |  |  |  |
| 9 | Rate Base | 2,276,464 | 1,037,952 | 111,433 | 14,157 | 41,591 | 132,929 | 356,346 | 15,391 | 33,545 |
| 10 |  |  |  |  |  |  |  |  |  |  |
| 11 | Return on Rate Base | 5.36\% | 5.40\% | 2.53\% | 3.34\% | 5.73\% | 6.90\% | 4.68\% | 5.5\% | 3.19\% |
| 12 | Relative Returns | 1.00 | 1.0086 | 0.47 | 0.62 | 1.07 | 1.29 | 0.87 | 1.03 | 0.60 |
| 13 | Revenue Requirement | 654,142 | 341,382 | 37,548 | 4,228 | 13,337 | 36,373 | 87,787 | 4,235 | 8,224 |
| 14 |  |  |  |  |  |  |  |  |  |  |
| 15 | Operating expenses | 190,164 | 104,073 | 12,179 | 1,225 | 3,723 | 9,785 | 24,349 | 1,134 | 2,250 |
| 16 | Uncollectibles expense | 15,437 | 12,216 | 2,064 | 63 | 244 | 239 | 453 | 39 | 58 |
| 17 | Depreciation expense | 181,309 | 100,069 | 9,790 | 1,268 | 4,396 | 10,893 | 22,200 | 1,271 | 2,080 |
| 18 | Regulatory expense | 926 | 483 | 53 | 6 | 19 | 51 | 124 | 6 | 12 |
| 19 | General tax / Other | 8,177 | 4,287 | 502 | 51 | 155 | 438 | 1,120 | 51 | 104 |
| 20 | GRT | 37,918 | 19,849 | 2,182 | 245 | 776 | 2,109 | 5,070 | 246 | 475 |
| 21 |  | 433,932 | 240,977 | 26,769 | 2,858 | 9,313 | 23,515 | 53,317 | 2,746 | 4,979 |
| 22 | Pre-tax income | 220,210 | 100,405 | 10,779 | 1,369 | 4,023 | 12,859 | 34,471 | 1,489 | 3,245 |
| 23 | Income taxes | 41,736 | 19,029 | 2,043 | 260 | 763 | 2,437 | 6,533 | 282 | 615 |
| 24 | Net income | 178,475 | 81,375 | 8,736 | 1,110 | 3,261 | 10,422 | 27,938 | 1,207 | 2,630 |
| 25 | Return on Rate Base | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% |
| 26 |  |  |  |  |  |  |  |  |  |  |
| 27 | Revenue increase (decrea: | 85,760 | 39,021 | 8,187 | 882 | 1,372 | 2,414 | 16,199 | 543 | 2,141 |
| 28 | Increase (decrease) \% | 15.09\% | 12.91\% | 27.88\% | 26.36\% | 11.47\% | 7.11\% | 22.63\% | 14.70\% | 35.20\% |

Exhibit 6-2

Sum
Summary of Results- Revenue requirement by rate class
Tot
Exh 6-2

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Summary of Results- Revenue requirement by rate class

| Line | Account | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Distribution Revenue | 550,379 | 64,408 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 2 | Forfeited Discounts | 3,916 | 9 | 0 | 0 | 0 | 0 | 4 | 2 |
| 3 | Other Revenue | 14,087 | 1,858 | 210 | 640 | 1 | 38 | 73 | 37 |
| 4 | Total Revenue | 568,382 | 66,275 | 7,402 | 19,306 | 325 | 1,530 | 10,037 | 1,153 |
| 5 |  |  |  |  |  |  |  |  |  |
| 6 | Expenses | 446,456 | 45,230 | 6,023 | 13,814 | 72 | 857 | 6,609 | 1,020 |
| 7 | Net income | 121,926 | 21,045 | 1,379 | 5,493 | 253 | 673 | 3,427 | 133 |
| 8 |  |  |  |  |  |  |  |  |  |
| 9 | Rate Base | 2,276,464 | 341,788 | 51,978 | 104,990 | 34 | 5,855 | 22,850 | 5,624 |
| 10 |  |  |  |  |  |  |  |  |  |
| 11 | Return on Rate Base | 5.36\% | 6.16\% | 2.65\% | 5.23\% | 739\% | 11.50\% | 15.00\% | 2.37\% |
| 12 | Relative Returns | 1.00 | 1.15 | 0.50 | 0.98 | 137.93 | 2.15 | 2.80 | 0.44 |
| 13 | Revenue Requirement | 654,142 | 75,565 | 11,049 | 23,357 | 18 | 1,305 | 8,165 | 1,569 |
| 14 |  |  |  |  |  |  |  |  |  |
| 15 | Operating expenses | 190,164 | 19,013 | 2,598 | 6,086 | 7 | 339 | 3,088 | 315 |
| 16 | Uncollectibles expense | 15,437 | 36 | 1 | 0 | 0 | 0 | 15 | 9 |
| 17 | Depreciation expense | 181,309 | 18,110 | 2,646 | 5,458 | 6 | 307 | 2,219 | 595 |
| 18 | Regulatory expense | 926 | 107 | 16 | 33 | 0 | 2 | 12 | 2 |
| 19 | General tax / Other | 8,177 | 887 | 125 | 280 | 0 | 16 | 150 | 12 |
| 20 | GRT | 37,918 | 4,349 | 636 | 1,343 | 1 | 75 | 471 | 91 |
| 21 |  | 433,932 | 42,503 | 6,021 | 13,201 | 15 | 739 | 5,955 | 1,025 |
| 22 | Pre-tax income | 220,210 | 33,062 | 5,028 | 10,156 | 3 | 566 | 2,210 | 544 |
| 23 | Income taxes | 41,736 | 6,266 | 953 | 1,925 | 1 | 107 | 419 | 103 |
| 24 | Net income | 178,475 | 26,796 | 4,075 | 8,231 | 3 | 459 | 1,791 | 441 |
| 25 | Return on Rate Base | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% | 7.84\% |
| 26 |  |  |  |  |  |  |  |  |  |
| 27 | Revenue increase (decrea: | 85,760 | 9,290 | 3,647 | 4,050 | (307) | (225) | $(1,871)$ | 416 |
| 28 | Increase (decrease) \% | 15.09\% | 14.02\% | 49.27\% | 21.0\% | (94.50\%) | (14.72\%) | (18.64\%) | 36.06\% |

Exhibit 6-2
Page 2 of 2

Exh 6-3

| Exh 6-3 | Account Description | Revenue requirement by rate class- Functional Classification |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| 1 | Demand-related |  |  |  |  |  |  |  |  |  |
| 2 | Primary | 320,522 | 111,977 | 14,915 | 1,792 | 3,107 | 19,405 | 63,392 | 2,112 | 5,790 |
| 3 | Secondary | 22,242 | 1,839 | 313 | 29 | 247 | 1,982 | 7,063 | 214 | 647 |
| 4 |  | 342,763 | 113,816 | 15,229 | 1,821 | 3,353 | 21,387 | 70,455 | 2,326 | 6,436 |
| 5 |  |  |  |  |  |  |  |  |  |  |
| 6 | Per kW / month-Demand |  |  |  |  |  |  |  |  |  |
| 7 | Primary | \$9.51 | \$8.10 | \$8.10 | \$8.10 | \$10.56 | \$10.60 | \$10.65 | \$10.63 | \$10.70 |
| 8 | Secondary | \$0.66 | \$0.13 | \$0.17 | \$0.13 | \$0.84 | \$1.08 | \$1.19 | \$1.07 | \$1.19 |
| 9 | Total Per kW / month-Primary Demand | \$10.17 | \$8.23 | \$8.27 | \$8.23 | \$11.40 | \$11.68 | \$11.84 | \$11.70 | \$11.89 |
| 10 |  |  |  |  |  |  |  |  |  |  |
| 11 | MWh-Meter | 12,058,025 | 3,436,013 | 398,682 | 60,061 | 100,471 | 612,074 | 2,111,922 | 58,250 | 181,082 |
| 12 | Per kWh-Meter | \$0.02843 | \$0.03312 | \$0.03820 | \$0.03033 | \$0.03338 | \$0.03494 | \$0.03336 | \$0.03993 | \$0.03554 |
| 13 |  |  |  |  |  |  |  |  |  |  |
| 14 | Customer-related |  |  |  |  |  |  |  |  |  |
| 15 | Secondary | 102,616 | 74,866 | 6,024 | 893 | 3,677 | 3,352 | 2,638 | 505 | 424 |
| 16 | Billing | 208,762 | 152,699 | 16,296 | 1,513 | 6,306 | 11,634 | 14,694 | 1,404 | 1,364 |
| 17 |  | 311,379 | 227,566 | 22,320 | 2,406 | 9,983 | 14,986 | 17,332 | 1,909 | 1,788 |
| 18 | Number of Bills | 7,252,295 | 5,952,211 | 478,910 | 71,035 | 299,232 | 242,476 | 81,264 | 30,085 | 7,699 |
| 19 |  |  |  |  |  |  |  |  |  |  |
| 20 | Per monthly bill |  |  |  |  |  |  |  |  |  |
| 21 | Secondary | \$14.15 | \$12.58 | \$12.58 | \$12.58 | \$12.29 | \$13.83 | \$32.46 | \$16.77 | \$55.02 |
| 22 | Billing | \$28.79 | \$25.65 | \$34.03 | \$21.29 | \$21.07 | \$47.98 | \$180.82 | \$46.68 | \$177.18 |
| 23 | Per bill | \$42.94 | \$38.23 | \$46.60 | \$33.87 | \$33.36 | \$61.80 | \$213.28 | \$63.45 | \$232.20 |
| 24 |  |  |  |  |  |  |  |  |  |  |
| 25 | Total revenue requirement | 654,142 | 341,382 | 37,548 | 4,228 | 13,337 | 36,373 | 87,787 | 4,235 | 8,224 |

FuncClass
Revenue req
Tot
Exh 6-3

## Duquesne Light Company

JSS / Class ACOS Study
Fully Projected Future Test Year

| , | Account Description |  |  | Rev | quirement | rate class- | ctional | cation | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Total | GL GLH |  | L | HVPS | SE | SL |  |
| 1 | Demand-related |  |  |  |  |  |  |  |  |
| 2 | Primary | 320,522 | 64,685 | 9,332 | 21,435 | 0 | 1,172 | 1,019 | 389 |
| 3 | Secondary | 22,242 | 6,865 | 1,051 | 1,728 | 0 | 131 | 105 | 27 |
| 4 |  | 342,763 | 71,550 | 10,384 | 23,164 | 0 | 1,303 | 1,123 | 416 |
| 5 |  |  |  |  |  |  |  |  |  |
| 6 | Per kW / month-Demand |  |  |  |  |  |  |  |  |
| 7 | Primary | \$9.51 | \$10.91 | \$11.66 | \$10.69 | \#DIV/0! | \$10.53 | \$10.53 | \$10.57 |
| 8 | Secondary | \$0.66 | \$1.16 | \$1.31 | \$0.86 | \#DIV/0! | \$1.18 | \$1.08 | \$0.73 |
| 9 | Total Per kW / month-Primary Demand | \$10.17 | \$12.07 | \$12.97 | \$11.55 | \#DIV/0! | \$11.71 | \$11.61 | \$11.30 |
| 10 |  |  |  |  |  |  |  |  |  |
| 11 | MWh-Meter | 12,058,025 | 2,559,511 | 314,530 | 937,897 | 1,213,147 | 24,592 | 28,667 | 21,127 |
| 12 | Per kWh-Meter | \$0.02843 | \$0.02795 | \$0.03301 | \$0.02470 | \$0.00000 | \$0.05297 | \$0.03918 | \$0.01971 |
| 13 |  |  |  |  |  |  |  |  |  |
| 14 | Customer-related |  |  |  |  |  |  |  |  |
| 15 | Secondary | 102,616 | 2,150 | 445 | 42 | 0 | 0 | 6,930 | 670 |
| 16 | Billing | 208,762 | 1,865 | 220 | 151 | 18 | 2 | 113 | 483 |
| 17 |  | 311,379 | 4,015 | 666 | 193 | 18 | 2 | 7,042 | 1,153 |
| 18 | Number of Bills | 7,252,295 | 8,837 | 1,057 | 241 | 108 | 12 | 11,568 | 67,561 |
| 19 |  |  |  |  |  |  |  |  |  |
| 20 | Per monthly bill |  |  |  |  |  |  |  |  |
| 21 | Secondary | \$14.15 | \$243.35 | \$421.40 | \$173.40 | \$0.52 | \$9.88 | \$599.03 | \$9.92 |
| 22 | Billing | \$28.79 | \$211.01 | \$208.55 | \$628.76 | \$164.98 | \$171.65 | \$9.74 | \$7.15 |
| 23 | Per bill | \$42.94 | \$454.35 | \$629.96 | \$802.16 | \$165.49 | \$181.53 | \$608.77 | \$17.07 |
| 24 |  |  |  |  |  |  |  |  |  |
| 25 | Total revenue requirement | 654,142 | 75,565 | 11,049 | 23,357 | 18 | 1,305 | 8,165 | 1,569 |

Cust-Sum
Customer-Related Costs- Summary
Cust
Exh 6-4

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year Customer-Related Costs- Summary

|  | Account Description | Acco unt | Rate RS | Rate GS | Rate GM<25 | Rate GM>25 | Rate GMH | Rate L |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Plant in service |  | 228,030 | 11,769 | 29,623 | 28,723 | 5,980 |  |
| 2 | Accum. depreciation |  | $(56,117)$ | $(2,890)$ | $(7,154)$ | $(7,408)$ | $(1,486)$ | (47) |
| 3 | Net plant |  | 171,913 | 8,878 | 22,469 | 21,315 | 4,495 | 195 |
| 4 | ADIT |  | $(24,694)$ | $(1,223)$ | $(2,813)$ | $(3,296)$ | (627) | (21) |
| 5 | Other rate base |  | 6,187 | 240 | 599 | 714 | 137 | 4 |
| 6 | Rate base |  | 153,406 | 7,896 | 20,255 | 18,733 | 4,004 | 178 |
| 7 |  |  |  |  |  |  |  |  |
| 8 | Return on rate base | 7.84\% | 12,027 | 619 | 1,588 | 1,469 | 314 | 14 |
| 9 | Income tax gross-up |  | 2,812 | 145 | 371 | 343 | 73 | 3 |
| 10 | Return component |  | 14,840 | 764 | 1,959 | 1,812 | 387 | 17 |
| 11 |  |  |  |  |  |  |  |  |
| 12 | Meter operating |  | 2,048 | 106 | 445 | 983 | 137 | 6 |
| 13 | Meter maintenance |  | 198 | 10 | 43 | 95 | 13 | 1 |
| 14 | Customer records- Supervision |  | 10,554 | 353 | 306 | 281 | 76 | 0 |
| 15 | Meter reading expenses |  | 276 | 14 | 13 | 4 | 2 | 0 |
| 16 | Customer records and collection |  | 984 | 33 | 28 | 26 | 7 | 0 |
| 17 | Customer assistance |  | 135 | 7 | 6 | 2 | 1 | 0 |
| 18 | Customer costs Acct 920/921 |  | 2,403 | 121 | 98 | 33 | 15 | 0 |
| 19 | Customer costs Acct 923 |  | 1,655 | 83 | 67 | 23 | 11 | 0 |
| 20 | Maint. general plant- Meters |  | 507 | 26 | 92 | 122 | 21 | 1 |
| 21 | Services depreciation expense |  | 1,977 | 101 | 93 | 31 | 14 | 0 |
| 22 | Meters depreciation expense |  | 6,464 | 335 | 1,170 | 1,552 | 271 | 10 |
| 23 | AMI amortization |  | 6,427 | 333 | 1,316 | 761 | 218 | 5 |
| 24 | Other Intangible amortization |  | 28,139 | 1,415 | 1,146 | 384 | 142 | 1 |
| 25 | A\&G based on Direct labor |  | 26,102 | 976 | 1,774 | 3,140 | 511 | 18 |
| 26 | Other expenses |  | 0 | 0 | 0 | 0 | 0 | 0 |
| 27 | Expense component |  | 87,869 | 3,913 | 6,597 | 7,439 | 1,441 | 43 |
| 28 | GRT on Return plus Expense |  | 6,340 | 289 | 527 | 567 | 112 | 4 |
| 29 | Customer-charge total |  | 109,049 | 4,966 | 9,083 | 9,818 | 1,940 | 63 |
| 30 Totals from Schedules |  |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  | \$18.32 | \$16.60 | \$37.46 | \$120.81 | \$51.36 | \$263.56 |
| 32 | Annual Blls |  | 5,952,211 | 299,232 | 242,476 | 81,264 | 37,783 | 241 |

Cust-RS
Customer-Related Costs- RS
Cust
Exh 6-4A

| Exh 6-4 | Account Description | Account | Total | Meters | Customer-Related Costs- RS |  |  | Total <br> Direct | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Services | AMI | Expenses |  |  |  |
| 1 | Plant in service |  | 1,887,228 | 92,079 | 94,584 | 41,367 |  | 228,030 |  |  |
| 2 | Accum. depreciation |  | $(687,125)$ | $(26,135)$ | $(23,555)$ | $(6,427)$ |  | $(56,117)$ |  |  |
| 3 | Net plant |  | 1,200,103 | 65,944 | 71,029 | 34,940 | - | 171,913 |  |  |
| 4 | ADIT |  | $(216,358)$ | $(11,889)$ | $(12,805)$ |  |  | $(24,694)$ |  |  |
| 5 | Other rate base |  | 54,208 | 2,979 | 3,208 |  |  | 6,187 |  |  |
| 6 | Rate base |  | 1,037,952 | 57,034 | 61,432 | 34,940 | - | 153,406 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base | 7.84\% | 81,375 | 4,471 | 4,816 | 2,739 | - | 12,027 |  |  |
| 9 | Income tax gross-up | 23.38\% | 19,029 | 1,046 | 1,126 | 641 | - | 2,812 |  |  |
| 10 | Return component |  | 100,405 | 5,517 | 5,943 | 3,380 | - | 14,840 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating |  | 2,048 | 2,048 |  |  |  | 2,048 | 99.8\% | 2,043 |
| 13 | Meter maintenance |  | 198 | 198 |  |  |  | 198 | 99.7\% | 197 |
| 14 | Customer records- Supervision |  | 10,554 |  |  |  | 10,554 | 10,554 | 79.5\% | 8,391 |
| 15 | Meter reading expenses |  | 276 | 276 |  |  |  | 276 | - | 0 |
| 16 | Customer records and collection |  | 984 |  |  |  | 984 | 984 | 9.5\% | 94 |
| 17 | Customer assistance |  | 135 |  |  |  | 135 | 135 | 41.2\% | 56 |
| 18 | Customer costs Acct 920/921 |  | 2,403 |  |  |  | 2,403 | 2,403 | 0.0\% | 1 |
| 19 | Customer costs Acct 923 |  | 1,655 |  |  |  | 1,655 | 1,655 | 3.2\% | 53 |
| 20 | Maint. general plant- Meters |  | 507 | 507 |  |  |  | 507 | - | 0 |
| 21 | Services depreciation expense |  | 1,977 |  | 1,977 |  |  | 1,977 |  |  |
| 22 | Meters depreciation expense |  | 6,464 | 6,464 |  |  |  | 6,464 |  |  |
| 23 | AMI amortization |  | 6,427 |  |  | 6,427 |  | 6,427 |  |  |
| 24 | Other Intangible amortization |  | 28,139 |  |  | 28,139 |  | 28,139 |  |  |
| 25 | A\&G based on Direct labor |  | 26,102 | 5,397 | 0 | 0 | 20,705 | 26,102 |  |  |
| 26 | All other expenses |  | 133,259 |  |  |  |  | - |  |  |
| 27 | Expense component |  | 221,128 | 14,890 | 1,977 | 34,566 | 36,437 | 87,869 |  | 10,834 |
| 28 | GRT on Return plus Expense | 6.17\% | 19,849 | 1,260 | 489 | 2,342 | 2,249 | 6,340 |  |  |
| 29 | Customer-charge total |  | 341,382 | 21,666 | 8,408 | 40,288 | 38,686 | 109,049 |  |  |
| 30 | Totals from Schedules |  | 341,382 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  |  | \$3.64 | \$1.41 | \$6.77 | \$6.50 | \$18.32 |  |  |
| 32 | Annual Bills |  | 5,952,211 |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct la | abor |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above |  | 10,834 | 2,240 | 0 | 0 | 8,594 | 10,834 |  |  |
| 35 | Total Direct labor costs |  | 22,029 |  |  |  |  |  |  |  |
| 36 | \% Direct labor |  | 49.2\% |  |  |  |  |  |  |  |
| 37 ( 37 |  |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other | 920/921 | 30,816 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax | 926/935P | 5,927 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant |  | 11,247 |  |  |  |  |  |  |  |
| 41 | Maint General Plant | 408 | 5,085 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor |  | 53,076 | 20.7\% | 0.0\% | 0.0\% | 79.3\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct 1 | abor | 26,102 | 5,397 | 0 | 0 | 20,705 | 10,781 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |  |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Customer-Related Costs- RS
bor \$

Cust-GS
Customer-Related Costs- GS
Cust
Exh 6-4B

| Exh 6-4 | Account Description | Account | Total | Meters | Customer-Related Costs- GS |  |  | Total <br> Direct | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Services | AMI | Expenses |  |  |  |
| 1 | Plant in service |  | 76,079 | 4,773 | 4,828 | 2,167 |  | 11,769 |  |  |
| 2 | Accum. depreciation |  | $(27,746)$ | $(1,355)$ | $(1,202)$ | (333) |  | $(2,890)$ |  |  |
| 3 | Net plant |  | 48,333 | 3,418 | 3,626 | 1,834 | - | 8,878 |  |  |
| 4 | ADIT |  | $(8,391)$ | (593) | (629) |  |  | $(1,223)$ |  |  |
| 5 | Other rate base |  | 1,649 | 117 | 124 |  |  | 240 |  |  |
| 6 | Rate base |  | 41,591 | 2,942 | 3,120 | 1,834 | - | 7,896 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base | 7.84\% | 3,261 | 231 | 245 | 144 | - | 619 |  |  |
| 9 | Income tax gross-up | 23.38\% | 763 | 54 | 57 | 34 | - | 145 |  |  |
| 10 | Return component |  | 4,023 | 285 | 302 | 177 | - | 764 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating |  | 106 | 106 |  |  |  | 106 | 99.8\% | 106 |
| 13 | Meter maintenance |  | 10 | 10 |  |  |  | 10 | 99.7\% | 10 |
| 14 | Customer records- Supervision |  | 353 |  |  |  | 353 | 353 | 79.5\% | 280 |
| 15 | Meter reading expenses |  | 14 | 14 |  |  |  | 14 | - | 0 |
| 16 | Customer records and collection |  | 33 |  |  |  | 33 | 33 | 9.5\% | 3 |
| 17 | Customer assistance |  | 7 |  |  |  | 7 | 7 | 41.2\% | 3 |
| 18 | Customer costs Acct 920/921 |  | 121 |  |  |  | 121 | 121 | 0.0\% | 0 |
| 19 | Customer costs Acct 923 |  | 83 |  |  |  | 83 | 83 | 3.2\% | 3 |
| 20 | Maint. general plant- Meters |  | 26 | 26 |  |  |  | 26 | - | 0 |
| 21 | Services depreciation expense |  | 101 |  | 101 |  |  | 101 |  |  |
| 22 | Meters depreciation expense |  | 335 | 335 |  |  |  | 335 |  |  |
| 23 | AMI amortization |  | 333 |  |  | 333 |  | 333 |  |  |
| 24 | Other Intangible amortization |  | 1,415 |  |  | 1,415 |  | 1,415 |  |  |
| 25 | A\&G based on Direct labor |  | 976 | 280 | 0 | 0 | 696 | 976 |  |  |
| 26 | All other expenses |  | 4,624 |  |  |  |  | - |  |  |
| 27 | Expense component |  | 8,537 | 772 | 101 | 1,748 | 1,293 | 3,913 |  | 405 |
| 28 | GRT on Return plus Expense | 6.18\% | 776 | 65 | 25 | 119 | 80 | 289 |  |  |
| 29 | Customer-charge total |  | 13,337 | 1,122 | 428 | 2,044 | 1,373 | 4,966 |  |  |
| 30 | Totals from Schedules |  | 13,337 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  |  | \$3.75 | \$1.43 | \$6.83 | \$4.59 | \$16.60 |  |  |
| 32 | Annual Bills |  | 299,232 |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct la | abor |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above |  | 405 | 116 | 0 | 0 | 289 | 405 |  |  |
| 35 | Total Direct labor costs |  | 785 |  |  |  |  |  |  |  |
| 36 | \% Direct labor |  | 51.6\% |  |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other | 920/921 | 1,098 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax | 926/935P | 211 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant |  | 401 |  |  |  |  |  |  |  |
| 41 | Maint General Plant | 408 | 181 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor |  | 1,891 | 28.7\% | 0.0\% | 0.0\% | 71.3\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct la | abor | 976 | 280 | 0 | 0 | 696 | 402 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |  |

Cust-GM<25
Customer-Related Costs- GM<25
Cust
Exh 6-4C

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Fully Projected Future Test Year
Customer-Related Costs- GM<25

|  | Account Description Account | Total | Meters | Services | AMI | Expenses | Total <br> Direct | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Plant in service | 236,407 | 16,665 | 4,446 | 8,512 |  | 29,623 |  |  |
| 2 | Accum. depreciation | $(80,944)$ | $(4,730)$ | $(1,107)$ | $(1,316)$ |  | $(7,154)$ |  |  |
| 3 | Net plant | 155,463 | 11,935 | 3,339 | 7,195 | - | 22,469 |  |  |
| 4 | ADIT | $(28,630)$ | $(2,198)$ | (615) |  |  | $(2,813)$ |  |  |
| 5 | Other rate base | 6,096 | 468 | 131 |  |  | 599 |  |  |
| 6 | Rate base | 132,929 | 10,205 | 2,855 | 7,195 | - | 20,255 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base $7.84 \%$ | 10,422 | 800 | 224 | 564 | - | 1,588 |  |  |
| 9 | Income tax gross-up 23.38\% | 2,437 | 187 | 52 | 132 | - | 371 |  |  |
| 10 | Return component | 12,859 | 987 | 276 | 696 | - | 1,959 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating | 445 | 445 |  |  |  | 445 | 99.8\% | 444 |
| 13 | Meter maintenance | 43 | 43 |  |  |  | 43 | 99.7\% | 43 |
| 14 | Customer records- Supervision | 306 |  |  |  | 306 | 306 | 79.5\% | 243 |
| 15 | Meter reading expenses | 13 | 13 |  |  |  | 13 | - | 0 |
| 16 | Customer records and collection | 28 |  |  |  | 28 | 28 | 9.5\% | 3 |
| 17 | Customer assistance | 6 |  |  |  | 6 | 6 | 41.2\% | 2 |
| 18 | Customer costs Acct 920/921 | 98 |  |  |  | 98 | 98 | 0.0\% | 0 |
| 19 | Customer costs Acct 923 | 67 |  |  |  | 67 | 67 | 3.2\% | 2 |
| 20 | Maint. general plant- Meters | 92 | 92 |  |  |  | 92 | - | 0 |
| 21 | Services depreciation expense | 93 |  | 93 |  |  | 93 |  |  |
| 22 | Meters depreciation expense | 1,170 | 1,170 |  |  |  | 1,170 |  |  |
| 23 | AMI amortization | 1,316 |  |  | 1,316 |  | 1,316 |  |  |
| 24 | Other Intangible amortization | 1,146 |  |  | 1,146 |  | 1,146 |  |  |
| 25 | A\&G based on Direct labor | 1,774 | 1,172 | 0 | 0 | 602 | 1,774 |  |  |
| 26 | All other expenses | 14,809 |  |  |  |  | - |  |  |
| 27 | Expense component | 21,406 | 2,935 | 93 | 2,463 | 1,107 | 6,597 |  | 737 |
| 28 | GRT on Return plus Expense 6.15\% | 2,109 | 241 | 23 | 194 | 68 | 527 |  |  |
| 29 | Customer-charge total | 36,373 | 4,163 | 392 | 3,353 | 1,175 | 9,083 |  |  |
| 30 | Totals from Schedules | 36,373 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  | \$17.17 | \$1.62 | \$13.83 | \$4.85 | \$37.46 |  |  |
| 32 | Annual Bills | 242,476 |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct labor |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above | 737 | 486 | 0 | 0 | 250 | 737 |  |  |
| 35 | Total Direct labor costs | 2,151 |  |  |  |  |  |  |  |
| 36 | \% Direct labor | 34.2\% |  |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other 920/921 | 3,009 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax 926/935P | 579 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant | 1,098 |  |  |  |  |  |  |  |
| 41 | Maint General Plant 408 | 497 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor | 5,183 | 66.1\% | 0.0\% | 0.0\% | 33.9\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct labor | 1,774 | 1,172 | 0 | 0 | 602 | 734 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |

Cust-GM>25
Customer-Related Costs- GM>25
Cust
Exh 6-4D

| Exh 6-4 | Account Description | Account | Total | Customer-Related Costs- GM>25 |  |  |  |  | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | Meters | Services | AMI | Expenses | Total Direct |  |  |
| 1 | Plant in service |  | 623,712 | 22,109 | 1,490 | 5,123 |  | 28,723 |  |  |
| 2 | Accum. depreciation |  | $(203,334)$ | $(6,275)$ | (371) | (761) |  | $(7,408)$ |  |  |
| 3 | Net plant |  | 420,378 | 15,834 | 1,119 | 4,362 | - | 21,315 |  |  |
| 4 | ADIT |  | $(81,726)$ | $(3,078)$ | (218) |  |  | $(3,296)$ |  |  |
| 5 | Other rate base |  | 17,694 | 666 | 47 |  |  | 714 |  |  |
| 6 | Rate base |  | 356,346 | 13,422 | 949 | 4,362 | - | 18,733 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base | 7.84\% | 27,938 | 1,052 | 74 | 342 | - | 1,469 |  |  |
| 9 | Income tax gross-up | 23.38\% | 6,533 | 246 | 17 | 80 | - | 343 |  |  |
| 10 | Return component |  | 34,471 | 1,298 | 92 | 422 | - | 1,812 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating |  | 983 | 983 |  |  |  | 983 | 99.8\% | 981 |
| 13 | Meter maintenance |  | 95 | 95 |  |  |  | 95 | 99.7\% | 95 |
| 14 | Customer records- Supervision |  | 281 |  |  |  | 281 | 281 | 79.5\% | 224 |
| 15 | Meter reading expenses |  | 4 | 4 |  |  |  | 4 | - | 0 |
| 16 | Customer records and collection |  | 26 |  |  |  | 26 | 26 | 9.5\% | 3 |
| 17 | Customer assistance |  | 2 |  |  |  | 2 | 2 | 41.2\% | 1 |
| 18 | Customer costs Acct 920/921 |  | 33 |  |  |  | 33 | 33 | 0.0\% | 0 |
| 19 | Customer costs Acct 923 |  | 23 |  |  |  | 23 | 23 | 3.2\% | 1 |
| 20 | Maint. general plant- Meters |  | 122 | 122 |  |  |  | 122 | - | 0 |
| 21 | Services depreciation expense |  | 31 |  | 31 |  |  | 31 |  |  |
| 22 | Meters depreciation expense |  | 1,552 | 1,552 |  |  |  | 1,552 |  |  |
| 23 | AMI amortization |  | 761 |  |  | 761 |  | 761 |  |  |
| 24 | Other Intangible amortization |  | 384 |  |  | 384 |  | 384 |  |  |
| 25 | A\&G based on Direct labor |  | 3,140 | 2,592 | 0 | 0 | 549 | 3,140 |  |  |
| 26 | All other expenses |  | 40,808 |  |  |  |  | - |  |  |
| 27 | Expense component |  | 48,246 | 5,348 | 31 | 1,145 | 914 | 7,439 |  | 1,303 |
| 28 | GRT on Return plus Expense | 6.13\% | 5,070 | 407 | 8 | 96 | 56 | 567 |  |  |
| 29 | Customer-charge total |  | 87,787 | 7,054 | 130 | 1,663 | 970 | 9,818 |  |  |
| 30 | Totals from Schedules |  | 87,787 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  | 81,264 | \$86.81 | \$1.61 | \$20.47 | \$11.93 | \$120.81 |  |  |
| 32 | Annual Bills |  |  |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct labor |  |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above |  | 1,303 | 1,076 | 0 | 0 | 228 | 1,303 |  |  |
| 35 | Total Direct labor costs |  | 5,445 |  |  |  |  |  |  |  |
| 36 | \% Direct labor |  | 23.9\% |  |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other | 920/921 | 7,616 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax | 926/935P | 1,465 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant |  | 2,780 |  |  |  |  |  |  |  |
| 41 | Maint General Plant | 408 | 1,257 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor |  | 13,118 | 82.5\% | 0.0\% | 0.0\% | 17.5\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct la | abor | 3,140 | 2,592 | 0 | 0 | 549 | 1,303 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |  |

Cust-GMH
Customer-Related Costs- GMH
Cust
Exh 6-4E

| Exh 6-4 | Account Description | Account | Total | Meters | Customer-Related Costs- GMH |  |  | Total Direct | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Services | AMI | Expenses |  |  |  |
| 1 | Plant in service |  | 85,898 | 3,858 | 693 | 1,430 |  | 5,980 |  |  |
| 2 | Accum. depreciation |  | $(28,361)$ | $(1,095)$ | (173) | (218) |  | $(1,486)$ |  |  |
| 3 | Net plant |  | 57,537 | 2,763 | 520 | 1,212 | - | 4,495 |  |  |
| 4 | ADIT |  | $(10,994)$ | (528) | (99) |  |  | (627) |  |  |
| 5 | Other rate base |  | 2,393 | 115 | 22 |  |  | 137 |  |  |
| 6 | Rate base |  | 48,936 | 2,350 | 443 | 1,212 | - | 4,004 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base | 7.84\% | 3,837 | 184 | 35 | 95 | - | 314 |  |  |
| 9 | Income tax gross-up | 23.38\% | 897 | 43 | 8 | 22 | - | 73 |  |  |
| 10 | Return component |  | 4,734 | 227 | 43 | 117 | - | 387 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating |  | 137 | 137 |  |  |  | 137 | 99.8\% | 137 |
| 13 | Meter maintenance |  | 13 | 13 |  |  |  | 13 | 99.7\% | 13 |
| 14 | Customer records- Supervision |  | 76 |  |  |  | 76 | 76 | 79.5\% | 61 |
| 15 | Meter reading expenses |  | 2 | 2 |  |  |  | 2 | - | 0 |
| 16 | Customer records and collection |  | 7 |  |  |  | 7 | 7 | 9.5\% | 1 |
| 17 | Customer assistance |  | 1 |  |  |  | 1 | 1 | 41.2\% | 0 |
| 18 | Customer costs Acct 920/921 |  | 15 |  |  |  | 15 | 15 | 0.0\% | 0 |
| 19 | Customer costs Acct 923 |  | 11 |  |  |  | 11 | 11 | 3.2\% | 0 |
| 20 | Maint. general plant- Meters |  | 21 | 21 |  |  |  | 21 | - | 0 |
| 21 | Services depreciation expense |  | 14 |  | 14 |  |  | 14 |  |  |
| 22 | Meters depreciation expense |  | 271 | 271 |  |  |  | 271 |  |  |
| 23 | AMI amortization |  | 218 |  |  | 218 |  | 218 |  |  |
| 24 | Other Intangible amortization |  | 142 |  |  | 142 |  | 142 |  |  |
| 25 | A\&G based on Direct labor |  | 511 | 362 | 0 | 0 | 149 | 511 |  |  |
| 26 | All other expenses |  | 5,564 |  |  |  |  | - |  |  |
| 27 | Expense component |  | 7,005 | 807 | 14 | 360 | 259 | 1,441 |  | 212 |
| 28 | GRT on Return plus Expense | 6.14\% | 721 | 64 | 4 | 29 | 16 | 112 |  |  |
| 29 | Customer-charge total |  | 12,459 | 1,098 | 61 | 507 | 275 | 1,940 |  |  |
| 30 | Totals from Schedules |  | 12,459 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  | 37,783 | \$29.06 | \$1.61 | \$13.42 | \$7.27 | \$51.36 |  |  |
| 32 | Annual Bills |  |  |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct labor |  |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above |  | 212 | 150 | 0 | 0 | 62 | 212 |  |  |
| 35 | Total Direct labor costs |  | 753 |  |  |  |  |  |  |  |
| 36 | \% Direct labor |  | 28.2\% |  |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other | 920/921 | 1,053 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax | 926/935P | 203 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant |  | 384 |  |  |  |  |  |  |  |
| 41 | Maint General Plant | 408 | 174 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor |  | 1,814 | 70.9\% | 0.0\% | 0.0\% | 29.1\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct la | abor | 511 | 362 | 0 | 0 | 149 | 212 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |  |

Customer-Related Costs- L
Cust
Exh 6-4F

|  | Account Description Account | Total | Meters | Services | AMI | Expenses | Total Direct | Labor portion | Labor \$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Plant in service | 184,070 | 146 | - | 95 |  | 241 |  |  |
| 2 | Accum. depreciation | $(59,369)$ | (41) | - | (5) |  | (47) |  |  |
| 3 | Net plant | 124,701 | 105 | - | 90 | - | 195 |  |  |
| 4 | ADIT | $(24,970)$ | (21) | - |  |  | (21) |  |  |
| 5 | Other rate base | 5,259 | 4 | - |  |  | 4 |  |  |
| 6 | Rate base | 104,990 | 88 | - | 90 | - | 178 |  |  |
| 7 |  |  |  |  |  |  |  |  |  |
| 8 | Return on rate base $7.84 \%$ | 8,231 | 7 | - | 7 | - | 14 |  |  |
| 9 | Income tax gross-up 23.38\% | 1,925 | 2 | - | 2 | - | 3 |  |  |
| 10 | Return component | 10,156 | 9 | - | 9 | - | 17 |  |  |
| 11 |  |  |  |  |  |  |  |  |  |
| 12 | Meter operating | 6 | 6 |  |  |  | 6 | 99.8\% | 6 |
| 13 | Meter maintenance | 1 | 1 |  |  |  | 1 | 99.7\% | 1 |
| 14 | Customer records- Supervision | 0 |  |  |  | 0 | 0 | 79.5\% | 0 |
| 15 | Meter reading expenses | 0 | 0 |  |  |  | 0 | - | 0 |
| 16 | Customer records and collection | 0 |  |  |  | 0 | 0 | 9.5\% | 0 |
| 17 | Customer assistance | 0 |  |  |  | 0 | 0 | 41.2\% | 0 |
| 18 | Customer costs Acct 920/921 | 0 |  |  |  | 0 | 0 | 0.0\% | 0 |
| 19 | Customer costs Acct 923 | 0 |  |  |  | 0 | 0 |  |  |
| 20 | Maint. general plant- Meters | 1 | 1 |  |  |  | 1 |  |  |
| 21 | Services depreciation expense | - |  | 0 |  |  | - |  |  |
| 22 | Meters depreciation expense | 10 | 10 |  |  |  | 10 |  |  |
| 23 | AMI amortization | 5 |  |  | 5 |  | 5 |  |  |
| 24 | Other Intangible amortization | 1 |  |  | 1 |  | 1 |  |  |
| 25 | A\&G based on Direct labor | 18 | 17 | 0 | 0 | 1 | 18 |  |  |
| 26 | All other expenses | 11,815 |  |  |  |  | - |  |  |
| 27 | Expense component | 11,858 | 35 | 0 | 6 | 1 | 43 |  | 7 |
| 28 | GRT on Return plus Expense $6.10 \%$ | 1,343 | 3 | - | 1 | 0 | 4 |  |  |
| 29 | Customer-charge total | 23,357 | 47 | 0 | 16 | 1 | 63 |  |  |
| 30 | Totals from Schedules | 23,357 |  |  |  |  |  |  |  |
| 31 | Customer-charge costs |  | \$193.46 | \$0.00 | \$65.71 | \$4.39 | \$263.56 |  |  |
| 32 | Annual Bills | 241 |  |  |  |  |  |  |  |
| 33 | A\&G allocated based on Direct labor |  |  |  |  |  |  |  |  |
| 34 | Direct labor costs included above | 7 | 7 | 0 | 0 | 0 | 7 |  |  |
| 35 | Total Direct labor costs | 1,322 |  |  |  |  |  |  |  |
| 36 | \% Direct labor | 0.6\% |  |  |  |  |  |  |  |
| 37 |  |  |  |  |  |  |  |  |  |
| 38 | A\&G Salaries / Off Supp-Other 920/921 | 1,849 |  |  |  |  |  |  |  |
| 39 | Employee benefits/ PR Tax 926/935P | 356 |  |  |  |  |  |  |  |
| 40 | Depreciation exp.- General plant | 675 |  |  |  |  |  |  |  |
| 41 | Maint General Plant 408 | 305 |  |  |  |  |  |  |  |
| 42 | A\&G related to Direct labor | 3,185 | 97.0\% | 0.0\% | 0.0\% | 3.0\% | 100.0\% |  |  |
| 43 | A\&G allocated based on Direct labor | 18 | 17 | 0 | 0 | 1 | 0 |  |  |
| 44 |  |  |  |  |  |  |  |  |  |

Xfmr
Transformer Costs
Cust
Exh 6-4G


Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Functionalization

| Line | Account | No. | Balance | Allocator | Primary | Secondary | Billing | Labor \$ | Labor \% |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 82 | Plant | 50 | 21 | 12 | - |  |
| 4 | SW- Plant/ OM | 303 P | 0 | Plant | 0 | 0 | 0 | - |  |
| 5 | SW- Customer-related | 303C | 219,001 | Bill | 0 | 0 | 219,001 | - |  |
| 6 | SW- Labor-related | 303L | 0 | Labor | 0 | 0 | 0 | - |  |
| 7 | SW- AMI | 303AMI | 62,331 | Bill | 0 | 0 | 62,331 | - |  |
| 8 | Software- RB / CIP/Cyber | 303 F | 88,984 | DistPt | 59,731 | 25,257 | 3,996 | - |  |
| 9 | Intangible Plant |  | 370,398 |  | 59,781 | 25,277 | 285,340 | - |  |
| 10 |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  | - |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | - |  |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | - |  |
| 14 |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | Prim | 23,190 | 0 | 0 | - |  |
| 17 | Structures and Improvements | 361 | 71,327 | Prim | 71,327 | 0 | 0 | - |  |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | - |  |
| 19 | Station Equipment | 362 | 523,748 | Prim | 523,748 | 0 | 0 | - |  |
| 20 | Station Equipment- Network | 362 | 13,188 | Prim | 13,188 | 0 | 0 | - |  |
| 21 | Poles, Towers and Fixtures | 364 | 624,016 | OH_Cond | 496,856 | 127,160 | 0 | - |  |
| 22 | OH Conductors and Devices | 365 | 629,457 | OH_Cond | 501,188 | 128,269 | 0 | - |  |
| 23 | UG Conduits- Radial | 366 | 157,950 | UG_Radial | 141,161 | 16,789 | 0 | - |  |
| 24 | UG Conduits- Network | 366 | 30,713 | UG_Network | 26,093 | 4,620 | 0 | - |  |
| 25 | UG Conduits- URD | 366 | 30,713 | UG_URD | 26,114 | 4,599 | 0 | - |  |
| 26 | UG Conductors- Radial | 367 | 331,382 | UG_Radial | 296,157 | 35,225 | 0 | - |  |
| 27 | UG Conductors- Network | 367 | 64,435 | UG_Network | 54,742 | 9,693 | 0 | - |  |
| 28 | UG Conductors- URD | 367 | 64,435 | UG_URD | 54,786 | 9,649 | 0 | - |  |
| 29 | Line Transformers- OH | 368 | 300,124 | LTrans_OH | 31,045 | 269,079 | 0 | - |  |
| 30 | Line Transformers- Radial | 368 | 95,034 | LTrans_Rad | 0 | 95,034 | 0 | - |  |
| 31 | Line Transformers- Network | 368 | 44,726 | LTrans_Net | 0 | 44,726 | 0 | - |  |
| 32 | Line Transformers- URD | 368 | 50,903 | LTrans_URD | 0 | 50,903 | 0 | - |  |
| 33 | Services | 369 | 114,962 | Sec | 0 | 114,962 | 0 | - |  |
| 34 | Meters | 370 | 151,169 | Bill | 0 | 0 | 151,169 | - |  |
| 35 | Street Lighting | 373 | 44,730 | Sec | 0 | 44,730 | 0 | - |  |
| 36 | ARO- Dist Plant | ARO | 0 | DistPt | 0 | 0 | 0 | - |  |
| 37 | Distribution Plant | 360-373 | 3,366,202 |  | 2,259,595 | 955,438 | 151,169 | - |  |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Functionalization


Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Functionalization

| Line | Account | No. | Balance | Allocator | Primary | Secondary | Billing |  | Labor \$ | Labor \% |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | - | 0 | 0.0\% |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | - | 8,606 | 0.0\% |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 |  |  |  |
| 83 |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 9,222 | D-Labor-Op | 4,710 | 1,432 | 3,080 | - | 2,979 | 32.3\% |
| 86 | Load Dispatching | 581 | 1,050 | Prim | 1,050 | 0 | 0 | - | 1,050 | 100.0\% |
| 87 | Station Expenses | 582 | 352 | Prim | 352 | 0 | 0 | - | 289 | 82.1\% |
| 88 | OH Line Expenses | 583 | 544 | OH_Cond | 433 | 111 | 0 | - | 519 | 95.4\% |
| 89 | UG Line Expenses | 584 | 607 | UG_Total | 535 | 72 | 0 | - | 600 | 98.9\% |
| 90 | Meter Expenses | 586 | 4,051 | Bill | 0 | 0 | 4,051 | - | 4,041 | 99.8\% |
| 91 | Customer Installation Expenses | 587 | 2 | Bill | 0 | 0 | 2 | - | 3 | 150.0\% |
| 92 | Misc. Distribution Expenses | 588 | 10,295 | DistPt | 6,911 | 2,922 | 462 | - | 6,478 | 62.9\% |
| 93 | Rents | 589 | 0 | DistPt | 0 | 0 | 0 | - | 0 | 0.0\% |
| 94 | Maint Supv \& Engineering | 590 | (190) | D-Labor-Mnt | (149) | (36) | (5) | - | 144 | -75.8\% |
| 95 | Maint of Structures | 591 | 99 | Prim | 99 | 0 | 0 | - | 99 | 100.0\% |
| 96 | Maint of Station Equip | 592 | 2,659 | Prim | 2,659 | 0 | 0 | - | 2,169 | 81.6\% |
| 97 | Maint of OH Lines | 593 | 23,720 | OH_Cond | 18,886 | 4,834 | 0 | - | 9,524 | 40.2\% |
| 98 | Maint of UG Lines | 594 | 2,242 | UG_Total | 1,977 | 266 | 0 | - | 1,583 | 70.6\% |
| 99 | Maint of Line Transformers | 595 | 29 | LTrans_Tot | 2 | 27 | 0 | - | 20 | 69.0\% |
| 100 | Maint of Lighting | 596 | 555 | Sec | 0 | 555 | 0 | - | 548 | 98.7\% |
| 101 | Maint of Meters | 597 | 391 | Bill | 0 | 0 | 391 | - | 390 | 99.7\% |
| 102 | Maint of Misc. Plant | 599 | 74 | DistPt | 50 | 21 | 3 | - | 0 | 0.0\% |
| 103 | Oper. \& Maint. Exp. | 500-599 | 55,702 |  | 37,514 | 10,204 | 7,984 | - | 30,436 |  |
| 104 |  |  | 55,702 |  | 37,514 | 10,204 | 7,984 | - |  |  |
| 105 | D. CUSTOMER ACCOUNTS AND | ERVICE |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,049 | Bill | 0 | 0 | 13,049 | - | 10,374 | 79.5\% |
| 107 | Meter Reading Exp | 902 | 335 | Bill | 0 | 0 | 335 | - | 0 | 0.0\% |
| 108 | Customer Records \& Coll | 903 | 1,216 | Bill | 0 | 0 | 1,216 | - | 116 | 9.5\% |
| 109 | Uncollectible Accounts | 904 | 14,309 | Bill | 0 | 0 | 14,309 | - | 0 | 0.0\% |
| 110 | COVID Uncol, LPC | 904 | 2,951 | Bill | 0 | 0 | 2,951 | - | 0 | 0.0\% |
| 111 | Customer Accts. Exp. | 901-905 | 31,860 |  | 0 | 0 | 31,860 | - | 10,490 |  |
| 112 (1) |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 165 | Bill | 0 | 0 | 165 | - | 68 | 41.2\% |
| 114 | COVID Relief | 908 CV | 1,453 | Bill | 0 | 0 | 1,453 | - | 0 |  |
| 115 | Customer Service Exp. | 908-916 | 1,618 |  | 0 | 0 | 1,618 | - | 68 |  |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 33,478 |  | 0 | 0 | 33,478 | - | 10,558 |  |

Functions
Functionalization
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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Functionalization

| Line | Account | No. | Balance | Allocator | Primary | Secondary | Billing |  | Labor \$ | Labor \% |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  | 40,994 |  |
| 118 | E. ADMINISTRATIVE AND GE | AL |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 52,775 | Labor | 25,118 | 6,695 | 20,963 | - | 39,015 | 73.9\% |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Bill | 0 | 0 | 2,928 | - | 1 | 0.0\% |
| 121 | Office Supp \& Exp- Other | 921 | 4,559 | Labor | 2,170 | 578 | 1,811 | - | 35 | 0.8\% |
| 122 | Outside Services- Cust Care | 923CC | 2,017 | Bill | 0 | 0 | 2,017 | - | 64 | 3.2\% |
| 123 | Outside Services- HR | 923M | 1,620 | Labor | 771 | 205 | 643 | - | 62 | 3.8\% |
| 124 | Outside Services- Other | 923 | 21,867 | Labor | 10,407 | 2,774 | 8,686 | - | 836 | 3.8\% |
| 125 | Property Insurance | 924 | 5,138 | Plant | 3,124 | 1,288 | 725 | - | 0 | 0.0\% |
| 126 | Injuries \& Damages | 925 | 190 | Labor | 90 | 24 | 75 | - | 0 | 0.0\% |
| 127 | Empl Pensions \& Benefits | 926 | 4,132 | Labor | 1,966 | 524 | 1,641 | - | 0 | 0.0\% |
| 128 | Regulatory Commission | 928 | 813 | Bill | 0 | 0 | 813 | - | 0 | 0.0\% |
| 129 | A\&G-EV | 930 EV | 350 | EV | 0 | 0 | 350 | - | 0 | 0.0\% |
| 130 | Marketing, Communications | 930.1 | 34 | Bill | 0 | 0 | 34 | - | 1,260 | 3705.9\% |
| 131 | Misc. General Plant | 930.2 | 6,146 | Labor | 2,925 | 780 | 2,441 | - | (5) | -0.1\% |
| 132 | General Plant Rent | 931 | 3,243 | Labor | 1,544 | 411 | 1,288 | - | 0 | 0.0\% |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Bill | 0 | 0 | 833 | - | 0 | 0.0\% |
| 134 | Misc Genl Plant- Other | 935P | 9,461 | Labor | 4,503 | 1,200 | 3,758 | - | 0 | 0.0\% |
| 135 | Admin \& Genl. Exp. | 920-932 | 116,105 |  | 52,618 | 14,480 | 49,007 | - | 41,268 |  |
| 136 |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 205,286 |  | 90,133 | 24,684 | 90,469 | - | 82,262 |  |
| 138 |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 13,930 | Intang | 2,248 | 951 | 10,731 | - |  |  |
| 141 | Intangible- Customers | 403 | 34,285 | Bill | 0 | 0 | 34,285 | - |  |  |
| 142 | Intangible- AMI | 403 | 9,758 | Bill | 0 | 0 | 9,758 | - |  |  |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | - |  |  |
| 144 | Structures and Improvements | 403 | 1,593 | Prim | 1,593 | 0 | 0 | - |  |  |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | - |  |  |
| 146 | Station Equipment | 403 | 11,383 | Prim | 11,383 | 0 | 0 | - |  |  |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | OH_Cond | 10,533 | 2,696 | 0 | - |  |  |
| 148 | OH Conductors and Devices | 403 | 16,681 | OH_Cond | 13,282 | 3,399 | 0 | - |  |  |
| 149 | UG Conduits | 403 | 3,071 | UG_Total | 2,707 | 364 | 0 | - |  |  |
| 150 | UG Conductors | 403 | 12,519 | UG_Total | 11,035 | 1,484 | 0 | - |  |  |
| 151 | Line Transformers | 403 | 16,932 | LTrans_Tot | 1,071 | 15,861 | 0 | - |  |  |
| 152 | Services | 403 | 2,403 | Sec | 0 | 2,403 | 0 | - |  |  |
| 153 | Meters | 403 | 10,613 | Bill | 0 | 0 | 10,613 | - |  |  |

Functions
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Duquesne Light Company
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| Line | Account | No. | Balance | Allocator | Primary | Secondary | Billing |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | Sec | 0 | 1,279 | 0 |
| 155 | General / Common Plant | 364 | 20,926 | Labor | 9,960 | 2,655 | 8,312 |
| 156 | Depr / Amort-EV | 403EV | 143 | EV | 0 | 0 | 143 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 12,564 | DistPt | 8,434 | 3,566 | 564 |
| 159 | Depreciation Expense | 403 | 181,309 |  | 72,245 | 34,657 | 74,407 |
| 160 |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |
| 163 | Payroll related | 408.3 | 6,897 | Labor | 3,282 | 875 | 2,739 |
| 164 | PURTA, Real estate | 408.16 | 1,281 | Plant | 779 | 321 | 181 |
| 165 | Capital stock |  | 0 | Plant | 0 | 0 | 0 |
| 166 | Other | 408.1 | 0 | Plant | 0 | 0 | 0 |
| 167 | General Taxes |  | 8,177 |  | 4,061 | 1,196 | 2,920 |
| 168 |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 32,924 | GRT_Rev | 16,055 | 6,316 | 10,553 |
| 171 | Gross Receipts Tax |  | 32,924 |  | 16,055 | 6,316 | 10,553 |
| 172 (171 |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 6,290 | Pretax | 4,310 | 1,858 | 121 |
| 175 | Federal Income Tax Expense |  | 12,470 | Pretax | 8,545 | 3,684 | 241 |
| 176 | Income Taxes | 409-411 | 18,759 |  | 12,854 | 5,542 | 362 |
| 177 | Total Taxes | 408-411 | 59,861 |  | 32,971 | 13,054 | 13,836 |
| 178 |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 446,456 |  | 195,349 | 72,395 | 178,712 |
| 180 |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | ent Rate |  |  |  |  |  |
| 182 | Distribution Revenue |  | 550,379 | DistBill_RR-PF | 268,390 | 105,576 | 176,414 |
| 183 | Transmission Revenue |  | 0 | None | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | None | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,916 | Bill | 0 | 0 | 3,916 |
| 186 | Misc Service Revenue |  | 2,299 | DistBill_RR-PF | 1,121 | 441 | 737 |
| 187 | Rent For Electric Property |  | 11,788 | OH_Cond | 9,386 | 2,402 | 0 |
| 188 | Other Electric Revenues |  | 0 | DistBill_RR-PF | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 568,382 |  | 278,897 | 108,419 | 181,066 |
| 190 |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 446,456 |  | 195,349 | 72,395 | 178,712 |
| 192 | V. NET INCOME at Present Rates |  | 121,926 |  | 83,548 | 36,024 | 2,355 |

## IV. OPERATING REVENUES at Present Rate

Distribution Revenue
POLR Revenue
Forfeited Discounts
Misc Service Revenue
Rent For Electric Property
Operating Revenues
V. NET INCOME at Present Rates

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Classify
Classification
Cls
Exh 6-6

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Classification
Secondary
Demand Customer

| Line | Account | No. | Secondary |  | Demand | Customer |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 21 | Sec-Pt | 4 | 17 | - |
| 4 | SW- Plant/ OM | 303P | 0 | None | 0 | 0 | - |
| 5 | SW- Customer-related | 303 C | 0 | None | 0 | 0 | - |
| 6 | SW- Labor-related | 303L | 0 | None | 0 | 0 | - |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | - |
| 8 | Software- RB / CIP/Cyber | 303F | 25,257 | $\mathrm{Sec}-\mathrm{Pt}$ | 4,718 | 20,539 | - |
| 9 | Intangible Plant |  | 25,277 |  | 4,722 | 20,556 | - |
| 10 |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  | - |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | - |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | - |
| 14 |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | - |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | - |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | - |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | - |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | - |
| 21 | Poles, Towers and Fixtures | 364 | 127,160 | OH_Min | 6,452 | 120,708 | - |
| 22 | OH Conductors and Devices | 365 | 128,269 | OH_Min | 6,509 | 121,760 | - |
| 23 | UG Conduits- Radial | 366 | 16,789 | UG_Rad_Min | 11,988 | 4,801 | - |
| 24 | UG Conduits- Network | 366 | 4,620 | UG_Net_Min | 2,615 | 2,005 | - |
| 25 | UG Conduits- URD | 366 | 4,599 | UG_URD_Min | 0 | 4,599 | - |
| 26 | UG Conductors- Radial | 367 | 35,225 | UG_Rad_Min | 25,152 | 10,073 | - |
| 27 | UG Conductors- Network | 367 | 9,693 | UG_Net_Min | 5,487 | 4,206 | - |
| 28 | UG Conductors- URD | 367 | 9,649 | UG_URD_Min | 0 | 9,649 | - |
| 29 | Line Transformers- OH | 368 | 269,079 | LTr_Min_OH | 28,468 | 240,610 | - |
| 30 | Line Transformers- Radial | 368 | 95,034 | LTr_Min_Rad | 81,624 | 13,410 | - |
| 31 | Line Transformers- Network | 368 | 44,726 | LTr_Min_Net | 4,839 | 39,887 | - |
| 32 | Line Transformers- URD | 368 | 50,903 | LTr_Min_URD | 8,003 | 42,900 | - |
| 33 | Services | 369 | 114,962 | Customer | 0 | 114,962 | - |
| 34 | Meters | 370 | 0 | None | 0 | 0 | - |
| 35 | Street Lighting | 373 | 44,730 | Customer | 0 | 44,730 | - |
| 36 | ARO- Dist Plant | ARO | 0 | Sec-Pt | 0 | 0 | - |
| 37 | Distribution Plant | 360-373 | 955,438 |  | 181,139 | 774,299 | - |

Classify
Classification
Cls
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| Line | Account | No. | Secondary |  | Demand | Customer |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |
| 40 | General Plant | 390 | 44,535 | Sec-Lab | 5,650 | 38,885 | - |
| 41 | General Plant-EV | 390 EV | 0 | None | 0 | 0 | - |
| 42 | General Plant | 389-399 | 44,535 |  | 5,650 | 38,885 | - |
| 43 |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 1,025,250 |  | 191,510 | 833,739 | - |
| 45 |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 16,351 | Sec-IntPt | 3,054 | 13,297 | - |
| 48 | Transmission Plant | 108.3 | 0 | Sec-IntPt | 0 | 0 | - |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | - |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | - |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | - |
| 52 | Poles, Towers and Fixtures | 108.5 | 39,271 | OH_Min | 1,993 | 37,278 | - |
| 53 | OH Conductors and Devices | 108.5 | 37,604 | OH_Min | 1,908 | 35,695 | - |
| 54 | UG Conduits | 108.5 | 6,311 | UG-Tot | 3,543 | 2,767 | - |
| 55 | UG Conductors | 108.5 | 16,157 | UG-Tot | 9,072 | 7,085 | - |
| 56 | Line Transformers | 108.5 | 131,865 | LTr-Tot | 35,261 | 96,604 | - |
| 57 | Services | 108.5 | 28,630 | Customer | 0 | 28,630 | - |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | - |
| 59 | Street Lighting | 108.5 | 25,853 | Customer | 0 | 25,853 | - |
| 60 | EV Assets | 108EV | 0 | Sec-Pt | 0 | 0 | - |
| 61 | General | 108.6 | 18,751 | Sec-Lab | 2,379 | 16,373 | - |
| 62 | Depreciation Reserve | 108 | 320,792 |  | 57,210 | 263,582 | - |
| 63 |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 5,550 | Sec-OM | 695 | 4,856 | - |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | - |
| 67 | Materials \& Supplies |  | 6,534 | Sec-Pt | 1,220 | 5,313 | - |
| 68 | Capitalized Pension |  | 18,658 | Sec-Pt | 3,485 | 15,173 | - |
| 69 | Customer Deposits |  | 0 | None | 0 | 0 | - |
| 70 | ADIT-EV |  | 0 | Sec-Pt | 0 | 0 | - |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | - |
| 72 | ADIT- Distribution | 154 | $(142,445)$ | $\mathrm{Sec}-\mathrm{Pt}$ | $(26,608)$ | $(115,837)$ | 兂 |
| 73 | ADIT- General | 182 | $(2,523)$ | Sec-Lab | (320) | $(2,203)$ | - |
| 74 | Other Rate Base | 131-283 | $(114,227)$ |  | $(21,528)$ | $(92,699)$ | - |
| 75 [ |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 590,231 |  | 112,773 | 477,459 | - |
| 77 |  |  |  |  |  |  |  |

Classify
Classification
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Duquesne Light Company
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Fully Projected Future Test Year
Classification

| Line | Account | No. | Secondary |  | Demand | Customer |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EX] |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 |
| 83 |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 1,432 | Sec-Lab | 182 | 1,250 |
| 86 | Load Dispatching | 581 | 0 | None | 0 | 0 |
| 87 | Station Expenses | 582 | 0 | None |  | 0 |
| 88 | OH Line Expenses | 583 | 111 | OH_Min | 6 | 105 |
| 89 | UG Line Expenses | 584 | 72 | UG-Tot | 40 | 32 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 2,922 | Sec-Pt | 546 | 2,376 |
| 93 | Rents | 589 | 0 | Sec-Pt | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (36) | Sec-Lab | (5) | (31) - |
| 95 | Maint of Structures | 591 | 0 | None | - | 0 |
| 96 | Maint of Station Equip | 592 | 0 | None | 0 | 0 |
| 97 | Maint of OH Lines | 593 | 4,834 | OH_Min | 245 | 4,588 |
| 98 | Maint of UG Lines | 594 | 266 | UG-Tot | 149 | 117 |
| 99 | Maint of Line Transformers | 595 | 27 | LTr-Tot | 7 | 20 |
| 100 | Maint of Lighting | 596 | 555 | Customer | - | 555 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 21 | Sec-Pt | 4 | 17 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 10,204 |  | 1,175 | 9,029 |
| 104 |  |  | 10,204 |  | 1,175 | 9,029 |
| 105 D. CUSTOMER ACCOUNTS AND SERVIC |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Sec-Rev | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 |
| 112 |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | - | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | - | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 |

Classify
Classification
Cls
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Line

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Classification
Secondary
Demand
Customer

| 849 | 5,845 | - |
| ---: | ---: | :--- |
| 0 | 0 | - |
| 73 | 505 | - |
| 0 | 0 | - |
| 26 | 179 | - |
| 352 | 2,422 | - |
| 241 | 1,048 | - |
| 3 | 21 | - |
| 66 | 458 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 99 | 681 | - |
| 52 | 359 | - |
| 0 | 0 | - |
| 152 | 1,048 | - |
| 1,914 | 12,566 | - |
|  |  |  |
| 3,089 | 21,595 | - |


| 178 | 773 | - |
| ---: | ---: | :--- |
| 0 | 0 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 0 | 0 | - |
| 137 | 2,559 | - |
| 172 | 3,227 | - |
| 204 | 160 | - |
| 833 | 651 | - |
| 4,241 | 11,620 | - |
| 0 | 2,403 | - |
| 0 | 0 | - |

Classify
Classification
Cls
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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Classification

| Line | Account | No. | Secondary |  | Demand | Customer |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | Customer | 0 | 1,279 | - |
| 155 | General / Common Plant | 364 | 2,655 | Sec-Lab | 337 | 2,318 | - |
| 156 | Depr / Amort-EV | 403EV | 0 | Sec-GenPt | 0 | 0 | - |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | Sec-GenPt | 0 | 0 | - |
| 158 | Amort Exp- Reg Assets- Dist |  | 3,566 | Sec-Pt | 666 | 2,900 | - |
| 159 | Depreciation Expense | 403 | 34,657 |  | 6,769 | 27,889 | - |
| 160 |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 875 | Sec-Lab | 111 | 764 | - |
| 164 | PURTA, Real estate | 408.16 | 321 | Sec-Pt | 60 | 261 | - |
| 165 | Capital stock |  | 0 | $\mathrm{Sec}-\mathrm{Pt}$ | 0 | 0 | - |
| 166 | Other | 408 | 0 | Sec-Pt | 0 | 0 | - |
| 167 | General Taxes |  | 1,196 |  | 171 | 1,025 | - |
| 168 |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 6,316 | Sec-Rev | 1,140 | 5,176 | - |
| 171 | Gross Receipts Tax |  | 6,316 |  | 1,140 | 5,176 | - |
| 172 |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME | TAXES |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 1,858 | Sec-Pretax | 362 | 1,497 | - |
| 175 | Federal Income Tax Expense |  | 3,684 | Sec-Pretax | 717 | 2,967 | - |
| 176 | Income Taxes | 409-411 | 5,542 |  | 1,078 | 4,464 |  |
| 177 | Total Taxes | 408-411 | 13,054 |  | 2,389 | 10,665 | - |
| 178 |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 72,395 |  | 12,247 | 60,148 | - |
| 180 |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at | Present R: |  |  |  |  |  |
| 182 | Distribution Revenue |  | 105,576 | Sec-RetRRPF | 19,055 | 86,521 | - |
| 183 | Transmission Revenue |  | 0 | Sec-RetRRPF | 0 | 0 | - |
| 184 | POLR Revenue |  | 0 | Sec-RetRRPF | 0 | 0 | - |
| 185 | Forfeited Discounts |  | 0 | Sec-Rev | 0 | 0 | - |
| 186 | Misc Service Revenue |  | 441 | Sec-RetRRPF | 80 | 361 | - |
| 187 | Rent For Electric Property |  | 2,402 | OH_Min | 122 | 2,280 | - |
| 188 | Other Electric Revenues |  | 0 | Sec-RetRRPF | 0 | 0 | - |
| 189 | Operating Revenues |  | 108,419 |  | 19,256 | 89,163 | - |
| 190 |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 72,395 |  | 12,247 | 60,148 | - |
| 192 | V. NET INCOME at Present Ratı |  | 36,024 |  | 7,009 | 29,014 | - |

Classify
Classification
Cls
Exh 6-6

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Classification
Secondary
Demand
Customer

| Line | Account | No. | Secondary |  | Demand | Customer |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 105,576 |  | 19,055 | 86,521 | - |
| 197 | Other Operating Revenues | 450-456 | 2,843 |  | 201 | 2,642 | - |
| 198 | Total Operating Revenues |  | 108,419 |  | 19,256 | 89,163 | - |
| 199 |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 10,204 |  | 1,175 | 9,029 | - |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | - |
| 203 | Admin \& General | 920-932 | 14,480 |  | 1,914 | 12,566 | - |
| 204 | Total Operating Expenses |  | 24,684 |  | 3,089 | 21,595 | - |
| 205 |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 34,657 |  | 6,769 | 27,889 | - |
| 207 | Taxes Other Than Income Tax / Otl | 408 | 7,512 |  | 1,311 | 6,201 | - |
| 208 | INCOME BEFORE INCOME TAX |  | 41,566 |  | 8,088 | 33,478 | - |
| 209 | Income Taxes | 409-411 | 5,542 |  | 1,078 | 4,464 | - |
| 210 | NET INCOME |  | 36,024 |  | 7,009 | 29,014 | - |
| 211 | RATE BASE |  | 590,231 |  | 112,773 | 477,459 | - |
| 212 Return on Rate Base |  |  |  |  |  |  |  |
| 213 ( |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% |  |
| 216 | Rate Base |  | 590,231 |  | 112,773 | 477,459 | - |
| 217 |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 24,684 |  | 3,089 | 21,595 | - |
| 219 | Uncollectibles expense |  | 0 | Sec-Rev | 0 | 0 | - |
| 220 | Depreciation expense |  | 34,657 |  | 6,769 | 27,889 | - |
| 221 | Regulatory Commission Expenses |  | 0 | None | 0 | 0 | - |
| 222 | General taxes / Other |  | 1,196 |  | 171 | 1,025 | - |
| 223 | Subtotal- Operating Costs to recove |  | 60,537 |  | 10,029 | 50,508 | - |
| 224 ( ${ }^{\text {c }}$ |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After 1 |  | 46,274 |  | 8,841 | 37,433 | - |
| 226 | Income taxes to recover | 23.38\% | 10,821 | 23.38\% | 2,068 | 8,754 | - |
| 227 |  |  |  | 18.95\% |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 117,632 |  | 20,937 | 96,695 | - |
| 229 | GRT needed | 6.30\% | 7,226 | Sec-RetRRPF | 1,304 | 5,921 | - |
| 230 | TOTAL REVENUE REQUIREM | ENT | 124,858 |  | 22,242 | 102,616 |  |

Total
Revenue requirement by rate class by account
Tot
Exh 6-7
Line

## Account

INTANGIBLE PLANT

| Organization / Franchise | $301 / 302$ | 82 |
| :--- | :---: | ---: |
| SW- Plant/ OM | 303 P | 0 |
| SW- Customer-related | 303 C | 219,001 |
| SW- Labor-related | 303 L | 0 |
| SW- AMI | 303 AMI | 62,331 |
| Software- RB / CIP/Cyber | 303 F | 88,984 |
| $\quad$ Intangible Plant |  | 370,398 |

C. TRANSMISSION PLANT
Transmission Plant
Transmission Plant

$$
\begin{array}{cc}
361 & 0 \\
\end{array}
$$

JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account
Balance
D. DISTRIBUTION PLANT

Land and Land Rights
Structures and Improvements
Direct Assignment
Station Equipment
Station Equipment- Network
Poles, Towers and Fixtures
OH Conductors and Devices
UG Conduits- Radial
UG Conduits- Network
UG Conduits- URD
UG Conductors- Radial
UG Conductors- Network
UG Conductors- URD
Line Transformers- OH
Line Transformers- Radial
Line Transformers- Network
Line Transformers- URD
Services
Meters
Street Lighting
ARO- Dist Plant
Distribution Plant

| 360 | 23,190 |
| :---: | ---: |
| 361 | 71,327 |
| 361 | 0 |
| 362 | 523,748 |
| 362 | 13,188 |
| 364 | 624,016 |
| 365 | 629,457 |
| 366 | 157,950 |
| 366 | 30,713 |
| 366 | 30,713 |
| 367 | 331,382 |
| 367 | 64,435 |
| 367 | 64,435 |
| 368 | 300,124 |
| 368 | 95,034 |
| 368 | 44,726 |
| 368 | 50,903 |
| 369 | 114,962 |
| 370 | 151,169 |
| 373 | 44,730 |
| ARO | 0 |
| 373 | $3,366,202$ |

RS RH

RA
GS
GM<25
GM $>25 \quad$ GMH $<25 \quad$ GMH $>25$

| 37 | 4 | 1 | 1 | 5 | 13 | 1 | 1 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 179,742 | 14,462 | 2,145 | 9,036 | 7,322 | 2,454 | 908 | 232 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 41,055 | 3,289 | 488 | 2,128 | 8,408 | 4,862 | 967 | 427 |
| 38,362 | 4,248 | 538 | 1,488 | 5,076 | 14,491 | 585 | 1,365 |
| 259,196 | 22,002 | 3,172 | 12,653 | 20,811 | 21,820 | 2,460 | 2,025 |

RS RH RA


| 9,519 | 1,268 | 152 | 202 | 1,260 | 4,097 | 137 | 373 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 29,280 | 3,900 | 469 | 623 | 3,876 | 12,603 | 421 | 1,146 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 214,998 | 28,638 | 3,441 | 4,573 | 28,459 | 92,540 | 3,091 | 8,414 |
| 0 | 0 | 0 | 24 | 364 | 2,075 | 55 | 268 |
| 311,407 | 36,247 | 4,580 | 9,444 | 31,705 | 90,545 | 3,480 | 8,153 |
| 314,123 | 36,564 | 4,620 | 9,527 | 31,981 | 91,335 | 3,510 | 8,224 |
| 6,980 | 724 | 96 | 2,814 | 16,226 | 51,734 | 1,755 | 4,657 |
| 0 | 0 | 0 | 461 | 1,494 | 4,948 | 325 | 673 |
| 26,934 | 3,365 | 414 | 0 | 0 | 0 | 0 | 0 |
| 14,644 | 1,518 | 201 | 5,904 | 34,043 | 108,538 | 3,682 | 9,771 |
| 0 | 0 | 0 | 966 | 3,134 | 10,382 | 681 | 1,413 |
| 56,506 | 7,061 | 868 | 0 | 0 | 0 | 0 | 0 |
| 210,824 | 18,236 | 2,569 | 10,153 | 11,612 | 18,568 | 1,346 | 1,685 |
| 10,913 | 878 | 130 | 1,793 | 9,595 | 30,248 | 1,039 | 2,723 |
| 0 | 0 | 0 | 577 | 2,205 | 13,784 | 691 | 2,666 |
| 46,236 | 4,087 | 580 | 0 | 0 | 0 | 0 | 0 |
| 94,584 | 7,610 | 1,129 | 4,828 | 4,446 | 1,490 | 552 | 141 |
| 92,079 | 7,376 | 1,094 | 4,773 | 16,665 | 22,109 | 1,916 | 1,942 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

# Company 

JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account

| Line | Account | No. | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 82 | 12 | 2 | 4 | 0 | 0 | 1 | 0 |
| 4 | SW- Plant/ OM | 303P | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 219,001 | 267 | 32 | 7 | 3 | 0 | 349 | 2,040 |
| 6 | SW- Labor-related | 303L | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 62,331 | 597 | 71 | 32 | 7 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 88,984 | 14,290 | 2,141 | 4,427 | 1 | 248 | 1,518 | 207 |
| 9 | Intangible Plant |  | 370,398 | 15,166 | 2,246 | 4,470 | 11 | 249 | 1,869 | 2,248 |
| 10 |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | 4,080 | 551 | 1,381 | 0 | 77 | 67 | 25 |
| 17 | Structures and Improvements | 361 | 71,327 | 12,551 | 1,695 | 4,247 | 0 | 235 | 205 | 78 |
| 18 | Direct Assignment | 361 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 523,748 | 92,158 | 12,448 | 31,184 | 0 | 1,729 | 1,503 | 573 |
| 20 | Station Equipment- Network | 362 | 13,188 | 6,765 | 2,713 | 921 | 0 | 0 | 0 | 4 |
| 21 | Poles, Towers and Fixtures | 364 | 624,016 | 84,125 | 9,531 | 29,727 | 0 | 1,707 | 1,677 | 1,687 |
| 22 | OH Conductors and Devices | 365 | 629,457 | 84,859 | 9,614 | 29,986 | 0 | 1,722 | 1,691 | 1,702 |
| 23 | UG Conduits- Radial | 366 | 157,950 | 48,391 | 5,489 | 16,855 | 0 | 988 | 868 | 374 |
| 24 | UG Conduits- Network | 366 | 30,713 | 14,857 | 5,934 | 2,008 | 0 | 0 | 0 | 13 |
| 25 | UG Conduits- URD | 366 | 30,713 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 331,382 | 101,525 | 11,516 | 35,361 | 0 | 2,074 | 1,820 | 784 |
| 27 | UG Conductors- Network | 367 | 64,435 | 31,170 | 12,449 | 4,212 | 0 | 0 | 0 | 28 |
| 28 | UG Conductors- URD | 367 | 64,435 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 300,124 | 15,496 | 2,010 | 4,452 | 0 | 309 | 585 | 2,278 |
| 30 | Line Transformers- Radial | 368 | 95,034 | 26,275 | 3,027 | 7,071 | 0 | 577 | 512 | 252 |
| 31 | Line Transformers- Network | 368 | 44,726 | 19,530 | 4,602 | 666 | 0 | 0 | 0 | 7 |
| 32 | Line Transformers- URD | 368 | 50,903 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 114,962 | 162 | 19 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 151,169 | 2,715 | 323 | 146 | 31 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 44,730 | 0 | 0 | 0 | 0 | 0 | 44,730 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 3,366,202 | 544,658 | 81,923 | 168,215 | 31 | 9,419 | 53,659 | 7,805 |


| Line | Account | No. | Balance | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 351,077 | 188,694 | 22,302 | 2,210 | 6,724 | 18,426 | 46,636 | 2,140 | 4,307 |
| 41 | General Plant-EV | 390EV | 1,081 | 312 | 37 | 4 | 39 | 104 | 261 | 12 | 24 |
| 42 | General Plant | 389-399 | 352,158 | 189,006 | 22,338 | 2,213 | 6,763 | 18,530 | 46,897 | 2,152 | 4,331 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 4,088,758 | 1,887,228 | 201,813 | 25,728 | 76,079 | 236,407 | 623,712 | 27,293 | 58,605 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 239,596 | 167,664 | 14,232 | 2,052 | 8,185 | 13,462 | 14,115 | 1,592 | 1,310 |
| 48 | Transmission Plant | 108.3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 43,772 | 17,968 | 2,393 | 288 | 382 | 2,378 | 7,734 | 258 | 703 |
| 50 | Direct Assignment | 108.5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 189,703 | 77,873 | 10,373 | 1,246 | 1,656 | 10,308 | 33,518 | 1,119 | 3,047 |
| 52 | Poles, Towers and Fixtures | 108.5 | 192,716 | 96,173 | 11,194 | 1,414 | 2,917 | 9,792 | 27,963 | 1,075 | 2,518 |
| 53 | OH Conductors and Devices | 108.5 | 184,533 | 92,089 | 10,719 | 1,354 | 2,793 | 9,376 | 26,776 | 1,029 | 2,411 |
| 54 | UG Conduits | 108.5 | 53,228 | 8,228 | 992 | 124 | 795 | 4,300 | 13,753 | 505 | 1,293 |
| 55 | UG Conductors | 108.5 | 136,278 | 21,067 | 2,540 | 317 | 2,034 | 11,008 | 35,211 | 1,292 | 3,311 |
| 56 | Line Transformers | 108.5 | 140,769 | 76,861 | 6,655 | 941 | 3,592 | 6,715 | 17,955 | 882 | 2,029 |
| 57 | Services | 108.5 | 28,630 | 23,555 | 1,895 | 281 | 1,202 | 1,107 | 371 | 137 | 35 |
| 58 | Meters | 108.5 | 42,906 | 26,135 | 2,094 | 311 | 1,355 | 4,730 | 6,275 | 544 | 551 |
| 59 | Street Lighting | 108.5 | 25,853 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 143 | 62 | 7 | 1 | 4 | 10 | 26 | 1 | 2 |
| 61 | General | 108.6 | 147,822 | 79,450 | 9,390 | 930 | 2,831 | 7,758 | 19,636 | 901 | 1,814 |
| 62 | Depreciation Reserve | 108 | 1,425,949 | 687,125 | 72,485 | 9,258 | 27,746 | 80,944 | 203,334 | 9,335 | 19,026 |
|  |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 46,162 | 26,046 | 3,178 | 290 | 892 | 2,261 | 5,593 | 264 | 520 |
| 66 | Cash Working Capital- Supp | 131 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 26,057 | 11,803 | 1,292 | 159 | 466 | 1,552 | 4,141 | 179 | 388 |
| 68 | Capitalized Pension |  | 74,408 | 33,705 | 3,688 | 455 | 1,332 | 4,432 | 11,824 | 511 | 1,109 |
| 69 | Customer Deposits |  | $(11,163)$ | $(6,640)$ | (831) | (58) | (658) | $(1,099)$ | $(1,208)$ | (102) | (110) |
| 70 | ADIT-EV |  | (53) | (15) | (2) | (0) | (2) | (5) | (13) | (1) | (1) |
| 71 | ADIT- Transmission | 154 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(501,864)$ | $(216,358)$ | $(23,956)$ | $(3,035)$ | $(8,391)$ | $(28,630)$ | $(81,726)$ | $(3,298)$ | $(7,696)$ |
| 73 | ADIT- General | 182 | $(19,893)$ | $(10,692)$ | $(1,264)$ | (125) | (381) | $(1,044)$ | $(2,642)$ | (121) | (244) |
| 74 | Other Rate Base | 131-283 | $(386,345)$ | $(162,151)$ | $(17,894)$ | $(2,314)$ | $(6,742)$ | $(22,533)$ | $(64,032)$ | $(2,567)$ | $(6,034)$ |
| 75 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,276,464 | 1,037,952 | 111,433 | 14,157 | 41,591 | 132,929 | 356,346 | 15,391 | 33,545 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account

Total
Revenue requirement by rate class by account

| Line | Account | No. | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 351,077 | 35,622 | 4,915 | 11,322 | 15 | 629 | 6,657 | 478 |
| 41 | General Plant-EV | 390 EV | 1,081 | 199 | 27 | 63 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 352,158 | 35,821 | 4,942 | 11,385 | 15 | 629 | 6,657 | 478 |
| 43 |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 4,088,758 | 595,645 | 89,110 | 184,070 | 57 | 10,297 | 62,185 | 10,530 |
| 45 |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 239,596 | 9,810 | 1,453 | 2,892 | 7 | 161 | 1,209 | 1,454 |
| 48 | Transmission Plant | 108.3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 43,772 | 7,702 | 1,040 | 2,606 | 0 | 145 | 126 | 48 |
| 50 | Direct Assignment | 108.5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 189,703 | 33,380 | 4,509 | 11,295 | 0 | 626 | 545 | 207 |
| 52 | Poles, Towers and Fixtures | 108.5 | 192,716 | 25,981 | 2,944 | 9,181 | 0 | 527 | 518 | 521 |
| 53 | OH Conductors and Devices | 108.5 | 184,533 | 24,877 | 2,819 | 8,791 | 0 | 505 | 496 | 499 |
| 54 | UG Conduits | 108.5 | 53,228 | 15,346 | 2,772 | 4,577 | 0 | 240 | 211 | 94 |
| 55 | UG Conductors | 108.5 | 136,278 | 39,290 | 7,096 | 11,717 | 0 | 614 | 539 | 240 |
| 56 | Line Transformers | 108.5 | 140,769 | 17,582 | 2,765 | 3,496 | 0 | 254 | 315 | 728 |
| 57 | Services | 108.5 | 28,630 | 40 | 5 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 42,906 | 770 | 92 | 41 | 9 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 25,853 | 0 | 0 | 0 | 0 | 0 | 25,853 | 0 |
| 60 | EV Assets | 108EV | 143 | 20 | 3 | 6 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 147,822 | 14,999 | 2,069 | 4,767 | 6 | 265 | 2,803 | 201 |
| 62 | Depreciation Reserve | 108 | 1,425,949 | 189,799 | 27,565 | 59,369 | 22 | 3,337 | 32,613 | 3,992 |
| 63 |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 46,162 | 4,304 | 587 | 1,375 | 2 | 77 | 701 | 73 |
| 66 | Cash Working Capital- Supp | 131 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 26,057 | 3,817 | 570 | 1,175 | 1 | 66 | 394 | 54 |
| 68 | Capitalized Pension |  | 74,408 | 10,900 | 1,629 | 3,354 | 2 | 187 | 1,125 | 155 |
| 69 | Customer Deposits |  | $(11,163)$ | (457) | 0 | 0 | 0 | (0) | (0) | 0 |
| 70 | ADIT-EV |  | (53) | (10) | (1) | (3) | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(501,864)$ | $(80,595)$ | $(12,074)$ | $(24,970)$ | (4) | $(1,399)$ | $(8,564)$ | $(1,169)$ |
| 73 | ADIT- General | 182 | $(19,893)$ | $(2,018)$ | (278) | (642) | (1) | (36) | (377) | (27) |
| 74 | Other Rate Base | 131-283 | $(386,345)$ | $(64,059)$ | $(9,568)$ | $(19,711)$ | (1) | $(1,105)$ | $(6,721)$ | (914) |
| 75 |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,276,464 | 341,788 | 51,978 | 104,990 | 34 | 5,855 | 22,850 | 5,624 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account

| Line | Account | No. | Balance | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 9,222 | 4,815 | 565 | 58 | 172 | 484 | 1,249 | 56 | 115 |
| 86 | Load Dispatching | 581 | 1,050 | 431 | 57 | 7 | 9 | 57 | 186 | 6 | 17 |
| 87 | Station Expenses | 582 | 352 | 144 | 19 | 2 | 3 | 19 | 62 | 2 | 6 |
| 88 | OH Line Expenses | 583 | 544 | 271 | 32 | 4 | 8 | 28 | 79 | 3 | 7 |
| 89 | UG Line Expenses | 584 | 607 | 94 | 11 | 1 | 9 | 49 | 157 | 6 | 15 |
| 90 | Meter Expenses | 586 | 4,051 | 2,048 | 164 | 24 | 106 | 445 | 983 | 51 | 86 |
| 91 | Customer Installation Expenses | 587 | 2 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 10,295 | 4,438 | 491 | 62 | 172 | 587 | 1,677 | 68 | 158 |
| 93 | Rents | 589 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (190) | (80) | (10) | (1) | (3) | (10) | (31) | (1) | (3) |
| 95 | Maint of Structures | 591 | 99 | 41 | 5 | 1 | 1 | 5 | 17 | 1 | 2 |
| 96 | Maint of Station Equip | 592 | 2,659 | 1,092 | 145 | 17 | 23 | 145 | 470 | 16 | 43 |
| 97 | Maint of OH Lines | 593 | 23,720 | 11,837 | 1,378 | 174 | 359 | 1,205 | 3,442 | 132 | 310 |
| 98 | Maint of UG Lines | 594 | 2,242 | 347 | 42 | 5 | 33 | 181 | 579 | 21 | 54 |
| 99 | Maint of Line Transformers | 595 | 29 | 16 | 1 | 0 | 1 | 1 | 4 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 555 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 391 | 198 | 16 | 2 | 10 | 43 | 95 | 5 | 8 |
| 102 | Maint of Misc. Plant | 599 | 74 | 32 | 4 | 0 | 1 | 4 | 12 | 0 | 1 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 55,702 | 25,724 | 2,922 | 359 | 906 | 3,243 | 8,981 | 366 | 820 |
| 104 |  |  | 55,702 | 25,724 | 2,922 | 359 | 906 | 3,243 | 8,981 | 366 | 820 |
| 105 | D. CUSTOMER ACCOUNTS | D SERV |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,049 | 10,554 | 1,367 | 86 | 353 | 306 | 281 | 42 | 34 |
| 107 | Meter Reading Exp | 902 | 335 | 276 | 22 | 3 | 14 | 13 | 4 | 1 | 0 |
| 108 | Customer Records \& Coll | 903 | 1,216 | 984 | 127 | 8 | 33 | 28 | 26 | 4 | 3 |
| 109 | Uncollectible Accounts | 904 | 14,309 | 11,324 | 1,913 | 58 | 226 | 221 | 420 | 36 | 54 |
| 110 | COVID Uncol, LPC | 904 | 2,951 | 2,335 | 395 | 12 | 47 | 46 | 87 | 7 | 11 |
| 111 | Customer Accts. Exp. | 901-905 | 31,860 | 25,472 | 3,824 | 167 | 673 | 614 | 819 | 91 | 102 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 165 | 135 | 11 | 2 | 7 | 6 | 2 | 1 | 0 |
| 114 | COVID Relief | 908 CV | 1,453 | 1,117 | 90 | 13 | 37 | 93 | 88 | 8 | 7 |
| 115 | Customer Service Exp. | 908-916 | 1,618 | 1,252 | 101 | 15 | 44 | 98 | 90 | 9 | 7 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 33,478 | 26,724 | 3,924 | 182 | 717 | 712 | 909 | 100 | 109 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Revenue requirement by rate class by account

## Fully Projected Future Test Year

Revenue requirement by rate class by account

| Line | Account | No. | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 9,222 | 1,003 | 139 | 320 | 0 | 18 | 212 | 15 |
| 86 | Load Dispatching | 581 | 1,050 | 185 | 25 | 63 | 0 | 3 | 3 | 1 |
| 87 | Station Expenses | 582 | 352 | 62 | 8 | 21 | 0 | 1 | 1 | 0 |
| 88 | OH Line Expenses | 583 | 544 | 73 | 8 | 26 | 0 | 1 | 1 | 1 |
| 89 | UG Line Expenses | 584 | 607 | 175 | 32 | 52 | 0 | 3 | 2 | 1 |
| 90 | Meter Expenses | 586 | 4,051 | 121 | 14 | 6 | 1 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 10,295 | 1,653 | 248 | 512 | 0 | 29 | 176 | 24 |
| 93 | Rents | 589 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (190) | (30) | (4) | (10) | (0) | (1) | (5) | (0) |
| 95 | Maint of Structures | 591 | 99 | 17 | 2 | 6 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 2,659 | 468 | 63 | 158 | 0 | 9 | 8 | 3 |
| 97 | Maint of OH Lines | 593 | 23,720 | 3,198 | 362 | 1,130 | 0 | 65 | 64 | 64 |
| 98 | Maint of UG Lines | 594 | 2,242 | 647 | 117 | 193 | 0 | 10 | 9 | 4 |
| 99 | Maint of Line Transformers | 595 | 29 | 4 | 1 | 1 | 0 | 0 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 555 | 0 | 0 | 0 | 0 | 0 | 555 | 0 |
| 101 | Maint of Meters | 597 | 391 | 12 | 1 | 1 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 74 | 12 | 2 | 4 | 0 | 0 | 1 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 55,702 | 7,599 | 1,018 | 2,483 | 2 | 139 | 1,027 | 114 |
| 104 |  |  | 55,702 | 7,599 | 1,018 | 2,483 | 2 | 139 | 1,027 | 114 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 13,049 | 24 | 1 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 335 | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 1,216 | 2 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 14,309 | 33 | 1 | 0 | 0 | 0 | 14 | 9 |
| 110 | COVID Uncol, LPC | 904 | 2,951 | 7 | 0 | 0 | 0 | 0 | 3 | 2 |
| 111 | Customer Accts. Exp. | 901-905 | 31,860 | 67 | 3 | 0 | 0 | 0 | 17 | 10 |
| 112 ( |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 165 | 0 | 0 | 0 | 0 | 0 | 0 | 2 |
| 114 | COVID Relief | 908 CV | 1,453 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 1,618 | 0 | 0 | 0 | 0 | 0 | 0 | 2 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 33,478 | 67 | 3 | 0 | 0 | 0 | 17 | 12 |

Total
Revenue requirement by rate class by account
Tot
Exh 6-7

| Line | Account | No. | Balance | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND | NERAL |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 52,775 | 28,365 | 3,352 | 332 | 1,011 | 2,770 | 7,011 | 322 | 647 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | 2,403 | 193 | 29 | 121 | 98 | 33 | 12 | 3 |
| 121 | Office Supp \& Exp- Other | 921 | 4,559 | 2,450 | 290 | 29 | 87 | 239 | 606 | 28 | 56 |
| 122 | Outside Services- Cust Care | 923 CC | 2,017 | 1,655 | 133 | 20 | 83 | 67 | 23 | 8 | 2 |
| 123 | Outside Services- HR | 923M | 1,620 | 871 | 103 | 10 | 31 | 85 | 215 | 10 | 20 |
| 124 | Outside Services- Other | 923 | 21,867 | 11,753 | 1,389 | 138 | 419 | 1,148 | 2,905 | 133 | 268 |
| 125 | Property Insurance | 924 | 5,138 | 2,327 | 255 | 31 | 92 | 306 | 816 | 35 | 77 |
| 126 | Injuries \& Damages | 925 | 190 | 102 | 12 | 1 | 4 | 10 | 25 | 1 | 2 |
| 127 | Empl Pensions \& Benefits | 926 | 4,132 | 2,221 | 262 | 26 | 79 | 217 | 549 | 25 | 51 |
| 128 | Regulatory Commission | 928 | 813 | 432 | 41 | 5 | 17 | 49 | 103 | 5 | 9 |
| 129 | A\&G-EV | 930 EV | 350 | 134 | 16 | 2 | 11 | 28 | 71 | 3 | 7 |
| 130 | Marketing, Communications | 930 | 34 | 28 | 2 | 0 | 1 | 1 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930 | 6,146 | 3,303 | 390 | 39 | 118 | 323 | 816 | 37 | 75 |
| 132 | General Plant Rent | 931 | 3,243 | 1,743 | 206 | 20 | 62 | 170 | 431 | 20 | 40 |
| 133 | Misc Genl Plant- Metering | 935M | 833 | 507 | 41 | 6 | 26 | 92 | 122 | 11 | 11 |
| 134 | Misc Genl Plant- Other | 935P | 9,461 | 5,085 | 601 | 60 | 181 | 497 | 1,257 | 58 | 116 |
| 135 | Admin \& Genl. Exp. | 920-932 | 116,105 | 63,380 | 7,287 | 747 | 2,343 | 6,100 | 14,982 | 709 | 1,384 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 205,286 | 115,828 | 14,133 | 1,288 | 3,967 | 10,055 | 24,871 | 1,175 | 2,313 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPEN |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 13,930 | 8,428 | 860 | 93 | 367 | 1,050 | 1,799 | 123 | 164 |
| 141 | Intangible- Customers | 403 | 34,285 | 28,139 | 2,264 | 336 | 1,415 | 1,146 | 384 | 142 | 36 |
| 142 | Intangible- AMI | 403 | 9,758 | 6,427 | 515 | 76 | 333 | 1,316 | 761 | 151 | 67 |
| 143 | Transmission Plant | 403 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,593 | 654 | 87 | 10 | 14 | 87 | 281 | 9 | 26 |
| 145 | Direct assignment | 403 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 11,383 | 4,673 | 622 | 75 | 99 | 619 | 2,011 | 67 | 183 |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | 6,602 | 768 | 97 | 200 | 672 | 1,920 | 74 | 173 |
| 148 | OH Conductors and Devices | 403 | 16,681 | 8,324 | 969 | 122 | 252 | 848 | 2,420 | 93 | 218 |
| 149 | UG Conduits | 403 | 3,071 | 475 | 57 | 7 | 46 | 248 | 793 | 29 | 75 |
| 150 | UG Conductors | 403 | 12,519 | 1,935 | 233 | 29 | 187 | 1,011 | 3,235 | 119 | 304 |
| 151 | Line Transformers | 403 | 16,932 | 9,245 | 800 | 113 | 432 | 808 | 2,160 | 106 | 244 |
| 152 | Services | 403 | 2,403 | 1,977 | 159 | 24 | 101 | 93 | 31 | 12 | 3 |
| 153 | Meters | 403 | 10,613 | 6,464 | 518 | 77 | 335 | 1,170 | 1,552 | 135 | 136 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account

Exhibit 6-7
Page 7 of 12

Total
Revenue requirement by rate class by account
Tot
Exh 6-7

| Line | Account | No. | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND | NERAL |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 52,775 | 5,355 | 739 | 1,702 | 2 | 95 | 1,001 | 72 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | 4 | 0 | 0 | 0 | 0 | 5 | 27 |
| 121 | Office Supp \& Exp- Other | 921 | 4,559 | 463 | 64 | 147 | 0 | 8 | 86 | 6 |
| 122 | Outside Services- Cust Care | 923 CC | 2,017 | 2 | 0 | 0 | 0 | 0 | 3 | 19 |
| 123 | Outside Services- HR | 923M | 1,620 | 164 | 23 | 52 | 0 | 3 | 31 | 2 |
| 124 | Outside Services- Other | 923 | 21,867 | 2,219 | 306 | 705 | 1 | 39 | 415 | 30 |
| 125 | Property Insurance | 924 | 5,138 | 753 | 112 | 232 | 0 | 13 | 78 | 11 |
| 126 | Injuries \& Damages | 925 | 190 | 19 | 3 | 6 | 0 | 0 | 4 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 4,132 | 419 | 58 | 133 | 0 | 7 | 78 | 6 |
| 128 | Regulatory Commission | 928 | 813 | 95 | 11 | 28 | 0 | 2 | 15 | 2 |
| 129 | A\&G-EV | 930 EV | 350 | 54 | 7 | 17 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930 | 34 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930 | 6,146 | 624 | 86 | 198 | 0 | 11 | 117 | 8 |
| 132 | General Plant Rent | 931 | 3,243 | 329 | 45 | 105 | 0 | 6 | 61 | 4 |
| 133 | Misc Genl Plant- Metering | 935M | 833 | 15 | 2 | 1 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 9,461 | 960 | 132 | 305 | 0 | 17 | 179 | 13 |
| 135 | Admin \& Genl. Exp. | 920-932 | 116,105 | 11,475 | 1,589 | 3,631 | 5 | 202 | 2,072 | 200 |
| 136 |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 205,286 | 19,141 | 2,610 | 6,114 | 7 | 341 | 3,117 | 326 |
| 138 |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPEN |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 13,930 | 695 | 99 | 177 | 2 | 9 | 57 | 8 |
| 141 | Intangible- Customers | 403 | 34,285 | 42 | 5 | 1 | 1 | 0 | 55 | 319 |
| 142 | Intangible- AMI | 403 | 9,758 | 93 | 11 | 5 | 1 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,593 | 280 | 38 | 95 | 0 | 5 | 5 | 2 |
| 145 | Direct assignment | 403 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 11,383 | 2,003 | 271 | 678 | 0 | 38 | 33 | 12 |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | 1,783 | 202 | 630 | 0 | 36 | 36 | 36 |
| 148 | OH Conductors and Devices | 403 | 16,681 | 2,249 | 255 | 795 | 0 | 46 | 45 | 45 |
| 149 | UG Conduits | 403 | 3,071 | 885 | 160 | 264 | 0 | 14 | 12 | 5 |
| 150 | UG Conductors | 403 | 12,519 | 3,609 | 652 | 1,076 | 0 | 56 | 50 | 22 |
| 151 | Line Transformers | 403 | 16,932 | 2,115 | 333 | 421 | 0 | 31 | 38 | 88 |
| 152 | Services | 403 | 2,403 | 3 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 10,613 | 191 | 23 | 10 | 2 | 0 | 0 | 0 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Revenue requirement by rate class by account

| 6 |
| :--- |
| 2 |
| 0 |
| 1 |
| 0 |
| 6 |
| 2 |
| 0 |
| 0 |
| 8 |
| 4 |
| 0 |
| 3 | 8

Total
Revenue requirement by rate class by account Tot

Exh 6-7
Account
Street Lighting
General / Common Plant
Depr / Amort-EV
Amort Exp- Reg Assets- Tran
Amort Exp- Reg Assets- Dist
Depreciation Expense

## III. TAXES and OTHER

A. GENERAL TAXES

Payroll related
PURTA, Real estate
Capital stock
Other
General Taxes

## B. GROSS RECEIPTS TAX

Gross Receipts tax
Gross Receipts Tax

| No. | Balance |
| :---: | ---: |
| 403 | 1,279 |
| 364 | 20,926 |
| 403 EV | 143 |
|  | 0 |
|  | 12,564 |
| 403 | 181,309 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Revenue requirement by rate class by account

| $\mathbf{R S}$ | RH | RA | GS | $\mathbf{G M}<\mathbf{2 5}$ | $\mathbf{G M}>\mathbf{2 5}$ | GMH<25 | $\mathbf{G M H}>\mathbf{2 5}$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 11,247 | 1,329 | 132 | 401 | 1,098 | 2,780 | 128 | 257 |
| 62 | 7 | 1 | 4 | 10 | 26 | 1 | 2 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5,416 | 600 | 76 | 210 | 717 | 2,046 | 83 | 193 |
| 100,069 | 9,790 | 1,268 | 4,396 | 10,893 | 22,200 | 1,271 | 2,080 |


| 3,707 | 438 | 43 | 132 | 362 | 916 | 42 | 85 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 580 | 63 | 8 | 23 | 76 | 203 | 9 | 19 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 4,287 | 502 | 51 | 155 | 438 | 1,120 | 51 | 104 |


| 17,477 | 1,677 | 193 | 698 | 1,984 | 4,156 | 215 | 352 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 17,477 | 1,677 | 193 | 698 | 1,984 | 4,156 | 215 | 352 |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| 2,892 | 146 | 24 | 123 | 473 | 860 | 44 | 55 |
| 5,735 | 289 | 48 | 244 | 939 | 1,705 | 87 | 109 |
| 8,627 | 435 | 73 | 366 | 1,412 | 2,566 | 131 | 165 |
| 30,391 | 2,613 | 317 | 1,220 | 3,834 | 7,841 | 397 | 621 |
|  |  |  |  |  |  |  |  |
| 246,288 | 26,536 | 2,873 | 9,582 | 24,782 | 54,913 | 2,843 | 5,014 |

## IV. OPERATING REVENUES at Present Rates

Distribution Revenue

| 550,379 |
| ---: |
| 0 |
| 0 |
| 3,916 |
| 2,299 |
| 11,788 |
| 0 |
| 568,382 |
|  |
| 446,456 |
| 121,926 |


| 292,161 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 3,099 | 524 | 16 | 62 | 61 | 115 | 10 | 15 |
| 1,220 | 117 | 13 | 49 | 139 | 290 | 15 | 25 |
| 5,880 | 685 | 86 | 179 | 600 | 1,711 | 66 | 154 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 302,360 | 29,361 | 3,346 | 11,964 | 33,959 | 71,588 | 3,692 | 6,083 |
|  |  |  |  |  |  |  |  |
| 246,288 | 26,536 | 2,873 | 9,582 | 24,782 | 54,913 | 2,843 | 5,014 |
| 56,072 | 2,825 | 473 | 2,382 | 9,177 | 16,675 | 849 | 1,069 |

Total
Revenue requirement by rate class by account Tot

Exh 6-7

| Line | Account | No. | Balance | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | 0 | 0 | 0 | 0 | 0 | 1,279 | 0 |
| 155 | General / Common Plant | 364 | 20,926 | 2,123 | 293 | 675 | 1 | 38 | 397 | 28 |
| 156 | Depr / Amort-EV | 403 EV | 143 | 20 | 3 | 6 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 12,564 | 2,018 | 302 | 625 | 0 | 35 | 214 | 29 |
| 159 | Depreciation Expense | 403 | 181,309 | 18,110 | 2,646 | 5,458 | 6 | 307 | 2,219 | 595 |
| 160 |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 6,897 | 700 | 97 | 222 | 0 | 12 | 131 | 9 |
| 164 | PURTA, Real estate | 408.16 | 1,281 | 188 | 28 | 58 | 0 | 3 | 19 | 3 |
| 165 | Capital stock |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 8,177 | 887 | 125 | 280 | 0 | 16 | 150 | 12 |
| 168 |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 32,924 | 3,853 | 430 | 1,117 | 19 | 89 | 596 | 67 |
| 171 | Gross Receipts Tax |  | 32,924 | 3,853 | 430 | 1,117 | 19 | 89 | 596 | 67 |
| 172 |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | TAXES |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 6,290 | 1,086 | 71 | 283 | 13 | 35 | 177 | 7 |
| 175 | Federal Income Tax Expense |  | 12,470 | 2,152 | 141 | 562 | 26 | 69 | 351 | 14 |
| 176 | Income Taxes 40 | 409-411 | 18,759 | 3,238 | 212 | 845 | 39 | 104 | 527 | 20 |
| 177 | Total Taxes 4 | 408-411 | 59,861 | 7,978 | 767 | 2,242 | 59 | 208 | 1,273 | 99 |
| 178 |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 446,456 | 45,230 | 6,023 | 13,814 | 72 | 857 | 6,609 | 1,020 |
| 180 |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | Present |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 550,379 | 64,408 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 183 | Transmission Revenue |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,916 | 9 | 0 | 0 | 0 | 0 | 4 | 2 |
| 186 | Misc Service Revenue |  | 2,299 | 269 | 30 | 78 | 1 | 6 | 42 | 5 |
| 187 | Rent For Electric Property |  | 11,788 | 1,589 | 180 | 562 | 0 | 32 | 32 | 32 |
| 188 | Other Electric Revenues |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 568,382 | 66,275 | 7,402 | 19,306 | 325 | 1,530 | 10,037 | 1,153 |
| 190 |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 446,456 | 45,230 | 6,023 | 13,814 | 72 | 857 | 6,609 | 1,020 |
| 192 | V. NET INCOME at Present Rates |  | 121,926 | 21,045 | 1,379 | 5,493 | 253 | 673 | 3,427 | 133 |


| Line | Account No. | Balance | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues 440-446 | 554,295 | 295,260 | 28,560 | 3,246 | 11,737 | 33,220 | 69,587 | 3,611 | 5,904 |
| 197 | Other Operating Revenues 450-456 | 14,087 | 7,101 | 802 | 100 | 228 | 738 | 2,001 | 81 | 179 |
| 198 | Total Operating Revenues | 568,382 | 302,360 | 29,361 | 3,346 | 11,964 | 33,959 | 71,588 | 3,692 | 6,083 |
| 199 |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission 580-599 | 55,702 | 25,724 | 2,922 | 359 | 906 | 3,243 | 8,981 | 366 | 820 |
| 202 | Customer Acctg \& Service 901-919 | 33,478 | 26,724 | 3,924 | 182 | 717 | 712 | 909 | 100 | 109 |
| 203 | Admin \& General 920-932 | 116,105 | 63,380 | 7,287 | 747 | 2,343 | 6,100 | 14,982 | 709 | 1,384 |
| 204 | Total Operating Expenses | 205,286 | 115,828 | 14,133 | 1,288 | 3,967 | 10,055 | 24,871 | 1,175 | 2,313 |
| 205 |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense 403 | 181,309 | 100,069 | 9,790 | 1,268 | 4,396 | 10,893 | 22,200 | 1,271 | 2,080 |
| 207 | Taxes Other Than Income Tax / 408 | 41,102 | 21,764 | 2,179 | 244 | 853 | 2,422 | 5,276 | 266 | 456 |
| 208 | INCOME BEFORE INCOME T | 140,685 | 64,699 | 3,259 | 545 | 2,748 | 10,589 | 19,241 | 980 | 1,234 |
| 209 | Income Taxes 409-411 | 18,759 | 8,627 | 435 | 73 | 366 | 1,412 | 2,566 | 131 | 165 |
| 210 | NET INCOME | 121,926 | 56,072 | 2,825 | 473 | 2,382 | 9,177 | 16,675 | 849 | 1,069 |
| 211 | RATE BASE | 2,276,464 | 1,037,952 | 111,433 | 14,157 | 41,591 | 132,929 | 356,346 | 15,391 | 33,545 |
| 212 | Return on Rate Base | 5.36\% | 5.40\% | 2.53\% | 3.34\% | 5.73\% | 6.90\% | 4.68\% | 5.52\% | 3.19\% |
| 213 | Income tax | 13.33\% | 13.33\% | 13.33\% | 13.33\% | 13.33\% | 13.33\% | 13.33\% | 13.33\% | 13.33\% |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base | 2,276,464 | 1,037,952 | 111,433 | 14,157 | 41,591 | 132,929 | 356,346 | 15,391 | 33,545 |
| 217 |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses | 190,164 | 104,073 | 12,179 | 1,225 | 3,723 | 9,785 | 24,349 | 1,134 | 2,250 |
| 219 | Uncollectibles expense | 15,437 | 12,216 | 2,064 | 63 | 244 | 239 | 453 | 39 | 58 |
| 220 | Depreciation expense | 181,309 | 100,069 | 9,790 | 1,268 | 4,396 | 10,893 | 22,200 | 1,271 | 2,080 |
| 221 | Regulatory Commission Expens | 926 | 483 | 53 | 6 | 19 | 51 | 124 | 6 | 12 |
| 222 | General taxes / Other | 8,177 | 4,287 | 502 | 51 | 155 | 438 | 1,120 | 51 | 104 |
| 223 | Subtotal- Operating Costs to recr | 396,013 | 221,128 | 24,587 | 2,613 | 8,537 | 21,406 | 48,246 | 2,501 | 4,504 |
| 224 |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- Aft | 178,475 | 81,375 | 8,736 | 1,110 | 3,261 | 10,422 | 27,938 | 1,207 | 2,630 |
| 226 | Income taxes to recover | 41,736 | 19,029 | 2,043 | 260 | 763 | 2,437 | 6,533 | 282 | 615 |
| 227 |  |  |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT | 616,224 | 321,533 | 35,366 | 3,982 | 12,560 | 34,265 | 82,717 | 3,989 | 7,749 |
| 229 | GRT needed | 37,918 | 19,849 | 2,182 | 245 | 776 | 2,109 | 5,070 | 246 | 475 |
| 230 | TOTAL REVENUE REQUIREMENT | 654,142 | 341,382 | 37,548 | 4,228 | 13,337 | 36,373 | 87,787 | 4,235 | 8,224 |
| 231 |  |  |  |  |  |  |  |  |  |  |
| 232 | Revenue at Present rates | 568,382 | 302,360 | 29,361 | 3,346 | 11,964 | 33,959 | 71,588 | 3,692 | 6,083 |
| 233 | Revenue Excess (Deficiency) | $(85,760)$ | $(39,021)$ | $(8,187)$ | (882) | $(1,372)$ | $(2,414)$ | $(16,199)$ | (543) | $\underline{(2,141)}$ |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Revenue requirement by rate class by account

Total
Revenue requirement by rate class by account Tot

Exh 6-7


PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 50 | PriD-Pt | 17 | 2 | 0 | 0 | 3 | 10 | 0 | 1 |
| 4 | SW- Plant/ OM | 303P | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303 C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303 F | 59,731 | PriD-Pt | 20,386 | 2,715 | 326 | 584 | 3,651 | 11,946 | 398 | 1,093 |
| 9 | Intangible Plant |  | 59,781 |  | 20,403 | 2,718 | 327 | 584 | 3,654 | 11,956 | 398 | 1,094 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | NCP-Prim | 9,519 | 1,268 | 152 | 202 | 1,260 | 4,097 | 137 | 373 |
| 17 | Structures and Improvements | 361 | 71,327 | NCP-Prim | 29,280 | 3,900 | 469 | 623 | 3,876 | 12,603 | 421 | 1,146 |
| 18 | Direct Assignment | 361 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 523,748 | NCP-Prim | 214,998 | 28,638 | 3,441 | 4,573 | 28,459 | 92,540 | 3,091 | 8,414 |
| 20 | Station Equipment- Network | 362 | 13,188 | NCP-Prim-Net | 0 | 0 | 0 | 24 | 364 | 2,075 | 55 | 268 |
| 21 | Poles, Towers and Fixtures | 364 | 496,856 | NCP-Prim-NonNet | 209,399 | 27,892 | 3,351 | 4,430 | 27,353 | 88,045 | 2,955 | 7,926 |
| 22 | OH Conductors and Devices | 365 | 501,188 | NCP-Prim-NonNet | 211,225 | 28,135 | 3,380 | 4,469 | 27,591 | 88,812 | 2,980 | 7,995 |
| 23 | UG Conduits- Radial | 366 | 141,161 | NCP-Prim-Rad | 2,818 | 375 | 45 | 2,385 | 14,724 | 47,395 | 1,591 | 4,266 |
| 24 | UG Conduits- Network | 366 | 26,093 | NCP-Prim-Net | 0 | 0 | 0 | 47 | 720 | 4,105 | 109 | 530 |
| 25 | UG Conduits- URD | 366 | 26,114 | NCP-Prim-URD | 22,723 | 3,027 | 364 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 296,157 | NCP-Prim-Rad | 5,912 | 788 | 95 | 5,004 | 30,892 | 99,436 | 3,337 | 8,951 |
| 27 | UG Conductors- Network | 367 | 54,742 | NCP-Prim-Net | 0 | 0 | 0 | 98 | 1,510 | 8,613 | 229 | 1,111 |
| 28 | UG Conductors- URD | 367 | 54,786 | NCP-Prim-URD | 47,673 | 6,350 | 763 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 31,045 | NCP-Prim-NonNet | 13,084 | 1,743 | 209 | 277 | 1,709 | 5,501 | 185 | 495 |
| 30 | Line Transformers- Radial | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 31 | Line Transformers- Network | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 32 | Line Transformers- URD | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 2,259,595 |  | 766,631 | 102,115 | 12,269 | 22,132 | 138,457 | 453,221 | 15,089 | 41,473 |

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 50 | PriD-Pt | 10 | 2 | 3 | 0 | 0 | 0 | 0 |
| 4 | SW- Plant/ OM | 303 P | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303 C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303 F | 59,731 | PriD-Pt | 12,292 | 1,811 | 4,044 | 0 | 220 | 191 | 73 |
| 9 | Intangible Plant |  | 59,781 |  | 12,302 | 1,813 | 4,048 | 0 | 220 | 191 | 73 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 23,190 | NCP-Prim | 4,080 | 551 | 1,381 | 0 | 77 | 67 | 25 |
| 17 | Structures and Improvements | 361 | 71,327 | NCP-Prim | 12,551 | 1,695 | 4,247 | 0 | 235 | 205 | 78 |
| 18 | Direct Assignment | 361 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 523,748 | NCP-Prim | 92,158 | 12,448 | 31,184 | 0 | 1,729 | 1,503 | 573 |
| 20 | Station Equipment- Network | 362 | 13,188 | NCP-Prim-Net | 6,765 | 2,713 | 921 | 0 | 0 | 0 | 4 |
| 21 | Poles, Towers and Fixtures | 364 | 496,856 | NCP-Prim-NonNet | 82,960 | 9,397 | 29,446 | 0 | 1,684 | 1,464 | 554 |
| 22 | OH Conductors and Devices | 365 | 501,188 | NCP-Prim-NonNet | 83,684 | 9,479 | 29,703 | 0 | 1,699 | 1,477 | 559 |
| 23 | UG Conduits- Radial | 366 | 141,161 | NCP-Prim-Rad | 44,658 | 5,059 | 15,851 | 0 | 907 | 788 | 298 |
| 24 | UG Conduits- Network | 366 | 26,093 | NCP-Prim-Net | 13,384 | 5,368 | 1,822 | 0 | 0 | 0 | 8 |
| 25 | UG Conduits- URD | 366 | 26,114 | NCP-Prim-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 296,157 | NCP-Prim-Rad | 93,694 | 10,613 | 33,256 | 0 | 1,902 | 1,654 | 626 |
| 27 | UG Conductors- Network | 367 | 54,742 | NCP-Prim-Net | 28,080 | 11,262 | 3,823 | 0 | 0 | 0 | 16 |
| 28 | UG Conductors- URD | 367 | 54,786 | NCP-Prim-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 31,045 | NCP-Prim-NonNet | 5,184 | 587 | 1,840 | 0 | 105 | 91 | 35 |
| 30 | Line Transformers- Radial | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 31 | Line Transformers- Network | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 32 | Line Transformers- URD | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 2,259,595 |  | 467,198 | 69,174 | 153,474 | 0 | 8,338 | 7,249 | 2,774 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 167,091 | PriD-Lab | 61,589 | 8,204 | 986 | 1,584 | 9,868 | 32,121 | 1,072 | 2,924 |
| 41 | General Plant-EV | 390EV | 0 | NCP-Prim-Net | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 167,091 |  | 61,589 | 8,204 | 986 | 1,584 | 9,868 | 32,121 | 1,072 | 2,924 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 2,486,467 |  | 848,623 | 113,036 | 13,581 | 24,301 | 151,979 | 497,299 | 16,559 | 45,490 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 38,670 | PriD-IntPt | 13,198 | 1,758 | 211 | 378 | 2,364 | 7,734 | 258 | 707 |
| 48 | Transmission Plant | 108.3 | 0 | PriD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 43,772 | NCP-Prim | 17,968 | 2,393 | 288 | 382 | 2,378 | 7,734 | 258 | 703 |
| 50 | Direct Assignment | 108.5 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 189,703 | NCP-Prim | 77,873 | 10,373 | 1,246 | 1,656 | 10,308 | 33,518 | 1,119 | 3,047 |
| 52 | Poles, Towers and Fixtures | 108.5 | 153,445 | NCP-Prim-NonNet | 64,669 | 8,614 | 1,035 | 1,368 | 8,447 | 27,191 | 912 | 2,448 |
| 53 | OH Conductors and Devices | 108.5 | 146,929 | NCP-Prim-NonNet | 61,923 | 8,248 | 991 | 1,310 | 8,089 | 26,036 | 874 | 2,344 |
| 54 | UG Conduits | 108.5 | 46,917 | PriD-UG | 6,197 | 825 | 99 | 590 | 3,747 | 12,496 | 412 | 1,164 |
| 55 | UG Conductors | 108.5 | 120,121 | PriD-UG | 15,866 | 2,113 | 254 | 1,511 | 9,594 | 31,992 | 1,056 | 2,979 |
| 56 | Line Transformers | 108.5 | 8,904 | PriD-LTr | 3,753 | 500 | 60 | 79 | 490 | 1,578 | 53 | 142 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 70,354 | PriD-Lab | 25,933 | 3,454 | 415 | 667 | 4,155 | 13,525 | 451 | 1,231 |
| 62 | Depreciation Reserve | 108 | 818,817 |  | 287,380 | 38,279 | 4,599 | 7,942 | 49,572 | 161,804 | 5,394 | 14,766 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 20,268 | PriD-OM | 7,544 | 1,005 | 121 | 191 | 1,192 | 3,876 | 129 | 353 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 15,846 | PriD-Pt | 5,408 | 720 | 87 | 155 | 969 | 3,169 | 106 | 290 |
| 68 | Capitalized Pension |  | 45,249 | PriD-Pt | 15,443 | 2,057 | 247 | 442 | 2,766 | 9,050 | 301 | 828 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(336,881)$ | PriD-Pt | (114,976) | $(15,315)$ | $(1,840)$ | $(3,292)$ | $(20,591)$ | $(67,377)$ | $(2,244)$ | $(6,163)$ |
| 73 | ADIT- General | 182 | $(9,468)$ | PriD-Lab | $(3,490)$ | (465) | (56) | (90) | (559) | $(1,820)$ | (61) | (166) |
| 74 | Other Rate Base | 131-283 | $(264,985)$ |  | $(90,070)$ | $(11,997)$ | $(1,441)$ | $(2,594)$ | $(16,224)$ | $(53,102)$ | $(1,768)$ | $(4,859)$ |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 1,402,665 |  | 471,173 | 62,760 | 7,540 | 13,765 | 86,182 | 282,392 | 9,397 | $\underline{25,866}$ |
| 77 |  |  |  |  |  |  |  |  |  |  |  |  |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 167,091 | PriD-Lab | 32,175 | 4,417 | 10,833 | 0 | 599 | 520 | 198 |
| 41 | General Plant-EV | 390EV | 0 | NCP-Prim-Net | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 167,091 |  | 32,175 | 4,417 | 10,833 | 0 | 599 | 520 | 198 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 2,486,467 |  | 511,675 | 75,405 | 168,355 | 0 | 9,157 | 7,961 | 3,046 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 38,670 | PriD-IntPt | 7,958 | 1,173 | 2,618 | 0 | 142 | 124 | 47 |
| 48 | Transmission Plant | 108.3 | 0 | PriD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 43,772 | NCP-Prim | 7,702 | 1,040 | 2,606 | 0 | 145 | 126 | 48 |
| 50 | Direct Assignment | 108.5 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 189,703 | NCP-Prim | 33,380 | 4,509 | 11,295 | 0 | 626 | 545 | 207 |
| 52 | Poles, Towers and Fixtures | 108.5 | 153,445 | NCP-Prim-NonNet | 25,621 | 2,902 | 9,094 | 0 | 520 | 452 | 171 |
| 53 | OH Conductors and Devices | 108.5 | 146,929 | NCP-Prim-NonNet | 24,533 | 2,779 | 8,708 | 0 | 498 | 433 | 164 |
| 54 | UG Conduits | 108.5 | 46,917 | PriD-UG | 14,083 | 2,530 | 4,288 | 0 | 220 | 191 | 74 |
| 55 | UG Conductors | 108.5 | 120,121 | PriD-UG | 36,056 | 6,477 | 10,979 | 0 | 563 | 490 | 190 |
| 56 | Line Transformers | 108.5 | 8,904 | PriD-LTr | 1,487 | 168 | 528 | 0 | 30 | 26 | 10 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 70,354 | PriD-Lab | 13,548 | 1,860 | 4,561 | 0 | 252 | 219 | 84 |
| 62 | Depreciation Reserve | 108 | 818,817 |  | 164,367 | 23,439 | 54,677 | 0 | 2,997 | 2,605 | 995 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 20,268 | PriD-OM | 3,867 | 525 | 1,306 | 0 | 72 | 63 | 24 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 15,846 | PriD-Pt | 3,261 | 481 | 1,073 | 0 | 58 | 51 | 19 |
| 68 | Capitalized Pension |  | 45,249 | PriD-Pt | 9,312 | 1,372 | 3,064 | 0 | 167 | 145 | 55 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(336,881)$ | PriD-Pt | $(69,325)$ | $(10,216)$ | $(22,810)$ | 0 | $(1,241)$ | $(1,079)$ | (413) |
| 73 | ADIT- General | 182 | $(9,468)$ | PriD-Lab | $(1,823)$ | (250) | (614) | 0 | (34) | (29) | (11) |
| 74 | Other Rate Base | 131-283 | $(264,985)$ |  | $(54,708)$ | $(8,089)$ | $(17,980)$ | 0 | (977) | (850) | (325) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 1,402,665 |  | 292,599 | 43,877 | 95,697 | 0 | 5,183 | 4,506 | 1,726 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
CAl
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| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 4,710 | PriD-Lab | 1,736 | 231 | 28 | 45 | 278 | 905 | 30 | 82 |
| 86 | Load Dispatching | 581 | 1,050 | NCP-Prim | 431 | 57 | 7 | 9 | 57 | 186 | 6 | 17 |
| 87 | Station Expenses | 582 | 352 | NCP-Prim | 144 | 19 | 2 | 3 | 19 | 62 | 2 | 6 |
| 88 | OH Line Expenses | 583 | 433 | NCP-Prim-NonNet | 183 | 24 | 3 | 4 | 24 | 77 | 3 | 7 |
| 89 | UG Line Expenses | 584 | 535 | PriD-UG | 71 | 9 | 1 | 7 | 43 | 142 | 5 | 13 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 6,911 | PriD-Pt | 2,359 | 314 | 38 | 68 | 422 | 1,382 | 46 | 126 |
| 93 | Rents | 589 | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (149) | PriD-Lab | (55) | (7) | (1) | (1) | (9) | (29) | (1) | (3) |
| 95 | Maint of Structures | 591 | 99 | NCP-Prim | 41 | 5 | 1 | 1 | 5 | 17 | 1 | 2 |
| 96 | Maint of Station Equip | 592 | 2,659 | NCP-Prim | 1,092 | 145 | 17 | 23 | 145 | 470 | 16 | 43 |
| 97 | Maint of OH Lines | 593 | 18,886 | NCP-Prim-NonNet | 7,960 | 1,060 | 127 | 168 | 1,040 | 3,347 | 112 | 301 |
| 98 | Maint of UG Lines | 594 | 1,977 | PriD-UG | 261 | 35 | 4 | 25 | 158 | 526 | 17 | 49 |
| 99 | Maint of Line Transformers | 595 | 2 | PriD-LTr | 1 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 50 | PriD-Pt | 17 | 2 | 0 | 0 | 3 | 10 | 0 | 1 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 37,514 |  | 14,239 | 1,897 | 228 | 351 | 2,185 | 7,097 | 237 | 644 |
| 104 |  |  | 37,514 |  | 14,239 | 1,897 | 228 | 351 | 2,185 | 7,097 | 237 | 644 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

Duquesne Light Company
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Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
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Exh 6-7A

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 4,710 | PriD-Lab | 907 | 125 | 305 | 0 | 17 | 15 | 6 |
| 86 | Load Dispatching | 581 | 1,050 | NCP-Prim | 185 | 25 | 63 | 0 | 3 | 3 | 1 |
| 87 | Station Expenses | 582 | 352 | NCP-Prim | 62 | 8 | 21 | 0 | 1 | 1 | 0 |
| 88 | OH Line Expenses | 583 | 433 | NCP-Prim-NonNet | 72 | 8 | 26 | 0 | 1 | 1 | 0 |
| 89 | UG Line Expenses | 584 | 535 | PriD-UG | 161 | 29 | 49 | 0 | 3 | 2 | 1 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 6,911 | PriD-Pt | 1,422 | 210 | 468 | 0 | 25 | 22 | 8 |
| 93 | Rents | 589 | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (149) | PriD-Lab | (29) | (4) | (10) | 0 | (1) | (0) | (0) |
| 95 | Maint of Structures | 591 | 99 | NCP-Prim | 17 | 2 | 6 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 2,659 | NCP-Prim | 468 | 63 | 158 | 0 | 9 | 8 | 3 |
| 97 | Maint of OH Lines | 593 | 18,886 | NCP-Prim-NonNet | 3,153 | 357 | 1,119 | 0 | 64 | 56 | 21 |
| 98 | Maint of UG Lines | 594 | 1,977 | PriD-UG | 593 | 107 | 181 | 0 | 9 | 8 | 3 |
| 99 | Maint of Line Transformers | 595 | 2 | PriD-LTr | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 50 | PriD-Pt | 10 | 2 | 3 | 0 | 0 | 0 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 37,514 |  | 7,023 | 931 | 2,389 | 0 | 133 | 116 | 44 |
| 104 |  |  | 37,514 |  | 7,023 | 931 | 2,389 | 0 | 133 | 116 | 44 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

Duquesne Light Company
JSS / Class ACOS Study
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Class Allocation- Primary Demand

PrimDem
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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 25,118 | PriD-Lab | 9,258 | 1,233 | 148 | 238 | 1,483 | 4,829 | 161 | 439 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 2,170 | PriD-Lab | 800 | 107 | 13 | 21 | 128 | 417 | 14 | 38 |
| 122 | Outside Services- Cust Care | 923 CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 771 | PriD-Lab | 284 | 38 | 5 | 7 | 46 | 148 | 5 | 13 |
| 124 | Outside Services- Other | 923 | 10,407 | PriD-Lab | 3,836 | 511 | 61 | 99 | 615 | 2,001 | 67 | 182 |
| 125 | Property Insurance | 924 | 3,124 | PriD-Pt | 1,066 | 142 | 17 | 31 | 191 | 625 | 21 | 57 |
| 126 | Injuries \& Damages | 925 | 90 | PriD-Lab | 33 | 4 | 1 | 1 | 5 | 17 | 1 | 2 |
| 127 | Empl Pensions \& Benefits | 926 | 1,966 | PriD-Lab | 725 | 97 | 12 | 19 | 116 | 378 | 13 | 34 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930EV | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 2,925 | PriD-Lab | 1,078 | 144 | 17 | 28 | 173 | 562 | 19 | 51 |
| 132 | General Plant Rent | 931 | 1,544 | PriD-Lab | 569 | 76 | 9 | 15 | 91 | 297 | 10 | 27 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 4,503 | PriD-Lab | 1,660 | 221 | 27 | 43 | 266 | 866 | 29 | 79 |
| 135 | Admin \& Genl. Exp. | 920-932 | 52,618 |  | 19,310 | 2,572 | 309 | 500 | 3,114 | 10,140 | 338 | 923 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 90,133 |  | 33,549 | 4,469 | 537 | 851 | 5,299 | 17,236 | 576 | 1,568 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 2,248 | PriD-Pt | 767 | 102 | 12 | 22 | 137 | 450 | 15 | 41 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | PriD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,593 | NCP-Prim | 654 | 87 | 10 | 14 | 87 | 281 | 9 | 26 |
| 145 | Direct assignment | 403 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 11,383 | NCP-Prim | 4,673 | 622 | 75 | 99 | 619 | 2,011 | 67 | 183 |
| 147 | Poles, Towers and Fixtures | 403 | 10,533 | NCP-Prim-NonNet | 4,439 | 591 | 71 | 94 | 580 | 1,867 | 63 | 168 |
| 148 | OH Conductors and Devices | 403 | 13,282 | NCP-Prim-NonNet | 5,598 | 746 | 90 | 118 | 731 | 2,354 | 79 | 212 |
| 149 | UG Conduits | 403 | 2,707 | PriD-UG | 358 | 48 | 6 | 34 | 216 | 721 | 24 | 67 |
| 150 | UG Conductors | 403 | 11,035 | PriD-UG | 1,458 | 194 | 23 | 139 | 881 | 2,939 | 97 | 274 |
| 151 | Line Transformers | 403 | 1,071 | PriD-LTr | 451 | 60 | 7 | 10 | 59 | 190 | 6 | 17 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Primary Demand

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 25,118 | PriD-Lab | 4,837 | 664 | 1,628 | 0 | 90 | 78 | 30 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 2,170 | PriD-Lab | 418 | 57 | 141 | 0 | 8 | 7 | 3 |
| 122 | Outside Services- Cust Care | 923CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 771 | PriD-Lab | 148 | 20 | 50 | 0 | 3 | 2 | 1 |
| 124 | Outside Services- Other | 923 | 10,407 | PriD-Lab | 2,004 | 275 | 675 | 0 | 37 | 32 | 12 |
| 125 | Property Insurance | 924 | 3,124 | PriD-Pt | 643 | 95 | 212 | 0 | 12 | 10 | 4 |
| 126 | Injuries \& Damages | 925 | 90 | PriD-Lab | 17 | 2 | 6 | 0 | 0 | 0 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 1,966 | PriD-Lab | 379 | 52 | 127 | 0 | 7 | 6 | 2 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930 EV | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 2,925 | PriD-Lab | 563 | 77 | 190 | 0 | 10 | 9 | 3 |
| 132 | General Plant Rent | 931 | 1,544 | PriD-Lab | 297 | 41 | 100 | 0 | 6 | 5 | 2 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | PriD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 4,503 | PriD-Lab | 867 | 119 | 292 | 0 | 16 | 14 | 5 |
| 135 | Admin \& Genl. Exp. | 920-932 | 52,618 |  | 10,174 | 1,403 | 3,420 | 0 | 189 | 164 | 63 |
| 136 [ |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 90,133 |  | 17,196 | 2,335 | 5,810 | 0 | 322 | 280 | 107 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 2,248 | PriD-Pt | 463 | 68 | 152 | 0 | 8 | 7 | 3 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | PriD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 1,593 | NCP-Prim | 280 | 38 | 95 | 0 | 5 | 5 | 2 |
| 145 | Direct assignment | 403 | 0 | NCP-Prim | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 11,383 | NCP-Prim | 2,003 | 271 | 678 | 0 | 38 | 33 | 12 |
| 147 | Poles, Towers and Fixtures | 403 | 10,533 | NCP-Prim-NonNet | 1,759 | 199 | 624 | 0 | 36 | 31 | 12 |
| 148 | OH Conductors and Devices | 403 | 13,282 | NCP-Prim-NonNet | 2,218 | 251 | 787 | 0 | 45 | 39 | 15 |
| 149 | UG Conduits | 403 | 2,707 | PriD-UG | 813 | 146 | 247 | 0 | 13 | 11 | 4 |
| 150 | UG Conductors | 403 | 11,035 | PriD-UG | 3,312 | 595 | 1,009 | 0 | 52 | 45 | 17 |
| 151 | Line Transformers | 403 | 1,071 | PriD-LTr | 179 | 20 | 63 | 0 | 4 | 3 | 1 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | $\mathbf{G M}>25$ | $\mathbf{G M H}<25$ | $\mathbf{G M H}>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 9,960 | PriD-Lab | 3,671 | 489 | 59 | 94 | 588 | 1,915 | 64 | 174 |
| 156 | Depr / Amort-EV | 403 EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 8,434 | PriD-Pt | 2,878 | 383 | 46 | 82 | 515 | 1,687 | 56 | 154 |
| 159 | Depreciation Expense | 403 | 72,245 |  | 24,947 | 3,323 | 399 | 707 | 4,414 | 14,414 | 480 | 1,316 |
| 160 ( 161 |  |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 3,282 | PriD-Lab | 1,210 | 161 | 19 | 31 | 194 | 631 | 21 | 57 |
| 164 | PURTA, Real estate | 408.16 | 779 | PriD-Pt | 266 | 35 | 4 | 8 | 48 | 156 | 5 | 14 |
| 165 | Capital stock |  | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 4,061 |  | 1,476 | 197 | 24 | 39 | 241 | 787 | 26 | 72 |
| 168 (3) |  |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 16,055 | Dist_Rev | 8,523 | 818 | 94 | 341 | 967 | 2,027 | 105 | 172 |
| 171 | Gross Receipts Tax |  | 16,055 |  | 8,523 | 818 | 94 | 341 | 967 | 2,027 | 105 | 172 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 4,310 | PriD-PreTax | 3,511 | 244 | 26 | 173 | 261 | 55 | 28 | (4) |
| 175 | Federal Income Tax Expense |  | 8,545 | PriD-PreTax | 6,960 | 483 | 52 | 342 | 517 | 108 | 56 | (8) |
| 176 | Income Taxes | 409-411 | 12,854 |  | 10,471 | 727 | 79 | 515 | 778 | 163 | 84 | (12) |
| 177 | Total Taxes | 408-411 | 32,971 |  | 20,469 | 1,741 | 197 | 894 | 1,987 | 2,976 | 216 | 231 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 195,349 |  | 78,965 | 9,533 | 1,133 | 2,453 | 11,699 | 34,626 | 1,272 | 3,115 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Ra |  |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 268,390 | Dist_Rev | 142,471 | 13,672 | 1,575 | 5,693 | 16,170 | 33,878 | 1,756 | 2,872 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 1,121 | Dist_Rev | 595 | 57 | 7 | 24 | 68 | 142 | 7 | 12 |
| 187 | Rent For Electric Property |  | 9,386 | NCP-Prim-NonNet | 3,956 | 527 | 63 | 84 | 517 | 1,663 | 56 | 150 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 278,897 |  | 147,022 | 14,256 | 1,645 | 5,801 | 16,755 | 35,682 | 1,819 | 3,034 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 195,349 |  | 78,965 | 9,533 | 1,133 | 2,453 | 11,699 | 34,626 | 1,272 | 3,115 |
| 192 | V. NET INCOME at Present Rates |  | 83,548 |  | 68,056 | 4,723 | 512 | 3,348 | 5,055 | 1,057 | 548 | (81) |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

## $\begin{array}{r}1 \\ 0 \\ \hline 72\end{array}$

| $4)$ |
| :--- |
| 1 |

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 9,960 | PriD-Lab | 1,918 | 263 | 646 | 0 | 36 | 31 | 12 |
| 156 | Depr / Amort-EV | 403EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 8,434 | PriD-Pt | 1,736 | 256 | 571 | 0 | 31 | 27 | 10 |
| 159 | Depreciation Expense | 403 | 72,245 |  | 14,679 | 2,107 | 4,872 | 0 | 267 | 232 | 89 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 3,282 | PriD-Lab | 632 | 87 | 213 | 0 | 12 | 10 | 4 |
| 164 | PURTA, Real estate | 408.16 | 779 | PriD-Pt | 160 | 24 | 53 | 0 | 3 | 2 | 1 |
| 165 | Capital stock |  | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | PriD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 4,061 |  | 792 | 110 | 266 | 0 | 15 | 13 | 5 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 16,055 | Dist_Rev | 1,879 | 210 | 545 | 9 | 44 | 291 | 33 |
| 171 | Gross Receipts Tax |  | 16,055 |  | 1,879 | 210 | 545 | 9 | 44 | 291 | 33 |
| 172 ( 171 |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | AXES |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 4,310 | PriD-PreTax | (64) | (48) | (80) | 7 | 5 | 183 | 14 |
| 175 | Federal Income Tax Expense |  | 8,545 | PriD-PreTax | (128) | (94) | (159) | 13 | 10 | 362 | 29 |
| 176 | Income Taxes | 409-411 | 12,854 |  | (192) | (142) | (239) | 20 | 15 | 545 | 43 |
| 177 | Total Taxes | 408-411 | 32,971 |  | 2,479 | 178 | 571 | 29 | 74 | 849 | 81 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 195,349 |  | 34,355 | 4,620 | 11,253 | 29 | 662 | 1,360 | 276 |
| 180 ( |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Rat |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 268,390 | Dist_Rev | 31,408 | 3,507 | 9,103 | 158 | 727 | 4,857 | 543 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 1,121 | Dist_Rev | 131 | 15 | 38 | 1 | 3 | 20 | 2 |
| 187 | Rent For Electric Property |  | 9,386 | NCP-Prim-NonNet | 1,567 | 178 | 556 | 0 | 32 | 28 | 10 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 278,897 |  | 33,106 | 3,699 | 9,697 | 159 | 762 | 4,905 | 556 |
| 190 ( ${ }^{(1)}$ |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 195,349 |  | 34,355 | 4,620 | 11,253 | 29 | 662 | 1,360 | 276 |
| 192 | V. NET INCOME at Present Rates |  | 83,548 |  | $(1,248)$ | (921) | $(1,556)$ | 129 | 100 | 3,544 | 281 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 268,390 |  | 142,471 | 13,672 | 1,575 | 5,693 | 16,170 | 33,878 | 1,756 | 2,872 |
| 197 | Other Operating Revenues | 450-456 | 10,507 |  | 4,551 | 584 | 70 | 107 | 584 | 1,805 | 63 | 162 |
| 198 | Total Operating Revenues |  | 278,897 |  | 147,022 | 14,256 | 1,645 | 5,801 | 16,755 | 35,682 | 1,819 | 3,034 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 37,514 |  | 14,239 | 1,897 | 228 | 351 | 2,185 | 7,097 | 237 | 644 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 52,618 |  | 19,310 | 2,572 | 309 | 500 | 3,114 | 10,140 | 338 | 923 |
| 204 | Total Operating Expenses |  | 90,133 |  | 33,549 | 4,469 | 537 | 851 | 5,299 | 17,236 | 576 | 1,568 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 72,245 |  | 24,947 | 3,323 | 399 | 707 | 4,414 | 14,414 | 480 | 1,316 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 20,116 |  | 9,998 | 1,014 | 118 | 379 | 1,209 | 2,813 | 131 | 243 |
| 208 | INCOME BEFORE INCOME TAXES |  | 96,402 |  | 78,527 | 5,450 | 591 | 3,863 | 5,833 | 1,219 | 632 | (93) |
| 209 | Income Taxes | 409-411 | 12,854 |  | 10,471 | 727 | 79 | 515 | 778 | 163 | 84 | (12) |
| 210 | NET INCOME |  | 83,548 |  | 68,056 | 4,723 | 512 | 3,348 | 5,055 | 1,057 | 548 | (81) |
| 211 | RATE BASE |  | 1,402,665 |  | 471,173 | 62,760 | 7,540 | 13,765 | 86,182 | 282,392 | 9,397 | 25,866 |
| 212 | Return on Rate Base |  | 5.96\% |  |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 1,402,665 |  | 471,173 | 62,760 | 7,540 | 13,765 | 86,182 | 282,392 | 9,397 | 25,866 |
| 217 |  |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 90,133 |  | 33,549 | 4,469 | 537 | 851 | 5,299 | 17,236 | 576 | 1,568 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 72,245 |  | 24,947 | 3,323 | 399 | 707 | 4,414 | 14,414 | 480 | 1,316 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 4,061 |  | 1,476 | 197 | 24 | 39 | 241 | 787 | 26 | 72 |
| 223 | Subtotal- Operating Costs to recover |  | 166,439 |  | 59,971 | 7,988 | 960 | 1,597 | 9,954 | 32,436 | 1,082 | 2,955 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 109,969 |  | 36,940 | 4,920 | 591 | 1,079 | 6,757 | 22,140 | 737 | 2,028 |
| 226 | Income taxes to recover |  | 25,716 | 23.38\% | 8,638 | 1,151 | 138 | 252 | 1,580 | 5,177 | 172 | 474 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 302,124 |  | 105,550 | 14,059 | 1,689 | 2,928 | 18,291 | 59,753 | 1,991 | 5,457 |
| 229 | GRT needed |  | 18,398 | 6.09\% | 6,427 | 856 | 103 | 178 | 1,114 | 3,639 | 121 | 332 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 320,522 |  | 111,977 | 14,915 | 1,792 | 3,107 | 19,405 | 63,392 | 2,112 | $\underline{5,790}$ |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

PrimDem
Class Allocation- Primary Demand
CAl
Exh 6-7A

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 268,390 |  | 31,408 | 3,507 | 9,103 | 158 | 727 | 4,857 | 543 |
| 197 | Other Operating Revenues | 450-456 | 10,507 |  | 1,698 | 192 | 594 | 1 | 35 | 48 | 13 |
| 198 | Total Operating Revenues |  | 278,897 |  | 33,106 | 3,699 | 9,697 | 159 | 762 | 4,905 | 556 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 37,514 |  | 7,023 | 931 | 2,389 | 0 | 133 | 116 | 44 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 52,618 |  | 10,174 | 1,403 | 3,420 | 0 | 189 | 164 | 63 |
| 204 | Total Operating Expenses |  | 90,133 |  | 17,196 | 2,335 | 5,810 | 0 | 322 | 280 | 107 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 72,245 |  | 14,679 | 2,107 | 4,872 | 0 | 267 | 232 | 89 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 20,116 |  | 2,671 | 320 | 810 | 9 | 58 | 303 | 37 |
| 208 | INCOME BEFORE INCOME TAXES |  | 96,402 |  | $(1,440)$ | $(1,063)$ | $(1,795)$ | 149 | 116 | 4,090 | 324 |
| 209 | Income Taxes | 409-411 | 12,854 |  | (192) | (142) | (239) | 20 | 15 | 545 | 43 |
| 210 | NET INCOME |  | 83,548 |  | $(1,248)$ | (921) | $(1,556)$ | 129 | 100 | 3,544 | 281 |
| 211 | RATE BASE |  | 1,402,665 |  | 292,599 | 43,877 | 95,697 | 0 | 5,183 | 4,506 | 1,726 |
| 212 | Return on Rate Base |  | 5.96\% |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 1,402,665 |  | 292,599 | 43,877 | 95,697 | 0 | 5,183 | 4,506 | 1,726 |
| 217 (1) |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 90,133 |  | 17,196 | 2,335 | 5,810 | 0 | 322 | 280 | 107 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 72,245 |  | 14,679 | 2,107 | 4,872 | 0 | 267 | 232 | 89 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 4,061 |  | 792 | 110 | 266 | 0 | 15 | 13 | 5 |
| 223 | Subtotal- Operating Costs to recover |  | 166,439 |  | 32,668 | 4,552 | 10,948 | 0 | 603 | 524 | 200 |
| 224 |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 109,969 |  | 22,940 | 3,440 | 7,503 | 0 | 406 | 353 | 135 |
| 226 | Income taxes to recover |  | 25,716 | 23.38\% | 5,364 | 804 | 1,754 | 0 | 95 | 83 | 32 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 302,124 |  | 60,972 | 8,797 | 20,205 | 0 | 1,104 | 960 | 367 |
| 229 | GRT needed |  | 18,398 | 6.09\% | 3,713 | 536 | 1,230 | 0 | 67 | 58 | 22 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 320,522 |  | 64,685 | 9,332 | 21,435 | 0 | 1,172 | 1,019 | 389 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Primary Demand

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SER |  |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 4 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 |
| 4 | SW- Plant/ OM | 303 P | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | SecD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 4,718 | SecD-Pt | 356 | 62 | 6 | 52 | 424 | 1,512 | 46 | 138 |
| 9 | Intangible Plant |  | 4,722 |  | 356 | 62 | 6 | 52 | 424 | 1,513 | 46 | 139 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 6,452 | NCP-Sec-NonNet | 2,808 | 374 | 45 | 59 | 367 | 1,181 | 40 | 106 |
| 22 | OH Conductors and Devices | 365 | 6,509 | NCP-Sec-NonNet | 2,833 | 377 | 45 | 60 | 370 | 1,191 | 40 | 107 |
| 23 | UG Conduits- Radial | 366 | 11,988 | NCP-Sec-Rad | 255 | 34 | 4 | 215 | 1,330 | 4,281 | 144 | 385 |
| 24 | UG Conduits- Network | 366 | 2,615 | NCP-Sec-Net | 0 | 0 | 0 | 5 | 72 | 411 | 11 | 53 |
| 25 | UG Conduits- URD | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 25,152 | NCP-Sec-Rad | 534 | 71 | 9 | 452 | 2,791 | 8,983 | 301 | 809 |
| 27 | UG Conductors- Network | 367 | 5,487 | NCP-Sec-Net | 0 | 0 | 0 | 10 | 151 | 863 | 23 | 111 |
| 28 | UG Conductors- URD | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 28,468 | NCP-Sec-Xfmr | 0 | 583 | 0 | 0 | 1,958 | 10,435 | 194 | 948 |
| 30 | Line Transformers- Radial | 368 | 81,624 | NCP-Sec-Rad-Xfmr | 0 | 0 | 0 | 1,195 | 9,114 | 30,089 | 981 | 2,708 |
| 31 | Line Transformers- Network | 368 | 4,839 | NCP-Sec-Net | 0 | 0 | 0 | 9 | 133 | 761 | 20 | 98 |
| 32 | Line Transformers- URD | 368 | 8,003 | NCP-Sec-URD | 6,964 | 928 | 111 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 181,139 |  | 13,393 | 2,367 | 214 | 2,005 | 16,287 | 58,195 | 1,754 | 5,327 |
| 38 |  |  |  |  | 12 | 15 | 12 | 82 | 107 | 117 | 106 | 118 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

## Class Allocation- Secondary Demand

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 4 | SecD-Pt | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 4 | SW- Plant/ OM | 303 P | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | SecD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 4,718 | SecD-Pt | 1,470 | 225 | 370 | 0 | 28 | 22 | 6 |
| 9 | Intangible Plant |  | 4,722 |  | 1,471 | 225 | 370 | 0 | 28 | 22 | 6 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 6,452 | NCP-Sec-NonNet | 1,028 | 118 | 277 | 0 | 23 | 20 | 7 |
| 22 | OH Conductors and Devices | 365 | 6,509 | NCP-Sec-NonNet | 1,037 | 119 | 279 | 0 | 23 | 20 | 7 |
| 23 | UG Conduits- Radial | 366 | 11,988 | NCP-Sec-Rad | 3,727 | 429 | 1,003 | 0 | 82 | 71 | 27 |
| 24 | UG Conduits- Network | 366 | 2,615 | NCP-Sec-Net | 1,342 | 538 | 183 | 0 | 0 | 0 | 1 |
| 25 | UG Conduits- URD | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 25,152 | NCP-Sec-Rad | 7,819 | 901 | 2,105 | 0 | 172 | 149 | 57 |
| 27 | UG Conductors- Network | 367 | 5,487 | NCP-Sec-Net | 2,815 | 1,129 | 383 | 0 | 0 | 0 | 2 |
| 28 | UG Conductors- URD | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 28,468 | NCP-Sec-Xfmr | 10,040 | 1,392 | 2,605 | 0 | 204 | 110 | 0 |
| 30 | Line Transformers- Radial | 368 | 81,624 | NCP-Sec-Rad-Xfmr | 26,258 | 3,025 | 7,070 | 0 | 577 | 489 | 116 |
| 31 | Line Transformers- Network | 368 | 4,839 | NCP-Sec-Net | 2,482 | 996 | 338 | 0 | 0 | 0 | 1 |
| 32 | Line Transformers- URD | 368 | 8,003 | NCP-Sec-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 181,139 |  | 56,547 | 8,648 | 14,243 | 0 | 1,080 | 859 | 219 |
| 38 |  |  |  |  | 123 | 136 | 120 | \#DIV/0! | 116 | 107 | 71 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 5,650 | SecD-Lab | 699 | 104 | 11 | 66 | 484 | 1,678 | 52 | 154 |
| 41 | General Plant-EV | 390EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 5,650 |  | 699 | 104 | 11 | 66 | 484 | 1,678 | 52 | 154 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 191,510 |  | 14,449 | 2,533 | 231 | 2,124 | 17,195 | 61,387 | 1,852 | 5,620 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 3,054 | SecD-IntPt | 230 | 40 | 4 | 34 | 274 | 979 | 30 | 90 |
| 48 | Transmission Plant | 108.3 | 0 | SecD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 1,993 | NCP-Sec-NonNet | 867 | 116 | 14 | 18 | 113 | 365 | 12 | 33 |
| 53 | OH Conductors and Devices | 108.5 | 1,908 | NCP-Sec-NonNet | 830 | 111 | 13 | 18 | 108 | 349 | 12 | 31 |
| 54 | UG Conduits | 108.5 | 3,543 | SecD-UG | 62 | 8 | 1 | 53 | 340 | 1,139 | 38 | 106 |
| 55 | UG Conductors | 108.5 | 9,072 | SecD-UG | 158 | 21 | 3 | 137 | 871 | 2,915 | 96 | 272 |
| 56 | Line Transformers | 108.5 | 35,261 | SecD-LTr | 1,997 | 433 | 32 | 345 | 3,214 | 11,841 | 343 | 1,077 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 2,379 | SecD-Lab | 294 | 44 | 5 | 28 | 204 | 706 | 22 | 65 |
| 62 | Depreciation Reserve | 108 | 57,210 |  | 4,440 | 773 | 71 | 633 | 5,125 | 18,295 | 552 | 1,675 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 695 | SecD-OM | 90 | 13 | 1 | 8 | 59 | 205 | 6 | 19 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 1,220 | SecD-Pt | 92 | 16 | 1 | 14 | 110 | 391 | 12 | 36 |
| 68 | Capitalized Pension |  | 3,485 | SecD-Pt | 263 | 46 | 4 | 39 | 313 | 1,117 | 34 | 102 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(26,608)$ | SecD-Pt | $(2,007)$ | (352) | (32) | (295) | $(2,389)$ | $(8,529)$ | (257) | (781) |
| 73 | ADIT- General | 182 | (320) | SecD-Lab | (40) | (6) | (1) | (4) | (27) | (95) | (3) | (9) |
| 74 | Other Rate Base | 131-283 | $(21,528)$ |  | $(1,602)$ | (282) | (26) | (239) | $(1,935)$ | $(6,910)$ | (208) | (633) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 112,773 |  | 8,407 | 1,478 | 135 | 1,252 | 10,135 | 36,182 | 1,092 | 3,312 |
| 77 |  |  |  |  |  |  |  |  |  |  |  |  |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Demand

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Demand

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 5,650 | SecD-Lab | 1,660 | 266 | 412 | 0 | 31 | 25 | 8 |
| 41 | General Plant-EV | 390EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 5,650 |  | 1,660 | 266 | 412 | 0 | 31 | 25 | 8 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 191,510 |  | 59,678 | 9,139 | 15,025 | 0 | 1,139 | 907 | 232 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 3,054 | SecD-IntPt | 952 | 146 | 240 | 0 | 18 | 14 | 4 |
| 48 | Transmission Plant | 108.3 | 0 | SecD-IntPt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 1,993 | NCP-Sec-NonNet | 317 | 37 | 85 | 0 | 7 | 6 | 2 |
| 53 | OH Conductors and Devices | 108.5 | 1,908 | NCP-Sec-NonNet | 304 | 35 | 82 | 0 | 7 | 6 | 2 |
| 54 | UG Conduits | 108.5 | 3,543 | SecD-UG | 1,230 | 235 | 288 | 0 | 20 | 17 | 7 |
| 55 | UG Conductors | 108.5 | 9,072 | SecD-UG | 3,149 | 601 | 737 | 0 | 51 | 44 | 17 |
| 56 | Line Transformers | 108.5 | 35,261 | SecD-LTr | 11,123 | 1,553 | 2,872 | 0 | 224 | 172 | 34 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 2,379 | SecD-Lab | 699 | 112 | 174 | 0 | 13 | 11 | 3 |
| 62 | Depreciation Reserve | 108 | 57,210 |  | 17,773 | 2,718 | 4,477 | 0 | 339 | 270 | 69 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 695 | SecD-OM | 202 | 32 | 50 | 0 | 4 | 3 | 1 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 1,220 | SecD-Pt | 380 | 58 | 96 | 0 | 7 | 6 | 1 |
| 68 | Capitalized Pension |  | 3,485 | SecD-Pt | 1,086 | 166 | 273 | 0 | 21 | 16 | 4 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(26,608)$ | SecD-Pt | $(8,292)$ | $(1,270)$ | $(2,088)$ | 0 | (158) | (126) | (32) |
| 73 | ADIT- General | 182 | (320) | SecD-Lab | (94) | (15) | (23) | 0 | (2) | (1) | (0) |
| 74 | Other Rate Base | 131-283 | $(21,528)$ |  | $(6,717)$ | $(1,028)$ | $(1,691)$ | 0 | (128) | (102) | (26) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 112,773 |  | 35,188 | 5,393 | 8,857 | 0 | 671 | 534 | 137 |
| 77 |  |  |  |  |  |  |  |  |  |  |  |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | $\mathbf{G M}<25$ | GM>25 | GMH<25 | $\mathbf{G M H}>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 182 | SecD-Lab | 22 | 3 | 0 | 2 | 16 | 54 | 2 | 5 |
| 86 | Load Dispatching | 581 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 87 | Station Expenses | 582 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 88 | OH Line Expenses | 583 | 6 | NCP-Sec-NonNet | 2 | 0 | 0 | 0 | 0 | 1 | 0 | 0 |
| 89 | UG Line Expenses | 584 | 40 | SecD-UG | 1 | 0 | 0 | 1 | 4 | 13 | 0 | 1 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 546 | SecD-Pt | 41 | 7 | 1 | 6 | 49 | 175 | 5 | 16 |
| 93 | Rents | 589 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (5) | SecD-Lab | (1) | (0) | (0) | (0) | (0) | (1) | (0) | (0) |
| 95 | Maint of Structures | 591 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 97 | Maint of OH Lines | 593 | 245 | NCP-Sec-NonNet | 107 | 14 | 2 | 2 | 14 | 45 | 2 | 4 |
| 98 | Maint of UG Lines | 594 | 149 | SecD-UG | 3 | 0 | 0 | 2 | 14 | 48 | 2 | 4 |
| 99 | Maint of Line Transformers | 595 | 7 | SecD-LTr | 0 | 0 | 0 | 0 | 1 | 2 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 4 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 1,175 |  | 176 | 26 | 3 | 13 | 98 | 338 | 11 | 31 |
| 104 |  |  | 1,175 |  | 176 | 26 | 3 | 13 | 98 | 338 | 11 | 31 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Secondary Demand

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Demand

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 182 | SecD-Lab | 53 | 9 | 13 | 0 | 1 | 1 | 0 |
| 86 | Load Dispatching | 581 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 87 | Station Expenses | 582 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 88 | OH Line Expenses | 583 | 6 | NCP-Sec-NonNet | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 89 | UG Line Expenses | 584 | 40 | SecD-UG | 14 | 3 | 3 | 0 | 0 | 0 | 0 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 546 | SecD-Pt | 170 | 26 | 43 | 0 | 3 | 3 | 1 |
| 93 | Rents | 589 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (5) | SecD-Lab | (1) | (0) | (0) | 0 | (0) | (0) | (0) |
| 95 | Maint of Structures | 591 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 97 | Maint of OH Lines | 593 | 245 | NCP-Sec-NonNet | 39 | 5 | 11 | 0 | 1 | 1 | 0 |
| 98 | Maint of UG Lines | 594 | 149 | SecD-UG | 52 | 10 | 12 | 0 | 1 | 1 | 0 |
| 99 | Maint of Line Transformers | 595 | 7 | SecD-LTr | 2 | 0 | 1 | 0 | 0 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 4 | SecD-Pt | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 1,175 |  | 331 | 52 | 83 | 0 | 6 | 5 | 2 |
| 104 |  |  | 1,175 |  | 331 | 52 | 83 | 0 | 6 | 5 | 2 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Secondary Demand

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | $\mathbf{G M}<25$ | $\mathbf{G M}>\mathbf{2 5}$ | GMH<25 | GMH>25 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 849 | SecD-Lab | 105 | 16 | 2 | 10 | 73 | 252 | 8 | 23 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 73 | SecD-Lab | 9 | 1 | 0 | 1 | 6 | 22 | 1 | 2 |
| 122 | Outside Services- Cust Care | 923 CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 26 | SecD-Lab | 3 | 0 | 0 | 0 | 2 | 8 | 0 | 1 |
| 124 | Outside Services- Other | 923 | 352 | SecD-Lab | 44 | 6 | 1 | 4 | 30 | 104 | 3 | 10 |
| 125 | Property Insurance | 924 | 241 | SecD-Pt | 18 | 3 | 0 | 3 | 22 | 77 | 2 | 7 |
| 126 | Injuries \& Damages | 925 | 3 | SecD-Lab | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 66 | SecD-Lab | 8 | 1 | 0 | 1 | 6 | 20 | 1 | 2 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930 EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 99 | SecD-Lab | 12 | 2 | 0 | 1 | 8 | 29 | 1 | 3 |
| 132 | General Plant Rent | 931 | 52 | SecD-Lab | 6 | 1 | 0 | 1 | 4 | 15 | 0 | 1 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | SecD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 152 | SecD-Lab | 19 | 3 | 0 | 2 | 13 | 45 | 1 | 4 |
| 135 | Admin \& Genl. Exp. | 920-932 | 1,914 |  | 225 | 34 | 4 | 22 | 165 | 574 | 18 | 53 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 3,089 |  | 401 | 59 | 6 | 36 | 262 | 912 | 28 | 84 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 178 | SecD-Pt | 13 | 2 | 0 | 2 | 16 | 57 | 2 | 5 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 137 | NCP-Sec-NonNet | 60 | 8 | 1 | 1 | 8 | 25 | 1 | 2 |
| 148 | OH Conductors and Devices | 403 | 172 | NCP-Sec-NonNet | 75 | 10 | 1 | 2 | 10 | 32 | 1 | 3 |
| 149 | UG Conduits | 403 | 204 | SecD-UG | 4 | 0 | 0 | 3 | 20 | 66 | 2 | 6 |
| 150 | UG Conductors | 403 | 833 | SecD-UG | 15 | 2 | 0 | 13 | 80 | 268 | 9 | 25 |
| 151 | Line Transformers | 403 | 4,241 | SecD-LTr | 240 | 52 | 4 | 42 | 387 | 1,424 | 41 | 130 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Secondary Demand

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GENERAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 849 | SecD-Lab | 250 | 40 | 62 | 0 | 5 | 4 | 1 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 73 | SecD-Lab | 22 | 3 | 5 | 0 | 0 | 0 | 0 |
| 122 | Outside Services- Cust Care | 923CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 26 | SecD-Lab | 8 | 1 | 2 | 0 | 0 | 0 | 0 |
| 124 | Outside Services- Other | 923 | 352 | SecD-Lab | 103 | 17 | 26 | 0 | 2 | 2 | 0 |
| 125 | Property Insurance | 924 | 241 | SecD-Pt | 75 | 11 | 19 | 0 | 1 | 1 | 0 |
| 126 | Injuries \& Damages | 925 | 3 | SecD-Lab | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 66 | SecD-Lab | 20 | 3 | 5 | 0 | 0 | 0 | 0 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 99 | SecD-Lab | 29 | 5 | 7 | 0 | 1 | 0 | 0 |
| 132 | General Plant Rent | 931 | 52 | SecD-Lab | 15 | 2 | 4 | 0 | 0 | 0 | 0 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | SecD-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 152 | SecD-Lab | 45 | 7 | 11 | 0 | 1 | 1 | 0 |
| 135 | Admin \& Genl. Exp. | 920-932 | 1,914 |  | 567 | 90 | 141 | 0 | 11 | 9 | 3 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 3,089 |  | 898 | 142 | 224 | 0 | 17 | 14 | 4 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 178 | SecD-Pt | 55 | 8 | 14 | 0 | 1 | 1 | 0 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 137 | NCP-Sec-NonNet | 22 | 3 | 6 | 0 | 0 | 0 | 0 |
| 148 | OH Conductors and Devices | 403 | 172 | NCP-Sec-NonNet | 27 | 3 | 7 | 0 | 1 | 1 | 0 |
| 149 | UG Conduits | 403 | 204 | SecD-UG | 71 | 14 | 17 | 0 | 1 | 1 | 0 |
| 150 | UG Conductors | 403 | 833 | SecD-UG | 289 | 55 | 68 | 0 | 5 | 4 | 2 |
| 151 | Line Transformers | 403 | 4,241 | SecD-LTr | 1,338 | 187 | 345 | 0 | 27 | 21 | 4 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 337 | SecD-Lab | 42 | 6 | 1 | 4 | 29 | 100 | 3 | 9 |
| 156 | Depr / Amort-EV | 403 EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 666 | SecD-Pt | 50 | 9 | 1 | 7 | 60 | 214 | 6 | 20 |
| 159 | Depreciation Expense | 403 | 6,769 |  | 498 | 90 | 8 | 73 | 608 | 2,185 | 65 | 200 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 111 | SecD-Lab | 14 | 2 | 0 | 1 | 9 | 33 | 1 | 3 |
| 164 | PURTA, Real estate | 408.16 | 60 | SecD-Pt | 5 | 1 | 0 | 1 | 5 | 19 | 1 | 2 |
| 165 | Capital stock |  | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 171 |  | 18 | 3 | 0 | 2 | 15 | 52 | 2 | 5 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 1,140 | Dist_Rev | 605 | 58 | 7 | 24 | 69 | 144 | 7 | 12 |
| 171 | Gross Receipts Tax |  | 1,140 |  | 605 | 58 | 7 | 24 | 69 | 144 | 7 | 12 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | AXES |  |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 362 | SecD-PreTax | 388 | 34 | 4 | 12 | 9 | (38) | 1 | (4) |
| 175 | Federal Income Tax Expense |  | 717 | SecD-PreTax | 770 | 68 | 8 | 24 | 18 | (76) | 2 | (8) |
| 176 | Income Taxes | 409-411 | 1,078 |  | 1,158 | 103 | 12 | 36 | 27 | (114) | 3 | (12) |
| 177 | Total Taxes | 408-411 | 2,389 |  | 1,782 | 164 | 19 | 62 | 111 | 82 | 12 | 4 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 12,247 |  | 2,681 | 313 | 34 | 171 | 982 | 3,179 | 106 | 288 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Ra |  |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 19,055 | Dist_Rev | 10,115 | 971 | 112 | 404 | 1,148 | 2,405 | 125 | 204 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 80 | Dist_Rev | 42 | 4 | 0 | 2 | 5 | 10 | 1 | 1 |
| 187 | Rent For Electric Property |  | 122 | NCP-Sec-NonNet | 53 | 7 | 1 | 1 | 7 | 22 | 1 | 2 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 19,256 |  | 10,210 | 982 | 113 | 407 | 1,160 | 2,438 | 126 | 207 |
| 190 ( |  |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 12,247 |  | 2,681 | 313 | 34 | 171 | 982 | 3,179 | 106 | 288 |
| 192 | V. NET INCOME at Present Rates |  | 7,009 |  | 7,529 | 669 | 80 | 236 | 178 | (742) | 20 | (81) |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Demand

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 337 | SecD-Lab | 99 | 16 | 25 | 0 | 2 | 2 | 0 |
| 156 | Depr / Amort-EV | 403 EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 666 | SecD-Pt | 208 | 32 | 52 | 0 | 4 | 3 | 1 |
| 159 | Depreciation Expense | 403 | 6,769 |  | 2,109 | 317 | 534 | 0 | 41 | 32 | 8 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 111 | SecD-Lab | 33 | 5 | 8 | 0 | 1 | 0 | 0 |
| 164 | PURTA, Real estate | 408.16 | 60 | SecD-Pt | 19 | 3 | 5 | 0 | 0 | 0 | 0 |
| 165 | Capital stock |  | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | SecD-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 171 |  | 51 | 8 | 13 | 0 | 1 | 1 | 0 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 1,140 | Dist_Rev | 133 | 15 | 39 | 1 | 3 | 21 | 2 |
| 171 | Gross Receipts Tax |  | 1,140 |  | 133 | 15 | 39 | 1 | 3 | 21 | 2 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 362 | SecD-PreTax | (42) | (10) | (7) | 0 | (0) | 12 | 1 |
| 175 | Federal Income Tax Expense |  | 717 | SecD-PreTax | (83) | (20) | (14) | 1 | (1) | 25 | 2 |
| 176 | Income Taxes | 409-411 | 1,078 |  | (124) | (31) | (21) | 1 | (1) | 37 | 3 |
| 177 | Total Taxes | 408-411 | 2,389 |  | 60 | (8) | 31 | 2 | 3 | 59 | 6 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 12,247 |  | 3,068 | 452 | 788 | 2 | 60 | 105 | 18 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Ra |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 19,055 | Dist_Rev | 2,230 | 249 | 646 | 11 | 52 | 345 | 39 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 80 | Dist_Rev | 9 | 1 | 3 | 0 | 0 | 1 | 0 |
| 187 | Rent For Electric Property |  | 122 | NCP-Sec-NonNet | 19 | 2 | 5 | 0 | 0 | 0 | 0 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 19,256 |  | 2,259 | 252 | 654 | 11 | 52 | 347 | 39 |
| 190 |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 12,247 |  | 3,068 | 452 | 788 | 2 | 60 | 105 | 18 |
| 192 | V. NET INCOME at Present Rates |  | 7,009 |  | (809) | (200) | (134) | 9 | (8) | 242 | 21 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Demand

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | $\mathbf{G M}>\mathbf{2 5}$ | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 19,055 |  | 10,115 | 971 | 112 | 404 | 1,148 | 2,405 | 125 | 204 |
| 197 | Other Operating Revenues | 450-456 | 201 |  | 95 | 11 | 1 | 3 | 12 | 32 | 1 | 3 |
| 198 | Total Operating Revenues |  | 19,256 |  | 10,210 | 982 | 113 | 407 | 1,160 | 2,438 | 126 | 207 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 1,175 |  | 176 | 26 | 3 | 13 | 98 | 338 | 11 | 31 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 1,914 |  | 225 | 34 | 4 | 22 | 165 | 574 | 18 | 53 |
| 204 | Total Operating Expenses |  | 3,089 |  | 401 | 59 | 6 | 36 | 262 | 912 | 28 | 84 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 6,769 |  | 498 | 90 | 8 | 73 | 608 | 2,185 | 65 | 200 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 1,311 |  | 623 | 61 | 7 | 26 | 84 | 196 | 9 | 17 |
| 208 | INCOME BEFORE INCOME TAXES |  | 8,088 |  | 8,687 | 772 | 92 | 272 | 205 | (856) | 23 | (94) |
| 209 | Income Taxes | 409-411 | 1,078 |  | 1,158 | 103 | 12 | 36 | 27 | (114) | 3 | (12) |
| 210 | NET INCOME |  | 7,009 |  | 7,529 | 669 | 80 | 236 | 178 | (742) | 20 | (81) |
| 211 | RATE BASE |  | 112,773 |  | 8,407 | 1,478 | 135 | 1,252 | 10,135 | 36,182 | 1,092 | 3,312 |
| 212 | Return on Rate Base |  | 6.22\% |  |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 112,773 |  | 8,407 | 1,478 | 135 | 1,252 | 10,135 | 36,182 | 1,092 | 3,312 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 3,089 |  | 401 | 59 | 6 | 36 | 262 | 912 | 28 | 84 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 6,769 |  | 498 | 90 | 8 | 73 | 608 | 2,185 | 65 | 200 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 171 |  | 18 | 3 | 0 | 2 | 15 | 52 | 2 | 5 |
| 223 | Subtotal- Operating Costs to recover |  | 10,029 |  | 918 | 152 | 15 | 111 | 886 | 3,149 | 95 | 288 |
| 224 |  |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 8,841 |  | 659 | 116 | 11 | 98 | 795 | 2,837 | 86 | 260 |
| 226 | Income taxes to recover |  | 2,068 | 23.38\% | 154 | 27 | 2 | 23 | 186 | 663 | 20 | 61 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 20,937 |  | 1,731 | 295 | 28 | 232 | 1,866 | 6,649 | 201 | 609 |
| 229 | GRT needed |  | 1,304 | 6.23\% | 108 | 18 | 2 | 14 | 116 | 414 | 13 | 38 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 22,242 |  | 1,839 | 313 | 29 | 247 | 1,982 | 7,063 | 214 | 647 |

SecnDem
Class Allocation- Secondary Demand
CAl
Exh 6-7B

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 19,055 |  | 2,230 | 249 | 646 | 11 | 52 | 345 | 39 |
| 197 | Other Operating Revenues | 450-456 | 201 |  | 29 | 3 | 8 | 0 | 1 | 2 | 0 |
| 198 | Total Operating Revenues |  | 19,256 |  | 2,259 | 252 | 654 | 11 | 52 | 347 | 39 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 1,175 |  | 331 | 52 | 83 | 0 | 6 | 5 | 2 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 1,914 |  | 567 | 90 | 141 | 0 | 11 | 9 | 3 |
| 204 | Total Operating Expenses |  | 3,089 |  | 898 | 142 | 224 | 0 | 17 | 14 | 4 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 6,769 |  | 2,109 | 317 | 534 | 0 | 41 | 32 | 8 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 1,311 |  | 185 | 23 | 51 | 1 | 4 | 21 | 3 |
| 208 | INCOME BEFORE INCOME TAXES |  | 8,088 |  | (933) | (230) | (155) | 11 | (9) | 279 | 24 |
| 209 | Income Taxes | 409-411 | 1,078 |  | (124) | (31) | (21) | 1 | (1) | 37 | 3 |
| 210 | NET INCOME |  | 7,009 |  | (809) | (200) | (134) | 9 | (8) | 242 | 21 |
| 211 | RATE BASE |  | 112,773 |  | 35,188 | 5,393 | 8,857 | 0 | 671 | 534 | 137 |
| 212 | Return on Rate Base |  | 6.22\% |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 112,773 |  | 35,188 | 5,393 | 8,857 | 0 | 671 | 534 | 137 |
| 217 |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 3,089 |  | 898 | 142 | 224 | 0 | 17 | 14 | 4 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 6,769 |  | 2,109 | 317 | 534 | 0 | 41 | 32 | 8 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 171 |  | 51 | 8 | 13 | 0 | 1 | 1 | 0 |
| 223 | Subtotal- Operating Costs to recover |  | 10,029 |  | 3,059 | 468 | 770 | 0 | 58 | 47 | 12 |
| 224 |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 8,841 |  | 2,759 | 423 | 694 | 0 | 53 | 42 | 11 |
| 226 | Income taxes to recover |  | 2,068 | 23.38\% | 645 | 99 | 162 | 0 | 12 | 10 | 3 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 20,937 |  | 6,462 | 989 | 1,627 | 0 | 123 | 98 | 25 |
| 229 | GRT needed |  | 1,304 | 6.23\% | 403 | 62 | 101 | 0 | 8 | 6 | 2 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 22,242 |  | 6,865 | 1,051 | 1,728 | 0 | 131 | 105 | 27 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Secondary Demand

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | $\mathbf{G M H}>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SER |  |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 17 | SecC-Pt | 12 | 1 | 0 | 1 | 1 | 0 | 0 | 0 |
| 4 | SW- Plant/ OM | 303P | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 20,539 | SecC-Pt | 14,982 | 1,205 | 179 | 734 | 677 | 558 | 103 | 91 |
| 9 | Intangible Plant |  | 20,556 |  | 14,994 | 1,206 | 179 | 735 | 678 | 559 | 103 | 91 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 120,708 | Avg-Cust-NonNet | 99,201 | 7,982 | 1,184 | 4,955 | 3,986 | 1,320 | 485 | 121 |
| 22 | OH Conductors and Devices | 365 | 121,760 | Avg-Cust-NonNet | 100,066 | 8,051 | 1,194 | 4,998 | 4,020 | 1,332 | 489 | 122 |
| 23 | UG Conduits- Radial | 366 | 4,801 | Avg-Cust-Rad | 3,907 | 314 | 47 | 214 | 172 | 57 | 21 | 5 |
| 24 | UG Conduits- Network | 366 | 2,005 | Avg-Cust-Net | 0 | 0 | 0 | 409 | 702 | 432 | 205 | 91 |
| 25 | UG Conduits- URD | 366 | 4,599 | Avg-Cust-URD | 4,210 | 339 | 50 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 10,073 | Avg-Cust-Rad | 8,197 | 660 | 98 | 449 | 361 | 120 | 44 | 11 |
| 27 | UG Conductors- Network | 367 | 4,206 | Avg-Cust-Net | 0 | 0 | 0 | 858 | 1,473 | 906 | 429 | 191 |
| 28 | UG Conductors- URD | 367 | 9,649 | Avg-Cust-URD | 8,833 | 711 | 105 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 240,610 | Avg-Cust-NonNet | 197,740 | 15,910 | 2,360 | 9,876 | 7,945 | 2,632 | 967 | 241 |
| 30 | Line Transformers- Radial | 368 | 13,410 | Avg-Cust-Rad | 10,913 | 878 | 130 | 597 | 481 | 159 | 58 | 15 |
| 31 | Line Transformers- Network | 368 | 39,887 | Avg-Cust-Net-Xfmr | 0 | 0 | 0 | 568 | 2,071 | 13,022 | 670 | 2,568 |
| 32 | Line Transformers- URD | 368 | 42,900 | Avg-Cust-URD | 39,271 | 3,160 | 469 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 114,962 | Services_Cost | 94,584 | 7,610 | 1,129 | 4,828 | 4,446 | 1,490 | 552 | 141 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 44,730 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 774,299 |  | 566,923 | 45,614 | 6,766 | 27,752 | 25,656 | 21,469 | 3,921 | 3,506 |

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

## Class Allocation- Secondary Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 17 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 1 | 0 |
| 4 | SW- Plant/ OM | 303P | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 6 | SW- Labor-related | 303L | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 20,539 | SecC-Pt | 469 | 97 | 9 | 0 | 0 | 1,305 | 128 |
| 9 | Intangible Plant |  | 20,556 |  | 469 | 97 | 9 | 0 | 0 | 1,306 | 128 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | $361$ | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | $350-359$ | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 120,708 | Avg-Cust-NonNet | 137 | 15 | 4 | 0 | 0 | 193 | 1,126 |
| 22 | OH Conductors and Devices | 365 | 121,760 | Avg-Cust-NonNet | 138 | 16 | 4 | 0 | 0 | 194 | 1,135 |
| 23 | UG Conduits- Radial | 366 | 4,801 | Avg-Cust-Rad | 6 | 1 | 0 | 0 | 0 | 8 | 49 |
| 24 | UG Conduits- Network | 366 | 2,005 | Avg-Cust-Net | 131 | 28 | 3 | 0 | 0 | 0 | 5 |
| 25 | UG Conduits- URD | 366 | 4,599 | Avg-Cust-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 10,073 | Avg-Cust-Rad | 12 | 1 | 0 | 0 | 0 | 17 | 102 |
| 27 | UG Conductors- Network | 367 | 4,206 | Avg-Cust-Net | 275 | 58 | 5 | 0 | 0 | 0 | 11 |
| 28 | UG Conductors- URD | 367 | 9,649 | Avg-Cust-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 240,610 | Avg-Cust-NonNet | 273 | 31 | 8 | 0 | 0 | 384 | 2,244 |
| 30 | Line Transformers- Radial | 368 | 13,410 | Avg-Cust-Rad | 17 | 2 | 0 | 0 | 0 | 23 | 136 |
| 31 | Line Transformers- Network | 368 | 39,887 | Avg-Cust-Net-Xfmr | 17,048 | 3,606 | 328 | 0 | 0 | 0 | 5 |
| 32 | Line Transformers- URD | 368 | 42,900 | Avg-Cust-URD | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 114,962 | Services_Cost | 162 | 19 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 44,730 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 44,730 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 774,299 |  | 18,199 | 3,777 | 352 | 0 | 1 | 45,551 | 4,812 |

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 38,885 | SecC-Lab | 26,263 | 2,113 | 313 | 1,322 | 1,159 | 637 | 167 | 91 |
| 41 | General Plant-EV | 390EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 38,885 |  | 26,263 | 2,113 | 313 | 1,322 | 1,159 | 637 | 167 | 91 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 833,739 |  | 608,181 | 48,934 | 7,258 | 29,809 | 27,492 | 22,665 | 4,191 | 3,688 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 13,297 | SecC-IntPt | 9,699 | 780 | 116 | 475 | 438 | 361 | 67 | 59 |
| 48 | Transmission Plant | 108.3 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 37,278 | Avg-Cust-NonNet | 30,636 | 2,465 | 366 | 1,530 | 1,231 | 408 | 150 | 37 |
| 53 | OH Conductors and Devices | 108.5 | 35,695 | Avg-Cust-NonNet | 29,335 | 2,360 | 350 | 1,465 | 1,179 | 390 | 143 | 36 |
| 54 | UG Conduits | 108.5 | 2,767 | SecC-UG | 1,970 | 158 | 24 | 151 | 212 | 119 | 55 | 23 |
| 55 | UG Conductors | 108.5 | 7,085 | SecC-UG | 5,043 | 406 | 60 | 387 | 543 | 304 | 140 | 60 |
| 56 | Line Transformers | 108.5 | 96,604 | $\mathrm{SecC-LTr}$ | 71,110 | 5,721 | 849 | 3,167 | 3,011 | 4,536 | 486 | 810 |
| 57 | Services | 108.5 | 28,630 | Services_Cost | 23,555 | 1,895 | 281 | 1,202 | 1,107 | 371 | 137 | 35 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 25,853 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 16,373 | SecC-Lab | 11,058 | 890 | 132 | 557 | 488 | 268 | 70 | 38 |
| 62 | Depreciation Reserve | 108 | 263,582 |  | 182,407 | 14,676 | 2,177 | 8,935 | 8,209 | 6,757 | 1,249 | 1,099 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 4,856 | SecC-OM | 3,393 | 273 | 40 | 170 | 148 | 81 | 21 | 12 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 5,313 | SecC-Pt | 3,876 | 312 | 46 | 190 | 175 | 144 | 27 | 24 |
| 68 | Capitalized Pension |  | 15,173 | SecC-Pt | 11,068 | 891 | 132 | 542 | 500 | 412 | 76 | 67 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(115,837)$ | SecC-Pt | $(84,499)$ | $(6,799)$ | $(1,008)$ | $(4,142)$ | $(3,820)$ | $(3,149)$ | (582) | (512) |
| 73 | ADIT- General | 182 | $(2,203)$ | SecC-Lab | $(1,488)$ | (120) | (18) | (75) | (66) | (36) | (9) | (5) |
| 74 | Other Rate Base | 131-283 | $(92,699)$ |  | $(67,650)$ | $(5,443)$ | (807) | $(3,314)$ | $(3,061)$ | $(2,547)$ | (468) | (415) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | $\underline{477,459}$ |  | 358,123 | 28,814 | 4,274 | 17,561 | 16,222 | 13,361 | 2,474 | 2,174 |
| 77 |  |  |  |  |  |  |  |  |  |  |  |  |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 38,885 | SecC-Lab | 363 | 73 | 7 | 0 | 0 | 6,110 | 265 |
| 41 | General Plant-EV | 390EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 38,885 |  | 363 | 73 | 7 | 0 | 0 | 6,110 | 265 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 833,739 |  | 19,031 | 3,948 | 368 | 0 | 1 | 52,967 | 5,206 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 13,297 | SecC-IntPt | 304 | 63 | 6 | 0 | 0 | 845 | 83 |
| 48 | Transmission Plant | 108.3 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 37,278 | Avg-Cust-NonNet | 42 | 5 | 1 | 0 | 0 | 60 | 348 |
| 53 | OH Conductors and Devices | 108.5 | 35,695 | Avg-Cust-NonNet | 40 | 5 | 1 | 0 | 0 | 57 | 333 |
| 54 | UG Conduits | 108.5 | 2,767 | SecC-UG | 33 | 7 | 1 | 0 | 0 | 2 | 13 |
| 55 | UG Conductors | 108.5 | 7,085 | SecC-UG | 85 | 18 | 2 | 0 | 0 | 5 | 33 |
| 56 | Line Transformers | 108.5 | 96,604 | Sec --LTr | 4,973 | 1,044 | 96 | 0 | 0 | 117 | 684 |
| 57 | Services | 108.5 | 28,630 | Services_Cost | 40 | 5 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 25,853 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 25,853 | 0 |
| 60 | EV Assets | 108EV | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 16,373 | SecC-Lab | 153 | 31 | 3 | 0 | 0 | 2,573 | 112 |
| 62 | Depreciation Reserve | 108 | 263,582 |  | 5,671 | 1,176 | 110 | 0 | 0 | 29,511 | 1,606 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 4,856 | SecC-OM | 46 | 9 | 1 | 0 | 0 | 626 | 34 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 5,313 | SecC-Pt | 121 | 25 | 2 | 0 | 0 | 338 | 33 |
| 68 | Capitalized Pension |  | 15,173 | SecC-Pt | 346 | 72 | 7 | 0 | 0 | 964 | 95 |
| 69 | Customer Deposits |  | 0 | CustDeposits | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 70 | ADIT-EV |  | 0 | $\mathrm{SecC}-\mathrm{Pt}$ | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(115,837)$ | SecC-Pt | $(2,644)$ | (549) | (51) | (0) | (0) | $(7,359)$ | (723) |
| 73 | ADIT- General | 182 | $(2,203)$ | SecC-Lab | (21) | (4) | (0) | (0) | (0) | (346) | (15) |
| 74 | Other Rate Base | 131-283 | $(92,699)$ |  | $(2,151)$ | (446) | (42) | (0) | (0) | $(5,778)$ | (576) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 477,459 |  | 11,210 | 2,325 | 217 | 0 | 1 | 17,677 | $\underline{3,024}$ |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 1,250 | SecC-Lab | 844 | 68 | 10 | 43 | 37 | 20 | 5 | 3 |
| 86 | Load Dispatching | 581 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 87 | Station Expenses | 582 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 88 | OH Line Expenses | 583 | 105 | Avg-Cust-NonNet | 86 | 7 | 1 | 4 | 3 | 1 | 0 | 0 |
| 89 | UG Line Expenses | 584 | 32 | SecC-UG | 22 | 2 | 0 | 2 | 2 | 1 | 1 | 0 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 2,376 | SecC-Pt | 1,733 | 139 | 21 | 85 | 78 | 65 | 12 | 11 |
| 93 | Rents | 589 | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (31) | SecC-Lab | (21) | (2) | (0) | (1) | (1) | (1) | (0) | (0) |
| 95 | Maint of Structures | 591 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 97 | Maint of OH Lines | 593 | 4,588 | Avg-Cust-NonNet | 3,771 | 303 | 45 | 188 | 151 | 50 | 18 | 5 |
| 98 | Maint of UG Lines | 594 | 117 | SecC-UG | 83 | 7 | 1 | 6 | 9 | 5 | 2 | 1 |
| 99 | Maint of Line Transformers | 595 | 20 | $\mathrm{SecC-LTr}$ | 15 | 1 | 0 | 1 | 1 | 1 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 555 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 17 | SecC-Pt | 12 | 1 | 0 | 1 | 1 | 0 | 0 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 9,029 |  | 6,547 | 527 | 78 | 328 | 282 | 144 | 39 | 20 |
| 104 |  |  | 9,029 |  | 6,547 | 527 | 78 | 328 | 282 | 144 | 39 | 20 |
| 105 | D. CUSTOMER ACCOUNTS AN | SERVIC |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

Duquesne Light Company
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Fully Projected Future Test Year
Class Allocation- Secondary Customer

## I. OPERATING AND MAINTENANCE EXPENSES

POLR Expense
Transmission Expense
Transmission Expense
D. CUSTOMER ACCOUNTS AND SERVICE

Supervision
$\begin{array}{cc}901 & 0 \\ 902 & 0 \\ 903 & 0 \\ 904 & 0 \\ 904 & 0 \\ & 0\end{array}$
None
None

Dist_Rev
None

None

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Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 78 | I. OPERATING AND MAINTENANCE EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 79 | B. TRANSMISSION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 80 | POLR Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 81 | Transmission Expense |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 82 | Transmission Expense |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |
| 84 | C. DISTRIBUTION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 85 | Ops Supv \& Engineering | 580 | 1,250 | SecC-Lab | 12 | 2 | 0 | 0 | 0 | 196 | 9 |
| 86 | Load Dispatching | 581 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 87 | Station Expenses | 582 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 88 | OH Line Expenses | 583 | 105 | Avg-Cust-NonNet | 0 | 0 | 0 | 0 | 0 | 0 | 1 |
| 89 | UG Line Expenses | 584 | 32 | SecC-UG | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 90 | Meter Expenses | 586 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 91 | Customer Installation Expenses | 587 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 92 | Misc. Distribution Expenses | 588 | 2,376 | SecC -Pt | 54 | 11 | 1 | 0 | 0 | 151 | 15 |
| 93 | Rents | 589 | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 94 | Maint Supv \& Engineering | 590 | (31) | SecC-Lab | (0) | (0) | (0) | (0) | (0) | (5) | (0) |
| 95 | Maint of Structures | 591 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 96 | Maint of Station Equip | 592 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 97 | Maint of OH Lines | 593 | 4,588 | Avg-Cust-NonNet | 5 | 1 | 0 | 0 | 0 | 7 | 43 |
| 98 | Maint of UG Lines | 594 | 117 | SecC-UG | 1 | 0 | 0 | 0 | 0 | 0 | 1 |
| 99 | Maint of Line Transformers | 595 | 20 | $\mathrm{SecC-LTr}$ | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 100 | Maint of Lighting | 596 | 555 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 555 | 0 |
| 101 | Maint of Meters | 597 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 102 | Maint of Misc. Plant | 599 | 17 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 1 | 0 |
| 103 | Oper. \& Maint. Exp. | 500-599 | 9,029 |  | 74 | 15 | 1 | 0 | 0 | 906 | 68 |
| 104 |  |  | 9,029 |  | 74 | 15 | 1 | 0 | 0 | 906 | 68 |
| 105 | D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |
| 106 | Supervision | 901 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 107 | Meter Reading Exp | 902 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 108 | Customer Records \& Coll | 903 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 109 | Uncollectible Accounts | 904 | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 110 | COVID Uncol, LPC | 904 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 111 | Customer Accts. Exp. | 901-905 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 112 |  |  |  |  |  |  |  |  |  |  |  |
| 113 | Customer Assistance | 908 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 114 | COVID Relief | 908 CV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 115 | Customer Service Exp. | 908-916 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 116 | Customer Accts. \& Serv. Exp. | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | $\mathbf{G M}<25$ | GM>25 | GMH<25 | GMH>25 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 5,845 | SecC-Lab | 3,948 | 318 | 47 | 199 | 174 | 96 | 25 | 14 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 505 | SecC-Lab | 341 | 27 | 4 | 17 | 15 | 8 | 2 | 1 |
| 122 | Outside Services- Cust Care | 923 CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 179 | SecC-Lab | 121 | 10 | 1 | 6 | 5 | 3 | 1 | 0 |
| 124 | Outside Services- Other | 923 | 2,422 | SecC-Lab | 1,636 | 132 | 20 | 82 | 72 | 40 | 10 | 6 |
| 125 | Property Insurance | 924 | 1,048 | SecC-Pt | 764 | 61 | 9 | 37 | 35 | 28 | 5 | 5 |
| 126 | Injuries \& Damages | 925 | 21 | SecC-Lab | 14 | 1 | 0 | 1 | 1 | 0 | 0 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 458 | SecC-Lab | 309 | 25 | 4 | 16 | 14 | 7 | 2 | 1 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930 EV | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 681 | SecC-Lab | 460 | 37 | 5 | 23 | 20 | 11 | 3 | 2 |
| 132 | General Plant Rent | 931 | 359 | SecC-Lab | 243 | 20 | 3 | 12 | 11 | 6 | 2 | 1 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 1,048 | SecC-Lab | 708 | 57 | 8 | 36 | 31 | 17 | 4 | 2 |
| 135 | Admin \& Genl. Exp. | 920-932 | 12,566 |  | 8,544 | 687 | 102 | 429 | 378 | 217 | 55 | 32 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 21,595 |  | 15,090 | 1,214 | 180 | 757 | 660 | 361 | 94 | 51 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 773 | SecC-Pt | 564 | 45 | 7 | 28 | 25 | 21 | 4 | 3 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 2,559 | Avg-Cust-NonNet | 2,103 | 169 | 25 | 105 | 84 | 28 | 10 | 3 |
| 148 | OH Conductors and Devices | 403 | 3,227 | Avg-Cust-NonNet | 2,652 | 213 | 32 | 132 | 107 | 35 | 13 | 3 |
| 149 | UG Conduits | 403 | 160 | SecC-UG | 114 | 9 | 1 | 9 | 12 | 7 | 3 | 1 |
| 150 | UG Conductors | 403 | 651 | SecC-UG | 463 | 37 | 6 | 36 | 50 | 28 | 13 | 5 |
| 151 | Line Transformers | 403 | 11,620 | SecC-LTr | 8,553 | 688 | 102 | 381 | 362 | 546 | 59 | 97 |
| 152 | Services | 403 | 2,403 | Services_Cost | 1,977 | 159 | 24 | 101 | 93 | 31 | 12 | 3 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

Duquesne Light Company

## JSS / Class ACOS Study

## Fully Projected Future Test Year

## Class Allocation- Secondary Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GENERAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 5,845 | SecC-Lab | 55 | 11 | 1 | 0 | 0 | 919 | 40 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 121 | Office Supp \& Exp- Other | 921 | 505 | SecC-Lab | 5 | 1 | 0 | 0 | 0 | 79 | 3 |
| 122 | Outside Services- Cust Care | 923CC | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 123 | Outside Services- HR | 923M | 179 | SecC-Lab | 2 | 0 | 0 | 0 | 0 | 28 | 1 |
| 124 | Outside Services- Other | 923 | 2,422 | SecC-Lab | 23 | 5 | 0 | 0 | 0 | 381 | 17 |
| 125 | Property Insurance | 924 | 1,048 | SecC-Pt | 24 | 5 | 0 | 0 | 0 | 67 | 7 |
| 126 | Injuries \& Damages | 925 | 21 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 3 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 458 | SecC-Lab | 4 | 1 | 0 | 0 | 0 | 72 | 3 |
| 128 | Regulatory Commission | 928 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 129 | A\&G-EV | 930 EV | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 681 | SecC-Lab | 6 | 1 | 0 | 0 | 0 | 107 | 5 |
| 132 | General Plant Rent | 931 | 359 | SecC-Lab | 3 | 1 | 0 | 0 | 0 | 56 | 2 |
| 133 | Misc Genl Plant- Metering | 935M | 0 | SecC-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 1,048 | SecC-Lab | 10 | 2 | 0 | 0 | 0 | 165 | 7 |
| 135 | Admin \& Genl. Exp. | 920-932 | 12,566 |  | 131 | 27 | 3 | 0 | 0 | 1,876 | 85 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 21,595 |  | 206 | 42 | 4 | 0 | 0 | 2,783 | 153 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 773 | SecC-Pt | 18 | 4 | 0 | 0 | 0 | 49 | 5 |
| 141 | Intangible- Customers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 142 | Intangible- AMI | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 2,559 | Avg-Cust-NonNet | 3 | 0 | 0 | 0 | 0 | 4 | 24 |
| 148 | OH Conductors and Devices | 403 | 3,227 | Avg-Cust-NonNet | 4 | 0 | 0 | 0 | 0 | 5 | 30 |
| 149 | UG Conduits | 403 | 160 | SecC-UG | 2 | 0 | 0 | 0 | 0 | 0 | 1 |
| 150 | UG Conductors | 403 | 651 | SecC-UG | 8 | 2 | 0 | 0 | 0 | 0 | 3 |
| 151 | Line Transformers | 403 | 11,620 | SecC-LTr | 598 | 126 | 12 | 0 | 0 | 14 | 82 |
| 152 | Services | 403 | 2,403 | Services_Cost | 3 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 2,318 | SecC-Lab | 1,565 | 126 | 19 | 79 | 69 | 38 | 10 | 5 |
| 156 | Depr / Amort-EV | 403EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 2,900 | SecC-Pt | 2,115 | 170 | 25 | 104 | 96 | 79 | 15 | 13 |
| 159 | Depreciation Expense | 403 | 27,889 |  | 20,107 | 1,618 | 240 | 974 | 898 | 813 | 138 | 135 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 764 | SecC-Lab | 516 | 42 | 6 | 26 | 23 | 13 | 3 | 2 |
| 164 | PURTA, Real estate | 408.16 | 261 | SecC-Pt | 190 | 15 | 2 | 9 | 9 | 7 | 1 | 1 |
| 165 | Capital stock |  | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 1,025 |  | 706 | 57 | 8 | 35 | 31 | 20 | 5 | 3 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 5,176 | Dist_Rev | 2,747 | 264 | 30 | 110 | 312 | 653 | 34 | 55 |
| 171 | Gross Receipts Tax |  | 5,176 |  | 2,747 | 264 | 30 | 110 | 312 | 653 | 34 | 55 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 1,497 | SecC-PreTax | 418 | 64 | 3 | 3 | 152 | 409 | 14 | 31 |
| 175 | Federal Income Tax Expense |  | 2,967 | SecC-PreTax | 828 | 126 | 6 | 5 | 302 | 811 | 27 | 61 |
| 176 | Income Taxes | 409-411 | 4,464 |  | 1,246 | 190 | 10 | 8 | 455 | 1,220 | 41 | 92 |
| 177 | Total Taxes | 408-411 | 10,665 |  | 4,699 | 510 | 49 | 153 | 798 | 1,892 | 80 | 150 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 60,148 |  | 39,896 | 3,342 | 469 | 1,884 | 2,356 | 3,066 | 311 | 336 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Rat |  |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 86,521 | Dist_Rev | 45,928 | 4,407 | 508 | 1,835 | 5,213 | 10,921 | 566 | 926 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 361 | Dist_Rev | 192 | 18 | 2 | 8 | 22 | 46 | 2 | 4 |
| 187 | Rent For Electric Property |  | 2,280 | Avg-Cust | 1,871 | 151 | 22 | 94 | 76 | 26 | 9 | 2 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 89,163 |  | 47,992 | 4,576 | 532 | 1,937 | 5,311 | 10,992 | 578 | 932 |
| 190 |  |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 60,148 |  | 39,896 | 3,342 | 469 | 1,884 | 2,356 | 3,066 | 311 | 336 |
| 192 | V. NET INCOME at Present Rates |  | 29,014 |  | 8,095 | 1,234 | 64 | 53 | 2,955 | 7,926 | 267 | 596 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

Exhibit 6-7C
Page 9 of 12

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 154 | Street Lighting | 403 | 1,279 | StLgt-Cost | 0 | 0 | 0 | 0 | 0 | 1,279 | 0 |
| 155 | General / Common Plant | 364 | 2,318 | SecC-Lab | 22 | 4 | 0 | 0 | 0 | 364 | 16 |
| 156 | Depr / Amort-EV | 403 EV | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 2,900 | SecC-Pt | 66 | 14 | 1 | 0 | 0 | 184 | 18 |
| 159 | Depreciation Expense | 403 | 27,889 |  | 723 | 150 | 14 | 0 | 0 | 1,900 | 179 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 764 | SecC-Lab | 7 | 1 | 0 | 0 | 0 | 120 | 5 |
| 164 | PURTA, Real estate | 408.16 | 261 | SecC-Pt | 6 | 1 | 0 | 0 | 0 | 17 | 2 |
| 165 | Capital stock |  | 0 | $\mathrm{SecC}-\mathrm{Pt}$ | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | SecC-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 1,025 |  | 13 | 3 | 0 | 0 | 0 | 137 | 7 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 5,176 | Dist_Rev | 606 | 68 | 176 | 3 | 14 | 94 | 10 |
| 171 | Gross Receipts Tax |  | 5,176 |  | 606 | 68 | 176 | 3 | 14 | 94 | 10 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 1,497 | SecC-PreTax | 385 | 39 | 123 | 2 | 10 | (149) | (7) |
| 175 | Federal Income Tax Expense |  | 2,967 | SecC-PreTax | 764 | 77 | 244 | 4 | 20 | (296) | (13) |
| 176 | Income Taxes | 409-411 | 4,464 |  | 1,150 | 116 | 367 | 6 | 30 | (445) | (20) |
| 177 | Total Taxes | 408-411 | 10,665 |  | 1,769 | 187 | 543 | 9 | 44 | (215) | (3) |
| 178 |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 60,148 |  | 2,697 | 379 | 561 | 9 | 44 | 4,468 | 329 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Ra |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 86,521 | Dist_Rev | 10,125 | 1,131 | 2,934 | 51 | 234 | 1,566 | 175 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 186 | Misc Service Revenue |  | 361 | Dist_Rev | 42 | 5 | 12 | 0 | 1 | 7 | 1 |
| 187 | Rent For Electric Property |  | 2,280 | Avg-Cust | 3 | 0 | 0 | 0 | 0 | 4 | 21 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 89,163 |  | 10,170 | 1,136 | 2,947 | 51 | 235 | 1,576 | 197 |
| 190 |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 60,148 |  | 2,697 | 379 | 561 | 9 | 44 | 4,468 | 329 |
| 192 | V. NET INCOME at Present Rates |  | 29,014 |  | 7,473 | 757 | 2,386 | 42 | 192 | $(2,893)$ | (132) |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 86,521 |  | 45,928 | 4,407 | 508 | 1,835 | 5,213 | 10,921 | 566 | 926 |
| 197 | Other Operating Revenues | 450-456 | 2,642 |  | 2,063 | 169 | 24 | 102 | 98 | 71 | 12 | 6 |
| 198 | Total Operating Revenues |  | 89,163 |  | 47,992 | 4,576 | 532 | 1,937 | 5,311 | 10,992 | 578 | 932 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 9,029 |  | 6,547 | 527 | 78 | 328 | 282 | 144 | 39 | 20 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 12,566 |  | 8,544 | 687 | 102 | 429 | 378 | 217 | 55 | 32 |
| 204 | Total Operating Expenses |  | 21,595 |  | 15,090 | 1,214 | 180 | 757 | 660 | 361 | 94 | 51 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 27,889 |  | 20,107 | 1,618 | 240 | 974 | 898 | 813 | 138 | 135 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 6,201 |  | 3,454 | 320 | 39 | 145 | 343 | 673 | 38 | 58 |
| 208 | INCOME BEFORE INCOME TAXES |  | 33,478 |  | 9,341 | 1,424 | 73 | 61 | 3,409 | 9,146 | 308 | 688 |
| 209 | Income Taxes | 409-411 | 4,464 |  | 1,246 | 190 | 10 | 8 | 455 | 1,220 | 41 | 92 |
| 210 | NET INCOME |  | 29,014 |  | 8,095 | 1,234 | 64 | 53 | 2,955 | 7,926 | 267 | 596 |
| 211 | RATE BASE |  | 477,459 |  | 358,123 | 28,814 | 4,274 | 17,561 | 16,222 | 13,361 | 2,474 | 2,174 |
| 212 | Return on Rate Base |  | 6.08\% |  |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 477,459 |  | 358,123 | 28,814 | 4,274 | 17,561 | 16,222 | 13,361 | 2,474 | 2,174 |
| 217 |  |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 21,595 |  | 15,090 | 1,214 | 180 | 757 | 660 | 361 | 94 | 51 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 27,889 |  | 20,107 | 1,618 | 240 | 974 | 898 | 813 | 138 | 135 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 1,025 |  | 706 | 57 | 8 | 35 | 31 | 20 | 5 | 3 |
| 223 | Subtotal- Operating Costs to recover |  | 50,508 |  | 35,903 | 2,889 | 428 | 1,767 | 1,590 | 1,193 | 236 | 189 |
| 224 |  |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 37,433 |  | 28,077 | 2,259 | 335 | 1,377 | 1,272 | 1,048 | 194 | 170 |
| 226 | Income taxes to recover |  | 8,754 | 23.38\% | 6,566 | 528 | 78 | 322 | 297 | 245 | 45 | 40 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 96,695 |  | 70,546 | 5,676 | 842 | 3,465 | 3,159 | 2,486 | 475 | 399 |
| 229 | GRT needed |  | 5,921 | 6.12\% | 4,320 | 348 | 52 | 212 | 193 | 152 | 29 | 24 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 102,616 |  | 74,866 | 6,024 | 893 | 3,677 | 3,352 | 2,638 | 505 | 424 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Secondary Customer

SecnCus
Class Allocation- Secondary Customer
CAl
Exh 6-7C

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 86,521 |  | 10,125 | 1,131 | 2,934 | 51 | 234 | 1,566 | 175 |
| 197 | Other Operating Revenues | 450-456 | 2,642 |  | 45 | 5 | 12 | 0 | 1 | 10 | 22 |
| 198 | Total Operating Revenues |  | 89,163 |  | 10,170 | 1,136 | 2,947 | 51 | 235 | 1,576 | 197 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission 58 | 580-599 | 9,029 |  | 74 | 15 | 1 | 0 | 0 | 906 | 68 |
| 202 | Customer Acctg \& Service | 901-919 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 203 | Admin \& General | 920-932 | 12,566 |  | 131 | 27 | 3 | 0 | 0 | 1,876 | 85 |
| 204 | Total Operating Expenses |  | 21,595 |  | 206 | 42 | 4 | 0 | 0 | 2,783 | 153 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 27,889 |  | 723 | 150 | 14 | 0 | 0 | 1,900 | 179 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 6,201 |  | 619 | 70 | 176 | 3 | 14 | 230 | 17 |
| 208 | INCOME BEFORE INCOME TAXES |  | 33,478 |  | 8,622 | 873 | 2,753 | 48 | 221 | $(3,338)$ | (152) |
| 209 | Income Taxes | 409-411 | 4,464 |  | 1,150 | 116 | 367 | 6 | 30 | (445) | (20) |
| 210 | NET INCOME |  | 29,014 |  | 7,473 | 757 | 2,386 | 42 | 192 | $(2,893)$ | (132) |
| 211 | RATE BASE |  | 477,459 |  | 11,210 | 2,325 | 217 | 0 | 1 | 17,677 | 3,024 |
| 212 | Return on Rate Base |  | 6.08\% |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 477,459 |  | 11,210 | 2,325 | 217 | 0 | 1 | 17,677 | 3,024 |
| 217 |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 21,595 |  | 206 | 42 | 4 | 0 | 0 | 2,783 | 153 |
| 219 | Uncollectibles expense |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 220 | Depreciation expense |  | 27,889 |  | 723 | 150 | 14 | 0 | 0 | 1,900 | 179 |
| 221 | Regulatory Commission Expenses |  | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 222 | General taxes / Other |  | 1,025 |  | 13 | 3 | 0 | 0 | 0 | 137 | 7 |
| 223 | Subtotal- Operating Costs to recover |  | 50,508 |  | 942 | 195 | 18 | 0 | 0 | 4,820 | 339 |
| 224 |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 37,433 |  | 879 | 182 | 17 | 0 | 0 | 1,386 | 237 |
| 226 | Income taxes to recover |  | 8,754 | 23.38\% | 206 | 43 | 4 | 0 | 0 | 324 | 55 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 96,695 |  | 2,026 | 420 | 39 | 0 | 0 | 6,530 | 631 |
| 229 | GRT needed |  | 5,921 | 6.12\% | 124 | 26 | 2 | 0 | 0 | 400 | 39 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 102,616 |  | 2,150 | 445 | 42 | 0 | 0 | 6,930 | 670 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Secondary Customer

BillCus
Class Allocation- Billing Customer CAl
Exh 6-7D

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 12 | Bill-Pt | 8 | 1 | 0 | 0 | 1 | 1 | 0 | 0 |
| 4 | SW- Plant/ OM | 303P | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303C | 219,001 | Avg-Cust | 179,742 | 14,462 | 2,145 | 9,036 | 7,322 | 2,454 | 908 | 232 |
| 6 | SW- Labor-related | 303L | 0 | Bill-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 62,331 | AMI_Cost | 41,055 | 3,289 | 488 | 2,128 | 8,408 | 4,862 | 967 | 427 |
| 8 | Software- RB / CIP/Cyber | 303F | 3,996 | Bill-Pt | 2,638 | 264 | 27 | 117 | 324 | 474 | 38 | 43 |
| 9 | Intangible Plant |  | 285,340 |  | 223,442 | 18,016 | 2,660 | 11,282 | 16,055 | 7,791 | 1,913 | 702 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 22 | OH Conductors and Devices | 365 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 23 | UG Conduits- Radial | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 24 | UG Conduits- Network | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 25 | UG Conduits- URD | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 27 | UG Conductors- Network | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 28 | UG Conductors- URD | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 30 | Line Transformers- Radial | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 31 | Line Transformers- Network | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 32 | Line Transformers- URD | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 151,169 | Acct370 | 92,079 | 7,376 | 1,094 | 4,773 | 16,665 | 22,109 | 1,916 | 1,942 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 151,169 |  | 92,079 | 7,376 | 1,094 | 4,773 | 16,665 | 22,109 | 1,916 | 1,942 |

BillCus
Class Allocation- Billing Customer CAl
Exh 6-7D

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | I. ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |  |  |  |  |
| 2 | INTANGIBLE PLANT |  |  |  |  |  |  |  |  |  |  |
| 3 | Organization / Franchise | $301 / 302$ | 12 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 4 | SW- Plant/ OM | 303P | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 5 | SW- Customer-related | 303 C | 219,001 | Avg-Cust | 267 | 32 | 7 | 3 | 0 | 349 | 2,040 |
| 6 | SW- Labor-related | 303L | 0 | Bill-Lab | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 7 | SW- AMI | 303AMI | 62,331 | AMI_Cost | 597 | 71 | 32 | 7 | 0 | 0 | 0 |
| 8 | Software- RB / CIP/Cyber | 303F | 3,996 | Bill-Pt | 59 | 7 | 4 | 1 | 0 | 0 | 0 |
| 9 | Intangible Plant |  | 285,340 |  | 923 | 110 | 43 | 11 | 0 | 349 | 2,040 |
| 10 |  |  |  |  |  |  |  |  |  |  |  |
| 11 | C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| 12 | Transmission Plant | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 13 | Transmission Plant | 350-359 | 0 |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 14 |  |  |  |  |  |  |  |  |  |  |  |
| 15 | D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| 16 | Land and Land Rights | 360 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 17 | Structures and Improvements | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 18 | Direct Assignment | 361 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 19 | Station Equipment | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 20 | Station Equipment- Network | 362 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 21 | Poles, Towers and Fixtures | 364 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 22 | OH Conductors and Devices | 365 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 23 | UG Conduits- Radial | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 24 | UG Conduits- Network | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 25 | UG Conduits- URD | 366 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 26 | UG Conductors- Radial | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 27 | UG Conductors- Network | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 28 | UG Conductors- URD | 367 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 29 | Line Transformers- OH | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 30 | Line Transformers- Radial | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 31 | Line Transformers- Network | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 32 | Line Transformers- URD | 368 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 33 | Services | 369 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 34 | Meters | 370 | 151,169 | Acct370 | 2,715 | 323 | 146 | 31 | 0 | 0 | 0 |
| 35 | Street Lighting | 373 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | ARO- Dist Plant | ARO | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 37 | Distribution Plant | 360-373 | 151,169 |  | 2,715 | 323 | 146 | 31 | 0 | 0 | 0 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH>25 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 139,451 | Bill-Lab | 100,143 | 11,881 | 899 | 3,751 | 6,916 | 12,200 | 849 | 1,139 |
| 41 | General Plant-EV | 390EV | 1,081 | EV_390 | 312 | 37 | 4 | 39 | 104 | 261 | 12 | 24 |
| 42 | General Plant | 389-399 | 140,532 |  | 100,454 | 11,918 | 903 | 3,790 | 7,020 | 12,461 | 861 | 1,163 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 577,041 |  | 415,975 | 37,310 | 4,657 | 19,845 | 39,740 | 42,362 | 4,690 | 3,806 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 184,575 | Bill-IntPt | 144,536 | 11,654 | 1,721 | 7,298 | 10,385 | 5,040 | 1,238 | 454 |
| 48 | Transmission Plant | 108.3 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 53 | OH Conductors and Devices | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 54 | UG Conduits | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 55 | UG Conductors | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 56 | Line Transformers | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 42,906 | Acct370 | 26,135 | 2,094 | 311 | 1,355 | 4,730 | 6,275 | 544 | 551 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 143 | EV_Depr | 62 | 7 | 1 | 4 | 10 | 26 | 1 | 2 |
| 61 | General | 108.6 | 58,717 | Bill-Lab | 42,165 | 5,003 | 379 | 1,580 | 2,912 | 5,137 | 357 | 479 |
| 62 | Depreciation Reserve | 108 | 286,340 |  | 212,898 | 18,757 | 2,411 | 10,236 | 18,038 | 16,478 | 2,140 | 1,487 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 20,343 | Bill-OM | 15,018 | 1,887 | 127 | 522 | 862 | 1,431 | 107 | 137 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 3,677 | Bill-Pt | 2,427 | 243 | 25 | 108 | 299 | 436 | 35 | 39 |
| 68 | Capitalized Pension |  | 10,501 | Bill-Pt | 6,931 | 695 | 72 | 308 | 853 | 1,245 | 100 | 112 |
| 69 | Customer Deposits |  | $(11,163)$ | CustDeposits | $(6,640)$ | (831) | (58) | (658) | $(1,099)$ | $(1,208)$ | (102) | (110) |
| 70 | ADIT-EV |  | (53) | EV_390 | (15) | (2) | (0) | (2) | (5) | (13) | (1) | (1) |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(22,538)$ | Bill-Pt | $(14,876)$ | $(1,491)$ | (154) | (662) | $(1,830)$ | $(2,671)$ | (215) | (240) |
| 73 | ADIT- General | 182 | $(7,902)$ | Bill-Lab | $(5,674)$ | (673) | (51) | (213) | (392) | (691) | (48) | (65) |
| 74 | Other Rate Base | 131-283 | $(7,133)$ |  | $(2,828)$ | (172) | (39) | (596) | $(1,313)$ | $(1,473)$ | (123) | (127) |
| 75 |  |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 283,568 |  | 200,249 | 18,381 | 2,208 | 9,014 | 20,390 | 24,411 | 2,427 | 2,192 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 139,451 | Bill-Lab | 1,424 | 158 | 69 | 15 | 0 | 1 | 6 |
| 41 | General Plant-EV | 390EV | 1,081 | EV_390 | 199 | 27 | 63 | 0 | 0 | 0 | 0 |
| 42 | General Plant | 389-399 | 140,532 |  | 1,623 | 185 | 133 | 15 | 0 | 1 | 6 |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 577,041 |  | 5,261 | 618 | 322 | 56 | 0 | 350 | 2,046 |
| 45 |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 184,575 | Bill-IntPt | 597 | 71 | 28 | 7 | 0 | 226 | 1,320 |
| 48 | Transmission Plant | 108.3 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 49 | Structures and Improvements | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 50 | Direct Assignment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 51 | Station Equipment | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 52 | Poles, Towers and Fixtures | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 53 | OH Conductors and Devices | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 54 | UG Conduits | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 55 | UG Conductors | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 56 | Line Transformers | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 57 | Services | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 58 | Meters | 108.5 | 42,906 | Acct370 | 770 | 92 | 41 | 9 | 0 | 0 | 0 |
| 59 | Street Lighting | 108.5 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 60 | EV Assets | 108EV | 143 | EV_Depr | 20 | 3 | 6 | 0 | 0 | 0 | 0 |
| 61 | General | 108.6 | 58,717 | Bill-Lab | 600 | 66 | 29 | 6 | 0 | 0 | 3 |
| 62 | Depreciation Reserve | 108 | 286,340 |  | 1,987 | 232 | 105 | 22 | 0 | 226 | 1,322 |
| 63 |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 20,343 | Bill-OM | 189 | 21 | 17 | 2 | 0 | 9 | 14 |
| 66 | Cash Working Capital- Supp | 131 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 67 | Materials \& Supplies |  | 3,677 | Bill-Pt | 55 | 6 | 4 | 1 | 0 | 0 | 0 |
| 68 | Capitalized Pension |  | 10,501 | Bill-Pt | 156 | 18 | 10 | 2 | 0 | 0 | 0 |
| 69 | Customer Deposits |  | $(11,163)$ | CustDeposits | (457) | 0 | 0 | 0 | (0) | (0) | 0 |
| 70 | ADIT-EV |  | (53) | EV_390 | (10) | (1) | (3) | 0 | 0 | 0 | 0 |
| 71 | ADIT- Transmission | 154 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 72 | ADIT- Distribution | 154 | $(22,538)$ | Bill-Pt | (335) | (39) | (22) | (4) | (0) | (0) | (0) |
| 73 | ADIT- General | 182 | $(7,902)$ | Bill-Lab | (81) | (9) | (4) | (1) | (0) | (0) | (0) |
| 74 | Other Rate Base | 131-283 | $(7,133)$ |  | (482) | (4) | 2 | (1) | 0 | 9 | 13 |
| 75 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 283,568 |  | 2,791 | 382 | 219 | 34 | 0 | 133 | 737 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

## I. OPERATING AND MAINTENANCE EXPENSES

## B. TRANSMISSION EXPENSE

POLR Expense

Transmission Expense
Transmission Expense

| 0 |
| :---: |
| 0 |
| 0 |

None
None
Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

## C. DISTRIBUTION EXPENSE

| Ops Supv \& Engineering | 580 | 3,080 |
| :--- | :---: | ---: |
| Load Dispatching | 581 | 0 |
| Station Expenses | 582 | 0 |
| OH Line Expenses | 583 | 0 |
| UG Line Expenses | 584 | 0 |
| Meter Expenses | 586 | 4,051 |
| Customer Installation Expenses | 587 | 2 |
| Misc. Distribution Expenses | 588 | 462 |
| Rents | 589 | 0 |
| Maint Supv \& Engineering | 590 | $(5)$ |
| Maint of Structures | 591 | 0 |
| Maint of Station Equip | 592 | 0 |
| Maint of OH Lines | 593 | 0 |
| Maint of UG Lines | 594 | 0 |
| Maint of Line Transformers | 595 | 0 |
| Maint of Lighting | 596 | 0 |
| Maint of Meters | 597 | 391 |
| Maint of Misc. Plant | 599 | 3 |
| Oper. \& Maint. Exp. | $500-599$ | 7,984 |
|  |  | 7,984 |

Bill-Lab
None
None
None
None
Meter_Tech
Avg-Cust
Bill-Pt
Bill-Pt
Bill-Lab
None
None
None
None
None
None
Meter_Tech
Bill-Pt

| 2,212 | 262 | 20 | 83 | 153 | 269 | 19 | 25 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 2,048 | 164 | 24 | 106 | 445 | 983 | 51 | 86 |
| 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 305 | 31 | 3 | 14 | 38 | 55 | 4 | 5 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| (4) | (0) | (0) | (0) | (0) | (0) | (0) | (0) |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 198 | 16 | 2 | 10 | 43 | 95 | 5 | 8 |
| 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 4,762 | 473 | 50 | 213 | 678 | 1,403 | 79 | 125 |
| 4,762 | 473 | 50 | 213 | 678 | 1,403 | 79 | 125 |
| 10,554 | 1,367 | 86 | 353 | 306 | 281 | 42 | 34 |
| 276 | 22 | 3 | 14 | 13 | 4 | 1 | 0 |
| 984 | 127 | 8 | 33 | 28 | 26 | 4 | 3 |
| 11,324 | 1,913 | 58 | 226 | 221 | 420 | 36 | 54 |
| 2,335 | 395 | 12 | 47 | 46 | 87 | 7 | 11 |
| 25,472 | 3,824 | 167 | 673 | 614 | 819 | 91 | 102 |

Customer Assistance 908165 Avg-Cust
COVID Relief
Customer Service Exp.

| 908 CV | 1,453 |
| :---: | ---: |
| $908-916$ | 1,618 |
| $901-919$ | 33,478 |


| Acct901903 | 10,554 | 1,367 | 86 | 353 | 306 | 281 | 42 | 34 |
| :---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Meters | 276 | 22 | 3 | 14 | 13 | 4 | 1 | 0 |
| Acct901903 | 984 | 127 | 8 | 33 | 28 | 26 | 4 | 3 |
| Write-Offs | 11,324 | 1,913 | 58 | 226 | 221 | 420 | 36 | 54 |
| Write-Offs | 2,335 | 395 | 12 | 47 | 46 | 87 | 7 | 11 |
|  | 25,472 | 3,824 | 167 | 673 | 614 | 819 | 91 | 102 |
| Avg-Cust |  |  |  |  |  |  |  |  |
| 908CV | 135 | 11 | 2 | 7 | 6 | 2 | 1 | 0 |
|  | 1,117 | 90 | 13 | 37 | 93 | 88 | 9 | 7 |
|  | 1,252 | 101 | 15 | 44 | 98 | 90 | 9 | 100 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D


Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Billing Customer

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 20,963 | Bill-Lab | 15,054 | 1,786 | 135 | 564 | 1,040 | 1,834 | 128 | 171 |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Bills | 2,403 | 193 | 29 | 121 | 98 | 33 | 12 | 3 |
| 121 | Office Supp \& Exp- Other | 921 | 1,811 | Bill-Lab | 1,300 | 154 | 12 | 49 | 90 | 158 | 11 | 15 |
| 122 | Outside Services- Cust Care | 923CC | 2,017 | Avg-Cust | 1,655 | 133 | 20 | 83 | 67 | 23 | 8 | 2 |
| 123 | Outside Services- HR | 923M | 643 | Bill-Lab | 462 | 55 | 4 | 17 | 32 | 56 | 4 | 5 |
| 124 | Outside Services- Other | 923 | 8,686 | Bill-Lab | 6,237 | 740 | 56 | 234 | 431 | 760 | 53 | 71 |
| 125 | Property Insurance | 924 | 725 | Bill-Pt | 479 | 48 | 5 | 21 | 59 | 86 | 7 | 8 |
| 126 | Injuries \& Damages | 925 | 75 | Bill-Lab | 54 | 6 | 0 | 2 | 4 | 7 | 0 | 1 |
| 127 | Empl Pensions \& Benefits | 926 | 1,641 | Bill-Lab | 1,179 | 140 | 11 | 44 | 81 | 144 | 10 | 13 |
| 128 | Regulatory Commission | 928 | 813 | Dist_Rev | 432 | 41 | 5 | 17 | 49 | 103 | 5 | 9 |
| 129 | A\&G-EV | 930EV | 350 | EV_930 | 134 | 16 | 2 | 11 | 28 | 71 | 3 | 7 |
| 130 | Marketing, Communications | 930.1 | 34 | Avg-Cust | 28 | 2 | 0 | 1 | 1 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 2,441 | Bill-Lab | 1,753 | 208 | 16 | 66 | 121 | 214 | 15 | 20 |
| 132 | General Plant Rent | 931 | 1,288 | Bill-Lab | 925 | 110 | 8 | 35 | 64 | 113 | 8 | 11 |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Meter_Cost | 507 | 41 | 6 | 26 | 92 | 122 | 11 | 11 |
| 134 | Misc Genl Plant- Other | 935P | 3,758 | Bill-Lab | 2,699 | 320 | 24 | 101 | 186 | 329 | 23 | 31 |
| 135 | Admin \& Genl. Exp. | 920-932 | 49,007 |  | 35,301 | 3,994 | 332 | 1,392 | 2,443 | 4,051 | 298 | 376 |
| 136 ( |  |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 90,469 |  | 66,788 | 8,391 | 565 | 2,322 | 3,833 | 6,362 | 478 | 610 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 10,731 | Bill-Pt | 7,083 | 710 | 73 | 315 | 871 | 1,272 | 102 | 114 |
| 141 | Intangible- Customers | 403 | 34,285 | Avg-Cust | 28,139 | 2,264 | 336 | 1,415 | 1,146 | 384 | 142 | 36 |
| 142 | Intangible- AMI | 403 | 9,758 | AMI_Cost | 6,427 | 515 | 76 | 333 | 1,316 | 761 | 151 | 67 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 148 | OH Conductors and Devices | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 149 | UG Conduits | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 150 | UG Conductors | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 151 | Line Transformers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 10,613 | Acct370 | 6,464 | 518 | 77 | 335 | 1,170 | 1,552 | 135 | 136 |
| 154 | Street Lighting | 403 | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 8,312 | Bill-Lab | 5,969 | 708 | 54 | 224 | 412 | 727 | 51 | 68 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Billing Customer

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 117 |  |  |  |  |  |  |  |  |  |  |  |
| 118 | E. ADMINISTRATIVE AND GE | RAL |  |  |  |  |  |  |  |  |  |
| 119 | Admin \& Gen Salaries | 920 | 20,963 | Bill-Lab | 214 | 24 | 10 | 2 | 0 | 0 | 1 |
| 120 | Office Supp \& Exp- Bill Print | 921Bill | 2,928 | Bills | 4 | 0 | 0 | 0 | 0 | 5 | 27 |
| 121 | Office Supp \& Exp- Other | 921 | 1,811 | Bill-Lab | 18 | 2 | 1 | 0 | 0 | 0 | 0 |
| 122 | Outside Services- Cust Care | 923 CC | 2,017 | Avg-Cust | 2 | 0 | 0 | 0 | 0 | 3 | 19 |
| 123 | Outside Services- HR | 923M | 643 | Bill-Lab | 7 | 1 | 0 | 0 | 0 | 0 | 0 |
| 124 | Outside Services- Other | 923 | 8,686 | Bill-Lab | 89 | 10 | 4 | 1 | 0 | 0 | 0 |
| 125 | Property Insurance | 924 | 725 | Bill-Pt | 11 | 1 | 1 | 0 | 0 | 0 | 0 |
| 126 | Injuries \& Damages | 925 | 75 | Bill-Lab | 1 | 0 | 0 | 0 | 0 | 0 | 0 |
| 127 | Empl Pensions \& Benefits | 926 | 1,641 | Bill-Lab | 17 | 2 | 1 | 0 | 0 | 0 | 0 |
| 128 | Regulatory Commission | 928 | 813 | Dist_Rev | 95 | 11 | 28 | 0 | 2 | 15 | 2 |
| 129 | A\&G-EV | 930 EV | 350 | EV_930 | 54 | 7 | 17 | 0 | 0 | 0 | 0 |
| 130 | Marketing, Communications | 930.1 | 34 | Avg-Cust | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 131 | Misc. General Plant | 930.2 | 2,441 | Bill-Lab | 25 | 3 | 1 | 0 | 0 | 0 | 0 |
| 132 | General Plant Rent | 931 | 1,288 | Bill-Lab | 13 | 1 | 1 | 0 | 0 | 0 | 0 |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Meter_Cost | 15 | 2 | 1 | 0 | 0 | 0 | 0 |
| 134 | Misc Genl Plant- Other | 935P | 3,758 | Bill-Lab | 38 | 4 | 2 | 0 | 0 | 0 | 0 |
| 135 | Admin \& Genl. Exp. | 920-932 | 49,007 |  | 603 | 69 | 67 | 5 | 2 | 23 | 50 |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 90,469 |  | 841 | 91 | 76 | 7 | 2 | 40 | 62 |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 10,731 | Bill-Pt | 160 | 19 | 10 | 2 | 0 | 0 | 0 |
| 141 | Intangible- Customers | 403 | 34,285 | Avg-Cust | 42 | 5 | 1 | 1 | 0 | 55 | 319 |
| 142 | Intangible- AMI | 403 | 9,758 | AMI_Cost | 93 | 11 | 5 | 1 | 0 | 0 | 0 |
| 143 | Transmission Plant | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 144 | Structures and Improvements | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 145 | Direct assignment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 146 | Station Equipment | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 147 | Poles, Towers and Fixtures | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 148 | OH Conductors and Devices | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 149 | UG Conduits | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 150 | UG Conductors | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 151 | Line Transformers | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 152 | Services | 403 | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 153 | Meters | 403 | 10,613 | Acct370 | 191 | 23 | 10 | 2 | 0 | 0 | 0 |
| 154 | Street Lighting | 403 | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 155 | General / Common Plant | 364 | 8,312 | Bill-Lab | 85 | 9 | 4 | 1 | 0 | 0 | 0 |

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 156 | Depr / Amort-EV | 403 EV | 143 | EV_403 | 62 | 7 | 1 | 4 | 10 | 26 | 1 | 2 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 564 | Bill-Pt | 372 | 37 | 4 | 17 | 46 | 67 | 5 | 6 |
| 159 | Depreciation Expense | 403 | 74,407 |  | 54,517 | 4,759 | 621 | 2,642 | 4,972 | 4,790 | 587 | 430 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 2,739 | Bill-Lab | 1,967 | 233 | 18 | 74 | 136 | 240 | 17 | 22 |
| 164 | PURTA, Real estate | 408.16 | 181 | Bill-Pt | 119 | 12 | 1 | 5 | 15 | 21 | 2 | 2 |
| 165 | Capital stock |  | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 2,920 |  | 2,087 | 245 | 19 | 79 | 151 | 261 | 18 | 24 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 10,553 | Dist_Rev | 5,602 | 538 | 62 | 224 | 636 | 1,332 | 69 | 113 |
| 171 | Gross Receipts Tax |  | 10,553 |  | 5,602 | 538 | 62 | 224 | 636 | 1,332 | 69 | 113 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T |  |  |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 121 | Bill-PreTax | $(1,424)$ | (196) | (9) | (65) | 51 | 435 | 1 | 33 |
| 175 | Federal Income Tax Expense |  | 241 | Bill-PreTax | $(2,824)$ | (389) | (19) | (128) | 101 | 863 | 1 | 65 |
| 176 | Income Taxes | 409-411 | 362 |  | $(4,248)$ | (585) | (28) | (193) | 152 | 1,298 | 2 | 98 |
| 177 | Total Taxes | 408-411 | 13,836 |  | 3,441 | 198 | 53 | 110 | 939 | 2,891 | 90 | 235 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 178,712 |  | 124,745 | 13,348 | 1,238 | 5,074 | 9,744 | 14,042 | 1,155 | 1,275 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Rat |  |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 176,414 | Dist_Rev | 93,647 | 8,986 | 1,035 | 3,742 | 10,629 | 22,268 | 1,154 | 1,888 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,916 | Write-Offs | 3,099 | 524 | 16 | 62 | 61 | 115 | 10 | 15 |
| 186 | Misc Service Revenue |  | 737 | Dist_Rev | 391 | 38 | 4 | 16 | 44 | 93 | 5 | 8 |
| 187 | Rent For Electric Property |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 181,066 |  | 97,137 | 9,547 | 1,055 | 3,820 | 10,734 | 22,476 | 1,169 | 1,910 |
| 190 |  |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 178,712 |  | 124,745 | 13,348 | 1,238 | 5,074 | 9,744 | 14,042 | 1,155 | 1,275 |
| 192 | V. NET INCOME at Present Rates |  | 2,355 |  | $(27,609)$ | $(3,801)$ | (183) | $(1,254)$ | 989 | 8,433 | 14 | 635 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

$$
\begin{array}{r}
22 \\
2 \\
0 \\
0 \\
\hline 24
\end{array}
$$

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 156 | Depr / Amort-EV | 403EV | 143 | EV_403 | 20 | 3 | 6 | 0 | 0 | 0 | 0 |
| 157 | Amort Exp- Reg Assets- Tran |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 158 | Amort Exp- Reg Assets- Dist |  | 564 | Bill-Pt | 8 | 1 | 1 | 0 | 0 | 0 | 0 |
| 159 | Depreciation Expense | 403 | 74,407 |  | 599 | 71 | 38 | 6 | 0 | 55 | 320 |
| 160 |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 2,739 | Bill-Lab | 28 | 3 | 1 | 0 | 0 | 0 | 0 |
| 164 | PURTA, Real estate | 408.16 | 181 | Bill-Pt | 3 | 0 | 0 | 0 | 0 | 0 | 0 |
| 165 | Capital stock |  | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 166 | Other | 408 | 0 | Bill-Pt | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 167 | General Taxes |  | 2,920 |  | 31 | 3 | 2 | 0 | 0 | 0 | 0 |
| 168 |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 10,553 | Dist_Rev | 1,235 | 138 | 358 | 6 | 29 | 191 | 21 |
| 171 | Gross Receipts Tax |  | 10,553 |  | 1,235 | 138 | 358 | 6 | 29 | 191 | 21 |
| 172 |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | XES |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 121 | Bill-PreTax | 806 | 90 | 247 | 4 | 20 | 131 | (2) |
| 175 | Federal Income Tax Expense |  | 241 | Bill-PreTax | 1,598 | 178 | 491 | 7 | 40 | 259 | (4) |
| 176 | Income Taxes | 409-411 | 362 |  | 2,405 | 268 | 738 | 11 | 60 | 390 | (6) |
| 177 | Total Taxes | 408-411 | 13,836 |  | 3,670 | 410 | 1,097 | 18 | 89 | 581 | 16 |
| 178 |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 178,712 |  | 5,110 | 571 | 1,212 | 31 | 91 | 676 | 398 |
| 180 |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Rat |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 176,414 | Dist_Rev | 20,645 | 2,305 | 5,983 | 104 | 478 | 3,192 | 357 |
| 183 | Transmission Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 184 | POLR Revenue |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 185 | Forfeited Discounts |  | 3,916 | Write-Offs | 9 | 0 | 0 | 0 | 0 | 4 | 2 |
| 186 | Misc Service Revenue |  | 737 | Dist_Rev | 86 | 10 | 25 | 0 | 2 | 13 | 1 |
| 187 | Rent For Electric Property |  | 0 | None | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 188 | Other Electric Revenues |  | 0 | Dist_Rev | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 189 | Operating Revenues |  | 181,066 |  | 20,740 | 2,315 | 6,008 | 104 | 480 | 3,210 | 361 |
| 190 |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 178,712 |  | 5,110 | 571 | 1,212 | 31 | 91 | 676 | 398 |
| 192 | V. NET INCOME at Present Rates |  | 2,355 |  | 15,630 | 1,743 | 4,797 | 73 | 389 | 2,534 | (37) |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

| Line | Account | No. | Balance | Allocator | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 180,330 |  | 96,746 | 9,510 | 1,051 | 3,804 | 10,689 | 22,383 | 1,164 | 1,902 |
| 197 | Other Operating Revenues | 450-456 | 737 |  | 391 | 38 | 4 | 16 | 44 | 93 | 5 | 8 |
| 198 | Total Operating Revenues |  | 181,066 |  | 97,137 | 9,547 | 1,055 | 3,820 | 10,734 | 22,476 | 1,169 | 1,910 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission 58 | 580-599 | 7,984 |  | 4,762 | 473 | 50 | 213 | 678 | 1,403 | 79 | 125 |
| 202 | Customer Acctg \& Service | 901-919 | 33,478 |  | 26,724 | 3,924 | 182 | 717 | 712 | 909 | 100 | 109 |
| 203 | Admin \& General | 920-932 | 49,007 |  | 35,301 | 3,994 | 332 | 1,392 | 2,443 | 4,051 | 298 | 376 |
| 204 | Total Operating Expenses |  | 90,469 |  | 66,788 | 8,391 | 565 | 2,322 | 3,833 | 6,362 | 478 | 610 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 74,407 |  | 54,517 | 4,759 | 621 | 2,642 | 4,972 | 4,790 | 587 | 430 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 13,473 |  | 7,689 | 783 | 81 | 303 | 786 | 1,593 | 87 | 137 |
| 208 | INCOME BEFORE INCOME TAXES |  | 2,717 |  | $(31,857)$ | $(4,386)$ | (211) | $(1,447)$ | 1,142 | 9,731 | 17 | 733 |
| 209 | Income Taxes | 409-411 | 362 |  | $(4,248)$ | (585) | (28) | (193) | 152 | 1,298 | 2 | 98 |
| 210 | NET INCOME |  | 2,355 |  | $(27,609)$ | $(3,801)$ | (183) | $(1,254)$ | 989 | 8,433 | 14 | 635 |
| 211 | RATE BASE |  | 283,568 |  | 200,249 | 18,381 | 2,208 | 9,014 | 20,390 | 24,411 | 2,427 | 2,192 |
| 212 | Return on Rate Base |  | 0.83\% |  |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 283,568 |  | 200,249 | 18,381 | 2,208 | 9,014 | 20,390 | 24,411 | 2,427 | 2,192 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 75,347 |  | 55,032 | 6,437 | 502 | 2,078 | 3,563 | 5,839 | 436 | 548 |
| 219 | Uncollectibles expense |  | 15,437 | Write-Offs | 12,216 | 2,064 | 63 | 244 | 239 | 453 | 39 | 58 |
| 220 | Depreciation expense |  | 74,407 |  | 54,517 | 4,759 | 621 | 2,642 | 4,972 | 4,790 | 587 | 430 |
| 221 | Regulatory Commission Expenses |  | 926 | Total_RR | 483 | 53 | 6 | 19 | 51 | 124 | 6 | 12 |
| 222 | General taxes / Other |  | 2,920 |  | 2,087 | 245 | 19 | 79 | 151 | 261 | 18 | 24 |
| 223 | Subtotal- Operating Costs to recover |  | 169,037 |  | 124,335 | 13,558 | 1,210 | 5,063 | 8,976 | 11,468 | 1,087 | 1,072 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 22,232 |  | 15,700 | 1,441 | 173 | 707 | 1,599 | 1,914 | 190 | 172 |
| 226 | Income taxes to recover |  | 5,199 | 23.38\% | 3,671 | 337 | 40 | 165 | 374 | 448 | 45 | 40 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 196,467 |  | 143,706 | 15,336 | 1,424 | 5,935 | 10,949 | 13,829 | 1,322 | 1,284 |
| 229 | GRT needed |  | 12,295 | 6.26\% | 8,993 | 960 | 89 | 371 | 685 | 865 | 83 | 80 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 208,762 |  | 152,699 | 16,296 | 1,513 | 6,306 | 11,634 | 14,694 | 1,404 | 1,364 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Class Allocation- Billing Customer

BillCus
Class Allocation- Billing Customer
CAl
Exh 6-7D

| Line | Account | No. | Balance | Allocator | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 193 |  |  |  |  |  |  |  |  |  |  |  |
| 194 | SUMMARY REPORT |  |  |  |  |  |  |  |  |  |  |
| 195 | OPERATING REVENUES |  |  |  |  |  |  |  |  |  |  |
| 196 | Utility Revenues | 440-446 | 180,330 |  | 20,654 | 2,305 | 5,983 | 104 | 478 | 3,196 | 360 |
| 197 | Other Operating Revenues | 450-456 | 737 |  | 86 | 10 | 25 | 0 | 2 | 13 | 1 |
| 198 | Total Operating Revenues |  | 181,066 |  | 20,740 | 2,315 | 6,008 | 104 | 480 | 3,210 | 361 |
| 199 |  |  |  |  |  |  |  |  |  |  |  |
| 200 | OPERATING EXPENSES |  |  |  |  |  |  |  |  |  |  |
| 201 | Distribution / Transmission | 580-599 | 7,984 |  | 171 | 20 | 9 | 2 | 0 | 0 | 0 |
| 202 | Customer Acctg \& Service | 901-919 | 33,478 |  | 67 | 3 | 0 | 0 | 0 | 17 | 12 |
| 203 | Admin \& General | 920-932 | 49,007 |  | 603 | 69 | 67 | 5 | 2 | 23 | 50 |
| 204 | Total Operating Expenses |  | 90,469 |  | 841 | 91 | 76 | 7 | 2 | 40 | 62 |
| 205 |  |  |  |  |  |  |  |  |  |  |  |
| 206 | Depreciation Expense | 403 | 74,407 |  | 599 | 71 | 38 | 6 | 0 | 55 | 320 |
| 207 | Taxes Other Than Income Tax / Other | 408 | 13,473 |  | 1,266 | 141 | 359 | 7 | 29 | 191 | 21 |
| 208 | INCOME BEFORE INCOME TAXES |  | 2,717 |  | 18,035 | 2,012 | 5,535 | 84 | 449 | 2,923 | (42) |
| 209 | Income Taxes | 409-411 | 362 |  | 2,405 | 268 | 738 | 11 | 60 | 390 | (6) |
| 210 | NET INCOME |  | 2,355 |  | 15,630 | 1,743 | 4,797 | 73 | 389 | 2,534 | (37) |
| 211 | RATE BASE |  | 283,568 |  | 2,791 | 382 | 219 | 34 | 0 | 133 | 737 |
| 212 | Return on Rate Base |  | 0.83\% |  |  |  |  |  |  |  |  |
| 213 |  |  |  |  |  |  |  |  |  |  |  |
| 214 | REVENUE REQUIREMENTS |  |  |  |  |  |  |  |  |  |  |
| 215 | Target Rate of Return |  | 7.8400\% |  | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% | 7.8400\% |
| 216 | Rate Base |  | 283,568 |  | 2,791 | 382 | 219 | 34 | 0 | 133 | 737 |
| 217 ( 218 |  |  |  |  |  |  |  |  |  |  |  |
| 218 | Operating expenses |  | 75,347 |  | 713 | 80 | 49 | 7 | 0 | 11 | 52 |
| 219 | Uncollectibles expense |  | 15,437 | Write-Offs | 36 | 1 | 0 | 0 | 0 | 15 | 9 |
| 220 | Depreciation expense |  | 74,407 |  | 599 | 71 | 38 | 6 | 0 | 55 | 320 |
| 221 | Regulatory Commission Expenses |  | 926 | Total_RR | 107 | 16 | 33 | 0 | 2 | 12 | 2 |
| 222 | General taxes / Other |  | 2,920 |  | 31 | 3 | 2 | 0 | 0 | 0 | 0 |
| 223 | Subtotal- Operating Costs to recover |  | 169,037 |  | 1,485 | 170 | 121 | 13 | 2 | 93 | 383 |
| 224 ( |  |  |  |  |  |  |  |  |  |  |  |
| 225 | Target Return on Rate Base- After taxe |  | 22,232 |  | 219 | 30 | 17 | 3 | 0 | 10 | 58 |
| 226 | Income taxes to recover |  | 5,199 | 23.38\% | 51 | 7 | 4 | 1 | 0 | 2 | 14 |
| 227 |  |  |  | 18.95\% |  |  |  |  |  |  |  |
| 228 | Subtotal- Rev Req before GRT |  | 196,467 |  | 1,755 | 207 | 142 | 17 | 2 | 106 | 455 |
| 229 | GRT needed |  | 12,295 | 6.26\% | 110 | 13 | 9 | 1 | 0 | 7 | 28 |
| 230 | TOTAL REVENUE REQUIREMENT |  | 208,762 |  | 1,865 | 220 | 151 | 18 | 2 | 113 | 483 |

Duquesne Light Company
JSS / Class ACOS Study

## Fully Projected Future Test Year

Class Allocation- Billing Customer

Assigned
Allocator Assignments
Fac
Exh 6-8

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Allocator Assignments

Classification
Secondary
I. ELECTRIC PLANT IN SERVICE
INTANGIBLE PLANT

| Organization / Franchise | $301 / 302$ | 107 | Plant | 82 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SW- Plant/ OM | 303 P | 0 | - | 0 | - | - | - | - | - | - |
| SW-Customer-related | 303C | 219,001 | Dist | 219,001 | Bill | - | - | - | - | Avg-Cust |
| SW- Labor-related | 303L | 0 | - | 0 | - | - | - | - | - | - |
| SW- AMI | 303AMI | 62,331 | Dist | 62,331 | Bill | - | - | - | - | AMI_Cost |
| Software- RB / CIP/Cyber | 303F | 115,627 | Plant | 88,984 | DistPt | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| Intangible Plant |  | 281,439 |  | 281,414 |  |  |  |  |  |  |
| C. TRANSMISSION PLANT |  |  |  |  |  |  |  |  |  |  |
| Transmission Plant | 361 | 1,122,826 | Tran | 0 | - | - | - | - | - | - |
| Transmission Plant | 350-359 | 1,122,826 |  | 0 |  |  |  |  |  |  |
| D. DISTRIBUTION PLANT |  |  |  |  |  |  |  |  |  |  |
| Land and Land Rights | 360 | 23,190 | Dist | 23,190 | Prim | - | NCP-Prim | - | - | - |
| Structures and Improvements | 361 | 71,327 | Dist | 71,327 | Prim | - | NCP-Prim | - | - | - |
| Direct Assignment | 361 | 961 | Pitcairn | 0 | - | - | - | - | - | - |
| Station Equipment | 362 | 523,748 | Dist | 523,748 | Prim | - | NCP-Prim | - | - | - |
| Station Equipment- Network | 362 | 13,188 | Dist | 13,188 | Prim | - | NCP-Prim-Net | - | - | - |
| Poles, Towers and Fixtures | 364 | 624,016 | Dist | 624,016 | OH_Cond | OH - Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| OH Conductors and Devices | 365 | 629,457 | Dist | 629,457 | OH_Cond | OH -Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| UG Conduits- Radial | 366 | 157,950 | Dist | 157,950 | UG_Radial | UG_Rad_Min | NCP-Prim-Rad | NCP-Sec-Rad | Avg-Cust-Rad | - |
| UG Conduits- Network | 366 | 30,713 | Dist | 30,713 | UG_Network | UG_Net_Min | NCP-Prim-Net | NCP-Sec-Net | Avg-Cust-Net | - |
| UG Conduits- URD | 366 | 30,713 | Dist | 30,713 | UG_URD | UG_URD_Min | NCP-Prim-URD | - | Avg-Cust-URD | - |
| UG Conductors- Radial | 367 | 331,382 | Dist | 331,382 | UG_Radial | UG_Rad_Min | NCP-Prim-Rad | NCP-Sec-Rad | Avg-Cust-Rad | - |
| UG Conductors- Network | 367 | 64,435 | Dist | 64,435 | UG_Network | UG_Net_Min | NCP-Prim-Net | NCP-Sec-Net | Avg-Cust-Net | - |
| UG Conductors- URD | 367 | 64,435 | Dist | 64,435 | UG_URD | UG_URD_Min | NCP-Prim-URD | - | Avg-Cust-URD | - |
| Line Transformers- OH | 368 | 300,124 | Dist | 300,124 | LTrans_OH | LTr_Min_OH | NCP-Prim-NonNet | NCP-Sec-Xfmr | Avg-Cust-NonNet | - |
| Line Transformers- Radial | 368 | 95,034 | Dist | 95,034 | LTrans_Rad | LTr_Min_Rad | - | NCP-Sec-Rad-Xfmr | Avg-Cust-Rad | - |
| Line Transformers- Network | 368 | 44,726 | Dist | 44,726 | LTrans_Net | LTr_Min_Net | - | NCP-Sec-Net | Avg-Cust-Net-Xfmr | - |
| Line Transformers- URD | 368 | 50,903 | Dist | 50,903 | LTrans_URD | LTr_Min_URD | - | NCP-Sec-URD | Avg-Cust-URD | - |
| Services | 369 | 114,962 | Dist | 114,962 | Sec | Customer | - | - | Services_Cost | - |
| Meters | 370 | 151,169 | Dist | 151,169 | Bill | - | - | - | - | Acct370 |
| Street Lighting | 373 | 44,730 | Dist | 44,730 | Sec | Customer | - | - | StLgt-Cost | - |
| ARO- Dist Plant | ARO | 0 | - | 0 | - | - | - | - | - | - |
| Distribution Plant | 360-373 | 3,367,163 |  | 3,366,202 |  |  |  |  |  |  |

Assigned
Allocator Assignments
Fac
Exh 6-8

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year

|  |  | Allocator Assignments |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Account | No. | Total | JSS | Distribution | Functional | $\begin{gathered} \hline \text { Classification } \\ \hline \text { Secondary } \\ \hline \end{gathered}$ | Class Allocation |  |  |  |
| Line |  |  |  |  |  |  |  | PrimDem | SecnDem | SecnCus | BillCus |
| 39 | E. GENERAL PLANT |  |  |  |  |  |  |  |  |  |  |
| 40 | General Plant | 390 | 424,855 | Labor | 351,077 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 41 | General Plant-EV | 390EV | 1,081 | EV | 1,081 | EV | - | - | - | - | EV_390 |
| 42 | General Plant | 389-399 | 425,936 |  | 352,158 |  |  |  |  |  |  |
| 43 |  |  |  |  |  |  |  |  |  |  |  |
| 44 | TOTAL UTILITY PLANT |  | 5,197,364 |  | 3,999,774 |  |  |  |  |  |  |
| 45 - |  |  |  |  |  |  |  |  |  |  |  |
| 46 | II. DEPRECIATION RESERVE |  |  |  |  |  |  |  |  |  |  |
| 47 | Intangible Plant | 108.3 | 256,846 | Intang | 239,596 | Intang | Sec-IntPt | PriD-IntPt | SecD-IntPt | SecC-IntPt | Bill-IntPt |
| 48 | Transmission Plant | 108.3 | 335,205 | Tran | 0 | - | - | - | - | - | - |
| 49 | Structures and Improvements | 108.5 | 43,772 | Dist | 43,772 | Prim | - | NCP-Prim | - | - | - |
| 50 | Direct Assignment | 108.5 | 255 | Pitcairn | 0 | - | - | - | - | - | - |
| 51 | Station Equipment | 108.5 | 189,703 | Dist | 189,703 | Prim | - | NCP-Prim | - | - | - |
| 52 | Poles, Towers and Fixtures | 108.5 | 192,716 | Dist | 192,716 | OH_Cond | OH - Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 53 | OH Conductors and Devices | 108.5 | 184,533 | Dist | 184,533 | OH_Cond | OH _Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 54 | UG Conduits | 108.5 | 53,228 | Dist | 53,228 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 55 | UG Conductors | 108.5 | 136,278 | Dist | 136,278 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 56 | Line Transformers | 108.5 | 140,769 | Dist | 140,769 | LTrans_Tot | LTr-Tot | PriD-LTr | SecD-LTr | $\mathrm{SecC}-\mathrm{LTr}$ | - |
| 57 | Services | 108.5 | 28,630 | Dist | 28,630 | Sec | Customer | - | - | Services_Cost | - |
| 58 | Meters | 108.5 | 42,906 | Dist | 42,906 | Bill | - | - | - | - | Acct 370 |
| 59 | Street Lighting | 108.5 | 25,853 | Dist | 25,853 | Sec | Customer | - | - | StLgt-Cost | - |
| 60 | EV Assets | 108EV | 143 | EV | 143 | EV | - | - | - | - | EV_Depr |
| 61 | General | 108.6 | 178,887 | Labor | 147,822 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 62 | Depreciation Reserve | 108 | 1,809,724 |  | 1,425,949 |  |  |  |  |  |  |
| 63 |  |  |  |  |  |  |  |  |  |  |  |
| 64 | III. OTHER RATE BASE ITEMS |  |  |  |  |  |  |  |  |  |  |
| 65 | Cash Working Capital | 131 | 54,267 | OMxSupp | 46,162 | OM | Sec-OM | PriD-OM | SecD-OM | SecC-OM | Bill-OM |
| 66 | Cash Working Capital- Supp | 131 | 13,797 | Supp | 0 | - | - | - | - | - | - |
| 67 | Materials \& Supplies |  | 33,482 | M\&S | 26,057 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 68 | Capitalized Pension |  |  |  |  |  |  |  |  |  |  |
| 69 | Customer Deposits |  | $(11,163)$ | Dist | $(11,163)$ | Bill | - | - | - | - | CustDeposits |
| 70 | ADIT-EV |  | (53) | EV | (53) | EV | - | - | - | - | EV_390 |
| 71 | ADIT- Transmission | 154 | $(166,107)$ | Tran | 0 | - | - | - | - | - | - |
| 72 | ADIT- Distribution | 154 | $(501,992)$ | PlantxTrans | $(501,864)$ | DistPt | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 73 | ADIT- General | 182 | $(24,073)$ | Labor | $(19,893)$ | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 74 | Other Rate Base | 131-283 | $(601,842)$ |  | $(460,753)$ |  |  |  |  |  |  |
| 75 ( 76 |  |  |  |  |  |  |  |  |  |  |  |
| 76 | TOTAL RATE BASE |  | 2,785,798 |  | 2,113,072 |  |  |  |  |  |  |
| 77 |  |  |  |  |  |  |  |  |  |  |  |

Assigned
Allocator Assignments
Fac
Exh 6-8

## Duquesne Light Company

JSS / Class ACOS Study
Fully Projected Future Test Year
Allocator Assignments
Classification
Total

## I. OPERATING AND MAINTENANCE EXPENSES

## B. TRANSMISSION EXPENSE

POLR Expense
Transmission Expense

## Transmission Expense

## C. DISTRIBUTION EXPENSE

| Ops Supv \& Engineering | 580 | 9,224 | PlantxTrans | 9,222 | D-Labor-Op | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Load Dispatching | 581 | 1,050 | Dist | 1,050 | Prim | - | NCP-Prim | - | - | - |
| Station Expenses | 582 | 352 | PlantxTrans | 352 | Prim | - | NCP-Prim | - | - | - |
| OH Line Expenses | 583 | 544 | PlantxTrans | 544 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| UG Line Expenses | 584 | 607 | PlantxTrans | 607 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| Meter Expenses | 586 | 4,052 | PlantxTrans | 4,051 | Bill | - | - | - | - | Meter_Tech |
| Customer Installation Expenses | 587 | 2 | PlantxTrans | 2 | Bill | - | - | - | - | Avg-Cust |
| Misc. Distribution Expenses | 588 | 10,298 | PlantxTrans | 10,295 | DistPt | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| Rents | 589 | 0 | - | 0 | - | - | - | - | - | - |
| Maint Supv \& Engineering | 590 | (190) | PlantxTrans | (190) | D-Labor-Mnt | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| Maint of Structures | 591 | 99 | PlantxTrans | 99 | Prim | - | NCP-Prim | - | - | - |
| Maint of Station Equip | 592 | 2,660 | PlantxTrans | 2,659 | Prim | - | NCP-Prim | - | - | - |
| Maint of OH Lines | 593 | 23,726 | PlantxTrans | 23,720 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| Maint of UG Lines | 594 | 2,243 | PlantxTrans | 2,242 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| Maint of Line Transformers | 595 | 29 | PlantxTrans | 29 | LTrans_Tot | LTr-Tot | PriD-LTr | SecD-LTr | SecC-LTr | - |
| Maint of Lighting | 596 | 555 | Dist | 555 | Sec | Customer | - | - | StLgt-Cost | - |
| Maint of Meters | 597 | 391 | Dist | 391 | Bill | - | - | - | - | Meter_Tech |
| Maint of Misc. Plant | 599 | 74 | PlantxTrans | 74 | DistPt | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| Oper. \& Maint. Exp. | 500-599 | 55,716 |  | 55,702 |  |  |  |  |  |  |
| D. CUSTOMER ACCOUNTS AND SERVICE |  |  |  |  |  |  |  |  |  |  |
| Supervision | 901 | 13,049 | Dist | 13,049 | Bill | - | - | - | - | Acct901903 |
| Meter Reading Exp | 902 | 335 | Dist | 335 | Bill | - | - | - | - | Meters |
| Customer Records \& Coll | 903 | 1,216 | Dist | 1,216 | Bill | - | - | - | - | Acct901903 |
| Uncollectible Accounts | 904 | 14,309 | Dist | 14,309 | Bill | - | - | - | - | Write-Offs |
| COVID Uncol, LPC | 904 | 2,951 | Dist | 2,951 | Bill | - | - | - | - | Write-Offs |
| Customer Accts. Exp. | 901-905 | 31,860 |  | 31,860 |  |  |  |  |  |  |
| Customer Assistance | 908 | 165 | Dist | 165 | Bill | - | - | - | - | Avg-Cust |
| COVID Relief | 908 CV | 1,453 | Dist | 1,453 | Bill | - | - | - | - | 908 CV |
| Customer Service Exp. | 908-916 | 165 |  | 165 |  |  |  |  |  |  |
| Customer Accts. \& Serv. Exp. | 901-919 | 32,025 |  | 32,025 |  |  |  |  |  |  |

Assigned
Allocator Assignments
Fac
Exh 6-8

| 119 | Admin \& Gen Salaries | 920 | 63,866 | Labor | 52,775 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Dist | 2,928 | Bill | - | - | - | - | Bills |
| 121 | Office Supp \& Exp- Other | 921 | 5,517 | Labor | 4,559 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 122 | Outside Services- Cust Care | 923CC | 2,017 | Dist | 2,017 | Bill | - | - | - | - | Avg-Cust |
| 123 | Outside Services- HR | 923M | 1,960 | Labor | 1,620 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 124 | Outside Services- Other | 923 | 26,462 | Labor | 21,867 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 125 | Property Insurance | 924 | 6,676 | Plant | 5,138 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 126 | Injuries \& Damages | 925 | 230 | Labor | 190 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 4,132 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 128 | Regulatory Commission | 928 | 813 | Dist | 813 | Bill | - | - | - | - | Dist_Rev |
| 129 | A\&G-EV | 930 EV | 350 | EV | 350 | EV | - | - | - | - | EV_930 |
| 130 | Marketing, Communications | 930 | 34 | Dist | 34 | Bill | - | - | - | - | Avg-Cust |
| 131 | Misc. General Plant | 930 | 7,437 | Labor | 6,146 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 132 | General Plant Rent | 931 | 3,925 | Labor | 3,243 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Dist | 833 | Bill | - | - | - | - | Meter_Cost |
| 134 | Misc Genl Plant- Other | 935P | 11,450 | Labor | 9,461 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 135 | Admin \& Genl. Exp. | 920-932 | 139,498 |  | 116,105 |  |  |  |  |  |  |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 227,239 |  | 203,833 |  |  |  |  |  |  |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 18,101 | Plant | 13,930 | Intang | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 141 | Intangible- Customers | 403 | 34,285 | Dist | 34,285 | Bill | - | - | - | - | Avg-Cust |
| 142 | Intangible- AMI | 403 | 9,758 | Dist | 9,758 | Bill | - | - | - | - | AMI_Cost |
| 143 | Transmission Plant | 403 | 27,084 | Tran | 0 | - | - | - | - | - | - |
| 144 | Structures and Improvements | 403 | 1,593 | Dist | 1,593 | Prim | - | NCP-Prim | - | - | - |
| 145 | Direct assignment | 403 | 26 | Pitcairn | 0 | - | - | - | - | - | - |
| 146 | Station Equipment | 403 | 11,383 | Dist | 11,383 | Prim | - | NCP-Prim | - | - | - |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | Dist | 13,229 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 148 | OH Conductors and Devices | 403 | 16,681 | Dist | 16,681 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 149 | UG Conduits | 403 | 3,071 | Dist | 3,071 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 150 | UG Conductors | 403 | 12,519 | Dist | 12,519 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 151 | Line Transformers | 403 | 16,932 | Dist | 16,932 | LTrans_Tot | LTr-Tot | PriD-LTr | SecD-LTr | SecC-LTr | - |
| 152 | Services | 403 | 2,403 | Dist | 2,403 | Sec | Customer | - | - | Services_Cost | - |
| 153 | Meters | 403 | 10,613 | Dist | 10,613 | Bill | - | - | - | - | Acct370 |


| 119 | Admin \& Gen Salaries | 920 | 63,866 | Labor | 52,775 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Dist | 2,928 | Bill | - | - | - | - | Bills |
| 121 | Office Supp \& Exp- Other | 921 | 5,517 | Labor | 4,559 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 122 | Outside Services- Cust Care | 923CC | 2,017 | Dist | 2,017 | Bill | - | - | - | - | Avg-Cust |
| 123 | Outside Services- HR | 923M | 1,960 | Labor | 1,620 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 124 | Outside Services- Other | 923 | 26,462 | Labor | 21,867 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 125 | Property Insurance | 924 | 6,676 | Plant | 5,138 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 126 | Injuries \& Damages | 925 | 230 | Labor | 190 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 4,132 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 128 | Regulatory Commission | 928 | 813 | Dist | 813 | Bill | - | - | - | - | Dist_Rev |
| 129 | A\&G-EV | 930 EV | 350 | EV | 350 | EV | - | - | - | - | EV_930 |
| 130 | Marketing, Communications | 930 | 34 | Dist | 34 | Bill | - | - | - | - | Avg-Cust |
| 131 | Misc. General Plant | 930 | 7,437 | Labor | 6,146 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 132 | General Plant Rent | 931 | 3,925 | Labor | 3,243 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Dist | 833 | Bill | - | - | - | - | Meter_Cost |
| 134 | Misc Genl Plant- Other | 935P | 11,450 | Labor | 9,461 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 135 | Admin \& Genl. Exp. | 920-932 | 139,498 |  | 116,105 |  |  |  |  |  |  |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 227,239 |  | 203,833 |  |  |  |  |  |  |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 18,101 | Plant | 13,930 | Intang | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 141 | Intangible- Customers | 403 | 34,285 | Dist | 34,285 | Bill | - | - | - | - | Avg-Cust |
| 142 | Intangible- AMI | 403 | 9,758 | Dist | 9,758 | Bill | - | - | - | - | AMI_Cost |
| 143 | Transmission Plant | 403 | 27,084 | Tran | 0 | - | - | - | - | - | - |
| 144 | Structures and Improvements | 403 | 1,593 | Dist | 1,593 | Prim | - | NCP-Prim | - | - | - |
| 145 | Direct assignment | 403 | 26 | Pitcairn | 0 | - | - | - | - | - | - |
| 146 | Station Equipment | 403 | 11,383 | Dist | 11,383 | Prim | - | NCP-Prim | - | - | - |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | Dist | 13,229 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 148 | OH Conductors and Devices | 403 | 16,681 | Dist | 16,681 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 149 | UG Conduits | 403 | 3,071 | Dist | 3,071 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 150 | UG Conductors | 403 | 12,519 | Dist | 12,519 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 151 | Line Transformers | 403 | 16,932 | Dist | 16,932 | LTrans_Tot | LTr-Tot | PriD-LTr | SecD-LTr | SecC-LTr | - |
| 152 | Services | 403 | 2,403 | Dist | 2,403 | Sec | Customer | - | - | Services_Cost | - |
| 153 | Meters | 403 | 10,613 | Dist | 10,613 | Bill | - | - | - | - | Acct370 |


| 119 | Admin \& Gen Salaries | 920 | 63,866 | Labor | 52,775 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 120 | Office Supp \& Exp- Bill Print | 921 Bill | 2,928 | Dist | 2,928 | Bill | - | - | - | - | Bills |
| 121 | Office Supp \& Exp- Other | 921 | 5,517 | Labor | 4,559 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 122 | Outside Services- Cust Care | 923CC | 2,017 | Dist | 2,017 | Bill | - | - | - | - | Avg-Cust |
| 123 | Outside Services- HR | 923M | 1,960 | Labor | 1,620 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 124 | Outside Services- Other | 923 | 26,462 | Labor | 21,867 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 125 | Property Insurance | 924 | 6,676 | Plant | 5,138 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 126 | Injuries \& Damages | 925 | 230 | Labor | 190 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 127 | Empl Pensions \& Benefits | 926 | 5,000 | Labor | 4,132 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 128 | Regulatory Commission | 928 | 813 | Dist | 813 | Bill | - | - | - | - | Dist_Rev |
| 129 | A\&G-EV | 930 EV | 350 | EV | 350 | EV | - | - | - | - | EV_930 |
| 130 | Marketing, Communications | 930 | 34 | Dist | 34 | Bill | - | - | - | - | Avg-Cust |
| 131 | Misc. General Plant | 930 | 7,437 | Labor | 6,146 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 132 | General Plant Rent | 931 | 3,925 | Labor | 3,243 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 133 | Misc Genl Plant- Metering | 935M | 833 | Dist | 833 | Bill | - | - | - | - | Meter_Cost |
| 134 | Misc Genl Plant- Other | 935P | 11,450 | Labor | 9,461 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 135 | Admin \& Genl. Exp. | 920-932 | 139,498 |  | 116,105 |  |  |  |  |  |  |
| 136 |  |  |  |  |  |  |  |  |  |  |  |
| 137 | Total Operating Expenses |  | 227,239 |  | 203,833 |  |  |  |  |  |  |
| 138 |  |  |  |  |  |  |  |  |  |  |  |
| 139 | II. DEPRECIATION EXPENSE |  |  |  |  |  |  |  |  |  |  |
| 140 | Intangible- Other | 403 | 18,101 | Plant | 13,930 | Intang | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 141 | Intangible- Customers | 403 | 34,285 | Dist | 34,285 | Bill | - | - | - | - | Avg-Cust |
| 142 | Intangible- AMI | 403 | 9,758 | Dist | 9,758 | Bill | - | - | - | - | AMI_Cost |
| 143 | Transmission Plant | 403 | 27,084 | Tran | 0 | - | - | - | - | - | - |
| 144 | Structures and Improvements | 403 | 1,593 | Dist | 1,593 | Prim | - | NCP-Prim | - | - | - |
| 145 | Direct assignment | 403 | 26 | Pitcairn | 0 | - | - | - | - | - | - |
| 146 | Station Equipment | 403 | 11,383 | Dist | 11,383 | Prim | - | NCP-Prim | - | - | - |
| 147 | Poles, Towers and Fixtures | 403 | 13,229 | Dist | 13,229 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 148 | OH Conductors and Devices | 403 | 16,681 | Dist | 16,681 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust-NonNet | - |
| 149 | UG Conduits | 403 | 3,071 | Dist | 3,071 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 150 | UG Conductors | 403 | 12,519 | Dist | 12,519 | UG_Total | UG-Tot | PriD-UG | SecD-UG | SecC-UG | - |
| 151 | Line Transformers | 403 | 16,932 | Dist | 16,932 | LTrans_Tot | LTr-Tot | PriD-LTr | SecD-LTr | SecC-LTr | - |
| 152 | Services | 403 | 2,403 | Dist | 2,403 | Sec | Customer | - | - | Services_Cost | - |
| 153 | Meters | 403 | 10,613 | Dist | 10,613 | Bill | - | - | - | - | Acct370 |

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Allocator Assignments
Classification
Distribution Functional
Secondary

203,833

| Class Allocation |  |  |  |
| :---: | :---: | :---: | :---: |
| PrimDem | SecnDem | SecnCus | BillCus |

8 E. ADMINISTRATIVE AND GENERAL

Assigned
Allocator Assignments
Fac
Exh 6-8

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Allocator Assignments

| Line | Account | No. | Total | JSS | Distribution | Functional | Classification <br> Secondary | Class Allocation |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |  | PrimDem | SecnDem | SeenCus | BillCus |
| 154 | Street Lighting | 403 | 1,279 | Dist | 1,279 | Sec | Customer | - | - | StLgt-Cost | - |
| 155 | General / Common Plant | 364 | 25,324 | Labor | 20,926 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 156 | Depr / Amort-EV | 403EV | 143 | EV | 143 | EV | - | - | - | - | EV_403 |
| 157 | Amort Exp- Reg Assets- Tran |  |  |  |  |  |  |  |  |  |  |
| 158 | Amort Exp- Reg Assets- Dist |  | 12,564 | Dist | 12,564 | DistPt | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 159 | Depreciation Expense | 403 | 216,988 |  | 181,309 |  |  |  |  |  |  |
| 160 |  |  |  |  |  |  |  |  |  |  |  |
| 161 | III. TAXES and OTHER |  |  |  |  |  |  |  |  |  |  |
| 162 | A. GENERAL TAXES |  |  |  |  |  |  |  |  |  |  |
| 163 | Payroll related | 408 | 8,346 | Labor | 6,897 | Labor | Sec-Lab | PriD-Lab | SecD-Lab | SecC-Lab | Bill-Lab |
| 164 | PURTA, Real estate | 408.16 | 1,664 | Plant | 1,281 | Plant | Sec-Pt | PriD-Pt | SecD-Pt | SecC-Pt | Bill-Pt |
| 165 | Capital stock |  | 0 | - | 0 | - | - | - | - | - | - |
| 166 | Other | 408 | 0 | - | 0 | - | - | - | - | - | - |
| 167 | General Taxes |  | 10,010 |  | 8,177 |  |  |  |  |  |  |
| 168 |  |  |  |  |  |  |  |  |  |  |  |
| 169 | B. GROSS RECEIPTS TAX |  |  |  |  |  |  |  |  |  |  |
| 170 | Gross Receipts tax |  | 50,278 | GRT_Rev | 32,924 | GRT_Rev | Sec-Rev | Dist_Rev | Dist_Rev | Dist_Rev | Dist_Rev |
| 171 | Gross Receipts Tax |  | 50,278 |  | 32,924 |  |  |  |  |  |  |
| 172 |  |  |  |  |  |  |  |  |  |  |  |
| 173 | B. FEDERAL / STATE INCOME T | AXES |  |  |  |  |  |  |  |  |  |
| 174 | State Income Tax Expense |  | 12,296 | PATax_Pres | 6,290 | Pretax | Sec-Pretax | PriD-PreTax | SecD-PreTax | SecC-PreTax | Bill-PreTax |
| 175 | Federal Income Tax Expense |  | 25,299 | FedTax_Pres | 12,470 | Pretax | Sec-Pretax | PriD-PreTax | SecD-PreTax | SecC-PreTax | Bill-PreTax |
| 176 | Income Taxes | 409-411 | 12,296 |  | 6,290 |  |  |  |  |  |  |
| 177 | Total Taxes | 408-411 | 72,584 |  | 47,391 |  |  |  |  |  |  |
| 178 - $\quad \square$ |  |  |  |  |  |  |  |  |  |  |  |
| 179 | TOTAL EXPENSES |  | 516,810 |  | 432,533 |  |  |  |  |  |  |
| 180 |  |  |  |  |  |  |  |  |  |  |  |
| 181 | IV. OPERATING REVENUES at P | esent Ra |  |  |  |  |  |  |  |  |  |
| 182 | Distribution Revenue |  | 550,379 | Dist | 550,379 | DistBill_RR-PF | Sec-RetRRPF | Dist_Rev | Dist_Rev | Dist_Rev | Dist_Rev |
| 183 | Transmission Revenue |  | 160,861 | Tran | 0 | - | - | - | - | - | - |
| 184 | POLR Revenue |  | 227,343 | Supp | 0 | - | - | - | - | - | - |
| 185 | Forfeited Discounts |  | 3,916 | Dist | 3,916 | Bill | - | - | - | - | Write-Offs |
| 186 | Misc Service Revenue |  | 2,299 | Dist | 2,299 | DistBill_RR-PF | Sec-RetRRPF | Dist_Rev | Dist_Rev | Dist_Rev | Dist_Rev |
| 187 | Rent For Electric Property |  | 11,788 | Dist | 11,788 | OH_Cond | OH_Min | NCP-Prim-NonNet | NCP-Sec-NonNet | Avg-Cust | - |
| 188 | Other Electric Revenues |  | 2,579 | Other_Rev | 0 | - | - | - | - | - | - |
| 189 | Operating Revenues |  | 959,165 |  | 568,382 |  |  |  |  |  |  |
| 190 ( 190 |  |  |  |  |  |  |  |  |  |  |  |
| 191 | TOTAL EXPENSES |  | 516,810 |  | 432,533 |  |  |  |  |  |  |
| 192 | V. NET INCOME at Present Rates |  | 442,355 |  | 135,849 |  |  |  |  |  |  |

Assigned
Allocator Assignments
Fac
Exh 6-8

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Allocator Assignments

| Class Allocation |  |  |  |
| :---: | :---: | :---: | :---: |
| PrimDem | SecnDem | SecnCus | BillCus |

## SUMMARY REPORT

OPERATING REVENUES
Utility Revenues
Other Operating Revenues
Total Operating Revenues
$440-446$
$450-456$
$\begin{array}{r}942,499 \\ 16,666 \\ \hline 959,165\end{array}$

| 554,295 |
| ---: |
| 14,087 |
| 568,382 |

OPERATING EXPENSES
Distribution / Transmission
Customer Acctg \& Service
Admin \& General
Total Operating Expenses

| $580-599$ | 55,716 | 55,702 |
| ---: | ---: | ---: |
| $901-919$ | 32,025 | 32,025 |
| $920-932$ | 139,498 | 116,105 |
|  | 227,239 | 203,833 |

Depreciation Expense
403 216,988
Taxes Other Than Income Tax / Other
$408 \frac{60,288}{454,651}$

| 181,309 |
| ---: |
| 41,102 |
| 142,138 |
| 6,290 |
| 135,849 |
| $2,113,072$ |
| $6.43 \%$ |

Income Taxes

NET INCOME

RATE BASE

Return on Rate Base
$\qquad$

Classification
Functional
Secondary

## REVENUE REQUIREMENTS

Target Rate of Return
Rate Base

Operating expenses
Uncollectibles expense
15,312
15,437
Bill
Write-Offs
Depreciation expense
Regulatory Commission Expenses
926
926 Bill
Total_RR
General taxes / Other
Subtotal- Operating Costs to recover

Target Return on Rate Base- After tax
Income taxes to recover

Subtotal- Rev Req before GRT
GRT needed
TOTAL REVENUE REQUIREMENT

| JSSFctr <br> JSS Factors |  | Duquesne Light Company JSS / Class ACOS Study |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |
| Fac |  | Fully Projected Future Test Year |  |  |  |  |
| Exh 6-8A |  | JSS Factors |  |  |  |  |
| 0 | Allocator Name | Total | Supply | Transmission | Pitcairn | Distribution |
| 1 | None | 0 |  |  |  |  |
| 2 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 3 |  |  |  |  |  |  |
| 4 | Supp | 1 | 1 |  |  |  |
| 5 |  | 100.00\% | 100.00\% | 0.00\% | 0.00\% | 0.00\% |
| 6 |  |  |  |  |  |  |
| 7 | Tran | 1 |  | 1 |  |  |
| 8 |  | 100.00\% | 0.00\% | 100.00\% | 0.00\% | 0.00\% |
| 9 |  |  |  |  |  |  |
| 10 | Pitcairn | 1 |  |  | 1 |  |
| 11 |  | 100.00\% | 0.00\% | 0.00\% | 100.00\% | 0.00\% |
| 12 |  |  |  |  |  |  |
| 13 | Dist | 1 |  |  |  | 1 |
| 14 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 100.00\% |
| 15 |  |  |  |  |  |  |
| 16 | EV | 1 |  |  |  | 1 |
| 17 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 100.00\% |
| 18 |  |  |  |  |  |  |
| 19 | Other_Rev | 2,579 | 1,560 | 1,019 |  |  |
| 20 |  | 100.00\% | 60.49\% | 39.51\% | 0.00\% | 0.00\% |
| 21 |  |  |  |  |  |  |
| 22 | GRT_Rev | 852,166 | 228,903 | 65,227 | - | 558,036 |
| 23 |  | 100.00\% | 26.86\% | 7.65\% | 0.00\% | 65.48\% |
| 24 |  |  |  |  |  |  |
| 25 | GRT_Prop | 93,196 | 13,505 | 3,848 | 37,921 | 37,921 |
| 26 |  | 100.00\% | 14.49\% | 4.13\% | 40.69\% | 40.69\% |
| 27 |  |  |  |  |  |  |
| 28 | Labor | 49,600 | - | 8,606 | 7 | 40,987 |
| 29 |  | 100.00\% | 0.00\% | 17.35\% | 0.01\% | 82.63\% |
| 30 |  |  |  |  |  |  |
| 31 | M\&S | 33,483 | - | 7,425 | - | 26,058 |
| 32 |  | 100.00\% | 0.00\% | 22.18\% | 0.00\% | 77.82\% |
| 33 |  |  |  |  |  |  |
| 34 | OMxSupp | 241,332 |  | 36,012 | 34 | 205,286 |
| 35 |  | 100.00\% | 0.00\% | 14.92\% | 0.01\% | 85.06\% |
| 36 |  |  |  |  |  |  |


Allocator Name Total Primary Secondary Billing

| None | 0 |  | 0.00\% | 0.00\% |
| :---: | :---: | :---: | :---: | :---: |
|  | 0.00\% | 0.00\% |  |  |
| Prim |  | 1 |  |  |
|  | 100.00\% | 100.00\% | 0.00\% | 0.00\% |
| $\overline{S e c}$ | 1 |  | 1 |  |
|  | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
| Bill |  |  |  | 1 |
|  | 100.00\% | 0.00\% | 0.00\% | 100.00\% |
| EV | 100.00\% |  |  | 100.00\% |
|  | 100.00\% | 0.00\% | 0.00\% | 100.00\% |
| OH_COND | 100.00\% | 79.62\% | 20.38\% | 0.00\% |
|  | 100.00\% | 79.62\% | 20.38\% | 0.00\% |
| UG_Radial | 100.00\% | 89.37\% | 10.63\% | 0.00\% |
|  | 100.00\% | 89.37\% | 10.63\% | 0.00\% |
| UG_Network | 100.00\% | 84.96\% | 15.04\% | 0.00\% |
|  | 100.00\% | 84.96\% | 15.04\% | 0.00\% |
| UG_URD | 100.00\% | 85.03\% | 14.97\% | 0.00\% |
|  | 100.00\% | 85.03\% | 14.97\% | 0.00\% |
| LTrans_OH | 100.00\% | 10.34\% | 89.66\% | 0.00\% |
|  | 100.00\% | 10.34\% | 89.66\% | 0.00\% |
| LTrans_Rad | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
|  | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
| LTrans_Net | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
|  | 100.00\% | 0.00\% | 100.00\% | 0.00\% |


| FuncF |  | Duquesne Light Company |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Functionalization Factors |  | JSS / Class ACOS Study |  |  |  |
| Fac |  | Fully Projected Future Test Year |  |  |  |
| Exh 6-8B |  | Functionalization Factors |  |  |  |
|  | Allocator Name | Total | Primary | Secondary | Billing |
| 37 | LTrans_URD | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
| 38 |  | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
| 39 |  |  |  |  |  |
| 40 | LTrans_Tot | 490,787 | 31,045 | 459,742 | - |
| 41 |  | 100.00\% | 6.33\% | 93.67\% | 0.00\% |
| 42 |  |  |  |  |  |
| 43 | UG_Total | 679,628 | 599,052 | 80,576 | - |
| 44 |  | 100.00\% | 88.14\% | 11.86\% | 0.00\% |
| 45 |  |  |  |  |  |
| 46 | Revenue | 550,379 | 268,390 | 105,576 | 176,414 |
| 47 |  | 100.00\% | 48.76\% | 19.18\% | 32.05\% |
| 48 |  |  |  |  |  |
| 49 | Rev_PF | 624,187 | 302,875 | 118,955 | 202,357 |
| 50 |  | 100.00\% | 48.52\% | 19.06\% | 32.42\% |
| 51 |  |  |  |  |  |
| 52 | DistBill_RR-PF | 637,026 | 310,643 | 122,197 | 204,187 |
| 53 |  | 100.00\% | 48.76\% | 19.18\% | 32.05\% |
| 54 |  |  |  |  |  |
| 55 | GRT_Rev | 550,379 | 268,390 | 105,576 | 176,414 |
| 56 |  | 100.00\% | 48.76\% | 19.18\% | 32.05\% |
| 57 |  |  |  |  |  |
| 58 | GRT_Prop | 37,415 | 18,154 | 7,130 | 12,132 |
| 59 |  | 100.00\% | 48.52\% | 19.06\% | 32.42\% |
| 60 |  |  |  |  |  |
| 61 | Misc_Rev | - |  |  | - |
| 62 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 63 |  |  |  |  |  |
| 64 | Labor | 40,987 | 19,507 | 5,199 | 16,280 |
| 65 |  | 100.00\% | 47.59\% | 12.69\% | 39.72\% |
| 66 |  |  |  |  |  |
| 67 | D-Labor-Op | 12,980 | 6,630 | 2,016 | 4,335 |
| 68 |  | 100.00\% | 51.07\% | 15.53\% | 33.40\% |
| 69 |  |  |  |  |  |
| 70 | D-Labor-Mnt | 14,333 | 11,248 | 2,695 | 390 |
| 71 |  | 100.00\% | 78.47\% | 18.80\% | 2.72\% |
| 72 |  |  |  |  |  |

FuncFctr

Functionalization Factors
Fac
Exh 6-8B
0

| Allocator Name | Total | Primary | Secondary | Billing |
| :--- | :--- | :---: | :---: | :---: |
| Labor_Pt | $200.00 \%$ | $108.41 \%$ | $37.76 \%$ | $53.83 \%$ |
|  | $100.00 \%$ | $54.20 \%$ | $18.88 \%$ | $26.92 \%$ |
|  |  |  |  |  |
| OM | 205,286 | 90,133 | 24,684 | 90,469 |
|  | $100.00 \%$ | $43.91 \%$ | $12.02 \%$ | $44.07 \%$ |
| Intang | 370,398 | 59,781 | 25,277 | 285,340 |
|  | $100.00 \%$ | $16.14 \%$ | $6.82 \%$ | $77.04 \%$ |
|  |  |  |  |  |
| DistPt | $3,366,202$ | $2,259,595$ | 955,438 | 151,169 |
|  | $100.00 \%$ | $67.13 \%$ | $28.38 \%$ | $4.49 \%$ |
| Pretax |  |  |  |  |
|  | 140,685 | 96,402 | 41,566 | 2,717 |
|  | $100.00 \%$ | $68.52 \%$ | $29.55 \%$ | $1.93 \%$ |
| Plant |  |  |  |  |
|  | $4,088,758$ | $2,486,467$ | $1,025,250$ | 577,041 |
|  | $100.00 \%$ | $60.81 \%$ | $25.07 \%$ | $14.11 \%$ |

ClassFctr
Classification Factors
Fac
Exh 6-8C

| 0 | Allocator Name | Total | Demand | Commodity | Customer |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | None | 0 |  |  |  |
| 2 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 3 |  |  |  |  |  |
| 4 | Demand | 1 | 1 |  |  |
| 5 |  | 100.00\% | 100.00\% | 0.00\% | 0.00\% |
| 6 |  |  |  |  |  |
| 7 | Commodity |  |  | 1 |  |
| 8 |  | 100.00\% | 0.00\% | 100.00\% | 0.00\% |
| 9 |  |  |  |  |  |
| 10 | Customer | 1 |  |  | 1 |
| 11 |  | 100.00\% | 0.00\% | 0.00\% | 100.00\% |
| 12 |  |  |  |  |  |
| 13 | OH_Min | 100.00\% | 5.07\% | 0.00\% | 94.93\% |
| 14 |  | 100.00\% | 5.07\% | 0.00\% | 94.93\% |
| 15 |  |  |  |  |  |
| 16 | UG_Rad_Min | 100.00\% | 71.40\% | 0.00\% | 28.60\% |
| 17 |  | 100.00\% | 71.40\% | 0.00\% | 28.60\% |
| 18 |  |  |  |  |  |
| 19 | UG_Net_Min | 100.00\% | 56.61\% | 0.00\% | 43.39\% |
| 20 |  | 100.00\% | 56.61\% | 0.00\% | 43.39\% |
| 21 |  |  |  |  |  |
| 22 | UG_URD_Min | 100.00\% | 0.00\% | 0.00\% | 100.00\% |
| 23 |  | 100.00\% | 0.00\% | 0.00\% | 100.00\% |
| 24 |  |  |  |  |  |
| 25 | LTr_Min_OH | 100.00\% | 10.58\% | 0.00\% | 89.42\% |
| 26 |  | 100.00\% | 10.58\% | 0.00\% | 89.42\% |
| 27 |  |  |  |  |  |
| 28 | LTr_Min_Rad | 100.00\% | 85.89\% | 0.00\% | 14.11\% |
| 29 |  | 100.00\% | 85.89\% | 0.00\% | 14.11\% |
| 30 |  |  |  |  |  |
| 31 | LTr_Min_Net | 100.00\% | 10.82\% | 0.00\% | 89.18\% |
| 32 |  | 100.00\% | 10.82\% | 0.00\% | 89.18\% |
| 33 |  |  |  |  |  |
| 34 | LTr_Min_URD | 100.00\% | 15.72\% | 0.00\% | 84.28\% |
| 35 |  | 100.00\% | 15.72\% | 0.00\% | 84.28\% |
| 36 |  |  |  |  |  |

ClassFctr
Classification Factors
Fac
Exh 6-8C

| 0 | Allocator Name | Total | Demand | Commodity | Customer |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 37 | Sec_RB | 590231 | 112,773 | - | 477,459 |
| 38 |  | 100.00\% | 19.11\% | 0.00\% | 80.89\% |
| 39 |  |  |  |  |  |
| 40 | $\overline{\mathrm{Sec}-\mathrm{Pt}}$ | 999,972 | 186,789 | - | 813,184 |
| 41 |  | 100.00\% | 18.68\% | 0.00\% | 81.32\% |
| 42 |  |  |  |  |  |
| 43 | Sec-GenPt | 44535 | 5,650 | - | 38,885 |
| 44 |  | 100.00\% | 12.69\% | 0.00\% | 87.31\% |
| 45 |  |  |  |  |  |
| 46 | Sec-IntPt | 25,277 | 4,722 | - | 20,556 |
| 47 |  | 100.00\% | 18.68\% | 0.00\% | 81.32\% |
| 48 |  |  |  |  |  |
| 49 | Sec-OM | 24,684 | 3,089 | - | 21,595 |
| 50 |  | 100.00\% | 12.51\% | 0.00\% | 87.49\% |
| 51 |  |  |  |  |  |
| 52 | Sec-Lab | 5,199 | 660 | - | 4,540 |
| 53 |  | 100.00\% | 12.69\% | 0.00\% | 87.31\% |
| 54 |  |  |  |  |  |
| 55 | Sec-Rev | 105,576 | 19,055 | - | 86,521 |
| 56 |  | 100.00\% | 18.05\% | 0.00\% | 81.95\% |
| 57 |  |  |  |  |  |
| 58 | UG-Tot | 26,009 | 14,604 | - | 11,405 |
| 59 |  | 100.00\% | 56.15\% | 0.00\% | 43.85\% |
| 60 |  |  |  |  |  |
| 61 | LTr-Tot | 459,742 | 122,935 | - | 336,807 |
| 62 |  | 100.00\% | 26.74\% | 0.00\% | 73.26\% |
| 63 |  |  |  |  |  |
| 64 | Sec-Pretax | 41,566 | 8,088 | - | 33,478 |
| 65 |  | 100.00\% | 19.46\% | 0.00\% | 80.54\% |
| 66 |  |  |  |  |  |
| 67 | Sec-LabPt | 200.00\% | 31.37\% | 0.00\% | 168.63\% |
| 68 |  | 100.00\% | 15.68\% | 0.00\% | 84.32\% |
| 69 |  |  |  |  |  |
| 70 | Sec-RetRRPF | 122,197 | 22,054 | - | 100,142 |
| 71 |  | 100.00\% | 18.05\% | 0.00\% | 81.95\% |
| 72 |  |  |  |  |  |

Duquesne Light Company


| AllocFctr |  |  | Duquesne Light Company |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class Allocation Factors |  |  | JSS / Class ACOS Study |  |  |  |  |  |  |
| Fac |  |  | Fully Projected Future Test Year |  |  |  |  |  |  |
| Exh 6-8D |  |  | Class Allocation Factors |  |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 1 | None | - |  |  |  |  |  |  |  |
| 2 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 3 |  |  |  |  |  |  |  |  |  |
| 4 | Supply | 0 |  |  |  |  |  |  |  |
| 5 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 6 |  |  |  |  |  |  |  |  |  |
| 7 | Trans | - |  |  |  |  |  |  |  |
| 8 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 9 |  |  |  |  |  |  |  |  |  |
| 10 | Pitcairn | - |  |  |  |  |  |  |  |
| 11 |  | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 12 |  |  |  |  |  |  |  |  |  |
| 13 | EV_390 | 1,081 | 199 | 27 | 63 |  |  |  |  |
| 14 |  | 100.00\% | 18.39\% | 2.54\% | 5.84\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 15 |  |  |  |  |  |  |  |  |  |
| 16 | EV_Depr | 143 | 20 | 3 | 6 |  |  |  |  |
| 17 |  | 100.00\% | 13.92\% | 1.92\% | 4.42\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 18 |  |  |  |  |  |  |  |  |  |
| 19 | $\overline{E V} 182$ | (53) | (10) | (1) | (3) |  |  |  |  |
| 20 |  | 100.00\% | 18.52\% | 2.56\% | 5.89\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 21 |  |  |  |  |  |  |  |  |  |
| 22 | EV_930 | 350 | 54 | 7 | 17 |  |  |  |  |
| 23 |  | 100.00\% | 15.50\% | 2.14\% | 4.93\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 24 |  |  |  |  |  |  |  |  |  |
| 25 | EV_403 | 143 | 20 | 3 | 6 |  |  |  |  |
| 26 |  | 100.00\% | 13.92\% | 1.92\% | 4.42\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 27 |  |  |  |  |  |  |  |  |  |
| 28 | 908CV | 1,453 | - | - | - | - | - | - | - |
| 29 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 30 |  |  |  |  |  |  |  |  |  |
| 31 | MWh-Meter | 12,058,025 | 2,559,511 | 314,530 | 937,897 | 1,213,147 | 24,592 | 28,667 | 21,127 |
| 32 |  | 100.00\% | 21.23\% | 2.61\% | 7.78\% | 10.06\% | 0.20\% | 0.24\% | 0.18\% |
| 33 |  |  |  |  |  |  |  |  |  |
| 34 | 1CP | 2,609 | 466 | 57 | 153 | 136 | - | - | 3 |
| 35 |  | 100.00\% | 17.85\% | 2.18\% | 5.85\% | 5.23\% | 0.00\% | 0.00\% | 0.10\% |
| 36 |  |  |  |  |  |  |  |  |  |
| 37 | NCP | 3,043 | 497 | 67 | 167 | 233 | 9 | 8 | 3 |
| 38 |  | 100.00\% | 16.32\% | 2.19\% | 5.49\% | 7.65\% | 0.30\% | 0.26\% | 0.10\% |
| 39 |  |  |  |  |  |  |  |  |  |
| 40 | NCP-Prim | 2,807 | 494 | 67 | 167 | - | 9 | 8 | 3 |
| 41 |  | 100.00\% | 17.60\% | 2.38\% | 5.95\% | 0.00\% | 0.33\% | 0.29\% | 0.11\% |
| 42 |  |  |  |  |  |  |  |  |  |


| AllocFctr |  |  | Duquesne Light Company |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class Allocation Factors |  |  | JSS / Class ACOS Study |  |  |  |  |  |  |  |
| Fac |  |  | Fully Projected Future Test Year |  |  |  |  |  |  |  |
| Exh 6-8D |  |  | Class Allocation Factors |  |  |  |  |  |  |  |
| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | $\mathbf{G M}>25$ | $\mathbf{G M H}<\mathbf{2 5}$ | GMH>25 |
| 43 | NCP-Prim-Net | 73 | - | - | - | 0 | 2 | 11 | 0 | 1 |
| 44 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.18\% | 2.76\% | 15.73\% | 0.42\% | 2.03\% |
| 45 |  |  |  |  |  |  |  |  |  |  |
| 46 | NCP-Prim-NonNet | 2,735 | 1,152 | 154 | 18 | 24 | 151 | 485 | 16 | 44 |
| 47 |  | 100.00\% | 42.14\% | 5.61\% | 0.67\% | 0.89\% | 5.51\% | 17.72\% | 0.59\% | 1.60\% |
| 48 |  |  |  |  |  |  |  |  |  |  |
| 49 | NCP-Prim-URD | 149 | 130 | 17 | 2 | - | - | - | - | - |
| 50 |  | 100.00\% | 87.02\% | 11.59\% | 1.39\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 51 |  |  |  |  |  |  |  |  |  |  |
| 52 | NCP-Prim-Rad | 1,443 | 29 | 4 | 0 | 24 | 151 | 485 | 16 | 44 |
| 53 |  | 100.00\% | 2.00\% | 0.27\% | 0.03\% | 1.69\% | 10.43\% | 33.58\% | 1.13\% | 3.02\% |
| 54 |  |  |  |  |  |  |  |  |  |  |
| 55 | NCP-Sec | 2,721 | 1,152 | 154 | 18 | 25 | 153 | 496 | 17 | 45 |
| 56 |  | 100.00\% | 42.35\% | 5.64\% | 0.68\% | 0.90\% | 5.61\% | 18.23\% | 0.61\% | 1.66\% |
| 57 |  |  |  |  |  |  |  |  |  |  |
| 58 | NCP-Sec-Xfmr | 1,296 | - | 27 | - | - | 89 | 475 | 9 | 43 |
| 59 |  | 100.00\% | 0.00\% | 2.05\% | 0.00\% | 0.00\% | 6.88\% | 36.65\% | 0.68\% | 3.33\% |
| 60 |  |  |  |  |  |  |  |  |  |  |
| 61 | NCP-Sec-Net | 73 | - | - | - | 0 | 2 | 11 | 0 | 1 |
| 62 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.18\% | 2.76\% | 15.73\% | 0.42\% | 2.03\% |
| 63 |  |  |  |  |  |  |  |  |  |  |
| 64 | NCP-Sec-NonNet | 2,648 | 1,152 | 154 | 18 | 24 | 151 | 485 | 16 | 44 |
| 65 |  | 100.00\% | 43.52\% | 5.80\% | 0.70\% | 0.92\% | 5.68\% | 18.30\% | 0.61\% | 1.65\% |
| 66 |  |  |  |  |  |  |  |  |  |  |
| 67 | NCP-Sec-URD | 149 | 130 | 17 | 2 | - | - | - | - | - |
| 68 |  | 100.00\% | 87.02\% | 11.59\% | 1.39\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 69 |  |  |  |  |  |  |  |  |  |  |
| 70 | NCP-Sec-Rad | 1,357 | 29 | 4 | 0 | 24 | 151 | 485 | 16 | 44 |
| 71 |  | 100.00\% | 2.12\% | 0.28\% | 0.03\% | 1.80\% | 11.10\% | 35.71\% | 1.20\% | 3.21\% |
| 72 |  |  |  |  |  |  |  |  |  |  |
| 73 | NCP-Sec-Rad-Xfmr | 1,311 | - | , | - | 19 | 146 | 483 | 16 | 43 |
| 74 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 1.46\% | 11.17\% | 36.86\% | 1.20\% | 3.32\% |
| 75 |  |  |  |  |  |  |  |  |  |  |
| 76 | MWh- Tx Level | 13,105,709 | 3,770,461 | 437,488 | 65,907 | 110,251 | 671,651 | 2,317,488 | 63,920 | 198,707 |
| 77 |  | 100.00\% | 28.77\% | 3.34\% | 0.50\% | 0.84\% | 5.12\% | 17.68\% | 0.49\% | 1.52\% |
| 78 |  |  |  |  |  |  |  |  |  |  |
| 79 | Billed-MW | 18,289 | 0 | 0 | 0 | 0 | 2,621 | 6,547 | 89 | 151 |
| 80 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 14.33\% | 35.80\% | 0.49\% | 0.82\% |
| 81 |  |  |  |  |  |  |  |  |  |  |
| 82 | Avg-Cust | 604,358 | 496,018 | 39,909 | 5,920 | 24,936 | 20,206 | 6,772 | 2,507 | 642 |
| 83 |  | 100.00\% | 82.07\% | 6.60\% | 0.98\% | 4.13\% | 3.34\% | 1.12\% | 0.41\% | 0.11\% |
| 84 |  |  |  |  |  |  |  |  |  |  |


| Alloc |  |  | uesne Light | ompany |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class | Allocation Factors |  | Class ACO | Study |  |  |  |  |  |
| Fac |  |  | Projected F | uture Test |  |  |  |  |  |
| Exh 6 |  |  | Allocation | actors |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 43 | NCP-Prim-Net | 73 | 37 | 15 | 5 | - | - | - | 0 |
| 44 |  | 100.00\% | 51.29\% | 20.57\% | 6.98\% | 0.00\% | 0.00\% | 0.00\% | 0.03\% |
| 45 |  |  |  |  |  |  |  |  |  |
| 46 | NCP-Prim-NonNet | 2,735 | 457 | 52 | 162 | - | 9 | 8 | 3 |
| 47 |  | 100.00\% | 16.70\% | 1.89\% | 5.93\% | 0.00\% | 0.34\% | 0.29\% | 0.11\% |
| 48 |  |  |  |  |  |  |  |  |  |
| 49 | NCP-Prim-URD | 149 | - | - | - | - | - | - | - |
| 50 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 51 |  |  |  |  |  |  |  |  |  |
| 52 | NCP-Prim-Rad | 1,443 | 457 | 52 | 162 | - | 9 | 8 | 3 |
| 53 |  | 100.00\% | 31.64\% | 3.58\% | 11.23\% | 0.00\% | 0.64\% | 0.56\% | 0.21\% |
| 54 |  |  |  |  |  |  |  |  |  |
| 55 | NCP-Sec | 2,721 | 459 | 64 | 119 | - | 9 | 8 | 3 |
| 56 |  | 100.00\% | 16.88\% | 2.34\% | 4.36\% | 0.00\% | 0.34\% | 0.30\% | 0.11\% |
| 57 |  |  |  |  |  |  |  |  |  |
| 58 | NCP-Sec-Xfmr | 1,296 | 457 | 63 | 119 | - | 9 | 5 | - |
| 59 |  | 100.00\% | 35.27\% | 4.89\% | 9.15\% | 0.00\% | 0.71\% | 0.39\% | 0.00\% |
| 60 |  |  |  |  |  |  |  |  |  |
| 61 | NCP-Sec-Net | 73 | 37 | 15 | 5 | - | - | - | 0 |
| 62 |  | 100.00\% | 51.29\% | 20.57\% | 6.98\% | 0.00\% | 0.00\% | 0.00\% | 0.03\% |
| 63 |  |  |  |  |  |  |  |  |  |
| 64 | NCP-Sec-NonNet | 2,648 | 422 | 49 | 114 | - | 9 | 8 | 3 |
| 65 |  | 100.00\% | 15.93\% | 1.84\% | 4.29\% | 0.00\% | 0.35\% | 0.30\% | 0.12\% |
| 66 |  |  |  |  |  |  |  |  |  |
| 67 | NCP-Sec-URD | 149 | - | - | - | - | - | - | - |
| 68 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 69 |  |  |  |  |  |  |  |  |  |
| 70 | NCP-Sec-Rad | 1,357 | 422 | 49 | 114 | - | 9 | 8 | 3 |
| 71 |  | 100.00\% | 31.09\% | 3.58\% | 8.37\% | 0.00\% | 0.68\% | 0.59\% | 0.22\% |
| 72 |  |  |  |  |  |  |  |  |  |
| 73 | NCP-Sec-Rad-Xfmr | 1,311 | 422 | 49 | 114 | - | 9 | 8 | 2 |
| 74 |  | 100.00\% | 32.17\% | 3.71\% | 8.66\% | 0.00\% | 0.71\% | 0.60\% | 0.14\% |
| 75 |  |  |  |  |  |  |  |  |  |
| 76 | MWh- Tx Level | 13,105,709 | 2,799,830 | 344,605 | 1,018,252 | 1,225,522 | 26,985 | 31,458 | 23,184 |
| 77 |  | 100.00\% | 21.36\% | 2.63\% | 7.77\% | 9.35\% | 0.21\% | 0.24\% | 0.18\% |
| 78 |  |  |  |  |  |  |  |  |  |
| 79 | Billed-MW | 18,289 | 6,658 | 251 | 1,972 | 0 | 0 | 0 | 0 |
| 80 |  | 100.00\% | 36.40\% | 1.37\% | 10.78\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 81 |  |  |  |  |  |  |  |  |  |
| 82 | Avg-Cust | 604,358 | 736 | 88 | 20 | 9 | 1 | 964 | 5,630 |
| 83 |  | 100.00\% | 0.12\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.16\% | 0.93\% |
| 84 |  |  |  |  |  |  |  |  |  |


| AllocF |  |  | quesne Ligh | Company |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class | Allocation Factors |  | S / Class AC | Study |  |  |  |  |  |  |
| Fac |  |  | Ily Projected | uture Test |  |  |  |  |  |  |
| Exh 6-8 |  |  | ass Allocatio | Factors |  |  |  |  |  |  |
| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | $\mathbf{G M}>\mathbf{2 5}$ | GMH $<25$ | GMH $>25$ |
| 85 | Bills | 7,252,295 | 5,952,211 | 478,910 | 71,035 | 299,232 | 242,476 | 81,264 | 30,085 | 7,699 |
| 86 |  | 100.00\% | 82.07\% | 6.60\% | 0.98\% | 4.13\% | 3.34\% | 1.12\% | 0.41\% | 0.11\% |
| 87 |  |  |  |  |  |  |  |  |  |  |
| 88 | Avg-Cust-Net | 794 | - | - | - | 162 | 278 | 171 | 81 | 36 |
| 89 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 20.40\% | 35.01\% | 21.54\% | 10.20\% | 4.53\% |
| 90 |  |  |  |  |  |  |  |  |  |  |
| 91 | Avg-Cust-Net-Xfmr | 122 | - | - | - | 2 | 6 | 40 | 2 | 8 |
| 92 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 1.42\% | 5.19\% | 32.65\% | 1.68\% | 6.44\% |
| 93 |  |  |  |  |  |  |  |  |  |  |
| 94 | Avg-Cust-NonNet | 603,555 | 496,018 | 39,909 | 5,920 | 24,774 | 19,928 | 6,601 | 2,426 | 606 |
| 95 |  | 100.00\% | 82.18\% | 6.61\% | 0.98\% | 4.10\% | 3.30\% | 1.09\% | 0.40\% | 0.10\% |
| 96 |  |  |  |  |  |  |  |  |  |  |
| 97 | Avg-Cust-URD | 47,417 | 43,407 | 3,492 | 518 | - | - | - | - | - |
| 98 |  | 100.00\% | 91.54\% | 7.37\% | 1.09\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 99 |  |  |  |  |  |  |  |  |  |  |
| 100 | Avg-Cust-Rad | 556,147 | 452,611 | 36,417 | 5,402 | 24,774 | 19,928 | 6,601 | 2,426 | 606 |
| 101 |  | 100.00\% | 81.38\% | 6.55\% | 0.97\% | 4.45\% | 3.58\% | 1.19\% | 0.44\% | 0.11\% |
| 102 |  |  |  |  |  |  |  |  |  |  |
| 103 | Services_Cost | 289,354 | 238,064 | 19,154 | 2,841 | 12,152 | 11,191 | 3,751 | 1,389 | 355 |
| 104 |  | 100.00\% | 82.27\% | 6.62\% | 0.98\% | 4.20\% | 3.87\% | 1.30\% | 0.48\% | 0.12\% |
| 105 |  |  |  |  |  |  |  |  |  |  |
| 106 | Meters | 605,719 | 498,187 | 39,909 | 5,920 | 25,825 | 23,476 | 7,868 | 2,699 | 691 |
| 107 |  | 100.00\% | 82.25\% | 6.59\% | 0.98\% | 4.26\% | 3.88\% | 1.30\% | 0.45\% | 0.11\% |
| 108 |  |  |  |  |  |  |  |  |  |  |
| 109 | Meter_Cost | 102,540 | 62,458 | 5,003 | 742 | 3,238 | 11,304 | 14,997 | 1,300 | 1,317 |
| 110 |  | 100.00\% | 60.91\% | 4.88\% | 0.72\% | 3.16\% | 11.02\% | 14.63\% | 1.27\% | 1.28\% |
| 111 |  |  |  |  |  |  |  |  |  |  |
| 112 | Meter_Tech | 123,555 | 62,458 | 5,003 | 742 | 3,238 | 13,565 | 29,994 | 1,560 | 2,634 |
| 113 |  | 100.00\% | 50.55\% | 4.05\% | 0.60\% | 2.62\% | 10.98\% | 24.28\% | 1.26\% | 2.13\% |
| 114 |  |  |  |  |  |  |  |  |  |  |
| 115 | AMI_Cost | 44,371 | 29,226 | 2,341 | 347 | 1,515 | 5,985 | 3,461 | 688 | 304 |
| 116 |  | 100.00\% | 65.87\% | 5.28\% | 0.78\% | 3.41\% | 13.49\% | 7.80\% | 1.55\% | 0.69\% |
| 117 |  |  |  |  |  |  |  |  |  |  |
| 118 | Acct370 | 102,540 | 62,458 | 5,003 | 742 | 3,238 | 11,304 | 14,997 | 1,300 | 1,317 |
| 119 |  | 100.00\% | 60.91\% | 4.88\% | 0.72\% | 3.16\% | 11.02\% | 14.63\% | 1.27\% | 1.28\% |
| 120 |  |  |  |  |  |  |  |  |  |  |
| 121 | Dist_Rev | 550,378 | 292,160 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| 122 |  | 100.00\% | 53.08\% | 5.09\% | 0.59\% | 2.12\% | 6.02\% | 12.62\% | 0.65\% | 1.07\% |
| 123 |  |  |  |  |  |  |  |  |  |  |
| 124 | Total_Rev | 844,336 | 477,890 | 49,647 | 6,490 | 16,581 | 56,775 | 107,796 | 5,960 | 8,853 |
| 125 |  | 100.00\% | 56.60\% | 5.88\% | 0.77\% | 1.96\% | 6.72\% | 12.77\% | 0.71\% | 1.05\% |
| 126 |  |  |  |  |  |  |  |  |  |  |


| Alloc |  |  | usne Light | ompany |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class | Allocation Factors |  | Class ACO | Study |  |  |  |  |  |
| Fac |  |  | Projected | ture Test Y |  |  |  |  |  |
| Exh 6- |  |  | Allocation | actors |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 85 | Bills | 7,252,295 | 8,837 | 1,057 | 241 | 108 | 12 | 11,568 | 67,561 |
| 86 |  | 100.00\% | 0.12\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.16\% | 0.93\% |
| 87 |  |  |  |  |  |  |  |  |  |
| 88 | Avg-Cust-Net | 794 | 52 | 11 | 1 | - | - | - | 2 |
| 89 |  | 100.00\% | 6.55\% | 1.39\% | 0.13\% | 0.00\% | 0.00\% | 0.00\% | 0.25\% |
| 90 |  |  |  |  |  |  |  |  |  |
| 91 | Avg-Cust-Net-Xfmr | 122 | 52 | 11 | 1 | - | - | - | 0 |
| 92 |  | 100.00\% | 42.74\% | 9.04\% | 0.82\% | 0.00\% | 0.00\% | 0.00\% | 0.01\% |
| 93 |  |  |  |  |  |  |  |  |  |
| 94 | Avg-Cust-NonNet | 603,555 | 684 | 77 | 19 | - | 1 | 964 | 5,628 |
| 95 |  | 100.00\% | 0.11\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.16\% | 0.93\% |
| 96 |  |  |  |  |  |  |  |  |  |
| 97 | Avg-Cust-URD | 47,417 | - | - | - | - | - | - | - |
| 98 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 99 |  |  |  |  |  |  |  |  |  |
| 100 | Avg-Cust-Rad | 556,147 | 684 | 77 | 19 | 9 | 1 | 964 | 5,628 |
| 101 |  | 100.00\% | 0.12\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.17\% | 1.01\% |
| 102 |  |  |  |  |  |  |  |  |  |
| 103 | Services_Cost | 289,354 | 408 | 49 | 0 | 0 | 0 | 0 | 0 |
| 104 |  | 100.00\% | 0.14\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 105 |  |  |  |  |  |  |  |  |  |
| 106 | Meters | 605,719 | 966 | 115 | 52 | 11 | - | - | - |
| 107 |  | 100.00\% | 0.16\% | 0.02\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 108 |  |  |  |  |  |  |  |  |  |
| 109 | Meter_Cost | 102,540 | 1,841 | 219 | 99 | 21 | - | - | - |
| 110 |  | 100.00\% | 1.80\% | 0.21\% | 0.10\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |
| 111 |  |  |  |  |  |  |  |  |  |
| 112 | Meter_Tech | 123,555 | 3,683 | 438 | 198 | 42 | - | - | - |
| 113 |  | 100.00\% | 2.98\% | 0.35\% | 0.16\% | 0.03\% | 0.00\% | 0.00\% | 0.00\% |
| 114 |  |  |  |  |  |  |  |  |  |
| 115 | AMI_Cost | 44,371 | 425 | 51 | 23 | 5 | - | - | - |
| 116 |  | 100.00\% | 0.96\% | 0.11\% | 0.05\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% |
| 117 |  |  |  |  |  |  |  |  |  |
| 118 | Acct370 | 102,540 | 1,841 | 219 | 99 | 21 | - | - | - |
| 119 |  | 100.00\% | 1.80\% | 0.21\% | 0.10\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |
| 120 |  |  |  |  |  |  |  |  |  |
| 121 | Dist_Rev | 550,378 | 64,407 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 122 |  | 100.00\% | 11.70\% | 1.31\% | 3.39\% | 0.06\% | 0.27\% | 1.81\% | 0.20\% |
| 123 |  |  |  |  |  |  |  |  |  |
| 124 | Total_Rev | 844,336 | 72,758 | 9,480 | 18,667 | 324 | 1,492 | 10,303 | 1,321 |
| 125 |  | 100.00\% | 8.62\% | 1.12\% | 2.21\% | 0.04\% | 0.18\% | 1.22\% | 0.16\% |
| 126 |  |  |  |  |  |  |  |  |  |

AllocFctr
Class Allocation Factors
Fac
Exh 6-8D

| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 127 | Supp_Rev | 227,343 | 137,809 | 18,774 | 2,570 | 4,109 | 18,524 | 31,678 | 1,989 | 2,496 |
| 128 |  | 100.00\% | 60.62\% | 8.26\% | 1.13\% | 1.81\% | 8.15\% | 13.93\% | 0.87\% | 1.10\% |
| 129 |  |  |  |  |  |  |  |  |  |  |
| 130 | Trans_Rev | 66,615 | 47,921 | 2,837 | 691 | 798 | 5,091 | 6,646 | 369 | 467 |
| 131 |  | 100.00\% | 71.94\% | 4.26\% | 1.04\% | 1.20\% | 7.64\% | 9.98\% | 0.55\% | 0.70\% |
| 132 |  |  |  |  |  |  |  |  |  |  |
| 133 | Total_Rev_POLR | 1,382,826 | 551,273 | 53,468 | 7,478 | 18,321 | 76,555 | 211,295 | 7,422 | 17,775 |
| 134 |  | 100.00\% | 39.87\% | 3.87\% | 0.54\% | 1.32\% | 5.54\% | 15.28\% | 0.54\% | 1.29\% |
| 135 |  |  |  |  |  |  |  |  |  |  |
| 136 | Revenue-Res | 534,027 | 477,890 | 49,647 | 6,490 | 0 | 0 | 0 | 0 | 0 |
| 137 |  | 100.00\% | 89.49\% | 9.30\% | 1.22\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 138 |  |  |  |  |  |  |  |  |  |  |
| 139 | CustDeposits | 7,717,413 | 4,590,348 | 574,358 | 39,865 | 455,002 | 759,771 | 835,441 | 70,427 | 75,844 |
| 140 |  | 100.00\% | 59.48\% | 7.44\% | 0.52\% | 5.90\% | 9.84\% | 10.83\% | 0.91\% | 0.98\% |
| 141 |  |  |  |  |  |  |  |  |  |  |
| 142 | Acct901903 | 100.00\% | 80.88\% | 10.47\% | 0.66\% | 2.70\% | 2.34\% | 2.16\% | 0.32\% | 0.26\% |
| 143 |  | 100.00\% | 80.88\% | 10.47\% | 0.66\% | 2.70\% | 2.34\% | 2.16\% | 0.32\% | 0.26\% |
| 144 |  |  |  |  |  |  |  |  |  |  |
| 145 | Write-Offs | 100.00\% | 79.14\% | 13.37\% | 0.41\% | 1.58\% | 1.55\% | 2.94\% | 0.25\% | 0.37\% |
| 146 |  | 100.00\% | 79.14\% | 13.37\% | 0.41\% | 1.58\% | 1.55\% | 2.94\% | 0.25\% | 0.37\% |
| 147 |  |  |  |  |  |  |  |  |  |  |
| 148 | StLgt-Cost | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 149 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 150 |  |  |  |  |  |  |  |  |  |  |
| 151 | Cust-Res | 542 | 496 | 40 | 6 | 0 | 0 | 0 | 0 | 0 |
| 152 |  | 100.00\% | 91.54\% | 7.37\% | 1.09\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 153 |  |  |  |  |  |  |  |  |  |  |
| 154 | PriD-RB | 1,402,665 | 471,173 | 62,760 | 7,540 | 13,765 | 86,182 | 282,392 | 9,397 | 25,866 |
| 155 |  | 100.00\% | 33.59\% | 4.47\% | 0.54\% | 0.98\% | 6.14\% | 20.13\% | 0.67\% | 1.84\% |
| 156 |  |  |  |  |  |  |  |  |  |  |
| 157 | PriD-Lab | 19,507 | 7,190 | 958 | 115 | 185 | 1,152 | 3,750 | 125 | 341 |
| 158 |  | 100.00\% | 36.86\% | 4.91\% | 0.59\% | 0.95\% | 5.91\% | 19.22\% | 0.64\% | 1.75\% |
| 159 |  |  |  |  |  |  |  |  |  |  |
| 160 | PriD-DxPt | 2,259,595 | 766,631 | 102,115 | 12,269 | 22,132 | 138,457 | 453,221 | 15,089 | 41,473 |
| 161 |  | 100.00\% | 33.93\% | 4.52\% | 0.54\% | 0.98\% | 6.13\% | 20.06\% | 0.67\% | 1.84\% |
| 162 |  |  |  |  |  |  |  |  |  |  |
| 163 | PriD-Pt | 2,426,686 | 828,220 | 110,319 | 13,254 | 23,716 | 148,325 | 485,342 | 16,161 | 44,397 |
| 164 |  | 100.00\% | 34.13\% | 4.55\% | 0.55\% | 0.98\% | 6.11\% | 20.00\% | 0.67\% | 1.83\% |
| 165 |  |  |  |  |  |  |  |  |  |  |
| 166 | PriD-IntPt | 59,781 | 20,403 | 2,718 | 327 | 584 | 3,654 | 11,956 | 398 | 1,094 |
| 167 |  | 100.00\% | 34.13\% | 4.55\% | 0.55\% | 0.98\% | 6.11\% | 20.00\% | 0.67\% | 1.83\% |
| 168 |  |  |  |  |  |  |  |  |  |  |


| AllocFctr |  |  | Duquesne Light Company |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class Allocation Factors |  |  | JSS / Class ACOS Study |  |  |  |  |  |  |
| Fac |  |  | Fully Projected Future Test Year |  |  |  |  |  |  |
| Exh 6-8D |  |  | Class Allocation Factors |  |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 127 | Supp_Rev | 227,343 | 6,930 | 1,940 | 0 | 0 | 0 | 344 | 181 |
| 128 |  | 100.00\% | 3.05\% | 0.85\% | 0.00\% | 0.00\% | 0.00\% | 0.15\% | 0.08\% |
| 129 |  |  |  |  |  |  |  |  |  |
| 130 | Trans_Rev | 66,615 | 1,420 | 349 | 0 | 0 | 0 | 0 | 25 |
| 131 |  | 100.00\% | 2.13\% | 0.52\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.04\% |
| 132 |  |  |  |  |  |  |  |  |  |
| 133 | Total_Rev_POLR | 1,382,826 | 234,985 | 28,393 | 81,302 | 78,830 | 2,311 | 10,961 | 2,455 |
| 134 |  | 100.00\% | 16.99\% | 2.05\% | 5.88\% | 5.70\% | 0.17\% | 0.79\% | 0.18\% |
| 135 |  |  |  |  |  |  |  |  |  |
| 136 | Revenue-Res | 534,027 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 137 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 138 |  |  |  |  |  |  |  |  |  |
| 139 | CustDeposits | 7,717,413 | 315,857 | - | - | - | 250 | 250 | - |
| 140 |  | 100.00\% | 4.09\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 141 |  |  |  |  |  |  |  |  |  |
| 142 | Acct901903 | 100.00\% | 0.19\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 143 |  | 100.00\% | 0.19\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 144 |  |  |  |  |  |  |  |  |  |
| 145 | Write-Offs | 100.00\% | 0.23\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.10\% | 0.06\% |
| 146 |  | 100.00\% | 0.23\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.10\% | 0.06\% |
| 147 |  |  |  |  |  |  |  |  |  |
| 148 | StLgt-Cost | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 100.00\% | 0.00\% |
| 149 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 100.00\% | 0.00\% |
| 150 |  |  |  |  |  |  |  |  |  |
| 151 | Cust-Res | 542 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| 152 |  | 100.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 153 |  |  |  |  |  |  |  |  |  |
| 154 | PriD-RB | 1,402,665 | 292,599 | 43,877 | 95,697 | - | 5,183 | 4,506 | 1,726 |
| 155 |  | 100.00\% | 20.86\% | 3.13\% | 6.82\% | 0.00\% | 0.37\% | 0.32\% | 0.12\% |
| 156 |  |  |  |  |  |  |  |  |  |
| 157 | PriD-Lab | 19,507 | 3,756 | 516 | 1,265 | - | 70 | 61 | 23 |
| 158 |  | 100.00\% | 19.26\% | 2.64\% | 6.48\% | 0.00\% | 0.36\% | 0.31\% | 0.12\% |
| 159 |  |  |  |  |  |  |  |  |  |
| 160 | PriD-DxPt | 2,259,595 | 467,198 | 69,174 | 153,474 | - | 8,338 | 7,249 | 2,774 |
| 161 |  | 100.00\% | 20.68\% | 3.06\% | 6.79\% | 0.00\% | 0.37\% | 0.32\% | 0.12\% |
| 162 |  |  |  |  |  |  |  |  |  |
| 163 | PriD-Pt | 2,426,686 | 499,373 | 73,592 | 164,307 | - | 8,937 | 7,770 | 2,973 |
| 164 |  | 100.00\% | 20.58\% | 3.03\% | 6.77\% | 0.00\% | 0.37\% | 0.32\% | 0.12\% |
| 165 |  |  |  |  |  |  |  |  |  |
| 166 | PriD-IntPt | 59,781 | 12,302 | 1,813 | 4,048 | - | 220 | 191 | 73 |
| 167 |  | 100.00\% | 20.58\% | 3.03\% | 6.77\% | 0.00\% | 0.37\% | 0.32\% | 0.12\% |
| 168 |  |  |  |  |  |  |  |  |  |


| AllocFctr |  |  | Duquesne Light Company |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class Allocation Factors |  |  | JSS / Class ACOS Study |  |  |  |  |  |  |  |
| Fac |  |  | Fully Projected Future Test Year |  |  |  |  |  |  |  |
| Exh 6-8D |  |  | ass Allocation Factors |  |  |  |  |  |  |  |
| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | GMH $>25$ |
| 169 | PriD-GenPt | 167,091 | 61,589 | 8,204 | 986 | 1,584 | 9,868 | 32,121 | 1,072 | 2,924 |
| 170 |  | 100.00\% | 36.86\% | 4.91\% | 0.59\% | 0.95\% | 5.91\% | 19.22\% | 0.64\% | 1.75\% |
| 171 |  |  |  |  |  |  |  |  |  |  |
| 172 | PriD-UG | 599,052 | 79,127 | 10,540 | 1,266 | 7,534 | 47,845 | 159,548 | 5,266 | 14,858 |
| 173 |  | 100.00\% | 13.21\% | 1.76\% | 0.21\% | 1.26\% | 7.99\% | 26.63\% | 0.88\% | 2.48\% |
| 174 |  |  |  |  |  |  |  |  |  |  |
| 175 | PriD-LTr | 31,045 | 13,084 | 1,743 | 209 | 277 | 1,709 | 5,501 | 185 | 495 |
| 176 |  | 100.00\% | 42.14\% | 5.61\% | 0.67\% | 0.89\% | 5.51\% | 17.72\% | 0.59\% | 1.60\% |
| 177 |  |  |  |  |  |  |  |  |  |  |
| 178 | PriD-Pretax | 96,402 | 78,527 | 5,450 | 591 | 3,863 | 5,833 | 1,219 | 632 | (93) |
| 179 |  | 100.00\% | 81.46\% | 5.65\% | 0.61\% | 4.01\% | 6.05\% | 1.26\% | 0.66\% | -0.10\% |
| 180 |  |  |  |  |  |  |  |  |  |  |
| 181 | SecD-RB | 112,773 | 8,407 | 1,478 | 135 | 1,252 | 10,135 | 36,182 | 1,092 | 3,312 |
| 182 |  | 100.00\% | 7.45\% | 1.31\% | 0.12\% | 1.11\% | 8.99\% | 32.08\% | 0.97\% | 2.94\% |
| 183 |  |  |  |  |  |  |  |  |  |  |
| 184 | SecD-Lab | 660 | 82 | 12 | 1 | 8 | 56 | 196 | 6 | 18 |
| 185 |  | 100.00\% | 12.37\% | 1.83\% | 0.20\% | 1.17\% | 8.56\% | 29.70\% | 0.93\% | 2.73\% |
| 186 |  |  |  |  |  |  |  |  |  |  |
| 187 | $\overline{\mathrm{Sec} D-D x P t}$ | 181,139 | 13,393 | 2,367 | 214 | 2,005 | 16,287 | 58,195 | 1,754 | 5,327 |
| 188 |  | 100.00\% | 7.39\% | 1.31\% | 0.12\% | 1.11\% | 8.99\% | 32.13\% | 0.97\% | 2.94\% |
| 189 |  |  |  |  |  |  |  |  |  |  |
| 190 | SecD-Pt | 186,789 | 14,092 | 2,471 | 226 | 2,072 | 16,771 | 59,873 | 1,807 | 5,481 |
| 191 |  | 100.00\% | 7.54\% | 1.32\% | 0.12\% | 1.11\% | 8.98\% | 32.05\% | 0.97\% | 2.93\% |
| 192 |  |  |  |  |  |  |  |  |  |  |
| 193 | SecD-IntPt | 4,722 | 356 | 62 | 6 | 52 | 424 | 1,513 | 46 | 139 |
| 194 |  | 100.00\% | 7.54\% | 1.32\% | 0.12\% | 1.11\% | 8.98\% | 32.05\% | 0.97\% | 2.93\% |
| 195 |  |  |  |  |  |  |  |  |  |  |
| 196 | SecD-UG | 45,243 | 789 | 105 | 13 | 682 | 4,344 | 14,539 | 479 | 1,358 |
| 197 |  | 100.00\% | 1.74\% | 0.23\% | 0.03\% | 1.51\% | 9.60\% | 32.14\% | 1.06\% | 3.00\% |
| 198 |  |  |  |  |  |  |  |  |  |  |
| 199 | SecD-LTr | 122,935 | 6,964 | 1,511 | 111 | 1,204 | 11,206 | 41,285 | 1,196 | 3,755 |
| 200 |  | 100.00\% | 5.66\% | 1.23\% | 0.09\% | 0.98\% | 9.12\% | 33.58\% | 0.97\% | 3.05\% |
| 201 |  |  |  |  |  |  |  |  |  |  |
| 202 | SecD-Pretax | 8,088 | 8,687 | 772 | 92 | 272 | 205 | (856) | 23 | (94) |
| 203 |  | 100.00\% | 107.41\% | 9.54\% | 1.13\% | 3.36\% | 2.54\% | -10.58\% | 0.28\% | -1.16\% |
| 204 |  |  |  |  |  |  |  |  |  |  |
| 205 | SecC-RB | 477,459 | 358,123 | 28,814 | 4,274 | 17,561 | 16,222 | 13,361 | 2,474 | 2,174 |
| 206 |  | 100.00\% | 75.01\% | 6.03\% | 0.90\% | 3.68\% | 3.40\% | 2.80\% | 0.52\% | 0.46\% |
| 207 |  |  |  |  |  |  |  |  |  |  |
| 208 | SecC-Lab | 4,540 | 3,066 | 247 | 37 | 154 | 135 | 74 | 19 | 11 |
| 209 |  | 100.00\% | 67.54\% | 5.43\% | 0.81\% | 3.40\% | 2.98\% | 1.64\% | 0.43\% | 0.23\% |
| 210 |  |  |  |  |  |  |  |  |  |  |


| Alloc |  |  | esne Light | ompany |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class | Allocation Factors |  | Class ACO | Study |  |  |  |  |  |
| Fac |  |  | Projected | uture Test |  |  |  |  |  |
| Exh 6-8 |  |  | Allocation | actors |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 169 | PriD-GenPt | 167,091 | 32,175 | 4,417 | 10,833 | - | 599 | 520 | 198 |
| 170 |  | 100.00\% | 19.26\% | 2.64\% | 6.48\% | 0.00\% | 0.36\% | 0.31\% | 0.12\% |
| 171 |  |  |  |  |  |  |  |  |  |
| 172 | PriD-UG | 599,052 | 179,816 | 32,303 | 54,753 | - | 2,809 | 2,442 | 947 |
| 173 |  | 100.00\% | 30.02\% | 5.39\% | 9.14\% | 0.00\% | 0.47\% | 0.41\% | 0.16\% |
| 174 |  |  |  |  |  |  |  |  |  |
| 175 | PriD-LTr | 31,045 | 5,184 | 587 | 1,840 | - | 105 | 91 | 35 |
| 176 |  | 100.00\% | 16.70\% | 1.89\% | 5.93\% | 0.00\% | 0.34\% | 0.29\% | 0.11\% |
| 177 |  |  |  |  |  |  |  |  |  |
| 178 | PriD-Pretax | 96,402 | $(1,440)$ | $(1,063)$ | $(1,795)$ | 149 | 116 | 4,090 | 324 |
| 179 |  | 100.00\% | -1.49\% | -1.10\% | -1.86\% | 0.15\% | 0.12\% | 4.24\% | 0.34\% |
| 180 |  |  |  |  |  |  |  |  |  |
| 181 | SecD-RB | 112,773 | 35,188 | 5,393 | 8,857 | - | 671 | 534 | 137 |
| 182 |  | 100.00\% | 31.20\% | 4.78\% | 7.85\% | 0.00\% | 0.60\% | 0.47\% | 0.12\% |
| 183 |  |  |  |  |  |  |  |  |  |
| 184 | SecD-Lab | 660 | 194 | 31 | 48 | - | 4 | 3 | 1 |
| 185 |  | 100.00\% | 29.38\% | 4.71\% | 7.30\% | 0.00\% | 0.54\% | 0.45\% | 0.14\% |
| 186 |  |  |  |  |  |  |  |  |  |
| 187 | $\overline{\mathrm{Sec} D-D x P t}$ | 181,139 | 56,547 | 8,648 | 14,243 | - | 1,080 | 859 | 219 |
| 188 |  | 100.00\% | 31.22\% | 4.77\% | 7.86\% | 0.00\% | 0.60\% | 0.47\% | 0.12\% |
| 189 |  |  |  |  |  |  |  |  |  |
| 190 | SecD-Pt | 186,789 | 58,207 | 8,914 | 14,655 | - | 1,111 | 884 | 226 |
| 191 |  | 100.00\% | 31.16\% | 4.77\% | 7.85\% | 0.00\% | 0.59\% | 0.47\% | 0.12\% |
| 192 |  |  |  |  |  |  |  |  |  |
| 193 | SecD-IntPt | 4,722 | 1,471 | 225 | 370 | - | 28 | 22 | 6 |
| 194 |  | 100.00\% | 31.16\% | 4.77\% | 7.85\% | 0.00\% | 0.59\% | 0.47\% | 0.12\% |
| 195 |  |  |  |  |  |  |  |  |  |
| 196 | SecD-UG | 45,243 | 15,703 | 2,997 | 3,674 | - | 254 | 221 | 86 |
| 197 |  | 100.00\% | 34.71\% | 6.62\% | 8.12\% | 0.00\% | 0.56\% | 0.49\% | 0.19\% |
| 198 |  |  |  |  |  |  |  |  |  |
| 199 | $\overline{\mathrm{SecD}-L T r}$ | 122,935 | 38,780 | 5,413 | 10,013 | - | 781 | 599 | 118 |
| 200 |  | 100.00\% | 31.55\% | 4.40\% | 8.14\% | 0.00\% | 0.64\% | 0.49\% | 0.10\% |
| 201 |  |  |  |  |  |  |  |  |  |
| 202 | SecD-Pretax | 8,088 | (933) | (230) | (155) | 11 | (9) | 279 | 24 |
| 203 |  | 100.00\% | -11.54\% | -2.85\% | -1.91\% | 0.13\% | -0.11\% | 3.45\% | 0.30\% |
| 204 |  |  |  |  |  |  |  |  |  |
| 205 | SecC-RB | 477,459 | 11,210 | 2,325 | 217 | 0 | 1 | 17,677 | 3,024 |
| 206 |  | 100.00\% | 2.35\% | 0.49\% | 0.05\% | 0.00\% | 0.00\% | 3.70\% | 0.63\% |
| 207 |  |  |  |  |  |  |  |  |  |
| 208 | SecC-Lab | 4,540 | 42 | 9 | 1 | 0 | 0 | 713 | 31 |
| 209 |  | 100.00\% | 0.93\% | 0.19\% | 0.02\% | 0.00\% | 0.00\% | 15.71\% | 0.68\% |
| 210 |  |  |  |  |  |  |  |  |  |

AllocFctr
Class Allocation Factors
Exh 6-8D

| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH $<25$ | $\mathbf{G M H}>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 211 | SecC-DxPt | 774,299 | 566,923 | 45,614 | 6,766 | 27,752 | 25,656 | 21,469 | 3,921 | 3,506 |
| 212 |  | 100.00\% | 73.22\% | 5.89\% | 0.87\% | 3.58\% | 3.31\% | 2.77\% | 0.51\% | 0.45\% |
| 213 |  |  |  |  |  |  |  |  |  |  |
| 214 | $\overline{\mathrm{SecC}-\mathrm{Pt}}$ | 813,184 | 593,186 | 47,727 | 7,079 | 29,074 | 26,815 | 22,106 | 4,088 | 3,597 |
| 215 |  | 100.00\% | 72.95\% | 5.87\% | 0.87\% | 3.58\% | 3.30\% | 2.72\% | 0.50\% | 0.44\% |
| 216 |  |  |  |  |  |  |  |  |  |  |
| 217 | SecC-IntPt | 20,556 | 14,994 | 1,206 | 179 | 735 | 678 | 559 | 103 | 91 |
| 218 |  | 100.00\% | 72.95\% | 5.87\% | 0.87\% | 3.58\% | 3.30\% | 2.72\% | 0.50\% | 0.44\% |
| 219 |  |  |  |  |  |  |  |  |  |  |
| 220 | SecC-UG | 35,333 | 25,148 | 2,023 | 300 | 1,930 | 2,707 | 1,514 | 698 | 298 |
| 221 |  | 100.00\% | 71.17\% | 5.73\% | 0.85\% | 5.46\% | 7.66\% | 4.29\% | 1.98\% | 0.84\% |
| 222 |  |  |  |  |  |  |  |  |  |  |
| 223 | $\overline{\mathrm{SecC}-L T r}$ | 336,807 | 247,925 | 19,948 | 2,959 | 11,042 | 10,496 | 15,813 | 1,696 | 2,824 |
| 224 |  | 100.00\% | 73.61\% | 5.92\% | 0.88\% | 3.28\% | 3.12\% | 4.69\% | 0.50\% | 0.84\% |
| 225 |  |  |  |  |  |  |  |  |  |  |
| 226 | SecC-UG | 35,333 | 25,148 | 2,023 | 300 | 1,930 | 2,707 | 1,514 | 698 | 298 |
| 227 |  | 100.00\% | 71.17\% | 5.73\% | 0.85\% | 5.46\% | 7.66\% | 4.29\% | 1.98\% | 0.84\% |
| 228 |  |  |  |  |  |  |  |  |  |  |
| 229 | SecC-Pretax | 33,478 | 9,341 | 1,424 | 73 | 61 | 3,409 | 9,146 | 308 | 688 |
| 230 |  | 100.00\% | 27.90\% | 4.25\% | 0.22\% | 0.18\% | 10.18\% | 27.32\% | 0.92\% | 2.05\% |
| 231 |  |  |  |  |  |  |  |  |  |  |
| 232 | Bill-RB | 283,568 | 200,249 | 18,381 | 2,208 | 9,014 | 20,390 | 24,411 | 2,427 | 2,192 |
| 233 |  | 100.00\% | 70.62\% | 6.48\% | 0.78\% | 3.18\% | 7.19\% | 8.61\% | 0.86\% | 0.77\% |
| 234 |  |  |  |  |  |  |  |  |  |  |
| 235 | Bill-Lab | 16,280 | 11,691 | 1,387 | 105 | 438 | 807 | 1,424 | 99 | 133 |
| 236 |  | 100.00\% | 71.81\% | 8.52\% | 0.64\% | 2.69\% | 4.96\% | 8.75\% | 0.61\% | 0.82\% |
| 237 |  |  |  |  |  |  |  |  |  |  |
| 238 | Bill-DxLab | 5,722 | 3,151 | 284 | 35 | 152 | 560 | 1,197 | 65 | 106 |
| 239 |  | 100.00\% | 55.06\% | 4.96\% | 0.61\% | 2.65\% | 9.78\% | 20.92\% | 1.13\% | 1.85\% |
| 240 |  |  |  |  |  |  |  |  |  |  |
| 241 | $\overline{\text { Bill-DxPt }}$ | 151,169 | 92,079 | 7,376 | 1,094 | 4,773 | 16,665 | 22,109 | 1,916 | 1,942 |
| 242 |  | 100.00\% | 60.91\% | 4.88\% | 0.72\% | 3.16\% | 11.02\% | 14.63\% | 1.27\% | 1.28\% |
| 243 |  |  |  |  |  |  |  |  |  |  |
| 244 | Bill-Pt | 291,701 | 192,533 | 19,294 | 1,997 | 8,563 | 23,685 | 34,570 | 2,777 | 3,104 |
| 245 |  | 100.00\% | 66.00\% | 6.61\% | 0.68\% | 2.94\% | 8.12\% | 11.85\% | 0.95\% | 1.06\% |
| 246 |  |  |  |  |  |  |  |  |  |  |
| 247 | Bill-IntPt | 285,340 | 223,442 | 18,016 | 2,660 | 11,282 | 16,055 | 7,791 | 1,913 | 702 |
| 248 |  | 100.00\% | 78.31\% | 6.31\% | 0.93\% | 3.95\% | 5.63\% | 2.73\% | 0.67\% | 0.25\% |
| 249 |  |  |  |  |  |  |  |  |  |  |
| 250 | Bill-Pretax | 2,717 | $(31,857)$ | $(4,386)$ | (211) | $(1,447)$ | 1,142 | 9,731 | 17 | 733 |
| 251 |  | 100.00\% | -1172.41\% | -161.41\% | -7.75\% | -53.26\% | 42.01\% | 358.13\% | 0.61\% | 26.97\% |
| 252 |  |  |  |  |  |  |  |  |  |  |

AllocFctr
Class Allocation Factors
Exh 6-8D

| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 211 | SecC-DxPt | 774,299 | 18,199 | 3,777 | 352 | 0 | 1 | 45,551 | 4,812 |
| 212 |  | 100.00\% | 2.35\% | 0.49\% | 0.05\% | 0.00\% | 0.00\% | 5.88\% | 0.62\% |
| 213 |  |  |  |  |  |  |  |  |  |
| 214 | $\overline{\mathrm{SecC}-\mathrm{Pt}}$ | 813,184 | 18,562 | 3,851 | 359 | 0 | 1 | 51,661 | 5,077 |
| 215 |  | 100.00\% | 2.28\% | 0.47\% | 0.04\% | 0.00\% | 0.00\% | 6.35\% | 0.62\% |
| 216 |  |  |  |  |  |  |  |  |  |
| 217 | SecC-IntPt | 20,556 | 469 | 97 | 9 | 0 | 0 | 1,306 | 128 |
| 218 |  | 100.00\% | 2.28\% | 0.47\% | 0.04\% | 0.00\% | 0.00\% | 6.35\% | 0.62\% |
| 219 |  |  |  |  |  |  |  |  |  |
| 220 | SecC-UG | 35,333 | 425 | 88 | 8 | 0 | 0 | 26 | 166 |
| 221 |  | 100.00\% | 1.20\% | 0.25\% | 0.02\% | 0.00\% | 0.00\% | 0.07\% | 0.47\% |
| 222 |  |  |  |  |  |  |  |  |  |
| 223 | $\overline{\mathrm{SecC}-\mathrm{LTr}}$ | 336,807 | 17,337 | 3,639 | 336 | 0 | 0 | 408 | 2,385 |
| 224 |  | 100.00\% | 5.15\% | 1.08\% | 0.10\% | 0.00\% | 0.00\% | 0.12\% | 0.71\% |
| 225 |  |  |  |  |  |  |  |  |  |
| 226 | SecC-UG | 35,333 | 425 | 88 | 8 | 0 | 0 | 26 | 166 |
| 227 |  | 100.00\% | 1.20\% | 0.25\% | 0.02\% | 0.00\% | 0.00\% | 0.07\% | 0.47\% |
| 228 |  |  |  |  |  |  |  |  |  |
| 229 | SecC-Pretax | 33,478 | 8,622 | 873 | 2,753 | 48 | 221 | $(3,338)$ | (152) |
| 230 |  | 100.00\% | 25.76\% | 2.61\% | 8.22\% | 0.14\% | 0.66\% | -9.97\% | -0.45\% |
| 231 |  |  |  |  |  |  |  |  |  |
| 232 | Bill-RB | 283,568 | 2,791 | 382 | 219 | 34 | 0 | 133 | 737 |
| 233 |  | 100.00\% | 0.98\% | 0.13\% | 0.08\% | 0.01\% | 0.00\% | 0.05\% | 0.26\% |
| 234 |  |  |  |  |  |  |  |  |  |
| 235 | Bill-Lab | 16,280 | 166 | 18 | 8 | 2 | 0 | 0 | 1 |
| 236 |  | 100.00\% | 1.02\% | 0.11\% | 0.05\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% |
| 237 |  |  |  |  |  |  |  |  |  |
| 238 | Bill-DxLab | 5,722 | 147 | 17 | 8 | 2 | 0 | 0 | 0 |
| 239 |  | 100.00\% | 2.56\% | 0.30\% | 0.14\% | 0.03\% | 0.00\% | 0.00\% | 0.00\% |
| 240 |  |  |  |  |  |  |  |  |  |
| 241 | Bill-DxPt | 151,169 | 2,715 | 323 | 146 | 31 | - | - | - |
| 242 |  | 100.00\% | 1.80\% | 0.21\% | 0.10\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |
| 243 |  |  |  |  |  |  |  |  |  |
| 244 | $\overline{\mathrm{Bill}-\mathrm{Pt}}$ | 291,701 | 4,337 | 508 | 279 | 46 | 0 | 1 | 6 |
| 245 |  | 100.00\% | 1.49\% | 0.17\% | 0.10\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |
| 246 |  |  |  |  |  |  |  |  |  |
| 247 | Bill-IntPt | 285,340 | 923 | 110 | 43 | 11 | 0 | 349 | 2,040 |
| 248 |  | 100.00\% | 0.32\% | 0.04\% | 0.02\% | 0.00\% | 0.00\% | 0.12\% | 0.72\% |
| 249 |  |  |  |  |  |  |  |  |  |
| 250 | Bill-Pretax | 2,717 | 18,035 | 2,012 | 5,535 | 84 | 449 | 2,923 | (42) |
| 251 |  | 100.00\% | 663.72\% | 74.04\% | 203.69\% | 3.09\% | 16.53\% | 107.59\% | -1.56\% |
| 252 |  |  |  |  |  |  |  |  |  |

AllocFctr
Class Allocation Factors
Fac
Exh 6-8D

| 0 | Allocator Name | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH>25 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 253 | Bill-OM | 90,469 | 66,788 | 8,391 | 565 | 2,322 | 3,833 | 6,362 | 478 | 610 |
| 254 |  | 100.00\% | 73.82\% | 9.27\% | 0.62\% | 2.57\% | 4.24\% | 7.03\% | 0.53\% | 0.67\% |
| 255 |  |  |  |  |  |  |  |  |  |  |
| 256 | PriD-OM | 90,133 | 33,549 | 4,469 | 537 | 851 | 5,299 | 17,236 | 576 | 1,568 |
| 257 |  | 100.00\% | 37.22\% | 4.96\% | 0.60\% | 0.94\% | 5.88\% | 19.12\% | 0.64\% | 1.74\% |
| 258 |  |  |  |  |  |  |  |  |  |  |
| 259 | SecC-OM | 21,595 | 15,090 | 1,214 | 180 | 757 | 660 | 361 | 94 | 51 |
| 260 |  | 100.00\% | 69.88\% | 5.62\% | 0.83\% | 3.51\% | 3.06\% | 1.67\% | 0.43\% | 0.24\% |
| 261 |  |  |  |  |  |  |  |  |  |  |
| 262 | SecD-OM | 3,089 | 401 | 59 | 6 | 36 | 262 | 912 | 28 | 84 |
| 263 |  | 100.00\% | 13.00\% | 1.93\% | 0.21\% | 1.16\% | 8.50\% | 29.53\% | 0.92\% | 2.71\% |
| 264 |  |  |  |  |  |  |  |  |  |  |
| 265 | Total-OM | 205,286 | 115,828 | 14,133 | 1,288 | 3,967 | 10,055 | 24,871 | 1,175 | 2,313 |
| 266 |  | 100.00\% | 56.42\% | 6.88\% | 0.63\% | 1.93\% | 4.90\% | 12.12\% | 0.57\% | 1.13\% |
| 267 |  |  |  |  |  |  |  |  |  |  |
| 268 | Dist_NetRev | 554,295 | 295,260 | 28,560 | 3,246 | 11,737 | 33,220 | 69,587 | 3,611 | 5,904 |
| 269 |  | 100.00\% | 53.27\% | 5.15\% | 0.59\% | 2.12\% | 5.99\% | 12.55\% | 0.65\% | 1.07\% |
| 270 |  |  |  |  |  |  |  |  |  |  |
| 271 | DistPlant | 3,366,202 | 1,439,026 | 157,472 | 20,343 | 56,663 | 197,065 | 554,995 | 22,680 | 52,248 |
| 272 |  | 100.00\% | 42.75\% | 4.68\% | 0.60\% | 1.68\% | 5.85\% | 16.49\% | 0.67\% | 1.55\% |
| 273 |  |  |  |  |  |  |  |  |  |  |
| 274 | Labor | 40,987 | 22,029 | 2,604 | 258 | 785 | 2,151 | 5,445 | 250 | 503 |
| 275 |  | 100.00\% | 53.75\% | 6.35\% | 0.63\% | 1.92\% | 5.25\% | 13.28\% | 0.61\% | 1.23\% |
| 276 |  |  |  |  |  |  |  |  |  |  |
| 277 | All_Labor | 75,318 | 40,857 | 4,788 | 479 | 1,472 | 3,928 | 9,844 | 457 | 909 |
| 278 |  | 100.00\% | 54.25\% | 6.36\% | 0.64\% | 1.95\% | 5.21\% | 13.07\% | 0.61\% | 1.21\% |
| 279 |  |  |  |  |  |  |  |  |  |  |
| 280 | Total_RR | 654,142 | 341,382 | 37,548 | 4,228 | 13,337 | 36,373 | 87,787 | 4,235 | 8,224 |
| 281 |  | 100.00\% | 52.19\% | 5.74\% | 0.65\% | 2.04\% | 5.56\% | 13.42\% | 0.65\% | 1.26\% |
| 282 |  |  |  |  |  |  |  |  |  |  |

Exhibit 6-8D
Page 13 of 14

| AllocFetr |  |  | Duquesne Light Company |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Class Allocation Factors |  |  | JSS / Class ACOS Study |  |  |  |  |  |  |
| Fac |  |  | Fully Projected Future Test Year |  |  |  |  |  |  |
| Exh 6-8D |  |  | Class Allocation Factors |  |  |  |  |  |  |
| 0 | Allocator Name | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| 253 | Bill-OM | 90,469 | 841 | 91 | 76 | 7 | 2 | 40 | 62 |
| 254 |  | 100.00\% | 0.93\% | 0.10\% | 0.08\% | 0.01\% | 0.00\% | 0.04\% | 0.07\% |
| 255 |  |  |  |  |  |  |  |  |  |
| 256 | PriD-OM | 90,133 | 17,196 | 2,335 | 5,810 | - | 322 | 280 | 107 |
| 257 |  | 100.00\% | 19.08\% | 2.59\% | 6.45\% | 0.00\% | 0.36\% | 0.31\% | 0.12\% |
| 258 |  |  |  |  |  |  |  |  |  |
| 259 | SecC-OM | 21,595 | 206 | 42 | 4 | 0 | 0 | 2,783 | 153 |
| 260 |  | 100.00\% | 0.95\% | 0.19\% | 0.02\% | 0.00\% | 0.00\% | 12.89\% | 0.71\% |
| 261 |  |  |  |  |  |  |  |  |  |
| 262 | SecD-OM | 3,089 | 898 | 142 | 224 | - | 17 | 14 | 4 |
| 263 |  | 100.00\% | 29.08\% | 4.61\% | 7.25\% | 0.00\% | 0.54\% | 0.45\% | 0.13\% |
| 264 |  |  |  |  |  |  |  |  |  |
| 265 | Total-OM | 205,286 | 19,141 | 2,610 | 6,114 | 7 | 341 | 3,117 | 326 |
| 266 |  | 100.00\% | 9.32\% | 1.27\% | 2.98\% | 0.00\% | 0.17\% | 1.52\% | 0.16\% |
| 267 |  |  |  |  |  |  |  |  |  |
| 268 | Dist_NetRev | 554,295 | 64,417 | 7,192 | 18,667 | 324 | 1,492 | 9,963 | 1,117 |
| 269 |  | 100.00\% | 11.62\% | 1.30\% | 3.37\% | 0.06\% | 0.27\% | 1.80\% | 0.20\% |
| 270 |  |  |  |  |  |  |  |  |  |
| 271 | DistPlant | 3,366,202 | 544,658 | 81,923 | 168,215 | 31 | 9,419 | 53,659 | 7,805 |
| 272 |  | 100.00\% | 16.18\% | 2.43\% | 5.00\% | 0.00\% | 0.28\% | 1.59\% | 0.23\% |
| 273 |  |  |  |  |  |  |  |  |  |
| 274 | Labor | 40,987 | 4,159 | 574 | 1,322 | 2 | 73 | 777 | 56 |
| 275 |  | 100.00\% | 10.15\% | 1.40\% | 3.22\% | 0.00\% | 0.18\% | 1.90\% | 0.14\% |
| 276 |  |  |  |  |  |  |  |  |  |
| 277 | All_Labor | 75,318 | 7,509 | 1,036 | 2,386 | 3 | 133 | 1,405 | 113 |
| 278 |  | 100.00\% | 9.97\% | 1.38\% | 3.17\% | 0.00\% | 0.18\% | 1.87\% | 0.15\% |
| 279 |  |  |  |  |  |  |  |  |  |
| 280 | Total_RR | 654,142 | 75,565 | 11,049 | 23,357 | 18 | 1,305 | 8,165 | 1,569 |
| 281 |  | 100.00\% | 11.55\% | 1.69\% | 3.57\% | 0.00\% | 0.20\% | 1.25\% | 0.24\% |
| 282 |  |  |  |  |  |  |  |  |  |

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

## Class Allocated Cost of Service Study (ACOS)

## INDEX TO EXHIBIT 6-9

Exhibit

Exh 6-9 Index to Exhibit 6-9

Exh 6-9A Allocator Values

Exh 6-9B Results of Functionalization and Classification of Distribution Assets

Exh 6-9C Development of Functionalization and Classification of Distribution Assets
Exh 6-9D Demand Allocators- Description
Exh 6-9E Demand Allocators-Calculations
Exh 6-9E-1 Demand Allocators-PLCC
Exh 6-9F Revenue and Physical Allocators (Fully Projected Future Test Year)
Exh 6-9G Services Costs
Exh 6-9H Meter Allocators

Exh 6-9I Customer Records and Accounts Allocators

Exh 6-9J Write-Off Allocator

Exh 6-9K Customer Deposits

## Duquesne Light Company

FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)

| Line | Allocator Names | Units | Total | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ALLOCATION VALUES |  |  |  |  |  |  |  |  |  |  |  |
| 1 | MWh-Meter | GWh | 12,058 | 3,436 | 399 | 60 | 100 | 612 | 2,112 | 58 | 181 |
| 2 | 1 CP | MW | 2,609.4 | 1,036.2 | 58.8 | 16.5 | 21.8 | 146.3 | 474.1 | 10.1 | 31.3 |
| 3 | NCP | MW | 3,042.9 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 4 | NCP-Prim | MW | 2,807.5 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 5 | NCP-Prim-Net | MW | 72.9 | 0.0 | 0.0 | 0.0 | 0.1 | 2.0 | 11.5 | 0.3 | 1.5 |
| 6 | NCP-Prim-NonNet | MW | 2,734.5 | 1,152.5 | 153.5 | 18.4 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 7 | NCP-Prim-URD | MW | 149.4 | 130.0 | 17.3 | 2.1 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 8 | NCP-Prim-Rad | MW | 1,443.2 | 28.8 | 3.8 | 0.5 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 9 | NCP-Sec | MW | 2,721.1 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 10 | NCP-Sec-Xfmr | MW | 1,296.0 | 0.0 | 26.5 | 0.0 | 0.0 | 89.1 | 475.0 | 8.8 | 43.2 |
| 11 | NCP-Sec-Net | MW | 72.9 | 0.0 | 0.0 | 0.0 | 0.1 | 2.0 | 11.5 | 0.3 | 1.5 |
| 12 | NCP-Sec-NonNet | MW | 2,648.1 | 1,152.5 | 153.5 | 18.4 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 13 | NCP-Sec-URD | MW | 149.4 | 130.0 | 17.3 | 2.1 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 14 | NCP-Sec-Rad | mW | 1,356.8 | 28.8 | 3.8 | 0.5 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 15 | NCP-Sec-Rad-Xfmr | MW | 1,310.8 | 0.0 | 0.0 | 0.0 | 19.2 | 146.4 | 483.2 | 15.8 | 43.5 |
| 16 | MWh- Tx Level | GWh | 13,106 | 3,770 | 437 | 66 | 110 | 672 | 2,317 | 64 | 199 |
| 17 | Avg-Cust | \# | 604,358 | 496,018 | 39,909 | 5,920 | 24,936 | 20,206 | 6,772 | 2,507 | 642 |
| 18 | Avg-Cust-Net | \# | 794 | 0 | 0 | 0 | 162 | 278 | 171 | 81 | 36 |
| 19 | Avg-Cust-Net-Xfmr | \# | 122 | 0 | 0 | 0 | 2 | 6 | 40 | 2 | 8 |
| 20 | Avg-Cust-NonNet | \# | 603,555 | 496,018 | 39,909 | 5,920 | 24,774 | 19,928 | 6,601 | 2,426 | 606 |
| 21 | Avg-Cust-URD | \# | 47,417 | 43,407 | 3,492 | 518 |  |  |  |  |  |
| 22 | Avg-Cust-Rad | \# | 556,147 | 452,611 | 36,417 | 5,402 | 24,774 | 19,928 | 6,601 | 2,426 | 606 |
| 23 | Services Cost | \# | 289,354 | 238,064 | 19,154 | 2,841 | 12,152 | 11,191 | 3,751 | 1,389 | 355 |
| 24 | Meters | \# | 605,719 | 498,187 | 39,909 | 5,920 | 25,825 | 23,476 | 7,868 | 2,699 | 691 |
| 25 | Meter Cost | \$000 | 102,540 | 62,458 | 5,003 | 742 | 3,238 | 11,304 | 14,997 | 1,300 | 1,317 |
| 26 | Meter_Tech | \$000 | 123,555 | 62,458 | 5,003 | 742 | 3,238 | 13,565 | 29,994 | 1,560 | 2,634 |
| 27 | AMI Cost | \$000 | 44,371 | 29,226 | 2,341 | 347 | 1,515 | 5,985 | 3,461 | 688 | 304 |
| 28 | Acct370 | \$000 | 102,540 | 62,458 | 5,003 | 742 | 3,238 | 11,304 | 14,997 | 1,300 | 1,317 |
| 29 | Dist Rev | \$000 | 550,378 | 292,160 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| 30 | Total Rev | \$000 | 844,336 | 477,890 | 49,647 | 6,490 | 16,581 | 56,775 | 107,796 | 5,960 | 8,853 |
| 31 | Supp Rev | \$000 | 227,343 | 137,809 | 18,774 | 2,570 | 4,109 | 18,524 | 31,678 | 1,989 | 2,496 |
| 32 | Trans Rev | \$000 | 66,615 | 47,921 | 2,837 | 691 | 798 | 5,091 | 6,646 | 369 | 467 |
| 33 | Total Rev POLR | \$000 | 1,382,826 | 551,273 | 53,468 | 7,478 | 18,321 | 76,555 | 211,295 | 7,422 | 17,775 |
| 34 | Revenue-Res | \$000 | 534,027 | 477,890 | 49,647 | 6,490 |  |  |  |  |  |
| 35 | CustDeposits | \$000 | 7,717 | 4,590 | 574 | 40 | 455 | 760 | 835 | 70 | 76 |
| 36 | Acct901903 | \$000 | 100.00\% | 80.88\% | 10.47\% | 0.66\% | 2.70\% | 2.34\% | 2.16\% | 0.32\% | 0.26\% |
| 37 |  |  |  |  |  |  |  |  |  |  |  |
| 38 | Write-Offs | \$000 | 100.00\% | 79.14\% | 13.37\% | 0.41\% | 1.58\% | 1.55\% | 2.94\% | 0.25\% | 0.37\% |
| 39 | StLgt-Cost | \$000 | 1 |  |  |  |  |  |  |  |  |
| 40 | Calls In | \# | 100.00\% | 83.67\% | 6.79\% | 1.00\% | 3.23\% | 2.83\% | 1.39\% | 0.35\% | 0.13\% |
| 41 | Bills | \# | 7,252,295 | 5,952,211 | 478,910 | 71,035 | 299,232 | 242,476 | 81,264 | 30,085 | 7,699 |
| 42 | MWh-Res | MWh | 3,895 | 3,436 | 399 | 60 |  |  |  |  |  |
| 43 | Cust-Res | \# | 541,846 | 496,018 | 39,909 | 5,920 |  |  |  |  |  |
| 44 | Cust-NonRes | \# | 62,512 | 0 | 0 | 0 | 24,936 | 20,206 | 6,772 | 2,507 | 642 |

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Allocator Values

| Line | Allocator Names | Units | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ALLOCATION VALUES |  |  |  |  |  |  |  |  |  |  |
| 1 | MWh-Meter | GWh | 12,058 | 2,560 | 315 | 938 | 1,213 | 25 | 29 | 21 |
| 2 | 1 CP | MW | 2,609.4 | 465.8 | 56.8 | 152.7 | 136.4 | 0.0 | 0.0 | 2.6 |
| 3 | NCP | MW | 3,042.9 | 496.6 | 66.7 | 167.2 | 232.8 | 9.3 | 8.1 | 3.1 |
| 4 | NCP-Prim | MW | 2,807.5 | 494.0 | 66.7 | 167.2 | 0.0 | 9.3 | 8.1 | 3.1 |
| 5 | NCP-Prim-Net | MW | 72.9 | 37.4 | 15.0 | 5.1 | 0.0 | 0.0 | 0.0 | 0.0 |
| 6 | NCP-Prim-NonNet | MW | 2,734.5 | 456.6 | 51.7 | 162.1 | 0.0 | 9.3 | 8.1 | 3.0 |
| 7 | NCP-Prim-URD | MW | 149.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 8 | NCP-Prim-Rad | MW | 1,443.2 | 456.6 | 51.7 | 162.1 | 0.0 | 9.3 | 8.1 | 3.0 |
| 9 | NCP-Sec | MW | 2,721.1 | 459.2 | 63.6 | 118.6 | 0.0 | 9.3 | 8.1 | 3.1 |
| 10 | NCP-Sec-Xfmr | MW | 1,296.0 | 457.1 | 63.4 | 118.6 | 0.0 | 9.3 | 5.0 | 0.0 |
| 11 | NCP-Sec-Net | MW | 72.9 | 37.4 | 15.0 | 5.1 | 0.0 | 0.0 | 0.0 | 0.0 |
| 12 | NCP-Sec-NonNet | MW | 2,648.1 | 421.8 | 48.6 | 113.5 | 0.0 | 9.3 | 8.1 | 3.0 |
| 13 | NCP-Sec-URD | MW | 149.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 14 | NCP-Sec-Rad | MW | 1,356.8 | 421.8 | 48.6 | 113.5 | 0.0 | 9.3 | 8.1 | 3.0 |
| 15 | NCP-Sec-Rad-Xfmr | MW | 1,310.8 | 421.7 | 48.6 | 113.5 | 0.0 | 9.3 | 7.9 | 1.9 |
| 16 | MWh- Tx Level | GWh | 13,106 | 2,800 | 345 | 1,018 | 1,226 | 27 | 31 | 23 |
| 17 | Avg-Cust | \# | 604,358 | 736 | 88 | 20 | 9 | 1 | 964 | 5,630 |
| 18 | Avg-Cust-Net | \# | 794 | 52 | 11 | 1 | 0 | 0 | 0 | 2 |
| 19 | Avg-Cust-Net-Xfmr | \# | 122 | 52 | 11 | 1 | 0 | 0 | 0 | 0 |
| 20 | Avg-Cust-NonNet | \# | 603,555 | 684 | 77 | 19 |  | 1 | 964 | 5,628 |
| 21 | Avg-Cust-URD | \# | 47,417 |  |  |  |  |  |  |  |
| 22 | Avg-Cust-Rad | \# | 556,147 | 684 | 77 | 19 | 9 | 1 | 964 | 5,628 |
| 23 | Services Cost | \# | 289,354 | 408 | 49 | 0 | 0 | 0 | 0 | 0 |
| 24 | Meters | \# | 605,719 | 966 | 115 | 52 | 11 | 0 | 0 | 0 |
| 25 | Meter Cost | \$000 | 102,540 | 1,841 | 219 | 99 | 21 | 0 | 0 | 0 |
| 26 | Meter_Tech | \$000 | 123,555 | 3,683 | 438 | 198 | 42 | 0 | 0 | 0 |
| 27 | AMI Cost | \$000 | 44,371 | 425 | 51 | 23 | 5 | 0 | 0 | 0 |
| 28 | Acct370 | \$000 | 102,540 | 1,841 | 219 | 99 | 21 | 0 | 0 | 0 |
| 29 | Dist Rev | \$000 | 550,378 | 64,407 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 30 | Total Rev | \$000 | 844,336 | 72,758 | 9,480 | 18,667 | 324 | 1,492 | 10,303 | 1,321 |
| 31 | Supp Rev | \$000 | 227,343 | 6,930 | 1,940 | 0 | 0 | 0 | 344 | 181 |
| 32 | Trans_Rev | \$000 | 66,615 | 1,420 | 349 | 0 | 0 | 0 | 0 | 25 |
| 33 | Total Rev POLR | \$000 | 1,382,826 | 234,985 | 28,393 | 81,302 | 78,830 | 2,311 | 10,961 | 2,455 |
| 34 | Revenue-Res | \$000 | 534,027 |  |  |  |  |  |  |  |
| 35 | CustDeposits | \$000 | 7,717 | 316 | 0 | 0 | 0 | 0 | 0 | 0 |
| 36 | Acct901903 | \$000 | 100.00\% | 0.19\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 37 |  |  |  |  |  |  |  |  |  |  |
| 38 | Write-Offs | \$000 | 100.00\% | 0.23\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.10\% | 0.06\% |
| 39 | StLgt-Cost | \$000 | 1 |  |  |  |  |  | 1 |  |
| 40 | Calls In | \# | 100.00\% | 0.46\% | 0.06\% | 0.10\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| 41 | Bills | \# | 7,252,295 | 8,837 | 1,057 | 241 | 108 | 12 | 11,568 | 67,561 |
| 42 | MWh-Res | MWh | 3,895 |  |  |  |  |  |  |  |
| 43 | Cust-Res | \# | 541,846 |  |  |  |  |  |  |  |
| 44 | Cust-NonRes | \# | 62,512 | 736 | 88 | 20 | 9 | 1 | 964 | 5,630 |

MinSys
Results of Functi
Exh 6-9B

| Line | Acct. \# | Account Description | Account Dollars \$000 | Primary Distribution \% of Total | Secondary \% of Total | Customer Component of Secondary | Secondary Distribution Function | Customer Component of Secondary | Billing <br> Function- $100 \%$ <br> Customer | Customer Component of Account |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 |  | Land \& Land Rights | 23,190 | 100.00\% | 0.00\% | N/A | 0 |  |  |  |
| 2 |  |  |  |  |  |  |  |  |  |  |
| 3 |  | Structures \& Improvements | 71,327 | 100.00\% | 0.00\% | N/A | 0 |  |  |  |
| 4 |  |  |  |  |  |  |  |  |  |  |
| 5 |  | Station Equipment | 523,748 | 100.00\% | 0.00\% | N/A | 0 |  |  |  |
| 6 |  |  |  |  |  |  |  |  |  |  |
| 7 |  | Station Equipment, Structures and Equipment- Customers Premises | 13,188 | 100.00\% | 0.00\% | N/A | 0 |  |  |  |
| 8 |  |  |  |  |  |  |  |  |  |  |
| 9 |  | Poles, Towers \& Fixtures | 624,016 | 79.62\% | 20.38\% | 94.93\% | 127,160 | 120,708 |  | 19.34\% |
| 10 |  |  |  |  |  |  |  |  |  |  |
| 11 |  | Overhead Conductors \& Devices | 629,457 | 79.62\% | 20.38\% | 94.93\% | 128,269 | 121,760 |  | 19.34\% |
| 12 |  |  |  |  |  |  |  |  |  |  |
| 13 |  | Undergound Conduits: |  |  |  |  |  |  |  |  |
| 14 |  | UG Radial | 157,950 | 89.37\% | 10.63\% | 28.60\% | 16,789 | 4,801 |  | 3.04\% |
| 15 |  | UG Network | 30,713 | 84.96\% | 15.04\% | 43.39\% | 4,620 | 2,005 |  | 6.53\% |
| 16 |  | URD | 30,713 | 85.03\% | 14.97\% | 100.00\% | 4,599 | 4,599 |  | 14.97\% |
| 17 |  | Account 366 Total | 219,376 | 88.14\% | 11.86\% | 43.85\% | 26,009 | 11,405 | 0 | 5.20\% |
| 18 |  |  |  |  |  |  |  |  |  |  |
| 19 |  | Undergound Conductors: |  |  |  |  |  |  |  |  |
| 20 |  | UG Radial | 331,382 | 89.37\% | 10.63\% | 28.60\% | 35,225 | 10,073 |  | 3.04\% |
| 21 |  | UG Network | 64,435 | 84.96\% | 15.04\% | 43.39\% | 9,693 | 4,206 |  | 6.53\% |
| 22 |  | URD | 64,435 | 85.03\% | 14.97\% | 100.00\% | 9,649 | 9,649 |  | 14.97\% |
| 23 |  | Account 367 Total | 460,252 | 88.14\% | 11.86\% | 43.85\% | 54,567 | 23,928 | 0 | 5.20\% |

MinSys
Results of Functi
Exh 6-9B

| Line | Acct. \# | Account Description | Account Dollars \$000 | Primary Distribution \% of Total | Secondary \% of Total | Customer Component of Secondary | Secondary Distribution Function | Customer Component of Secondary | Billing <br> Function$100 \%$ <br> Customer | Customer <br> Component of Account |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 25 | 368 Line Transformers: |  |  |  |  |  |  |  |  |  |
| 26 |  | Overhead | 300,124 | 10.34\% | 89.66\% | 89.42\% | 269,079 | 240,610 |  | 80.17\% |
| 27 |  | UG Radial | 95,034 | 0.00\% | 100.00\% | 14.11\% | 95,034 | 13,410 |  | 14.11\% |
| 28 |  | UG Network | 44,726 | 0.00\% | 100.00\% | 89.18\% | 44,726 | 39,887 |  | 89.18\% |
| 29 |  | URD | 50,903 | 0.00\% | 100.00\% | 84.28\% | 50,903 | 42,900 |  | 84.28\% |
| 30 |  | Account 368 Total | 490,787 | 6.33\% | 93.67\% | 73.26\% | 459,742 | 336,807 | 0 | 68.63\% |
| 31 |  |  |  |  |  |  |  |  |  |  |
| 32 |  | Services | 114,962 | 0.00\% | 100.00\% | 100.00\% | 114,962 | 114,962 |  | 100.00\% |
| 33 | 370 | Meters | 151,169 | 0.00\% | 100.00\% | 100.00\% |  | 0 | 151,169 | 100.00\% |
| 34 | 373 | Street Lighting | 44,730 | 0.00\% | 100.00\% | 100.00\% | 44,730 | 44,730 |  | 100.00\% |
| 35 |  |  |  |  |  |  |  |  |  |  |
| 36 |  |  | 3,366,202 | 71.62\% | 28.38\% | 81.04\% | 955,438 | 774,299 | 151,169 | 27.49\% |

Development of Functionalization and Cla Exh 6-9C

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Development of Functionalization and Classification of Distribution Assets


Development of Functionalization and Cla Exh 6-9C

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Development of Functionalization and Classification of Distribution Assets


Development of Functionalization and Cla Exh 6-9C

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Development of Functionalization and Classification of Distribution Assets


Development of Functionalization and Cla Exh 6-9C

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Development of Functionalization and Classification of Distribution Assets


## Duquesne Light Company <br> FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 <br> Class Allocated Cost Of Service Study <br> DEMAND ALLOCATORS

## USE OF DEMAND ALLOCATORS

The table below shows how demand allocators are used in the Class Allocated Cost of Service Study (ACOS).

| Assets (Accounts) | Allocator for Demand Component of Primary Distribution | Allocator for Demand Component of Secondary Distribution |
| :---: | :---: | :---: |
| Substations- Equipment, Structures, Land (\#360, \#361, \#362) |  |  |
| Network | NCP-Primary-Network | N/A (Note A) |
| Non-Network | NCP-Primary | N/A (Note A) |
| Poles, Towers, Fixtures (\#364) and OH Conductors (\#365) | NCP-Primary-NonNetwork | NCP-Secondary-NonNetwork |
| UG Conduits (\#366); UG Conductors (\#367) |  |  |
| Radial | NCP-Primary-Radial | NCP-Secondary-Radial |
| Network | NCP-Primary-Network | NCP-Secondary-Network |
| Underground Residential Development (URD) | NCP-Primary-URD | N/A (Note B) |
| Line Transformers (\#368) |  |  |
| OH (368.1) | NCP-Primary-NonNetwork | NCP-Secondary-Xfmr |
| UG-Radial (368.3) | N/A (Note C) | NCP-Secondary-Radial-Xfmr |
| UG-Network (368.5) | N/A (Note C) | NCP-Secondary-Network |
| UG-URD (368.7) | N/A (Note C) | NCP-Secondary-URD |
| Note A- Distribution Substations are 100\% Primary distribution. <br> Note B- Secondary distribution URD UG Conduits and UG Conductors are 100\% Customer-related <br> Note C- All UG (Radial, Network, URD) Transformers) are 100\% Secondary distribution. |  |  |
|  |  |  |
|  |  |  |

# Duquesne Light Company <br> FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 <br> Class Allocated Cost Of Service Study <br> DEMAND ALLOCATORS 

## OVERVIEW

To develop the demand allocators, hourly loads by rate class were obtained for each of the fifteen years 2005-2019. This information is developed and used by the Company to develop its rates for Transmission service. Class contributions are determined from a combination of load profiles (RS, RH, RA,GS, portions of GM and GMH and Lighting classes) and $100 \%$ metered loads (most of GM and GMH and all of GL, GLH, L and HVPS). The class load values were developed at the Transmission level and exclude non-retail loads.

The annual load factor was developed for each rate class, computed as follows:

Class NCP Load Factor = Class Annual MWh / (Class Annual Peak X 8760 or 8784 hours)

For each rate class the average of the eight annual load factors, i.e., the average annual load factor, was computed.

In addition, for each class, metered kWh deliveries for the FPFTY, which are normalized kWh , were multiplied by the appropriate loss factor, to determine the normalized class kWh at the Transmission level.

## NCP ALLOCATOR

This allocator measures each class' annual peak on the Transmission system regardless of when it occurred. The value for each rate class was computed by multiplying the average load factor for the class by the normalized class $\boldsymbol{k} W h$ at the Transmission level. All customer loads are included. This allocator is the starting point for development of the other NCP allocators, although is not used as an allocator in the ACOS.

## PRIMARY DISTRIBUTION SYSTEM ALLOCATORS

## NCP-Primary

This allocator measures each class' annual peak on the Primary Distribution system. The allocator is developed by eliminating, from the NCP value for each class, the contribution

# Duquesne Light Company <br> FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 <br> Class Allocated Cost Of Service Study DEMAND ALLOCATORS 

of customers taking service at Sub-Transmission voltage. Therefore, the HVPS allocator value is zero, because all HVPS customers take service at Sub-Transmission voltage. GL is the only other class with Sub-Transmission customers (past rate L customers have been migrated to HVPS); the portions of the NCP due to customers taking service at SubTransmission voltage are eliminated. For all other classes, the values are the same as the NCP values.

## NCP-Primary-Network

This allocator measures each class' annual peak on the UG Network portion of the Primary Distribution system. Annual kWh, Billed demand and contribution to the 2016 Network peak was obtained for each customer; these were summed by rate class.

## NCP-Primary-NonNetwork

This allocator measures each class' annual peak on the Non-Network portion of the Primary Distribution system. It is computed by subtracting NCP-Primary-Network values from NCP-Primary values, by class.

## NCP-Primary-URD

This allocator measures each class' annual peak on the URD portion of the Primary Distribution system. Only the Residential classes (RS, RH, RA) are served by the URD system. URD customers were estimated to be responsible for $11.28 \%$ of their respective class NCPs.

## NCP-Primary-Radial

This allocator measures each class' annual peak on the Radial portion of the Primary Distribution system. The Radial portion excludes the UG Network; it also excludes an estimated $97.5 \%$ of Residential customers. The allocator is computed by subtracting from the NCP-Primary value for each rate class, the NCP-Primary-Network value and and $97.5 \%$ of the NCP-Primary-Residential value.

# Duquesne Light Company <br> FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 <br> Class Allocated Cost Of Service Study <br> DEMAND ALLOCATORS 

## SECONDARY DISTRIBUTION SYSTEM ALLOCATORS

## NCP-Secondary

This allocator measures each class' annual peak on the Secondary Distribution system. The allocator is developed by eliminating, from the NCP-Primary value for each class, the contribution of customers taking service at Primary voltage. Classes with Primary voltage customers are L, GL and GLH. For all other classes, the values are the same as for NCP-Primary (some GM and GMH customers take service at Primary voltage but the loads are very small and were not considered).

## NCP-Secondary-Xfmr

This allocator measures the portion of each class' annual peak on the Secondary Distribution system above the Peak Load Carrying Capability (PLCC) of the OH Transformer Minimum System. The PLCC is equal to the number of OH transformers times the capacity (in kVA ) of the minimum size transformer, at a power factor of $80 \%$. The total capacity of this system is approximately 3.2 kW per customer; therefore in computing the allocator, peak demands above 3.2 kW per customer are deducted from the NCP-Secondary allocator for each class.

## NCP-Secondary-Network

This allocator measures each class' annual peak on the UG Network portion of the Secondary Distribution system. It is the same as the NCP-Primary-Network allocator, except the demands of Network customers taking service at Primary voltage are removed.

## NCP-Secondary-Non-Network

This allocator measures each class' annual peak on the Non-Network portion of the Secondary Distribution system. It is computed by subtracting NCP-Secondary-Network values from NCP-Secondary values, by class.

# Duquesne Light Company <br> FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 <br> Class Allocated Cost Of Service Study <br> DEMAND ALLOCATORS 

## NCP-Secondary-URD

This allocator measures each class' annual peak on the URD portion of the Secondary Distribution system. All URD customers are served at Secondary voltages, therefore the values are the same as for NCP-Primary-URD.

## NCP-Secondary-Radial

This allocator measures each class' annual peak on the Radial portion of the Secondary Distribution system. The Radial portion excludes the UG Network; it also excludes an estimated $97.5 \%$ of Residential customers. The allocator is computed by subtracting from the NCP-Secondary value for each rate class, the NCP-Secondary-Network value and $97.5 \%$ of the NCP-Secondary-Residential value.

## NCP-Secondary-Radial-Xfmr

This allocator measures the portion of each class' annual peak on the Radial portion of the Secondary Distribution system above the Peak Load Carrying Capability (PLCC) of the OH Transformer Minimum System. The PLCC is equal to the number of Radial transformers times the capacity (in kVA ) of the minimum size transformer, at a power factor of $80 \%$. The total capacity of this system is approximately 0.2 kW per customer; therefore in computing the allocator, peak demands above 0.2 kW per customer are deducted from the NCP-Secondary-Radial allocator for each class.

## 1CP ALLOCATOR

This allocator measures each class' contribution to the system peak for the year. The 1 CP allocator is not used in the ACOS. It was developed based on average load factors over an eight-year period, computed as follows:

Class 1CP Load Factor $=$ Class Annual MWh / Class Contribution to Annual System Peak X 8760 or 8784 hours)

FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

## Class Allocated Cost of Service Study (ACOS)

Demand Allocators-Calculations

| Line | Allocator |  | Total | RS <br> Secondary | RH <br> Secondary | RA <br> Secondary | GS <br> Secondary | $G M<25$ <br> Secondary | $\mathbf{G M}>25$ <br> Secondary | GMH<25 <br> Secondary | $\text { GMH }>25$ <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 1CP | 2019 | 2,611.7 | 1,099.6 | 54.0 | 14.7 | 18.4 | 152.4 | 402.5 | 9.3 | 31.8 |
| 2 |  | 2018 | 2,756.5 | 1,121.0 | 54.2 | 14.9 | 20.8 | 136.4 | 491.0 | 7.4 | 41.5 |
| 3 |  | 2017 | 2,662.3 | 1,056.6 | 49.3 | 13.8 | 19.3 | 115.6 | 476.9 | 6.6 | 38.4 |
| 4 |  | 2016 | 2,749.5 | 1,040.0 | 51.5 | 13.6 | 22.3 | 130.5 | 495.1 | 6.4 | 39.2 |
| 5 |  | 2015 | 2,688.4 | 1,104.8 | 52.7 | 13.7 | 19.2 | 123.7 | 440.0 | 6.3 | 38.6 |
| 6 |  | 2014 | 2,638.1 | 945.0 | 46.0 | 11.4 | 17.2 | 121.7 | 471.2 | 7.5 | 40.0 |
| 7 |  | 2013 | 2,909.1 | 1,136.0 | 55.3 | 13.9 | 17.6 | 126.9 | 482.3 | 8.2 | 42.3 |
| 8 |  | 2012 | 3,051.0 | 1,144.2 | 55.2 | 14.3 | 18.8 | 136.8 | 509.1 | 8.2 | 45.2 |
| 9 |  | 2011 | 3,008.2 | 1,272.6 | 61.3 | 16.2 | 17.8 | 128.9 | 476.0 | 8.3 | 44.5 |
| 10 |  | 2010 | 2,885.6 | 1,053.8 | 53.2 | 13.4 | 20.9 | 154.3 | 538.3 | 7.9 | 42.4 |
| 11 |  | 2009 | 2,711.3 | 951.0 | 49.5 | 12.8 | 17.9 | 154.5 | 512.4 | 8.5 | 40.4 |
| 12 |  | 2008 | 2,818.6 | 1,097.0 | 55.2 | 14.2 | 17.3 | 182.7 | 478.7 | 12.3 | 38.0 |
| 13 |  | 2007 | 2,882.2 | 1,145.7 | 53.8 | 14.6 | 18.8 | 178.1 | 511.0 | 10.0 | 40.7 |
| 14 |  | 2006 | 3,049.1 | 1,168.6 | 48.0 | 13.2 | 21.8 | 166.2 | 565.1 | 9.2 | 43.0 |
| 15 |  | 2005 | 2,880.6 | 1,130.2 | 50.6 | 13.2 | 19.6 | 149.9 | 509.7 | 8.8 | 41.3 |
| 16 | LF 1CP | 2019 | 57.78\% | 39.72\% | 86.62\% | 50.22\% | 61.30\% | 52.59\% | 62.80\% | 67.06\% | 77.65\% |
| 17 | LF 1CP | 2018 | 57.48\% | 41.16\% | 89.68\% | 50.61\% | 56.50\% | 50.52\% | 57.19\% | 65.87\% | 68.09\% |
| 18 | LF 1CP | 2017 | 57.36\% | 40.12\% | 86.92\% | 48.94\% | 57.91\% | 51.63\% | 58.76\% | 67.25\% | 71.56\% |
| 19 | LF 1CP | 2016 | 57.19\% | 43.90\% | 84.92\% | 49.79\% | 52.77\% | 48.87\% | 56.22\% | 75.46\% | 71.58\% |
| 20 | LF 1CP | 2015 | 59.72\% | 40.55\% | 85.96\% | 47.05\% | 60.07\% | 55.02\% | 62.64\% | 82.44\% | 75.44\% |
| 21 | LF 1CP | 2014 | 62.35\% | 46.73\% | 105.01\% | 54.74\% | 64.02\% | 55.87\% | 58.21\% | 77.16\% | 74.70\% |
| 22 | LF 1CP | 2013 | 57.70\% | 39.47\% | 83.41\% | 43.65\% | 61.76\% | 54.65\% | 56.29\% | 70.09\% | 70.46\% |
| 23 | LF 1CP | 2012 | 56.30\% | 40.90\% | 76.45\% | 43.27\% | 57.61\% | 51.50\% | 53.54\% | 64.94\% | 65.29\% |
| 24 | LF 1CP | 2011 | 56.50\% | 37.05\% | 73.22\% | 39.87\% | 61.59\% | 55.30\% | 57.35\% | 69.17\% | 68.21\% |
| 25 | LF 1CP | 2010 | 59.02\% | 45.58\% | 87.63\% | 49.06\% | 52.51\% | 48.60\% | 50.77\% | 76.26\% | 73.67\% |
| 26 | LF 1CP | 2009 | 58.58\% | 45.71\% | 89.42\% | 45.59\% | 56.58\% | 50.07\% | 51.34\% | 75.00\% | 74.02\% |
| 27 | LF 1CP | 2008 | 58.87\% | 40.66\% | 79.77\% | 40.32\% | 59.75\% | 52.81\% | 53.43\% | 73.96\% | 74.78\% |
| 28 | LF 1CP | 2007 | 59.15\% | 41.36\% | 81.30\% | 40.11\% | 58.29\% | 53.81\% | 53.92\% | 77.12\% | 75.49\% |
| 29 | LF 1CP | 2006 | 54.34\% | 38.54\% | 81.06\% | 40.69\% | 49.31\% | 49.31\% | 49.31\% | 69.34\% | 69.34\% |
| 30 | LF 1CP | 2005 | 58.49\% | 41.61\% | 82.20\% | 40.60\% | 55.32\% | 55.32\% | 55.32\% | 76.38\% | 76.38\% |
| 31 | LF 1CP | Average | 58.06\% | 41.54\% | 84.90\% | 45.63\% | 57.68\% | 52.39\% | 55.80\% | 72.50\% | 72.44\% |
| 32 | Normalized kWh at Tx | 13,105,709 | 13,105,709 | 3,770,461 | 437,488 | 65,907 | 110,251 | 671,651 | 2,317,488 | 63,920 | 198,707 |
| 33 | 1CP | Allocator | 2,609.4 | 1,036.2 | 58.8 | 16.5 | 21.8 | 146.3 | 474.1 | 10.1 | 31.3 |

## Duquesne Light Company

## FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | GL Sec-Pri-SubT | GLH <br> Sec-Pri | L <br> Sec-Pri | HVPS SubT | SE <br> Secondary | SL <br> Secondary | UMS <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 1CP | 2019 | 2,611.7 | 446.5 | 59.1 | 131.8 | 189.1 | 0.0 | 0.0 | 2.5 |
| 2 |  | 2018 | 2,756.5 | 485.5 | 59.2 | 169.9 | 152.3 | 0.0 | 0.0 | 2.5 |
| 3 |  | 2017 | 2,662.3 | 480.5 | 73.2 | 168.4 | 161.2 | 0.0 | 0.0 | 2.4 |
| 4 |  | 2016 | 2,749.5 | 527.1 | 75.2 | 178.4 | 167.4 | 0.0 | 0.0 | 2.7 |
| 5 |  | 2015 | 2,688.4 | 484.8 | 80.2 | 155.1 | 166.8 | 0.0 | 0.0 | 2.6 |
| 6 |  | 2014 | 2,638.1 | 521.9 | 84.6 | 169.9 | 199.1 | 0.0 | 0.0 | 2.6 |
| 7 |  | 2013 | 2,909.1 | 536.0 | 88.5 | 177.6 | 222.2 | 0.0 | 0.0 | 2.4 |
| 8 |  | 2012 | 3,051.0 | 562.3 | 92.3 | 182.8 | 278.9 | 0.0 | 0.0 | 2.8 |
| 9 |  | 2011 | 3,008.2 | 557.3 | 95.0 | 188.1 | 139.6 | 0.0 | 0.0 | 2.8 |
| 10 |  | 2010 | 2,885.6 | 571.0 | 95.4 | 179.4 | 153.1 | 0.0 | 0.0 | 2.8 |
| 11 |  | 2009 | 2,711.3 | 555.2 | 92.4 | 171.4 | 142.4 | 0.0 | 0.0 | 2.8 |
| 12 |  | 2008 | 2,818.6 | 525.3 | 90.0 | 185.3 | 119.6 | 0.0 | 0.0 | 3.0 |
| 13 |  | 2007 | 2,882.2 | 525.1 | 90.6 | 181.3 | 109.4 | 0.0 | 0.0 | 3.1 |
| 14 |  | 2006 | 3,049.1 | 544.7 | 93.9 | 177.2 | 196.7 | 0.0 | 0.0 | 1.3 |
| 15 |  | 2005 | 2,880.6 | 528.0 | 90.2 | 160.2 | 177.6 | 0.0 | 0.0 | 1.3 |
| 16 | LF 1CP | 2019 | 57.78\% | 72.71\% | 71.79\% | 75.22\% | 88.51\% |  |  | 100.39\% |
| 17 | LF 1CP | 2018 | 57.48\% | 69.07\% | 77.42\% | 76.00\% | 100.38\% |  |  | 98.60\% |
| 18 | LF 1CP | 2017 | 57.36\% | 68.79\% | 65.02\% | 72.72\% | 99.74\% |  |  | 102.14\% |
| 19 | LF 1CP | 2016 | 57.19\% | 65.28\% | 66.98\% | 69.20\% | 90.38\% |  |  | 99.16\% |
| 20 | LF 1CP | 2015 | 59.72\% | 70.92\% | 69.44\% | 81.73\% | 108.19\% |  |  | 101.71\% |
| 21 | LF 1CP | 2014 | 62.35\% | 67.14\% | 69.46\% | 74.56\% | 107.66\% |  |  | 101.99\% |
| 22 | LF 1CP | 2013 | 57.70\% | 66.63\% | 67.79\% | 73.14\% | 105.30\% |  |  | 108.57\% |
| 23 | LF 1CP | 2012 | 56.30\% | 64.58\% | 65.54\% | 73.35\% | 87.87\% |  |  | 93.28\% |
| 24 | LF 1CP | 2011 | 56.50\% | 66.90\% | 66.18\% | 73.25\% | 144.83\% |  |  | 94.49\% |
| 25 | LF 1CP | 2010 | 59.02\% | 66.52\% | 68.32\% | $77.21 \%$ | 117.99\% |  |  | 99.56\% |
| 26 | LF 1CP | 2009 | 58.58\% | 66.70\% | 68.88\% | 73.38\% | 102.99\% |  |  | 101.40\% |
| 27 | LF 1CP | 2008 | 58.87\% | 72.23\% | 71.71\% | 78.40\% | 136.70\% |  |  | 102.40\% |
| 28 | LF 1CP | 2007 | 59.15\% | 71.41\% | 71.65\% | 78.23\% | 153.56\% |  |  | 104.24\% |
| 29 | LF 1CP | 2006 | 54.34\% | 68.54\% | 66.94\% | 74.56\% | 90.14\% |  |  | 101.20\% |
| 30 | LF 1CP | 2005 | 58.49\% | 71.97\% | 71.49\% | 90.57\% | 86.90\% |  |  | 110.41\% |
| 31 | LF 1CP | Average | 58.06\% | 68.63\% | 69.24\% | 76.10\% | 108.08\% |  |  | 101.30\% |
| 32 | Normalized kWh at Tx | 13,105,709 | 13,105,709 | 2,799,830 | 344,605 | 1,018,252 | 1,225,522 | 26,985 | 31,458 | 23,184 |
| 33 | 1CP | Allocator | 2,609.4 | 465.8 | 56.8 | 152.7 | 136.4 | - | - | 2.6 |

# FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 

Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | RS <br> Secondary | $\mathbf{R H}$ <br> Secondary | RA <br> Secondary | GS <br> Secondary | $\mathbf{G M}<\mathbf{2 5}$ <br> Secondary | $\text { GM }>25$ <br> Secondary | GMH $<\mathbf{2 5}$ <br> Secondary | GMH $>25$ <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 34 |  |  |  |  |  |  |  |  |  |  |  |
| 35 | NCP- Tx Level | 2019 | 3,034.9 | 1,205.8 | 166.0 | 16.5 | 19.7 | 158.7 | 432.3 | 15.1 | 52.7 |
| 36 |  | 2018 | 3,184.9 | 1,242.3 | 154.1 | 16.5 | 22.6 | 137.6 | 506.3 | 12.6 | 62.5 |
| 37 |  | 2017 | 3,008.2 | 1,155.8 | 136.4 | 15.1 | 28.2 | 119.3 | 495.2 | 10.5 | 58.1 |
| 38 |  | 2016 | 3,085.3 | 1,178.4 | 130.6 | 15.3 | 22.3 | 130.6 | 499.7 | 12.9 | 56.0 |
| 39 |  | 2015 | 3,166.1 | 1,183.8 | 158.0 | 14.5 | 25.4 | 131.6 | 475.0 | 15.3 | 61.5 |
| 40 |  | 2014 | 3,119.5 | 1,083.5 | 157.6 | 13.0 | 20.8 | 123.0 | 475.8 | 15.0 | 65.1 |
| 41 |  | 2013 | 3,293.6 | 1,225.6 | 127.4 | 14.8 | 19.1 | 131.3 | 499.5 | 11.7 | 57.6 |
| 42 |  | 2012 | 3,487.2 | 1,328.0 | 110.1 | 16.6 | 19.2 | 137.4 | 511.4 | 11.1 | 50.3 |
| 43 |  | 2011 | 3,542.9 | 1,325.2 | 129.1 | 16.7 | 20.1 | 145.8 | 534.0 | 12.2 | 56.4 |
| 44 |  | 2010 | 3,432.6 | 1,278.4 | 140.9 | 17.2 | 20.9 | 154.8 | 540.2 | 14.0 | 60.2 |
| 45 |  | 2009 | 3,208.9 | 1,108.5 | 153.7 | 14.5 | 20.9 | 157.9 | 524.4 | 16.9 | 60.1 |
| 46 |  | 2008 | 3,340.0 | 1,189.3 | 134.6 | 15.1 | 19.9 | 198.6 | 520.3 | 17.9 | 55.2 |
| 47 |  | 2007 | 3,391.1 | 1,205.9 | 141.6 | 14.9 | 21.8 | 195.7 | 552.5 | 16.1 | 63.6 |
| 48 |  | 2006 | 3,448.2 | 1,303.6 | 111.2 | 15.2 | 22.2 | 169.8 | 577.2 | 11.9 | 55.7 |
| 49 |  | 2005 | 3,428.4 | 1,261.6 | 121.1 | 16.7 | 21.2 | 161.8 | 549.9 | 12.9 | 60.3 |
| 50 | LF NCP | 2019 | 49.72\% | 36.22\% | 28.17\% | 44.76\% | 57.42\% | 50.48\% | 58.46\% | 41.13\% | 46.88\% |
| 51 | LF NCP | 2018 | 49.75\% | 37.14\% | 31.54\% | 45.76\% | 51.85\% | 50.07\% | 55.45\% | 38.40\% | 45.21\% |
| 52 | LF NCP | 2017 | 50.77\% | 36.68\% | 31.42\% | 44.62\% | 39.71\% | 50.06\% | 56.59\% | 41.98\% | 47.35\% |
| 53 | LF NCP | 2016 | 50.97\% | 38.74\% | 33.51\% | 44.49\% | 52.75\% | 48.82\% | 55.71\% | 37.25\% | 50.18\% |
| 54 | LF NCP | 2015 | 50.71\% | 37.84\% | 28.66\% | 44.53\% | 45.34\% | 51.70\% | 58.02\% | 34.00\% | 47.41\% |
| 55 | LF NCP | 2014 | 52.73\% | 40.76\% | 30.65\% | 48.01\% | 52.81\% | 55.30\% | 57.65\% | 38.72\% | 45.87\% |
| 56 | LF NCP | 2013 | 50.96\% | 36.59\% | 36.17\% | 41.02\% | 56.92\% | 52.78\% | 54.35\% | 49.06\% | 51.74\% |
| 57 | LF NCP | 2012 | 49.26\% | 35.24\% | 38.32\% | 37.29\% | 56.41\% | 51.26\% | 53.29\% | 48.22\% | 58.68\% |
| 58 | LF NCP | 2011 | 47.98\% | 35.58\% | 34.76\% | 38.53\% | 54.33\% | 48.90\% | 51.12\% | 46.76\% | 53.83\% |
| 59 | LF NCP | 2010 | 49.62\% | 37.57\% | 33.06\% | 38.10\% | 52.34\% | 48.44\% | 50.60\% | 42.68\% | 51.88\% |
| 60 | LF NCP | 2009 | 49.50\% | 39.22\% | 28.80\% | 40.43\% | 48.45\% | 49.01\% | 50.16\% | 37.81\% | 49.82\% |
| 61 | LF NCP | 2008 | 49.68\% | 37.51\% | 32.71\% | 37.86\% | 51.98\% | 48.57\% | 49.16\% | 50.91\% | 51.47\% |
| 62 | LF NCP | 2007 | 50.27\% | 39.29\% | 30.90\% | 39.17\% | 50.25\% | 48.96\% | 49.87\% | 47.94\% | 48.30\% |
| 63 | LF NCP | 2006 | 48.05\% | 34.55\% | 34.99\% | 35.24\% | 48.27\% | 48.27\% | 48.27\% | 53.56\% | 53.56\% |
| 64 | LF NCP | 2005 | 49.15\% | 37.28\% | 34.36\% | 32.09\% | 51.28\% | 51.28\% | 51.28\% | 52.25\% | 52.25\% |
| 65 | LF NCP | Average | 49.94\% | 37.35\% | 32.53\% | 40.79\% | 51.34\% | 50.26\% | 53.33\% | 44.04\% | 50.30\% |
| 66 | NCP- Tx Level | Allocator | 3,042.9 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |

## Duquesne Light Company

## FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | GL <br> Sec-Pri-SubT | GLH <br> Sec-Pri | L <br> Sec-Pri | HVPS <br> SubT | SE <br> Secondary | SL <br> Secondary | UMS <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 34 |  |  |  |  |  |  |  |  |  |  |
| 35 | NCP- Tx Level | 2019 | 3,034.9 | 496.5 | 78.2 | 139.4 | 236.0 | 7.4 | 8.0 | 2.6 |
| 36 |  | 2018 | 3,184.9 | 508.6 | 84.3 | 177.9 | 241.2 | 7.4 | 8.2 | 2.7 |
| 37 |  | 2017 | 3,008.2 | 493.8 | 86.0 | 172.4 | 219.1 | 7.4 | 8.2 | 2.7 |
| 38 |  | 2016 | 3,085.3 | 531.6 | 90.7 | 181.1 | 218.0 | 7.1 | 8.2 | 2.8 |
| 39 |  | 2015 | 3,166.1 | 524.8 | 98.7 | 174.3 | 284.6 | 7.4 | 8.3 | 2.8 |
| 40 |  | 2014 | 3,119.5 | 531.3 | 104.3 | 174.8 | 331.8 | 11.8 | 8.8 | 2.8 |
| 41 |  | 2013 | 3,293.6 | 559.1 | 98.2 | 184.9 | 341.3 | 11.9 | 8.3 | 3.0 |
| 42 |  | 2012 | 3,487.2 | 592.2 | 96.9 | 191.2 | 397.3 | 12.9 | 9.3 | 3.3 |
| 43 |  | 2011 | 3,542.9 | 619.1 | 103.6 | 203.5 | 351.9 | 13.2 | 8.8 | 3.2 |
| 44 |  | 2010 | 3,432.6 | 596.7 | 106.3 | 200.5 | 276.1 | 13.7 | 9.3 | 3.4 |
| 45 |  | 2009 | 3,208.9 | 587.3 | 107.4 | 184.6 | 252.2 | 7.9 | 9.2 | 3.5 |
| 46 |  | 2008 | 3,340.0 | 585.6 | 105.3 | 204.5 | 266.8 | 13.1 | 9.8 | 3.8 |
| 47 |  | 2007 | 3,391.1 | 575.0 | 110.6 | 206.9 | 265.6 | 7.8 | 9.2 | 4.1 |
| 48 |  | 2006 | 3,448.2 | 585.5 | 98.4 | 200.8 | 272.7 | 13.3 | 9.0 | 1.6 |
| 49 |  | 2005 | 3,428.4 | 583.6 | 101.8 | 226.3 | 284.9 | 15.4 | 9.2 | 1.7 |
| 50 | LF NCP | 2019 | 49.72\% | 65.39\% | 54.32\% | 71.17\% | 70.92\% | 42.19\% | 45.59\% | 94.82\% |
| 51 | LF NCP | 2018 | 49.75\% | 65.94\% | 54.31\% | 72.58\% | 63.37\% | 42.20\% | 45.28\% | 92.01\% |
| 52 | LF NCP | 2017 | 50.77\% | 66.94\% | 55.30\% | 71.04\% | 73.39\% | 40.45\% | 45.64\% | 91.88\% |
| 53 | LF NCP | 2016 | 50.97\% | 64.72\% | 55.51\% | 68.20\% | 69.37\% | 41.72\% | 45.55\% | 94.94\% |
| 54 | LF NCP | 2015 | 50.71\% | 65.52\% | 56.39\% | 72.71\% | 63.40\% | 42.24\% | 45.49\% | 91.94\% |
| 55 | LF NCP | 2014 | 52.73\% | 65.95\% | 56.33\% | 72.47\% | 64.60\% | 26.44\% | 43.41\% | 92.05\% |
| 56 | LF NCP | 2013 | 50.96\% | 63.88\% | 61.13\% | 70.27\% | 68.56\% | 26.60\% | 46.36\% | 88.17\% |
| 57 | LF NCP | 2012 | 49.26\% | 61.32\% | 62.44\% | 70.14\% | 61.68\% | 24.96\% | 42.76\% | 80.40\% |
| 58 | LF NCP | 2011 | 47.98\% | 60.22\% | 60.65\% | 67.69\% | 57.45\% | 26.05\% | 44.90\% | 83.08\% |
| 59 | LF NCP | 2010 | 49.62\% | 63.65\% | 61.32\% | 69.08\% | 65.40\% | 17.19\% | 43.45\% | 81.47\% |
| 60 | LF NCP | 2009 | 49.50\% | 63.06\% | 59.25\% | 68.13\% | 58.16\% | 43.78\% | 43.81\% | 80.32\% |
| 61 | LF NCP | 2008 | 49.68\% | 64.79\% | 61.23\% | 71.05\% | 61.26\% | 26.20\% | 41.01\% | 80.32\% |
| 62 | LF NCP | 2007 | 50.27\% | 65.22\% | 58.73\% | 68.55\% | 63.27\% | 44.89\% | 44.80\% | 78.20\% |
| 63 | LF NCP | 2006 | 48.05\% | 63.77\% | 63.92\% | 65.81\% | 65.01\% | 25.91\% | 45.96\% | 82.07\% |
| 64 | LF NCP | 2005 | 49.15\% | 65.11\% | 63.32\% | 64.10\% | 54.19\% | 27.72\% | 44.47\% | 81.47\% |
| 65 | LF NCP | Average | 49.94\% | 64.36\% | 58.95\% | 69.53\% | 64.00\% | 33.23\% | 44.57\% | 86.21\% |
| 66 | NCP- Tx Level | Allocator | 3,042.9 | 496.6 | 66.7 | 167.2 | 232.8 | 9.3 | 8.1 | 3.1 |

Demand Allocators-Calculations
Exh 6-9E

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | RS <br> Secondary | $\mathbf{R H}$ <br> Secondary | $\mathbf{R A}$ <br> Secondary | GS <br> Secondary | $\mathbf{G M}<\mathbf{2 5}$ <br> Secondary | $\mathbf{G M}>25$ <br> Secondary | GMH $<\mathbf{2 5}$ <br> Secondary | GMH $>25$ <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 67 |  |  |  |  |  |  |  |  |  |  |  |
| 68 | NCP- Primary | Allocator | 2,807.5 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 69 | From Downtown tab |  |  |  |  |  |  |  |  |  |  |
| 70 | NCP-Prim-Network | Allocator | 72.9 |  |  |  | 0.1 | 2.0 | 11.5 | 0.3 | 1.5 |
| 71 |  |  |  |  |  |  |  |  |  |  |  |
| 72 | NCP- Prim-NonNetwork | Allocator | 2,734.5 | 1,152.5 | 153.5 | 18.4 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 73 |  |  |  |  |  |  |  |  |  |  |  |
| 74 | NCP-Prim-URD |  |  |  |  |  |  |  |  |  |  |
| 75 | NCP- Primary |  | 1,324.4 | 1,152.5 | 153.5 | 18.4 |  |  |  |  |  |
| 76 | URD \% of total | Average |  | 11.28\% | 11.28\% | 11.28\% |  |  |  |  |  |
| 77 | NCP-Prim-URD | Allocator | 149.4 | 130.0 | 17.3 | 2.1 |  |  |  |  |  |
| 78 |  |  |  | 97.50\% | of Residentia | does not use | -Radial |  |  |  |  |
| 79 | NCP- Primary | Line 75 | 2,807.5 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 80 | NCP- Primary Residential | 97.5\% | $(1,291.3)$ | $(1,123.7)$ | (149.7) | (18.0) |  |  |  |  |  |
| 81 | NCP-Prim-Network | Subtract | (72.9) | - | - | - | (0.1) | (2.0) | (11.5) | (0.3) | (1.5) |
| 82 | NCP-Prim-Radial | Allocator | 1,443.2 | 28.8 | 3.8 | 0.5 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 83 |  |  |  |  |  |  |  |  |  |  |  |
| 84 | NCP-Secondary | Allocator | 2,721.1 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| $85 \sim$ |  |  |  |  |  |  |  |  |  |  |  |
| 86 | NCP-Sec-PLCC | Subtract | 1,920.2 | 1,578.1 | 127.0 | 18.8 | 78.8 | 63.4 | 21.0 | 7.7 | 1.9 |
| 87 | NCP-Sec-Xfmr | Allocator | 1,296.0 | - | 26.5 | - | - | 89.1 | 475.0 | 8.8 | 43.2 |
| 88 |  |  |  |  |  |  |  |  |  |  |  |
| 89 | NCP-Sec-Network | Allocator | 72.9 | - | - | - | 0.1 | 2.0 | 11.5 | 0.3 | 1.5 |
| 90 |  |  |  |  |  |  |  |  |  |  |  |
| 91 | NCP-Sec-NonNetwork | Allocator | 2,648.1 | 1,152.5 | 153.5 | 18.4 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 92 |  |  |  |  |  |  |  |  |  |  |  |
| 93 | NCP-Sec-URD | Allocator | 149.4 | 130.0 | 17.3 | 2.1 | - | - | - | - | - |
| 94 |  |  |  |  |  |  |  |  |  |  |  |
| 95 | NCP-Sec-Radial |  |  |  |  |  |  |  |  |  |  |
| 96 | NCP-Secondary | Line 84 | 2,721.1 | 1,152.5 | 153.5 | 18.4 | 24.5 | 152.6 | 496.0 | 16.6 | 45.1 |
| 97 | NCP- Secondary Residential | 97.5\% | $(1,291.3)$ | $(1,123.7)$ | (149.7) | (18.0) |  |  |  |  |  |
| 98 | NCP-Sec-Network | Subtract | (72.9) | - | - | - | (0.1) | (2.0) | (11.5) | (0.3) | (1.5) |
| 99 | NCP-Sec-Radial | Allocator | 1,356.8 | 28.8 | 3.8 | 0.5 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |

Demand Allocators-Calculations
Exh 6-9E

## Duquesne Light Company

FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | GL <br> Sec-Pri-SubT | $\begin{gathered} \text { GLH } \\ \text { Sec-Pri } \end{gathered}$ | $\begin{gathered} \mathbf{L} \\ \text { Sec-Pri } \end{gathered}$ | HVPS <br> SubT | SE <br> Secondary | SL <br> Secondary | UMS <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 67 |  |  |  |  |  |  |  |  |  |  |
| 68 | NCP- Primary | Allocator | 2,807.5 | 494.0 | 66.7 | 167.2 |  | 9.3 | 8.1 | 3.1 |
| 69 | From Downtown tab |  |  |  |  |  |  |  |  |  |
| 70 | NCP-Prim-Network | Allocator | 72.9 | 37.4 | 15.0 | 5.1 |  |  | - | 0.0 |
| 71 |  |  |  |  |  |  |  |  |  |  |
| 72 | NCP- Prim-NonNetwork | Allocator | 2,734.5 | 456.6 | 51.7 | 162.1 |  | 9.3 | 8.1 | 3.0 |
| 73 |  |  |  |  |  |  |  |  |  |  |
| 74 | NCP-Prim-URD |  |  |  |  |  |  |  |  |  |
| 75 | NCP- Primary |  | 1,324.4 |  |  |  |  |  |  |  |
| 76 | URD \% of total | Average |  |  |  |  |  |  |  |  |
| 77 | NCP-Prim-URD | Allocator | 149.4 |  |  |  |  |  |  |  |
| 78 |  |  |  |  |  |  |  |  |  |  |
| 79 | NCP- Primary | Line 75 | 2,807.5 | 494.0 | 66.7 | 167.2 | - | 9.3 | 8.1 | 3.1 |
| 80 | NCP- Primary Residential | 97.5\% | $(1,291.3)$ |  |  |  |  |  |  |  |
| 81 | NCP-Prim-Network | Subtract | (72.9) | (37.4) | (15.0) | (5.1) | - | - | - | (0.0) |
| 82 | NCP-Prim-Radial | Allocator | 1,443.2 | 456.6 | 51.7 | 162.1 | - | 9.3 | 8.1 | 3.0 |
| 83 |  |  |  |  |  |  |  |  |  |  |
| 84 | NCP-Secondary | Allocator | 2,721.1 | 459.2 | 63.6 | 118.6 |  | 9.3 | 8.1 | 3.1 |
| 85 |  |  |  |  |  |  |  |  |  |  |
| 86 | NCP-Sec-PLCC | Subtract | 1,920.2 | 2.2 | 0.2 | 0.1 | - | 0.0 | 3.1 | 17.9 |
| 87 | NCP-Sec-Xfmr | Allocator | 1,296.0 | 457.1 | 63.4 | 118.6 | - | 9.3 | 5.0 | - |
| 88 |  |  |  |  |  |  |  |  |  |  |
| 89 | NCP-Sec-Network | Allocator | 72.9 | 37.4 | 15.0 | 5.1 | - | - | - | 0.0 |
| 90 |  |  |  |  |  |  |  |  |  |  |
| 91 | NCP-Sec-NonNetwork | Allocator | 2,648.1 | 421.8 | 48.6 | 113.5 | - | 9.3 | 8.1 | 3.0 |
| 92 |  |  |  |  |  |  |  |  |  |  |
| 93 | NCP-Sec-URD | Allocator | 149.4 | - | - | - | - | - | - | - |
| 94 |  |  |  |  |  |  |  |  |  |  |
| 95 | NCP-Sec-Radial |  |  |  |  |  |  |  |  |  |
| 96 | NCP-Secondary | Line 84 | 2,721.1 | 459.2 | 63.6 | 118.6 | - | 9.3 | 8.1 | 3.1 |
| 97 | NCP- Secondary Residential | 97.5\% | $(1,291.3)$ |  |  |  |  |  |  |  |
| 98 | NCP-Sec-Network | Subtract | (72.9) | (37.4) | (15.0) | (5.1) | - | - | - | (0.0) |
| 99 | NCP-Sec-Radial | Allocator | 1,356.8 | 421.8 | 48.6 | 113.5 | - | 9.3 | 8.1 | 3.0 |

Demand Allocators-Calculations
Exh 6-9E

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | RS <br> Secondary | RH <br> Secondary | RA <br> Secondary | GS <br> Secondary | $\mathbf{G M}<\mathbf{2 5}$ <br> Secondary | GM>25 <br> Secondary | GMH $<25$ <br> Secondary | GMH $>25$ <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 100 |  |  |  |  |  |  |  |  |  |  |  |
| 101 | NCP-Sec-Radial | Line 99 | 1,356.8 | 28.8 | 3.8 | 0.5 | 24.4 | 150.5 | 484.6 | 16.3 | 43.6 |
| 102 | NCP-Sec-Radial-PLCC | Subtract | (116.5) | (94.8) | (7.6) | (1.1) | (5.2) | (4.2) | (1.4) | (0.5) | (0.1) |
| 103 | NCP-Sec-Radial-Xfmr | Allocator | 1,310.8 | - | - | - | 19.2 | 146.4 | 483.2 | 15.8 | 43.5 |
| 104 | From Downtown tab |  |  |  |  |  |  |  |  |  |  |
| 105 | Network Customers | Allocator | 794 |  |  |  | 162 | 278 | 171 | 81 | 36 |
| 106 | Adjust for Load |  |  |  |  |  | 93.46 | 44.01 | 4.30 | 39.61 | 4.60 |
| 107 | Net Cust- Xfmr | Allocator | 121.7 |  |  |  | 1.73 | 6.32 | 39.72 | 2.04 | 7.83 |
| 108 |  |  |  |  |  |  |  |  |  |  |  |
| 106 | MWh- Tx Level | 2019 | 13,218 | 3,826 | 410 | 65 | 99 | 702 | 2,214 | 55 | 216 |
| 107 |  | 2018 | 13,880 | 4,042 | 426 | 66 | 103 | 603 | 2,459 | 43 | 247 |
| 108 |  | 2017 | 13,378 | 3,713 | 375 | 59 | 98 | 523 | 2,455 | 39 | 241 |
| 109 |  | 2016 | 13,812 | 4,010 | 384 | 60 | 103 | 560 | 2,445 | 42 | 247 |
| 107 |  | 2015 | 14,064 | 3,924 | 397 | 57 | 101 | 596 | 2,414 | 45 | 255 |
| 108 |  | 2014 | 14,409 | 3,869 | 423 | 55 | 96 | 596 | 2,403 | 51 | 262 |
| 109 |  | 2013 | 14,703 | 3,928 | 404 | 53 | 95 | 607 | 2,378 | 50 | 261 |
| 110 |  | 2012 | 15,088 | 4,110 | 370 | 54 | 95 | 619 | 2,394 | 47 | 259 |
| 111 |  | 2011 | 14,890 | 4,130 | 393 | 56 | 96 | 625 | 2,391 | 50 | 266 |
| 112 |  | 2010 | 14,919 | 4,207 | 408 | 58 | 96 | 657 | 2,394 | 52 | 273 |
| 113 |  | 2009 | 13,915 | 3,808 | 388 | 51 | 89 | 678 | 2,304 | 56 | 262 |
| 114 |  | 2008 | 14,575 | 3,918 | 387 | 50 | 91 | 848 | 2,247 | 80 | 249 |
| 115 |  | 2007 | 14,934 | 4,151 | 383 | 51 | 96 | 839 | 2,414 | 68 | 269 |
| 116 |  | 2006 | 14,514 | 3,945 | 341 | 47 | 94 | 718 | 2,441 | 56 | 261 |
| 117 |  | 2005 | 14,761 | 4,120 | 365 | 47 | 95 | 727 | 2,470 | 59 | 276 |
| 118 |  |  | 14,337 | 3,980 | 390 | 55 | 96 | 660 | 2,388 | 53 | 256 |
| 119 | Average |  | 14,337 | 3,980 | 390 | 55 | 96 | 660 | 2,388 | 53 | 256 |
| 120 |  |  | 100.000\% | 27.762\% | 2.722\% | 0.386\% | 0.673\% | 4.602\% | 16.658\% | 0.369\% | 1.788\% |
| 121 | Normalized kWh at Meter | 12,058,025 | 12,058,025 | 3,436,013 | 398,682 | 60,061 | 100,471 | 612,074 | 2,111,922 | 58,250 | 181,082 |
| 122 | Check= | - |  | 1.0973 | 1.0973 | 1.0973 | 1.0973 | 1.0973 | 1.0973 | 1.0973 | 1.0973 |
| 123 | Normalized kWh at Tx L | Allocator | 13,105,709 | 3,770,461 | 437,488 | 65,907 | 110,251 | 671,651 | 2,317,488 | 63,920 | 198,707 |
| 124 |  |  | 100.000\% | 28.770\% | 3.338\% | 0.503\% | 0.841\% | 5.125\% | 17.683\% | 0.488\% | 1.516\% |

Demand Allocators-Calculations
Exh 6-9E

## Duquesne Light Company

## FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

Class Allocated Cost of Service Study (ACOS)
Demand Allocators-Calculations

| Line | Allocator |  | Total | GL Sec-Pri-SubT | GLH <br> Sec-Pri | $\mathbf{L}$ Sec-Pri | HVPS SubT | SE <br> Secondary | SL <br> Secondary | UMS <br> Secondary |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 100 |  |  |  |  |  |  |  |  |  |  |
| 101 | NCP-Sec-Radial | Line 99 | 1,356.8 | 421.8 | 48.6 | 113.5 |  | 9.3 |  | 3.0 |
| 102 | NCP-Sec-Radial-PLCC | Subtract | (116.5) | (0.1) | (0.0) | (0.0) | (0.0) | (0.0) | (0.2) | (1.2) |
| 103 | NCP-Sec-Radial-Xfmr | Allocator | 1,310.8 | 421.7 | 48.6 | 113.5 | - | 9.3 | 7.9 | 1.9 |
| 104 | From Downtown tab |  |  |  |  |  |  |  |  |  |
| 105 | Network Customers | Allocator | 794 | 52 | 11 | 1 |  |  |  | 2 |
| 106 | Adjust for Load |  |  | 1.00 | 1.00 | 1.00 |  |  |  | 121.83 |
| 107 | Net Cust- Xfmr | Allocator | 121.7 | 52.00 | 11.00 | 1.00 |  |  |  | 0.02 |
| 108 |  |  |  |  |  |  |  |  |  |  |
| 106 | MWh- Tx Level | 2019 | 13,218 | 2,844 | 372 | 869 | 1,466 | 27 | 32 | 22 |
| 107 |  | 2018 | 13,880 | 2,938 | 401 | 1,131 | 1,339 | 27 | 32 | 21 |
| 108 |  | 2017 | 13,378 | 2,896 | 417 | 1,073 | 1,409 | 26 | 33 | 21 |
| 109 |  | 2016 | 13,812 | 3,022 | 442 | 1,085 | 1,329 | 26 | 33 | 23 |
| 107 |  | 2015 | 14,064 | 3,012 | 488 | 1,110 | 1,581 | 27 | 33 | 23 |
| 108 |  | 2014 | 14,409 | 3,069 | 515 | 1,110 | 1,878 | 27 | 33 | 23 |
| 109 |  | 2013 | 14,703 | 3,129 | 526 | 1,138 | 2,050 | 28 | 34 | 23 |
| 110 |  | 2012 | 15,088 | 3,190 | 531 | 1,178 | 2,153 | 28 | 35 | 23 |
| 111 |  | 2011 | 14,890 | 3,266 | 551 | 1,207 | 1,771 | 30 | 35 | 24 |
| 112 |  | 2010 | 14,919 | 3,327 | 571 | 1,213 | 1,582 | 21 | 35 | 24 |
| 113 |  | 2009 | 13,915 | 3,244 | 558 | 1,102 | 1,285 | 30 | 35 | 25 |
| 114 |  | 2008 | 14,575 | 3,333 | 567 | 1,276 | 1,436 | 30 | 35 | 27 |
| 115 |  | 2007 | 14,934 | 3,285 | 569 | 1,242 | 1,472 | 30 | 36 | 28 |
| 116 |  | 2006 | 14,514 | 3,271 | 551 | 1,158 | 1,553 | 30 | 36 | 12 |
| 117 |  | 2005 | 14,761 | 3,329 | 565 | 1,271 | 1,352 | 37 | 36 | 12 |
| 118 |  |  | 14,337 | 3,144 | 508 | 1,144 | 1,577 | 28 | 34 | 22 |
| 119 | Average |  | 14,337 | 3,144 | 508 | 1,144 | 1,577 | 28 | 34 | 22 |
| 120 |  |  | 100.000\% | 21.926\% | 3.544\% | 7.980\% | 10.999\% | 0.199\% | 0.239\% | 0.154\% |
| 121 | Normalized kWh at Meter | 12,058,025 | 12,058,025 | 2,559,511 | 314,530 | 937,897 | 1,213,147 | 24,592 | 28,667 | 21,127 |
| 122 | Check= | - |  |  |  |  | 1.0102 | 1.0973 | 1.0973 | 1.0973 |
| 123 | Normalized kWh at Tx Levi | Allocator | 13,105,709 | 2,799,830 | 344,605 | 1,018,252 | 1,225,522 | 26,985 | 31,458 | 23,184 |
| 124 |  |  | 100.000\% | 21.363\% | 2.629\% | 7.770\% | 9.351\% | 0.206\% | 0.240\% | 0.177\% |

Demands_PLCC
Demand Allocators-PLCC
Exh 6-9E-1


Revenue
Revenue and Physical Allocators (Fully
Exh 6-9F

## Duquesne Light Company

## FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022

Class Allocated Cost of Service Study (ACOS)
Revenue and Physical Allocators (Fully Projected Future Test Year)
Revenue and Physical Allocators (Fully Projected Future Test Year)

|  |  |  |  |  | Distribution Base Revenue |  |  | Transmission | Generation | Total Revenue |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Line | Rate Class | Customers | Distribution kWh | POLR kWh | Total <br> Distribution <br> Base Revenue | Distribution Base Revenue | Distribution Other Revenue | Transmission Revenue | Supply Revenue | Total Revenue |
|  |  | Average | kWh | kWh | \$ | \$ | \$ | \$ | \$ | \$ |
| 1 | RS | 496,018 | 3,436,012,580 | 2,462,883,068 | 292,160,106 | 281,363,268 | 10,796,839 | 47,920,726 | 137,809,023 | 477,889,855 |
| 2 | RH | 39,909 | 398,681,994 | 338,777,811 | 28,035,943 | 26,227,568 | 1,808,375 | 2,837,324 | 18,773,775 | 49,647,042 |
| 3 | RA | 5,920 | 60,060,581 | 46,104,014 | 3,229,634 | 3,085,336 | 144,298 | 691,167 | 2,569,649 | 6,490,451 |
| 4 | GS | 24,936 | 100,471,491 | 74,163,814 | 11,674,531 | 11,103,561 | 570,969 | 797,643 | 4,108,674 | 16,580,848 |
| 5 | GM<25 | 20,206 | 612,074,114 | 333,702,452 | 33,159,838 | 31,936,603 | 1,223,235 | 5,091,114 | 18,524,169 | 56,775,121 |
| 6 | $\mathrm{GM}>25$ | 6,772 | 2,111,921,912 | 570,837,570 | 69,471,863 | 65,982,505 | 3,489,358 | 6,646,098 | 31,677,694 | 107,795,656 |
| 7 | GMH<25 | 2,507 | 58,250,231 | 35,969,683 | 3,601,523 | 3,412,093 | 189,430 | 368,986 | 1,989,181 | 5,959,690 |
| 8 | GMH>25 | 642 | 181,081,549 | 45,209,383 | 5,889,536 | 5,878,378 | 11,158 | 467,368 | 2,496,283 | 8,853,187 |
| 9 | GL | 736 | 2,559,510,775 | 125,035,488 | 64,407,436 | 62,515,502 | 1,891,934 | 1,420,441 | 6,930,125 | 72,758,002 |
| 10 | GLH | 88 | 314,529,656 | 35,001,437 | 7,191,583 | 7,370,247 | $(178,664)$ | 348,812 | 1,939,964 | 9,480,359 |
| 11 | L | 20 | 937,896,579 | 0 | 18,666,789 | 18,272,393 | 394,396 | 0 | 0 | 18,666,789 |
| 12 | HVPS | 9 | 1,213,146,604 | 0 | 323,733 | 265,162 | 58,571 | 0 | 0 | 323,733 |
| 13 | SE | 1 | 24,591,733 | 0 | 1,491,576 | 1,420,662 | 70,914 | 0 | 0 | 1,491,576 |
| 14 | SL (below) | 964 | 28,667,464 | 10,236,382 | 9,959,315 | 9,500,108 | 459,207 | 141 | 343,611 | 10,303,067 |
| 15 | UMS | 5,630 | 21,127,282 | 3,249,834 | 1,114,515 | 1,059,510 | 55,005 | 25,092 | 181,146 | 1,320,754 |
| 16 | Total | 604,358 | 12,058,024,546 | 4,081,170,936 | 550,377,921 | 529,392,895 | 20,985,026 | 66,614,912 | 227,343,295 | 844,336,129 |
| 17 |  |  |  |  |  |  |  |  |  |  |
| 18 |  |  |  |  |  |  |  |  |  |  |
| 19 | AL | 3 | 109,708 | 9,582 | 1,106 | 1,054 | 53 | 97 | 319 | 1,522 |
| 20 | SM | 174 | 25,004,964 | 8,031,018 | 9,422,276 | 8,974,314 | 447,962 | 0 | 269,807 | 9,692,083 |
| 21 | SH | 13 | 866,940 | 246,410 | 114,821 | 109,362 | 5,459 | 0 | 8,491 | 123,311 |
| 22 | PAL | 774 | 2,685,852 | 1,949,372 | 421,112 | 415,378 | 5,734 | 44 | 64,994 | 486,150 |
| 23 |  | 964 | 28,667,464 | 10,236,382 | 9,959,315 | 9,500,108 | 459,207 | 141 | 343,611 | 10,303,067 |

## Duquesne Light Company

FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Services Costs

| Line | Rate Class | Customers | \% Residential | \% Commercial | Unit Cost | Total Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | RS | 496,018 | 100\% |  | \$479.95 | 238,063,645 |
| 2 | RH | 39,909 | 100\% |  | \$479.95 | 19,154,393 |
| 3 | RA | 5,920 | 100\% |  | \$479.95 | 2,841,116 |
| 4 | GS | 24,936 | 90\% | 10\% | \$487.34 | 12,152,329 |
| 5 | GM<25 | 20,206 |  | 100\% | \$553.86 | 11,191,494 |
| 6 | GM>25 | 6,772 |  | 100\% | \$553.86 | 3,750,744 |
| 7 | GMH<25 | 2,507 |  | 100\% | \$553.86 | 1,388,557 |
| 8 | GMH $>25$ | 642 |  | 100\% | \$553.86 | 355,335 |
| 9 | GL | 736 |  | 100\% | \$553.86 | 407,869 |
| 10 | GLH | 88 |  | 100\% | \$553.86 | 48,771 |
| 11 | L | 20 |  |  |  | 0 |
| 12 | HVPS | 9 |  |  |  | 0 |
| 13 | SE | 1 |  |  |  | 0 |
| 14 | SL | 964 |  |  |  | 0 |
| 15 | UMS | 5,630 |  |  |  | 0 |
| 16 | Total | 604,358 |  |  |  | 289,354,253 |
| 17 |  |  |  |  |  |  |
| 18 |  |  | Residential | Non-Residential |  |  |
| 19 | Average Installed Cost |  | \$479.95 | \$553.86 | 2020 |  |
| 20 |  |  |  |  |  |  |
| 21 | Residential | Length- feet | Cost / Foot |  |  |  |
| 22 | \#4 triplex | 100 | 0.3516 |  | 35.16 |  |
| 23 | Labor / Overhead |  |  |  | 444.79 |  |
| 24 |  |  |  |  | 479.95 |  |
| 25 |  |  |  |  |  |  |
| 26 | Non-residential | Length- feet | Cost / Foot |  |  |  |
| 27 | 1/0 triplex | 100 | 0.9343 |  | 93.43 |  |
| 28 | Labor / Overhead |  |  |  | 460.43 |  |
| 29 |  |  |  |  | 553.86 |  |
| 30 |  |  |  |  |  |  |



CustSves
Customer Records and Accounts Allocators
Exh 6-9I

| Line | Description |
| :---: | :--- |
| 1 | Account 901-Supervision |
| 2 | Credit \& Collection Supervision |
| 3 | Billing |
| 4 | Customer Services- Inbound Calls |
| 5 | Customer Services- Inbound Calls |
| 6 | Credit \& Collection (\& Cash Mgt) |
| 7 | Field Services- Customer Care |
| 8 |  |
| 9 |  |
| 10 |  |
| 11 | Callocils_In (Inbound Calls) |
| 12 | Trouble (Outages, Voltage) |
| 13 | Movers |
| 14 | General Business |
| 15 | Billing / Credit- Residential |
| 16 | Billing / Credit- Commercial |
| 17 | Verify Payment |
| 18 |  |

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Customer Records and Accounts Allocators

| Allocator | Activity \% | RS | RH | RA | GS | GM<25 | GM>25 | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Write-Offs | 3,701,613 | 2,929,298 | 494,866 | 15,016 | 58,593 | 57,248 | 108,693 | 9,328 | 13,857 |
| Avg-Cust | 5,941,641 | 4,876,512 | 392,360 | 58,198 | 245,154 | 198,655 | 66,578 | 24,648 | 6,307 |
| Calls_In | 17,284 | 14,461 | 1,173 | 173 | 558 | 490 | 241 | 60 | 22 |
| Calls_In | 80,233 | 67,130 | 5,446 | 804 | 2,589 | 2,273 | 1,119 | 278 | 101 |
| Write-Offs | 4,605,371 | 3,644,494 | 615,689 | 18,682 | 72,898 | 71,225 | 135,231 | 11,606 | 17,240 |
| Avg-Cust | 403,762 | 331,382 | 26,663 | 3,955 | 16,659 | 13,500 | 4,524 | 1,675 | 429 |
| 14,667,400 | $\underline{\text { 14,749,904 }}$ | 11,863,277 | 1,536,197 | 96,827 | 396,451 | 343,390 | 316,386 | 47,594 | 37,956 |
| Acct901903 | 100.00\% | 80.88\% | 10.47\% | 0.66\% | 2.70\% | 2.34\% | 2.16\% | 0.32\% | 0.26\% |
| Avg-Cust | 14.0\% | 11.47\% | 0.92\% | 0.14\% | 0.58\% | 0.47\% | 0.16\% | 0.06\% | 0.01\% |
| Avg-Cust | 12.8\% | 10.54\% | 0.85\% | 0.13\% | 0.53\% | 0.43\% | 0.14\% | 0.05\% | 0.01\% |
| Avg-Cust | 35.4\% | 29.04\% | 2.34\% | 0.35\% | 1.46\% | 1.18\% | 0.40\% | 0.15\% | 0.04\% |
| Cust-Res | 32.2\% | 29.50\% | 2.37\% | 0.35\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Cust-NonRes | 1.4\% | 0.00\% | 0.00\% | 0.00\% | 0.55\% | 0.45\% | 0.15\% | 0.06\% | 0.01\% |
| Total_Rev | 4.2\% | 2.38\% | 0.25\% | 0.03\% | 0.08\% | 0.28\% | 0.54\% | 0.03\% | 0.04\% |
| 99.11\% | $\underline{100.00 \%}$ | 82.92\% | 6.73\% | 0.99\% | 3.20\% | 2.81\% | 1.38\% | 0.34\% | 0.12\% |

CustSvcs
Customer Records and Accounts Allocators
Exh 6-9I

| Line | Description |
| :---: | :--- |
| 1 | Account 901- Supervision |
| 2 | Credit \& Collection Supervision |
| 3 | Billing |
| 4 | Customer Services- Inbound Calls |
| 5 | Customer Services- Inbound Calls |
| 6 | Credit \& Collection (\& Cash Mgt) |
| 7 | Field Services- Customer Care |
| 8 |  |
| 9 |  |
| 10 |  |
| 11 | CalLOCATOR |
| 12 | Trouble (Outages, Voltage) |
| 13 | Movers |
| 14 | General Business |
| 15 | Billing / Credit- Residential |
| 16 | Billing / Credit- Commercial |
| 17 | Verify Payment |
| 18 |  |

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022 Class Allocated Cost of Service Study (ACOS) Customer Records and Accounts Allocators

| Allocator | Activity \% | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Write-Offs | 3,701,613 | 8,579 | 226 | 0 | 0 |  |  |  |
| Avg-Cust | 5,941,641 | 7,240 | 866 | 197 | 88 |  |  |  |
| Calls_In | 17,284 | 79 | 10 | 17 | 0 |  |  |  |
| Calls_In | 80,233 | 367 | 47 | 77 | 2 |  |  |  |
| Write-Offs | 4,605,371 | 10,674 | 281 | 0 | 0 |  |  |  |
| Avg-Cust | 403,762 | 492 | 59 | 13 | 6 |  |  |  |
| 14,667,400 | 14,749,904 | 27,432 | 1,488 | 304 | 97 | 0 | 0 | 0 |
| Acct901903 | 100.00\% | 0.19\% | 0.01\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |
| Avg-Cust | 14.0\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |  |  |  |
| Avg-Cust | 12.8\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |  |  |  |
| Avg-Cust | 35.4\% | 0.04\% | 0.01\% | 0.00\% | 0.00\% |  |  |  |
| Cust-Res | 32.2\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |  |  |  |
| Cust-NonRes | 1.4\% | 0.02\% | 0.00\% | 0.00\% | 0.00\% |  |  |  |
| Total_Rev | 4.2\% | 0.36\% | 0.05\% | 0.09\% | 0.00\% |  |  |  |
| 99.11\% | $\underline{\text { 100.00\% }}$ | 0.45\% | 0.06\% | 0.10\% | 0.00\% | 0.00\% | 0.00\% | 0.00\% |

FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 2022
Class Allocated Cost of Service Study (ACOS)
Write-Off Allocator

| Line | Rate Class | Revenue <br> FPFTY | Write-Offs, Net |  |  |  |  |  | Write-Offs, Net |  |  |  |  |  | Allocator ValuesWeighted Average |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | 2015 | 2016 | 2017 | 2018 | 2019 | 2020 | 2015 | 2016 | 2017 | 2018 | 2019 | 2020 |  |
| 1 | RS | 477,889,855 | 8,699,649 | 6,553,266 | 10,571,981 | 10,300,438 | 6,423,722 | 2,257,964 | 74.5\% | 79.5\% | 81.9\% | 81.7\% | 79.5\% | 72.7\% | 79.1\% |
| 2 | RH | 49,647,042 | 1,478,423 | 1,082,693 | 1,690,666 | 1,671,260 | 1,164,165 | 482,341 | 12.7\% | 13.1\% | 13.1\% | 13.3\% | 14.4\% | 15.5\% | 13.4\% |
| 3 | RA | 6,490,451 | 35,215 | 24,497 | 49,893 | 55,227 | 36,229 | 28,620 | 0.3\% | 0.3\% | 0.4\% | 0.4\% | 0.4\% | 0.9\% | 0.4\% |
| 4 | GS | 16,580,848 | 249,506 | 134,751 | 187,278 | 160,024 | 93,718 | 70,968 | 2.1\% | 1.6\% | 1.5\% | 1.3\% | 1.2\% | 2.3\% | 1.6\% |
| 5 | GM<25 | 56,775,121 | 338,863 | 148,847 | 101,804 | 119,108 | 90,171 | 76,878 | 2.9\% | 1.8\% | 0.8\% | 0.9\% | 1.1\% | 2.5\% | 1.5\% |
| 6 | GM>25 | 107,795,656 | 643,379 | 282,606 | 193,290 | 226,144 | 171,203 | 145,963 | 5.5\% | 3.4\% | 1.5\% | 1.8\% | 2.1\% | 4.7\% | 2.9\% |
| 7 | GMH $<25$ | 5,959,690 | 63,142 | $(1,221)$ | 21,053 | 13,317 | 38,836 | 7,558 | 0.5\% | 0.0\% | 0.2\% | 0.1\% | 0.5\% | 0.2\% | 0.3\% |
| 8 | GMH>25 | 8,853,187 | 93,798 | $(1,813)$ | 31,274 | 19,783 | 57,691 | 11,227 | 0.8\% | 0.0\% | 0.2\% | 0.2\% | 0.7\% | 0.4\% | 0.4\% |
| 9 | GL | 72,758,002 | 38,921 | 4,670 | 22,008 | 34,822 | 4,373 | 26,438 | 0.3\% | 0.1\% | 0.2\% | 0.3\% | 0.1\% | 0.9\% | 0.2\% |
| 10 | GLH | 9,480,359 |  |  |  | 3,454 | - | - | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% |
| 11 | L | 18,666,789 |  |  |  |  |  |  | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% |
| 12 | HVPS | 323,733 |  |  |  |  |  |  | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% |
| 13 | SE | 1,491,576 |  |  |  |  |  |  | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% |
| 14 | SL | 10,303,067 | 42,393 | 13,505 | 133 | 268 | 1 | 43 | 0.4\% | 0.2\% | 0.0\% | 0.0\% | 0.0\% | 0.0\% | 0.1\% |
| 15 | UMS | 1,320,754 | 3 | 108 | 33,890 | 40 | - | - | 0.0\% | 0.0\% | 0.3\% | 0.0\% | 0.0\% | 0.0\% | 0.1\% |
| 16 |  | 844,336,129 | 11,683,292 | 8,241,909 | 12,903,270 | 12,603,885 | 8,080,109 | 3,108,001 | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% | 100.0\% |

CustDep
Customer Deposits
Exh 6-9K

Duquesne Light Company
FULLY PROJECTED FUTURE TEST YEAR ENDING DECEMBER 31, 202 Class Allocated Cost of Service Study (ACOS)

Customer Deposits
As of 12/31/2020

|  | Rate Class | Count | Deposits |
| :--- | ---: | ---: | ---: |
| RS | 31,698 | $4,590,348$ |  |
| RH | 3,351 | 574,358 |  |
| RA | 247 | 39,865 |  |
| GS | 1,764 | 455,002 |  |
| GM $<25$ |  | 1,375 | 759,771 |
| GM $>25$ | 277 | 835,441 |  |
| GMH $<25$ | 173 | 70,427 |  |
| GMH $>25$ | 27 | 75,844 |  |
| GL | 18 | 315,857 |  |
| GLH |  |  |  |
| L |  |  |  |
| HVPS |  | 1 |  |
| SE | 1 | 250 |  |
| SL |  |  |  |
| UMS |  |  |  |
|  |  |  |  |
|  |  |  |  |

RevAlloc
Revenue Allocation
Tot
Exh 6-10

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Revenue Allocation

| Line | Account | Total | RS | RH | RA | GS | GM<25 | $\mathbf{G M}>25$ | GMH<25 | GMH $>25$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Results at Present rates |  |  |  |  |  |  |  |  |  |
| 2 | Revenue | 568,382 | 302,360 | 29,361 | 3,346 | 11,964 | 33,959 | 71,588 | 3,692 | 6,083 |
| 3 | Rate of Return | 5.36\% | 5.40\% | 2.53\% | 3.34\% | 5.73\% | 6.90\% | 4.68\% | 5.52\% | 3.19\% |
| 4 | Relative rate of return | 1.00 x | 1.01 x | 0.47 x | 0.62 x | 1.07 x | 1.29 x | 0.87 x | 1.03 x | 0.60 x |
| 5 | Rate base | 2,276,464 | 1,037,952 | 111,433 | 14,157 | 41,591 | 132,929 | 356,346 | 15,391 | 33,545 |
| 6 |  |  |  |  |  |  |  |  |  |  |
| 7 | Revenue requirement, at full cost of service |  |  |  |  |  |  |  |  |  |
| 8 | Increase (decrease) Revenue | 85,760 | 39,021 | 8,187 | 882 | 1,372 | 2,414 | 16,199 | 543 | 2,141 |
| 9 | Distribution revenue | 550,379 | 292,161 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| 10 | \% Increase (decrease) Dx | 15.58\% | 13.36\% | 29.20\% | 27.31\% | 11.76\% | 7.28\% | 23.32\% | 15.07\% | 36.35\% |
| 11 |  |  |  |  |  |  |  |  |  |  |
| 12 | Place Within Band |  | In-Hi | Under | Under | In-Hi | In-Hi | In-Low | In-Hi | Under |
| 13 | Initial Increase | 15.09\% | 15.03\% | 21.50\% | 21.50\% | 15.03\% | 15.03\% | 16.50\% | 15.03\% | 21.50\% |
| 14 | Initial relative increase |  | 0.96 x | 1.38 x | 1.38 x | 0.96 x | 0.96 x | 1.06 x | 0.96 x | 1.38 x |
| 15 |  |  |  |  |  |  |  |  |  |  |
| 16 | Results at Proposed revenue allocation |  |  |  |  |  |  |  |  |  |
| 17 | Step 1- Tolerance band | 85,762 | 43,912 | 6,028 | 694 | 1,755 | 4,984 | 11,463 | 541 | 1,266 |
| 18 | Step 1- Over (short) | 2 |  |  |  |  |  |  |  |  |
| 19 | Step 2- Judgmental | $(4,097)$ | $(4,097)$ |  |  | (180) |  |  |  |  |
| 20 | Step 3-Re-allocate | 4,095 | 2,097 | 288 | 33 | 84 | 238 | 547 | 26 | 60 |
| 21 |  |  |  |  |  |  |  |  |  |  |
| 22 | Present rate revenue- Dx | 550,379 | 292,161 | 28,036 | 3,230 | 11,675 | 33,160 | 69,472 | 3,602 | 5,890 |
| 23 | Other revenue | 18,003 | 10,200 | 1,325 | 116 | 290 | 799 | 2,116 | 91 | 193 |
| 24 | Increase (decrease) | 85,760 | 41,912 | 6,316 | 728 | 1,658 | 5,222 | 12,010 | 567 | 1,327 |
| 25 |  | 654,142 | 344,272 | 35,677 | 4,073 | 13,623 | 39,181 | 83,598 | 4,260 | 7,410 |
| 26 |  |  |  |  |  |  |  |  |  |  |
| 27 | Expenses | 396,013 | 221,128 | 24,587 | 2,613 | 8,537 | 21,406 | 48,246 | 2,501 | 4,504 |
| 28 | GRT | 37,918 | 19,956 | 2,068 | 236 | 790 | 2,271 | 4,846 | 247 | 430 |
| 29 | Income tax | 41,736 | 19,557 | 1,710 | 232 | 814 | 2,938 | 5,782 | 287 | 469 |
| 30 | Net income | 178,475 | 83,631 | 7,312 | 992 | 3,482 | 12,565 | 24,725 | 1,225 | 2,007 |
| 31 | Check | 178,475 | 1.009 x | 0.473 x | 0.623 x | 1.069 x | 1.289 x | 0.874 x | 1.030 x | 0.595 x |
| 32 | Return at proposed revenue | 7.84\% | 8.06\% | 6.56\% | 7.01\% | 8.37\% | 9.45\% | 6.94\% | 7.96\% | 5.98\% |
| 33 |  |  |  |  |  |  |  |  |  |  |
| 34 | Relative return | 1.00 x | 1.0277 x | 0.84 x | 0.89 x | 1.07 x | 1.21 x | 0.88 x | 1.016 x | 0.76 x |
| 35 | Closer to unity? |  | FALSE | TRUE | TRUE | TRUE | TRUE | TRUE | TRUE | TRUE |
| 36 | Progress |  | (221\%) | 69\% | 72\% | 2\% | 29\% | 9\% | 48\% | 41\% |
| 37 | Proposed Increase (decrease) | 15.58\% | 14.35\% | 22.53\% | 22.53\% | 14.21\% | 15.75\% | 17.29\% | 15.75\% | 22.53\% |
| 38 | Relative Increase (decrease) | 1.000 x | 0.921 x | 1.446 x | 1.446 x | 0.912 x | 1.011 x | 1.109 x | 1.011 x | 1.446 x |
| 39 |  |  |  |  |  |  |  |  |  |  |
| 40 | Proposed Distribution | 636,139 | 334,072 | 34,352 | 3,957 | 13,333 | 38,382 | 81,482 | 4,169 | 7,216 |

RevAlloc
Revenue Allocation
Tot
Exh 6-10

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Revenue Allocation

| Line | Account | Total | GL | GLH | L | HVPS | SE | SL | UMS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Results at Present rates |  |  |  |  |  |  |  |  |
| 2 | Revenue | 568,382 | 66,275 | 7,402 | 19,306 | 325 | 1,530 | 10,037 | 1,153 |
| 3 | Rate of Return | 5.36\% | 6.16\% | 2.65\% | 5.23\% | 739\% | 11.50\% | 15.00\% | 2.37\% |
| 4 | Relative rate of return | 1.00 x | 1.15 x | 0.50 x | 0.98 x | 137.93 x | 2.15 x | 2.80 x | 0.44 x |
| 5 | Rate base | 2,276,464 | 341,788 | 51,978 | 104,990 | 34 | 5,855 | 22,850 | 5,624 |
| 6 |  |  |  |  |  |  |  |  |  |
| 7 | Revenue requirement, at full cost of service |  |  |  |  |  |  |  |  |
| 8 | Increase (decrease) Revenue | 85,760 | 9,290 | 3,647 | 4,050 | (307) | (225) | $(1,871)$ | 416 |
| 9 | Distribution revenue | 550,379 | 64,408 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 10 | \% Increase (decrease) Dx | 15.58\% | 14.42\% | 50.71\% | 21.70\% | (94.91\%) | (15.10\%) | (18.79\%) | 37.32\% |
| 11 |  |  |  |  |  |  |  |  |  |
| 12 | Place Within Band |  | In-Hi | Under | In-Low | Hi | Over | Over | Under |
| 13 | Initial Increase | 15.09\% | 15.03\% | 21.50\% | 16.50\% | - | 5.00\% | 5.00\% | 21.50\% |
| 14 | Initial relative increase |  | 0.96 x | 1.38 x | 1.06 x | 0.00 x | 0.32 x | 0.32 x | 1.38 x |
| 15 |  |  |  |  |  |  |  |  |  |
| 16 | Results at Proposed revenue allocation |  |  |  |  |  |  |  |  |
| 17 | Step 1- Tolerance band | 85,762 | 9,680 | 1,546 | 3,080 | 0 | 75 | 498 | 240 |
| 18 | Step 1- Over (short) | 2 |  |  |  |  |  |  |  |
| 19 | Step 2- Judgmental | $(4,097)$ |  |  | 180 |  |  |  |  |
| 20 | Step 3-Re-allocate | 4,095 | 462 | 74 | 147 | 0 | 4 | 24 | 11 |
| 21 |  |  |  |  |  |  |  |  |  |
| 22 | Present rate revenue- Dx | 550,379 | 64,408 | 7,192 | 18,667 | 324 | 1,492 | 9,959 | 1,115 |
| 23 | Other revenue | 18,003 | 1,867 | 210 | 640 | 1 | 38 | 77 | 39 |
| 24 | Increase (decrease) | 85,760 | 10,143 | 1,620 | 3,407 | 0 | 78 | 522 | 251 |
| 25 |  | 654,142 | 76,418 | 9,022 | 22,713 | 325 | 1,608 | 10,558 | 1,404 |
| 26 |  |  |  |  |  |  |  |  |  |
| 27 | Expenses | 396,013 | 38,153 | 5,385 | 11,858 | 14 | 663 | 5,484 | 934 |
| 28 | GRT | 37,918 | 4,430 | 523 | 1,317 | 19 | 93 | 612 | 81 |
| 29 | Income tax | 41,736 | 6,413 | 590 | 1,808 | 55 | 161 | 846 | 74 |
| 30 | Net income | 178,475 | 27,422 | 2,524 | 7,731 | 237 | 690 | 3,617 | 315 |
| 31 |  | 178,475 | 1.150 x | 0.495 x | 0.977 x | 137.926 x | 2.147 x | 2.800 x | 0.442 x |
| 32 | Return at proposed revenue | 7.84\% | 8.02\% | 4.86\% | 7.36\% | 693\% | 11.79\% | 15.83\% | 5.60\% |
| 33 |  | 1.00 x |  |  |  |  |  |  |  |
| 34 | Relative return |  | 1.02 x | 0.62 x | 0.9393 x | 88.41 x | 1.50 x | 2.02 x | 0.71 x |
| 35 | Closer to unity? |  | TRUE | TRUE | FALSE | TRUE | TRUE | TRUE | TRUE |
| 36 | Progress |  | 84\% | 25\% | (161\%) | 36\% | 56\% | 43\% | 49\% |
| 37 | Proposed Increase (decrease) | 15.58\% | 15.75\% | 22.53\% | 18.25\% | - | 5.24\% | 5.24\% | 22.53\% |
| 38 | Relative Increase (decrease) | 1.000 x | 1.011 x | 1.446 x | 1.171 x | 0.000 x | 0.336 x | 0.336 x | 1.446 x |
| 39 40 | Proposed Distribution | 636,139 | 74,550 | 8,812 | 22,074 | 324 | 1,570 | 10,481 | 1,366 |

SL
SL- Distribution Component
Cust
Exh 6-11

Duquesne Light Company
JSS / Class ACOS Study
Fully Projected Future Test Year
Distribution to
Support SL, No
SL O\&M

|  | Account Description | Account | Total | SL- Distribution Component | Per Fixture- Month |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Plant in service |  | 4,088,758 | 15,700 | \$262.95 | \$42.86 | \$220.09 |
| 2 | Accum. depreciation |  | $(1,425,949)$ | $(5,684)$ | (\$95.19) | (\$19.07) | (\$76.12) |
| 3 | Net plant |  | 2,662,809 | 10,016 | \$167.76 | \$23.79 | \$143.97 |
| 4 | Other rate base |  | $(386,345)$ | $(1,462)$ | (\$24.48) | (\$0.23) | (\$24.24) |
| 5 | Rate base |  | 2,276,464 | 8,555 | \$143.28 | \$23.55 | \$119.73 |
| 6 |  |  |  |  |  |  |  |
| 7 | Return on rate base |  | 178,475 | 671 | \$0.94 | \$0.13 | \$0.80 |
| 8 | Income tax gross-up |  | 41,736 | 157 | \$0.22 | \$0.03 | \$0.19 |
| 9 | Return component |  | 220,210 | 828 | \$1.15 | \$0.16 | \$0.99 |
| 10 |  |  |  |  |  |  |  |
| 11 | Operating costs |  | 214,704 | 2,774 | \$3.87 | \$3.15 | \$0.72 |
| 12 | Depreciation expense |  | 181,309 | 688 | \$0.96 | \$0.12 | \$0.84 |
| 13 | GRT |  | 37,918 | 262 | \$0.37 | \$0.21 | \$0.16 |
| 14 | Revenue Requirement |  | 654,142 | 4,552 | \$6.35 | \$3.64 | \$2.71 |
| 15 | Check |  |  | 4,552 |  |  |  |
| 16 | Fixtures |  |  | 59,708 |  |  |  |
| 17 | Per Fixture- Annual |  |  | \$76.24 |  |  |  |
| 18 | Per Fixture- Monthly |  |  | \$6.35 |  |  |  |

# Duquesne Light Company 

Docket No. R-2021-3024750

## DLC Exhibit 7

Depreciation Studies

## BOOK 11

# Duquesne Light Company <br> Distribution Rate Case <br> Docket No. R-2021-3024750 

## Filing Index

## Exhibit 1 - Summary of Filing

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Part I - Schedule A and General Information
Part II - Primary Statements of Rate Base \& Operating Income
Book 2
Part III - Rate of Return
Book 3
Part IV - Rate Structure \& Cost Allocation
Book 4
Part V - Plant \& Depreciation Supporting Data
Part VI - Unadjusted Comparative Balance Sheet \& Operating Income Statements

## Exhibits 2 thru 4 - Summary of Measures of Value \& Rate of Return

Book 5
Exhibit 2 - Fully Projected Future Test Year (January 1, 2022 through December 31, 2022)

## Book 6

Exhibit 3 - Future Test Year (January 1, 2021 through December 31, 2021) Book 7

Exhibit 4 - Historic Test Year (January 1, 2020 through December 31, 2020)

## Exhibit 5 - Direct Testimony

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Statement 1 - C. James Davis
Statement 2 - Jaime Bachota
Statement 3 - Todd A. Mobley
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Statement 9 - Jennifer Neiswonger
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Statement 10 - Robert L. O'Brien
Statement 11 - John J. Spanos
Statement 12 - Matthew L. Simpson
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Statement 14-James H. Milligan
Statement 15 - Howard S. Gorman
Statement 16 - David B. Ogden
Statement 17 - Margot Everett

Book 10

## Exhibit 6 - Jurisdictional Separation and Allocated Cost of Service Studies

Book 11

## Exhibit 7 - Depreciation Studies

Book 12

## Confidential Testimony and Exhibits



PITTSBURGH, PENNSYLVANIA

## 2020 DEPRECIATION STUDY

CALCULATED ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2020

EXHIBIT JJS-1

Prepared by:

# DUQUESNE LIGHT COMPANY 

Pittsburgh, Pennsylvania

# 2020 DEPRECIATION STUDY <br> CALCULATED ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT <br> AS OF DECEMBER 31, 2020 

EXHIBIT JJS-1

# Gannett Fleming 

Excellence Delivered As Promised

April 12, 2021

Duquesne Light Company<br>$4117^{\text {th }}$ Avenue<br>Pittsburgh, PA 15219<br>Attention Jaime A. Bachota<br>Assistant Controller<br>Ladies and Gentlemen:

Pursuant to your request, we have determined the annual depreciation accruals applicable to the electric plant of Duquesne Light Company. The results of our study as of December 31, 2020, are presented in the attached detailed report.

The results of our study as of December 31, 2021, as well as a discussion of the methods and procedures used in the calculations and the support for the service life estimates, are included in our report titled "2021 Depreciation Study - Calculated Annual Depreciation Accruals Related to Electric Plant as of December 31, 2021." The same methods, procedures and estimates were used in both studies.

The results of our study as of December 31, 2020, are summarized on pages I-3 through l-5 of the attached report.

Respectfully submitted,
GANNETT FLEMING VALUATION AND RATE CONSULTANTS, LLC


JOHN J. SPANOS
President

JJS:mle
067908

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## PART I. RESULTS OF STUDY

## PART I. RESULTS OF STUDY

## DESCRIPTION OF SUMMARY TABULATIONS

The tables on pages I-3 through I-5 summarize the results of the depreciation studies for electric plant as of December 31, 2020. Table 1 sets forth, by depreciable group, the estimated survivor curves, original cost, book depreciation reserve, and calculated annual accrual as of December 31, 2020.

Table 2 presents the amortization of experienced net salvage based on the fiveyear period, 2016 through 2020.

## DESCRIPTION OF DETAILED TABULATIONS

Supporting statistical data for the estimates of survivor curves are presented in Exhibit JJS 2. Supporting data for the original cost depreciation calculations in account sequence are presented in this report beginning on page II-3. The tables of the calculated original cost depreciation indicate the estimated survivor curves used in the calculations and set forth, for each installation year, the original cost, calculated accrued depreciation, allocated book reserve, future book accruals, remaining life, and calculated remaining life accrual. The amount of regular retirements, gross salvage and cost of removal are set forth by account for the years 2016 through 2020, beginning on pages III-2 through III-4.

## DUQUESNE LIGHT COMPANY

TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, ORIGINAL COST, BOOK DEPRECIATION RESERVE AND CALCULATED
ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2020


| SURVIVOR <br> CURVE$(2)$ |  | ORIGINAL COST <br> AS OF <br> DECEMBER 31, 2020 <br> $(3)$ | BOOK <br> DEPRECIATION <br> RESERVE <br> $(4)$ | $\begin{gathered} \begin{array}{c} \text { FUTURE } \\ \text { ACCRUALS } \end{array} \\ \hline(5) \end{gathered}$ | CALCULATED ANNUAL ACCRUAL |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | AMOUNT | RATE |
|  |  |  |  |  | (6) | (7)=(6)/(3) |
| 65-R3 | * | 25,718,276.88 | 8,374,585 | 17,343,693 | 765,786 | 2.98 |
| 45-R3 |  | 7,390,637.92 | 1,789,075 | 5,601,563 | 178,364 | 2.41 |
|  |  | 33,108,914.80 | 10,163,660 | 22,945,256 | 944,150 | 2.85 |
| 38-S0 |  | 432,945,260.42 | 141,953,715 | 290,991,545 | 13,880,536 | 3.21 |
| 80-R3 |  | 78,247,471.86 | 34,496,411 | 43,751,061 | 918,720 | 1.17 |
| 55-R3 |  | 59,118,433.72 | 14,950,006 | 44,168,428 | 1,136,124 | 1.92 |
| 65-R3 |  | 139,592,330.45 | 38,403,704 | 101,188,627 | 2,162,517 | 1.55 |
| 60-S3 |  | 80,848,762.42 | 32,074,761 | 48,774,002 | 1,417,497 | 1.75 |
| 60-R3 |  | 147,799,020.67 | 31,721,229 | 116,077,792 | 2,704,095 | 1.83 |
| 60-R4 |  | 10,185,993.84 | 1,355,911 | 8,830,083 | 180,127 | 1.77 |
|  |  | 981,846,188.18 | 305,119,396 | 676,726,794 | 23,343,766 | 2.38 |
| 70-R3 | * | 39,777,434.29 | 26,761,791 | 13,015,644 | 861,893 | 2.17 |
| 45-R3 |  | 30,517,006.00 | 14,595,529 | 15,921,477 | 629,577 | 2.06 |
|  |  | 70,294,440.29 | 41,357,320 | 28,937,121 | 1,491,470 | 2.12 |
| 55-R1 |  | 463,534,504.22 | 157,504,924 | 306,029,581 | 9,797,162 | 2.11 |
| 45-R0.5 |  | 36,852,933.48 | 16,828,328 | 20,024,605 | 873,036 | 2.37 |
| 45-R0.5 |  | 4,413,012.19 | 1,230,941 | 3,182,071 | 117,274 | 2.66 |
|  |  | 504,800,449.89 | 175,564,193 | 329,236,257 | 10,787,472 | 2.14 |
| 58-R1 |  | 596,619,726.70 | 175,713,485 | 420,906,242 | 13,216,858 | 2.22 |
| 50-R0.5 |  | 576,572,530.74 | 167,483,743 | 409,088,788 | 15,654,534 | 2.72 |
| 75-R4 |  | 146,553,442.72 | 52,161,554 | 94,391,888 | 2,025,845 | 1.38 |
| 45-R1.5 |  | 437,016,513.61 | 118,211,054 | 318,805,460 | 12,215,533 | 2.80 |
| 39-S0 |  | 260,554,293.53 | 78,933,437 | 181,620,856 | 8,685,400 | 3.33 |
| 45-R0.5 |  | 77,356,155.81 | 20,218,181 | 57,137,975 | 2,399,964 | 3.10 |
| 30-L0 |  | 55,909,442.92 | 15,589,860 | 40,319,583 | 2,650,171 | 4.74 |
| 40-R1.5 |  | 38,289,395.90 | 10,555,820 | 27,733,576 | 1,229,257 | 3.21 |
|  |  | 432,109,288.16 | 125,297,298 | 306,811,990 | 14,964,792 | 3.46 |
| 65-R1.5 |  | 102,586,465.67 | 39,908,186 | 62,678,280 | 1,716,372 | 1.67 |
| 18-S0 |  | 142,503,898.82 | 20,517,531 | 121,986,368 | 11,521,346 | 8.08 |
| 10-S4 |  | 19,872.70 | 14,905 | 4,968 | 1,703 | 8.57 |
| 30-L0 |  | 43,252,189.92 | 24,870,208 | 18,381,982 | 1,246,073 | 2.88 |
|  |  | 3,052,328,819.22 | 941,099,477 | 2,111,229,344 | 84,841,998 | 2.78 |

[^90]transmission plant
STRUCTURES AND IMPROVEMENTS
STRUCTURES AND IMPROVEMENTS
MAJOR STRUCTURES
OTHER SMALL STRUCTURES
MAJOR STRUCTURES
OTHER SMALL STRUCTURES
TOTAL ACCOUNT 352
STATION EQUIPMENT
TOWERS AND FIXTURES
POLES AND FIXTURES
POWERS AND FIXTURES
OVERHEAD CONDUCTORS AND DEVICES
UNDERGROUND CONDUIT
UNDERGROUND CONDUCTORS AND DEVICES UNDERGROUND CONDUCTORS AND DEVICES
ROADS AND TRAILS

## TOTAL TRANSMISSION PLANT


dUQUESNE LIGHT COMPANY
TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, ORIGINAL COST, BOOK DEPRECIATION RESERVE AND CALCULATED
ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2020


$$
\begin{array}{r}
197,011,331 \\
\\
\hline 10,247,099 \\
\hline \mathbf{2 0 7 , 2 5 8 , 4 3 0} \\
\hline \mathbf{1 , 6 0 3 , 1 1 9 , 1 3 6} \\
\hline \hline
\end{array}
$$



> GENERAL PLANT
STRUCTURES AND IMPROVEMENTS
MAJOR STRUCTURES
MAJOR STRUCTURES
OTHER SMALL STRUCTURES
OFFICE FURNITURE AND EQUIPMENT
OFFICE FURNITURE
OFFICE FURNITURE
E.D.P EQUIPMENT
TOTAL ACCOUNT 391
TRANSPORTATION EQUIPMENT
STORES EQUIPMENT
STORES EQUIPMENT
TOOLS, SHOP AND GARAGE EQUIPMENT
LABORATORY EQUIPMENT COMMUNICATION EQUIPMENT
MISCELLANEOUS EQUIPMENT total general plant TOTAL DEPRECIABLE PLANT INTANGIBLE AND NONDEPRECIABLE PLANT ORGANIZATION

NOTE: TRANSPORTATION WAS SWITCHED FROM GROUP TO INDIVIDUAL WITH GAIN LOSS * LIFE SPAN PROCEDURE WAS USED. CURVE SHOWN IS INTERIM SUR
** ANNUAL ACCRUAL IS CHARGED ON A VEHICLE BY VEHICLE BASIS.
广্ভ্ল -

## DUQUESNE LIGHT COMPANY

table 2. CALCuLATION OF THE NET SALVAGE ACCRUAL FOR THE YEAR 2021

|  |  |  |  |  |  | $\xrightarrow{\text { ¢ }}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{aligned} & \text { O} \\ & \text { © } \\ & 0.0 \end{aligned}$ | $\begin{aligned} & \stackrel{\circ}{\circ} \\ & \stackrel{\circ}{\circ} \\ & \stackrel{1}{2} \end{aligned}$ |  |  |  | 울 |
|  | -8 |  |  |  | ¢ | ¢ |
|  |  |  |  |  |  | ¢ |
|  |  | $\stackrel{N}{\sim}$ |  |  | - | 鲖 |
|  |  |  |  |  |  | - |


|  |  | - | ¢. |
| :---: | :---: | :---: | :---: |
|  |  |  | N |



## PART II. DETAILED DEPRECIATION CALCULATIONS

## CUMULATIVE DEPRECIATED ORIGINAL COST

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  |  |  |  |  | IATED ORIGIN | L COST |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | ORIGINAL | ACCRUED |  | MOUNT | CUMULATIVE | $\begin{gathered} \text { PCT OF } \\ \text { COL } 4 \end{gathered}$ |
| INST <br> (1) | $\begin{gathered} \text { COST } \\ (2) \end{gathered}$ | DEPRECIATION <br> (3) | (2) | $\begin{gathered} - \\ (4) \end{gathered}$ | AMOUNT (5) | TOTAL (6) |
| 1891 | 2,282 | 2,282 |  |  |  | 0.0 |
| 1893 | 21 | 21 |  |  |  | 0.0 |
| 1896 | 8,448 | 8,448 |  |  |  | 0.0 |
| 1897 | 4,611 | 4,611 |  |  |  | 0.0 |
| 1898 | 2,362 | 2,362 |  |  |  | 0.0 |
| 1899 | 86,042 | 86,042 |  |  |  | 0.0 |
| 1900 | 9,184 | 9,184 |  |  |  | 0.0 |
| 1901 | 16,564 | 16,564 |  |  |  | 0.0 |
| 1902 | 68,022 | 68,021 |  | 1 | 1 | 0.0 |
| 1903 | 26,513 | 26,513 |  |  | 1 | 0.0 |
| 1904 | 31,456 | 31,391 |  | 65 | 66 | 0.0 |
| 1905 | 35,288 | 34,892 |  | 396 | 462 | 0.0 |
| 1906 | 3,559 | 3,549 |  | 10 | 472 | 0.0 |
| 1907 | 26,578 | 26,448 |  | 130 | 602 | 0.0 |
| 1908 | 5,809 | 5,734 |  | 75 | 677 | 0.0 |
| 1909 | 698 | 698 |  |  | 677 | 0.0 |
| 1910 | 26,413 | 25,892 |  | 521 | 1,198 | 0.0 |
| 1911 | 22,295 | 21,771 |  | 524 | 1,722 | 0.0 |
| 1912 | 16,551 | 16,193 |  | 358 | 2,080 | 0.0 |
| 1913 | 263,739 | 258,544 |  | 5,195 | 7,275 | 0.0 |
| 1914 | 98,088 | 96,195 |  | 1,893 | 9,168 | 0.0 |
| 1915 | 103,206 | 101,312 |  | 1,894 | 11,062 | 0.0 |
| 1916 | 523,913 | 522,182 |  | 1,731 | 12,793 | 0.0 |
| 1917 | 135,859 | 133,752 |  | 2,107 | 14,900 | 0.0 |
| 1918 | 148,644 | 148,378 |  | 266 | 15,166 | 0.0 |
| 1919 | 156,868 | 155,124 |  | 1,744 | 16,910 | 0.0 |
| 1920 | 797,413 | 788,375 |  | 9,038 | 25,948 | 0.0 |
| 1921 | 269,372 | 259,887 |  | 9,485 | 35,433 | 0.0 |
| 1922 | 852,979 | 828,449 |  | 24,530 | 59,963 | 0.0 |
| 1923 | 705,962 | 677,733 |  | 28,229 | 88,192 | 0.0 |
| 1924 | 2,191,276 | 2,140,895 |  | 50,381 | 138,573 | 0.0 |
| 1925 | 1,490,726 | 1,439,102 |  | 51,624 | 190,197 | 0.0 |
| 1926 | 1,315,592 | 1,260,290 |  | 55,302 | 245,499 | 0.0 |
| 1927 | 1,807,373 | 1,711,044 |  | 96,329 | 341,828 | 0.0 |
| 1928 | 1,329,933 | 1,267,373 |  | 62,560 | 404,388 | 0.0 |
| 1929 | 1,028,282 | 947,058 |  | 81,224 | 485,612 | 0.0 |
| 1930 | 1,057,968 | 987,499 |  | 70,469 | 556,081 | 0.0 |
| 1931 | 665,331 | 609,494 |  | 55,837 | 611,918 | 0.0 |
| 1932 | 193,605 | 175,800 |  | 17,805 | 629,723 | 0.0 |
| 1933 | 192,184 | 174,053 |  | 18,131 | 647,854 | 0.0 |
| 1934 | 218,894 | 197,621 |  | 21,273 | 669,127 | 0.0 |
| 1935 | 188,967 | 169,797 |  | 19,170 | 688,297 | 0.0 |
| 1936 | 174,983 | 153,101 |  | 21,882 | 710,179 | 0.0 |
| 1937 | 322,211 | 279,906 |  | 42,305 | 752,484 | 0.0 |
| 1938 | 264,089 | 252,612 |  | 11,477 | 763,961 | 0.0 |
| 1939 | 184,080 | 162,342 |  | 21,738 | 785,699 | 0.0 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  |  |  |  | IATED ORIGI | L Cost |
| :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | ORIGINAL | ACCRUED | AMOUNT | CUMULATIVE | $\begin{gathered} \text { PCT OF } \\ \text { COL } 4 \end{gathered}$ |
| INST | COST | DEPRECIATION | (2) - (3) | AMOUNT | TOTAL |
| (1) | (2) | (3) | (4) | (5) | (6) |
| 1940 | 111,612 | 94,439 | 17,173 | 802,872 | 0.0 |
| 1941 | 788,560 | 680,277 | 108,283 | 911,155 | 0.0 |
| 1942 | 716,698 | 622,932 | 93,766 | 1,004,921 | 0.0 |
| 1943 | 216,675 | 188,479 | 28,196 | 1,033,117 | 0.0 |
| 1944 | 79,539 | 66,742 | 12,797 | 1,045,914 | 0.0 |
| 1945 | 339,960 | 298,414 | 41,546 | 1,087,460 | 0.0 |
| 1946 | 110,559 | 88,904 | 21,655 | 1,109,115 | 0.0 |
| 1947 | 228,416 | 183,413 | 45,003 | 1,154,118 | 0.0 |
| 1948 | 1,169,907 | 954,864 | 215,043 | 1,369,161 | 0.0 |
| 1949 | 1,509,883 | 1,202,917 | 306,966 | 1,676,127 | 0.1 |
| 1950 | 2,275,775 | 1,819,046 | 456,729 | 2,132,856 | 0.1 |
| 1951 | 2,067,418 | 1,614,798 | 452,620 | 2,585,476 | 0.1 |
| 1952 | 2,518,782 | 1,927,501 | 591,281 | 3,176,757 | 0.1 |
| 1953 | 3,790,155 | 2,966,048 | 824,107 | 4,000,864 | 0.1 |
| 1954 | 5,834,037 | 4,612,542 | 1,221,495 | 5,222,359 | 0.2 |
| 1955 | 5,492,695 | 4,182,827 | 1,309,868 | 6,532,227 | 0.2 |
| 1956 | 9,460,131 | 7,328,496 | 2,131,635 | 8,663,862 | 0.3 |
| 1957 | 6,419,922 | 4,778,260 | 1,641,662 | 10,305,524 | 0.3 |
| 1958 | 9,364,190 | 7,195,314 | 2,168,876 | 12,474,400 | 0.4 |
| 1959 | 7,650,147 | 5,576,161 | 2,073,986 | 14,548,386 | 0.5 |
| 1960 | 6,112,753 | 4,346,174 | 1,766,579 | 16,314,965 | 0.6 |
| 1961 | 5,379,388 | 3,807,788 | 1,571,600 | 17,886,565 | 0.6 |
| 1962 | 4,972,868 | 3,428,792 | 1,544,076 | 19,430,641 | 0.7 |
| 1963 | 5,060,531 | 3,481,648 | 1,578,883 | 21,009,524 | 0.7 |
| 1964 | 6,045,338 | 4,162,549 | 1,882,789 | 22,892,313 | 0.8 |
| 1965 | 9,058,896 | 6,415,616 | 2,643,280 | 25,535,593 | 0.9 |
| 1966 | 7,252,509 | 4,841,947 | 2,410,562 | 27,946,155 | 0.9 |
| 1967 | 10,611,207 | 7,093,024 | 3,518,183 | 31,464,338 | 1.1 |
| 1968 | 9,659,339 | 6,516,536 | 3,142,803 | 34,607,141 | 1.2 |
| 1969 | 14,120,913 | 9,519,971 | 4,600,942 | 39,208,083 | 1.3 |
| 1970 | 30,085,506 | 19,893,452 | 10,192,054 | 49,400,137 | 1.7 |
| 1971 | 12,849,844 | 7,946,249 | 4,903,595 | 54,303,732 | 1.8 |
| 1972 | 42,202,108 | 27,658,131 | 14,543,977 | 68,847,709 | 2.3 |
| 1973 | 22,230,656 | 13,738,467 | 8,492,189 | 77,339,898 | 2.6 |
| 1974 | 28,671,190 | 17,150,107 | 11,521,083 | 88,860,981 | 3.0 |
| 1975 | 31,439,497 | 18,883,430 | 12,556,067 | 101,417,048 | 3.4 |
| 1976 | 29,110,787 | 17,186,557 | 11,924,230 | 113,341,278 | 3.8 |
| 1977 | 22,171,340 | 12,272,083 | 9,899,257 | 123,240,535 | 4.2 |
| 1978 | 25,898,255 | 14,382,993 | 11,515,262 | 134,755,797 | 4.6 |
| 1979 | 96,642,767 | 58,972,721 | 37,670,046 | 172,425,843 | 5.8 |
| 1980 | 35,132,504 | 19,143,804 | 15,988,700 | 188,414,543 | 6.4 |
| 1981 | 28,659,703 | 15,609,123 | 13,050,580 | 201, 465,123 | 6.8 |
| 1982 | 63,638,390 | 36,147,764 | 27,490,626 | 228,955,749 | 7.7 |
| 1983 | 27,171,873 | 17,226,510 | 9,945,363 | 238,901,112 | 8.1 |
| 1984 | 33,381,687 | 20,995,160 | 12,386,527 | 251,287,639 | 8.5 |
| 1985 | 32,240,129 | 19,671,743 | 12,568,386 | 263,856,025 | 8.9 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  |  |  | DEPRECIATED ORIGINAL COST |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | PCT OF |
| YEAR | ORIGINAL | ACCRUED | AMOUNT | CUMULATIVE | COL 4 |
| INST | COST | DEPRECIATION | $(2)-(3)$ | AMOUNT | TOTAL |
| (1) | (2) | (3) | (4) | (5) | (6) |
| 1986 | 42,772,649 | 25,475,260 | 17,297,389 | 281,153,414 | 9.5 |
| 1987 | 27,499,932 | 16,044,966 | 11,454,966 | 292,608,380 | 9.9 |
| 1988 | 32,261,368 | 18,494,559 | 13,766,809 | 306,375,189 | 10.3 |
| 1989 | 33,762,916 | 18,677,791 | 15,085,125 | 321,460,314 | 10.9 |
| 1990 | 39,713,662 | 21,697,031 | 18,016,631 | 339,476,945 | 11.5 |
| 1991 | 38,966,544 | 20,830,625 | 18,135,919 | 357,612,864 | 12.1 |
| 1992 | 48,148,848 | 25,441,957 | 22,706,891 | 380,319,755 | 12.8 |
| 1993 | 35,047,395 | 17,902,188 | 17,145,207 | 397,464,962 | 13.4 |
| 1994 | 26,974,144 | 13,598,017 | 13,376,127 | 410,841,089 | 13.9 |
| 1995 | 37,806,462 | 18,553,832 | 19,252,630 | 430,093,719 | 14.5 |
| 1996 | 50,767,090 | 25,080,514 | 25,686,576 | 455,780, 295 | 15.4 |
| 1997 | 47,657,520 | 22,349,814 | 25,307,706 | 481,088,001 | 16.3 |
| 1998 | 12,709,493 | 5,845,114 | 6,864,379 | 487,952,380 | 16.5 |
| 1999 | 35,597,646 | 16,148,628 | 19,449,018 | 507,401,398 | 17.1 |
| 2000 | 35,615,698 | 15,500,277 | 20,115,421 | 527,516,819 | 17.8 |
| 2001 | 51,649,173 | 21,938,658 | 29,710,515 | 557,227,334 | 18.8 |
| 2002 | 43,787,767 | 17,449,672 | 26,338,095 | 583,565,429 | 19.7 |
| 2003 | 39,918,925 | 14,747,568 | 25,171,357 | 608,736,786 | 20.6 |
| 2004 | 56,849,456 | 20,673,845 | 36,175,611 | 644,912,397 | 21.8 |
| 2005 | 96,894,084 | 33,788,192 | 63,105,892 | 708,018,289 | 23.9 |
| 2006 | 166,288,181 | 60,863,471 | 105,424,710 | 813,442,999 | 27.5 |
| 2007 | 113,084,867 | 35,098,621 | 77,986,246 | 891,429,245 | 30.1 |
| 2008 | 86,275,103 | 27,099,916 | 59,175,187 | 950,604,432 | 32.1 |
| 2009 | 155,119,816 | 45,455,516 | 109,664,300 | 1,060,268,732 | 35.8 |
| 2010 | 209, 910,065 | 55,400,940 | 154,509,125 | 1,214,777,857 | 41.0 |
| 2011 | 169,553,570 | 42,415,849 | 127,137,721 | 1,341, 915,578 | 45.3 |
| 2012 | 222,066,321 | 50,838,347 | 171,227,974 | 1,513,143,552 | 51.1 |
| 2013 | 171,137, 265 | 34,848,491 | 136,288,774 | 1,649,432,326 | 55.7 |
| 2014 | 146,930,241 | 26,173,530 | 120,756,711 | 1,770,189, 037 | 59.8 |
| 2015 | 155,313, 074 | 27,640,623 | 127,672,451 | 1,897,861,488 | 64.1 |
| 2016 | 229,018,752 | 37,056,172 | 191,962,580 | 2,089,824,068 | 70.6 |
| 2017 | 210,969,430 | 26,815,776 | 184,153,654 | 2, 273, 977, 722 | 76.8 |
| 2018 | 257,336,335 | 22,858,560 | 234,477,775 | 2,508,455,497 | 84.7 |
| 2019 | 226,755,381 | 13,926,057 | 212,829,324 | 2,721,284,821 | 91.9 |
| 2020 | 244,217,849 | 5,200,887 | 239,016,962 | 2,960,301,783 | 100.0 |
| TOTAL | $4,315,396,294$ | 1,355,094,511 | 2,960,301,783 |  |  |
| UNTS |  |  |  |  |  |
| AND 396 | 70,539,918 | 40,766,196 | 29,773,722 |  |  |
| EPRECIABLE | 391,426,019 |  |  |  |  |
| AL | 4,777,362,229 | 1,603,119,136 | 2,990,075,503 |  |  |

TOTAL
$4,777,362,229 \quad 1,603,119,136 \quad 2,990,075,503$

UTILITY PLANT IN SERVICE

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

BEAVER VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2031

| 1958 | $8,664.84$ | 7,474 | 7,680 | 985 | 8.45 | 117 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1976 | $618,449.23$ | 500,517 | 514,289 | 104,160 | 9.79 | 10,639 |
| 1977 | $3,391.44$ | 2,732 | 2,807 | 584 | 9.84 | 59 |
| 1980 | $842,768.52$ | 669,082 | 687,493 | 155,276 | 9.95 | 15,606 |
| 1981 | $23,966.12$ | 18,929 | 19,450 | 4,516 | 9.98 | 453 |
| 1984 | 919.13 | 721 | 741 | 178 | 10.01 | 18 |
| 1992 | $183,176.20$ | 134,689 | 138,395 | 44,781 | 10.26 | 4,365 |
| 1993 | $18,245.19$ | 13,297 | 13,663 | 4,582 | 10.23 | 448 |
| 1994 | $53,193.66$ | 38,342 | 39,397 | 13,797 | 10.26 | 1,345 |
| 1997 | $2,962.57$ | 2,061 | 2,118 | 845 | 10.28 | 82 |
| 1999 | $126,209.56$ | 85,204 | 87,548 | 38,661 | 10.35 | 3,735 |
| 2007 | $61,363.76$ | 34,707 | 35,662 | 25,702 | 10.37 | 2,478 |
| 2009 | $25,475.49$ | 13,390 | 13,758 | 11,717 | 10.38 | 1,129 |
| 2011 | $81,766.96$ | 38,995 | 40,068 | 41,699 | 10.42 | 4,002 |
| 2012 | $37,008.33$ | 16,639 | 17,097 | 19,911 | 10.40 | 1,915 |
| 2018 | $49,844.94$ | 9,630 | 9,895 | 39,950 | 10.44 | 3,827 |
|  |  |  |  |  |  | 50,218 |

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035

| 1970 | $603,940.93$ | 474,106 | 487,152 | 116,789 | 12.43 | 9,396 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1975 | $13,393.38$ | 10,227 | 10,508 | 2,885 | 12.96 | 223 |
| 1981 | $100,494.08$ | 73,821 | 75,852 | 24,642 | 13.43 | 1,835 |
| 1987 | $9,782.46$ | 6,948 | 7,139 | 2,643 | 13.67 | 193 |
| 1994 | $70,918.91$ | 46,608 | 47,890 | 23,028 | 13.82 | 1,666 |
| 1996 | $13,664.54$ | 8,704 | 8,944 | 4,721 | 13.96 | 338 |
| 2005 | $152,200.48$ | 79,510 | 81,698 | 70,503 | 14.17 | 4,976 |
| 2009 | $95,333.01$ | 42,538 | 43,708 | 51,625 | 14.27 | 3,618 |
| 2011 | $16,151.99$ | 6,445 | 6,622 | 9,530 | 14.31 | 666 |
| 2012 | $83,311.37$ | 31,017 | 31,870 | 51,441 | 14.33 | 3,590 |
| 2014 | $23,661.53$ | 7,382 | 7,585 | 16,076 | 14.33 | 1,122 |
| 2016 | $4,465,138.36$ | $1,067,168$ | $1,096,532$ | $3,368,606$ | 14.33 | 235,074 |
| 2017 | $289,752.78$ | 56,792 | 58,355 | 231,398 | 14.36 | 16,114 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035

| 2018 | $1,153.24$ | 171 | 176 | 978 | 14.36 | 68 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | 606.63 | 57 | 59 | 548 | 14.35 | 38 |
| 2020 | $25,969.59$ | 878 | 902 | 25,067 | 14.29 | 1,754 |
|  |  |  |  |  |  | 280,671 |

CRESCENT SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2030

| 1975 | $692,787.29$ | 572,693 | 588,452 | 104,336 | 8.90 | 11,723 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1979 | $15,951.88$ | 12,968 | 13,325 | 2,627 | 9.03 | 291 |
| 1981 | $73,835.77$ | 59,470 | 61,106 | 12,729 | 9.08 | 1,402 |
| 1986 | $32,983.89$ | 26,057 | 26,774 | 6,210 | 9.17 | 677 |
| 1991 | $20,828.44$ | 15,853 | 16,289 | 4,539 | 9.26 | 490 |
| 1994 | $64,957.66$ | 48,030 | 49,352 | 15,606 | 9.34 | 1,671 |
| 1998 | $124,838.24$ | 88,198 | 90,625 | 34,213 | 9.35 | 3,659 |
| 2000 | $19,852.32$ | 13,635 | 14,010 | 5,842 | 9.35 | 625 |
| 2006 | $10,833.62$ | 6,566 | 6,747 | 4,087 | 9.42 | 434 |
| 2009 | $160,842.96$ | 88,415 | 90,848 | 69,995 | 9.42 | 7,430 |
| 2011 | $77,708.40$ | 38,979 | 40,052 | 37,657 | 9.44 | 3,989 |
| 2012 | $19,166.61$ | 9,073 | 9,323 | 9,844 | 9.45 | 1,042 |
| 2017 | $390,615.34$ | 105,544 | 108,448 | 282,167 | 9.45 | 29,859 |
| 2018 | $71,919.22$ | 15,046 | 15,460 | 56,459 | 9.45 | 5,974 |
|  |  |  |  |  |  |  |
|  | $1,777,121.64$ | $1,100,527$ | $1,130,810$ | 646,312 |  | 69,266 |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2049

| 1979 | $722,403.75$ | 452,593 | 465,047 | 257,357 | 22.51 | 11,433 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1996 | $81,414.46$ | 40,088 | 41,191 | 40,223 | 25.25 | 1,593 |
| 2009 | $1,062,512.36$ | 317,691 | 326,433 | 736,080 | 26.96 | 27,303 |
| 2010 | $3,142,395.19$ | 881,128 | 905,373 | $2,237,022$ | 26.95 | 83,006 |
| 2011 | $1,473,978.86$ | 382,350 | 392,871 | $1,081,108$ | 27.13 | 39,849 |


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA $65-\mathrm{R} 3$
PROBABLE RETIREMENT YEAR.. $6-2049$

| 2016 | $532,491.39$ | 75,241 | 77,311 | 455,180 | 27.35 | 16,643 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2018 | $92,748.86$ | 7,745 | 7,958 | 84,791 | 27.44 | 3,090 |
| 2020 | $265,903.07$ | 4,786 | 4,918 | 260,985 | 27.28 | 9,567 |
|  | $7,373,847.94$ | $2,161,622$ | $2,221,102$ | $5,152,746$ |  | 192,484 |

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2066

| 2011 | 673,863.54 | 130,595 | 134,188 | 539,675 | 39.52 | 13,656 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2017 | 94,142.16 | 7,447 | 7,652 | 86,490 | 40.75 | 2,122 |
| 2018 | 82,680.02 | 4,754 | 4,885 | 77,795 | 40.98 | 1,898 |
|  | 850,685.72 | 142,796 | 146,725 | 703,961 |  | 17,676 |
| LOGANS FERRY SUBSTATION INTERIM SURVIVOR CURVE.. IOWA 65-R3 PROBABLE RETIREMENT YEAR.. 6-2065 |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| 2010 | 4,684,748.00 | 998,788 | 1,026,271 | 3,658,477 | 38.76 | 94,388 |
| 2018 | 67,887.59 | 3,971 | 4,080 | 63,807 | 40.24 | 1,586 |
|  | 4,752,635.59 | 1,002,759 | 1,030,351 | 3,722,285 |  | 95,974 |
| TECUMSEH SUBSTATION |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 65-R3 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2071 |  |  |  |  |  |  |
| 2016 | 1,319,737.74 | 123,000 | 126,384 | 1,193,354 | 43.81 | 27,239 |
| 2018 | 249,161.01 | 13,330 | 13,697 | 235,464 | 44.23 | 5,324 |
|  | 1,568,898.75 | 136,330 | 140,081 | 1,428,818 |  | 32,563 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

POTTER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2071

| 2016 | $719,743.11$ | 67,080 | 68,926 | 650,817 | 43.81 | 14,855 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2017 | $482,585.21$ | 35,615 | 36,595 | 445,990 | 43.90 | 10,159 |
| 2018 | $89,879.70$ | 4,809 | 4,941 | 84,938 | 44.23 | 1,920 |
|  | $1,292,208.02$ | 107,504 | 110,462 | $1,181,746$ | 26,934 |  |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1927 | 2,240.19 | 2,240 | 2,240 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1930 | 3,271.66 | 3,272 | 3,272 |  |  |  |
| 1942 | 1,468.63 | 1,469 | 1,469 |  |  |  |
| 1950 | 2,276.02 | 2,209 | 2,270 | 6 | 1.32 | 5 |
| 1953 | 8,212.61 | 7,835 | 8, 051 | 161 | 2.07 | 78 |
| 1955 | 22,885.50 | 21,579 | 22,175 | 710 | 2.57 | 276 |
| 1957 | 255.22 | 238 | 245 | 11 | 3.09 | 4 |
| 1967 | 7,205.83 | 6,277 | 6,450 | 755 | 5.80 | 130 |
| 1968 | 4,920.31 | 4,251 | 4,368 | 552 | 6.12 | 90 |
| 1969 | 106,419.00 | 91,141 | 93,659 | 12,760 | 6.46 | 1,975 |
| 1970 | 49,496.89 | 42,007 | 43,168 | 6,329 | 6.81 | 929 |
| 1972 | 27,318.37 | 22,729 | 23,357 | 3,961 | 7.56 | 524 |
| 1973 | 16,639.27 | 13,692 | 14,070 | 2,569 | 7.97 | 322 |
| 1975 | 40,204.26 | 32,297 | 33,189 | 7,015 | 8.85 | 793 |
| 1976 | 88,115.52 | 69,866 | 71,796 | 16,319 | 9.32 | 1,751 |
| 1979 | 113,460.39 | 86,104 | 88,483 | 24,978 | 10.85 | 2,302 |
| 1980 | 89,558.20 | 66,850 | 68,697 | 20,861 | 11.41 | 1,828 |
| 1981 | 46,369.76 | 34,025 | 34,965 | 11,405 | 11.98 | 952 |
| 1983 | 1,036.35 | 785 | 807 | 230 | 12.00 | 19 |
| 1984 | 55,501.15 | 41,326 | 42,468 | 13,033 | 12.52 | 1,041 |
| 1985 | 682.98 | 499 | 513 | 170 | 13.04 | 13 |
| 1986 | 8,965.88 | 6,403 | 6,580 | 2,386 | 13.81 | 173 |
| 1987 | 1,502.11 | 1,052 | 1,081 | 421 | 14.34 | 29 |
| 1989 | 3,778.93 | 2,536 | 2,606 | 1,173 | 15.45 | 76 |
| 1990 | 32,331.68 | 21,103 | 21,686 | 10,646 | 16.23 | 656 |
| 1991 | 31,077.56 | 19,803 | 20,350 | 10,727 | 16.80 | 639 |
| 1992 | 74,670.62 | 46,393 | 47,675 | 26,996 | 17.37 | 1,554 |
| 1993 | 5,367.29 | 3,232 | 3,321 | 2,046 | 18.16 | 113 |
| 1995 | 62,002.11 | 35,099 | 36,069 | 25,933 | 19.55 | 1,326 |
| 1996 | 32,372.43 | 17,766 | 18,257 | 14,116 | 20.14 | 701 |
| 1997 | 92,841.41 | 49,308 | 50,670 | 42,171 | 20.75 | 2,032 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1998 | $20,969.12$ | 10,711 | 11,007 | 9,962 | 21.55 | 462 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2002 | $6,098.37$ | 2,628 | 2,701 | 3,398 | 24.42 | 139 |
| 2003 | $85,573.34$ | 35,188 | 36,160 | 49,413 | 25.06 | 1,972 |
| 2005 | $54,856.95$ | 20,154 | 20,711 | 34,146 | 26.69 | 1,279 |
| 2006 | $93,022.16$ | 32,241 | 33,132 | 59,890 | 27.34 | 2,191 |
| 2009 | $1,804,367.08$ | 504,140 | 518,068 | $1,286,299$ | 29.65 | 43,383 |
| 2010 | $223,551.09$ | 57,274 | 58,856 | 164,695 | 30.48 | 5,403 |
| 2011 | $53,345.07$ | 12,419 | 12,762 | 40,583 | 31.31 | 1,296 |
| 2012 | $68,898.48$ | 14,407 | 14,805 | 54,093 | 32.15 | 1,683 |
| 2013 | $66,792.96$ | 12,423 | 12,766 | 54,027 | 32.82 | 1,646 |
| 2016 | $1,193,056.67$ | 135,293 | 139,031 | $1,054,026$ | 35.18 | 29,961 |
| 2017 | $137,139.82$ | 12,151 | 12,487 | 124,653 | 36.02 | 3,461 |
| 2018 | $1,697,347.15$ | 108,291 | 111,283 | $1,586,064$ | 36.71 | 43,205 |
| 2019 | $756,152.39$ | 29,187 | 29,993 | 726,159 | 37.41 | 19,411 |
| 2020 | $97,019.14$ | 1,271 | 1,306 | 95,713 | 37.67 | 2,541 |
|  |  |  |  |  |  |  |
|  | $7,390,637.92$ | $1,741,164$ | $1,789,075$ | $5,601,563$ |  | 178,364 |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  | 33,108,914.80 | $9,891,483$ | $10,163,660$ | $22,945,256$ |  | 944,150 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 353 STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 38-S0

| 1920 | 976.49 | 976 | 976 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1921 | 13,335.00 | 13,335 | 13,335 |  |  |  |
| 1922 | 39,003.26 | 39,003 | 39,003 |  |  |  |
| 1924 | 78.04 | 78 | 78 |  |  |  |
| 1925 | 263.12 | 263 | 263 |  |  |  |
| 1926 | 6,386.76 | 6,387 | 6,387 |  |  |  |
| 1927 | 4,864.25 | 4,864 | 4,864 |  |  |  |
| 1928 | 9,443.85 | 9,444 | 9,444 |  |  |  |
| 1929 | 9,396.42 | 9,396 | 9,396 |  |  |  |
| 1930 | 8,636.47 | 8,636 | 8,636 |  |  |  |
| 1932 | 329.14 | 329 | 329 |  |  |  |
| 1933 | 44.16 | 44 | 44 |  |  |  |
| 1936 | 73.16 | 73 | 73 |  |  |  |
| 1938 | 184,736.39 | 184,736 | 184,736 |  |  |  |
| 1939 | 1,638.54 | 1,639 | 1,639 |  |  |  |
| 1941 | 72.20 | 72 | 72 |  |  |  |
| 1942 | 8,464.30 | 8,464 | 8,464 |  |  |  |
| 1943 | 19,243.94 | 19,244 | 19,244 |  |  |  |
| 1944 | 6,927.35 | 6,927 | 6,927 |  |  |  |
| 1945 | 16.54 | 16 | 16 | 1 | 0.20 | 1 |
| 1946 | 521.11 | 513 | 502 | 19 | 0.56 | 19 |
| 1947 | 467.39 | 456 | 446 | 21 | 0.92 | 21 |
| 1948 | 36,115.94 | 34,900 | 34,135 | 1,981 | 1.28 | 1,548 |
| 1949 | 7,170.60 | 6,859 | 6,709 | 462 | 1.65 | 280 |
| 1950 | 194.59 | 184 | 180 | 15 | 2.02 | 7 |
| 1951 | 4,127.31 | 3,868 | 3,783 | 344 | 2.39 | 144 |
| 1952 | 2,048.42 | 1,899 | 1,857 | 191 | 2.77 | 69 |
| 1953 | 102,282.02 | 93,830 | 91,774 | 10,508 | 3.14 | 3,346 |
| 1954 | 16,788.45 | 15,233 | 14,899 | 1,889 | 3.52 | 537 |
| 1955 | 85,045.33 | 76,339 | 74,666 | 10,379 | 3.89 | 2,668 |
| 1956 | 81,857.45 | 72,659 | 71,067 | 10,790 | 4.27 | 2,527 |
| 1957 | 113,329.41 | 99,461 | 97,282 | 16,047 | 4.65 | 3,451 |
| 1958 | 42,053.10 | 36,476 | 35,677 | 6,376 | 5.04 | 1,265 |
| 1959 | 69,685.28 | 59,746 | 58,437 | 11,248 | 5.42 | 2,075 |
| 1960 | 28,640.97 | 24,262 | 23,730 | 4,911 | 5.81 | 845 |
| 1961 | 99,186.50 | 83,003 | 81,184 | 18,002 | 6.20 | 2,904 |
| 1962 | 21,900.24 | 18,102 | 17,705 | 4,195 | 6.59 | 637 |
| 1963 | 24,328.81 | 19,860 | 19,425 | 4,904 | 6.98 | 703 |
| 1964 | 16,184.94 | 13,046 | 12,760 | 3,425 | 7.37 | 465 |
| 1965 | 20,643.69 | 16,423 | 16,063 | 4,581 | 7.77 | 590 |
| 1966 | 165,526.59 | 129,981 | 127,133 | 38,394 | 8.16 | 4,705 |
| 1967 | 1,114,451.95 | 863,411 | 844,493 | 269,959 | 8.56 | 31,537 |

## ACCOUNT 353 STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 38-S0

| 1968 | $89,393.90$ | 68,292 | 66,796 | 22,598 | 8.97 | 2,519 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1969 | $1,730,938.49$ | $1,304,124$ | $1,275,549$ | 455,389 | 9.37 | 48,601 |
| 1970 | $7,249,934.38$ | $5,384,019$ | $5,266,050$ | $1,983,884$ | 9.78 | 202,851 |
| 1971 | $97,764.34$ | 71,548 | 69,980 | 27,784 | 10.19 | 2,727 |
| 1972 | $4,902,014.68$ | $3,534,598$ | $3,457,151$ | $1,444,864$ | 10.60 | 136,308 |
| 1973 | $855,733.60$ | 607,571 | 594,259 | 261,475 | 11.02 | 23,727 |
| 1974 | $996,673.48$ | 696,884 | 681,615 | 315,058 | 11.43 | 27,564 |
| 1975 | $4,289,871.34$ | $2,952,118$ | $2,887,434$ | $1,402,437$ | 11.85 | 118,349 |
| 1976 | $5,476,981.33$ | $3,707,040$ | $3,625,815$ | $1,851,166$ | 12.28 | 150,746 |
| 1977 | $1,185,787.42$ | 789,485 | 772,187 | 413,600 | 12.70 | 32,567 |
| 1978 | $761,293.60$ | 498,244 | 487,327 | 273,967 | 13.13 | 20,866 |
| 1979 | $6,332,784.67$ | $4,071,284$ | $3,982,078$ | $2,350,707$ | 13.57 | 173,228 |
| 1980 | $2,631,198.05$ | $1,661,812$ | $1,625,400$ | $1,005,798$ | 14.00 | 71,843 |
| 1981 | $1,805,340.51$ | $1,119,311$ | $1,094,786$ | 710,555 | 14.44 | 49,207 |
| 1982 | $4,409,361.95$ | $2,681,598$ | $2,622,842$ | $1,786,520$ | 14.89 | 119,981 |
| 1983 | $1,186,078.56$ | 871,768 | 852,667 | 333,412 | 13.52 | 24,661 |
| 1984 | $4,126,231.76$ | $2,982,028$ | $2,916,689$ | $1,209,543$ | 14.01 | 86,334 |
| 1985 | $782,351.00$ | 558,286 | 546,053 | 236,298 | 14.25 | 16,582 |
| 1986 | $2,451,194.92$ | $1,725,151$ | $1,687,351$ | 763,844 | 14.52 | 52,606 |
| 1987 | $1,538,436.90$ | $1,066,752$ | $1,043,378$ | 495,059 | 14.81 | 33,427 |
| 1988 | $956,453.13$ | 652,779 | 638,476 | 317,977 | 15.12 | 21,030 |
| 1989 | $2,064,307.05$ | $1,385,150$ | $1,354,800$ | 709,507 | 15.45 | 45,923 |
| 1990 | $695,022.58$ | 457,881 | 447,848 | 247,175 | 15.80 | 15,644 |
| 1991 | $950,638.57$ | 614,113 | 600,657 | 349,982 | 16.16 | 21,657 |
| 1992 | $2,357,746.45$ | $1,491,746$ | $1,459,060$ | 898,686 | 16.55 | 54,301 |
| 1993 | $1,949,114.10$ | $1,206,112$ | $1,179,685$ | 769,429 | 16.94 | 45,421 |
| 1994 | $165,806.29$ | 100,611 | 98,407 | 67,399 | 17.17 | 3,925 |
| 1995 | $626,126.54$ | 372,044 | 363,892 | 262,235 | 17.42 | 15,054 |
| 1996 | $6,423,139.20$ | $3,713,859$ | $3,632,485$ | $2,790,654$ | 17.87 | 156,164 |
| 1997 | $7,467,098.57$ | $4,211,444$ | $4,119,167$ | $3,347,932$ | 18.17 | 184,256 |
| 1998 | $593,312.41$ | 325,729 | 318,592 | 274,720 | 18.48 | 14,866 |
| 1999 | $2,226,843.63$ | $1,192,252$ | $1,166,129$ | $1,060,715$ | 18.66 | 56,844 |
| 2000 | $1,469,277.13$ | 761,967 | 745,272 | 724,005 | 19.03 | 38,045 |
| 2001 | $1,011,769.02$ | 509,021 | 497,868 | 513,901 | 19.26 | 26,682 |
| 2002 | $1,698,342.24$ | 823,186 | 805,149 | 893,193 | 19.67 | 45,409 |
| 2003 | $1,412,182.49$ | 659,772 | 645,316 | 766,866 | 19.96 | 38,420 |
| 2004 | $835,741.94$ | 375,081 | 366,863 | 468,879 | 20.26 | 23,143 |
| 2005 | $5,861,708.86$ | $2,525,810$ | $2,470,467$ | $3,391,242$ | 20.47 | 165,669 |
| 2006 | $26,282,727.47$ | $10,823,227$ | $10,586,079$ | $15,696,648$ | 20.71 | 757,926 |
| 2007 | $22,405,947.91$ | $8,771,929$ | $8,579,727$ | $13,826,221$ | 20.98 | 659,019 |
| 2008 | $3,288,821.82$ | $1,216,864$ | $1,190,201$ | $2,098,621$ | 21.28 | 98,619 |
| 2009 | $27,289,219.03$ | $9,507,564$ | $9,299,244$ | $17,989,975$ | 21.50 | 836,743 |
|  |  |  |  |  |  |  |

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 38-S0

| 2010 | $41,228,674.76$ | $13,419,934$ | $13,125,890$ | $28,102,785$ | 21.76 | $1,291,488$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2011 | $25,454,015.16$ | $7,666,749$ | $7,498,763$ | $17,955,252$ | 22.04 | 814,667 |
| 2012 | $44,041,748.46$ | $12,164,331$ | $11,897,798$ | $32,143,950$ | 22.27 | $1,443,374$ |
| 2013 | $14,445,418.61$ | $3,608,466$ | $3,529,401$ | $10,916,018$ | 22.53 | 484,510 |
| 2014 | $21,438,127.39$ | $4,780,702$ | $4,675,952$ | $16,762,175$ | 22.65 | 740,052 |
| 2015 | $22,986,092.54$ | $4,450,108$ | $4,352,602$ | $18,633,491$ | 22.91 | 813,334 |
| 2016 | $31,614,172.17$ | $5,165,756$ | $5,052,569$ | $26,561,603$ | 23.05 | $1,152,347$ |
| 2017 | $12,613,709.59$ | $1,654,919$ | $1,618,658$ | $10,995,052$ | 23.17 | 474,538 |
| 2018 | $9,806,726.68$ | 951,252 | 930,409 | $8,876,318$ | 23.27 | 381,449 |
| 2019 | $11,837,263.83$ | 717,338 | 701,621 | $11,135,643$ | 23.25 | 478,952 |
| 2020 | $24,182,120.45$ | 512,661 | 501,428 | $23,680,692$ | 23.08 | $1,026,027$ |
|  | $432,945,260.42$ | $145,126,707$ | $141,953,715$ | $290,991,545$ |  | $13,880,536$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 21.03 .21

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 354 TOWERS AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 80-R3

| 1915 | 44,951.23 | 40,793 | 44,951 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1916 | 455,121.83 | 411,544 | 455,122 |  |  |  |
| 1917 | 31,576.45 | 28,450 | 31,576 |  |  |  |
| 1918 | 44,288.30 | 39,754 | 44,200 | 88 | 8.19 | 11 |
| 1919 | 31,113.97 | 27,824 | 30,936 | 178 | 8.46 | 21 |
| 1920 | 542,386.70 | 483,131 | 537,168 | 5,219 | 8.74 | 597 |
| 1924 | 40,228.25 | 35,255 | 39,198 | 1,030 | 9.89 | 104 |
| 1925 | 3,708.45 | 3,236 | 3,598 | 110 | 10.20 | 11 |
| 1926 | 111,674.35 | 97,003 | 107,853 | 3,821 | 10.51 | 364 |
| 1927 | 90,194.01 | 77,984 | 86,706 | 3,488 | 10.83 | 322 |
| 1930 | 77,944.96 | 66,409 | 73,837 | 4,108 | 11.84 | 347 |
| 1931 | 2,443.61 | 2,071 | 2,303 | 141 | 12.20 | 12 |
| 1933 | 1,580.96 | 1,325 | 1,473 | 108 | 12.95 | 8 |
| 1934 | 1,788.15 | 1,490 | 1,657 | 131 | 13.33 | 10 |
| 1936 | 21,413.31 | 17,626 | 19,597 | 1,816 | 14.15 | 128 |
| 1941 | 10,191.10 | 8,104 | 9,010 | 1,181 | 16.38 | 72 |
| 1942 | 176,846.59 | 139,576 | 155,187 | 21,660 | 16.86 | 1,285 |
| 1943 | 194.50 | 152 | 169 | 26 | 17.35 | 1 |
| 1944 | 9,854.43 | 7,654 | 8,510 | 1,344 | 17.86 | 75 |
| 1945 | 7,463.15 | 5,748 | 6,391 | 1,072 | 18.38 | 58 |
| 1948 | 3,260.30 | 2,445 | 2,718 | 542 | 20.00 | 27 |
| 1949 | 18,769.93 | 13,946 | 15,506 | 3,264 | 20.56 | 159 |
| 1950 | 56,383.99 | 41,485 | 46,125 | 10,259 | 21.14 | 485 |
| 1951 | 252,595.83 | 184,016 | 204,598 | 47,998 | 21.72 | 2,210 |
| 1952 | 56,205.68 | 40,524 | 45,057 | 11,149 | 22.32 | 500 |
| 1953 | 242,093.61 | 172,705 | 192,022 | 50,072 | 22.93 | 2,184 |
| 1954 | 1,557,215.51 | 1,099,005 | 1,221,926 | 335,290 | 23.54 | 14,243 |
| 1956 | 3,394,544.44 | 2,341,828 | 2,603,756 | 790,788 | 24.81 | 31,874 |
| 1957 | 672,764.82 | 458,657 | 509,957 | 162,808 | 25.46 | 6,395 |
| 1959 | 342,578.29 | 227,900 | 253,390 | 89,188 | 26.78 | 3,330 |
| 1960 | 111,489.89 | 73,221 | 81,411 | 30,079 | 27.46 | 1,095 |
| 1961 | 42,463.76 | 27,522 | 30,600 | 11,864 | 28.15 | 421 |
| 1962 | 129,643.90 | 82,907 | 92,180 | 37,464 | 28.84 | 1,299 |
| 1963 | 135,003.17 | 85,153 | 94,677 | 40,326 | 29.54 | 1,365 |
| 1964 | 684,611.81 | 425,746 | 473,365 | 211,247 | 30.25 | 6,983 |
| 1965 | 2,141,345.88 | 1,312,388 | 1,459,176 | 682,170 | 30.97 | 22,027 |
| 1966 | 872,961.56 | 527,051 | 586,000 | 286,962 | 31.70 | 9,052 |
| 1967 | 386,557.36 | 229,855 | 255,564 | 130,993 | 32.43 | 4,039 |
| 1968 | 312,979.47 | 183,212 | 203,704 | 109,275 | 33.17 | 3,294 |
| 1969 | 2,239,786.34 | 1,290,117 | 1,434,414 | 805,372 | 33.92 | 23,743 |
| 1970 | 1,607,035.13 | 910,385 | 1,012,209 | 594,826 | 34.68 | 17,152 |
| 1971 | 812,281. 22 | 452,441 | 503,045 | 309,236 | 35.44 | 8,726 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 354 TOWERS AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 80-R3

| 1972 | $9,292,835.12$ | $5,086,712$ | $5,655,649$ | $3,637,186$ | 36.21 | 100,447 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1973 | $1,627,015.86$ | 874,716 | 972,551 | 654,465 | 36.99 | 17,693 |
| 1974 | $3,363,963.95$ | $1,775,769$ | $1,974,385$ | $1,389,579$ | 37.77 | 36,791 |
| 1975 | $84,817.27$ | 43,925 | 48,838 | 35,979 | 38.57 | 933 |
| 1976 | $10,497.75$ | 5,333 | 5,929 | 4,569 | 39.36 | 116 |
| 1979 | $10,199,574.99$ | $4,870,297$ | $5,415,029$ | $4,784,546$ | 41.80 | 114,463 |
| 1980 | $2,973,217.87$ | $1,389,236$ | $1,544,619$ | $1,428,599$ | 42.62 | 33,519 |
| 1981 | $3,754,465.46$ | $1,715,340$ | $1,907,197$ | $1,847,268$ | 43.45 | 42,515 |
| 1984 | $3,219.84$ | 1,516 | 1,686 | 1,534 | 41.02 | 37 |
| 1986 | $737,547.29$ | 330,790 | 367,788 | 369,759 | 42.42 | 8,717 |
| 1987 | $10,140.94$ | 4,450 | 4,948 | 5,193 | 42.84 | 121 |
| 1990 | $1,269.96$ | 511 | 568 | 702 | 45.26 | 16 |
| 1991 | $413,688.30$ | 162,331 | 180,487 | 233,201 | 45.68 | 5,105 |
| 1992 | $891,161.61$ | 337,750 | 375,527 | 515,635 | 46.69 | 11,044 |
| 1994 | $15,461.62$ | 5,490 | 6,104 | 9,358 | 48.13 | 194 |
| 1995 | $458,722.20$ | 156,745 | 174,277 | 284,445 | 49.13 | 5,790 |
| 1997 | $95,657.04$ | 30,342 | 33,736 | 61,921 | 50.58 | 1,224 |
| 1998 | $326,610.17$ | 99,943 | 111,121 | 215,489 | 51.03 | 4,223 |
| 1999 | $401,035.92$ | 117,263 | 130,379 | 270,657 | 52.03 | 5,202 |
| 2000 | $1,067,832.74$ | 297,712 | 331,010 | 736,823 | 53.03 | 13,894 |
| 2002 | $6,027.00$ | 1,527 | 1,698 | 4,329 | 54.50 | 79 |
| 2003 | $502,346.17$ | 121,317 | 134,886 | 367,460 | 54.96 | 6,686 |
| 2004 |  | 37.47 |  | 9 | 10 | 107 |
| 2005 | $3,565,247.51$ | 762,606 | 847,901 | $2,717,347$ | 55.96 | 4.96 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 47.6 1.17

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 355 POLES AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R3

| 1931 | $7,560.14$ | 7,446 | 7,560 |
| :--- | ---: | ---: | ---: |
| 1941 | 904.49 | 850 | 904 |
| 1943 | 118.07 | 110 | 118 |
| 1945 | 698.06 | 643 | 698 |
| 1950 | 50.15 | 45 | 50 |
| 1953 | $1,044.18$ | 922 | 1,022 |
| 1954 | $2,240.19$ | 1,965 | 2,178 |
| 1958 | $3,403.68$ | 2,906 | 3,221 |
| 1965 | $12,431.15$ | 9,977 | 11,059 |
| 1966 | $15,055.44$ | 11,954 | 13,250 |
| 1968 | $57,084.08$ | 44,287 | 49,090 |
| 1969 | $209,683.24$ | 160,693 | 178,121 |
| 1970 | $21,118.65$ | 15,977 | 17,710 |
| 1972 | $46,796.16$ | 34,450 | 38,186 |
| 1973 | $33,688.05$ | 24,439 | 27,089 |
| 1974 | $547,441.36$ | 391,070 | 433,483 |
| 1975 | $25,110.75$ | 17,660 | 19,575 |
| 1976 | $11,823.49$ | 8,178 | 9,065 |
| 1977 | $13,940.21$ | 9,477 | 10,505 |
| 1978 | $4,583.18$ | 3,061 | 3,393 |
| 1979 | $993,922.40$ | 651,655 | 722,329 |
| 1980 | $424,820.94$ | 273,198 | 302,827 |
| 1981 | $2,138,558.34$ | $1,348,062$ | $1,494,263$ |
| 1982 | $10,564.59$ | 6,523 | 7,230 |
| 1985 | $1,807.38$ | 1,136 | 1,259 |
| 1986 | $846,055.70$ | 519,563 | 575,911 |
| 1987 | $144,740.31$ | 87,278 | 96,744 |
| 1988 | $1,657.21$ | 975 | 1,081 |
| 1989 | $16,091.99$ | 9,226 | 10,227 |
| 1992 | $1,330,919.14$ | 701,661 | 777,758 |
| 1993 | $1,291,042.91$ | 660,368 | 731,987 |
| 1995 | $19,948.26$ | 9,563 | 10,600 |
| 1996 | $3,645.82$ | 1,688 | 1,871 |
| 1997 | $13,560.21$ | 6,055 | 6,712 |
| 1999 | $281,663.86$ | 116,271 | 128,881 |
| 2000 | $258,852.47$ | 102,402 | 113,508 |
| 2002 | 219.00 | 79 | 88 |
| 2003 | $911,867.15$ | 311,129 | 344,872 |
| 2004 | $173,165.67$ | 56,002 | 62,076 |
| 2005 | $1,618,368.49$ | 494,250 | 547,853 |
| 2006 | $1,082,826.09$ | 310,879 | 344,595 |
| 2007 | 280.64 | 75 | 83 |
|  |  |  |  |


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R3

| 2008 | $761,034.04$ | 190,259 | 210,893 | 550,141 | 37.50 | 14,670 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2009 | $2,828,156.73$ | 653,870 | 724,784 | $2,103,373$ | 38.25 | 54,990 |
| 2010 | $320,304.00$ | 67,584 | 74,914 | 245,390 | 39.25 | 6,252 |
| 2011 | $13,871,388.85$ | $2,661,920$ | $2,950,612$ | $10,920,777$ | 40.00 | 273,019 |
| 2012 | $704,839.38$ | 121,655 | 134,849 | 569,990 | 40.76 | 13,984 |
| 2013 | $18,697,627.66$ | $2,860,737$ | $3,170,991$ | $15,526,637$ | 41.52 | 373,956 |
| 2014 | $1,048,386.05$ | 139,645 | 154,790 | 893,596 | 42.28 | 21,135 |
| 2015 | $203,774.55$ | 23,088 | 25,592 | 178,183 | 43.04 | 4,140 |
| 2016 | $233,162.14$ | 21,731 | 24,088 | 209,074 | 43.81 | 4,772 |
| 2017 | $1,410,593.00$ | 102,691 | 113,828 | $1,296,765$ | 44.58 | 29,088 |
| 2018 | $3,730,558.02$ | 194,735 | 215,854 | $3,514,704$ | 45.35 | 77,502 |
| 2019 | $308,221.36$ | 9,740 | 10,796 | 297,425 | 45.90 | 6,480 |
| 2020 | $2,421,034.65$ | 26,147 | 28,983 | $2,392,052$ | 46.01 | 51,990 |
|  |  |  |  |  |  | $1,136,124$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 38.9 1.92

## ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R3

| 1916 | 74.17 | 73 | 74 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1920 | 11,430.81 | 11,039 | 11,431 |  |  |  |
| 1922 | 716.42 | 686 | 716 |  |  |  |
| 1924 | 6,528.22 | 6,204 | 6,528 |  |  |  |
| 1927 | 10.26 | 10 | 10 |  |  |  |
| 1929 | 71.73 | 67 | 72 |  |  |  |
| 1931 | 5,699.98 | 5,259 | 5,700 |  |  |  |
| 1941 | 7,941.24 | 6,999 | 7,941 |  |  |  |
| 1942 | 3,294.32 | 2,888 | 3,294 |  |  |  |
| 1943 | 2,164.61 | 1,888 | 2,165 |  |  |  |
| 1945 | 12,049.45 | 10,390 | 12,049 |  |  |  |
| 1948 | 7,129.52 | 6,034 | 7,118 | 12 | 9.99 | 1 |
| 1950 | 42,976.34 | 35,869 | 42,313 | 663 | 10.75 | 62 |
| 1951 | 37,565.46 | 31,121 | 36,712 | 853 | 11.15 | 77 |
| 1952 | 24,166.08 | 19,868 | 23,437 | 729 | 11.56 | 63 |
| 1953 | 182,483.30 | 148,822 | 175,557 | 6,926 | 11.99 | 578 |
| 1954 | 764,821.82 | 618,565 | 729,688 | 35,134 | 12.43 | 2,827 |
| 1956 | 1,080,830.87 | 858,850 | 1,013,139 | 67,692 | 13.35 | 5,071 |
| 1957 | 267,392.01 | 210,459 | 248,267 | 19,125 | 13.84 | 1,382 |
| 1958 | 6,245.20 | 4,868 | 5,743 | 502 | 14.33 | 35 |
| 1959 | 166,883.13 | 128,757 | 151,888 | 14,995 | 14.85 | 1,010 |
| 1960 | 304,365.13 | 232,346 | 274,086 | 30,279 | 15.38 | 1,969 |
| 1961 | 12,872.89 | 9,720 | 11,466 | 1,407 | 15.92 | 88 |
| 1962 | 160,352.48 | 119,697 | 141,200 | 19,152 | 16.48 | 1,162 |
| 1963 | 49,065.12 | 36,195 | 42,697 | 6,368 | 17.05 | 373 |
| 1964 | 175,462.10 | 127,872 | 150,844 | 24,618 | 17.63 | 1,396 |
| 1965 | 1,873,044.91 | 1,347,731 | 1,589,846 | 283,199 | 18.23 | 15,535 |
| 1966 | 440,957.69 | 313,146 | 369,401 | 71,557 | 18.84 | 3,798 |
| 1967 | 264,142.25 | 185,063 | 218,309 | 45,833 | 19.46 | 2,355 |
| 1968 | 846,132.57 | 584,483 | 689,483 | 156,650 | 20.10 | 7,794 |
| 1969 | 2,029,184.97 | 1,381,408 | 1,629,573 | 399,612 | 20.75 | 19,258 |
| 1970 | 1,163,313.96 | 780,142 | 920,292 | 243,022 | 21.41 | 11,351 |
| 1971 | 127,850.47 | 84,421 | 99,587 | 28,263 | 22.08 | 1,280 |
| 1972 | 4,237,064.37 | 2,753,456 | 3,248,104 | 988,960 | 22.76 | 43,452 |
| 1973 | 1,223,767.76 | 782,269 | 922,801 | 300,967 | 23.45 | 12,834 |
| 1974 | 2,436,523.71 | 1,530,892 | 1,805,911 | 630,613 | 24.16 | 26,102 |
| 1975 | 34,356.36 | 21,211 | 25,021 | 9,335 | 24.87 | 375 |
| 1976 | 1,299,080.43 | 787,645 | 929,142 | 369,938 | 25.59 | 14,456 |
| 1977 | 74,280.85 | 44,191 | 52,130 | 22,151 | 26.33 | 841 |
| 1978 | 901.01 | 526 | 620 | 281 | 27.07 | 10 |
| 1979 | 2,699,312.97 | 1,544,007 | 1,821,382 | 877,931 | 27.82 | 31,558 |
| 1980 | 1,783,140.19 | 999,111 | 1,178,597 | 604,543 | 28.58 | 21,153 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R3

| 1981 | 3,182,739.82 | 1,745,605 | 2,059,196 | 1,123,544 | 29.35 | 38,281 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1982 | 55,547.58 | 29,799 | 35,152 | 20,396 | 30.13 | 677 |
| 1983 | 24,189.70 | 13,970 | 16,480 | 7,710 | 27.44 | 281 |
| 1984 | 15,667.22 | 8,807 | 10,389 | 5,278 | 28.44 | 186 |
| 1985 | 2,610,437.65 | 1,436,263 | 1,694,282 | 916,156 | 29.02 | 31,570 |
| 1986 | 991,004.41 | 533,359 | 629,175 | 361,829 | 29.60 | 12,224 |
| 1987 | 175,164.28 | 92,136 | 108,688 | 66,476 | 30.19 | 2,202 |
| 1988 | 21,782.75 | 11,114 | 13,111 | 8,672 | 31.20 | 278 |
| 1989 | 3,318.86 | 1,652 | 1,949 | 1,370 | 31.79 | 43 |
| 1990 | 88,507.78 | 42,926 | 50,637 | 37,871 | 32.39 | 1,169 |
| 1991 | 3,540.49 | 1,660 | 1,958 | 1,582 | 33.40 | 47 |
| 1992 | 2,787,046.31 | 1,270,893 | 1,499,204 | 1,287,842 | 34.00 | 37,878 |
| 1993 | 1,158,505.34 | 512,986 | 605,142 | 553,363 | 34.61 | 15,989 |
| 1994 | 2,492.35 | 1,070 | 1,262 | 1,230 | 35.23 | 35 |
| 1995 | 17,443.54 | 7,206 | 8,501 | 8,943 | 36.23 | 247 |
| 1996 | 7,634.70 | 3,049 | 3,597 | 4,038 | 36.85 | 110 |
| 1997 | 19,557.46 | 7,537 | 8,891 | 10,666 | 37.48 | 285 |
| 1999 | 5,297.36 | 1,880 | 2,218 | 3,079 | 39.10 | 79 |
| 2000 | 1,975.92 | 668 | 788 | 1,188 | 40.11 | 30 |
| 2002 | 5,163.64 | 1,596 | 1,883 | 3,281 | 41.38 | 79 |
| 2003 | 797,070.96 | 232,904 | 274,744 | 522,327 | 42.38 | 12,325 |
| 2004 | 958,545.43 | 265,709 | 313,443 | 645,102 | 43.02 | 14,995 |
| 2005 | 2,950,332. 60 | 772,987 | 911,851 | 2,038,482 | 43.67 | 46,679 |
| 2006 | 1,471,707.56 | 360,568 | 425,343 | 1,046,365 | 44.67 | 23,424 |
| 2007 | 2,316,580.94 | 531,655 | 627,165 | 1,689,416 | 45.32 | 37,277 |
| 2009 | 15,431,973.63 | 3,033,926 | 3,578,959 | 11,853,015 | 46.98 | 252,299 |
| 2010 | $2,835,248.73$ | 512,046 | 604,033 | 2,231,216 | 47.64 | 46,835 |
| 2011 | 3,422,627.77 | 559,257 | 659,725 | 2,762,903 | 48.64 | 56,803 |
| 2012 | 4,442,797.98 | 653,091 | 770,416 | 3,672,382 | 49.31 | 74,475 |
| 2013 | 8,563,980.37 | 1,111,605 | 1,311,300 | 7,252,680 | 50.30 | 144,188 |
| 2014 | 7,444,083.53 | 841,926 | 993,175 | 6,450,909 | 50.97 | 126,563 |
| 2015 | $2,175,804.82$ | 209,312 | 246,914 | 1,928,891 | 51.65 | 37,345 |
| 2016 | 4,075,716.98 | 322,797 | 380,786 | 3,694,931 | 52.32 | 70,622 |
| 2017 | 12,917,655.02 | 800,895 | 944,773 | 11,972,882 | 52.99 | 225,946 |
| 2018 | 11,860,871.71 | 527,809 | 622,628 | 11,238,244 | 53.68 | 209,356 |
| 2019 | 6,511,089.48 | 174,497 | 205,845 | 6,305,244 | 54.37 | 115,969 |
| 2020 | 16,373,578.65 | 149,000 | 175,767 | 16,197,812 | 54.45 | 297,480 |
|  | 139,592,330.45 | 32,558,408 | 38,403,704 | 101,188,627 |  | 162,517 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 46.8 1.55

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 357 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 60-S3

| 1956 | $91,709.41$ | 76,043 | 75,327 | 16,382 | 10.25 | 1,598 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1958 | $3,594,249.57$ | $2,939,485$ | $2,911,798$ | 682,452 | 10.93 | 62,438 |
| 1960 | $263,024.66$ | 211,866 | 209,870 | 53,155 | 11.67 | 4,555 |
| 1961 | $10,434.81$ | 8,339 | 8,260 | 2,175 | 12.05 | 180 |
| 1967 | $391,921.15$ | 296,422 | 293,630 | 98,291 | 14.62 | 6,723 |
| 1972 | $165,588.11$ | 118,147 | 117,034 | 48,554 | 17.19 | 2,825 |
| 1974 | $5,897.53$ | 4,096 | 4,057 | 1,841 | 18.33 | 100 |
| 1975 | $4,528.32$ | 3,100 | 3,071 | 1,457 | 18.93 | 77 |
| 1979 | $28,640,461.01$ | $18,367,987$ | $18,194,981$ | $10,445,480$ | 21.52 | 485,385 |
| 1980 | $659,680.65$ | 415,487 | 411,574 | 248,107 | 22.21 | 11,171 |
| 1983 | $16,636.13$ | 10,544 | 10,445 | 6,191 | 21.67 | 286 |
| 1985 | $432,054.70$ | 262,257 | 259,787 | 172,268 | 22.98 | 7,496 |
| 1986 | $640,900.19$ | 380,310 | 376,728 | 264,172 | 23.64 | 11,175 |
| 1990 | $1,493,297.60$ | 792,493 | 785,028 | 708,270 | 26.97 | 26,261 |
| 1996 | $13,656.62$ | 5,922 | 5,866 | 7,791 | 32.00 | 243 |
| 2003 | $528,003.76$ | 164,473 | 162,924 | 365,080 | 38.68 | 9,438 |
| 2005 | $663,726.32$ | 184,118 | 182,384 | 481,342 | 40.37 | 11,923 |
| 2006 | $258,941.50$ | 67,221 | 66,588 | 192,354 | 41.36 | 4,651 |
| 2007 | $24,875,884.97$ | $6,010,014$ | $5,953,405$ | $18,922,480$ | 42.37 | 446,601 |
| 2009 | 151.78 |  | 31 |  | 31 | 121 |
| 44.37 | 3 |  |  |  |  |  |
| 2010 | $109,559.76$ | 20,597 | 20,403 | 89,157 | 45.36 | 1,966 |
| 2011 | $1,291,616.16$ | 219,575 | 217,507 | $1,074,109$ | 46.37 | 23,164 |
| 2012 | $5,757,829.90$ | 876,342 | 868,088 | $4,889,742$ | 47.36 | 103,246 |
| 2013 | $766,004.08$ | 102,798 | 101,830 | 664,174 | 48.37 | 13,731 |
| 2015 | $1,610,380.03$ | 158,461 | 156,968 | $1,453,412$ | 50.37 | 28,855 |
| 2016 | $8,399,786.68$ | 677,023 | 670,646 | $7,729,141$ | 51.36 | 150,490 |
| 2017 | $62,256.13$ | 3,897 | 3,860 | 58,396 | 52.37 | 1,115 |
| 2019 | $100,580.89$ | 2,696 | 2,671 | 97,910 | 54.37 | 1,801 |
|  |  |  |  |  |  |  |
|  | $80,848,762.42$ | $32,379,744$ | $32,074,761$ | $48,774,002$ | $1,417,497$ |  |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 34.4 1.75

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 60-R3

| 1951 | 1,472.20 | 1,268 | 1,301 | 171 | 8.33 | 21 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1958 | 705,920.83 | 576,737 | 591,930 | 113,991 | 10.98 | 10,382 |
| 1959 | 1,790.10 | 1,449 | 1,487 | 303 | 11.42 | 27 |
| 1967 | 238,697.15 | 177,073 | 181,738 | 56,959 | 15.49 | 3,677 |
| 1968 | 16,696.81 | 12,225 | 12,547 | 4,150 | 16.07 | 258 |
| 1972 | 168,645.39 | 116,563 | 119,634 | 49,011 | 18.53 | 2,645 |
| 1975 | 135,372.41 | 89,098 | 91,445 | 43,927 | 20.51 | 2,142 |
| 1979 | 15,348,704.29 | 9,383,123 | 9,630,304 | 5,718,400 | 23.32 | 245,214 |
| 1980 | 16,920.12 | 10,138 | 10,405 | 6,515 | 24.05 | 271 |
| 1982 | 59,636.07 | 34,261 | 35,164 | 24,472 | 25.53 | 959 |
| 1983 | 509,630.19 | 313,423 | 321,680 | 187,950 | 23.48 | 8,005 |
| 1986 | 153,515.09 | 87,918 | 90,234 | 63,281 | 25.74 | 2,458 |
| 2000 | 167.63 | 61 | 63 | 105 | 35.68 | 3 |
| 2004 | 62,917.24 | 18,787 | 19,282 | 43,635 | 38.75 | 1,126 |
| 2005 | 168,221.02 | 47,455 | 48,705 | 119,516 | 39.45 | 3,030 |
| 2006 | 200,476.26 | 53,206 | 54,608 | 145,868 | 40.14 | 3,634 |
| 2007 | 15,114,671.61 | 3,733,324 | 3,831,671 | 11,283,001 | 41.15 | 274,192 |
| 2008 | 6,759,504.11 | 1,554,686 | 1,595,641 | 5,163,863 | 41.85 | 123,390 |
| 2009 | 59,830.99 | 12,732 | 13,067 | 46,764 | 42.55 | 1,099 |
| 2010 | 18,218,306.69 | 3,537,995 | 3,631,197 | 14,587,110 | 43.56 | 334,874 |
| 2011 | 19,282,188.42 | 3,407,163 | 3,496,919 | 15,785,269 | 44.26 | 356,649 |
| 2012 | 14,001,214.58 | 2,226,193 | 2,284,838 | 11,716,377 | 44.97 | 260,538 |
| 2013 | 12,709,057.60 | 1,791,977 | 1,839,183 | 10,869,875 | 45.69 | 237,905 |
| 2015 | 3,837.56 | 399 | 410 | 3,428 | 47.41 | 72 |
| 2016 | 42,236,831.60 | 3,611,249 | 3,706,380 | 38,530,452 | 48.13 | 800,550 |
| 2017 | 1,624,794.71 | 108,536 | 111,396 | 1,513,399 | 48.86 | 30,974 |
|  | 147,799,020.67 | 30,907,039 | 31,721,229 | 116,077,792 |  | 704,095 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 42.9 1.83

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 60-R4

| 2011 | $2,091,746.25$ | 351,832 | 354,123 | $1,737,623$ | 46.99 | 36,979 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2012 | 2.55 |  |  | 48.00 |  |  |
| 2013 | $7,171,325.17$ | 952,352 | 958,554 | $6,212,771$ | 48.99 | 126,817 |
| 2014 | $30,518.01$ | 3,510 | 3,533 | 26,985 | 50.00 | 540 |
| 2018 | $892,401.86$ | 39,444 | 39,701 | 852,701 | 54.00 | 15,791 |
|  | $10,185,993.84$ | $1,347,138$ | $1,355,911$ | $8,830,083$ |  | 180,127 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 49.0 1.77

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

AMBRIDGE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA $70-\mathrm{R} 3$
PROBABLE RETIREMENT YEAR.. $6-2046$

| 1920 | 194.29 | 182 | 187 | 7 | 4.36 | 2 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1923 | $1,924.93$ | 1,784 | 1,834 | 90 | 5.13 | 18 |
| 1929 | 101.27 | 92 | 95 | 7 | 6.69 | 1 |
| 1930 | $2,047.31$ | 1,844 | 1,896 | 151 | 6.95 | 22 |
| 1948 | $2,303.48$ | 47.46 | 1,892 | 1,946 | 358 | 12.45 |
| 1956 | 247.85 | 37 | 38 | 9 | 15.35 | 29 |
| 1964 | $7,729.19$ | 4,812 | 186 | 4,948 | 18.16 | 1 |
| 1981 | $48,448.94$ | 29,418 | 30,250 | 18,781 | 22.38 | 3 |
| 1986 | $85,128.16$ | 47,714 | 49,064 | 36,064 | 22.32 | 124 |
| 1991 | $1,069,097.12$ | 60,939 | 62,663 | $1,006,434$ | 24.82 | 815 |
| 2019 |  |  |  |  | 1,559 |  |
|  | $1,217,270.00$ | 148,895 | 153,108 | $1,064,162$ | 40,549 |  |
|  |  |  |  |  | 43,123 |  |

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1922 | 57,206.67 | 53,781 | 55,303 | 1,904 | 4.19 | 454 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1927 | 394.38 | 368 | 378 | 16 | 4.73 | 3 |
| 1928 | 33,930.56 | 31,588 | 32,482 | 1,449 | 4.82 | 301 |
| 1929 | 3,137.09 | 2,916 | 2,998 | 139 | 4.91 | 28 |
| 1931 | 260.46 | 242 | 249 | 12 | 5.07 | 2 |
| 1941 | 78.27 | 72 | 74 | 4 | 5.80 | 1 |
| 1945 | 1,254.84 | 1,142 | 1,174 | 81 | 6.07 | 13 |
| 1948 | 127.30 | 115 | 118 | 9 | 6.26 | 1 |
| 1949 | 385.84 | 349 | 359 | 27 | 6.32 | 4 |
| 1953 | 853.71 | 767 | 789 | 65 | 6.54 | 10 |
| 1955 | 2,123.34 | 1,902 | 1,956 | 168 | 6.64 | 25 |
| 1956 | 59,146.45 | 52,906 | 54,403 | 4,744 | 6.68 | 710 |
| 1957 | 72,215.05 | 64,477 | 66,301 | 5,914 | 6.73 | 879 |
| 1962 | 989.74 | 875 | 900 | 90 | 6.92 | 13 |
| 1964 | 21,353.04 | 18,811 | 19,343 | 2,010 | 6.98 | 288 |
| 1966 | 13,324.36 | 11,687 | 12,018 | 1,307 | 7.04 | 186 |
| 1967 | 91,851.33 | 80,372 | 82,646 | 9,205 | 7.07 | 1,302 |
| 1970 | 20,297.02 | 17,632 | 18,131 | 2,166 | 7.14 | 303 |
| 1973 | 651.38 | 561 | 577 | 75 | 7.19 | 10 |
| 1974 | 147.54 | 127 | 131 | 17 | 7.21 | 2 |
| 1975 | 3,381.04 | 2,897 | 2,979 | 402 | 7.23 | 56 |
| 1976 | 3,414.43 | 2,916 | 2,998 | 416 | 7.24 | 57 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1977 | $4,868.30$ | 4,144 | 4,261 | 607 | 7.26 | 84 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1978 | $47,683.89$ | 40,454 | 41,599 | 6,085 | 7.27 | 837 |
| 1979 | $90,582.00$ | 76,582 | 78,749 | 11,833 | 7.28 | 1,625 |
| 1980 | $13,828.46$ | 11,645 | 11,974 | 1,854 | 7.30 | 254 |
| 1981 | $127,041.02$ | 106,577 | 109,592 | 17,449 | 7.31 | 2,387 |
| 1983 | $258,851.69$ | 216,452 | 222,576 | 36,276 | 7.35 | 4,936 |
| 1988 | $7,768.16$ | 6,337 | 6,516 | 1,252 | 7.34 | 171 |
| 1996 | $98,510.88$ | 75,538 | 77,675 | 20,836 | 7.45 | 2,797 |
| 1998 | $53,947.30$ | 40,541 | 41,688 | 12,259 | 7.44 | 1,648 |
| 1999 | $99,784.67$ | 74,230 | 76,330 | 23,455 | 7.40 | 3,170 |
| 2004 | $80,982.49$ | 55,854 | 57,434 | 23,548 | 7.42 | 3,174 |
| 2011 | $61,132.96$ | 34,210 | 35,178 | 25,955 | 7.48 | 3,470 |
| 2013 | $31,893.29$ | 15,979 | 16,431 | 15,462 | 7.47 | 2,070 |
| 2014 | $84,246.70$ | 39,208 | 40,317 | 43,929 | 7.47 | 5,881 |
|  |  |  |  |  |  | 37,152 |

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022

| 1918 | $6,479.65$ | 6,359 | 6,480 |
| ---: | ---: | ---: | ---: |
| 1920 | $1,139.38$ | 1,118 | 1,139 |
| 1924 | $21,829.47$ | 21,407 | 21,829 |
| 1925 | 130.20 | 128 | 130 |
| 1926 | $6,879.41$ | 6,745 | 6,879 |
| 1927 | $7,591.79$ | 7,442 | 7,592 |
| 1928 | $1,550.59$ | 1,520 | 1,551 |
| 1929 | 41.37 | 41 | 41 |
| 1936 | 124.43 | 122 | 124 |
| 1941 | 385.02 | 377 | 385 |
| 1945 | 91.20 | 89 | 91 |
| 1947 | 185.32 | 181 | 185 |
| 1948 | $3,776.50$ | 3,691 | 3,777 |
| 1950 | $3,345.31$ | 3,268 | 3,345 |
| 1951 | 363.99 | 356 | 364 |
| 1954 | 239.48 | 234 | 239 |
| 1956 | $3,964.21$ | 3,867 | 3,964 |
| 1958 | $5,227.70$ | 5,097 | 5,228 |
| 1960 | $1,588.13$ | 1,547 | 1,588 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022

| 1964 | 4,364.80 | 4,246 | 4,365 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1965 | 26,341.57 | 25,614 | 26,342 |  |  |  |
| 1969 | 991.16 | 962 | 990 | 2 | 1.49 | 1 |
| 1970 | 26,477.66 | 25,683 | 26,419 | 59 | 1.49 | 40 |
| 1972 | 649,046.00 | 628,880 | 646,898 | 2,148 | 1.49 | 1,442 |
| 1975 | 10,827.98 | 10,472 | 10,772 | 56 | 1.49 | 38 |
| 1978 | 10,129.72 | 9,776 | 10,056 | 74 | 1.49 | 50 |
| 1982 | 19,253.95 | 18,520 | 19,051 | 203 | 1.49 | 136 |
| 1987 | 992.73 | 951 | 978 | 14 | 1.47 | 10 |
| 1989 | 8,142.94 | 7,772 | 7,995 | 148 | 1.50 | 99 |
| 1992 | 11,155.20 | 10,586 | 10,889 | 266 | 1.53 | 174 |
| 1995 | 1,769.50 | 1,670 | 1,718 | 52 | 1.53 | 34 |
| 1998 | 3,928.52 | 3,686 | 3,792 | 137 | 1.48 | 93 |
| 1999 | 113,103.99 | 105,775 | 108,806 | 4,298 | 1.49 | 2,885 |
| 2000 | 2,114.00 | 1,972 | 2,029 | 85 | 1.48 | 57 |
| 2002 | 92,388.44 | 85,459 | 87,908 | 4,481 | 1.50 | 2,987 |
| 2006 | 48,955.91 | 44,364 | 45,635 | 3,321 | 1.50 | 2,214 |
| 2007 | 3,382.83 | 3,046 | 3,133 | 250 | 1.49 | 168 |
| 2009 | 113,808.87 | 100,653 | 103,537 | 10,272 | 1.50 | 6,848 |
| 2011 | 77,040.51 | 66,532 | 68,438 | 8,602 | 1.50 | 5,735 |
| 2014 | 133,046.28 | 108,100 | 111,197 | 21,849 | 1.50 | 14,566 |
| 2019 | 56,760.10 | 28,386 | 29,199 | 27,561 | 1.50 | 18,374 |
|  | 1,478,955.81 | 1,356,694 | 1,395,078 | 83,878 |  | 55,951 |

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020

| 1925 | $5,580.60$ | 5,581 | 5,581 |
| ---: | ---: | ---: | ---: |
| 1926 | $5,585.75$ | 5,586 | 5,586 |
| 1927 | $8,368.56$ | 8,369 | 8,369 |
| 1928 | $194,910.32$ | 194,910 | 194,910 |
| 1939 | $4,857.87$ | 4,858 | 4,858 |
| 1941 | 390.66 | 391 | 391 |
| 1945 | $7,822.11$ | 7,822 | 7,822 |
| 1948 | $1,280.08$ | 1,280 | 1,280 |
| 1951 | $1,451.21$ | 1,451 | 1,451 |
| 1955 | $13,175.67$ | 13,176 | 13,176 |
| 1959 | $1,046.38$ | 1,046 | 1,046 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020

| 1962 | $4,795.76$ | 4,796 | 4,796 |
| ---: | ---: | ---: | ---: |
| 1964 | $7,377.68$ | 7,378 | 7,378 |
| 1968 | $2,731.98$ | 2,732 | 2,732 |
| 1970 | $3,738.69$ | 3,739 | 3,739 |
| 1973 | $6,413.14$ | 6,413 | 6,413 |
| 1975 | $847,423.37$ | 847,423 | 847,423 |
| 1976 | $40,937.27$ | 40,937 | 40,937 |
| 1977 | $1,455.67$ | 1,456 | 1,456 |
| 1979 | $11,730.51$ | 11,731 | 11,731 |
| 1981 | $2,663.43$ | 2,663 | 2,663 |
| 1988 | $15,907.68$ | 15,908 | 15,908 |
| 1990 | $20,549.10$ | 20,549 | 20,549 |
| 1995 | $97,828.82$ | 97,829 | 97,829 |
| 1996 | $75,615.66$ | 75,616 | 75,616 |
| 1999 | $12,089.25$ | 12,089 | 12,089 |
| 2000 | $141,263.00$ | 141,263 | 141,263 |
| 2018 | $14,164.13$ | 14,164 | 14,164 |
| 2019 | $4,199.09$ | 4,199 | 4,199 |
|  |  |  |  |
|  | $1,555,353.44$ | $1,555,355$ | $1,555,353$ |

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040

| 1920 | 24,315.05 | 22,800 | 23,473 | 842 | 4.36 | 193 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1924 | 1,614.45 | 1,490 | 1,534 | 80 | 5.39 | 15 |
| 1925 | 1,528.60 | 1,405 | 1,446 | 82 | 5.65 | 15 |
| 1926 | 83.36 | 76 | 78 | 5 | 5.90 | 1 |
| 1927 | 50.34 | 46 | 47 | 3 | 6.15 |  |
| 1928 | 548.07 | 498 | 513 | 35 | 6.41 | 5 |
| 1930 | 1,912.18 | 1,724 | 1,775 | 137 | 6.90 | 20 |
| 1933 | 308.08 | 274 | 282 | 26 | 7.64 | 3 |
| 1942 | 539.72 | 463 | 477 | 63 | 9.87 | 6 |
| 1943 | 1,567.28 | 1,339 | 1,379 | 189 | 10.13 | 19 |
| 1951 | 245.06 | 201 | 207 | 38 | 12.26 | 3 |
| 1954 | 1,188.09 | 961 | 989 | 199 | 13.06 | 15 |
| 1956 | 52,571.01 | 42,044 | 43,285 | 9,286 | 13.58 | 684 |
| 1957 | 5,882.97 | 4,679 | 4,817 | 1,066 | 13.83 | 77 |
| 1961 | 31,163.44 | 24,219 | 24,934 | 6,230 | 14.78 | 422 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040

| 1966 | $4,238.80$ | 3,196 | 3,290 | 948 | 15.82 | 60 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1967 | $4,490.52$ | 3,364 | 3,463 | 1,027 | 16.01 | 64 |
| 1968 | $7,240.74$ | 5,389 | 5,548 | 1,693 | 16.19 | 105 |
| 1970 | $33,996.04$ | 24,977 | 25,714 | 8,282 | 16.52 | 501 |
| 1971 | $30,306.93$ | 22,115 | 22,768 | 7,539 | 16.68 | 452 |
| 1974 | $1,800.27$ | 1,287 | 1,325 | 475 | 17.10 | 28 |
| 1978 | $3,004.77$ | 2,083 | 2,144 | 860 | 17.57 | 49 |
| 1982 | $4,055.37$ | 2,716 | 2,796 | 1,259 | 17.96 | 70 |
| 1983 | $1,364.18$ | $9,763.19$ | 3,745 | 3,856 | 411 | 17.75 |
| 1987 | $25,956.73$ | 16,703 | 17,196 | 1,908 | 18.05 | 23 |
| 1988 | $107,821.95$ | 66,483 | 68,445 | 8,761 | 18.01 | 106 |
| 1991 | $477,943.24$ | 276,634 | 284,799 | 193,145 | 18.56 | 486 |
| 1995 | $191,762.77$ | 108,998 | 112,215 | 79,548 | 18.60 | 10,147 |
| 1996 | $31,380.47$ | 16,801 | 17,297 | 14,084 | 18.66 | 4,277 |
| 1999 | $19,787.14$ | 9,522 | 9,803 | 9,984 | 18.87 | 755 |
| 2003 | $101,833.56$ | 45,774 | 47,125 | 54,709 | 18.98 | 529 |
| 2005 | $104,155.00$ | 39,162 | 40,318 | 63,837 | 19.08 | 2,882 |
| 2009 | $79,727.09$ | 26,438 | 27,218 | 52,509 | 19.15 | 3,346 |
| 2011 |  |  |  |  | 2,742 |  |
|  | $1,360,146.46$ | 778,532 | 801,510 | 558,636 |  |  |
|  |  |  |  |  |  | 30,507 |

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2049

| 1959 | $815,963.20$ | 613,098 | 631,193 | 184,770 | 17.15 | 10,774 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1961 | $8,602.26$ | 6,351 | 6,538 | 2,064 | 17.97 | 115 |
| 1965 | 730.45 | 504.81 | 473 | 535 | 195 | 19.55 |
| 1971 | $8,226.77$ | 5,006 | 5,154 | 218 | 21.68 | 10 |
| 1980 | $11,976.63$ | 125.58 | 7,320 | 72,536 | 3,073 | 24.16 |
| 1983 | $6,804.79$ | 3,673 | 7,441 | 23.85 | 10 |  |
| 1987 | $85,821.08$ | 41,632 | 4,781 | 51 | 24.64 | 186 |
| 1991 | $14,775.32$ | 6,068 | 6,861 | 3,023 | 25.15 | 2 |
| 1996 | $7,305.61$ | 2,436 | 2,508 | 42,960 | 26.01 | 120 |
| 2002 | $80,399.00$ | 23,854 | 24,558 | 8,528 | 26.55 | 1,652 |
| 2007 |  | 4,798 | 26.99 | 321 |  |  |
| 2009 |  |  | 55,841 | 27.26 | 178 |  |
|  |  |  |  |  | 2,048 |  |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2049

| 2011 | $303,940.12$ | 78,234 | 80,543 | 223,397 | 27.40 | 8,153 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2012 | $986,343.55$ | 233,961 | 240,866 | 745,477 | 27.34 | 27,267 |
| 2014 | $25,583.65$ | 4,889 | 5,033 | 20,550 | 27.51 | 747 |
|  | $2,357,302.82$ | $1,027,587$ | $1,057,915$ | $1,299,388$ | 51,710 |  |

RANKIN SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2041

| 1986 | $1,408,528.92$ | 913,572 | 940,535 | 467,994 | 18.69 | 25,040 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1989 | $17,214.00$ | 10,736 | 11,053 | 6,161 | 19.01 | 324 |
| 1991 | $12,284.82$ | 7,465 | 7,685 | 4,599 | 19.04 | 242 |
| 2007 | $25,140.89$ | 10,147 | 10,446 | 14,694 | 19.95 | 737 |
|  |  |  |  |  |  |  |
|  | $1,463,168.63$ | 941,920 | 969,720 | 493,449 | 26,343 |  |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2027

| 1965 | $89,653.99$ | 80,044 | 82,406 | 7,248 | 6.14 | 1,180 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1972 | $790,707.59$ | 695,609 | 716,139 | 74,568 | 6.26 | 11,912 |
| 1978 | $1,221.01$ | 1,057 | 1,088 | 133 | 6.33 | 21 |
| 1981 | $48,253.57$ | 41,357 | 42,578 | 5,676 | 6.36 | 892 |
| 1982 | 864.40 | 738 | 760 | 105 | 6.37 | 16 |
| 1985 | $2,495.52$ | 2,117 | 2,179 | 316 | 6.34 | 50 |
| 2001 | $87,673.91$ | 65,826 | 67,769 | 19,905 | 6.47 | 3,077 |
| 2002 | $19,477.95$ | 14,449 | 14,875 | 4,603 | 6.44 | 715 |
| 2011 | $40,757.40$ | 24,238 | 24,953 | 15,804 | 6.47 | 2,443 |
| 2012 | $47,323.93$ | 26,871 | 27,664 | 19,660 | 6.47 | 3,039 |
| 2017 | $50,441.02$ | 17,690 | 18,212 | 32,229 | 6.48 | 4,974 |
| 2019 | $21,356.53$ | 4,015 | 4,133 | 17,223 | 6.48 | 2,658 |
|  |  |  |  |  |  |  |
|  | $1,200,226.82$ | 974,011 | $1,002,758$ | 197,469 |  | 30,977 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OAKLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037

| 1967 | $122,589.59$ | 94,832 | 97,631 | 24,959 | 14.10 | 1,770 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1968 | $1,102,592.83$ | 848,346 | 873,384 | 229,209 | 14.23 | 16,107 |
| 1969 | 137.16 | 105 | 108 | 29 | 14.35 | 2 |
| 1972 | $3,893.50$ | 2,929 | 3,015 | 878 | 14.68 | 60 |
| 1975 | $26,487.78$ | 19,570 | 20,148 | 6,340 | 14.96 | 424 |
| 1977 | $3,773.13$ | 2,752 | 2,833 | 940 | 15.12 | 62 |
| 1979 | $1,852.83$ | 1,333 | 1,372 | 480 | 15.27 | 31 |
| 1980 | $11,795.74$ | 8,423 | 8,672 | 3,124 | 15.33 | 204 |
| 1990 | $21,532.25$ | 14,250 | 14,671 | 6,862 | 15.59 | 440 |
| 2005 | $80,473.80$ | 39,416 | 40,579 | 39,894 | 16.15 | 2,470 |
| 2009 | $121,348.63$ | 50,384 | 51,871 | 69,478 | 16.20 | 4,289 |
| 2012 | $1,215,217.52$ | 417,306 | 429,622 | 785,595 | 16.25 | 48,344 |
| 2013 | $145,906.66$ | 45,961 | 47,317 | 98,589 | 16.31 | 6,045 |
| 2015 | $369,559.38$ | 93,277 | 96,030 | 273,529 | 16.29 | 16,791 |
|  |  |  |  |  |  |  |
|  | $3,227,160.80$ | $1,638,884$ | $1,687,254$ | $1,539,907$ |  | 97,039 |

RACCOON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2027

| 1972 | 1,016,123.08 | 893,914 | 920,297 | 95,826 | 6.26 | 15,308 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1977 | 3,136.98 | 2,724 | 2,804 | 333 | 6.32 | 53 |
| 1983 | 23,306.08 | 19,927 | 20,515 | 2,791 | 6.36 | 439 |
| 1988 | 54,050.97 | 45,143 | 46,475 | 7,576 | 6.41 | 1,182 |
| 1995 | 31,030.02 | 24,768 | 25,499 | 5,531 | 6.45 | 858 |
| 1999 | 38,882.18 | 29,928 | 30,811 | 8,071 | 6.43 | 1,255 |
|  | 1,166,529.31 | 1,016,404 | 1,046,402 | 120,127 |  | 19,095 |
| LOGANS FERRY SUBSTATION |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 70-R3 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2028 |  |  |  |  |  |  |
| 1973 | 1,071,930.01 | 923,854 | 951, 120 | 120,810 | 7.19 | 16,803 |
| 1975 | 52,907.59 | 45,325 | 46,663 | 6,245 | 7.23 | 864 |
| 1977 | 28,334.05 | 24,118 | 24,830 | 3,504 | 7.26 | 483 |
| 1983 | 724.81 | 606 | 624 | 101 | 7.35 | 14 |
| 1985 | 4,117.06 | 3,406 | 3,507 | 611 | 7.42 | 82 |
| 1994 | 17,063.20 | 13,340 | 13,734 | 3,329 | 7.40 | 450 |

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

LOGANS FERRY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1996 | $34,699.66$ | 26,608 | 27,393 | 7,306 | 7.45 | 981 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1998 | $44,776.55$ | 33,650 | 34,643 | 10,133 | 7.44 | 1,362 |
| 1999 | $39,500.85$ | 29,385 | 30,252 | 9,249 | 7.40 | 1,250 |
| 2004 | $92,299.66$ | 63,659 | 65,538 | 26,762 | 7.42 | 3,607 |
| 2012 | $46,684.39$ | 24,841 | 25,574 | 21,110 | 7.47 | 2,826 |
| 2014 | $62,849.69$ | 29,250 | 30,113 | 32,736 | 7.47 | 4,382 |
|  |  |  |  |  |  |  |
|  | $1,495,887.52$ | $1,218,042$ | $1,253,991$ | 241,897 | 33,104 |  |

PLUM SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2033

| 1978 | $1,145,253.71$ | 885,613 | 911,751 |
| ---: | ---: | ---: | ---: |
| 1986 | $4,963.21$ | 3,682 | 3,791 |
| 1989 | $9,580.86$ | 6,941 | 7,146 |
| 1994 | $41,701.84$ | 28,624 | 29,469 |
| 2011 | $106,685.39$ | 46,323 | 47,690 |
| 2012 | $93,896.74$ | 38,235 | 39,363 |
|  |  |  |  |
|  | $1,402,081.75$ | $1,009,418$ | $1,039,210$ |


| 233,503 | 11.80 | 19,788 |
| ---: | ---: | ---: |
| 1,173 | 12.01 | 98 |
| 2,435 | 11.98 | 203 |
| 12,233 | 12.11 | 1,010 |
| 58,995 | 12.38 | 4,765 |
| 54,533 | 12.38 | 4,405 |
|  |  |  |
| 362,872 |  | 30,269 |

ARSENAL SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037

| 1982 | $7,792,540.97$ | $5,478,000$ | $5,639,679$ | $2,152,862$ | 15.46 | 139,254 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1990 | $26,188.00$ | 17,331 | 17,843 | 8,345 | 15.59 | 535 |
| 1996 | $259,365.34$ | 156,968 | 161,601 | 97,765 | 15.98 | 6,118 |
| 1999 | $102,517.43$ | 58,845 | 60,582 | 41,936 | 15.96 | 2,628 |
| 2007 | $177,484.85$ | 80,756 | 83,139 | 94,345 | 16.17 | 5,835 |
| 2009 | $135,868.40$ | 56,413 | 58,078 | 77,790 | 16.20 | 4,802 |
| 2011 | $58,120.31$ | 21,423 | 22,055 | 36,065 | 16.27 | 2,217 |
| 2012 | $95,003.44$ | 32,624 | 33,587 | 61,417 | 16.25 | 3,780 |
| 2013 | $58,454.67$ | 18,413 | 18,956 | 39,498 | 16.31 | 2,422 |
| 2014 | $20,969.81$ | 5,985 | 6,162 | 14,808 | 16.28 | 910 |
| 2019 | $111,231.07$ | 9,377 | 9,654 | 101,577 | 16.29 | 6,236 |
|  | $8,837,744.29$ | $5,936,135$ | $6,111,335$ | $2,726,409$ |  | 174,737 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

CARSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2034

| 1971 | $100,584.52$ | 79,291 | 81,631 | 18,953 | 12.27 | 1,545 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1979 | $7,205,842.15$ | $5,444,878$ | $5,605,579$ | $1,600,263$ | 12.72 | 125,807 |
| 1981 | $24,406.12$ | 18,214 | 18,752 | 5,655 | 12.80 | 442 |
| 1988 | $6,265.15$ | 4,480 | 4,612 | 1,653 | 12.95 | 128 |
| 1991 | $21,864.90$ | 15,157 | 15,604 | 6,261 | 13.06 | 479 |
| 1994 | $29,370.58$ | 19,690 | 20,271 | 9,099 | 13.03 | 698 |
| 1999 | $28,644.53$ | 17,737 | 18,260 | 10,384 | 13.22 | 785 |
| 2005 | $11,591.54$ | 6,234 | 6,418 | 5,174 | 13.32 | 388 |
| 2006 | $25,851.02$ | 13,494 | 13,892 | 11,959 | 13.28 | 901 |
| 2007 | $299,734.75$ | 150,946 | 155,401 | 144,334 | 13.31 | 10,844 |
| 2009 | $80,493.48$ | 37,301 | 38,402 | 42,092 | 13.32 | 3,160 |
| 2012 | $17,060.05$ | 6,626 | 6,822 | 10,238 | 13.38 | 765 |
| 2013 | $49,964.19$ | 17,947 | 18,477 | 31,487 | 13.38 | 2,353 |
| 2014 | $25,980.51$ | 8,496 | 8,747 | 17,234 | 13.38 | 1,288 |
|  |  |  |  |  |  |  |
|  | $7,927,653.49$ | $5,840,491$ | $6,012,868$ | $1,914,785$ |  | 149,583 |

FINDLAY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2043

| 1988 | $1,116,779.71$ | 685,926 | 706,170 | 410,609 | 20.41 | 20,118 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1994 | $4,125.73$ | 2,296 | 2,364 | 1,762 | 21.12 | 83 |
| 1996 | $28,836.01$ | 15,473 | 15,930 | 12,906 | 21.16 | 610 |
| 1998 | $121,511.95$ | 62,336 | 64,176 | 57,336 | 21.36 | 2,684 |
| 1999 | $34,002.00$ | 17,035 | 17,538 | 16,464 | 21.42 | 769 |
| 2000 | $146,862.00$ | 71,962 | 74,086 | 72,776 | 21.34 | 3,410 |
| 2002 | $52,323.92$ | 24,200 | 24,914 | 27,410 | 21.50 | 1,275 |
| 2003 | $164,725.35$ | 73,797 | 75,975 | 88,750 | 21.56 | 4,116 |
| 2004 | $230,726.27$ | 99,743 | 102,687 | 128,039 | 21.67 | 5,909 |
| 2005 | $148,293.39$ | 61,838 | 63,663 | 84,630 | 21.67 | 3,905 |
| 2006 | $326,024.44$ | 130,475 | 134,326 | 191,699 | 21.73 | 8,822 |
| 2009 | $121,005.30$ | 41,747 | 42,979 | 78,026 | 21.83 | 3,574 |
| 2010 | $12,084.50$ | 3,920 | 4,036 | 8,049 | 21.86 | 368 |
| 2012 | $22,423.04$ | 6,252 | 6,437 | 15,987 | 21.99 | 727 |
| 2019 | $97,992.10$ | 6,252 | 6,437 | 91,556 | 22.03 | 4,156 |
| 2020 | $57,417.26$ | 1,280 | 1,318 | 56,099 | 21.92 | 2,559 |
|  |  |  |  |  |  |  |
|  | $2,685,132.97$ | $1,304,532$ | $1,343,034$ | $1,342,099$ |  | 63,085 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WILSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2067

| 2012 | $638,406.46$ | 108,529 | 111,732 | 526,674 | 41.50 | 12,691 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2014 | $316,768.07$ | 42,637 | 43,896 | 272,873 | 41.81 | 6,527 |
|  | $955,174.53$ | 151,166 | 155,628 | 799,547 | 19,218 |  |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1899 | $28,257.88$ | 28,258 | 28,258 |
| ---: | ---: | ---: | ---: |
| 1900 | $5,845.15$ | 5,845 | 5,845 |
| 1902 | $4,578.31$ | 4,578 | 4,578 |
| 1903 | $2,923.42$ | 2,923 | 2,923 |
| 1904 | $20,727.21$ | 20,727 | 20,727 |
| 1906 | $1,356.83$ | 1,357 | 1,357 |
| 1909 | 694.82 | 695 | 695 |
| 1913 | $8,372.35$ | 8,372 | 8,372 |
| 1914 | $21,064.91$ | 21,065 | 21,065 |
| 1915 | 41.18 | 41 | 41 |
| 1917 | $11,634.24$ | 11,634 | 11,634 |
| 1918 | $39,833.40$ | 39,833 | 39,833 |
| 1919 | $78,367.01$ | 78,367 | 78,367 |
| 1920 | $2,780.38$ | 2,780 | 2,780 |
| 1921 | $55,853.31$ | 55,853 | 55,853 |
| 1922 | $195,706.74$ | 195,707 | 195,707 |
| 1923 | $120,747.22$ | 120,747 | 120,747 |
| 1924 | $536,689.11$ | 536,689 | 536,689 |
| 1925 | $298,786.19$ | 298,786 | 298,786 |
| 1926 | $98,785.59$ | 98,786 | 98,786 |
| 1927 | $92,173.51$ | 92,174 | 92,174 |
| 1928 | $96,566.49$ | 96,566 | 96,566 |
| 1929 | $36,332.19$ | 36,332 | 36,332 |
| 1930 | $8,925.31$ | 8,925 | 8,925 |
| 1931 | $14,011.96$ | 14,012 | 14,012 |
| 1932 | $4,958.48$ | 4,958 | 4,958 |
| 1933 | 396.66 | 397 | 397 |
| 1934 | 910.91 | 911 | 911 |
| 1935 | 42.39 | 151.67 | 42 |
| 1936 | $3,735.81$ | 188.95 | 3,736 |

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1939 | 7,456.01 | 7,456 | 7,456 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1940 | 1,696.52 | 1,697 | 1,697 |  |  |  |
| 1941 | 40,349.67 | 40,350 | 40,350 |  |  |  |
| 1942 | 29,503.66 | 29,504 | 29,504 |  |  |  |
| 1943 | 6,241.76 | 6,242 | 6,242 |  |  |  |
| 1944 | 5,298.74 | 5,299 | 5,299 |  |  |  |
| 1945 | 63,801.36 | 63,419 | 63,801 |  |  |  |
| 1946 | 171.70 | 170 | 172 |  |  |  |
| 1947 | 1,204.02 | 1,187 | 1,204 |  |  |  |
| 1948 | 59,034.07 | 57,919 | 59,034 |  |  |  |
| 1949 | 24,413.68 | 23,828 | 24,414 |  |  |  |
| 1950 | 43,160.37 | 41,894 | 43,160 |  |  |  |
| 1951 | 10,656.75 | 10,287 | 10,640 | 17 | 1.56 | 11 |
| 1952 | 16,383.54 | 15,725 | 16,264 | 119 | 1.81 | 66 |
| 1953 | 122,606.83 | 116,967 | 120,977 | 1,630 | 2.07 | 787 |
| 1954 | 117,523.47 | 111,464 | 115,285 | 2,238 | 2.32 | 965 |
| 1955 | 273,389.46 | 257,776 | 266,613 | 6,776 | 2.57 | 2,637 |
| 1956 | 89,935.67 | 84,280 | 87,169 | 2,766 | 2.83 | 977 |
| 1957 | 105,416.90 | 98,178 | 101,544 | 3,873 | 3.09 | 1,253 |
| 1958 | 255,240.65 | 236,241 | 244,340 | 10,901 | 3.35 | 3,254 |
| 1959 | 162,772.15 | 149,750 | 154,884 | 7,888 | 3.60 | 2,191 |
| 1960 | 131,199.25 | 119,945 | 124,057 | 7,142 | 3.86 | 1,850 |
| 1961 | 186,635.57 | 169,547 | 175,360 | 11,276 | 4.12 | 2,737 |
| 1962 | 43,563.78 | 39,324 | 40,672 | 2,892 | 4.38 | 660 |
| 1963 | 70,504.60 | 63,219 | 65,386 | 5,118 | 4.65 | 1,101 |
| 1964 | 61,348.82 | 54,642 | 56,515 | 4,834 | 4.92 | 983 |
| 1965 | 40,508.91 | 35,819 | 37,047 | 3,462 | 5.21 | 664 |
| 1966 | 36,110.82 | 31,697 | 32,784 | 3,327 | 5.50 | 605 |
| 1967 | 56,257.10 | 49,006 | 50,686 | 5,571 | 5.80 | 961 |
| 1968 | 113,715.06 | 98,250 | 101,618 | 12,097 | 6.12 | 1,977 |
| 1969 | 42,664.21 | 36,539 | 37,792 | 4,873 | 6.46 | 754 |
| 1970 | 388,316.97 | 329,553 | 340,851 | 47,466 | 6.81 | 6,970 |
| 1971 | 97,703.04 | 82,114 | 84,929 | 12,774 | 7.18 | 1,779 |
| 1972 | 598,508.42 | 497,959 | 515,031 | 83,478 | 7.56 | 11,042 |
| 1973 | 151,900.04 | 124,997 | 129,282 | 22,618 | 7.97 | 2,838 |
| 1974 | 242,417.84 | 197,166 | 203,925 | 38,492 | 8.40 | 4,582 |
| 1975 | 145,591.57 | 116,958 | 120,968 | 24,624 | 8.85 | 2,782 |
| 1976 | 84,931.81 | 67,342 | 69,651 | 15,281 | 9.32 | 1,640 |
| 1977 | 186,972.09 | 146,212 | 151,225 | 35,747 | 9.81 | 3,644 |
| 1978 | 141,673.37 | 109,183 | 112,926 | 28,747 | 10.32 | 2,786 |
| 1979 | 419, 060.32 | 318,021 | 328,924 | 90,137 | 10.85 | 8,308 |

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1980 | $79,399.27$ | 59,267 | 61,299 | 18,100 | 11.41 | 1,586 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1981 | $103,102.69$ | 75,655 | 78,249 | 24,854 | 11.98 | 2,075 |
| 1982 | $477,916.13$ | 344,420 | 356,228 | 121,688 | 12.57 | 9,681 |
| 1983 | $78,565.55$ | 59,513 | 61,553 | 17,012 | 12.00 | 1,418 |
| 1984 | $67,738.26$ | 50,438 | 52,167 | 15,571 | 12.52 | 1,244 |
| 1985 | $53,663.31$ | 39,244 | 40,589 | 13,074 | 13.04 | 1,003 |
| 1986 | $144,687.08$ | 103,336 | 106,879 | 37,808 | 13.81 | 2,738 |
| 1987 | $41,965.46$ | 29,384 | 30,391 | 11,574 | 14.34 | 807 |
| 1988 | $186,638.63$ | 127,997 | 132,385 | 54,253 | 14.89 | 3,644 |
| 1989 | $23,299.32$ | 15,634 | 16,170 | 7,129 | 15.45 | 461 |
| 1990 | $678,968.42$ | 443,163 | 458,356 | 220,612 | 16.23 | 13,593 |
| 1991 | $60,969.69$ | 38,850 | 40,182 | 20,788 | 16.80 | 1,237 |
| 1992 | $976,662.24$ | 606,800 | 627,603 | 349,059 | 17.37 | 20,096 |
| 1993 | $11,103.31$ | 6,686 | 6,915 | 4,188 | 18.16 | 231 |
| 1994 | $323,252.78$ | 189,297 | 195,787 | 127,466 | 18.75 | 6,798 |
| 1995 | $951,680.40$ | 538,746 | 557,216 | 394,464 | 19.55 | 20,177 |
| 1996 | $441,371.78$ | 242,225 | 250,529 | 190,843 | 20.14 | 9,476 |
| 1997 | $402,510.32$ | 213,773 | 221,102 | 181,409 | 20.75 | 8,743 |
| 1998 | $478,668.30$ | 244,504 | 252,886 | 225,782 | 21.55 | 10,477 |
| 1999 | $517,935.58$ | 255,031 | 263,774 | 254,161 | 22.17 | 11,464 |
| 2000 | $54,323.89$ | 25,614 | 26,492 | 27,832 | 22.98 | 1,211 |
| 2001 | $510,896.82$ | 231,130 | 239,054 | 271,843 | 23.60 | 11,519 |
| 2002 | $505,554.87$ | 217,894 | 225,364 | 280,191 | 24.42 | 11,474 |
| 2003 | $401,146.74$ | 164,952 | 170,607 | 230,540 | 25.06 | 9,200 |
| 2004 | $338,020.64$ | 131,625 | 136,138 | 201,883 | 25.87 | 7,804 |
| 2005 | $609,772.88$ | 224,031 | 231,711 | 378,061 | 26.69 | 14,165 |
| 2006 | $3,348,574.43$ | $1,160,616$ | $1,200,406$ | $2,148,169$ | 27.34 | 78,572 |
| 2007 | $904,314.58$ | 292,998 | 303,043 | 601,272 | 28.17 | 21,344 |
| 2008 | $649,940.93$ | 195,762 | 202,473 | 447,468 | 29.00 | 15,430 |
| 2009 | $3,634,634.67$ | $1,015,517$ | $1,050,332$ | $2,584,303$ | 29.65 | 87,160 |
| 2010 | $80,253.70$ | 20,561 | 21,266 | 58,988 | 30.48 | 1,935 |
| 2011 | $1,047,172.66$ | 243,782 | 252,140 | 795,033 | 31.31 | 25,392 |
| 2012 | $1,177,590.93$ | 246,234 | 254,676 | 922,915 | 32.15 | 28,707 |
| 2013 | $652,802.13$ | 121,421 | 125,584 | 527,218 | 32.82 | 16,064 |
| 2014 | $340,655.06$ | 55,118 | 57,008 | 283,647 | 33.66 | 8,427 |
| 2015 | $188,750.82$ | 25,953 | 26,843 | 161,908 | 34.50 | 4,693 |
| 2016 | $553,944.50$ | 62,817 | 64,971 | 488,974 | 35.18 | 13,899 |
| 2017 | $1,611,040.81$ | 142,738 | 147,632 | $1,463,409$ | 36.02 | 40,628 |
|  |  |  |  |  |  |  |


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 2018 | $1,010,061.03$ | 64,442 | 66,651 | 943,410 | 36.71 | 25,699 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | $276,361.40$ | 10,668 | 11,034 | 265,328 | 37.41 | 7,092 |
| 2020 | $53,813.84$ | 705 | 729 | 53,085 | 37.67 | 1,409 |
|  | $30,517,006.00$ | $14,177,104$ | $14,595,529$ | $15,921,477$ | 629,577 |  |
|  | $70,294,440.29$ | $40,219,424$ | $41,357,320$ | $28,937,121$ | $1,491,470$ |  |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 19.4 2.12

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R1

| 1900 | 1,695.10 | 1,695 | 1,695 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1906 | 68.73 | 69 | 69 |  |  |  |
| 1911 | 359.58 | 357 | 360 |  |  |  |
| 1913 | 171.18 | 168 | 171 |  |  |  |
| 1914 | 790.13 | 771 | 790 |  |  |  |
| 1915 | 231.67 | 225 | 232 |  |  |  |
| 1916 | 1,271.97 | 1,225 | 1,272 |  |  |  |
| 1917 | 6,495.00 | 6,217 | 6,495 |  |  |  |
| 1918 | 45,621.51 | 43,398 | 45,622 |  |  |  |
| 1919 | 7,808.66 | 7,381 | 7,809 |  |  |  |
| 1920 | 110,463.98 | 103,775 | 110,464 |  |  |  |
| 1921 | 48,090.74 | 44,917 | 48,091 |  |  |  |
| 1922 | 142,914.48 | 132,703 | 142,155 | 759 | 3.93 | 193 |
| 1923 | 37,319.41 | 34,449 | 36,903 | 416 | 4.23 | 98 |
| 1924 | 971,354.13 | 891,353 | 954,839 | 16,515 | 4.53 | 3,646 |
| 1925 | 469,016.75 | 427,912 | 458,390 | 10,627 | 4.82 | 2,205 |
| 1926 | 412,719.51 | 374,299 | 400,958 | 11,762 | 5.12 | 2,297 |
| 1927 | 363,476.05 | 327,655 | 350,992 | 12,484 | 5.42 | 2,303 |
| 1928 | 269,849.59 | 241,785 | 259,006 | 10,844 | 5.72 | 1,896 |
| 1929 | 101,226.68 | 90,147 | 96,568 | 4,659 | 6.02 | 774 |
| 1930 | 337,577.01 | 298,725 | 320,002 | 17,575 | 6.33 | 2,776 |
| 1931 | 8,897.76 | 7,824 | 8,381 | 517 | 6.64 | 78 |
| 1932 | 2,195.37 | 1,918 | 2,055 | 140 | 6.96 | 20 |
| 1933 | 37.47 | 33 | 35 | 2 | 7.28 |  |
| 1934 | 2,144.27 | 1,848 | 1,980 | 164 | 7.60 | 22 |
| 1935 | 16,763.82 | 14,347 | 15,369 | 1,395 | 7.93 | 176 |
| 1936 | 8,188.97 | 6,959 | 7,455 | 734 | 8.26 | 89 |
| 1937 | 28,459.83 | 24,015 | 25,725 | 2,735 | 8.59 | 318 |
| 1938 | 12,138.02 | 10,167 | 10,891 | 1,247 | 8.93 | 140 |
| 1939 | 4,344.35 | 3,611 | 3,868 | 476 | 9.28 | 51 |
| 1940 | 5,124.82 | 4,228 | 4,529 | 596 | 9.63 | 62 |
| 1941 | 208,793.93 | 170,908 | 183,081 | 25,713 | 9.98 | 2,576 |
| 1942 | 244,165.73 | 198,263 | 212,384 | 31,782 | 10.34 | 3,074 |
| 1943 | 65,589.44 | 52,829 | 56,592 | 8,997 | 10.70 | 841 |
| 1944 | 13,065.64 | 10,438 | 11,181 | 1,885 | 11.06 | 170 |
| 1945 | 76,275.49 | 60,410 | 64,713 | 11,562 | 11.44 | 1,011 |
| 1946 | 27,929.53 | 21,932 | 23,494 | 4,436 | 11.81 | 376 |
| 1947 | 35,162.64 | 27,369 | 29,318 | 5,845 | 12.19 | 479 |
| 1948 | 216,531.77 | 167,004 | 178,899 | 37,633 | 12.58 | 2,991 |
| 1949 | 377,933.09 | 288,809 | 309,379 | 68,554 | 12.97 | 5,286 |
| 1950 | 861,221.82 | 651,867 | 698,296 | 162,926 | 13.37 | 12,186 |
| 1951 | 315,389.61 | 236,429 | 253,269 | 62,121 | 13.77 | 4,511 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R1

| 1952 | $274,912.26$ | 204,084 | 218,620 | 56,292 | 14.17 | 3,973 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1953 | $637,879.84$ | 468,784 | 502,173 | 135,707 | 14.58 | 9,308 |
| 1954 | $272,956.65$ | 198,513 | 212,652 | 60,305 | 15.00 | 4,020 |
| 1955 | $1,836,184.67$ | $1,321,392$ | $1,415,508$ | 420,677 | 15.42 | 27,281 |
| 1956 | $1,007,857.04$ | 717,413 | 768,511 | 239,346 | 15.85 | 15,101 |
| 1957 | $1,103,519.08$ | 776,877 | 832,210 | 271,309 | 16.28 | 16,665 |
| 1958 | $661,301.61$ | 460,266 | 493,048 | 168,254 | 16.72 | 10,063 |
| 1959 | $1,643,010.00$ | $1,130,095$ | $1,210,586$ | 432,424 | 17.17 | 25,185 |
| 1960 | $416,101.72$ | 282,799 | 302,941 | 113,161 | 17.62 | 6,422 |
| 1961 | $1,099,858.25$ | 738,500 | 791,099 | 308,759 | 18.07 | 17,087 |
| 1962 | $152,141.01$ | 100,883 | 108,068 | 44,073 | 18.53 | 2,378 |
| 1963 | $371,467.61$ | 243,144 | 260,462 | 111,006 | 19.00 | 5,842 |
| 1964 | $793,720.76$ | 512,601 | 549,111 | 244,610 | 19.48 | 12,557 |
| 1965 | $251,131.65$ | 159,993 | 171,388 | 79,744 | 19.96 | 3,995 |
| 1966 | $878,534.52$ | 552,036 | 591,355 | 287,180 | 20.44 | 14,050 |
| 1967 | $1,277,324.14$ | 791,238 | 847,594 | 429,730 | 20.93 | 20,532 |
| 1968 | $1,514,253.90$ | 924,240 | 990,069 | 524,185 | 21.43 | 24,460 |
| 1969 | $757,317.14$ | 455,216 | 487,639 | 269,678 | 21.94 | 12,292 |
| 1970 | $2,562,760.21$ | $1,516,693$ | $1,624,719$ | 938,041 | 22.45 | 41,784 |
| 1971 | $281,183.28$ | 163,750 | 175,413 | 105,770 | 22.97 | 4,605 |
| 1972 | $7,927,077.20$ | $4,541,502$ | $4,864,969$ | $3,062,108$ | 23.49 | 130,358 |
| 1973 | $3,326,392.80$ | $1,873,657$ | $2,007,108$ | $1,319,285$ | 24.02 | 54,924 |
| 1974 | $1,481,384.03$ | 819,872 | 878,267 | 603,117 | 24.56 | 24,557 |
| 1975 | $4,869,518.72$ | $2,647,265$ | $2,835,816$ | $2,033,703$ | 25.10 | 81,024 |
| 1976 | $1,682,524.79$ | 897,863 | 961,813 | 720,712 | 25.65 | 28,098 |
| 1977 | $1,144,544.27$ | 599,329 | 642,016 | 502,528 | 26.20 | 19,180 |
| 1978 | $4,857,776.01$ | $2,493,351$ | $2,670,939$ | $2,186,837$ | 26.77 | 81,690 |
| 1979 | $4,240,201.48$ | $2,133,203$ | $2,285,140$ | $1,955,061$ | 27.33 | 71,535 |
| 1980 | $1,379,842.00$ | 679,641 | 728,048 | 651,794 | 27.91 | 23,353 |
| 1981 | $531,737.04$ | 256,297 | 274,552 | 257,185 | 28.49 | 9,027 |
| 1982 | $17,325,070.65$ | $8,167,905$ | $8,749,661$ | $8,575,410$ | 29.07 | 294,992 |
| 1983 | $990,637.35$ | 590,618 | 632,685 | 357,952 | 25.40 | 14,093 |
| 1984 | $2,296,763.10$ | $1,349,578$ | $1,445,701$ | 851,062 | 25.61 | 33,232 |
| 1985 | $1,156,401.51$ | 665,047 | 712,415 | 443,987 | 26.23 | 16,927 |
| 1986 | $6,278,488.08$ | $3,552,369$ | $3,805,385$ | $2,473,103$ | 26.48 | 93,395 |
| 1987 | $2,641,727.08$ | $1,460,347$ | $1,564,360$ | $1,077,367$ | 27.10 | 39,755 |
| 1988 | $5,185,911.70$ | $2,814,913$ | $3,015,404$ | $2,170,508$ | 27.38 | 79,273 |
| 1989 | $1,605,257.55$ | 854,639 | 915,510 | 689,748 | 27.67 | 24,928 |
| 1990 | $4,448,908.65$ | $2,306,759$ | $2,471,057$ | $1,977,852$ | 28.32 | 69,839 |
| 1991 | $4,329,874.59$ | $2,196,978$ | $2,353,457$ | $1,976,418$ | 28.64 | 69,009 |
| 1992 | $8,669,910.91$ | $4,299,409$ | $4,605,633$ | $4,064,278$ | 28.97 | 140,293 |
| 1993 | $2,431,974.55$ | $1,177,076$ | $1,260,913$ | $1,171,062$ | 29.32 | 39,941 |
|  |  |  |  |  |  |  |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R1

| 1994 | $817,998.63$ | 385,850 | 413,332 | 404,667 | 29.68 | 13,634 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1995 | $11,457,989.86$ | $5,229,427$ | $5,601,891$ | $5,856,099$ | 30.37 | 192,825 |
| 1996 | $13,608,196.64$ | $6,033,874$ | $6,463,635$ | $7,144,562$ | 30.75 | 232,343 |
| 1997 | $9,684,004.74$ | $4,187,364$ | $4,485,608$ | $5,198,397$ | 30.85 | 168,506 |
| 1998 | $3,105,187.57$ | $1,299,521$ | $1,392,079$ | $1,713,109$ | 31.26 | 54,802 |
| 1999 | $3,117,391.58$ | $1,260,050$ | $1,349,797$ | $1,767,595$ | 31.69 | 55,778 |
| 2000 | $6,991,586.37$ | $2,723,223$ | $2,917,184$ | $4,074,402$ | 32.13 | 126,810 |
| 2001 | $4,663,934.92$ | $1,755,505$ | $1,880,540$ | $2,783,395$ | 32.31 | 86,147 |
| 2002 | $5,243,074.44$ | $1,891,701$ | $2,026,437$ | $3,216,637$ | 32.78 | 98,128 |
| 2003 | $7,006,574.16$ | $2,427,778$ | $2,600,696$ | $4,405,878$ | 33.01 | 133,471 |
| 2004 | $10,365,071.33$ | $3,437,058$ | $3,681,861$ | $6,683,210$ | 33.25 | 200,999 |
| 2005 | $11,834,139.49$ | $3,741,955$ | $4,008,475$ | $7,825,664$ | 33.52 | 233,463 |
| 2006 | $43,352,245.55$ | $13,014,344$ | $13,941,286$ | $29,410,960$ | 33.81 | 869,889 |
| 2007 | $7,549,069.68$ | $2,149,975$ | $2,303,106$ | $5,245,964$ | 33.90 | 154,748 |
| 2008 | $15,109,077.37$ | $4,041,678$ | $4,329,545$ | $10,779,532$ | 34.23 | 314,915 |
| 2009 | $23,847,593.80$ | $5,978,592$ | $6,404,415$ | $17,443,179$ | 34.37 | 507,512 |
| 2010 | $16,855,495.33$ | $3,947,557$ | $4,228,721$ | $12,626,774$ | 34.34 | 367,699 |
| 2011 | $22,057,684.80$ | $4,777,695$ | $5,117,985$ | $16,939,700$ | 34.36 | 493,006 |
| 2012 | $39,021,850.68$ | $7,726,326$ | $8,276,631$ | $30,745,220$ | 34.42 | 893,237 |
| 2013 | $6,385,107.50$ | $1,144,211$ | $1,225,707$ | $5,159,400$ | 34.34 | 150,245 |
| 2014 | $10,395,839.88$ | $1,662,295$ | $1,780,691$ | $8,615,149$ | 34.15 | 252,274 |
| 2015 | $4,842,890.79$ | 676,552 | 724,739 | $4,118,152$ | 33.87 | 121,587 |
| 2016 | $6,026,495.49$ | 713,537 | 764,359 | $5,262,136$ | 33.52 | 156,985 |
| 2017 | $14,237,121.41$ | $1,369,611$ | $1,467,161$ | $12,769,960$ | 32.87 | 388,499 |
| 2018 | $13,686,565.80$ | 996,382 | $1,067,349$ | $12,619,217$ | 31.86 | 396,083 |
| 2019 | $21,871,629.13$ | $1,036,715$ | $1,110,555$ | $20,761,074$ | 30.15 | 688,593 |
| 2020 | $17,946,472.65$ | 339,188 | 363,347 | $17,583,126$ | 25.96 | 677,316 |
|  |  |  |  |  |  |  |
|  | $463,534,504.22$ | $147,034,533$ | $157,504,924$ | $306,029,581$ |  | $9,797,162$ |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5

| 1933 | 11.46 | 11 | 11 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1934 | 74.43 | 72 | 74 |  |  |  |
| 1937 | 7.41 | 7 | 7 |  |  |  |
| 1941 | 234.56 | 209 | 224 | 11 | 4.89 | 2 |
| 1943 | 618.50 | 540 | 578 | 40 | 5.73 | 7 |
| 1945 | 10,667.20 | 9,114 | 9,763 | 904 | 6.55 | 138 |
| 1946 | 962.46 | 814 | 872 | 90 | 6.96 | 13 |
| 1947 | 9,405.39 | 7,867 | 8,427 | 978 | 7.36 | 133 |
| 1948 | 43,430.45 | 35,941 | 38,500 | 4,930 | 7.76 | 635 |
| 1949 | 62,663.18 | 51,314 | 54,968 | 7,695 | 8.15 | 944 |
| 1951 | 8,467.22 | 6,783 | 7,266 | 1,201 | 8.95 | 134 |
| 1952 | 36,451.78 | 28,886 | 30,943 | 5,509 | 9.34 | 590 |
| 1953 | 29,764.14 | 23,322 | 24,983 | 4,781 | 9.74 | 491 |
| 1954 | 127, 209.74 | 98,546 | 105,564 | 21,646 | 10.14 | 2,135 |
| 1955 | 58,522.50 | 44,828 | 48,020 | 10,502 | 10.53 | 997 |
| 1956 | 255,231.36 | 193,238 | 206,999 | 48,232 | 10.93 | 4,413 |
| 1957 | 46,196.54 | 34,555 | 37,016 | 9,181 | 11.34 | 810 |
| 1958 | 83,545.02 | 61,749 | 66,146 | 17,399 | 11.74 | 1,482 |
| 1959 | 127,575.45 | 93,130 | 99,762 | 27,813 | 12.15 | 2,289 |
| 1960 | 207,932.73 | 149,897 | 160,571 | 47,362 | 12.56 | 3,771 |
| 1961 | 171,611.46 | 122,150 | 130,848 | 40,763 | 12.97 | 3,143 |
| 1962 | 47,725.97 | 33,525 | 35,912 | 11,814 | 13.39 | 882 |
| 1963 | 161,607.11 | 112,012 | 119,988 | 41,619 | 13.81 | 3,014 |
| 1964 | 129,258.28 | 88,384 | 94,678 | 34,580 | 14.23 | 2,430 |
| 1965 | 62,790.64 | 42,335 | 45,350 | 17,441 | 14.66 | 1,190 |
| 1966 | 239,854.57 | 159,424 | 170,777 | 69,078 | 15.09 | 4,578 |
| 1967 | 85,315.13 | 55,872 | 59,851 | 25,464 | 15.53 | 1,640 |
| 1968 | 119,744.09 | 77,248 | 82,749 | 36,995 | 15.97 | 2,317 |
| 1969 | 557,910.78 | 354,335 | 379,567 | 178,344 | 16.42 | 10,861 |
| 1970 | 1,330,420.68 | 831,659 | 890,882 | 439,539 | 16.87 | 26,054 |
| 1971 | 99,383.47 | 61,132 | 65,485 | 33,898 | 17.32 | 1,957 |
| 1972 | 496,307.64 | 300,212 | 321,590 | 174,718 | 17.78 | 9,827 |
| 1973 | 322,655.18 | 191,799 | 205,457 | 117,198 | 18.25 | 6,422 |
| 1974 | 317,682.17 | 185,526 | 198,737 | 118,945 | 18.72 | 6,354 |
| 1975 | 801,287.77 | 459,587 | 492,315 | 308,973 | 19.19 | 16,101 |
| 1976 | 641,341.82 | 361,005 | 386,712 | 254,630 | 19.67 | 12,945 |
| 1977 | 925,821.08 | 511,257 | 547,664 | 378,157 | 20.15 | 18,767 |
| 1978 | 555,189.34 | 300,541 | 321,943 | 233,246 | 20.64 | 11,301 |
| 1979 | 136,685.05 | 72,473 | 77,634 | 59,051 | 21.14 | 2,793 |
| 1980 | 272,979.97 | 141,707 | 151,798 | 121,182 | 21.64 | 5,600 |
| 1981 | 468, 025.29 | 237,757 | 254,688 | 213,337 | 22.14 | 9,636 |
| 1982 | 191,480.41 | 95,059 | 101,828 | 89,652 | 22.66 | 3,956 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5

| 2010 | $473,644.39$ | 131,768 | 141,151 | 332,493 | 27.24 | 12,206 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2011 | $3,843,562.05$ | 997,020 | $1,068,019$ | $2,775,543$ | 27.13 | 102,305 |
| 2013 | $83,022.68$ | 18,116 | 19,406 | 63,617 | 26.87 | 2,368 |
| 2015 | $12,783.07$ | 2,208 | 2,365 | 10,418 | 26.35 | 395 |
|  |  |  |  |  |  |  |
|  | $4,413,012.19$ | $1,149,112$ | $1,230,941$ | $3,182,071$ | 117,274 |  |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 27.1 2.66

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 364.11 POLES, TOWERS AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 58-R1

| 1912 | 1,819.38 | 1,735 | 1,819 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1914 | 9,359.44 | 8,820 | 9,359 |  |  |  |
| 1915 | 10.52 | 10 | 11 |  |  |  |
| 1916 | 7,269.69 | 6,773 | 7,270 |  |  |  |
| 1917 | 18,191.10 | 16,855 | 18,137 | 54 | 4.26 | 13 |
| 1918 | 3,802.22 | 3,503 | 3,769 | 33 | 4.56 | 7 |
| 1919 | 78.73 | 72 | 77 | 2 | 4.85 |  |
| 1920 | 58,606.96 | 53,403 | 57,465 | 1,142 | 5.15 | 222 |
| 1921 | 1,243.55 | 1,127 | 1,213 | 31 | 5.44 | 6 |
| 1922 | 11,391.59 | 10,264 | 11,045 | 347 | 5.74 | 60 |
| 1923 | 1,899.73 | 1,702 | 1,831 | 69 | 6.05 | 11 |
| 1924 | 31,903.96 | 28,411 | 30,572 | 1,332 | 6.35 | 210 |
| 1925 | 123,702.27 | 109,498 | 117,828 | 5,874 | 6.66 | 882 |
| 1926 | 54,205.21 | 47,691 | 51,319 | 2,886 | 6.97 | 414 |
| 1927 | 205,848.69 | 180,011 | 193,705 | 12,144 | 7.28 | 1,668 |
| 1928 | 139,045.37 | 120,826 | 130,018 | 9,027 | 7.60 | 1,188 |
| 1929 | 110,852.41 | 95,716 | 102,997 | 7,855 | 7.92 | 992 |
| 1930 | 152,490.58 | 130,800 | 140,750 | 11,741 | 8.25 | 1,423 |
| 1931 | 150,124.62 | 127,917 | 137,648 | 12,477 | 8.58 | 1,454 |
| 1932 | 57,742.69 | 48,872 | 52,590 | 5,153 | 8.91 | 578 |
| 1933 | 48,439.77 | 40,715 | 43,812 | 4,628 | 9.25 | 500 |
| 1934 | 66,749.74 | 55,713 | 59,951 | 6,799 | 9.59 | 709 |
| 1935 | 7,981.33 | 6,613 | 7,116 | 865 | 9.94 | 87 |
| 1936 | 67,492.92 | 55,519 | 59,742 | 7,751 | 10.29 | 753 |
| 1937 | 96,306.21 | 78,639 | 84,621 | 11,685 | 10.64 | 1,098 |
| 1938 | 33,187.37 | 26,893 | 28,939 | 4,248 | 11.00 | 386 |
| 1939 | 53,316.39 | 42,874 | 46,136 | 7,180 | 11.36 | 632 |
| 1940 | 36,426.19 | 29,059 | 31,270 | 5,156 | 11.73 | 440 |
| 1941 | 110,351.53 | 87,330 | 93,973 | 16,379 | 12.10 | 1,354 |
| 1942 | 99,724.88 | 78,267 | 84,221 | 15,504 | 12.48 | 1,242 |
| 1943 | 14,890.33 | 11,589 | 12,471 | 2,419 | 12.86 | 188 |
| 1944 | 6,544.94 | 5,050 | 5,434 | 1,111 | 13.25 | 84 |
| 1945 | 12,082.60 | 9,241 | 9,944 | 2,139 | 13.64 | 157 |
| 1946 | 21.53 | 16 | 17 | 5 | 14.03 |  |
| 1947 | 9,979.38 | 7,497 | 8,067 | 1,912 | 14.43 | 133 |
| 1948 | 270,851.99 | 201,552 | 216,885 | 53,967 | 14.84 | 3,637 |
| 1949 | 326,523.13 | 240,670 | 258,978 | 67,545 | 15.25 | 4,429 |
| 1950 | 398,122.76 | 290,630 | 312,739 | 85,384 | 15.66 | 5,452 |
| 1951 | 561,457.29 | 405,799 | 436,669 | 124,788 | 16.08 | 7,760 |
| 1952 | 669,230.17 | 478,727 | 515,145 | 154,085 | 16.51 | 9,333 |
| 1953 | 864,438.88 | 611,962 | 658,515 | 205,924 | 16.94 | 12,156 |
| 1954 | 1,127,944.89 | 790,148 | 850,256 | 277,689 | 17.37 | 15,987 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 364.11 POLES, TOWERS AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 58-R1

| 1955 | 909,120.09 | 629,802 | 677,713 | 231,407 | 17.82 | 12,986 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1956 | 950,478.73 | 651,240 | 700,781 | 249,698 | 18.26 | 13,675 |
| 1957 | 1,228, 204.25 | 831,998 | 895,290 | 332,914 | 18.71 | 17,793 |
| 1958 | 1,223,448.40 | 819,074 | 881,383 | 342,065 | 19.17 | 17,844 |
| 1959 | 1,595,631.91 | 1,055,590 | 1,135,891 | 459,741 | 19.63 | 23,420 |
| 1960 | 1,460,339.28 | 954,259 | 1,026,852 | 433,487 | 20.10 | 21,567 |
| 1961 | 995,036.44 | 641,968 | 690,804 | 304,232 | 20.58 | 14,783 |
| 1962 | 1,160,043.67 | 738,832 | 795,037 | 365,007 | 21.06 | 17,332 |
| 1963 | 1,022,563.20 | 642,804 | 691,704 | 330,859 | 21.54 | 15,360 |
| 1964 | 1,111,347.62 | 689,036 | 741,453 | 369,895 | 22.04 | 16,783 |
| 1965 | 1,333,433.70 | 815,461 | 877,495 | 455,939 | 22.53 | 20,237 |
| 1966 | 1,318,537.73 | 794,762 | 855,221 | 463,317 | 23.04 | 20,109 |
| 1967 | 2,245,692.38 | 1,333,874 | 1,435,345 | 810,347 | 23.55 | 34,410 |
| 1968 | 1,467,499.57 | 858,737 | 924,063 | 543,437 | 24.06 | 22,587 |
| 1969 | 1,325,298.75 | 763,650 | 821,743 | 503,556 | 24.58 | 20,486 |
| 1970 | 3,434,718.92 | 1,947,726 | 2,095,894 | 1,338,825 | 25.11 | 53,318 |
| 1971 | 1,797,093.22 | 1,002,347 | 1,078,598 | 718,495 | 25.65 | 28,012 |
| 1972 | 2,650,602.89 | 1,453,723 | 1,564,311 | 1,086,292 | 26.19 | 41,477 |
| 1973 | 3, 255, 663.32 | 1,755,258 | 1,888,785 | 1,366,878 | 26.73 | 51,136 |
| 1974 | 5,186,522.51 | 2,747,094 | 2,956,072 | 2,230,451 | 27.28 | 81,761 |
| 1975 | 5,332, 013.73 | 2,772,647 | 2,983,569 | 2,348,445 | 27.84 | 84,355 |
| 1976 | 5,845,454.89 | 2,982,176 | 3,209,037 | 2,636,418 | 28.41 | 92,799 |
| 1977 | 5,357, 769.76 | 2,681,671 | 2,885,672 | 2,472,098 | 28.97 | 85,333 |
| 1978 | 4,223,549.15 | 2,071,735 | 2,229,337 | 1,994,212 | 29.55 | 67,486 |
| 1979 | 5,140,516.10 | 2,470,121 | 2,658,029 | 2,482,487 | 30.13 | 82,393 |
| 1980 | 6,395,552.99 | 3,008,084 | 3,236,916 | 3,158,637 | 30.72 | 102,820 |
| 1981 | 4,910,306.77 | 2,259,576 | 2,431,467 | 2,478,840 | 31.31 | 79,171 |
| 1982 | 6,453,865.86 | 2,903,142 | 3,123,991 | 3,329,875 | 31.91 | 104,352 |
| 1983 | 6,926,085.68 | 3,999,814 | 4,304,089 | 2,621,997 | 27.44 | 95,554 |
| 1984 | 6,379,788.09 | 3,609,684 | 3,884,281 | 2,495,507 | 28.01 | 89,093 |
| 1985 | 8,393,193.60 | 4,678,366 | 5,034,260 | 3,358,934 | 28.19 | 119,153 |
| 1986 | 8,102,863.90 | 4,416,871 | 4,752,873 | 3,349,991 | 28.79 | 116,360 |
| 1987 | 7,626,750.68 | 4,087,938 | 4,398,917 | 3,227,834 | 29.00 | 111,305 |
| 1988 | 8,866,849.92 | 4,639,136 | 4,992,046 | 3,874,804 | 29.61 | 130,861 |
| 1989 | 8,666,873.07 | 4,449,573 | 4,788,062 | 3,878,811 | 29.85 | 129,943 |
| 1990 | 9,144,705.72 | 4,574,182 | 4,922,151 | 4,222,555 | 30.48 | 138,535 |
| 1991 | 10,386,855.26 | 5,086,443 | 5,473,380 | 4,913,475 | 30.74 | 159,840 |
| 1992 | 11,556,572.65 | 5,500,929 | 5,919,397 | 5,637,176 | 31.38 | 179,642 |
| 1993 | 8,648,988.58 | 4,020,050 | 4,325,865 | 4,323,124 | 31.67 | 136,505 |
| 1994 | 9,708, 030.21 | 4,399,679 | 4,734,373 | 4,973,657 | 31.98 | 155,524 |
| 1995 | 9,319, 612. 23 | 4,111,813 | 4, 424, 608 | 4,895,004 | 32.30 | 151,548 |
| 1996 | 9,452,117.61 | 4,053,068 | 4,361,394 | 5,090,724 | 32.64 | 155,966 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 364.11 POLES, TOWERS AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 58-R1

| 1997 | $14,382,063.46$ | $5,982,938$ | $6,438,074$ | $7,943,989$ | 32.99 | 240,800 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1998 | $2,067,285.13$ | 832,702 | 896,048 | $1,171,237$ | 33.36 | 35,109 |
| 1999 | $365,334.79$ | 142,188 | 153,005 | 212,330 | 33.75 | 6,291 |
| 2000 | $1,404,918.17$ | 527,125 | 567,225 | 837,693 | 34.14 | 24,537 |
| 2001 | $2,737,110.62$ | 987,550 | $1,062,675$ | $1,674,436$ | 34.55 | 48,464 |
| 2002 | $2,734,819.18$ | 951,170 | $1,023,528$ | $1,711,291$ | 34.69 | 49,331 |
| 2003 | $5,564,760.82$ | $1,850,283$ | $1,991,038$ | $3,573,723$ | 35.13 | 101,729 |
| 2004 | $7,424,638.91$ | $2,364,005$ | $2,543,840$ | $4,880,799$ | 35.32 | 138,188 |
| 2005 | $7,546,711.35$ | $2,292,691$ | $2,467,101$ | $5,079,610$ | 35.52 | 143,007 |
| 2006 | $10,983,437.71$ | $3,169,820$ | $3,410,956$ | $7,572,482$ | 35.75 | 211,818 |
| 2007 | $5,582,684.43$ | $1,522,398$ | $1,638,210$ | $3,944,474$ | 36.00 | 109,569 |
| 2008 | $7,139,969.64$ | $1,838,542$ | $1,978,404$ | $5,161,566$ | 36.04 | 143,218 |
| 2009 | $8,207,310.34$ | $1,973,037$ | $2,123,131$ | $6,084,179$ | 36.34 | 167,424 |
| 2010 | $12,389,507.22$ | $2,783,922$ | $2,995,701$ | $9,393,806$ | 36.23 | 259,283 |
| 2011 | $21,799,862.85$ | $4,514,752$ | $4,858,200$ | $16,941,663$ | 36.37 | 465,814 |
| 2012 | $19,363,358.08$ | $3,671,293$ | $3,950,577$ | $15,412,781$ | 36.34 | 424,127 |
| 2013 | $24,830,700.41$ | $4,265,914$ | $4,590,432$ | $20,240,268$ | 36.17 | 559,587 |
| 2014 | $14,922,582.13$ | $2,280,171$ | $2,453,629$ | $12,468,953$ | 36.05 | 345,879 |
| 2015 | $13,731,171.73$ | $1,834,485$ | $1,974,038$ | $11,757,134$ | 35.65 | 329,793 |
| 2016 | $14,643,510.53$ | $1,660,574$ | $1,786,898$ | $12,856,613$ | 35.18 | 365,452 |
| 2017 | $25,434,282.48$ | $2,339,954$ | $2,517,960$ | $22,916,322$ | 34.52 | 663,856 |
| 2018 | $53,082,562.69$ | $3,689,238$ | $3,969,886$ | $49,112,677$ | 33.47 | $1,467,364$ |
| 2019 | $49,560,878.48$ | $2,245,108$ | $2,415,899$ | $47,144,979$ | 31.61 | $1,491,458$ |
| 2020 | $62,189,019.59$ | $1,119,402$ | $1,204,557$ | $60,984,462$ | 27.28 | $2,235,501$ |
|  |  |  |  |  |  |  |
|  | $596,619,726.70$ | $163,291,704$ | $175,713,485$ | $420,906,242$ |  | $13,216,858$ |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 50-R0.5

| 1929 | 35.06 | 32 | 33 | 2 | 4.04 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1934 | 1,961.41 | 1,718 | 1,754 | 207 | 6.21 | 33 |
| 1935 | 16,734.97 | 14,519 | 14,822 | 1,913 | 6.62 | 289 |
| 1936 | 18,086.10 | 15,543 | 15,867 | 2,219 | 7.03 | 316 |
| 1937 | 18,772.84 | 15,979 | 16,312 | 2,461 | 7.44 | 331 |
| 1938 | 7,848.95 | 6,618 | 6,756 | 1,093 | 7.84 | 139 |
| 1940 | 14,060.14 | 11,631 | 11,874 | 2,186 | 8.64 | 253 |
| 1941 | 62,784.07 | 51,433 | 52,506 | 10,278 | 9.04 | 1,137 |
| 1942 | 51,729.75 | 41,974 | 42,850 | 8,880 | 9.43 | 942 |
| 1943 | 23,373.12 | 18,778 | 19,170 | 4,203 | 9.83 | 428 |
| 1944 | 9,565.54 | 7,608 | 7,767 | 1,799 | 10.23 | 176 |
| 1945 | 38,244.27 | 30,121 | 30,749 | 7,495 | 10.62 | 706 |
| 1946 | 52,933.06 | 41,267 | 42,128 | 10,805 | 11.02 | 980 |
| 1947 | 99,971.71 | 77,138 | 78,747 | 21,225 | 11.42 | 1,859 |
| 1948 | 177,830.91 | 135,792 | 138,625 | 39,206 | 11.82 | 3,317 |
| 1949 | 367,125.45 | 277,400 | 283,187 | 83,938 | 12.22 | 6,869 |
| 1950 | 437,095.69 | 326,773 | 333,591 | 103,505 | 12.62 | 8,202 |
| 1951 | 447,579.52 | 331,030 | 337,936 | 109,644 | 13.02 | 8,421 |
| 1952 | 636,554.58 | 465,576 | 475,289 | 161,266 | 13.43 | 12,008 |
| 1953 | 787,623.02 | 569,609 | 581,493 | 206,130 | 13.84 | 14,894 |
| 1954 | 687,393.64 | 491,486 | 501,740 | 185,654 | 14.25 | 13,028 |
| 1955 | 738,699.03 | 521,965 | 532,855 | 205,844 | 14.67 | 14,032 |
| 1956 | 900,457.44 | 628,699 | 641,816 | 258,641 | 15.09 | 17,140 |
| 1957 | 953,185.42 | 657,507 | 671,225 | 281,960 | 15.51 | 18,179 |
| 1958 | 901,474.99 | 614,265 | 627,081 | 274,394 | 15.93 | 17,225 |
| 1959 | 1,223,633.59 | 823,261 | 840,437 | 383,197 | 16.36 | 23,423 |
| 1960 | 1,234,033.44 | 819,398 | 836,493 | 397,540 | 16.80 | 23,663 |
| 1961 | 763,766.57 | 500,573 | 511,017 | 252,750 | 17.23 | 14,669 |
| 1962 | 1,010,182.44 | 653,184 | 666,812 | 343,370 | 17.67 | 19,432 |
| 1963 | 882,698.47 | 562,809 | 574,551 | 308,147 | 18.12 | 17,006 |
| 1964 | 1,034,362.61 | 650,200 | 663,765 | 370,598 | 18.57 | 19,957 |
| 1965 | 1,231,713.32 | 763,170 | 779,092 | 452,621 | 19.02 | 23,797 |
| 1966 | 1,153,141.04 | 703,877 | 718,562 | 434,579 | 19.48 | 22,309 |
| 1967 | 1,060,222.69 | 637,406 | 650,704 | 409,519 | 19.94 | 20,538 |
| 1968 | 1,245,303.16 | 737,219 | 752,600 | 492,703 | 20.40 | 24,152 |
| 1969 | 1,334, 274.65 | 777,348 | 793,566 | 540,709 | 20.87 | 25,908 |
| 1970 | 3,788,613.46 | 2,170,876 | 2,216,167 | 1,572,446 | 21.35 | 73,651 |
| 1971 | 1,667,380.86 | 939,402 | 959,001 | 708,380 | 21.83 | 32,450 |
| 1972 | 2,606,483.51 | 1,443,471 | 1,473,586 | 1,132,898 | 22.31 | 50,780 |
| 1973 | 3,268,383.25 | 1,778,000 | 1,815,095 | 1,453,288 | 22.80 | 63,741 |
| 1974 | 5,682,502.89 | 3,035,593 | 3,098,925 | 2,583,578 | 23.29 | 110,931 |
| 1975 | 6,185,514.40 | 3,242,447 | 3,310,095 | 2,875,419 | 23.79 | 120,867 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 50-R0.5

| 1976 | 5,887,971.14 | 3,026,417 | 3,089,558 | 2,798,413 | 24.30 | 115,161 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1977 | 5,603,724.14 | 2,824,277 | 2,883,200 | 2,720,524 | 24.80 | 109,699 |
| 1978 | 4,461,456.64 | 2,202,175 | 2,248,119 | 2,213,338 | 25.32 | 87,415 |
| 1979 | 4,549,943.23 | 2,199,443 | 2,245,330 | 2,304,613 | 25.83 | 89,222 |
| 1980 | 6,116,522.39 | 2,893,115 | 2,953,475 | 3,163,047 | 26.35 | 120,040 |
| 1981 | 4,139,253.66 | 1,913,991 | 1,953,923 | 2,185,331 | 26.88 | 81,300 |
| 1982 | 4,473, 673.88 | 2,021,206 | 2,063,375 | 2,410,299 | 27.41 | 87,935 |
| 1983 | 4,489,346.37 | 2,760,948 | 2,818,550 | 1,670,796 | 23.48 | 71,158 |
| 1984 | 3,974,258.69 | 2,393,299 | 2,443,231 | 1,531,028 | 24.11 | 63,502 |
| 1985 | $4,562,638.07$ | 2,704,732 | 2,761,161 | 1,801,477 | 24.38 | 73,892 |
| 1986 | 4, 650,478. 02 | 2,711,229 | 2,767,794 | 1,882,684 | 24.67 | 76,315 |
| 1987 | 3,834,818.24 | 2,196,584 | 2,242,412 | 1,592,406 | 24.98 | 63,747 |
| 1988 | 3,589,033.07 | 2,017,754 | 2,059,851 | 1,529,182 | 25.31 | 60,418 |
| 1989 | 4,797,987.05 | 2,644,650 | 2,699,826 | 2,098,161 | 25.65 | 81,800 |
| 1990 | 5,159,903.62 | 2,785,316 | 2,843,427 | 2,316,477 | 26.00 | 89,095 |
| 1991 | 6,433,003.38 | 3,396,626 | 3,467,490 | 2,965,513 | 26.37 | 112,458 |
| 1992 | 7,160,343.99 | 3,693,305 | 3,770,359 | 3,389,985 | 26.75 | 126,728 |
| 1993 | 4,824,283.29 | 2,427,579 | 2,478,226 | 2,346,057 | 27.15 | 86,411 |
| 1994 | 4,313,287.39 | 2,126,019 | 2,170,375 | 2,142,912 | 27.26 | 78,610 |
| 1995 | 3,233,482.23 | 1,550,131 | 1,582,472 | 1,651,010 | 27.69 | 59,625 |
| 1996 | 7,085,653.54 | 3,316,086 | 3,385,270 | 3,700,384 | 27.85 | 132,868 |
| 1997 | 6,205,829.26 | 2,814,964 | 2,873,693 | 3,332,136 | 28.31 | 117,702 |
| 1998 | 2,289,666.39 | 1,009,743 | 1,030,809 | 1,258,857 | 28.52 | 44,139 |
| 1999 | 8, 025,700.22 | 3,433,395 | 3,505,027 | 4,520,673 | 28.75 | 157,241 |
| 2000 | 5,040,756.89 | 2,087,377 | 2,130,926 | 2,909,831 | 29.00 | 100,339 |
| 2001 | 20,254,247.79 | 8,097,648 | 8,266,591 | 11,987,657 | 29.28 | 409,415 |
| 2002 | 12,934,097.40 | 4,977,041 | 5,080,878 | 7,853,219 | 29.58 | 265,491 |
| 2003 | 3,907,977.68 | 1,449,860 | 1,480,109 | 2,427,869 | 29.67 | 81,829 |
| 2004 | 9,464,919.99 | 3,373,297 | 3,443,675 | 6,021,245 | 29.80 | 202,055 |
| 2005 | 16,801,495.58 | 5,729,310 | 5,848,842 | 10,952,654 | 29.95 | 365,698 |
| 2006 | 9,890,208.80 | 3,212,340 | 3,279,360 | 6,610,849 | 30.14 | 219,338 |
| 2007 | 3,905,827.88 | 1,207,682 | 1,232,878 | 2,672,950 | 30.17 | 88,596 |
| 2008 | 10,651,108.92 | 3,115,449 | 3,180,447 | 7,470,662 | 30.24 | 247,046 |
| 2009 | 15,386,251.35 | 4,246,605 | 4,335,203 | 11,051,048 | 30.17 | 366,293 |
| 2010 | 55,192,290.50 | 14,256,169 | 14,553,598 | 40,638,692 | 30.15 | 1,347,884 |
| 2011 | 1,719,384.60 | 413,340 | 421,964 | 1,297,421 | 30.02 | 43,219 |
| 2012 | 24,427,032.98 | 5,398,374 | 5,511,001 | 18,916,032 | 29.96 | 631,376 |
| 2013 | 10,299,192.29 | 2,078,377 | 2,121,739 | 8,177,453 | 29.67 | 275,614 |
| 2014 | 13,149,533.30 | 2,385,325 | 2,435,090 | 10,714,443 | 29.34 | 365,182 |
| 2015 | 13,707,351.16 | 2,186,323 | 2,231,937 | 11,475,414 | 28.98 | 395,977 |
| 2016 | 13,102,776.83 | 1,797,701 | 1,835,207 | 11,267,570 | 28.29 | 398,288 |
| 2017 | 30,492,272.27 | 3,445,627 | 3,517,514 | 26,974,758 | 27.46 | 982,329 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 50-R0.5

| 2018 | $46,312,357.65$ | $4,019,913$ | $4,103,781$ | $42,208,577$ | 26.32 | $1,603,669$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | $46,708,375.89$ | $2,704,415$ | $2,760,837$ | $43,947,539$ | 24.41 | $1,800,391$ |
| 2020 | $50,539,482.06$ | $1,223,055$ | $1,248,572$ | $49,290,910$ | 20.12 | $2,449,846$ |
|  | $576,572,530.74$ | $164,060,907$ | $167,483,743$ | $409,088,788$ |  | $15,654,534$ |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT $\ldots 26.1$ | 2.72 |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 366 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 75-R4

| 1891 | 2,281.69 | 2,282 | 2,282 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1896 | 8,447.94 | 8,448 | 8,448 |  |  |  |
| 1897 | 4,610.73 | 4,611 | 4,611 |  |  |  |
| 1898 | 2,260.74 | 2,261 | 2,261 |  |  |  |
| 1899 | 20,934.16 | 20,934 | 20,934 |  |  |  |
| 1900 | 1,342.94 | 1,343 | 1,343 |  |  |  |
| 1901 | 10,128.24 | 10,128 | 10,128 |  |  |  |
| 1902 | 53,646.85 | 53,647 | 53,647 |  |  |  |
| 1903 | 18,556.93 | 18,557 | 18,557 |  |  |  |
| 1904 | 2,656.35 | 2,656 | 2,656 |  |  |  |
| 1905 | 4,658.35 | 4,658 | 4,658 |  |  |  |
| 1906 | 1,406.35 | 1,404 | 1,405 | 1 | 0.12 | 1 |
| 1907 | 21,049.99 | 20,969 | 20,981 | 69 | 0.29 | 69 |
| 1908 | 4,128.20 | 4,101 | 4,103 | 25 | 0.50 | 25 |
| 1909 | 3.37 | 3 | 3 |  |  |  |
| 1910 | 11,465.01 | 11,340 | 11,347 | 118 | 0.82 | 118 |
| 1911 | 10,893.49 | 10,742 | 10,748 | 145 | 1.04 | 139 |
| 1912 | 10,321.82 | 10,155 | 10,161 | 161 | 1.21 | 133 |
| 1913 | 222,349.72 | 218,141 | 218,267 | 4,083 | 1.42 | 2,875 |
| 1914 | 51,054.95 | 49,932 | 49,961 | 1,094 | 1.65 | 663 |
| 1915 | 41,453.02 | 40,430 | 40,453 | 1,000 | 1.85 | 541 |
| 1916 | 55,705.43 | 54,168 | 54,199 | 1,506 | 2.07 | 728 |
| 1917 | 65,022.93 | 63,020 | 63,056 | 1,967 | 2.31 | 852 |
| 1918 | 678.26 | 655 | 655 | 23 | 2.53 | 9 |
| 1919 | 35,149.26 | 33,851 | 33,871 | 1,278 | 2.77 | 461 |
| 1920 | 29,892.78 | 28,689 | 28,706 | 1,187 | 3.02 | 393 |
| 1921 | 59,947.51 | 57,342 | 57,375 | 2,573 | 3.26 | 789 |
| 1922 | 322,227.00 | 307,147 | 307,325 | 14,902 | 3.51 | 4,246 |
| 1923 | 506,928.34 | 481,445 | 481,724 | 25,204 | 3.77 | 6,685 |
| 1924 | 509,980.90 | 482,646 | 482,925 | 27,056 | 4.02 | 6,730 |
| 1925 | 507,901.12 | 478,915 | 479,192 | 28,709 | 4.28 | 6,708 |
| 1926 | 519,088.76 | 487,668 | 487,950 | 31,139 | 4.54 | 6,859 |
| 1927 | 886,863.72 | 830,104 | 830,585 | 56,279 | 4.80 | 11,725 |
| 1928 | 397,984.43 | 371,081 | 371,296 | 26,688 | 5.07 | 5,264 |
| 1929 | 578,545.22 | 537,353 | 537,664 | 40,881 | 5.34 | 7,656 |
| 1930 | 329,321.68 | 304,688 | 304,864 | 24,458 | 5.61 | 4,360 |
| 1931 | 318,532.08 | 293,518 | 293,688 | 24,844 | 5.89 | 4,218 |
| 1932 | 86,608.46 | 79,483 | 79,529 | 7,079 | 6.17 | 1,147 |
| 1933 | 85,499.81 | 78,136 | 78,181 | 7,319 | 6.46 | 1,133 |
| 1934 | 64,616.54 | 58,801 | 58,835 | 5,782 | 6.75 | 857 |
| 1935 | 97,551.54 | 88,382 | 88,433 | 9,119 | 7.05 | 1,293 |
| 1936 | 26,250.95 | 23,675 | 23,689 | 2,562 | 7.36 | 348 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 366 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 75-R4

| 1937 | $72,896.41$ | 65,432 | 65,470 | 7,426 | 7.68 | 967 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1938 | $12,448.94$ | 11,119 | 11,125 | 1,324 | 8.01 | 165 |
| 1939 | $67,667.95$ | 60,134 | 60,169 | 7,499 | 8.35 | 898 |
| 1940 | $21,697.63$ | 19,178 | 19,189 | 2,509 | 8.71 | 288 |
| 1941 | $210,218.05$ | 184,767 | 184,874 | 25,344 | 9.08 | 2,791 |
| 1942 | $66,502.17$ | 58,105 | 58,139 | 8,363 | 9.47 | 883 |
| 1943 | $60,383.97$ | 52,430 | 52,460 | 7,924 | 9.88 | 802 |
| 1944 | $7,627.87$ | 6,580 | 6,584 | 1,044 | 10.30 | 101 |
| 1945 | $81,803.46$ | 70,079 | 70,120 | 11,683 | 10.75 | 1,087 |
| 1946 | $8,987.46$ | 7,644 | 7,648 | 1,339 | 11.21 | 119 |
| 1947 | $34,128.58$ | 28,805 | 28,822 | 5,307 | 11.70 | 454 |
| 1948 | $100,639.43$ | 84,255 | 84,304 | 16,335 | 12.21 | 1,338 |
| 1949 | $164,987.84$ | 136,961 | 137,040 | 27,948 | 12.74 | 2,194 |
| 1950 | $240,288.80$ | 197,710 | 197,824 | 42,465 | 13.29 | 3,195 |
| 1951 | $101,995.41$ | 83,147 | 83,195 | 18,800 | 13.86 | 1,356 |
| 1952 | $167,161.76$ | 134,933 | 135,011 | 32,151 | 14.46 | 2,223 |
| 1953 | $371,037.38$ | 296,485 | 296,657 | 74,380 | 15.07 | 4,936 |
| 1954 | $493,007.63$ | 389,806 | 390,032 | 102,976 | 15.70 | 6,559 |
| 1955 | $402,695.42$ | 314,960 | 315,142 | 87,553 | 16.34 | 5,358 |
| 1956 | $313,954.69$ | 242,791 | 242,932 | 71,023 | 17.00 | 4,178 |
| 1957 | $190,957.23$ | 145,968 | 146,053 | 44,904 | 17.67 | 2,541 |
| 1958 | $481,092.85$ | 363,384 | 363,594 | 117,499 | 18.35 | 6,403 |
| 1959 | $242,967.30$ | 181,319 | 181,424 | 61,543 | 19.03 | 3,234 |
| 1960 | $308,603.60$ | 227,419 | 227,551 | 81,053 | 19.73 | 4,108 |
| 1961 | $689,253.89$ | 501,412 | 501,702 | 187,552 | 20.44 | 9,176 |
| 1962 | $593,522.02$ | 426,149 | 426,396 | 167,126 | 21.15 | 7,902 |
| 1963 | $114,838.79$ | 81,337 | 81,384 | 33,455 | 21.88 | 1,529 |
| 1964 | $213,040.91$ | 148,815 | 148,901 | 64,140 | 22.61 | 2,837 |
| 1965 | $908,694.07$ | 625,663 | 626,025 | 282,669 | 23.36 | 12,101 |
| 1966 | $291,129.50$ | 197,540 | 197,654 | 93,476 | 24.11 | 3,877 |
| 1967 | $992,334.27$ | 663,147 | 663,531 | 328,803 | 24.88 | 13,216 |
| 1968 | $273,767.63$ | 180,139 | 180,243 | 93,525 | 25.65 | 3,646 |
| 1969 | $1,228,480.49$ | 795,404 | 795,864 | 432,616 | 26.44 | 16,362 |
| 1970 | $1,455,070.47$ | 926,778 | 927,315 | 527,755 | 27.23 | 19,381 |
| 1971 | $3,220,438.54$ | $2,016,413$ | $2,017,580$ | $1,202,859$ | 28.04 | 42,898 |
| 1972 | $1,529,313.17$ | 941,032 | 941,577 | 587,736 | 28.85 | 20,372 |
| 1973 | $2,306,134.01$ | $1,393,528$ | $1,394,335$ | 911,799 | 29.68 | 30,721 |
| 1974 | $3,051,616.55$ | $1,810,219$ | $1,811,267$ | $1,240,350$ | 30.51 | 40,654 |
| 1975 | $1,804,653.58$ | $1,050,308$ | $1,050,916$ | 753,738 | 31.35 | 24,043 |
| 1976 | $1,455,441.41$ | 830,373 | 830,854 | 624,587 | 32.21 | 19,391 |
| 1977 | $1,011,437.29$ | 565,464 | 565,791 | 445,646 | 33.07 | 13,476 |
| 1978 | $2,343,351.21$ | $1,282,914$ | $1,283,657$ | $1,059,694$ | 33.94 | 31,223 |
|  |  |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 366 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 75-R4

| 1979 | $1,795,772.79$ | 962,301 | 962,858 | 832,915 | 34.81 | 23,927 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1980 | $2,887,071.58$ | $1,512,826$ | $1,513,702$ | $1,373,370$ | 35.70 | 38,470 |
| 1981 | $938,090.34$ | 480,424 | 480,702 | 457,388 | 36.59 | 12,500 |
| 1982 | $3,316,282.06$ | $1,658,572$ | $1,659,532$ | $1,656,750$ | 37.49 | 44,192 |
| 1983 | $3,000,905.36$ | $1,541,865$ | $1,542,758$ | $1,458,147$ | 35.49 | 41,086 |
| 1984 | $3,274,312.94$ | $1,649,271$ | $1,650,226$ | $1,624,087$ | 35.96 | 45,164 |
| 1985 | $2,019,881.06$ | 989,540 | 990,113 | $1,029,768$ | 36.96 | 27,862 |
| 1986 | $4,988,459.95$ | $2,375,006$ | $2,376,381$ | $2,612,079$ | 37.96 | 68,811 |
| 1987 | $1,253,544.81$ | 579,514 | 579,849 | 673,696 | 38.96 | 17,292 |
| 1988 | $1,635,451.71$ | 738,897 | 739,325 | 896,127 | 39.44 | 22,721 |
| 1989 | $3,310,310.58$ | $1,449,254$ | $1,450,093$ | $1,860,218$ | 40.45 | 45,988 |
| 1990 | $2,626,955.48$ | $1,113,829$ | $1,114,474$ | $1,512,481$ | 41.44 | 36,498 |
| 1991 | $1,288,637.97$ | 528,342 | 528,648 | 759,990 | 42.45 | 17,903 |
| 1992 | $1,789,991.02$ | 709,194 | 709,605 | $1,080,386$ | 43.44 | 24,871 |
| 1993 | $4,188,834.25$ | $1,612,701$ | $1,613,634$ | $2,575,200$ | 43.93 | 58,621 |
| 1994 | $1,060,059.85$ | 393,282 | 393,510 | 666,550 | 44.93 | 14,835 |
| 1995 | $2,031,811.98$ | 725,357 | 725,777 | $1,306,035$ | 45.93 | 28,435 |
| 1996 | $969,992.69$ | 332,707 | 332,900 | 637,093 | 46.93 | 13,575 |
| 1997 | $833,534.11$ | 274,233 | 274,392 | 559,142 | 47.93 | 11,666 |
| 1998 | $538,278.67$ | 169,558 | 169,656 | 368,623 | 48.93 | 7,534 |
| 1999 | $1,671,204.80$ | 503,033 | 503,324 | $1,167,881$ | 49.93 | 23,390 |
| 2000 | $695,565.07$ | 201,018 | 201,134 | 494,431 | 50.43 | 9,804 |
| 2001 | $270,421.34$ | 74,366 | 74,409 | 196,012 | 51.42 | 3,812 |
| 2002 | $2,331,495.36$ | 608,054 | 608,406 | $1,723,089$ | 52.43 | 32,865 |
| 2003 | $2,973,836.07$ | 733,943 | 734,368 | $2,239,468$ | 53.42 | 41,922 |
| 2004 | $511,087.33$ | 118,879 | 118,948 | 392,139 | 54.43 | 7,204 |
| 2005 | $2,115,514.93$ | 462,452 | 462,720 | $1,652,795$ | 55.42 | 29,823 |
| 2006 | $3,641,054.96$ | 744,232 | 744,663 | $2,896,392$ | 56.43 | 51,327 |
| 2007 | $2,929,964.88$ | 557,865 | 558,188 | $2,371,777$ | 57.42 | 41,306 |
| 2008 | $2,216,390.05$ | 390,528 | 390,754 | $1,825,636$ | 58.43 | 31,245 |
| 2009 | $5,668,510.16$ | 919,432 | 919,964 | $4,748,546$ | 59.42 | 79,915 |
| 2010 | $3,102,267.53$ | 459,136 | 459,402 | $2,642,866$ | 60.43 | 43,734 |
| 2011 | $116,460.66$ | 15,606 | 15,615 | 100,846 | 61.42 | 1,642 |
| 2012 | $4,064,160.62$ | 486,886 | 487,168 | $3,576,993$ | 62.43 | 57,296 |
| 2013 | $897,218.98$ | 95,554 | 95,609 | 801,610 | 62.92 | 12,740 |
| 2014 | $13,001,091.88$ | $1,200,001$ | $1,200,695$ | $11,800,397$ | 63.92 | 184,612 |
| 2015 | $9,184,461.93$ | 717,306 | 717,721 | $8,466,741$ | 64.92 | 130,418 |
| 2016 | $3,578,351.73$ | 228,657 | 228,789 | $3,349,563$ | 65.92 | 50,813 |
| 2017 | $6,326,290.76$ | 314,417 | 314,599 | $6,011,692$ | 66.92 | 89,834 |
| 192 |  |  |  |  |  |  |


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |


| SURVIVOR CURVE. . IOWA |  |  |  |  |  |  |  | $75-R 4$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | :---: | :---: |
| 2018 | $938,325.75$ | 33,311 | 33,330 | 904,996 | 67.92 | 13,324 |  |  |
| 2019 | $853,339.23$ | 18,176 | 18,187 | 835,152 | 68.92 | 12,118 |  |  |
| 2020 | $2,024,032.31$ | 14,371 | 14,379 | $2,009,653$ | 69.92 | 28,742 |  |  |
|  |  |  |  |  |  | $2,025,845$ |  |  |

[^91]CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R1.5

| 1902 | 298.03 | 298 | 298 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1907 | 345.77 | 346 | 346 |  |  |  |
| 1910 | 126.40 | 126 | 126 |  |  |  |
| 1915 | 278.72 | 279 | 279 |  |  |  |
| 1923 | 36.83 | 37 | 37 |  |  |  |
| 1924 | 165.75 | 166 | 166 |  |  |  |
| 1926 | 0.44 |  |  |  |  |  |
| 1933 | 105.67 | 103 | 92 | 14 | 0.97 | 14 |
| 1942 | 173.57 | 160 | 142 | 32 | 3.64 | 9 |
| 1943 | 484.87 | 443 | 394 | 91 | 3.86 | 24 |
| 1944 | 1,917.78 | 1,743 | 1,550 | 368 | 4.09 | 90 |
| 1945 | 123.85 | 112 | 100 | 24 | 4.32 | 6 |
| 1948 | 542.66 | 482 | 429 | 114 | 5.05 | 23 |
| 1949 | 151.60 | 134 | 119 | 33 | 5.30 | 6 |
| 1951 | 534.73 | 465 | 414 | 121 | 5.83 | 21 |
| 1952 | 184.93 | 160 | 142 | 43 | 6.11 | 7 |
| 1953 | 13,999.26 | 12,011 | 10,684 | 3,315 | 6.39 | 519 |
| 1954 | 5,547.89 | 4,726 | 4,204 | 1,344 | 6.67 | 201 |
| 1955 | 5,136.29 | 4,342 | 3,862 | 1,274 | 6.96 | 183 |
| 1956 | 5.34 | 4 | 4 | 1 | 7.25 |  |
| 1957 | 13,113.94 | 10,914 | 9,708 | 3,406 | 7.55 | 451 |
| 1958 | 7,197.72 | 5,942 | 5,286 | 1,912 | 7.85 | 244 |
| 1959 | 1,466.65 | 1,201 | 1,068 | 399 | 8.16 | 49 |
| 1960 | 2,032.08 | 1,649 | 1,467 | 565 | 8.48 | 67 |
| 1962 | 914.82 | 729 | 648 | 267 | 9.12 | 29 |
| 1963 | 6,266.81 | 4,949 | 4,402 | 1,865 | 9.46 | 197 |
| 1964 | 8,498.58 | 6,648 | 5,914 | 2,585 | 9.80 | 264 |
| 1965 | 120,259.38 | 93,134 | 82,847 | 37,412 | 10.15 | 3,686 |
| 1966 | 285,878.07 | 219,045 | 194,850 | 91,028 | 10.52 | 8,653 |
| 1967 | 411,810.51 | 312,152 | 277,672 | 134,139 | 10.89 | 12,318 |
| 1968 | 380,735.80 | 285,384 | 253,861 | 126,875 | 11.27 | 11,258 |
| 1969 | 740,475.01 | 548,611 | 488, 012 | 252,463 | 11.66 | 21,652 |
| 1970 | 1,564,452.53 | 1,145,179 | 1,018,684 | 545,769 | 12.06 | 45,254 |
| 1971 | 2,586, 335.47 | 1,869,636 | 1,663,118 | 923,217 | 12.47 | 74,035 |
| 1972 | 1,825,506.32 | 1,302,608 | 1,158,723 | 666,783 | 12.89 | 51,729 |
| 1973 | 1,607,513.02 | 1,131,336 | 1,006,370 | 601,143 | 13.33 | 45,097 |
| 1974 | 2,035,261.09 | 1,412,471 | 1,256,451 | 778,810 | 13.77 | 56,558 |
| 1975 | 3,013,204.60 | 2,060,369 | 1,832,783 | 1,180,422 | 14.23 | 82,953 |
| 1976 | 3,100,923.39 | 2,087,945 | 1,857,313 | 1,243,610 | 14.70 | 84,599 |
| 1977 | 2,945,872.91 | 1,952,142 | 1,736,510 | 1,209,363 | 15.18 | 79,668 |
| 1978 | 2,862,440.75 | 1,865,052 | 1,659,040 | 1,203,401 | 15.68 | 76,748 |
| 1979 | 3,633,128.84 | 2,326,801 | 2,069,785 | 1,563,344 | 16.18 | 96,622 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R1.5

| 1980 | $3,431,947.86$ | $2,158,318$ | $1,919,912$ | $1,512,036$ | 16.70 | 90,541 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1981 | $1,565,463.09$ | 966,407 | 859,659 | 705,804 | 17.22 | 40,987 |
| 1982 | $3,275,161.26$ | $1,982,553$ | $1,763,562$ | $1,511,599$ | 17.76 | 85,113 |
| 1983 | $2,215,950.61$ | $1,553,825$ | $1,382,191$ | 833,760 | 15.98 | 52,175 |
| 1984 | $4,907,510.34$ | $3,385,201$ | $3,011,275$ | $1,896,235$ | 16.41 | 115,554 |
| 1985 | $3,862,664.65$ | $2,605,367$ | $2,317,581$ | $1,545,084$ | 17.13 | 90,198 |
| 1986 | $3,294,394.22$ | $2,182,207$ | $1,941,163$ | $1,353,231$ | 17.58 | 76,976 |
| 1987 | $2,641,795.37$ | $1,716,903$ | $1,527,256$ | $1,114,539$ | 18.05 | 61,747 |
| 1988 | $3,034,705.39$ | $1,942,818$ | $1,728,216$ | $1,306,489$ | 18.26 | 71,549 |
| 1989 | $3,591,445.35$ | $2,251,118$ | $2,002,462$ | $1,588,983$ | 18.75 | 84,746 |
| 1990 | $4,628,161.51$ | $2,837,063$ | $2,523,684$ | $2,104,478$ | 19.25 | 109,324 |
| 1991 | $5,113,379.55$ | $3,061,892$ | $2,723,678$ | $2,389,702$ | 19.76 | 120,936 |
| 1992 | $4,451,403.72$ | $2,600,510$ | $2,313,260$ | $2,138,144$ | 20.28 | 105,431 |
| 1993 | $4,472,182.10$ | $2,545,566$ | $2,264,385$ | $2,207,797$ | 20.81 | 106,093 |
| 1994 | $3,799,652.35$ | $2,104,247$ | $1,871,814$ | $1,927,838$ | 21.35 | 90,297 |
| 1995 | $2,849,316.55$ | $1,540,341$ | $1,370,196$ | $1,479,121$ | 21.67 | 68,257 |
| 1996 | $3,975,206.09$ | $2,084,201$ | $1,853,982$ | $2,121,224$ | 22.23 | 95,422 |
| 1997 | $3,356,903.69$ | $1,703,964$ | $1,515,746$ | $1,841,158$ | 22.80 | 80,753 |
| 1998 | $523,546.75$ | 258,004 | 229,505 | 294,042 | 23.16 | 12,696 |
| 1999 | $7,626,255.35$ | $3,623,997$ | $3,223,694$ | $4,402,561$ | 23.75 | 185,371 |
| 2000 | $9,549,347.24$ | $4,385,060$ | $3,900,691$ | $5,648,656$ | 24.14 | 233,996 |
| 2001 | $5,219,308.83$ | $2,300,149$ | $2,046,077$ | $3,173,232$ | 24.75 | 128,211 |
| 2002 | $4,143,878.09$ | $1,755,347$ | $1,561,453$ | $2,582,425$ | 25.17 | 102,599 |
| 2003 | $6,348,122.39$ | $2,577,338$ | $2,292,648$ | $4,055,474$ | 25.60 | 158,417 |
| 2004 | $11,178,681.28$ | $4,335,093$ | $3,856,243$ | $7,322,438$ | 26.05 | 281,092 |
| 2005 | $13,472,761.19$ | $4,970,102$ | $4,421,109$ | $9,051,652$ | 26.52 | 341,314 |
| 2006 | $13,342,456.13$ | $4,661,854$ | $4,146,910$ | $9,195,546$ | 27.00 | 340,576 |
| 2007 | $8,366,470.85$ | $2,767,629$ | $2,461,919$ | $5,904,552$ | 27.31 | 216,205 |
| 2008 | $8,571,626.42$ | $2,657,204$ | $2,363,692$ | $6,207,934$ | 27.82 | 223,146 |
| 2009 | $18,488,483.11$ | $5,357,962$ | $4,766,127$ | $13,722,356$ | 28.18 | 486,954 |
| 2010 | $22,043,760.90$ | $5,947,407$ | $5,290,462$ | $16,753,299$ | 28.41 | 589,697 |
| 2011 | $15,463,335.39$ | $3,834,907$ | $3,411,307$ | $12,052,028$ | 28.81 | 418,328 |
| 2012 | $17,932,065.45$ | $4,054,440$ | $3,606,591$ | $14,325,474$ | 29.09 | 492,454 |
| 2013 | $20,555,386.97$ | $4,193,299$ | $3,730,111$ | $16,825,276$ | 29.26 | 575,027 |
| 2014 | $20,829,544.28$ | $3,763,899$ | $3,348,143$ | $17,481,401$ | 29.47 | 593,193 |
| 2015 | $28,569,525.16$ | $4,479,702$ | $3,984,878$ | $24,584,647$ | 29.59 | 830,843 |
| 2016 | $18,439,105.77$ | $2,430,274$ | $2,161,828$ | $16,277,278$ | 29.63 | 549,351 |
| 2017 | $26,351,593.61$ | $2,803,810$ | $2,494,104$ | $23,857,490$ | 29.39 | 811,755 |
| 195 |  |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R1.5

| 2018 | $27,645,314.15$ | $2,197,802$ | $1,955,035$ | $25,690,279$ | 28.95 | 887,402 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | $27,056,170.16$ | $1,374,453$ | $1,222,633$ | $25,833,537$ | 28.00 | 922,626 |
| 2020 | $13,649,081.77$ | 267,522 | 237,972 | $13,411,110$ | 25.07 | 534,947 |
|  |  |  |  |  |  |  |
|  | $437,016,513.61$ | $132,889,789$ | $118,211,054$ | $318,805,460$ | $12,215,533$ |  |
|  |  |  |  |  |  |  |
| COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT $\ldots 26.1$ | 2.80 |  |  |  |  |  |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 39-S0

| 1949 | 20,932.18 | 19,649 | 16,447 | 4,485 | 2.39 | 1,877 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1950 | 51,285.27 | 47,642 | 39,877 | 11,408 | 2.77 | 4,118 |
| 1951 | 146,309.14 | 134,530 | 112,604 | 33,705 | 3.14 | 10,734 |
| 1952 | 255,408.98 | 232,356 | 194,486 | 60,923 | 3.52 | 17,308 |
| 1953 | 3,277.75 | 2,951 | 2,470 | 808 | 3.89 | 208 |
| 1955 | 237,516.28 | 209,197 | 175,102 | 62,414 | 4.65 | 13,422 |
| 1956 | 36,015.00 | 31,370 | 26,257 | 9,758 | 5.03 | 1,940 |
| 1957 | 581,125.80 | 500,367 | 418,816 | 162,310 | 5.42 | 29,946 |
| 1958 | 269,720.11 | 229,607 | 192,185 | 77,535 | 5.80 | 13,368 |
| 1959 | 190,223.57 | 160,031 | 133,949 | 56,275 | 6.19 | 9,091 |
| 1960 | 217,818.86 | 181,068 | 151,557 | 66,262 | 6.58 | 10,070 |
| 1961 | 326,492.81 | 268,142 | 224,440 | 102,053 | 6.97 | 14,642 |
| 1962 | 542,849.38 | 440,403 | 368,625 | 174,224 | 7.36 | 23,672 |
| 1963 | 390,298.29 | 312,641 | 261,686 | 128,612 | 7.76 | 16,574 |
| 1964 | 239,659.69 | 189,578 | 158,680 | 80,980 | 8.15 | 9,936 |
| 1965 | 146,160.69 | 114,118 | 95,519 | 50,642 | 8.55 | 5,923 |
| 1966 | 170,712.52 | 131,536 | 110,098 | 60,615 | 8.95 | 6,773 |
| 1967 | 134,389.74 | 102,136 | 85,490 | 48,900 | 9.36 | 5,224 |
| 1968 | 53,590.48 | 40,179 | 33,631 | 19,959 | 9.76 | 2,045 |
| 1969 | 261,116.32 | 193,025 | 161,565 | 99,551 | 10.17 | 9,789 |
| 1970 | 1,336,541.15 | 973,964 | 815,225 | 521,316 | 10.58 | 49,274 |
| 1971 | 85,632.76 | 61,502 | 51,478 | 34,155 | 10.99 | 3,108 |
| 1972 | 1,037,867.69 | 734,229 | 614,562 | 423,306 | 11.41 | 37,100 |
| 1973 | 616,803.93 | 429,709 | 359,674 | 257,130 | 11.83 | 21,735 |
| 1974 | 593, 024.22 | 406,755 | 340,461 | 252,563 | 12.25 | 20,617 |
| 1975 | 600,691.29 | 405,545 | 339,448 | 261,243 | 12.67 | 20,619 |
| 1976 | 1,005,149.58 | 667,520 | 558,726 | 446,424 | 13.10 | 34,078 |
| 1977 | 1,818,947.24 | 1,187,918 | 994,308 | 824,639 | 13.53 | 60,949 |
| 1978 | 1,819,434.47 | 1,168,168 | 977,777 | 841,657 | 13.96 | 60,291 |
| 1979 | 1,535,461.88 | 968,523 | 810,671 | 724,791 | 14.40 | 50,333 |
| 1980 | 1,090,550.56 | 675,585 | 565,476 | 525,075 | 14.84 | 35,382 |
| 1981 | 1,609,408.05 | 978,858 | 819,321 | 790,087 | 15.28 | 51,707 |
| 1982 | 1,087,224.29 | 648,714 | 542,985 | 544,239 | 15.73 | 34,599 |
| 1983 | 2,130,642.15 | 1,542,159 | 1,290,814 | 839,828 | 14.31 | 58,688 |
| 1984 | 2,604, 479.23 | 1,863,244 | 1,559,568 | 1,044,911 | 14.52 | 71,964 |
| 1985 | 2,713,349.24 | 1,907,213 | 1,596,370 | 1,116,979 | 15.01 | 74,416 |
| 1986 | 2,480,958.73 | 1,720,297 | 1,439,919 | 1,041,040 | 15.25 | 68,265 |
| 1987 | 2,770,604.51 | 1,893,431 | 1,584,835 | 1,185,770 | 15.52 | 76,403 |
| 1988 | 2,885,485.20 | 1,941,354 | 1,624,947 | 1,260,538 | 15.81 | 79,730 |
| 1989 | 4,401,394.69 | 2,897,878 | 2,425,574 | 1,975,821 | 16.34 | 120,919 |
| 1990 | 3,937,901.50 | 2,546,247 | 2,131, 253 | 1,806,648 | 16.67 | 108,377 |
| 1991 | 3,409,944.68 | 2,172,817 | 1,818,686 | 1,591,259 | 16.80 | 94,718 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 39-S0

| 1992 | $2,166,386.64$ | $1,352,259$ | $1,131,864$ | $1,034,523$ | 17.16 | 60,287 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1993 | $2,105,512.05$ | $1,285,415$ | $1,075,915$ | $1,029,597$ | 17.55 | 58,666 |
| 1994 | $1,963,523.61$ | $1,175,954$ | 984,294 | 979,230 | 17.75 | 55,168 |
| 1995 | $2,278,666.20$ | $1,330,741$ | $1,113,853$ | $1,164,813$ | 18.17 | 64,106 |
| 1996 | $1,261,382.52$ | 719,997 | 602,650 | 658,733 | 18.42 | 35,762 |
| 1997 | $1,145,421.16$ | 638,000 | 534,017 | 611,404 | 18.69 | 32,713 |
| 1998 | $649,525.59$ | 350,744 | 293,579 | 355,947 | 19.17 | 18,568 |
| 1999 | $5,223,165.28$ | $2,751,563$ | $2,303,106$ | $2,920,059$ | 19.31 | 151,220 |
| 2000 | $2,524,173.62$ | $1,288,338$ | $1,078,361$ | $1,445,813$ | 19.66 | 73,541 |
| 2001 | $2,558,904.12$ | $1,262,563$ | $1,056,787$ | $1,502,117$ | 20.02 | 75,031 |
| 2002 | $5,330,460.03$ | $2,544,229$ | $2,129,564$ | $3,200,896$ | 20.26 | 157,991 |
| 2003 | $2,440,570.54$ | $1,123,151$ | 940,097 | $1,500,474$ | 20.52 | 73,123 |
| 2004 | $11,014,199.58$ | $4,870,479$ | $4,076,676$ | $6,937,524$ | 20.81 | 333,375 |
| 2005 | $21,056,935.67$ | $8,911,295$ | $7,458,909$ | $13,598,027$ | 21.13 | 643,541 |
| 2006 | $7,889,294.94$ | $3,180,175$ | $2,661,862$ | $5,227,433$ | 21.47 | 243,476 |
| 2007 | $6,708,078.15$ | $2,571,877$ | $2,152,706$ | $4,555,372$ | 21.71 | 209,828 |
| 2008 | $7,390,743.84$ | $2,679,145$ | $2,242,491$ | $5,148,253$ | 21.98 | 234,224 |
| 2009 | $7,541,292.98$ | $2,576,106$ | $2,156,246$ | $5,385,047$ | 22.17 | 242,898 |
| 2010 | $12,264,988.32$ | $3,914,984$ | $3,276,910$ | $8,988,078$ | 22.39 | 401,433 |
| 2011 | $9,291,539.84$ | $2,744,721$ | $2,297,379$ | $6,994,161$ | 22.66 | 308,657 |
| 2012 | $15,789,600.19$ | $4,267,929$ | $3,572,331$ | $12,217,269$ | 22.95 | 532,343 |
| 2013 | $10,427,323.89$ | $2,556,780$ | $2,140,069$ | $8,287,255$ | 23.08 | 359,067 |
| 2014 | $10,400,349.84$ | $2,265,196$ | $1,896,008$ | $8,504,342$ | 23.35 | 364,212 |
| 2015 | $10,081,214.10$ | $1,913,414$ | $1,601,561$ | $8,479,653$ | 23.48 | 361,144 |
| 2016 | $8,475,994.09$ | $1,354,464$ | $1,133,710$ | $7,342,284$ | 23.67 | 310,194 |
| 2017 | $10,147,629.57$ | $1,299,911$ | $1,088,048$ | $9,059,582$ | 23.82 | 380,335 |
| 2018 | $12,189,851.36$ | $1,155,598$ | 967,256 | $11,222,595$ | 23.88 | 469,958 |
| 2019 | $9,963,026.95$ | 588,815 | 492,848 | $9,470,179$ | 23.88 | 396,574 |
| 2020 | $14,428,138.96$ | 297,220 | 248,778 | $14,179,361$ | 23.71 | 598,033 |

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5

| 1906 | 297.26 | 297 | 297 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1908 | 15.82 | 16 | 16 |  |  |  |
| 1912 | 60.01 | 60 | 60 |  |  |  |
| 1913 | 205.02 | 205 | 205 |  |  |  |
| 1916 | 644.84 | 645 | 645 |  |  |  |
| 1917 | 47.48 | 47 | 47 |  |  |  |
| 1918 | 5,804.74 | 5,805 | 5,805 |  |  |  |
| 1919 | 276.11 | 276 | 276 |  |  |  |
| 1920 | 568.56 | 569 | 569 |  |  |  |
| 1921 | 744.92 | 745 | 745 |  |  |  |
| 1922 | 509.91 | 510 | 510 |  |  |  |
| 1923 | 911.23 | 911 | 911 |  |  |  |
| 1924 | 4,075.57 | 4,076 | 4,076 |  |  |  |
| 1925 | 4,808.68 | 4,809 | 4,809 |  |  |  |
| 1926 | 11,650.82 | 11,651 | 11,651 |  |  |  |
| 1927 | 23,452.47 | 23,452 | 23,452 |  |  |  |
| 1928 | 31,191.42 | 31,191 | 31,191 |  |  |  |
| 1929 | 54,638.06 | 54,638 | 54,638 |  |  |  |
| 1930 | 55,624.21 | 55,624 | 55,624 |  |  |  |
| 1931 | 24,284.06 | 24,144 | 20,177 | 4,107 | 0.26 | 4,107 |
| 1932 | 9,231.22 | 9,077 | 7,586 | 1,645 | 0.75 | 1,645 |
| 1933 | 9,373.65 | 9,117 | 7,619 | 1,755 | 1.23 | 1,427 |
| 1934 | 105.14 | 101 | 84 | 21 | 1.71 | 12 |
| 1935 | 4,140.90 | 3,940 | 3,293 | 848 | 2.18 | 389 |
| 1936 | 14,518.04 | 13,663 | 11,418 | 3,100 | 2.65 | 1,170 |
| 1937 | 41,969.45 | 39,060 | 32,642 | 9,327 | 3.12 | 2,989 |
| 1938 | 7,418.98 | 6,830 | 5,708 | 1,711 | 3.57 | 479 |
| 1939 | 2,832.60 | 2,580 | 2,156 | 677 | 4.02 | 168 |
| 1940 | 9,518.11 | 8,575 | 7,166 | 2,352 | 4.46 | 527 |
| 1941 | 53,236.74 | 47,452 | 39,655 | 13,582 | 4.89 | 2,778 |
| 1942 | 15,675.53 | 13,826 | 11,554 | 4,122 | 5.31 | 776 |
| 1943 | 8,479.82 | 7,400 | 6,184 | 2,296 | 5.73 | 401 |
| 1944 | 7,747.21 | 6,690 | 5,591 | 2,156 | 6.14 | 351 |
| 1945 | 14,116.77 | 12,062 | 10,080 | 4,037 | 6.55 | 616 |
| 1946 | 7,364.16 | 6,225 | 5,202 | 2,162 | 6.96 | 311 |
| 1947 | 8,884.80 | 7,432 | 6,211 | 2,674 | 7.36 | 363 |
| 1948 | 72,846.24 | 60,285 | 50,379 | 22,467 | 7.76 | 2,895 |
| 1949 | 40,986.52 | 33,563 | 28,048 | 12,939 | 8.15 | 1,588 |
| 1950 | 49,492.11 | 40,089 | 33,502 | 15,990 | 8.55 | 1,870 |
| 1951 | 103,237.63 | 82,705 | 69,116 | 34,122 | 8.95 | 3,813 |
| 1952 | 58,175.37 | 46,100 | 38,525 | 19,650 | 9.34 | 2,104 |
| 1953 | 85,046.68 | 66,639 | 55,689 | 29,358 | 9.74 | 3,014 |

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5

| 1954 | 180,098.63 | 139,517 | 116,593 | 63,506 | 10.14 | 6,263 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1955 | 194,493.70 | 148,982 | 124,502 | 69,992 | 10.53 | 6,647 |
| 1956 | 243,408.22 | 184,287 | 154,006 | 89,402 | 10.93 | 8,180 |
| 1957 | 104,565.71 | 78,215 | 65,363 | 39,203 | 11.34 | 3,457 |
| 1958 | 204,357.87 | 151,043 | 126,225 | 78,133 | 11.74 | 6,655 |
| 1959 | 237,192.38 | 173,150 | 144,699 | 92,493 | 12.15 | 7,613 |
| 1960 | 317,235.01 | 228,692 | 191,115 | 126,120 | 12.56 | 10,041 |
| 1961 | 206,641.87 | 147,084 | 122,916 | 83,726 | 12.97 | 6,455 |
| 1962 | 183,136.90 | 128,643 | 107,505 | 75,632 | 13.39 | 5,648 |
| 1963 | 167,202.36 | 115,890 | 96,848 | 70,354 | 13.81 | 5,094 |
| 1964 | 96,201.01 | 65,780 | 54,972 | 41,229 | 14.23 | 2,897 |
| 1965 | 117,321.57 | 79,101 | 66,104 | 51,218 | 14.66 | 3,494 |
| 1966 | 203,958.90 | 135,565 | 113,290 | 90,669 | 15.09 | 6,009 |
| 1967 | 359,464.17 | 235,409 | 196,728 | 162,736 | 15.53 | 10,479 |
| 1968 | 532,843.91 | 343,743 | 287,262 | 245,582 | 15.97 | 15,378 |
| 1969 | 222,003.47 | 140,997 | 117,829 | 104,174 | 16.42 | 6,344 |
| 1970 | 450,912.72 | 281,870 | 235,555 | 215,358 | 16.87 | 12,766 |
| 1971 | 245,479.29 | 150,997 | 126,186 | 119,293 | 17.32 | 6,888 |
| 1972 | 391,298.81 | 236,693 | 197,801 | 193,498 | 17.78 | 10,883 |
| 1973 | 583,411.55 | 346,803 | 289,819 | 293,593 | 18.25 | 16,087 |
| 1974 | 829,907.15 | 484,666 | 405,029 | 424,878 | 18.72 | 22,696 |
| 1975 | 673,853.74 | 386,496 | 322,990 | 350,864 | 19.19 | 18,284 |
| 1976 | 204,408.84 | 115,060 | 96,154 | 108,255 | 19.67 | 5,504 |
| 1977 | 376,025.87 | 207,649 | 173,530 | 202,496 | 20.15 | 10,049 |
| 1978 | 631,946.02 | 342,091 | 285,881 | 346,065 | 20.64 | 16,767 |
| 1979 | 431,274.29 | 228,670 | 191,097 | 240,177 | 21.14 | 11,361 |
| 1980 | 571,478.39 | 296,660 | 247,915 | 323,563 | 21.64 | 14,952 |
| 1981 | 354,276.00 | 179,972 | 150,400 | 203,876 | 22.14 | 9,208 |
| 1982 | 314,173.39 | 155,968 | 130,340 | 183,833 | 22.66 | 8,113 |
| 1983 | 382,714.20 | 249,721 | 208,689 | 174,025 | 19.97 | 8,714 |
| 1984 | 485,590.47 | 311,943 | 260,687 | 224,903 | 20.32 | 11,068 |
| 1985 | 673,436.94 | 425,545 | 355,623 | 317,814 | 20.68 | 15,368 |
| 1986 | 675,161.49 | 419,275 | 350,383 | 324,778 | 21.06 | 15,422 |
| 1987 | 925,264.51 | 564,134 | 471,440 | 453,825 | 21.45 | 21,157 |
| 1988 | 510,869.67 | 305,500 | 255,302 | 255,568 | 21.85 | 11,696 |
| 1989 | 720,653.73 | 424,465 | 354,720 | 365,934 | 21.98 | 16,648 |
| 1990 | 969,112.22 | 558,596 | 466,812 | 502,300 | 22.41 | 22,414 |
| 1991 | 940,699.26 | 529,990 | 442,906 | 497,793 | 22.86 | 21,776 |
| 1992 | 429,082.10 | 237,239 | 198,258 | 230,824 | 23.05 | 10,014 |
| 1993 | 1,198.99 | 646 | 540 | 659 | 23.52 | 28 |
| 1994 | 67,949.24 | 35,836 | 29,948 | 38,001 | 23.75 | 1,600 |
| 1995 | 44,448.16 | 22,784 | 19,040 | 25,408 | 24.25 | 1,048 |

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 45-R0.5

| 1996 | $122,018.17$ | 60,985 | 50,964 | 71,054 | 24.52 | 2,898 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1997 | $222,428.07$ | 108,189 | 90,412 | 132,016 | 24.81 | 5,321 |
| 1998 | $112,462.51$ | 53,139 | 44,408 | 68,055 | 25.12 | 2,709 |
| 1999 | $890,514.47$ | 407,856 | 340,840 | 549,674 | 25.45 | 21,598 |
| 2000 | $995,469.78$ | 442,785 | 370,030 | 625,440 | 25.59 | 24,441 |
| 2001 | $1,101,868.89$ | 472,702 | 395,031 | 706,838 | 25.95 | 27,238 |
| 2002 | $1,577,934.34$ | 653,896 | 546,453 | $1,031,481$ | 26.14 | 39,460 |
| 2003 | $1,379,162.92$ | 550,286 | 459,867 | 919,296 | 26.36 | 34,875 |
| 2005 | $480,036.56$ | 176,365 | 147,386 | 332,651 | 26.69 | 12,464 |
| 2006 | $2,382,899.51$ | 836,159 | 698,767 | $1,684,133$ | 26.82 | 62,794 |
| 2007 | $2,261,770.06$ | 754,074 | 630,170 | $1,631,600$ | 26.99 | 60,452 |
| 2008 | $2,739,304.80$ | 862,881 | 721,099 | $2,018,206$ | 27.18 | 74,253 |
| 2009 | $3,174,211.60$ | 945,280 | 789,958 | $2,384,254$ | 27.11 | 87,947 |
| 2010 | $3,517,935.02$ | 978,690 | 817,879 | $2,700,056$ | 27.24 | 99,121 |
| 2011 | $3,286,574.05$ | 852,537 | 712,454 | $2,574,120$ | 27.13 | 94,881 |
| 2012 | $3,897,814.98$ | 930,798 | 777,856 | $3,119,959$ | 27.09 | 115,170 |
| 2013 | $5,002,096.50$ | $1,091,457$ | 912,117 | $4,089,980$ | 26.87 | 152,214 |
| 2014 | $4,163,967.85$ | 817,387 | 683,080 | $3,480,888$ | 26.61 | 130,811 |
| 2015 | $3,527,836.38$ | 609,257 | 509,148 | $3,018,688$ | 26.35 | 114,561 |
| 2016 | $4,325,873.73$ | 642,392 | 536,839 | $3,789,035$ | 25.80 | 146,862 |
| 2017 | $3,500,317.00$ | 428,789 | 358,334 | $3,141,983$ | 25.07 | 125,328 |
| 2018 | $4,426,089.07$ | 416,938 | 348,430 | $4,077,659$ | 24.03 | 169,690 |
| 2019 | $3,810,189.18$ | 240,042 | 200,600 | $3,609,589$ | 22.31 | 161,792 |
| 2020 | $3,158,418.79$ | 83,698 | 69,945 | $3,088,474$ | 18.37 | 168,126 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 23.8 3.10

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA $30-\mathrm{L} 0$

| 1926 | 448.75 | 381 | 319 | 130 | 4.56 | 29 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1927 | 13,130.36 | 11,073 | 9,268 | 3,862 | 4.70 | 822 |
| 1928 | 22,267.34 | 18,682 | 15,637 | 6,630 | 4.83 | 1,373 |
| 1929 | 71,201.49 | 59,406 | 49,724 | 21,477 | 4.97 | 4,321 |
| 1930 | 20,901.06 | 17,341 | 14,515 | 6,386 | 5.11 | 1,250 |
| 1931 | 18,055.16 | 14,896 | 12,468 | 5,587 | 5.25 | 1,064 |
| 1932 | 2,006.90 | 1,646 | 1,378 | 629 | 5.39 | 117 |
| 1933 | 1,410.61 | 1,151 | 963 | 448 | 5.53 | 81 |
| 1935 | 2,770.36 | 2,233 | 1,869 | 901 | 5.82 | 155 |
| 1936 | 6,667.57 | 5,341 | 4,471 | 2,197 | 5.97 | 368 |
| 1937 | 10,526.25 | 8,382 | 7,016 | 3,510 | 6.11 | 574 |
| 1938 | 5,076.71 | 4,017 | 3,362 | 1,715 | 6.26 | 274 |
| 1939 | 3,207.28 | 2,522 | 2,111 | 1,096 | 6.41 | 171 |
| 1940 | 7,024.59 | 5,486 | 4,592 | 2,433 | 6.57 | 370 |
| 1941 | 22,100.99 | 17,150 | 14,355 | 7,746 | 6.72 | 1,153 |
| 1942 | 4,092.34 | 3,155 | 2,641 | 1,451 | 6.87 | 211 |
| 1943 | 1,402.05 | 1,074 | 899 | 503 | 7.03 | 72 |
| 1944 | 6,284.62 | 4,778 | 3,999 | 2,286 | 7.19 | 318 |
| 1945 | 170.62 | 129 | 108 | 63 | 7.35 | 9 |
| 1946 | 4,044.21 | 3,032 | 2,538 | 1,506 | 7.51 | 201 |
| 1947 | 5,528.60 | 4,113 | 3,443 | 2,086 | 7.68 | 272 |
| 1948 | 22,661.86 | 16,740 | 14,012 | 8,650 | 7.84 | 1,103 |
| 1949 | 55,416.86 | 40,621 | 34,000 | 21,417 | 8.01 | 2,674 |
| 1950 | 28,561.07 | 20,773 | 17,387 | 11,174 | 8.18 | 1,366 |
| 1951 | 17,904.59 | 12,921 | 10,815 | 7,090 | 8.35 | 849 |
| 1952 | 62,825.88 | 44,983 | 37,652 | 25,174 | 8.52 | 2,955 |
| 1953 | 56,045.14 | 39,792 | 33,307 | 22,738 | 8.70 | 2,614 |
| 1954 | 45,637.63 | 32,144 | 26,905 | 18,733 | 8.87 | 2,112 |
| 1955 | 72,459.72 | 50,601 | 42,354 | 30,106 | 9.05 | 3,327 |
| 1956 | 82,921.32 | 57,409 | 48,052 | 34,869 | 9.23 | 3,778 |
| 1957 | 67,239.51 | 46,126 | 38,608 | 28,632 | 9.42 | 3,039 |
| 1958 | 68,330.52 | 46,465 | 38,892 | 29,439 | 9.60 | 3,067 |
| 1959 | 49,192.70 | 33,140 | 27,739 | 21,454 | 9.79 | 2,191 |
| 1960 | 273,086.85 | 182,239 | 152,537 | 120,550 | 9.98 | 12,079 |
| 1961 | 58,965.67 | 38,976 | 32,624 | 26,342 | 10.17 | 2,590 |
| 1962 | 34,692.02 | 22,700 | 19,000 | 15,692 | 10.37 | 1,513 |
| 1963 | 94,194.81 | 61,007 | 51,064 | 43,131 | 10.57 | 4,081 |
| 1964 | 53,190.66 | 34,095 | 28,538 | 24,653 | 10.77 | 2,289 |
| 1965 | 42,662.04 | 27,062 | 22,651 | 20,011 | 10.97 | 1,824 |
| 1966 | 88,327.68 | 55,411 | 46,380 | 41,948 | 11.18 | 3,752 |
| 1967 | 301, 027.53 | 186,839 | 156,388 | 144,640 | 11.38 | 12,710 |
| 1968 | 232,367.19 | 142,597 | 119,356 | 113,011 | 11.59 | 9,751 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 30-L0

| 1969 | $77,890.12$ | 47,227 | 39,530 | 38,360 | 11.81 | 3,248 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1970 | $52,554.69$ | 31,498 | 26,364 | 26,191 | 12.02 | 2,179 |
| 1971 | $159,295.73$ | 94,303 | 78,933 | 80,363 | 12.24 | 6,566 |
| 1972 | $287,859.10$ | 168,205 | 140,791 | 147,068 | 12.47 | 11,794 |
| 1973 | $84,568.62$ | 48,796 | 40,843 | 43,726 | 12.69 | 3,446 |
| 1974 | $160,087.68$ | 91,143 | 76,288 | 83,800 | 12.92 | 6,486 |
| 1975 | $260,115.31$ | 146,099 | 122,287 | 137,828 | 13.15 | 10,481 |
| 1976 | $51,565.14$ | 28,550 | 23,897 | 27,668 | 13.39 | 2,066 |
| 1977 | $30,462.58$ | 16,623 | 13,914 | 16,549 | 13.63 | 1,214 |
| 1978 | $28,978.91$ | 15,581 | 13,042 | 15,937 | 13.87 | 1,149 |
| 1979 | 296.38 | 157 | 131 | 165 | 14.12 | 12 |
| 1980 | $50,173.02$ | 26,140 | 21,880 | 28,293 | 14.37 | 1,969 |
| 1981 | $44,931.82$ | 228,103 | 190,926 | 254,006 | 14.62 | 17,374 |
| 1982 | $1,017,236.23$ | 512,687 | 429,128 | 588,108 | 14.88 | 39,523 |
| 1983 | $350,415.73$ | 261,480 | 218,863 | 131,553 | 12.75 | 10,318 |
| 1984 | $46,395.53$ | 34,207 | 28,632 | 17,764 | 13.00 | 1,366 |
| 1986 | $364,161.79$ | 262,561 | 219,768 | 144,394 | 13.35 | 10,816 |
| 1987 | $674,522.39$ | 481,339 | 402,889 | 271,633 | 13.45 | 20,196 |
| 1988 | $408,570.70$ | 288,124 | 241,165 | 167,406 | 13.59 | 12,318 |
| 1989 | $350,414.18$ | 243,958 | 204,197 | 146,217 | 13.75 | 10,634 |
| 1990 | $234,524.89$ | 160,931 | 134,702 | 99,823 | 13.95 | 7,156 |
| 1991 | $391,894.66$ | 264,764 | 221,612 | 170,283 | 14.17 | 12,017 |
| 1992 | $3,866.45$ | 2,579 | 2,159 | 1,707 | 14.24 | 120 |
| 1993 | $1,839.29$ | 1,209 | 1,012 | 10 | 827 | 14.34 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 30-L0

| 2012 | $2,084,605.53$ | 717,521 | 600,578 | $1,484,028$ | 16.19 | 91,663 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2013 | $3,229,719.92$ | $1,022,206$ | 855,604 | $2,374,116$ | 16.20 | 146,550 |
| 2014 | $4,507,452.88$ | $1,294,991$ | $1,083,930$ | $3,423,523$ | 16.12 | 212,377 |
| 2015 | $2,529,983.90$ | 647,170 | 541,693 | $1,988,291$ | 16.00 | 124,268 |
| 2016 | $3,230,092.17$ | 713,850 | 597,505 | $2,632,587$ | 15.87 | 165,884 |
| 2017 | $3,947,198.92$ | 722,337 | 604,609 | $3,342,590$ | 15.62 | 213,994 |
| 2018 | $5,538,836.52$ | 778,207 | 651,373 | $4,887,464$ | 15.29 | 319,651 |
| 2019 | $3,648,497.57$ | 336,391 | 281,565 | $3,366,933$ | 14.76 | 228,112 |
| 2020 | $3,082,106.53$ | 109,107 | 91,324 | $2,990,783$ | 13.62 | 219,588 |
|  |  |  |  |  |  |  |
|  | $55,909,442.92$ | $18,625,490$ | $15,589,860$ | $40,319,583$ |  | $2,650,171$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 15.2 4.74

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 40-R1.5

| 1961 | 9,412.35 | 8,043 | 6,732 | 2,680 | 5.82 | 460 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1962 | 414.71 | 351 | 294 | 121 | 6.10 | 20 |
| 1964 | 1,720.41 | 1,433 | 1,199 | 521 | 6.69 | 78 |
| 1965 | 10,764.71 | 8,881 | 7,434 | 3,331 | 7.00 | 476 |
| 1966 | 36,763.70 | 30,045 | 25,148 | 11,616 | 7.31 | 1,589 |
| 1967 | 36,311.10 | 29,394 | 24,603 | 11,708 | 7.62 | 1,536 |
| 1968 | 22,226.79 | 17,809 | 14,906 | 7,321 | 7.95 | 921 |
| 1969 | 75,275.26 | 59,693 | 49,964 | 25,311 | 8.28 | 3,057 |
| 1970 | 86,593.00 | 67,932 | 56,860 | 29,733 | 8.62 | 3,449 |
| 1971 | 110,400.96 | 85,644 | 71,686 | 38,715 | 8.97 | 4,316 |
| 1972 | 84,373.69 | 64,694 | 54,150 | 30,224 | 9.33 | 3,239 |
| 1973 | 271,552.39 | 205,701 | 172,175 | 99,377 | 9.70 | 10,245 |
| 1974 | 426,606.02 | 319,101 | 267,093 | 159,513 | 10.08 | 15,825 |
| 1975 | 3,638.76 | 2,686 | 2,248 | 1,391 | 10.47 | 133 |
| 1976 | 167,636.88 | 122,040 | 102,150 | 65,487 | 10.88 | 6,019 |
| 1977 | 162,855.43 | 116,849 | 97,805 | 65,050 | 11.30 | 5,757 |
| 1978 | 228,595.40 | 161,560 | 135,229 | 93,366 | 11.73 | 7,960 |
| 1979 | 314,674.72 | 218,935 | 183,252 | 131,423 | 12.17 | 10,799 |
| 1980 | 292,964.73 | 200,461 | 167,789 | 125,176 | 12.63 | 9,911 |
| 1981 | 2,290.90 | 1,541 | 1,290 | 1,001 | 13.10 | 76 |
| 1982 | 6,100.12 | 4,029 | 3,372 | 2,728 | 13.58 | 201 |
| 1983 | 306, 011.74 | 229,509 | 192,103 | 113,909 | 12.50 | 9,113 |
| 1984 | 250,321.08 | 184,562 | 154,482 | 95,839 | 13.00 | 7,372 |
| 1985 | 438,134.68 | 318,874 | 266,903 | 171,232 | 13.28 | 12,894 |
| 1986 | 385,614.81 | 275,406 | 230,520 | 155,095 | 13.81 | 11,231 |
| 1987 | 396,385.74 | 277,549 | 232,313 | 164,073 | 14.34 | 11,442 |
| 1988 | 406,031.72 | 279,756 | 234,161 | 171,871 | 14.67 | 11,716 |
| 1989 | 1,070,992.25 | 721,956 | 604,290 | 466,702 | 15.23 | 30,644 |
| 1990 | 461,677.47 | 305,538 | 255,741 | 205,936 | 15.59 | 13,209 |
| 1991 | 640,025.15 | 415,376 | 347,677 | 292,348 | 15.95 | 18,329 |
| 1992 | 218,642.61 | 138,335 | 115,789 | 102,854 | 16.55 | 6,215 |
| 1993 | 355,316.66 | 219,870 | 184,035 | 171,282 | 16.94 | 10,111 |
| 1994 | 289,229.41 | 174,000 | 145,641 | 143,588 | 17.55 | 8,182 |
| 1995 | 323,185.27 | 189,548 | 158,655 | 164,530 | 17.98 | 9,151 |
| 1996 | 231,243.97 | 131,994 | 110,481 | 120,763 | 18.42 | 6,556 |
| 1997 | 168,351.62 | 93,368 | 78,151 | 90,201 | 18.87 | 4,780 |
| 1998 | 356.66 | 192 | 161 | 196 | 19.34 | 10 |
| 1999 | 263,301. 30 | 136,996 | 114,668 | 148,633 | 19.82 | 7,499 |
| 2000 | 96,939.24 | 48,683 | 40,749 | 56,190 | 20.32 | 2,765 |
| 2001 | 255,587.97 | 123,602 | 103,457 | 152,131 | 20.82 | 7,307 |
| 2002 | 1,042,332.20 | 484,059 | 405,166 | 637,166 | 21.34 | 29,858 |
| 2003 | 622,544.80 | 276,721 | 231,620 | 390,925 | 21.87 | 17,875 |

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 40-R1.5

| 2004 | $4,745.99$ | 2,020 | 1,691 | 3,055 | 22.26 | 137 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2006 | $1,401,793.12$ | 538,569 | 450,791 | 951,002 | 23.24 | 40,921 |
| 2007 | $1,390,964.13$ | 505,198 | 422,859 | 968,105 | 23.67 | 40,900 |
| 2008 | $1,415,087.49$ | 482,828 | 404,135 | $1,010,952$ | 24.13 | 41,896 |
| 2009 | $1,160,166.91$ | 370,905 | 310,454 | 849,713 | 24.47 | 34,725 |
| 2010 | $2,187,740.50$ | 650,196 | 544,225 | $1,643,516$ | 24.83 | 66,191 |
| 2011 | $1,574,433.76$ | 430,765 | 360,558 | $1,213,876$ | 25.22 | 48,131 |
| 2012 | $2,280,953.21$ | 567,957 | 475,390 | $1,805,563$ | 25.63 | 70,447 |
| 2013 | $3,204,151.10$ | 720,934 | 603,434 | $2,600,717$ | 25.83 | 100,686 |
| 2014 | $2,674,791.77$ | 533,888 | 446,873 | $2,227,919$ | 26.07 | 85,459 |
| 2015 | $1,174,645.73$ | 203,449 | 170,290 | $1,004,356$ | 26.25 | 38,261 |
| 2016 | $2,792,672.38$ | 408,289 | 341,745 | $2,450,927$ | 26.27 | 93,298 |
| 2017 | $1,403,016.65$ | 164,995 | 138,104 | $1,264,913$ | 26.26 | 48,169 |
| 2018 | $1,650,050.29$ | 145,204 | 121,538 | $1,528,512$ | 25.91 | 58,993 |
| 2019 | $1,710,435.06$ | 96,469 | 80,747 | $1,629,688$ | 25.10 | 64,928 |
| 2020 | $1,690,349.43$ | 36,850 | 30,844 | $1,659,505$ | 22.49 | 73,789 |
|  |  |  |  |  |  |  |
|  | $38,289,395.90$ | $12,611,232$ | $10,555,820$ | $27,733,576$ |  | $1,229,257$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.63 .21

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 369.2 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R1.5

| 1899 | 34,036.01 | 32,439 | 34,036 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1900 | 97.98 | 93 | 98 |  |  |  |
| 1904 | 4,200.68 | 3,908 | 4,136 | 65 | 4.53 | 14 |
| 1905 | 20,545.50 | 19,038 | 20,150 | 396 | 4.77 | 83 |
| 1906 | 379.10 | 350 | 370 | 9 | 5.01 | 2 |
| 1907 | 2,285.09 | 2,101 | 2,224 | 61 | 5.23 | 12 |
| 1908 | 1,637.84 | 1,500 | 1,588 | 50 | 5.46 | 9 |
| 1910 | 10,671.88 | 9,702 | 10,269 | 403 | 5.91 | 68 |
| 1911 | 9,140.81 | 8,279 | 8,762 | 379 | 6.13 | 62 |
| 1912 | 4,350.09 | 3,924 | 4,153 | 197 | 6.37 | 31 |
| 1913 | 22,655.92 | 20,355 | 21,544 | 1,112 | 6.60 | 168 |
| 1914 | 15,018.83 | 13,436 | 14,221 | 798 | 6.85 | 116 |
| 1915 | 15,680.44 | 13,970 | 14,786 | 894 | 7.09 | 126 |
| 1916 | 3,680.72 | 3,265 | 3,456 | 225 | 7.34 | 31 |
| 1917 | 1,303.99 | 1,152 | 1,219 | 85 | 7.60 | 11 |
| 1918 | 1,754.17 | 1,542 | 1,632 | 122 | 7.86 | 16 |
| 1919 | 3,875.48 | 3,391 | 3,589 | 286 | 8.13 | 35 |
| 1920 | 8,180.25 | 7,123 | 7,539 | 641 | 8.40 | 76 |
| 1921 | 83,136.17 | 72,047 | 76,254 | 6,882 | 8.67 | 794 |
| 1922 | 75,902.73 | 65,463 | 69,286 | 6,617 | 8.94 | 740 |
| 1923 | 26,129.40 | 22,419 | 23,728 | 2,401 | 9.23 | 260 |
| 1924 | 42,880.13 | 36,606 | 38,744 | 4,136 | 9.51 | 435 |
| 1925 | 59,316.89 | 50,383 | 53,325 | 5,992 | 9.79 | 612 |
| 1926 | 44,232.29 | 37,373 | 39,555 | 4,677 | 10.08 | 464 |
| 1927 | 62,018.93 | 52,115 | 55,158 | 6,861 | 10.38 | 661 |
| 1928 | 45,251.72 | 37,824 | 40,033 | 5,219 | 10.67 | 489 |
| 1929 | 46,863.46 | 38,954 | 41,229 | 5,634 | 10.97 | 514 |
| 1930 | 41,224.22 | 34,070 | 36,059 | 5,165 | 11.28 | 458 |
| 1931 | 42,574.84 | 34,990 | 37,033 | 5,542 | 11.58 | 479 |
| 1932 | 18,852.01 | 15,404 | 16,303 | 2,549 | 11.89 | 214 |
| 1933 | 15,015.80 | 12,195 | 12,907 | 2,109 | 12.21 | 173 |
| 1934 | 37,501.24 | 30,272 | 32,040 | 5,461 | 12.53 | 436 |
| 1935 | 14,686.61 | 11,783 | 12,471 | 2,216 | 12.85 | 172 |
| 1936 | 7,433.79 | 5,926 | 6,272 | 1,162 | 13.18 | 88 |
| 1937 | 14,730.08 | 11,668 | 12,349 | 2,381 | 13.51 | 176 |
| 1938 | 606.80 | 478 | 506 | 101 | 13.85 | 7 |
| 1939 | 15,567.59 | 12,167 | 12,877 | 2,691 | 14.20 | 190 |
| 1940 | 4,650.04 | 3,609 | 3,820 | 830 | 14.55 | 57 |
| 1941 | 22,083.99 | 17,018 | 18,012 | 4,072 | 14.91 | 273 |
| 1942 | 4,272.05 | 3,268 | 3,459 | 813 | 15.27 | 53 |
| 1943 | 1,643.63 | 1,248 | 1,321 | 323 | 15.64 | 21 |
| 1944 | 2,887.24 | 2,176 | 2,303 | 584 | 16.02 | 36 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 369.2 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R1.5

| 1945 | $9,755.51$ | 7,294 | 7,720 | 2,036 | 16.40 | 124 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1946 | $3,366.15$ | 2,497 | 2,643 | 723 | 16.79 | 43 |
| 1947 | $20,421.60$ | 15,021 | 15,898 | 4,524 | 17.19 | 263 |
| 1948 | $119,674.57$ | 87,270 | 92,366 | 27,309 | 17.60 | 1,552 |
| 1949 | $33,455.21$ | 24,185 | 25,597 | 7,858 | 18.01 | 436 |
| 1950 | $40,819.64$ | 29,246 | 30,954 | 9,866 | 18.43 | 535 |
| 1951 | $27,787.99$ | 19,725 | 20,877 | 6,911 | 18.86 | 366 |
| 1952 | $232,349.13$ | 163,360 | 172,899 | 59,450 | 19.30 | 3,080 |
| 1953 | $251,561.75$ | 175,125 | 185,351 | 66,211 | 19.75 | 3,352 |
| 1954 | $402,996.03$ | 277,757 | 293,976 | 109,020 | 20.20 | 5,397 |
| 1955 | $568,118.26$ | 387,542 | 410,172 | 157,946 | 20.66 | 7,645 |
| 1956 | $760,663.09$ | 513,387 | 543,365 | 217,298 | 21.13 | 10,284 |
| 1957 | $853,538.85$ | 569,771 | 603,042 | 250,497 | 21.61 | 11,592 |
| 1958 | $768,561.53$ | 507,366 | 536,993 | 231,569 | 22.09 | 10,483 |
| 1959 | $657,273.65$ | 428,845 | 453,887 | 203,387 | 22.59 | 9,003 |
| 1960 | $718,565.87$ | 463,310 | 490,364 | 228,202 | 23.09 | 9,883 |
| 1961 | $581,809.27$ | 370,566 | 392,204 | 189,605 | 23.60 | 8,034 |
| 1962 | $739,136.91$ | 464,858 | 492,002 | 247,135 | 24.12 | 10,246 |
| 1963 | $722,989.59$ | 448,919 | 475,133 | 247,857 | 24.64 | 10,059 |
| 1964 | $684,576.01$ | 419,385 | 443,874 | 240,702 | 25.18 | 9,559 |
| 1965 | $450,689.78$ | 272,356 | 288,260 | 162,430 | 25.72 | 6,315 |
| 1966 | $826,884.06$ | 492,699 | 521,469 | 305,415 | 26.27 | 11,626 |
| 1967 | $824,884.71$ | 484,397 | 512,682 | 312,203 | 26.83 | 11,636 |
| 1968 | $599,440.36$ | 346,848 | 367,101 | 232,339 | 27.39 | 8,483 |
| 1969 | $972,681.76$ | 554,283 | 586,649 | 386,033 | 27.96 | 13,807 |
| 1970 | $2,074,851.37$ | $1,163,826$ | $1,231,785$ | 843,066 | 28.54 | 29,540 |
| 1971 | $1,142,116.88$ | 630,277 | 667,081 | 475,036 | 29.13 | 16,307 |
| 1972 | $1,247,822.97$ | 677,281 | 716,829 | 530,994 | 29.72 | 17,867 |
| 1973 | $1,235,153.59$ | 659,004 | 697,485 | 537,669 | 30.32 | 17,733 |
| 1974 | $1,048,861.77$ | 549,761 | 581,863 | 466,999 | 30.93 | 15,099 |
| 1975 | $1,264,756.34$ | 650,869 | 688,875 | 575,881 | 31.55 | 18,253 |
| 1976 | $1,132,643.55$ | 572,076 | 605,481 | 527,163 | 32.17 | 16,387 |
| 1977 | $1,052,885.17$ | 521,578 | 552,035 | 500,850 | 32.80 | 15,270 |
| 1978 | $1,113,032.96$ | 540,589 | 572,156 | 540,877 | 33.43 | 16,179 |
| 1979 | $1,288,924.45$ | 613,128 | 648,930 | 639,994 | 34.08 | 18,779 |
| 1980 | $1,628,896.44$ | 758,821 | 803,131 | 825,765 | 34.72 | 23,784 |
| 1981 | $1,357,621.90$ | 618,655 | 654,780 | 702,842 | 35.38 | 19,866 |
| 1982 | $1,368,510.98$ | 609,726 | 645,330 | 723,181 | 36.04 | 20,066 |
| 1983 | $1,622,457.42$ | 888,295 | 940,165 | 682,292 | 30.99 | 22,017 |
| 1984 | $1,516,608.09$ | 813,812 | 861,333 | 655,275 | 31.52 | 20,789 |
| 1985 | $1,522,949.85$ | 800,158 | 846,882 | 676,068 | 32.07 | 21,081 |
| 1986 | $1,240,268.11$ | 637,498 | 674,723 | 565,545 | 32.62 | 17,337 |
|  |  |  |  | 2 |  | 2 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 369.2 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R1.5

| 1987 | $1,498,171.24$ | 752,831 | 796,791 | 701,380 | 33.17 | 21,145 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1988 | $1,776,587.96$ | 871,949 | 922,865 | 853,723 | 33.72 | 25,318 |
| 1989 | $1,819,941.67$ | 877,212 | 928,435 | 891,507 | 33.86 | 26,329 |
| 1990 | $1,673,544.75$ | 786,064 | 831,965 | 841,580 | 34.44 | 24,436 |
| 1991 | $2,397,310.20$ | $1,096,050$ | $1,160,052$ | $1,237,258$ | 35.02 | 35,330 |
| 1992 | $1,941,203.13$ | 863,059 | 913,456 | $1,027,747$ | 35.60 | 28,869 |
| 1993 | $1,957,780.93$ | 850,656 | 900,328 | $1,057,453$ | 35.79 | 29,546 |
| 1994 | $2,207,861.25$ | 930,393 | 984,721 | $1,223,140$ | 36.39 | 33,612 |
| 1995 | $1,242,824.04$ | 507,072 | 536,681 | 706,143 | 37.00 | 19,085 |
| 1996 | $1,393,910.46$ | 553,243 | 585,549 | 808,361 | 37.23 | 21,713 |
| 1997 | $2,759,298.89$ | $1,056,811$ | $1,118,521$ | $1,640,778$ | 37.85 | 43,349 |
| 1998 | $180,479.66$ | 66,994 | 70,906 | 109,574 | 38.11 | 2,875 |
| 1999 | $951,008.39$ | 339,415 | 359,234 | 591,774 | 38.74 | 15,276 |
| 2000 | $1,572,922.83$ | 541,715 | 573,347 | 999,576 | 39.02 | 25,617 |
| 2001 | $605,537.85$ | 199,585 | 211,239 | 394,299 | 39.67 | 9,939 |
| 2002 | $1,165,303.76$ | 368,702 | 390,232 | 775,072 | 39.98 | 19,386 |
| 2003 | $1,329,100.95$ | 402,452 | 425,952 | 903,149 | 40.30 | 22,411 |
| 2004 | $1,571,942.33$ | 453,977 | 480,486 | $1,091,456$ | 40.64 | 26,857 |
| 2005 | $1,939,479.44$ | 532,193 | 563,269 | $1,376,210$ | 40.99 | 33,574 |
| 2006 | $2,619,225.58$ | 679,951 | 719,656 | $1,899,570$ | 41.36 | 45,928 |
| 2007 | $2,314,753.34$ | 565,726 | 598,761 | $1,715,992$ | 41.75 | 41,102 |
| 2008 | $3,295,355.59$ | 757,932 | 802,190 | $2,493,166$ | 41.85 | 59,574 |
| 2009 | $2,791,694.16$ | 597,143 | 632,012 | $2,159,682$ | 42.26 | 51,105 |
| 2010 | $3,973,089.77$ | 788,261 | 834,290 | $3,138,800$ | 42.41 | 74,011 |
| 2011 | $2,418,621.29$ | 441,157 | 466,917 | $1,951,704$ | 42.58 | 45,836 |
| 2012 | $3,967,177.69$ | 657,758 | 696,167 | $3,271,011$ | 42.78 | 76,461 |
| 2013 | $1,444,348.07$ | 215,497 | 228,081 | $1,216,267$ | 42.75 | 28,451 |
| 2014 | $2,139,712.00$ | 282,442 | 298,934 | $1,840,778$ | 42.76 | 43,049 |
| 2015 | $1,713,335.41$ | 196,006 | 207,451 | $1,505,884$ | 42.58 | 35,366 |
| 2016 | $1,364,599.72$ | 131,411 | 139,085 | $1,225,515$ | 42.23 | 29,020 |
| 2017 | $1,083,650.41$ | 83,875 | 88,773 | 994,877 | 41.75 | 23,829 |
| 2018 | $2,522,949.34$ | 145,070 | 153,541 | $2,369,408$ | 40.98 | 57,819 |
| 2019 | $2,324,660.56$ | 85,548 | 90,543 | $2,234,118$ | 39.31 | 56,833 |
| 2020 | $3,009,763.46$ | 42,137 | 44,598 | $2,965,166$ | 35.09 | 84,502 |
|  |  |  |  |  |  |  |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 36.51 .67

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 18-S0

| 2004 | $14,213.87$ | 10,038 | 5,782 | 8,432 | 6.86 | 1,229 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2005 | $27,266.39$ | 18,639 | 10,737 | 16,529 | 7.17 | 2,305 |
| 2006 | $29,741.71$ | 19,624 | 11,304 | 18,438 | 7.48 | 2,465 |
| 2007 | $23,638.96$ | 14,968 | 8,622 | 15,017 | 7.82 | 1,920 |
| 2008 | $178,879.72$ | 108,222 | 62,341 | 116,539 | 8.16 | 14,282 |
| 2009 | $39,158.52$ | 22,563 | 12,997 | 26,162 | 8.46 | 3,092 |
| 2010 | $14,129.54$ | 7,701 | 4,436 | 9,694 | 8.77 | 1,105 |
| 2011 | $14,537.65$ | 7,443 | 4,288 | 10,250 | 9.05 | 1,133 |
| 2012 | $1,093,210.98$ | 520,368 | 299,758 | 793,453 | 9.36 | 84,771 |
| 2013 | $2,400,405.43$ | $1,049,457$ | 604,539 | $1,795,866$ | 9.65 | 186,100 |
| 2014 | $1,867,221.81$ | 739,046 | 425,727 | $1,441,495$ | 9.92 | 145,312 |
| 2015 | $19,609,322.29$ | $6,871,107$ | $3,958,098$ | $15,651,224$ | 10.20 | $1,534,434$ |
| 2016 | $32,211,327.89$ | $9,711,715$ | $5,594,429$ | $26,616,899$ | 10.43 | $2,551,956$ |
| 2017 | $37,090,916.62$ | $9,165,165$ | $5,279,588$ | $31,811,329$ | 10.66 | $2,984,177$ |
| 2018 | $32,042,478.99$ | $5,998,352$ | $3,455,348$ | $28,587,131$ | 10.85 | $2,634,759$ |
| 2019 | $8,646,171.73$ | $1,039,270$ | 598,671 | $8,047,501$ | 10.98 | 732,924 |
| 2020 | $7,201,276.72$ | 313,976 | 180,866 | $7,020,411$ | 10.98 | 639,382 |
|  |  |  |  |  |  |  |
|  | $142,503,898.82$ | $35,617,654$ | $20,517,531$ | $121,986,368$ |  | $11,521,346$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 10.68 .08

| DUQUESNE LIGHT COMPANY |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE |  |  |  |  |  |  |
| ACCOUNT 370.1 METERS - COMMUNICATION EQUIPMENT |  |  |  |  |  |  |
| CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL ELAATED TO ORIGINAL COST AS OF DECEMBER 31, 2020 |  |  |  |  |  |  |
| YEAR <br> (1) | $\begin{aligned} & \text { ORIGINAL } \\ & \text { COST } \\ & (2) \end{aligned}$ | CALCULATED ACCRUED (3) | ALLOC. BOOK RESERVE <br> (4) | FUTURE BOOK ACCRUALS (5) | REM. LIFE (6) | ANNUAL ACCRUAL (7) |
| SURVIVOR CURVE.. IOWA 10-S4 |  |  |  |  |  |  |
| 2008 0.21 |  |  |  |  |  |  |
| 2012 | 6,746.09 | 5,487 | 5,770 | 976 | 1.95 | 501 |
| 2014 | 13,126.40 | 8,686 | 9,135 | 3,992 | 3.32 | 1,202 |
|  | 19,872.70 | 14,173 | 14,905 | 4,968 |  | 1,703 |
| COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 2.9 8.57 |  |  |  |  |  |  |

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA $30-\mathrm{L} 0$

| 1893 | 20.68 | 21 | 21 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1898 | 101.11 | 101 | 101 |  |  |  |
| 1899 | 2,813.57 | 2,743 | 2,814 |  |  |  |
| 1900 | 202.55 | 196 | 203 |  |  |  |
| 1901 | 6,435.84 | 6,125 | 6,436 |  |  |  |
| 1902 | 9,498.49 | 9,039 | 9,498 |  |  |  |
| 1903 | 5,032.80 | 4,749 | 5,033 |  |  |  |
| 1904 | 3,872.05 | 3,640 | 3,872 |  |  |  |
| 1905 | 1,202.63 | 1,124 | 1,203 |  |  |  |
| 1906 | 50.70 | 47 | 51 |  |  |  |
| 1907 | 2,897.33 | 2,688 | 2,897 |  |  |  |
| 1908 | 27.16 | 25 | 27 |  |  |  |
| 1910 | 4,149.66 | 3,798 | 4,150 |  |  |  |
| 1911 | 1,900.69 | 1,732 | 1,901 |  |  |  |
| 1913 | 9,985.14 | 9,020 | 9,985 |  |  |  |
| 1914 | 799.33 | 719 | 799 |  |  |  |
| 1915 | 559.01 | 500 | 559 |  |  |  |
| 1916 | 143.87 | 128 | 144 |  |  |  |
| 1917 | 1,587.55 | 1,408 | 1,588 |  |  |  |
| 1918 | 381.97 | 337 | 382 |  |  |  |
| 1919 | 199.02 | 175 | 199 |  |  |  |
| 1920 | 6,477.12 | 5,661 | 6,477 |  |  |  |
| 1921 | 7,021.27 | 6,109 | 7,021 |  |  |  |
| 1922 | 7,399.77 | 6,406 | 7,400 |  |  |  |
| 1923 | 10,065.15 | 8,669 | 10,017 | 48 | 4.16 | 12 |
| 1924 | 23,948.32 | 20,524 | 23,716 | 232 | 4.29 | 54 |
| 1925 | 15,246.17 | 12,995 | 15,016 | 230 | 4.43 | 52 |
| 1926 | 43,835.98 | 37,173 | 42,954 | 882 | 4.56 | 193 |
| 1927 | 46,695.95 | 39,380 | 45,504 | 1,192 | 4.70 | 254 |
| 1928 | 87,393.55 | 73,323 | 84,726 | 2,668 | 4.83 | 552 |
| 1929 | 15,839.15 | 13,215 | 15,270 | 569 | 4.97 | 114 |
| 1930 | 18,091.85 | 15,010 | 17,344 | 748 | 5.11 | 146 |
| 1931 | 55,923.59 | 46,137 | 53,312 | 2,612 | 5.25 | 498 |
| 1932 | 11,680.92 | 9,582 | 11,072 | 609 | 5.39 | 113 |
| 1933 | 29,959.73 | 24,437 | 28,237 | 1,723 | 5.53 | 312 |
| 1934 | 43,041.71 | 34,907 | 40,335 | 2,707 | 5.67 | 477 |
| 1935 | 27,873.60 | 22,466 | 25,960 | 1,914 | 5.82 | 329 |
| 1936 | 4,581.77 | 3,670 | 4,241 | 341 | 5.97 | 57 |
| 1937 | 34,806.62 | 27,718 | 32,028 | 2,779 | 6.11 | 455 |
| 1938 | 437.56 | 346 | 400 | 38 | 6.26 | 6 |
| 1939 | 23,191.02 | 18,236 | 21,072 | 2,119 | 6.41 | 331 |
| 1940 | 11,394.90 | 8,899 | 10,283 | 1,112 | 6.57 | 169 |

## ACCOUNT 373 STREET LIGHTING EQUI PMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 30-L0

| 1941 | 38,443.85 | 29,832 | 34,471 | 3,973 | 6.72 | 591 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1942 | 10,064.42 | 7,760 | 8,967 | 1,097 | 6.87 | 160 |
| 1943 | 10,278.81 | 7,870 | 9,094 | 1,185 | 7.03 | 169 |
| 1944 | 1,818.01 | 1,382 | 1,597 | 221 | 7.19 | 31 |
| 1945 | 3,523.39 | 2,660 | 3,074 | 449 | 7.35 | 61 |
| 1946 | 4,257.72 | 3,192 | 3,688 | 570 | 7.51 | 76 |
| 1947 | 3,076.89 | 2,289 | 2,645 | 432 | 7.68 | 56 |
| 1948 | 8,955.69 | 6,615 | 7,644 | 1,312 | 7.84 | 167 |
| 1949 | 4,839.61 | 3,547 | 4,099 | 741 | 8.01 | 93 |
| 1950 | 19,053.48 | 13,858 | 16,013 | 3,040 | 8.18 | 372 |
| 1951 | 28,277.19 | 20,407 | 23,581 | 4,696 | 8.35 | 562 |
| 1952 | 26,272.17 | 18,811 | 21,736 | 4,536 | 8.52 | 532 |
| 1953 | 29,904.68 | 21,232 | 24,534 | 5,371 | 8.70 | 617 |
| 1954 | 31,227.69 | 21,995 | 25,415 | 5,813 | 8.87 | 655 |
| 1955 | 73,129.72 | 51,069 | 59,011 | 14,119 | 9.05 | 1,560 |
| 1956 | 54,532.16 | 37,754 | 43,625 | 10,907 | 9.23 | 1,182 |
| 1957 | 41,019.74 | 28,140 | 32,516 | 8,504 | 9.42 | 903 |
| 1958 | 70,120.87 | 47,682 | 55,097 | 15,024 | 9.60 | 1,565 |
| 1959 | 121,261.26 | 81,690 | 94,394 | 26,867 | 9.79 | 2,744 |
| 1960 | 116,695.22 | 77,874 | 89,984 | 26,711 | 9.98 | 2,676 |
| 1961 | 85,180.11 | 56,304 | 65,060 | 20,120 | 10.17 | 1,978 |
| 1962 | 146,862.41 | 96,096 | 111,040 | 35,822 | 10.37 | 3,454 |
| 1963 | 79,553.47 | 51,524 | 59,537 | 20,016 | 10.57 | 1,894 |
| 1964 | 72,204.53 | 46,283 | 53,481 | 18,724 | 10.77 | 1,739 |
| 1965 | 178,034.81 | 112,933 | 130,495 | 47,540 | 10.97 | 4,334 |
| 1966 | 175,606.43 | 110,163 | 127,295 | 48,311 | 11.18 | 4,321 |
| 1967 | 188,187.37 | 116,802 | 134,966 | 53,221 | 11.38 | 4,677 |
| 1968 | 103,890.83 | 63,755 | 73,670 | 30,221 | 11.59 | 2,608 |
| 1969 | 196,709.65 | 119,271 | 137,819 | 58,891 | 11.81 | 4,987 |
| 1970 | 413,675.09 | 247,928 | 286,484 | 127,191 | 12.02 | 10,582 |
| 1971 | 184,049.72 | 108,957 | 125,901 | 58,149 | 12.24 | 4,751 |
| 1972 | 205,332.35 | 119,982 | 138,641 | 66,691 | 12.47 | 5,348 |
| 1973 | 364,375.42 | 210,245 | 242,941 | 121,434 | 12.69 | 9,569 |
| 1974 | 212,413.64 | 120,933 | 139,740 | 72,674 | 12.92 | 5,625 |
| 1975 | 209,899.06 | 117,894 | 136,228 | 73,671 | 13.15 | 5,602 |
| 1976 | 279,967.91 | 155,010 | 179,116 | 100,852 | 13.39 | 7,532 |
| 1977 | 178,414.34 | 97,355 | 112,495 | 65,919 | 13.63 | 4,836 |
| 1978 | 279,393.65 | 150,222 | 173,583 | 105,811 | 13.87 | 7,629 |
| 1979 | 740,250.62 | 391,837 | 452,772 | 287,479 | 14.12 | 20,360 |
| 1980 | 832,250.77 | 433,603 | 501,034 | 331,217 | 14.37 | 23,049 |
| 1981 | 874,266.39 | 448,210 | 517,912 | 356,354 | 14.62 | 24,374 |
| 1982 | 1,711,426.99 | 862,559 | 996,698 | 714,729 | 14.88 | 48,033 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 373 STREET LIGHTING EQUI PMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 30-L0

| 1983 | 2,037,682.84 | 1,520,519 | 1,756,978 | 280,705 | 12.75 | 22,016 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1984 | 2,093,431.93 | 1,543,487 | 1,783,518 | 309,914 | 13.00 | 23,840 |
| 1985 | 1,321,279.94 | 966,252 | 1,116,516 | 204,764 | 13.04 | 15,703 |
| 1986 | 888,730.39 | 640,775 | 740,423 | 148,307 | 13.35 | 11,109 |
| 1987 | 585,935.14 | 418,123 | 483,146 | 102,789 | 13.45 | 7,642 |
| 1988 | 518, 007.51 | 365,299 | 422,108 | 95,900 | 13.59 | 7,057 |
| 1989 | 346,240.83 | 241,053 | 278,540 | 67,701 | 13.75 | 4,924 |
| 1990 | 533,276.93 | 365,935 | 422,842 | 110,435 | 13.95 | 7,916 |
| 1991 | 581,122.15 | 392,606 | 453,661 | 127,461 | 14.17 | 8,995 |
| 1992 | 482,968.36 | 322,092 | 372,181 | 110,787 | 14.24 | 7,780 |
| 1993 | 854,082.69 | 561,303 | 648,593 | 205,490 | 14.34 | 14,330 |
| 1994 | 1,116,778.86 | 722,109 | 834,406 | 282,373 | 14.48 | 19,501 |
| 1995 | 911,568.45 | 578,846 | 668,864 | 242,704 | 14.66 | 16,556 |
| 1996 | 1,051,106.04 | 654,103 | 755,824 | 295,282 | 14.87 | 19,858 |
| 1997 | 597.83 | 365 | 422 | 176 | 14.96 | 12 |
| 1998 | 3,334.67 | 1,996 | 2,306 | 1,029 | 15.09 | 68 |
| 1999 | $2,426,380.98$ | 1,418,948 | 1,639,612 | 786,769 | 15.26 | 51,558 |
| 2000 | 640,919.65 | 365,260 | 422,062 | 218,858 | 15.47 | 14,147 |
| 2002 | 314,939.98 | 170,697 | 197,243 | 117,697 | 15.63 | 7,530 |
| 2003 | 566.42 | 298 | 344 | 222 | 15.72 | 14 |
| 2004 | 286,085.19 | 145,846 | 168,527 | 117,558 | 15.86 | 7,412 |
| 2005 | $1,845,038.52$ | 909,419 | 1,050,845 | 794,194 | 15.95 | 49,793 |
| 2006 | 245,907.02 | 116,953 | 135,141 | 110,766 | 15.99 | 6,927 |
| 2007 | 1,793,020.06 | 818,155 | 945,388 | 847,632 | 16.09 | 52,681 |
| 2008 | 4,202.38 | 1,833 | 2,118 | 2,084 | 16.15 | 129 |
| 2009 | 445,170.22 | 184,835 | 213,579 | 231,591 | 16.20 | 14,296 |
| 2010 | 1,590,808.69 | 624,711 | 721,861 | 868,948 | 16.24 | 53,507 |
| 2011 | 2,259,527.99 | 835,122 | 964,994 | 1,294,534 | 16.21 | 79,860 |
| 2012 | 22,820.84 | 7,855 | 9,077 | 13,744 | 16.19 | 849 |
| 2013 | 354,359.85 | 112,155 | 129,596 | 224,764 | 16.20 | 13,874 |
| 2014 | 647,868.42 | 186,133 | 215,079 | 432,789 | 16.12 | 26,848 |
| 2015 | 782,596.96 | 200,188 | 231, 320 | 551,277 | 16.00 | 34,455 |
| 2016 | 1,261,351.30 | 278,759 | 322,110 | 939,241 | 15.87 | 59,183 |
| 2017 | 1,393,093.07 | 254,936 | 294,582 | 1,098,511 | 15.62 | 70,327 |
| 2018 | 1,255,797.29 | 176,440 | 203,878 | 1,051,919 | 15.29 | 68,798 |
| 2019 | 1,711,451.10 | 157,796 | 182,335 | 1,529,116 | 14.76 | 103,599 |
| 2020 | 1,658,674.45 | 58,717 | 67,848 | 1,590,826 | 13.62 | 116,801 |
|  | 43,252,189.92 | 21,526,622 | 24,870,208 | 18,381,982 |  | ,246,073 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 14.8 2.88

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

MANCHESTER FACILITY
FULLY ACCRUED

| 1986 | $72,753.01$ | 72,753 | 72,753 |
| ---: | ---: | ---: | ---: |
| 1989 | $42,805.51$ | 42,806 | 42,806 |
| 1990 | $56,762.89$ | 56,763 | 56,763 |
| 1991 | $6,822.59$ | 6,823 | 6,823 |
| 1993 | $14,855.36$ | 14,855 | 14,855 |
| 1994 | $38,204.69$ | 38,205 | 38,205 |
| 1995 | $34,201.35$ | 34,201 | 34,201 |
| 1996 | $15,914.81$ | 15,915 | 15,915 |
| 1997 | $7,985.20$ | 7,985 | 7,985 |
| 1998 | $44,526.07$ | 44,526 | 44,526 |
| 1999 | $18,639.11$ | 18,639 | 18,639 |
| 2002 | $2,790.44$ | 2,790 | 2,790 |
| 2003 | $15,761.05$ | 15,761 | 15,761 |
| 2004 | $97,964.29$ | 97,964 | 97,964 |
| 2005 | $41,986.42$ | 41,986 | 41,986 |
| 2006 | $38,137.34$ | 38,137 | 38,137 |
| 2009 | $29,612.90$ | 29,613 | 29,613 |
|  |  |  |  |
|  | $579,723.03$ | 579,722 | 579,723 |

MANCHESTER FACILITY - SEYMORE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2059

| 2009 | $717,757.40$ | 195,661 | 197,493 | 520,265 | 30.69 | 16,952 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2010 | 197.41 | 50 | 50 | 147 | 30.82 | 5 |
| 2011 | $217,902.26$ | 51,120 | 51,599 | 166,304 | 30.99 | 5,366 |
| 2012 | $317,861.63$ | 68,086 | 68,723 | 249,138 | 31.18 | 7,990 |
| 2013 | $541,535.83$ | 104,787 | 105,768 | 435,768 | 31.26 | 13,940 |
| 2014 | $75,910.78$ | 13,072 | 13,194 | 62,716 | 31.24 | 2,008 |
| 2015 | $567,409.68$ | 84,884 | 85,679 | 481,731 | 31.26 | 15,410 |
| 2016 | $1,067,874.35$ | 134,125 | 135,381 | 932,494 | 31.34 | 29,754 |
| 2017 | $292,389.80$ | 29,473 | 29,749 | 262,641 | 31.22 | 8,413 |
| 2018 | $69,065.79$ | 5,166 | 5,214 | 63,851 | 30.94 | 2,064 |
| 2019 | $24,306.24$ | 1,142 | 1,153 | 23,154 | 30.45 | 760 |
| 2020 | $1,161,060.19$ | 19,738 | 19,923 | $1,141,137$ | 28.91 | 39,472 |
|  |  |  |  |  |  |  |
|  | $5,053,271.36$ | 707,304 | 713,925 | $4,339,346$ |  | 142,134 |

DUQUESNE LIGHT COMPANY

## ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

KIRKWOOD STREET HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2021

| 1970 | $125,095.85$ | 123,710 | 124,868 | 228 | 0.50 | 228 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1971 | $2,145.58$ | 2,121 | 2,141 | 5 | 0.50 | 5 |
|  | $127,241.43$ | 125,831 | 127,009 | 232 | 233 |  |

MCKEESPORT HEADQUARTERS AND SERVICE CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2069

| 2005 | 789.49 | 250 | 252 | 537 | 33.52 | 16 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2011 | 345.06 | 73 | 74 | 271 | 35.14 | 8 |
| 2012 | 56,658.10 | 10,980 | 11,083 | 45,575 | 35.36 | 1,289 |
| 2013 | 28,659.46 | 4,987 | 5,034 | 23,626 | 35.60 | 664 |
| 2014 | 8,745,657.64 | 1,346,831 | 1,359,439 | 7,386,219 | 35.70 | 206,897 |
| 2017 | 76,466.78 | 6,821 | 6,885 | 69,582 | 35.72 | 1,948 |
| 2018 | 310,349.16 | 20,483 | 20,675 | 289,674 | 35.38 | 8,188 |
| 2020 | 2,021.52 | 30 | 30 | 1,991 | 32.83 | 61 |
|  | 9,220,947.21 | 1,390,455 | 1,403,471 | 7,817,476 |  | 219,071 |
| EASTERN DIVISION HEADQUARTERS |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 58-R2 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2043 |  |  |  |  |  |  |
| 1963 | 763,741.19 | 574,051 | 579,425 | 184,316 | 14.11 | 13,063 |
| 1966 | 35,005.31 | 25,731 | 25,972 | 9,033 | 14.91 | 606 |
| 1967 | 6,712.00 | 4,896 | 4,942 | 1,770 | 15.17 | 117 |
| 1968 | 2,398.79 | 1,736 | 1,752 | 647 | 15.42 | 42 |
| 1969 | 398.78 | 286 | 289 | 110 | 15.67 | 7 |
| 1970 | 14,532.88 | 10,354 | 10,451 | 4,082 | 15.92 | 256 |
| 1971 | 1,712.80 | 1,210 | 1,221 | 491 | 16.16 | 30 |
| 1973 | 309.59 | 215 | 217 | 93 | 16.63 | 6 |
| 1974 | 50,454.49 | 34,757 | 35,082 | 15,372 | 16.85 | 912 |
| 1975 | 6,520.93 | 4,453 | 4,495 | 2,026 | 17.07 | 119 |
| 1979 | 4,975.42 | 3,272 | 3,303 | 1,673 | 17.89 | 94 |
| 1980 | 3,063.80 | 1,995 | 2,014 | 1,050 | 18.08 | 58 |
| 1981 | 13,876.60 | 8,942 | 9,026 | 4,851 | 18.26 | 266 |
| 1982 | 1,203.92 | 768 | 775 | 429 | 18.44 | 23 |
| 1983 | 45,119.79 | 30,627 | 30,914 | 14,206 | 17.75 | 800 |
| 1984 | 187,708.72 | 126,065 | 127,245 | 60,464 | 17.85 | 3,387 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

EASTERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2043

| 1986 | $528,650.17$ | 346,530 | 349,774 | 178,876 | 18.13 | 9,866 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1987 | $7,969.56$ | 5,153 | 5,201 | 2,768 | 18.31 | 151 |
| 1988 | $159,195.66$ | 101,408 | 102,357 | 56,838 | 18.52 | 3,069 |
| 1989 | $42,559.22$ | 26,676 | 26,926 | 15,633 | 18.75 | 834 |
| 1990 | $231,419.07$ | 143,295 | 144,636 | 86,783 | 18.76 | 4,626 |
| 1991 | $459,655.52$ | 279,333 | 281,948 | 177,708 | 19.04 | 9,333 |
| 1992 | $109,592.22$ | 65,591 | 66,205 | 43,387 | 19.12 | 2,269 |
| 1994 | $47,651.72$ | 27,528 | 27,786 | 19,866 | 19.37 | 1,026 |
| 1995 | $172,803.05$ | 98,256 | 99,176 | 73,627 | 19.35 | 3,805 |
| 1996 | $114,662.00$ | 63,775 | 64,372 | 50,290 | 19.55 | 2,572 |
| 1997 | $34,103.73$ | 18,593 | 18,767 | 15,337 | 19.60 | 782 |
| 1998 | $5,020.01$ | 2,677 | 2,702 | 2,318 | 19.70 | 118 |
| 1999 | $61,540.30$ | 32,019 | 32,319 | 29,222 | 19.82 | 1,474 |
| 2000 | $86,444.69$ | 43,776 | 44,186 | 42,259 | 19.98 | 2,115 |
| 2003 | $11,430.20$ | 5,321 | 5,371 | 6,059 | 20.09 | 302 |
| 2004 | $791,163.92$ | 355,074 | 358,398 | 432,766 | 20.26 | 21,361 |
| 2005 | $369,432.29$ | 159,743 | 161,238 | 208,194 | 20.34 | 10,236 |
| 2007 | $884,365.38$ | 352,154 | 355,451 | 528,915 | 20.40 | 25,927 |
| 2009 | $142,524.99$ | 51,138 | 51,617 | 90,908 | 20.55 | 4,424 |
| 2010 | $117,515.54$ | 39,732 | 40,104 | 77,412 | 20.56 | 3,765 |
| 2011 | $680,437.10$ | 214,610 | 216,619 | 463,818 | 20.62 | 22,494 |
| 2012 | $1,226,891.07$ | 357,761 | 361,110 | 865,781 | 20.65 | 41,926 |
| 2013 | $47,033.39$ | 12,520 | 12,637 | 34,396 | 20.67 | 1,664 |
| 2014 | $698,058.93$ | 166,976 | 168,539 | 529,520 | 20.67 | 25,618 |
| 2017 | $290,289.00$ | 42,150 | 42,545 | 247,744 | 20.60 | 12,026 |
| 2018 | $3,773,188.27$ | 410,523 | 414,366 | $3,358,822$ | 20.49 | 163,925 |
| 2019 | $2,242,383.33$ | 154,276 | 155,720 | $2,086,663$ | 20.29 | 102,842 |
| 2020 | $144,039.92$ | 3,587 | 3,621 | 140,419 | 19.58 | 7,172 |
|  |  |  |  |  |  | 5 |

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039

| 1963 | $4,207.27$ | 3,248 | 3,278 | 929 | 12.78 | 73 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1964 | $636,606.00$ | 488,652 | 493,226 | 143,380 | 12.98 | 11,046 |
| 1967 | $2,701.54$ | 2,036 | 2,055 | 646 | 13.57 | 48 |
| 1970 | $215,286.77$ | 159,200 | 160,690 | 54,596 | 14.11 | 3,869 |
| 1972 | $13,721.57$ | 10,012 | 10,106 | 3,616 | 14.45 | 250 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039

| 1975 | $6,768.37$ | 4,834 | 4,879 | 1,889 | 14.93 | 127 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1977 | $22,451.12$ | 15,797 | 15,945 | 6,506 | 15.22 | 427 |
| 1978 | $10,948.61$ | 7,643 | 7,715 | 3,234 | 15.36 | 211 |
| 1979 | $35,017.57$ | 24,251 | 24,478 | 10,540 | 15.49 | 680 |
| 1982 | $46,647.04$ | 31,471 | 31,766 | 14,881 | 15.87 | 938 |
| 1983 | $73,273.43$ | 51,936 | 52,422 | 20,851 | 15.41 | 1,353 |
| 1984 | $133,055.69$ | 93,245 | 94,118 | 38,938 | 15.58 | 2,499 |
| 1986 | $479,597.04$ | 329,291 | 332,374 | 147,223 | 15.75 | 9,347 |
| 1988 | $16,004.75$ | 10,715 | 10,815 | 5,189 | 16.04 | 324 |
| 1989 | $3,321.57$ | 2,197 | 2,218 | 1,104 | 16.12 | 68 |
| 1990 | $59,472.81$ | 38,818 | 39,181 | 20,291 | 16.23 | 1,250 |
| 1991 | $44,799.19$ | 28,810 | 29,080 | 15,719 | 16.37 | 960 |
| 1993 | $67,328.74$ | 42,215 | 42,610 | 24,719 | 16.36 | 1,511 |
| 1994 | $47,686.25$ | 29,318 | 29,592 | 18,094 | 16.60 | 1,090 |
| 1995 | $8,477.09$ | 5,145 | 5,193 | 3,284 | 16.52 | 199 |
| 1996 | $32,193.92$ | 19,168 | 19,347 | 12,846 | 16.65 | 772 |
| 1998 | $48,649.81$ | 27,915 | 28,176 | 20,473 | 16.71 | 1,225 |
| 1999 | $18,342.22$ | 10,294 | 10,390 | 7,952 | 16.81 | 473 |
| 2000 | $110,538.40$ | 60,509 | 61,075 | 49,463 | 16.95 | 2,918 |
| 2001 | $4,012.92$ | 2,144 | 2,164 | 1,849 | 17.00 | 109 |
| 2002 | $53,485.02$ | 27,903 | 28,164 | 25,321 | 16.96 | 1,493 |
| 2003 | $71,739.29$ | 36,286 | 36,626 | 35,114 | 17.10 | 2,053 |
| 2004 | $277,883.08$ | 136,635 | 137,914 | 139,969 | 17.06 | 8,205 |
| 2005 | $111,532.14$ | 52,900 | 53,395 | 58,137 | 17.18 | 3,384 |
| 2006 | $571,766.37$ | 261,983 | 264,436 | 307,331 | 17.15 | 17,920 |
| 2008 | $136,831.05$ | 57,469 | 58,007 | 78,824 | 17.26 | 4,567 |
| 2009 | $1,088,002.87$ | 434,113 | 438,177 | 649,826 | 17.32 | 37,519 |
| 2010 | $443,786.94$ | 167,308 | 168,874 | 274,913 | 17.35 | 15,845 |
| 2011 | $973,293.11$ | 344,935 | 348,164 | 625,129 | 17.31 | 36,114 |
| 2012 | $606,590.34$ | 199,568 | 201,436 | 405,154 | 17.34 | 23,365 |
| 2013 | $416,262.05$ | 125,503 | 126,678 | 289,584 | 17.38 | 16,662 |
| 2014 | $158,380.42$ | 43,143 | 43,547 | 114,834 | 17.37 | 6,611 |
| 2017 | $175,358.18$ | 29,460 | 29,736 | 145,622 | 17.33 | 8,403 |
| 2018 | $502,314.07$ | 63,543 | 64,138 | 438,176 | 17.26 | 25,387 |
| 2019 | $469,439.57$ | 37,837 | 38,191 | 431,248 | 17.12 | 25,190 |
|  |  |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WESTERN DISTRICT HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. $6-2038$

| 1968 | $557,788.70$ | 422,051 | 426,002 | 131,787 | 13.26 | 9,939 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1969 | 188.85 | 142 | 143 | 46 | 13.43 | 3 |
| 1976 | $14,704.21$ | 10,564 | 10,663 | 4,041 | 14.46 | 279 |
| 1977 | $11,934.29$ | 8,511 | 8,591 | 3,344 | 14.59 | 229 |
| 1978 | 255.94 | 181 | 183 | 73 | 14.72 | 5 |
| 1983 | $1,450.41$ | 1,039 | 1,049 | 402 | 14.86 | 27 |
| 1984 | $215,204.85$ | 152,387 | 153,813 | 61,391 | 15.05 | 4,079 |
| 1985 | $27,238.65$ | 19,146 | 19,325 | 7,913 | 15.01 | 527 |
| 1992 | $123,857.87$ | 80,136 | 80,886 | 42,972 | 15.55 | 2,763 |
| 1993 | $145,724.42$ | 92,972 | 93,842 | 51,882 | 15.60 | 3,326 |
| 1994 | $5,242.13$ | 3,292 | 3,323 | 1,919 | 15.70 | 122 |
| 1995 | $93,754.40$ | 57,856 | 58,398 | 35,357 | 15.82 | 2,235 |
| 1996 | $3,656.21$ | 2,222 | 2,243 | 1,413 | 15.82 | 89 |
| 1997 | $22,292.39$ | 13,306 | 13,431 | 8,862 | 15.87 | 558 |
| 1998 | $22,292.39$ | 13,041 | 13,163 | 9,129 | 15.96 | 572 |
| 1999 | $72,480.54$ | 41,452 | 41,840 | 30,641 | 16.09 | 1,904 |
| 2000 | $426,623.07$ | 238,738 | 240,973 | 185,650 | 16.13 | 11,510 |
| 2006 | $172,736.47$ | 81,152 | 81,912 | 90,825 | 16.36 | 5,552 |
| 2011 | $458,794.05$ | 167,827 | 169,398 | 289,396 | 16.47 | 17,571 |
| 2017 | $81,446.49$ | 14,253 | 14,386 | 67,060 | 16.50 | 4,064 |
| 2018 | $1,387,300.30$ | 183,401 | 185,118 | $1,202,182$ | 16.40 | 73,304 |

CENTRAL DOWNTOWN - UNDERGROUND
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2027

| 1999 | $18,342.22$ | 14,157 | 14,290 | 4,053 | 6.36 | 637 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2001 | $6,608.19$ | 4,987 | 5,034 | 1,575 | 6.34 | 248 |
| 2004 | $15,679.72$ | 11,305 | 11,411 | 4,269 | 6.38 | 669 |
|  | $40,630.13$ | 30,449 | 30,734 | 9,896 |  | 1,554 |

WOODS RUN \#1 SS\&S CENTRAL DISTRICT
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2036
1980
19,288.25 13,872
14,002
$\begin{array}{lllllll}1983 & 2,331.70 & 1,714 & 1,730 & 602 & 13.52 & 45\end{array}$

$$
5,286 \quad 13.54
$$

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## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODS RUN \#1 SS\&S CENTRAL DISTRICT INTERIM SURVIVOR CURVE.. IOWA 58-R2 PROBABLE RETIREMENT YEAR.. 6-2036

| 1988 | $9,342.33$ | 6,558 | 6,619 | 2,723 | 13.80 | 197 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1989 | $5,588.57$ | 3,873 | 3,909 | 1,679 | 13.95 | 120 |
| 1992 | $9,149.42$ | 6,128 | 6,185 | 2,964 | 14.05 | 211 |
| 1995 | $108,248.42$ | 69,560 | 70,211 | 38,037 | 14.18 | 2,682 |
| 1996 | $19,712.60$ | 12,460 | 12,577 | 7,136 | 14.26 | 500 |
| 2000 | $21,920.47$ | 12,852 | 12,972 | 8,948 | 14.47 | 618 |
| 2001 | $608,086.00$ | 348,616 | 351,880 | 256,206 | 14.51 | 17,657 |
| 2002 | $110,216.69$ | 61,787 | 62,365 | 47,851 | 14.50 | 3,300 |
| 2003 | 393.51 | 215 | 217 | 176 | 14.55 | 12 |
| 2004 | $53,270.31$ | 28,303 | 28,568 | 24,702 | 14.56 | 1,697 |
| 2005 | $29,421.83$ | 15,140 | 15,282 | 14,140 | 14.62 | 967 |
| 2010 | $128,643.52$ | 53,490 | 53,991 | 74,653 | 14.75 | 5,061 |
| 2011 | $265,847.78$ | 104,053 | 105,027 | 160,821 | 14.77 | 10,888 |
| 2012 | $204,961.73$ | 74,914 | 75,615 | 129,346 | 14.76 | 8,763 |
| 2014 | $61,180.72$ | 18,691 | 18,866 | 42,315 | 14.78 | 2,863 |
| 2016 | $168,370.19$ | 39,331 | 39,699 | 128,671 | 14.77 | 8,712 |
| 2017 | $422,802.46$ | 81,094 | 81,853 | 340,949 | 14.75 | 23,115 |
| 2019 | $9,775.80$ | 911 |  | 920 | 8,856 | 14.60 |

WOODS RUN \#2 SOC
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2048

| 1978 | $364,705.29$ | 230,377 | 232,534 | 132,172 | 20.07 | 6,586 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1980 | $76,422.92$ | 47,143 | 47,584 | 28,839 | 20.62 | 1,399 |
| 1981 | $11,189.13$ | 6,816 | 6,880 | 4,309 | 20.89 | 206 |
| 1983 | $28,599.00$ | 18,661 | 18,836 | 9,763 | 19.97 | 489 |
| 1985 | $24,290.54$ | 15,434 | 15,578 | 8,712 | 20.37 | 428 |
| 1987 | $10,641.73$ | 6,560 | 6,621 | 4,020 | 20.85 | 193 |
| 1989 | $1,571.49$ | 936 | 945 | 627 | 21.41 | 29 |
| 1990 | $108,454.19$ | 63,511 | 64,106 | 44,349 | 21.58 | 2,055 |
| 1991 | $24,869.57$ | 14,305 | 14,439 | 10,431 | 21.78 | 479 |
| 1992 | $28,594.86$ | 16,136 | 16,287 | 12,308 | 22.01 | 559 |
| 1994 | $5,927.49$ | 3,220 | 3,250 | 2,677 | 22.28 | 120 |
| 1996 | $62,222.38$ | 32,318 | 32,621 | 29,602 | 22.67 | 1,306 |
| 1997 | $355,041.93$ | 180,219 | 181,906 | 173,136 | 22.80 | 7,594 |
| 1998 | $664,728.08$ | 329,040 | 332,120 | 332,608 | 22.95 | 14,493 |
| 2000 | $82,102.31$ | 38,375 | 38,734 | 43,368 | 23.36 | 1,857 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODS RUN \#2 SOC
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2048

| 2001 | $1,812,941.45$ | 823,801 | 831,513 | 981,429 | 23.42 | 41,906 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2002 | $1,177,675.54$ | 518,531 | 523,385 | 654,290 | 23.52 | 27,818 |
| 2003 | $478,690.44$ | 203,539 | 205,444 | 273,246 | 23.65 | 11,554 |
| 2004 | $57,959.12$ | 23,717 | 23,939 | 34,020 | 23.82 | 1,428 |
| 2005 | $9,296.15$ | 3,660 | 3,694 | 5,602 | 23.87 | 235 |
| 2006 | $138,063.48$ | 52,050 | 52,537 | 85,526 | 23.96 | 3,570 |
| 2007 | $65,303.96$ | 23,451 | 23,671 | 41,633 | 24.09 | 1,728 |
| 2008 | $25,678.51$ | 8,762 | 8,844 | 16,834 | 24.13 | 698 |
| 2009 | 380.29 | 122 | 123 | 257 | 24.21 | 11 |
| 2010 | $16,712.84$ | 5,054 | 5,101 | 11,612 | 24.22 | 479 |
| 2011 | $367,093.22$ | 103,227 | 104,193 | 262,900 | 24.28 | 10,828 |
| 2012 | $716,482.47$ | 185,139 | 186,872 | 529,610 | 24.39 | 21,714 |
| 2013 | $435,240.27$ | 102,194 | 103,151 | 332,090 | 24.45 | 13,582 |
| 2014 | $74,755.32$ | 15,699 | 15,846 | 58,909 | 24.46 | 2,408 |
| 2015 | $147,042.13$ | 27,012 | 27,265 | 119,777 | 24.44 | 4,901 |
| 2017 | $2,546,958.50$ | 319,898 | 322,893 | $2,224,066$ | 24.36 | 91,300 |
| 2018 | $6,568,086.25$ | 616,086 | 621,853 | $5,946,233$ | 24.17 | 246,017 |
| 2019 | $1,266,839.12$ | 74,870 | 75,571 | $1,191,268$ | 23.88 | 49,886 |
|  |  |  |  |  |  |  |
|  | $17,754,559.97$ | $4,109,863$ | $4,148,336$ | $13,606,224$ |  | 567,856 |

WOODS RUN \#3 OFFICE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045

| 1980 | $10,643.90$ | 6,770 | 6,833 | 3,811 | 19.17 | 199 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1983 | $28,554.29$ | 19,060 | 19,238 | 9,316 | 18.68 | 499 |
| 1984 | $46,864.99$ | 30,790 | 31,078 | 15,787 | 19.06 | 828 |
| 1986 | $84,544.03$ | 54,252 | 54,760 | 29,784 | 19.26 | 1,546 |
| 1987 | $584,429.17$ | 370,061 | 373,525 | 210,904 | 19.41 | 10,866 |
| 1988 | $46,209.32$ | 28,835 | 29,105 | 17,104 | 19.58 | 874 |
| 1989 | $106,558.83$ | 65,448 | 66,061 | 40,498 | 19.78 | 2,047 |
| 1990 | $2,040,384.18$ | $1,232,188$ | $1,243,723$ | 796,661 | 20.01 | 39,813 |
| 1991 | $175,326.20$ | 103,968 | 104,941 | 70,385 | 20.25 | 3,476 |
| 1992 | $84,302.22$ | 49,249 | 49,710 | 34,592 | 20.28 | 1,706 |
| 1993 | $137,702.35$ | 79,151 | 79,892 | 57,810 | 20.34 | 2,842 |
| 1994 | $73,806.25$ | 41,464 | 41,852 | 31,954 | 20.67 | 1,546 |
| 1995 | $70,875.93$ | 39,038 | 39,403 | 31,472 | 20.80 | 1,513 |
| 1996 | $454,209.21$ | 244,819 | 247,111 | 207,098 | 20.95 | 9,885 |
| 1997 | $71,092.98$ | 37,594 | 37,946 | 33,147 | 20.94 | 1,583 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODS RUN \#3 OFFICE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045

| 1998 | $54,785.65$ | 28,226 | 28,490 | 26,295 | 21.17 | 1,242 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1999 | $18,672.95$ | 9,394 | 9,482 | 9,191 | 21.24 | 433 |
| 2000 | $648,980.10$ | 318,000 | 320,977 | 328,003 | 21.34 | 15,370 |
| 2001 | $5,178,656.63$ | $2,464,005$ | $2,487,071$ | $2,691,586$ | 21.48 | 125,307 |
| 2002 | $506,218.24$ | 234,126 | 236,318 | 269,901 | 21.50 | 12,554 |
| 2003 | $14,587.38$ | 6,535 | 6,596 | 7,991 | 21.56 | 371 |
| 2004 | $293,940.73$ | 127,071 | 128,261 | 165,680 | 21.67 | 7,646 |
| 2005 | $1,281,401.68$ | 532,294 | 537,277 | 744,125 | 21.81 | 34,119 |
| 2006 | $21,584.04$ | 8,608 | 8,689 | 12,895 | 21.86 | 590 |
| 2009 | $144,817.12$ | 49,629 | 50,094 | 94,724 | 22.06 | 4,294 |
| 2010 | $16,168.14$ | 5,213 | 5,262 | 10,906 | 22.07 | 494 |
| 2011 | $598,331.44$ | 179,619 | 181,300 | 417,031 | 22.15 | 18,828 |
| 2012 | $158,368.55$ | 43,884 | 44,295 | 114,074 | 22.17 | 5,145 |
| 2013 | $267,842.54$ | 67,711 | 68,345 | 199,498 | 22.17 | 8,999 |
| 2014 | $768,012.69$ | 173,724 | 175,350 | 592,662 | 22.24 | 26,648 |
| 2015 | $78,728.29$ | 15,635 | 15,781 | 62,947 | 22.20 | 2,835 |
| 2017 | $1,832,738.23$ | 250,169 | 252,511 | $1,580,227$ | 22.14 | 71,374 |
| 2018 | $130,670.74$ | 13,328 | 13,453 | 117,218 | 22.01 | 5,326 |
| 2019 | $349,048.48$ | 22,514 | 22,725 | 326,324 | 21.76 | 14,997 |
| 2020 | $11,953.25$ |  | 279 |  | 282 | 11,672 |
|  |  |  | 20.96 | 557 |  |  |

WOODS RUN \#4 COMMUNICATIONS HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045

| 1980 | $10,712.51$ | 6,814 | 6,878 | 3,835 | 19.17 | 200 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1983 | $3,657.61$ | 2,441 | 2,464 | 1,194 | 18.68 | 64 |
| 1986 | $35,933.38$ | 23,058 | 23,274 | 12,660 | 19.26 | 657 |
| 1988 | $9,286.46$ | 5,795 | 5,849 | 3,437 | 19.58 | 176 |
| 1994 | $20,620.18$ | 11,584 | 11,692 | 8,928 | 20.67 | 432 |
| 1996 | 744.81 | 401 | 405 | 340 | 20.95 | 16 |
| 1997 | $54,555.88$ | 28,849 | 29,119 | 25,437 | 20.94 | 1,215 |
| 2000 | $23,528.39$ | 11,529 | 11,637 | 11,891 | 21.34 | 557 |
| 2001 | $795,962.89$ | 378,719 | 382,264 | 413,699 | 21.48 | 19,260 |
| 2002 | $76,989.54$ | 35,608 | 35,941 | 41,048 | 21.50 | 1,909 |
| 2003 | 442.71 | 198 | 200 | 243 | 21.56 | 11 |
| 2004 | $2,379.61$ | 1,029 | 1,039 | 1,341 | 21.67 | 62 |
| 2011 | $9,864.93$ | 2,961 | 2,989 | 6,876 | 22.15 | 310 |

DUQUESNE LIGHT COMPANY
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CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODS RUN \#4 COMMUNICATIONS HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045

| 2016 | $9,718.51$ | 1,640 | 1,655 | 8,063 | 22.17 | 364 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | $274,266.89$ | 17,690 | 17,856 | 256,411 | 21.76 | 11,784 |
| 2020 | $30,834.00$ | 718 | 725 | 30,109 | 20.96 | 1,436 |
|  | $1,359,498.30$ | 529,034 | 533,986 | 825,512 |  |  |
|  |  |  |  | 38,453 |  |  |

WOODS RUN GUARD HOUSE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045

| 1978 | $1,456.15$ | 946 | 955 | 501 | 18.72 | 27 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1980 | $527,586.95$ | 335,566 | 338,707 | 188,880 | 19.17 | 9,853 |
| 1985 | $814,275.66$ | 528,953 | 533,905 | 280,371 | 19.15 | 14,641 |
| 1986 | $14,436.99$ | 9,264 | 9,351 | 5,086 | 19.26 | 264 |
| 1987 | $3,846.01$ | 2,435 | 2,458 | 1,388 | 19.41 | 72 |
| 1988 | $8,030.81$ | 5,011 | 5,058 | 2,973 | 19.58 | 152 |
| 1990 | $60,792.87$ | 36,713 | 37,057 | 23,736 | 20.01 | 1,186 |
| 1991 | 852.26 | 505 | 510 | 343 | 20.25 | 17 |
| 1996 | $24,149.01$ | 13,016 | 13,138 | 11,011 | 20.95 | 526 |
| 1998 | $15,769.11$ | 8,124 | 8,200 | 7,569 | 21.17 | 358 |
| 2000 | $6,001.12$ | 2,941 | 2,969 | 3,033 | 21.34 | 142 |
| 2001 | $15,255.18$ | 7,258 | 7,326 | 7,929 | 21.48 | 369 |
| 2009 | $605,416.08$ | 207,476 | 209,418 | 395,998 | 22.06 | 17,951 |
|  |  |  |  |  |  | 45,558 |

RACCOON T \& D HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037

| 1982 | $6,317,725.62$ | $4,401,054$ | $4,442,253$ | $1,875,472$ | 14.45 | 129,790 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1987 | $9,723.43$ | 6,775 | 6,838 | 2,885 | 14.58 | 198 |
| 1988 | $44,445.57$ | 30,623 | 30,910 | 13,536 | 14.67 | 923 |
| 1989 | $146,031.48$ | 99,827 | 100,762 | 45,270 | 14.58 | 3,105 |
| 1990 | $46,056.95$ | 31,042 | 31,333 | 14,724 | 14.75 | 998 |
| 1991 | $11,020.00$ | 7,347 | 7,416 | 3,604 | 14.75 | 244 |
| 2000 | $44,538.57$ | 25,476 | 25,714 | 18,824 | 15.34 | 1,227 |
| 2001 | $4,012.94$ | 2,246 | 2,267 | 1,746 | 15.34 | 114 |
| 2002 | $5,351.86$ | 2,921 | 2,948 | 2,404 | 15.40 | 156 |
| 2003 | $44,811.29$ | 23,840 | 24,063 | 20,748 | 15.39 | 1,348 |

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|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

RACCOON T \& D HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037

| 2004 | $91,719.17$ | 47,364 | 47,807 | 43,912 | 15.45 | 2,842 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2005 | $21,456.35$ | 10,741 | 10,842 | 10,615 | 15.46 | 687 |
| 2009 | $73,876.90$ | 31,353 | 31,647 | 42,230 | 15.60 | 2,707 |
| 2011 | $183,925.81$ | 69,542 | 70,193 | 113,733 | 15.63 | 7,277 |
| 2012 | $36,959.20$ | 13,006 | 13,128 | 23,831 | 15.65 | 1,523 |
| 2013 | $524,331.25$ | 169,883 | 171,473 | 352,858 | 15.65 | 22,547 |
| 2014 | $291,447.41$ | 85,452 | 86,252 | 205,195 | 15.67 | 13,095 |
| 2015 | $5,559.62$ | 1,447 | 1,461 | 4,099 | 15.64 | 262 |
| 2018 | $56,915.29$ | 7,866 | 7,940 | 48,976 | 15.58 | 3,144 |
| 2019 | $1,505,125.32$ | 133,204 | 134,451 | $1,370,674$ | 15.45 | 88,717 |
|  | $9,465,034.03$ | $5,201,009$ | $5,249,697$ | $4,215,337$ |  | 280,904 |

RACCOON S \& S HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037

| 1982 | $2,384,494.57$ | $1,661,087$ | $1,676,637$ |
| :--- | ---: | ---: | ---: |
| 1988 | $11,180.00$ | 7,703 | 7,775 |
| 1991 | $12,027.76$ | 8,019 | 8,094 |
| 1996 | $35,462.54$ | 21,980 | 22,186 |
| 2000 | 44.99 | 26 | 26 |
| 2002 | $5,351.86$ | 2,921 | 2,948 |
| 2003 | $2,719.34$ | 1,447 | 1,461 |
| 2011 | $69,719.58$ | 26,361 | 26,608 |
| 2012 | $23,737.40$ | 8,353 | 8,431 |
| 2013 | $88,027.35$ | 28,521 | 28,788 |
| 2014 | $101,544.73$ | 29,773 | 30,052 |
| 2017 | $110,769.71$ | 20,271 | 20,461 |
|  |  |  |  |
|  | $2,845,079.83$ | $1,816,462$ | $1,833,466$ |


| 707,858 | 14.45 | 48,987 |
| ---: | ---: | ---: |
| 3,405 | 14.67 | 232 |
| 3,934 | 14.75 | 267 |
| 13,277 | 15.03 | 883 |
| 19 | 15.34 | 1 |
| 2,404 | 15.40 | 156 |
| 1,259 | 15.39 | 82 |
| 43,112 | 15.63 | 2,758 |
| 15,306 | 15.65 | 978 |
| 59,239 | 15.65 | 3,785 |
| 71,493 | 15.67 | 4,562 |
| 90,309 | 15.62 | 5,782 |
|  |  | 68,473 |

RACCOON GARAGE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037

| 1982 | $1,518,371.46$ | $1,057,728$ | $1,067,630$ | 450,741 | 14.45 | 31,193 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1987 | $2,732.66$ | 1,904 | 1,922 | 811 | 14.58 | 56 |
| 1988 | $5,314.81$ | 3,662 | 3,696 | 1,619 | 14.67 | 110 |
| 1991 | $60,628.56$ | 40,421 | 40,799 | 19,829 | 14.75 | 1,344 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

RACCOON GARAGE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037

| 1996 | $10,477.93$ | 6,494 | 6,555 | 3,923 | 15.03 | 261 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1998 | $32,432.02$ | 19,336 | 19,517 | 12,915 | 15.24 | 847 |
| 2004 | $1,773.48$ | 916 | 925 | 849 | 15.45 | 55 |
| 2007 | $83,517.03$ | 38,785 | 39,148 | 44,369 | 15.57 | 2,850 |
| 2011 | $44,221.68$ | 16,720 | 16,877 | 27,345 | 15.63 | 1,750 |
| 2018 | $59,727.99$ | 8,254 | 8,331 | 51,397 | 15.58 | 3,299 |
| 2019 | $111,256.63$ | 9,846 | 9,938 | 101,318 | 15.45 | 6,558 |
| 2020 | $26,926.73$ | 864 | 872 | 26,055 | 15.08 | 1,728 |
|  |  |  |  |  | 741,171 | 50,051 |

PREBLE AVE SERVICE CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061

| 2006 | $13,103,749.96$ | $4,161,751$ | $4,200,710$ |
| ---: | ---: | ---: | ---: |
| 2009 | $43,868.25$ | 11,704 | 11,814 |
| 2010 | $96,421.61$ | 23,893 | 24,117 |
| 2011 | $889,736.97$ | 203,750 | 205,657 |
| 2012 | $1,024,739.40$ | 214,273 | 216,279 |
| 2013 | $355,475.72$ | 67,185 | 67,814 |
| 2014 | $466,079.68$ | 78,162 | 78,894 |
| 2015 | $9,985.04$ | 1,450 | 1,464 |
| 2016 | $27,421.61$ | 3,356 | 3,387 |
| 2017 | $501,314.78$ | 49,129 | 49,589 |
| 2018 | $102,290.68$ | 7,416 | 7,485 |
| 2019 | $462,254.18$ | 20,986 | 21,182 |
| 2020 | $95,323.24$ | 1,573 | 1,588 |
|  |  |  |  |
|  | $17,178,661.12$ | $4,844,628$ | $4,889,980$ |


| $8,903,040$ | 31.16 | 285,720 |
| ---: | ---: | ---: |
| 32,055 | 31.60 | 1,014 |
| 72,305 | 31.87 | 2,269 |
| 684,080 | 31.99 | 21,384 |
| 808,461 | 32.15 | 25,147 |
| 287,662 | 32.18 | 8,939 |
| 387,186 | 32.26 | 12,002 |
| 8,521 | 32.38 | 263 |
| 24,034 | 32.26 | 745 |
| 451,726 | 32.21 | 14,024 |
| 94,805 | 31.98 | 2,965 |
| 441,072 | 31.50 | 14,002 |
| 93,736 | 29.80 | 3,146 |
|  |  |  |
| $12,288,681$ |  | 391,620 |

WOODS RUN TRAINING CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2056

| 2006 | $9,427,600.47$ | $3,158,246$ | $3,187,812$ | $6,239,789$ | 28.79 | 216,735 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2008 | $4,263,403.25$ | $1,284,137$ | $1,296,158$ | $2,967,245$ | 29.00 | 102,319 |
| 2010 | $878,117.71$ | 231,472 | 233,639 | 644,479 | 29.34 | 21,966 |
| 2011 | $792,458.08$ | 193,518 | 195,330 | 597,128 | 29.41 | 20,304 |
| 2012 | $161,276.30$ | 36,061 | 36,399 | 124,878 | 29.52 | 4,230 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WOODS RUN TRAINING CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2056

| 2013 | $44,427.00$ | 8,996 | 9,080 | 35,347 | 29.54 | 1,197 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2014 | $923,602.26$ | 166,248 | 167,804 | 755,798 | 29.60 | 25,534 |
| 2015 | $347,160.16$ | 54,435 | 54,945 | 292,216 | 29.59 | 9,875 |
| 2017 | $84,726.10$ | 8,981 | 9,065 | 75,661 | 29.50 | 2,565 |
| 2018 | $40,668.35$ | 3,192 | 3,222 | 37,446 | 29.35 | 1,276 |
| 2019 | $1,048,624.49$ | 51,802 | 52,287 | 996,338 | 28.89 | 34,487 |
| 2020 | $419,698.53$ | 7,471 | 7,541 | 412,158 | 27.51 | 14,982 |
|  |  |  |  |  |  | 455,470 |

WOODS RUN \#5 TRANSPORTATION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061

| 2011 | 157,195.44 | 35,998 |  |
| :---: | :---: | :---: | :---: |
| 2012 | 13,010.91 | 2,721 |  |
| 2013 | 1,009,137.65 | 190,727 | 19 |
| 2014 | 169,891.52 | 28,491 |  |
| 2019 | 178,944.62 | 8,124 |  |
| 2020 | 98,561.36 | 1,626 |  |
|  | 1,626,741.50 | 267,687 | 2 |
| INDEPENDENT ALTERNATE OPERATIONS CENTER |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 58-R2 |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2068 |  |  |  |


| 2013 | $4,142,612.11$ | 727,028 | 733,833 | $3,408,779$ | 35.24 | 96,730 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2015 | $116,942.76$ | 15,764 | 15,912 | 101,031 | 35.31 | 2,861 |
|  | $4,259,554.87$ | 742,792 | 749,745 | $3,509,810$ | 99,591 |  |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1905 | $8,881.12$ | 8,881 | 8,881 |
| ---: | ---: | ---: | ---: |
| 1925 | 737.36 | 737 | 737 |
| 1926 | 15.05 | 15 | 15 |
| 1931 | $16,963.00$ | 16,963 | 16,963 |
| 1935 | 421.35 | 421 | 421 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1940 | 19.26 | 19 | 19 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1942 | 180.69 | 181 | 181 |  |  |  |
| 1948 | 22,914.33 | 22,481 | 22,695 | 219 | 0.85 | 219 |
| 1949 | 4,128.17 | 4,029 | 4,067 | 61 | 1.08 | 56 |
| 1950 | 1,448.04 | 1,406 | 1,419 | 29 | 1.32 | 22 |
| 1952 | 451.75 | 434 | 438 | 14 | 1.81 | 8 |
| 1958 | 4,032.50 | 3,732 | 3,768 | 265 | 3.35 | 79 |
| 1965 | 539.23 | 477 | 482 | 58 | 5.21 | 11 |
| 1967 | 6,665.75 | 5,807 | 5,862 | 803 | 5.80 | 138 |
| 1969 | 11,087.35 | 9,496 | 9,587 | 1,501 | 6.46 | 232 |
| 1970 | 11,759.50 | 9,980 | 10,075 | 1,684 | 6.81 | 247 |
| 1976 | 6,822.07 | 5,409 | 5,461 | 1,362 | 9.32 | 146 |
| 1977 | 22,254.33 | 17,403 | 17,569 | 4,685 | 9.81 | 478 |
| 1984 | 794.00 | 591 | 597 | 197 | 12.52 | 16 |
| 1986 | 8,506.94 | 6,076 | 6,134 | 2,373 | 13.81 | 172 |
| 1990 | 11,312.32 | 7,384 | 7,454 | 3,858 | 16.23 | 238 |
| 1993 | 1,317.79 | 794 | 802 | 516 | 18.16 | 28 |
| 1995 | 63,828.64 | 36,133 | 36,477 | 27,351 | 19.55 | 1,399 |
| 1996 | 253,546.74 | 139,146 | 140,472 | 113,075 | 20.14 | 5,614 |
| 1998 | 445,768.99 | 227,699 | 229,869 | 215,900 | 21.55 | 10,019 |
| 1999 | 88,722.68 | 43,687 | 44,103 | 44,619 | 22.17 | 2,013 |
| 2000 | 50,481.45 | 23,802 | 24,029 | 26,453 | 22.98 | 1,151 |
| 2001 | 533,821. 31 | 241,501 | 243,803 | 290,019 | 23.60 | 12,289 |
| 2002 | 1,135.42 | 489 | 494 | 642 | 24.42 | 26 |
| 2003 | 38,314.25 | 15,755 | 15,905 | 22,409 | 25.06 | 894 |
| 2004 | 9,962.85 | 3,880 | 3,917 | 6,046 | 25.87 | 234 |
| 2005 | 8,898.54 | 3,269 | 3,300 | 5,598 | 26.69 | 210 |
| 2006 | 414,602.49 | 143,701 | 145,071 | 269,532 | 27.34 | 9,859 |
| 2007 | 40,724.00 | 13,195 | 13,321 | 27,403 | 28.17 | 973 |
| 2009 | 149,026.72 | 41,638 | 42,035 | 106,992 | 29.65 | 3,608 |
| 2011 | 755,652.56 | 175,916 | 177,593 | 578,060 | 31.31 | 18,462 |
| 2012 | 55,610.94 | 11,628 | 11,739 | 43,872 | 32.15 | 1,365 |
| 2013 | 141,977.07 | 26,408 | 26,660 | 115,317 | 32.82 | 3,514 |
| 2014 | 72,303.91 | 11,699 | 11,810 | 60,493 | 33.66 | 1,797 |
| 2015 | 605,872.50 | 83,307 | 84,101 | 521,772 | 34.50 | 15,124 |
| 2016 | 207,767.07 | 23,561 | 23,786 | 183,982 | 35.18 | 5,230 |
| 2017 | 704,279.90 | 62,399 | 62,994 | 641,286 | 36.02 | 17,804 |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 2018 | $807,875.53$ | 51,542 | 52,033 | 755,842 | 36.71 | 20,590 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2019 | $467,796.92$ | 18,057 | 18,229 | 449,568 | 37.41 | 12,017 |
| 2020 | $330,900.47$ | 4,335 | 4,376 | 326,524 | 37.67 | 8,668 |
|  | $6,390,122.85$ | $1,525,463$ | $1,539,743$ | $4,850,380$ | 154,950 |  |
|  |  |  |  |  |  |  |
| 143,698,136.61 | $46,875,261$ | $47,308,645$ | $96,389,489$ | $4,001,847$ |  |  | RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 20-SQUARE

| 1998 | $22,500.54$ | 22,501 | 22,501 |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2000 | $548,018.81$ | 548,019 | 548,019 |  |  |  |
| 2001 | $20,471.30$ | 19,960 | 20,353 | 118 | 0.50 | 118 |
| 2002 | $5,904.89$ | 5,462 | 5,570 | 335 | 1.50 | 223 |
| 2003 | $206,707.26$ | 180,869 | 184,430 | 22,277 | 2.50 | 8,911 |
| 2004 | $15,493.02$ | 12,782 | 13,034 | 2,459 | 3.50 | 703 |
| 2005 | $244,565.11$ | 189,538 | 193,269 | 51,296 | 4.50 | 11,399 |
| 2006 | $584,112.45$ | 423,482 | 431,819 | 152,293 | 5.50 | 27,690 |
| 2007 | 0.08 |  |  |  |  |  |
| 2009 | $5,884.00$ | 3,383 | 3,450 | 2,434 | 8.50 | 286 |
| 2011 | $131,314.49$ | 62,374 | 63,602 | 67,712 | 10.50 | 6,449 |
| 2012 | $200,674.00$ | 85,286 | 86,965 | 113,709 | 11.50 | 9,888 |
| 2013 | $347,322.84$ | 130,246 | 132,810 | 214,513 | 12.50 | 17,161 |
| 2014 | $583,739.30$ | 189,715 | 193,450 | 390,289 | 13.50 | 28,910 |
| 2015 | $1,539,521.11$ | 423,368 | 431,703 | $1,107,818$ | 14.50 | 76,401 |
| 2016 | $26,077.70$ | 5,867 | 5,983 | 20,095 | 15.50 | 1,296 |
| 2017 | $418,912.23$ | 73,310 | 74,753 | 344,159 | 16.50 | 20,858 |
| 2018 | $552,975.63$ | 69,122 | 70,483 | 482,493 | 17.50 | 27,571 |
| 2019 | $466,288.94$ | 34,972 | 35,660 | 430,629 | 18.50 | 23,277 |
| 2020 | $493,498.96$ | 12,337 | 12,580 | 480,919 | 19.50 | 24,663 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 13.6 4.46

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE ACCOUNT 391.2 OFFICE FURNITURE AND EQUIPMENT - E.D.P. EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 5-SQUARE

| 2016 | $6,431,370.31$ | $5,788,233$ | $5,696,588$ | 734,782 | 0.50 | 734,782 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2017 | $5,428,646.78$ | $3,800,053$ | $3,739,886$ | $1,688,761$ | 1.50 | $1,125,841$ |
| 2018 | $2,837,782.26$ | $1,418,891$ | $1,396,426$ | $1,441,356$ | 2.50 | 576,542 |
| 2019 | $6,095,848.11$ | $1,828,754$ | $1,799,799$ | $4,296,049$ | 3.50 | $1,227,443$ |
| 2020 | $4,561,515.87$ | 456,152 | 448,930 | $4,112,586$ | 4.50 | 913,908 |
|  | $25,355,163.33$ | $13,292,083$ | $13,081,629$ | $12,273,534$ |  | $4,578,516$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 2.718 .06

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 30-SQUARE

| 1991 | $34,116.35$ | 33,548 | 33,615 | 501 | 0.50 | 501 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1993 | $107,936.90$ | 98,943 | 99,142 | 8,795 | 2.50 | 3,518 |
| 1994 | $102,887.68$ | 90,884 | 91,066 | 11,822 | 3.50 | 3,378 |
| 2000 | $130,828.73$ | 89,399 | 89,578 | 41,251 | 9.50 | 4,342 |
| 2001 | $8,530.94$ | 5,545 | 5,556 | 2,975 | 10.50 | 283 |
| 2003 | $61,839.75$ | 36,073 | 36,145 | 25,695 | 12.50 | 2,056 |
| 2006 | $944,989.56$ | 456,742 | 457,659 | 487,331 | 15.50 | 31,441 |
| 2014 | $22,400.00$ | 4,853 | 4,863 | 17,537 | 23.50 | 746 |
| 2020 | $207,126.49$ | 3,453 | 3,460 | 203,667 | 29.50 | 6,904 |
|  |  |  |  |  |  |  |
|  | $1,620,656.40$ | 819,440 | 821,084 | 799,572 |  | 53,169 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 15.0 3. 28

## ACCOUNT 394 TOOLS, SHOP AND GARAGE EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 25-SQUARE

| 1992 | 124,457.18 | 124,457 | 124,457 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1993 | 249,188.04 | 249,188 | 249,188 |  |  |  |
| 1994 | 7,863.75 | 7,864 | 7,864 |  |  |  |
| 1996 | 63,672.70 | 62,399 | 61,291 | 2,382 | 0.50 | 2,382 |
| 1997 | 183,835.64 | 172,806 | 169,738 | 14,098 | 1.50 | 9,399 |
| 2000 | 195,075.03 | 159,962 | 157,122 | 37,953 | 4.50 | 8,434 |
| 2001 | 378,459.71 | 295,199 | 289,959 | 88,501 | 5.50 | 16,091 |
| 2002 | 583,922.00 | 432,102 | 424,432 | 159,490 | 6.50 | 24,537 |
| 2003 | 298,630.88 | 209,042 | 205,331 | 93,300 | 7.50 | 12,440 |
| 2004 | 321,887.03 | 212,445 | 208,674 | 113,213 | 8.50 | 13,319 |
| 2005 | 414,543.82 | 257,017 | 252,455 | 162,089 | 9.50 | 17,062 |
| 2006 | 2,711,903.67 | 1,572,904 | 1,544,982 | 1,166,922 | 10.50 | 111,135 |
| 2007 | 764,289.56 | 412,716 | 405,390 | 358,900 | 11.50 | 31,209 |
| 2008 | 268,216.94 | 134,108 | 131, 727 | 136,490 | 12.50 | 10,919 |
| 2009 | 1,706,958.42 | 785,201 | 771,262 | 935,696 | 13.50 | 69,311 |
| 2010 | 1,011,921.05 | 425,007 | 417,462 | 594,459 | 14.50 | 40,997 |
| 2011 | 1,218,704.71 | 463,108 | 454,887 | 763,818 | 15.50 | 49,279 |
| 2012 | 2,377,461.89 | 808,337 | 793,988 | 1,583,474 | 16.50 | 95,968 |
| 2013 | 1,677,887.50 | 503,366 | 494,431 | 1,183,456 | 17.50 | 67,626 |
| 2014 | 1,169,820.44 | 304,153 | 298,754 | 871,066 | 18.50 | 47,085 |
| 2015 | 1,372,966.46 | 302,053 | 296,691 | 1,076,275 | 19.50 | 55,194 |
| 2016 | 2,929,954.18 | 527,392 | 518,030 | 2,411,924 | 20.50 | 117,655 |
| 2017 | 1,388,523.37 | 194,393 | 190,942 | 1,197,581 | 21.50 | 55,701 |
| 2018 | 1,592,694.53 | 159,269 | 156,442 | 1,436,253 | 22.50 | 63,833 |
| 2019 | 2,767,616.97 | 166,057 | 163,109 | 2,604,508 | 23.50 | 110,830 |
| 2020 | 2, 052, 350.45 | 41,047 | 40,318 | 2,012,032 | 24.50 | 82,124 |
|  | $27,832,805.92$ | 8,981,592 | 8,828,926 | 19,003,880 |  | 1,112,530 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 17.1 4.00 RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2020

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 20-SQUARE

| 2000 | $4,624.31$ | 4,624 | 4,624 |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2001 | $36,572.84$ | 35,659 | 35,520 | 1,053 | 0.50 | 1,053 |
| 2002 | $79,984.00$ | 73,985 | 73,696 | 6,288 | 1.50 | 4,192 |
| 2005 | $139,720.33$ | 108,283 | 107,860 | 31,860 | 4.50 | 7,080 |
| 2006 | $58,532.76$ | 42,436 | 42,270 | 16,263 | 5.50 | 2,957 |
| 2008 | 845.29 | 528 | 526 | 319 | 7.50 | 43 |
| 2009 | $31,479.93$ | 18,101 | 18,030 | 13,450 | 8.50 | 1,582 |
| 2010 | $516,042.61$ | 270,922 | 269,863 | 246,180 | 9.50 | 25,914 |
| 2011 | $42,334.35$ | 20,109 | 20,030 | 22,304 | 10.50 | 2,124 |
| 2012 | $428,035.95$ | 181,915 | 181,204 | 246,832 | 11.50 | 21,464 |
| 2013 | $67,929.97$ | 25,474 | 25,374 | 42,556 | 12.50 | 3,404 |
| 2015 | $242,718.47$ | 66,748 | 66,487 | 176,231 | 14.50 | 12,154 |
| 2017 | $181,601.91$ | 31,780 | 31,656 | 149,946 | 16.50 | 9,088 |
| 2018 | $65,051.76$ | 8,131 | 8,100 | 56,952 | 17.50 | 3,254 |
|  |  |  |  |  |  |  |
|  | $1,895,474.48$ | 888,695 | 885,240 | $1,010,235$ |  | 94,309 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 10.7 4.98

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 15-SQUARE

| 2005 | $10,955.45$ | 10,955 | 10,955 |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2006 | $6,517,245.72$ | $6,300,026$ | $6,272,612$ | 244,634 | 0.50 | 244,634 |
| 2007 | $1,703,443.26$ | $1,533,099$ | $1,526,428$ | 177,015 | 1.50 | 118,010 |
| 2008 | $4,225,955.80$ | $3,521,616$ | $3,506,292$ | 719,664 | 2.50 | 287,866 |
| 2009 | $4,102,141.10$ | $3,144,989$ | $3,131,303$ | 970,838 | 3.50 | 277,382 |
| 2010 | $557,365.17$ | 390,156 | 388,458 | 168,907 | 4.50 | 37,535 |
| 2011 | $4,340,229.69$ | $2,748,798$ | $2,736,837$ | $1,603,393$ | 5.50 | 291,526 |
| 2012 | $4,819,734.12$ | $2,731,199$ | $2,719,314$ | $2,100,420$ | 6.50 | 323,142 |
| 2013 | $8,143,219.35$ | $4,071,610$ | $4,053,892$ | $4,089,327$ | 7.50 | 545,244 |
| 2014 | $2,275,528.91$ | 986,055 | 981,764 | $1,293,765$ | 8.50 | 152,208 |
| 2015 | $13,005,614.18$ | $4,768,769$ | $4,748,018$ | $8,257,596$ | 9.50 | 869,221 |
| 2016 | $11,888,517.73$ | $3,566,555$ | $3,551,035$ | $8,337,483$ | 10.50 | 794,046 |
| 2017 | $1,458,922.84$ | 340,410 | 338,929 | $1,119,994$ | 11.50 | 97,391 |
| 2018 | $3,264,861.41$ | 544,154 | 541,786 | $2,723,075$ | 12.50 | 217,846 |
| 2019 | $7,068,399.18$ | 706,840 | 703,764 | $6,364,635$ | 13.50 | 471,454 |
| 2020 | $792,914.98$ | 26,428 | 26,313 | 766,602 | 14.50 | 52,869 |
|  |  |  |  |  |  |  |
|  | $74,175,048.89$ | $35,391,659$ | $35,237,700$ | $38,937,348$ |  | $4,780,374$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 8.1 6.44

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. 20-SQUARE

| 2002 | $77,503.00$ | 71,690 | 70,235 | 7,268 | 1.50 | 4,845 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2004 | $60,334.98$ | 49,776 | 48,765 | 11,570 | 3.50 | 3,306 |
| 2005 | $45,054.60$ | 34,917 | 34,208 | 10,847 | 4.50 | 2,410 |
| 2006 | $36,150.54$ | 26,209 | 25,677 | 10,474 | 5.50 | 1,904 |
| 2007 | 351.23 | 237 | 232 | 119 | 6.50 | 18 |
| 2015 | $10,621.75$ | 2,921 | 2,862 | 7,759 | 14.50 | 535 |
|  | $230,016.10$ | 185,750 | 181,979 | 48,037 |  | 13,018 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.7 5.66

## PART III. EXPERIENCED NET SALVAGE

EXPERIENCED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE

ACCT $\quad$ REGULAR
RETIREMENT RETIREMENTS

COST OF
REMOVAL

GROSS
SALVAGE

NET
SALVAGE

2016 TRANSACTION YEAR
303.00
352.00
353.00
354.00
355.00
356.00
357.00
358.00
361.00
362.00
364.11
365.01
366.00
367.00
368.00
369.20
370.00
370.10
373.00
390.10
392.00
393.00
394.00
395.00
397.00
398.00

$$
\begin{array}{r}
7,376,894.63 \\
10,903.68 \\
3,513,445.92 \\
1,363.82 \\
36,521.25 \\
145,866.40 \\
\\
30,114.39 \\
969,334.18 \\
3,165,643.82 \\
4,011,488.37 \\
2,037,103.88 \\
7,696,845.50 \\
5,566,032.45 \\
88,409.16 \\
26,203,991.17 \\
20,563.25 \\
894,301.27 \\
27,433.44 \\
4,271,213.01 \\
177,767.94 \\
570,224.57 \\
221,859.42 \\
1,968,085.41 \\
4,448.76
\end{array}
$$

$$
69,009,855.69
$$

85,929.47
$1,144,499.45$
4,753.86
1,089.57
20,472.46
681,770.97
17,436.80
15,176.33
838,922.68
$2,370,888.64$
3,708,346.57
69,364.30
719,726.11
1,152,549.04
799,703.54
38,282. 85

96,120.89
298,888.81
434,966.40
17,436.80
15.56

7,534.44
1,156,013.35
1,504,230.05
265,679.41
859,660.62
1,098,102.96
$176,179.52$

-
路
$390,121.40$
96,120.89298,888.81 390,121.40

5,909,940.51 6,153,981.83-

EXPERIENCED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE
$\begin{array}{cc} & \text { REGULAR } \\ \text { ACCT }\end{array}$
COST OF
REMOVAL
GROSS
SALVAGE

NET
SALVAGE

## 2017 TRANSACTION YEAR

| 303.00 | $2,990,977.95$ |
| ---: | ---: |
| 350.00 | $22,290.30$ |
| 352.00 | $93,267.32$ |
| 353.00 | $2,396,820.00$ |
| 356.00 | $27,400.41$ |
| 357.00 | $11,129.15$ |
| 360.00 | $90,950.90$ |
| 361.00 | $17,000.91$ |
| 362.00 | $1,456,115.01$ |
| 364.11 | $6,259,162.37$ |
| 365.01 | $6,477,151.12$ |
| 366.00 | $78,627.23$ |
| 367.00 | $2,880,853.29$ |
| 368.00 | $6,845,491.37$ |
| 369.20 | $457,517.88$ |
| 370.00 | $21,380,302.84$ |
| 370.10 | $12,491.73$ |
| 373.00 | $1,144,840.20$ |
| 390.10 | $299,416.57$ |
| 391.00 | $1,618,904.25$ |
| 392.00 | $4,448,975.34$ |
| 393.00 | $14,796.06$ |
| 394.00 | $391,617.62$ |
| 395.00 | $610,947.01$ |
| 397.00 | $3,168,684.48$ |

63,195,731. 31
2018 TRANSACTION YEAR

| 352.00 | $48,329.79$ |
| ---: | ---: |
| 353.00 | $3,138,131.87$ |
| 355.00 | $3,803.03$ |
| 356.00 | $3,819.27$ |
| 362.00 | $1,700,184.77$ |
| 364.11 | $8,815,643.61$ |
| 365.01 | $10,674,256.33$ |
| 366.00 | $227,644.37$ |
| 367.00 | $7,741,079.25$ |
| 368.00 | $10,307,824.66$ |
| 369.20 | $1,045,988.52$ |
| 370.00 | $25,943,853.96$ |
| 373.00 | $573,911.34$ |
| 390.10 | $17,350.21$ |
| 392.00 | $1,902,741.55$ |
| 396.00 | $302,297.30$ |
| 397.00 | $2,171,279.67$ |

$74,618,139.50$

$$
9,481,201.45
$$

| $1,137.23-$ | $29,000.00$ | $30,137.23$ |
| ---: | ---: | ---: |
| $58,443.94$ | $1,523.85$ | $56,920.09-$ |
| $678,910.71$ | $60,109.10$ | $618,801.61-$ |
| $45,487.38$ | $23,011.67$ | $22,475.71-$ |
| $197,757.98$ | $194,412.25$ | $3,345.73-$ |
| $14,089.24$ |  | $14,089.24-$ |
| $1,075,470.04$ | $28,424.69$ | $1,047,045.35-$ |
| $3,135,094.68$ | $893,246.99$ | $2,241,847.69-$ |
| $1,121,162.38$ | $597,641.05$ | $523,521.33-$ |
| $31,923.59$ | $1,482.81$ | $30,440.78-$ |
| $547,037.25$ | $498,352.48$ | $48,684.77-$ |
| $1,077,400.80$ | $1,095,428.06$ | $18,027.26$ |
| $1,442,930.18$ |  | $1,442,930.18-$ |
| $2,008.39$ |  | $2,008.39-$ |
|  |  | $37,051.86-$ |
| $37,051.86$ |  | $60,454.26-$ |
| $60,454.26$ |  | $170,958.50$ |
| $42,884.00-$ | $128,074.50$ |  |
|  |  |  |
|  |  |  |
|  |  |  |

$$
3,550,707.45
$$

$$
5,930,494.00-
$$

1,620.85 934,401.09 1,037.79 44,180.18 652,537.25

$$
4,527,343.88
$$

$$
1,400,699.74
$$

$$
43,443.69
$$

$$
1,016,492.94
$$

$$
1,180,118.90
$$

$$
1,401,663.80
$$

$$
277,982.71
$$

$$
39,295.93
$$

86,300.00-
$11,434,518.75$
$5,675,978.94 \quad 5,758,539.81-$

EXPERIENCED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE

ACCT
REGULAR
RETIREMENTS

COST OF
REMOVAL

GROSS
SALVAGE

NET
SALVAGE

## 2019 TRANSACTION YEAR

| 353.00 | $2,208,563.66$ | $580,806.30$ |  | $580,806.30-$ |
| ---: | ---: | ---: | ---: | ---: |
| 354.00 | $645,954.25$ |  |  |  |
| 356.00 | $45,999.22$ | $196,952.91$ |  |  |
| 357.00 | $16,636.40$ |  |  | $65,630.63-$ |
| 358.00 | $98,482.01$ |  |  | $1,470,386.84-$ |
| 361.00 | $56,242.55$ | $65,630.63$ |  | $9,931,615.48-$ |
| 362.00 | $2,079,989.64$ | $1,470,386.84$ |  | $923,300.55-$ |
| 364.11 | $6,412,418.85$ | $3,970,076.78$ | $1,038,461.30$ | $65,140.59-$ |
| 365.01 | $7,649,870.57$ | $2,512,801.50$ | $1,589,500.95$ | $920,289.46-$ |
| 366.00 | $61,452.20$ | $65,140.59$ |  | $1,032,632.06-$ |
| 367.00 | $5,757,578.07$ | $1,565,025.76$ | $644,736.30$ | $1,377,092.11-$ |
| 368.00 | $9,099,589.71$ | $1,633,372.56$ | $600,740.50$ | $5,317.56-$ |
| 369.20 | $318,642.04$ | $1,377,092.11$ |  | $43,204.27-$ |
| 370.00 | $235,499.28$ | $5,317.56$ |  | $11,966.59-$ |
| 373.00 | $1,701,296.30$ | $43,204.27$ |  | $167,665.00-$ |
| 390.10 | $40,650.34$ | $8,466.59$ |  |  |
| 390.20 | $10,174.02$ | $11,905.33$ |  | $137,295.00$ |
| 392.00 | $1,997,054.93$ | $30,370.00-$ |  |  |
| 396.00 | $97,970.01$ |  |  |  |
| 397.00 | $5,893,626.21$ |  |  |  |
|  |  |  |  |  |
|  | $44,427,690.26$ | $13,475,809.73$ | $4,010,734.05$ | $9,465,075.68-$ |

## 2020 TRANSACTION YEAR

| 352.00 | $24,188.90$ |
| ---: | ---: |
| 353.00 | $3,671,416.21$ |
| 354.00 | $708,579.61$ |
| 355.00 | $19,494.35$ |
| 356.00 | $148,576.23$ |
| 361.00 | $71,671.51$ |
| 362.00 | $4,274,291.09$ |
| 364.11 | $2,187,353.77$ |
| 365.01 | $4,183,197.74$ |
| 366.00 | $172,634.86$ |
| 367.00 | $4,323,718.86$ |
| 368.00 | $4,839,314.97$ |
| 369.20 |  |
| 370.00 | $33,617.81$ |
| 373.00 | $1,288,041.69$ |
| 390.10 | $7,113.61$ |
| 390.20 | $10,174.02$ |
| 392.00 | $2,298,354.30$ |
| 396.00 | $111,968.47$ |
| 397.00 | $10,276,213.83$ |
|  |  |
|  | $38,649,921.83$ |

$$
\begin{array}{r}
41,009.59 \\
897,620.21 \\
38,063.05 \\
4,469.59 \\
229,134.07 \\
32,484.63 \\
1,399,570.05 \\
4,245,098.45 \\
2,379,647.12 \\
62,809.75 \\
1,589,410.99 \\
1,618,214.51 \\
1,004,737.81 \\
491.12 \\
18,578.66 \\
28,867.79 \\
74,667.98 \\
4,772.94 \\
245.02
\end{array}
$$

$$
3,830,122.84
$$

$$
22,977,483.79
$$



DUQUESNE LIGHT CO.
PITTSBURGH, PENNSYLVANIA

## 2021 DEPRECIATION STUDY

CALCULATED ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2021

## EXHIBIT JJS-2

Prepared by:

# Q Gannett Fleming 

Excellence Delivered As Promised

# DUQUESNE LIGHT COMPANY 

Pittsburgh, Pennsylvania

# 2021 DEPRECIATION STUDY <br> CALCULATED ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT <br> AS OF DECEMBER 31, 2021 

EXHIBIT JJS-2

Excellence Delivered As Promised

April 12, 2021

Duquesne Light Company
$4117^{\text {th }}$ Avenue
Pittsburgh, PA 15219
Attention Jaime A. Bachota
Assistant Controller
Ladies and Gentlemen:
Pursuant to your request, we have determined the annual depreciation accruals applicable to the electric plant of Duquesne Light Company. The results of our study as of December 31, 2021 are presented in the attached report. The results of our study as of December 31, 2020 are presented in our report titled "2020 Depreciation Study Calculated Annual Depreciation Accruals Related to Electric Plant as of December 31, 2020". The same methods, procedures and estimates are used in both studies.

The attached report sets forth a description of the methods and procedures upon which the study was based, the estimates of survivor curves and the calculated annual depreciation rates as of December 31, 2021. The results are summarized on pages $\mathrm{V}-4$ through V-8 of the report.

Respectfully submitted,
GANNETT FLEMING VALUATION AND RATE CONSULTANTS, LLC


JOHN J. SPANOS
President

JJS:mle
067908

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## PART I. INTRODUCTION

# DUQUESNE LIGHT COMPANY DEPRECIATION STUDY 

## PART I. INTRODUCTION

## SCOPE

This report presents the results of the depreciation study as applied to electric plant in service as of December 31, 2021. Gannett Fleming Valuation and Rate Consultants, LLC prepared this report on behalf of Duquesne Light Company. It relates to the concepts, methods and basic judgments which underlie recommended annual depreciation accrual rates related to current electric plant in service.

The annual depreciation accrual rates and amounts presented herein are based on a service life study incorporating data through 2019 prepared pursuant to the rules of 52 Pa. Code, Chapter 73.6.

## BASIS OF STUDY

## Depreciation and Amortization

Depreciation, as defined in the Uniform System of Accounts, is the loss in service value not restored by current maintenance, incurred in connection with the consumption or prospective retirement of electric plant in the course of service from causes which are known to be in current operation and against which the utility is not protected by insurance. Among the causes to be given consideration are wear and tear, decay, action of the elements, inadequacy, obsolescence, changes in the art, changes in demand, and requirements of public authorities.

Depreciation, as used in accounting, is a method of distributing fixed capital costs over a period of time by allocating annual amounts to expense. Each annual amount of such depreciation expense is part of that year's total cost of providing utility service.

Normally, the period of time over which the fixed capital cost is allocated to the cost of service is equal to the period of time over which an item renders service, that is, the item's service life. The most prevalent method of allocation is to distribute an equal amount of cost to each year of service life. This method is known as the straight line method of depreciation.

The calculation of annual and accrued depreciation based on the straight line method requires the estimation of survivor curves and the selection of group depreciation procedures. These subjects are discussed in the sections which follow. For most plant accounts, depreciation accruals and accrued depreciation were calculated using the straight line method, the remaining life basis, and average service life (ASL) procedure for plant installed prior to 1983 and the equal life group procedure (ELG) for 1983 and subsequent vintages. The calculations were based on the attained ages and estimated service life characteristics for each depreciable group of electric plant. For certain general plant accounts, the amortization amounts, annual and accrued, were based on the age of the vintage and the selected amortization period.

Survivor curves were used to reflect the expected dispersion of retirements, thus providing a consistent method of estimating service lives and depreciation for mass property. Iowa type curves were used to depict the estimated survivor curves. For life span groups, the estimate of life characteristics is consistent because the calculated lives of the units within a group are obtained by employing a single probable retirement date for the entire group.

## Service Life Estimates

The method of estimating service life consisted of compiling the service life history of the plant accounts, subaccounts or depreciable groups, reducing this history
to trends through the use of acceptable actuarial techniques, and forecasting the trend of survivors for each depreciable group on the basis of interpretations of past trends and consideration of Company plans for the future. The combination of the historical trend and the estimated future trend yielded a complete pattern of life characteristics from which the average service life was derived.

The Company's service life estimates used in the depreciation calculation incorporated historical data compiled through 2019 from the property records of the Company. Such data included plant additions, retirements, transfers and other activity. Generally, retirement data for the years 1964 through 2019 were used in the actuarial life table computations which were the primary statistical support of the service life estimates.

A general understanding of the function of the plant and information with respect to the reasons for past retirements and the expected future causes of retirement was obtained through field trips conducted during the course of the service life study. Discussions with operating and management personnel also provided information regarding plans for the future which was incorporated in the interpretation and extrapolation of the statistical analyses.

## AMORTIZATION OF NET SALVAGE

Inasmuch as this report relates primarily to Pennsylvania rate regulation practices, under which experienced costs of negative net salvage are amortized after their occurrence, no adjustments for expected salvage were made to either the annual depreciation accrual or the calculated accrued depreciation for the individual accounts. The annual provision for recovering negative net salvage is based on the amortization of net salvage over a five-year period.

## PART II. ESTIMATION OF SURVIVOR CURVES

## PART II. ESTIMATION OF SURVIVOR CURVES

## Survivor Curves

The use of an average service life for a property group implies that the various units in the group have different lives. Thus, the average life may be obtained by determining the separate lives of each of the units, or by constructing a survivor curve by plotting the number of units which survive at successive ages. The use of survivor curves, which reflect experienced and expected dispersion of service lives, is a systematic and rational means of estimating average service lives to be used to calculate depreciation for utility property. A discussion of the general concept of survivor curves and the lowa type survivor curves is presented.

The survivor curve graphically depicts the amount of property existing at each age throughout the life of an original group. From the survivor curve, the average life of the group, the remaining life expectancy, the probable life and the frequency curve can be calculated. In Figure 1, a typical smooth survivor curve and the derived curves are illustrated. The average life is obtained by calculating the area under the survivor curve, from age zero to the maximum age, and dividing this area by the ordinate at age zero. The remaining life expectancy at any age can be calculated by obtaining the area under the curve, from the observation age to the maximum age, and dividing this area by the percent surviving at the observation age. For example, in Figure 1 the remaining life at age 30 years is equal to the crosshatched area under the survivor curve divided by 29.5 percent surviving at age 30 . The probable life at any age is developed by adding the age and remaining life. If the probable life of the property is calculated for each year of age, the probable life curve shown in the chart can be developed. The frequency curve presents the number of units retired in each age interval and is derived by obtaining the
differences between the amount of property surviving at the beginning and at the end of each interval.

## Iowa Type Curves

The range of survivor characteristics usually experienced by utility and industrial properties is encompassed by a system of generalized survivor curves known as the Iowa type curves. There are four families in the lowa system, labeled in accordance with the location of the modes of the retirements in relationship to the average life and the relative height of the modes. The left moded curves, presented in Figure 2, are those in which the greatest frequency of retirement occurs to the left of, or prior to, average service life. The symmetrical moded curves, presented in Figure 3, are those in which the greatest frequency of retirement occurs at average service life. The right moded curves, presented in Figure 4, are those in which the greatest frequency occurs to the right of, or after, average service life. The origin moded curves, presented in Figure 5, are those in which the greatest frequency of retirement occurs at the origin, or immediately after age zero. The letter designation of each family of curves ( $\mathrm{L}, \mathrm{S}, \mathrm{R}$ or 0 ) represents the location of the mode of the associated frequency curve with respect to the average service life. The numerical subscripts represent the relative heights of the modes of the frequency curves within each family.

The lowa curves were developed at the lowa State College Engineering Experiment Station through an extensive process of observation and classification of the ages at which industrial property had been retired. A report of the study which resulted in the classification of property survivor characteristics into 18 type curves, which constitute three of the four families, was published in 1935 in the form of the


Figure 1. A Typical Survivor Curve and Derived Curves


Figure 2. Left Modal or "L" Iowa Type Survivor Curves




Figure 5. Origin Modal or "O" Iowa Type Survivor Curves

Experiment Station's Bulletin 125. ${ }^{1}$ These curve types have also been presented in subsequent Experiment Station bulletins and in the text, "Engineering Valuation and Depreciation." ${ }^{2}$ In 1957, Frank V. B. Couch, Jr., an lowa State College graduate student submitted a thesis presenting his development of the fourth family consisting of the four O type survivor curves.

Survivor curves for groups in which all property is expected to be retired concurrently, such as power plants, are obtained by truncating smooth survivor curves at an age before zero percent surviving is reached. Such groups to which truncated survivor curves are applicable are designated as life span groups. In life span groups of one or more vintages, future retirements of all property included in the group are anticipated to occur at a specific date or over a restricted range of future dates which are represented by an estimated probable retirement date. Survivor curves for life span groups can be developed using both available historical experience and known or forecasted retirement dates. The life span of both the original installation and a subsequent addition is the number of years which elapse between its installation and the final retirement of the group. During the life of the group as a whole, interim retirements normally occur between age zero and the maximum age to produce a survivor pattern which is referred to as an "interim survivor curve".

## Retirement Rate Method of Analysis

The retirement rate method is an actuarial method of deriving survivor curves using the average rates at which property of each age group is retired. The method relates to property groups for which aged accounting experience is available or for

[^92]which aged accounting experience is developed by statistically aging unaged amounts and is the method used to develop the original stub survivor curves in this study. The method (also known as the annual rate method) is illustrated through the use of an example in the following text, and is also explained in several publications, including "Statistical Analyses of Industrial Property Retirements,"3 "Engineering Valuation and Depreciation,"4 and "Depreciation Systems." ${ }^{5}$

The average rate of retirement used in the calculation of the percent surviving for the survivor curve (life table) requires two sets of data: first, the property retired during a period of observation, identified by the property's age at retirement; and second, the property exposed to retirement at the beginning of the age intervals during the same period. The period of observation is referred to as the experience band, and the band of years which represent the installation dates of the property exposed to retirement during the experience band is referred to as the placement band. An example of the calculations used in the development of a life table follows. The example includes schedules of annual aged property transactions, a schedule of plant exposed to retirement, a life table and illustrations of smoothing the stub survivor curve.

## Schedules of Annual Transactions in Plant Records.

The property group used to illustrate the retirement rate method is observed for the experience band 2011-2020 during which there were placements during the years 2006-2020. In order to illustrate the summation of the aged data by age interval, the data were compiled in the manner presented in Schedules 1 and 2 on pages II-12 and II-13. In Schedule 1, the year of installation (year placed) and the year of retirement

[^93]are shown. The age interval during which a retirement occurred is determined from this information. In the example which follows, \$10,000 of the dollars invested in 2006 were retired in 2011. The $\$ 10,000$ retirement occurred during the age interval between $41 / 2$ and $51 / 2$ years on the basis that approximately one-half of the amount of property was installed prior to and subsequent to July 1 of each year. That is, on the average, property installed during a year is placed in service at the midpoint of the year for the purpose of the analysis. All retirements also are stated as occurring at the midpoint of a one-year age interval of time, except the first age interval which encompasses only onehalf year.

The total retirements occurring in each age interval in a band are determined by summing the amounts for each transaction year-installation year combination for that age interval. For example, the total of $\$ 143,000$ retired for age interval $41 / 2-51 / 2$ is the sum of the retirements entered on Schedule 1 immediately above the stairstep line drawn on the table beginning with the 2011 retirements of 2006 installations and ending with the 2020 retirements of the 2015 installations. Thus, the total amount of 143 for age interval $41 / 2-51 / 2$ equals the sum of:

$$
10+12+13+11+13+13+15+17+19+20
$$

In Schedule 2, other transactions which affect the group are recorded in a similar manner. The entries illustrated include transfers and sales. The entries which are credits to the plant account are shown in parentheses. The items recorded on this schedule are not totaled with the retirements but are used in developing the exposures at the beginning of each age interval.
SCHEDULE 1. RETIREMENTS FOR EACH YEAR 2011-2020

SCHEDULE 2. OTHER TRANSACTIONS FOR EACH YEAR 2011-2020 SUMMARIZED BY AGE INTERVAL
0Z0Z-900Z pueg łuәməวセld

| Year | Acquisitions, Transfers and Sales, Thousands of Dollars |  |  |  |  |  |  |  |  |  | Total During Age Interval | Age <br> Interval |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | During Year |  |  |  |  |  |  |  |  |  |  |  |
|  | $\underline{2011}$ | $\underline{2012}$ | $\underline{2013}$ | $\underline{2014}$ | $\underline{2015}$ | $\underline{2016}$ | $\underline{2017}$ | $\underline{2018}$ | $\underline{2019}$ | $\underline{2020}$ |  |  |
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) | (13) |
| 2006 | - | - | - | - | - | - | $60^{\text {a }}$ | - | - | - | - | 131/2-141/2 |
| 2007 | - | - | - | - | - | - | - | - | - | - | - | 121/2-131/2 |
| 2008 | - | - | - | - | - | - | - | - | - | - | - | $111 / 2-121 / 2$ |
| 2009 | - | - | - | - | - | - | - | (5) ${ }^{\text {b }}$ | - | - | 60 | 101/2-111/2 |
| 2010 | - | - | - | - | - | - | - | $6^{\text {a }}$ | - | - | - | 91/2-101/2 |
| 2011 | - | - | - | - | - | - | - | - | - | - | (5) | $81 / 2-91 / 2$ |
| 2012 |  | - | - | - | - | - | - | - | - | - | 6 | $71 / 2-81 / 2$ |
| 2013 |  |  | - | - | - | - | - | - | - | - | - | $61 / 2-71 / 2$ |
| 2014 |  |  |  | - | - | - | - | $(12)^{\text {b }}$ | - | - | - | 51/2-61/2 |
| 2015 |  |  |  |  | - | - | - | - | $22^{\text {a }}$ | - | - | $41 / 2-51 / 2$ |
| 2016 |  |  |  |  |  | - | - | $(19){ }^{\text {b }}$ | - | - | 10 | $31 / 2-41 / 2$ |
| 2017 |  |  |  |  |  |  | - | - | - | - | - | 21/2-31/2 |
| 2018 |  |  |  |  |  |  |  | - | - | $(102){ }^{\text {c }}$ | (121) | 11/2-21/2 |
| 2019 |  |  |  |  |  |  |  |  | - | - | - | 1/2-11/2 |
| 2020 |  |  |  |  |  |  |  |  |  |  | - | 0-1/2 |
| Total | - | - | - | - | - | - | 60 | (30) | 22 | (102) | (50) |  |

[^94]
## Schedule of Plant Exposed to Retirement.

The development of the amount of plant exposed to retirement at the beginning of each age interval is illustrated in Schedule 3 on page II-15.

The surviving plant at the beginning of each year from 2011 through 2020 is recorded by year in the portion of the table headed "Annual Survivors at the Beginning of the Year". The last amount entered in each column is the amount of new plant added to the group during the year. The amounts entered in Schedule 3 for each successive year following the beginning balance or addition are obtained by adding or subtracting the net entries shown on Schedules 1 and 2. For the purpose of determining the plant exposed to retirement, transfers-in are considered as being exposed to retirement in this group at the beginning of the year in which they occurred, and the sales and transfers-out are considered to be removed from the plant exposed to retirement at the beginning of the following year. Thus, the amounts of plant shown at the beginning of each year are the amounts of plant from each placement year considered to be exposed to retirement at the beginning of each successive transaction year. For example, the exposures for the installation year 2016 are calculated in the following manner:

| Exposures at age $0=$ amount of addition | $=$ | $\$ 750,000$ |  |
| ---: | :--- | :--- | :--- |
| Exposures at age $1 / 2=\$ 750,000-\$ 8,000$ | $=$ | $\$ 742,000$ |  |
| Exposures at age 11/2 | $=\$ 742,000-\$ 18,000$ | $=$ | $\$ 24,000$ |
| Exposures at age $21 / 2=\$ 124,00-\$ 20,000-\$ 19,000$ | $=$ | $=685,000$ |  |
| Exposures at age $31 / 2$ | $=\$ 685,000-\$ 22,000$ | $=$ | $\$ 663,000$ |

For the entire experience band 2011-2020 the total exposures at the beginning of an age interval are obtained by summing diagonally in a manner similar to the summing of the retirements during an age interval (Schedule 1). For example, the figure of 3,789,
SCHEDULE 3. PLANT EXPOSED TO RETIREMENT JANUARY 1 OF EACH YEAR 2011-2020

| Experience Band 2011-2020 |  |  |  |  |  |  |  |  |  |  | Placement Band 2006-2020 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Exposures, Thousands of Dollars |  |  |  |  |  |  |  |  |  | Total at Beginning of Age Interval | Age <br> Interval |
| Year | Annual Survivors at the Beginning of the Year |  |  |  |  |  |  |  |  |  |  |  |
| Placed | $\underline{2011}$ | $\underline{2012}$ | $\underline{2013}$ | $\underline{2014}$ | $\underline{2015}$ | $\underline{2016}$ | $\underline{2017}$ | $\underline{2018}$ | $\underline{2019}$ | $\underline{2020}$ |  |  |
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) | (13) |
| 2006 | 255 | 245 | 234 | 222 | 209 | 195 | 239 | 216 | 192 | 167 | 167 | $13^{1 / 2-14} 1 / 2$ |
| 2007 | 279 | 268 | 256 | 243 | 228 | 212 | 194 | 174 | 153 | 131 | 323 | $121 / 2-131 / 2$ |
| 2008 | 307 | 296 | 284 | 271 | 257 | 241 | 224 | 205 | 184 | 162 | 531 | $111 / 2-121 / 2$ |
| 2009 | 338 | 330 | 321 | 311 | 300 | 289 | 276 | 262 | 242 | 226 | 823 | 101/2-111/2 |
| 2010 | 376 | 367 | 357 | 346 | 334 | 321 | 307 | 297 | 280 | 261 | 1,097 | 91/2-101/2 |
| 2011 | 420a | 416 | 407 | 397 | 386 | 374 | 361 | 347 | 332 | 316 | 1,503 | $81 / 2-91 / 2$ |
| 2012 |  | 460a | 455 | 444 | 432 | 419 | 405 | 390 | 374 | 356 | 1,952 | $71 / 2-81 / 2$ |
| 2013 |  |  | 510a | 504 | 492 | 479 | 464 | 448 | 431 | 412 | 2,463 | $61 / 2-71 / 2$ |
| 2014 |  |  |  | 580a | 574 | 561 | 546 | 530 | 501 | 482 | 3,057 | $51 / 2-61 / 2$ |
| 2015 |  |  |  |  | 660a | 653 | 639 | 623 | 628 | 609 | 3,789 | $41 / 2-51 / 2$ |
| 2016 |  |  |  |  |  | 750a | 742 | 724 | 685 | 663 | 4,332 | $31 / 2-41 / 2$ |
| 2017 |  |  |  |  |  |  | 850a | 841 | 821 | 799 | 4,955 | $21 / 2-31 / 2$ |
| 2018 |  |  |  |  |  |  |  | 960 ${ }^{\text {a }}$ | 949 | 926 | 5,719 | $11 / 2-21 / 2$ |
| 2019 |  |  |  |  |  |  |  |  | 1,080a | 1,069 | 6,579 | $1 / 2-11 / 2$ |
| 2020 |  |  |  |  |  |  |  |  |  | 1,220a | 7,490 | 0-1/2 |
| Total | $\underline{\underline{1,975}}$ | $\underline{\underline{2,382}}$ | $\underline{\underline{2,824}}$ | 3,318 | 3,872 | 4,494 | 5,247 | 6,017 | 6,852 | 7,799 | 44,780 |  |

shown as the total exposures at the beginning of age interval $41 / 2-51 / 2$, is obtained by summing:

$$
255+268+284+311+334+374+405+448+501+609
$$

## Original Life Table

The original life table, illustrated in Schedule 4 on page II-17, is developed from the totals shown on the schedules of retirements and exposures, Schedules 1 and 3, respectively. The exposures at the beginning of the age interval are obtained from the corresponding age interval of the exposure schedule, and the retirements during the age interval are obtained from the corresponding age interval of the retirement schedule. The retirement ratio is the result of dividing the retirements during the age interval by the exposures at the beginning of the age interval. The percent surviving at the beginning of each age interval is derived from survivor ratios, each of which equals one minus the retirement ratio. The percent surviving is developed by starting with $100 \%$ at age zero and successively multiplying the percent surviving at the beginning of each interval by the survivor ratio, i.e., one minus the retirement ratio for that age interval.

The calculations necessary to determine the percent surviving at age $51 / 2$ are as follows:

| Percent surviving at age $41 / 2$ | $=$ | 88.15 |
| :--- | :--- | ---: | :--- |
| Exposures at age $41 / 2$ | $=$ | $3,789,000$ |
| Retirements from age $41 / 2$ to $51 / 2$ | $=$ | 143,000 |
| Retirement Ratio | $=$ | $143,000+3,789,000=0.0377$ |
| Survivor Ratio | $=$ | $1.000-0.0377=0.9623$ |
| Percent surviving at age $51 / 2$ | $=$ | $(88.15) \times(0.9623)=84.83$ |

## SCHEDULE 4. ORIGINAL LIFE TABLE CALCULATED BY THE RETIREMENT RATE METHOD

Experience Band 2011-2020
Placement Band 2006-2020
(Exposure and Retirement Amounts are in Thousands of Dollars)

| Age at <br> Beginning of <br> Interval | Exposures at <br> Beginning of <br> Age Interval | Retirements <br> During Age <br> Interval | Retirement <br> Ratio | Survivor <br> $\frac{\text { Ratio }}{}$ | Percent <br> Surviving at <br> Beginning of |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Age Interval |  |  |  |  |  |

Column 2 from Schedule 3, Column 12, Plant Exposed to Retirement.
Column 3 from Schedule 1, Column 12, Retirements for Each Year.
Column 4 = Column 3 divided by Column 2.
Column $5=1.0000$ minus Column 4.
Column $6=$ Column 5 multiplied by Column 6 as of the Preceding Age Interval.

The totals of the exposures and retirements (Columns 2 and 3) are shown for the purpose of checking with the respective totals in Schedules 1 and 3. The ratio of the total retirements to the total exposures, other than for each age interval, is meaningless.

The original survivor curve is plotted from the original life table (Column 6, Schedule 4). When the curve terminates at a percent surviving greater than zero, it is called a stub survivor curve. Survivor curves developed from retirement rate studies generally are stub curves.

## Smoothing the Original Survivor Curve

The smoothing of the original survivor curve eliminates any irregularities and serves as the basis for the preliminary extrapolation to zero percent surviving of the original stub curve. Even if the original survivor curve is complete from $100 \%$ to zero percent, it is desirable to eliminate any irregularities, as there is still an extrapolation for the vintages which have not yet lived to the age at which the curve reaches zero percent. In this study, the smoothing of the original curve with established type curves was used to eliminate irregularities in the original curve.

The lowa type curves are used in this study to smooth those original stub curves which are expressed as percents surviving at ages in years. Each original survivor curve was compared to the lowa curves using visual and mathematical matching in order to determine the better fitting smooth curves. In Figures 6, 7, and 8, the original curve developed in Schedule 4 is compared with the L, S, and R Iowa type curves which most nearly fit the original survivor curve. In Figure 6, the L1 curve with an average life between 12 and 13 years appears to be the best fit. In Figure 7, the SO type curve with a 12-year average life appears to be the best fit and appears
to be better than the L1 fitting. In Figure 8, the R1 type curve with a 12-year average life appears to be the best fit and appears to be better than either the L1 or the SO. In Figure 9, the three fittings, 12-L1, 12-SO, and 12-R1 are drawn for comparison purposes. It is probable that the 12-R1 lowa curve would be selected as the most representative of the plotted survivor characteristics of the group, assuming no contrary relevant factors external to the analysis of historical data.


## PART III. SERVICE LIFE CONSIDERATIONS

## PART III. SERVICE LIFE CONSIDERATIONS

## Field Trips

In order to be familiar with the operation of the Company and observe representative portions of the plant, field trips have been conducted periodically. A general understanding of the function of the plant and information with respect to the reasons for past retirements and the expected future causes of retirements are obtained during these field trips. This knowledge and information were incorporated in the interpretation and extrapolation of the statistical analyses.

During the extensive period of years our firm has been conducting depreciation studies for the Company, the field trips have resulted in numerous reviews of the Company's operating areas. The following is a list of the locations visited during the most recent trips.

November 23, 2020
Penn Hills Service Center
Logans Ferry Substation
Plum Substation
Aber Substation
Universal Substation
Evergreen Substation
Wilmerding Substation
East McKeesport Substation
McKeesport Service Center
June 29, 2015
Forbes Substation
Arsenal Substation
North Substation
Preble Avenue Office Building
Woods Run Complex
May 11, 2010
Woods Run Complex
Brunot Island Substation
Arsenal Substation
Oakland Substation
Preble Avenue Office Building

August 18, 2005
Carson Substation
J\&L Southside Substation
Oakland Substation
Post Perry Substation
Wilmerding Substation
Woods Run Complex
Preble Avenue Office Building
August 9 and 10, 1999
Raccoon T \& D Headquarters
Raccoon S \& S Headquarters
Raccoon Garage
Raccoon Substation
Valley Substation
Beaver Valley Substation
Crescent Substation
Findlay Substation
Woodville Substation
Woods Run Guard House
Brunot Island Substations
Manchester Facility
Forbes Substation
Carson Substation
Oakland Substation
Arsenal Substation
Northern District Headquarters
May 19-21, 1987
South Heights Building
Crescent Substation
Hopewell Substation
Phillips Transmission Yard
Phillips Power Station and Scrubbers
Collier Substation
Fort Martin Power Station
Beaver Valley Power Station
Beaver Valley Transmission Yard
Midland Substation
Banksville Building
Arsenal Substation
Kirkwood Street Building
Sammis Power Station
Eastlake Power Station
Northern Building
Highland Substation
Oakland Substation
Mansfield Power Station and Scrubbers

Raccoon Substation
Western Division S\&S Building
Western Division Headquarters Building
Preble Building
Brunot Island Substation
Brunot Island Transmission Yard
Brunot Island Power Station
May 4-6, 1987
Elrama Power Station
McKeesport Substation
Dravosburg Substation
Duquesne Substation
Wilmerding Substation
Hershey Road Building
Main Office Building
Cheswick Substation
Universal Substation
Manchester Substation
System Control Center

## Judgment

The survivor curve estimates were based on judgment which considered a number of factors. The primary factors were the statistical analyses of data; current Company policies and outlook as determined during the field trips and other conversations with management; and the survivor curve estimates from previous studies of this company and other electric companies.

The statistical analyses resulted in good to excellent indications of the survivor patterns experienced for most of the major accounts. The plant accounts or subaccounts for which the statistical analyses were significant factors in the judgments of the survivor curves are as follows:

Account Title

## Transmission Plant

352
353
354
355
358
Distribution Plant
362.1
362.2
365.01

367
368.1
368.3
368.5
369.2

370
370.1

## General Plant

390.1
368.7 Line Transformers - Underground Residential Distribution

Structures and Improvements
Station Equipment
Towers and Fixtures
Poles and Fixtures
Underground Conductors and Devices

Station Equipment - Company Stations
Station Equipment - Customer High Tension
Overhead Conductors and Devices
Underground Conductors and Devices
Line Transformers - Overhead
Line Transformers - Conventional Distribution
Line Transformers - Network Services
Meters and Smart Meters
Meters - Communication Equipment

Structures and Improvements

Account 362.1, Station Equipment - Company Stations, is used to illustrate the manner in which the study was conducted for the groups in the preceding list. Aged retirement and other plant accounting data were compiled for the years 1964 through 2019. These data were coded in the course of the Company's normal recordkeeping according to plant account or property group, type of transaction, year in which the transaction took place, and year in which the electric plant was placed in service. The data were analyzed by the retirement rate method of life analysis. The survivor curve chart for the account is presented on page VI-53 and the life tables for the experience bands plotted on the chart follow it.

The rates of retirements of station equipment have been consistent over the course of the experience band. Discussions with operating and management personnel
indicated that the life characteristics of station equipment will be similar in the future as they have been in the past. Typical service lives for station equipment of other electric companies range from 45 to 55 years. The lowa 55-R1 survivor curve, at the upper end of the range of others, is estimated to represent the future, inasmuch as it is a reasonable interpretation of the significant portion of the stub survivor curve through age 70 and reflects the outlook of management.

For Account 365.01, Overhead Conductors and Devices, the estimate of survivor characteristics is based on the 1964-2019 and 2000-2019 experience bands. Most recent retirements have been due to deterioration and voltage upgrades. Retirements related to expansion projects, that tend to result in retirements of younger property, have maintained a steady state. Typical service lives for overhead conductors and devices range from 40 to 55 years. The lowa $50-\mathrm{R} 0.5$ survivor curve is within the range of other estimates, is a reasonable interpretation of a significant portion of the survivor curve through age 90 and reflects the outlook of management.

The survivor curve estimate for Account 364.11, Poles and Fixtures, is the lowa 58-R1. The estimate is based on the results of experience band analyses for the period 1964-1993 and 1964-2019. The addition of the 1994 through 2019 experience results in a different life characteristic and significantly longer indication of service that is well beyond the typical range of lives of 40 to 55 years for distribution poles. The retirement of poles during this period has been affected by a property record system conversion. During the conversion process, many pole retirements were priced using the first-in firstout convention of like poles rather than actual installation years. With completion of the conversion process, retirements will be priced based on actual installation years and the life will move toward the indication based on data through 1993.

Similar studies were performed for the remaining significant mass plant accounts. The results of the statistical analyses are presented in account sequence in the report, beginning on page VII-6.

The major structures included in Accounts 352, 361 and 390.1, Structures and Improvements, were separated from the smaller structures for purposes of the study. The major structures group consists of 44 structures or complexes of significant size and of a nature that the life span procedure is appropriate. The life spans assigned to the major structures were typically 55 to 65 years from the date of initial installation or 40 years from a major rehabilitation and varied within this range based on individual circumstances, such as size, condition, type of construction, location, and management's plans. Long-term continued use is planned for most of the major structures.

The lowa 65-R3, 70-R3 and 58-R2 interim survivor curves were judged appropriate for the major structures based on the 1964-2019 interim retirement experience, our observations of the buildings, consideration of the typical presence of facilities which will be retired during the estimated life spans, and a review of the interim survivor curves derived for similar structures of other electric companies.

Generally, the survivor curve estimates for the remainder of the accounts were based on engineering judgment, considering the nature of the plant and equipment, review of available historical retirement data and a general knowledge of the service lives for similar equipment in other electric companies.

## PART IV. CALCULATION OF ANNUAL AND ACCRUED DEPRECIATION

## PART IV. CALCULATION OF ANNUAL AND ACCRUED DEPRECIATION

## Group Depreciation Procedures

A group procedure for depreciation is appropriate when considering more than a single item of property. Normally, the items within a group do not have identical service lives, but have lives that are dispersed over a range of time. There are two primary group procedures, namely, average service life and equal life group.

In the average service life procedure, the rate of annual depreciation is based on the average life or average remaining life of the group, and this rate is applied to the surviving balances of the group's cost. A characteristic of this procedure is that the cost of plant retired prior to average life is not fully recouped at the time of retirement, whereas the cost of plant retired subsequent to average life is more than fully recouped. Over the entire life cycle, the portion of cost not recouped prior to average life is balanced by the cost recouped subsequent to average life.

In the equal life group procedure, the property group is subdivided according to service life. That is, each equal life group includes that portion of the property which experiences the life of that specific group. The relative size of each equal life group is determined from the property's life dispersion curve. This procedure eliminates the need to base depreciation on average lives, inasmuch as each group is equivalent to a unit having a single life. The full costs of short-lived units are accrued during their lives, leaving no deferral of accruals required to be added to the annual costs associated with long-lived units. The calculated depreciation for the property group is the summation of the calculated depreciation based on the service life of each equal life group.

## Remaining Life Annual Accruals

For the purpose of calculating remaining life accrual rates as of December 31, 2021, the estimated book depreciation reserve for each plant account is allocated among vintages in proportion to the calculated accrued depreciation for the account. Explanations of remaining life accruals and calculated accrued depreciation for the vintages calculated by the average service life procedure and for the vintages calculated by the equal life group procedure follow. The detailed calculations are set forth in the Results of Study section of the report.

## Average Service Life Procedure

In the average service life procedure, the remaining life annual accrual for each vintage is determined by dividing future book accruals (original cost less book reserve) by the average remaining life of the vintage. The average remaining life is a directly weighted average derived from the estimated future survivor curve in accordance with the average service life procedure.

The calculated accrued depreciation for each depreciable property group represents that portion of the depreciable cost of the group which would not be allocated to expense through future whole life depreciation accruals if current forecasts of life characteristics are used as the basis for such accruals. The accrued depreciation calculation consists of applying an appropriate ratio to the surviving original cost of each vintage of each account, based upon the attained age and service life. The straight line accrued depreciation ratios are calculated as follows for the average service life procedure:

$$
\text { Ratio }=1-\frac{\text { Average Remaining Life Expectancy }}{\text { Average Service Life }} .
$$

## Equal Life Group Procedure

In the equal life group procedure, the remaining life annual accrual for each vintage is determined by dividing future book accruals (original cost less book reserve) by the composite remaining life for the surviving original cost of that vintage. The composite remaining life is derived by compositing the individual equal life group remaining lives in accordance with the following equation:


The book costs and lives of the several equal life groups which are summed in the foregoing equation are defined by the estimated future survivor curve. Inasmuch as book cost divided by life equals the whole life annual accrual, the foregoing equation reduces to the following form:

Composite Remaining LIfe $=\frac{\sum \text { Whole Life Future Accruals }}{\sum \text { Whole Life Annual Accruals }}$
or

Composite Remaining Life $=\frac{\sum \text { Book Cost }- \text { Calc. Reserve }}{\sum \text { Whole Life Annual Accrual }}$.

The annual accrual rate for each account is equal to the sum of the remaining life annual accruals for all vintages divided by the account's total original cost. The
account's "composite remaining life" is calculated by dividing the sum of the future book accruals for all vintages by the sum of the remaining life annual accruals for all vintages.

The calculated accrued depreciation in the equal life group procedure also represents that portion of depreciable cost which will not be allocated to expense through future accruals. However, the calculation is based at the equal life group level rather than the vintage group level, and does not require the use of averages. The equal life group accrued depreciation ratio is calculated as follows:

$$
\text { Ratio }=\frac{\text { Remaining Life }}{\text { Average Service Life }} .
$$

Inasmuch as service life minus remaining life equals age, when averages are not employed, the foregoing equation reduces to:

$$
\text { Ratio }=\frac{\text { Age }}{\text { Service Life }} .
$$

The table on the following page illustrates the procedure for calculating straight line equal life group accrued depreciation, using an lowa 18-S0 Survivor curve and a December 31, 2021 calculation date.

In the table, each equal life group is defined by the age interval shown in columns 1 and 2, which identify the ages at which the first and last retirement of each group occur. The group's designated life, shown in column 3, is the midpoint of the interval. In the calculation, the equal life groups of each vintage are arranged such that the midpoint of each one-year age interval coincides with the calculation date, e.g.,

December 31 in this case. This enables the calculation of annual accruals which are centered on, or as of, the same date as the calculation of accrued depreciation.

The retirement during each age interval, shown in column 4, is the size of each equal life group. It is derived from the lowa 18-S0 survivor curve and is the difference between the percents surviving (not shown) at the beginning and end of the age interval.

DETAILED COMPUTATION OF ANNUAL AND ACCRUED FACTORS USING THE EQUAL LIFE GROUP PROCEDURE
INPUT PARAMETERS:
CALCULATION DATE. .
12-31-2021
SURVIVOR CURVE...

|  |  | RETIREMENTS |  | GROUP |  | SUMMATION | AVERAGE |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| AGE II | ERVAL |  | DURING | ANNUAL | YEAR | OF ANNUAL | PERCENT | ANNUAL | ACCRUED |
| BEG <br> (1) | END <br> (2) | LIFE <br> (3) | INIERVAL <br> (4) | $\begin{gathered} \text { ACCRUAL } \\ (5)=(4) /(3) \end{gathered}$ | INST <br> (6) | ACCRUALS <br> (7) | SURVIVING <br> (8) | FACTOR <br> (9) | FACTOR <br> (10) |
| 0.000 | 1.000 | 0.500 | 0.42263 | 0.42263000000 | 2021 | 8.68684116818 | 99.842382 | 0.0870 | 0.0435 |
| 1.000 | 2.000 | 1.500 | 0.97248 | 0.64832000000 | 2020 | 7.94005116818 | 99.091130 | 0.0801 | 0.1202 |
| 2.000 | 3.000 | 2.500 | 1.40102 | 0.56040800000 | 2019 | 7.33568716818 | 97.904381 | 0.0749 | 0.1873 |
| 3.000 | 4.000 | 3.500 | 1.76172 | 0.50334857143 | 2018 | 6.80380888246 | 96.323012 | 0.0706 | 0.2471 |
| 4.000 | 5.000 | 4.500 | 2.07867 | 0.46192666667 | 2017 | 6.32117126341 | 94.402817 | 0.0670 | 0.3015 |
| 5.000 | 6.000 | 5.500 | 2.35817 | 0.42875818182 | 2016 | 5.87582883917 | 92.184395 | 0.0637 | 0.3504 |
| 6.000 | 7.000 | 6.500 | 2.60652 | 0.40100307692 | 2015 | 5.46094820980 | 89.702050 | 0.0609 | 0.3959 |
| 7.000 | 8.000 | 7.500 | 2.82801 | 0.37706800000 | 2014 | 5.07191267134 | 86.984786 | 0.0583 | 0.4373 |
| 8.000 | 9.000 | 8.500 | 3.02329 | 0.35568117647 | 2013 | 4.70553808310 | 84.059136 | 0.0560 | 0.4760 |
| 9.000 | 10.000 | 9.500 | 3.19748 | 0.33657684211 | 2012 | 4.35940907381 | 80.948749 | 0.0539 | 0.5121 |
| 10.000 | 11.000 | 10.500 | 3.34688 | 0.31875047619 | 2011 | 4.03174541466 | 77.676566 | 0.0519 | 0.5450 |
| 11.000 | 12.000 | 11.500 | 3.47834 | 0.30246434783 | 2010 | 3.72113800265 | 74.263960 | 0.0501 | 0.5762 |
| 12.000 | 13.000 | 12.500 | 3.58770 | 0.28701600000 | 2009 | 3.42639782874 | 70.730942 | 0.0484 | 0.6050 |
| 13.000 | 14.000 | 13.500 | 3.67955 | 0.27255925926 | 2008 | 3.14661019911 | 67.097313 | 0.0469 | 0.6332 |
| 14.000 | 15.000 | 14.500 | 3.75126 | 0.25870758621 | 2007 | 2.88097677637 | 63.381911 | 0.0455 | 0.6598 |
| 15.000 | 16.000 | 15.500 | 3.80575 | 0.24553225806 | 2006 | 2.62885685424 | 59.603408 | 0.0441 | 0.6836 |
| 16.000 | 17.000 | 16.500 | 3.84103 | 0.23278969697 | 2005 | 2.38969587672 | 55.780018 | 0.0428 | 0.7062 |
| 17.000 | 18.000 | 17.500 | 3.85950 | 0.22054285714 | 2004 | 2.16302959967 | 51.929752 | 0.0417 | 0.7298 |
| 18.000 | 19.000 | 18.500 | 3.85950 | 0.20862162162 | 2003 | 1.94844736029 | 48.070249 | 0.0405 | 0.7493 |
| 19.000 | 20.000 | 19.500 | 3.84103 | 0.19697589744 | 2002 | 1.74564860076 | 44.219983 | 0.0395 | 0.7703 |
| 20.000 | 21.000 | 20.500 | 3.80575 | 0.18564634146 | 2001 | 1.55433748131 | 40.396592 | 0.0385 | 0.7893 |
| 21.000 | 22.000 | 21.500 | 3.75126 | 0.17447720930 | 2000 | 1.37427570593 | 36.618090 | 0.0375 | 0.8063 |
| 22.000 | 23.000 | 22.500 | 3.67955 | 0.16353555556 | 1999 | 1.20526932350 | 32.902688 | 0.0366 | 0.8235 |
| 23.000 | 24.000 | 23.500 | 3.58770 | 0.15266808511 | 1998 | 1.04716750316 | 29.269059 | 0.0358 | 0.8413 |
| 24.000 | 25.000 | 24.500 | 3.47834 | 0.14197306122 | 1997 | 0.89984693000 | 25.736040 | 0.0350 | 0.8575 |
| 25.000 | 26.000 | 25.500 | 3.34688 | 0.13125019608 | 1996 | 0.76323530135 | 22.323434 | 0.0342 | 0.8721 |
| 26.000 | 27.000 | 26.500 | 3.19748 | 0.12065962264 | 1995 | 0.63728039199 | 19.051252 | 0.0335 | 0.8878 |
| 27.000 | 28.000 | 27.500 | 3.02329 | 0.10993781818 | 1994 | 0.52198167158 | 15.940864 | 0.0327 | 0.8993 |
| 28.000 | 29.000 | 28.500 | 2.82801 | 0.09922842105 | 1993 | 0.41739855196 | 13.015215 | 0.0321 | 0.9149 |
| 29.000 | 30.000 | 29.500 | 2.60652 | 0.08835661017 | 1992 | 0.32360603635 | 10.297951 | 0.0314 | 0.9263 |
| 30.000 | 31.000 | 30.500 | 2.35817 | 0.07731704918 | 1991 | 0.24076920668 | 7.815606 | 0.0308 | 0.9394 |
| 31.000 | 32.000 | 31.500 | 2.07867 | 0.06598952381 | 1990 | 0.16911592018 | 5.597187 | 0.0302 | 0.9513 |
| 32.000 | 33.000 | 32.500 | 1.76172 | 0.05420676923 | 1989 | 0.10901777366 | 3.676992 | 0.0296 | 0.9620 |
| 33.000 | 34.000 | 33.500 | 1.40102 | 0.04182149254 | 1988 | 0.06100364278 | 2.095619 | 0.0291 | 0.9749 |
| 34.000 | 35.000 | 34.500 | 0.97248 | 0.02818782609 | 1987 | 0.02599898346 | 0.908871 | 0.0286 | 0.9867 |
| 35.000 | 36.000 | 35.500 | 0.42263 | 0.01190507042 | 1986 | 0.00595253521 | 0.211315 | 0.0282 | 1.0000 |

[^95]100.00000

Each equal life group's whole life annual accrual, shown in column 5, equals the group's size (column 4) divided by its life (column 3), except that for the first age interval, the annual accrual is set equal to the group's size.

Columns 6 through 10 show the derivation of the whole life annual factor and accrued factor for each vintage based on the data developed in the first five columns. The year installed is shown in column 6. For all vintages other than the first year (2021), the summation of annual accruals for each year installed, shown in column 7, is calculated by adding one-half of the group annual accrual (column 5) for that vintage's current age interval plus the group annual accruals for all succeeding age intervals. For example, the figure 7.94005116818 for 2020 equals one-half 0.64832000000 plus all of the succeeding figures in column 5. Only one-half of the annual accrual for the vintage's current age interval group is included in the summation because the equal life group for that interval expires at the midpoint of the current year.

The summation of annual accruals (column 7) for installations during 2021 is calculated on the basis of an in-service date at the midpoint of twelve months, i.e., six months prior to December 31. Inasmuch as the overall calculation is centered on December 31, 2021, the accrual for 2021 installations (during the twelve months) represents only one-half of one year, one-half of the year prior to December 31 plus one-half year following December 31. For this reason, the first figure in column 7, for vintage 2021, equals the group annual accrual for 2021 plus one-half of the group annual accruals for each of the subsequent years.

The average percent surviving, derived from the lowa 18-S0 survivor curve, is shown in column 8 for each age interval. The annual factor, shown in column 9, is the
result of dividing the summation of annual accruals (column 7) by the average percent surviving (column 8).

The accrued depreciation factor, shown in column 10, equals the annual factor multiplied by the age of the group as of December 31, 2021.

## CALCULATION OF ANNUAL AND ACCRUED AMORTIZATION

Amortization, as defined in the Uniform System of Accounts, is the gradual extinguishment of an amount in an account by distributing such amount over a fixed period, over the life of the asset or liability to which it applies, or over the period during which it is anticipated the benefit will be realized. Normally, the distribution of the amount is in equal amounts to each year of the amortization period.

The calculation of annual and accrued amortization requires the selection of an amortization period. The amortization periods used in this report were based on judgment which incorporated a consideration of the period during which the assets will render most of their service, the amortization periods and service lives used by other utilities, and the service life estimates previously used for the asset under depreciation accounting.

Amortization accounting is appropriate for certain General Plant accounts that represent numerous units of property, but a very small portion of depreciable electric plant in service. The accounts and their amortization periods are as follows:

|  | Account | Amortization Period, Years |
| :---: | :---: | :---: |
| 391, | Office Furniture and Equipment |  |
|  | Office Furniture | 20 |
|  | EDP Equipment | 5 |
| 393, | Stores Equipment | 30 |
| 394, | Tools, Shop and Garage Equipment | 25 |

395, Laboratory Equipment 20
397, Communication Equipment 15
398, Miscellaneous Equipment 20
For the purpose of calculating annual amortization amounts as of December 31, 2021, the book depreciation reserve for each plant account or subaccount is assigned or allocated to vintages. The book reserve assigned to vintages with an age greater than the amortization period is equal to the vintage's original cost. The remaining book reserve is allocated among vintages with an age less than the amortization period in proportion to the calculated accrued amortization. The calculated accrued amortization is equal to the original cost multiplied by the ratio of the vintage's age to its amortization period. The annual amortization amount is determined by dividing the future amortizations (original cost less allocated book reserve) by the remaining period of amortization for the vintage.

## AMORTIZATION OF NET SALVAGE

Experienced salvage is incorporated in the results of the study, as it was reported on the Company's books and records for the period January 1, 2017 through December 31, 2020. The data for the twelve months of 2021 is based on estimated experience. Results of the calculations are shown in Table 5.

Net salvage experienced during the five-year period is presented in this manner to determine the amount of negative net salvage to be amortized for book purposes. In developing the amount to be amortized, the data for the accounts which experienced positive net salvage have been netted with those for accounts which experienced negative net salvage.

In order to be consistent with this manner of recognizing salvage, no adjustments for salvage were made to the annual accruals and accrued depreciation calculated for each function. There were no exclusions from the 2017 through 2021 net salvage accrual.

## PART V. RESULTS OF STUDY

## PART V. RESULTS OF STUDY

## DESCRIPTION OF SUMMARY TABULATIONS

Tables 1 through 4 presented on pages $\mathrm{V}-4$ through $\mathrm{V}-8$ summarize the results of the depreciation study as of December 31, 2021. Table 1 sets forth, by depreciable group, the estimated survivor curve, original cost, book depreciation reserve as of December 31, 2021, future book accruals, calculated annual accrual amount and rate, and composite remaining life for plant in service. Table 2 presents the bringforward of the book reserve to December 31, 2021. Table 3 sets forth the calculation of the depreciation accruals for the twelve months ended December 31, 2021. Table 4 presents the annual amortization of experienced and estimated net salvage based on the period 2017 through 2021.

## DESCRIPTION OF DETAILED TABULATIONS

Supporting statistical data for the estimates of average service lives and survivor curves, the annual depreciation calculations, and salvage and cost of removal for the years 2017-2021 are presented in three sections.

The section beginning on page $\mathrm{VI}-2$ sets forth, for each depreciable group analyzed by the retirement rate method, a chart depicting the original and estimated survivor curves followed by a tabular presentation of the original life table(s) plotted on the chart. A cumulative summary, by year installed, for gas plant and the supporting data for the original cost depreciation calculations are presented in the section beginning on page VII-2. The tabulations of experienced and estimated net salvage by year by account for the five-year period, 2017-2021, are presented in the section beginning on page VIII-2.

In the first section, the survivor curves estimated for the depreciable groups are shown as dark smooth curves on the charts. Each smooth survivor curve is denoted by a numeral followed by the type curve designation. The numeral used is the average life derived from the entire curve from 100 percent to zero percent surviving. In cases where only a segment of the estimated curve is used in the depreciation calculation, the numeral used for identification purposes is not a designation of the average life of the group. The titles of the charts indicate the group, the symbol used to plot the points of the original life table, and the experience and placement bands of the life tables which were plotted. The experience band indicates the range of years for which the retirements were used to develop the stub survivor curve. The placements indicate, for the related experience band, the range of years of installations which appear in the experience.

The tables of the calculated annual depreciation related to original cost are presented in the second section and indicate the estimated average survivor curves used in the calculations. The tables set forth, for each installation year, the original cost, calculated accrued depreciation, allocated book reserve, future book accruals, remaining life expectancy and the calculated annual accrual.

Detailed tabulations setting forth the cost of removal and salvage amounts, by plant account for each year, are presented beginning on page VIII-2. The total salvage and removal costs, by year, were used to calculate the five-year net salvage amortization presented in Table 4 on page V-8.

DUQUESNE LIGHT COMPANY
TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, ORIGINAL COST, BOOK DEPRECIATION RESERVE AND CALCULATED
ANNUAL DEPRECIATION ACCRUALS REL ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2021





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$\begin{array}{r}220,607,855 \\ (6,027) \\ 11,260,124 \\ \hline 231,861,952 \\ \hline \mathbf{1 , 6 8 5 , 0 5 5 , 2 1 1} \\ \hline \hline\end{array}$

NOTE: TRANSPORTATION WAS SWITCHED FROM GROUP TO INDIVIDUAL WITH GAIN LOSS

* LIFE SPAN PROCEDURE WAS USED. CURVE SHOWN IS INTERIM SURVIVOR CURVE. ** ANNUAL ACCRUAL IS CHARGED ON A VEHICLE BY VEHICLE BASIS.

duauesne light company
TABLE 2．BRINGFORWARD TO DECEMBER 31， 2021 OF THE BOOK RESERVE AS OF DECEMBER 31， 2020

|  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
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|  | ⿷． <br>  | $\begin{aligned} & \text { ざ } \\ & \stackrel{\rightharpoonup}{\boxed{\circ}} \end{aligned}$ |  |  |  | ¢ | 左芯 |  |
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|  | DEPRECIABLE GROUP |
| :--- | :---: |
| DEPRECIABLE PLANT |  |



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| GENERAL PLANT |  |  |
| :--- | :--- | :---: |
| 390．1 | STRUCTURES AND IMPROVEMENTS |  |
| 390．15 | STRUCTURES AND IMRROVEMENTS－EV CHARGING STATIONS |  |
| 391.1 | OFFICE FURNITURE AND EQUIPMENT－OFFICE FURNITURE |  |
| 3912 | OFFICE FURNTURE ANE |  |

$\begin{array}{ll} & \text { TOTAL TRANSMISSION PLANT } \\ & \text { IISTRIBUTION PLANT } \\ 361 & \text { STRUCTURES AND IMPROVEMENTS } \\ 362 & \text { STATION EQUIPMENT } \\ \text { 364．11 } & \text { POLES，TOWERS AND FIXTURES } \\ \text { 365．01 } & \text { OVERHEAD CONDUCTRS AND DEVICES } \\ \text { 366 } & \text { UNERGROUND CONDUIT } \\ 367 & \text { UNERGROUND CONDUCTORS AND DEVICES } \\ 368 & \text { LINE TRANSFORMERS } \\ 369.2 & \text { SERVICES } \\ \text { 370 } & \text { MEERERS AND SMART METERS } \\ \text { 370．1 } & \text { METERS－COMMUNICATION EQUIPMENT } \\ 373 & \text { STREET LIGHTING EQUIPMENT } \\ & \text { TOTAL DISTRIBUTION PLANT }\end{array}$ $\begin{array}{ll} & \text { TOTAL TRANSMISSION PLANT } \\ & \text { IISTRIBUTION PLANT } \\ 361 & \text { STRUCTURES AND IMPROVEMENTS } \\ 362 & \text { STATION EQUIPMENT } \\ \text { 364．11 } & \text { POLES，TOWERS AND FIXTURES } \\ \text { 365．01 } & \text { OVERHEAD CONDUCTRS AND DEVICES } \\ \text { 366 } & \text { UNERGROUND CONDUIT } \\ 367 & \text { UNERGROUND CONDUCTORS AND DEVICES } \\ 368 & \text { LINE TRANSFORMERS } \\ 369.2 & \text { SERVICES } \\ \text { 370 } & \text { MEERERS AND SMART METERS } \\ \text { 370．1 } & \text { METERS－COMMUNICATION EQUIPMENT } \\ 373 & \text { STREET LIGHTING EQUIPMENT } \\ & \text { TOTAL DISTRIBUTION PLANT }\end{array}$ $\begin{array}{ll} & \text { TOTAL TRANSMISSION PLANT } \\ & \text { DISTRIBUTION PLANT } \\ 361 & \text { SIRUICTURES AND IMPROVEMENTS } \\ 362 & \text { STATION EQUIPMENT } \\ \text { 364．11 } & \text { POLES，TOWERS AND FIXTURES } \\ \text { 365．01 } & \text { OVERHEAD CONDUCTORS AND DEVICES } \\ \text { 366 } & \text { UDERGROUND CONDUIT } \\ 367 & \text { UNDERGROUND CONDUCTORS AND DEVICES } \\ 368 & \text { LINE TRANSFORMERS } \\ 369.2 & \text { SERVICES } \\ \text { 370 } & \text { MEERS AND SMART METERS } \\ \text { 370．1 } & \text { METERS－COMMUNICATION EQUIPMENT } \\ 373 & \text { STREET LIGHTING EQUIPMENT } \\ & \text { TOTAL DISTRIBUTION PLANT }\end{array}$ $\begin{array}{ll} & \text { TOTAL TRANSMISSION PLANT } \\ & \text { IISTRIBUTION PLANT } \\ 361 & \text { STRUCTURES AND IMPROVEMENTS } \\ 362 & \text { STATION EQUIPMENT } \\ \text { 364．11 } & \text { POLES，TOWERS AND FIXTURES } \\ \text { 365．01 } & \text { OVERHEAD CONDUCTRS AND DEVICES } \\ \text { 366 } & \text { UNERGROUND CONDUIT } \\ 367 & \text { UNERGROUND CONDUCTORS AND DEVICES } \\ 368 & \text { LINE TRANSFORMERS } \\ 369.2 & \text { SERVICES } \\ \text { 370 } & \text { MEERERS AND SMART METERS } \\ \text { 370．1 } & \text { METERS－COMMUNICATION EQUIPMENT } \\ 373 & \text { STREET LIGHTING EQUIPMENT } \\ & \text { TOTAL DISTRIBUTION PLANT }\end{array}$
duQuesne light company
TABLE 3. CALCULATION OF DEPRECIATION ACCRUALS FOR THE TWELVE MONTHS ENDED DECEMBER 31, 2021


* ANNUAL ACCRUAL IS CHARGED ON A VEHICLE BY VEHICLE BASIS.
DUQUESNE LIGHT COMPANY
table 4．AMORTIZATION OF EXPERIENCED AND ESTIMATED NET SALVAGE

|  | $\underset{\infty}{\text { No }}$ |  |  | M | N0000 |
| :---: | :---: | :---: | :---: | :---: | :---: |
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| ACCOUNT | 2017 |  |
| :---: | :---: | :---: |
|  | COST OF REMOVAL | GROSS SALVAGE |
| （1） | （2） | （3） |
| 350 | $(1,137)$ | 29，000 |
| 352 | 58，444 | 1，524 |
| 353 | 678，911 | 60，109 |
| 354 |  |  |
| 355 |  |  |
| 356 | 45，487 | 23，012 |
| 357 | 197，758 | 194，412 |
| 358 |  |  |
| 361 | 14，089 |  |
| 362 | 1，075，470 | 28，425 |
| 364.11 | 3，135，095 | 893，247 |
| 365.01 | 1，121，162 | 597，641 |
| 366 | 31，924 | 1，483 |
| 367 | 547，037 | 498，352 |
| 368 | 1，077，401 | 1，095，428 |
| 369.2 | 1，442，930 |  |
| 370 | 2，008 |  |
| 373 | 37，052 |  |
| 390.1 | 60，454 |  |
| 390.2 |  |  |
| 392 | $(42,884)$ | 128，075 |
| 396 |  |  |
| 397 |  |  |
| total | 9，481，201 | 3，550，707 |

## PART VI. SERVICE LIFE STATISTICS



ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1922-2019
EXPERIENCE BAND 1969-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 34,486,562 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 33,825,101 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 30,693,303 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 29,344,276 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 20,868,937 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 20,888,784 | 57,620 | 0.0028 | 0.9972 | 100.00 |
| 5.5 | 20,807,502 | 79,403 | 0.0038 | 0.9962 | 99.72 |
| 6.5 | 20,911,306 | 1,047 | 0.0001 | 0.9999 | 99.34 |
| 7.5 | 20,760,595 | 5,436 | 0.0003 | 0.9997 | 99.34 |
| 8.5 | 18,308,000 |  | 0.0000 | 1.0000 | 99.31 |
| 9.5 | 10,260,018 |  | 0.0000 | 1.0000 | 99.31 |
| 10.5 | 7,138,479 | 26,578 | 0.0037 | 0.9963 | 99.31 |
| 11.5 | 7,115,923 | 16,920 | 0.0024 | 0.9976 | 98.94 |
| 12.5 | 6,996,878 | 22,826 | 0.0033 | 0.9967 | 98.71 |
| 13.5 | 6,893,796 | 10,782 | 0.0016 | 0.9984 | 98.39 |
| 14.5 | 6,678,079 | 15,312 | 0.0023 | 0.9977 | 98.23 |
| 15.5 | 6,695,437 | 3,053 | 0.0005 | 0.9995 | 98.01 |
| 16.5 | 6,611,547 | 14,104 | 0.0021 | 0.9979 | 97.96 |
| 17.5 | 6,591,498 |  | 0.0000 | 1.0000 | 97.75 |
| 18.5 | 6,571,651 | 61,800 | 0.0094 | 0.9906 | 97.75 |
| 19.5 | 6,511,860 | 26,912 | 0.0041 | 0.9959 | 96.83 |
| 20.5 | 6,413,182 | 13,842 | 0.0022 | 0.9978 | 96.43 |
| 21.5 | 6,297,053 |  | 0.0000 | 1.0000 | 96.23 |
| 22.5 | 6,201,249 | 8,665 | 0.0014 | 0.9986 | 96.23 |
| 23.5 | 6,046,222 | 33,422 | 0.0055 | 0.9945 | 96.09 |
| 24.5 | 5,978,029 | 3,253 | 0.0005 | 0.9995 | 95.56 |
| 25.5 | 5,031,617 | 1,991 | 0.0004 | 0.9996 | 95.51 |
| 26.5 | 5,007,408 |  | 0.0000 | 1.0000 | 95.47 |
| 27.5 | 4,750,403 |  | 0.0000 | 1.0000 | 95.47 |
| 28.5 | 4,698,661 |  | 0.0000 | 1.0000 | 95.47 |
| 29.5 | 4,666,329 |  | 0.0000 | 1.0000 | 95.47 |
| 30.5 | 4,713,091 |  | 0.0000 | 1.0000 | 95.47 |
| 31.5 | 4,723,599 | 3,783 | 0.0008 | 0.9992 | 95.47 |
| 32.5 | 4,708,780 | 97,253 | 0.0207 | 0.9793 | 95.39 |
| 33.5 | 4,597,260 |  | 0.0000 | 1.0000 | 93.42 |
| 34.5 | 4,596,577 | 29,223 | 0.0064 | 0.9936 | 93.42 |
| 35.5 | 4,510,934 | 34,129 | 0.0076 | 0.9924 | 92.83 |
| 36.5 | 4,475,768 |  | 0.0000 | 1.0000 | 92.13 |
| 37.5 | 4,475,768 | 7,843 | 0.0018 | 0.9982 | 92.13 |
| 38.5 | 4,220,340 |  | 0.0000 | 1.0000 | 91.97 |

PLACEMENT BAND 1922-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |

39.5 3,288,013
$40.5 \quad 2,428,665$
$41.5 \quad 2,444,467$
$42.5 \quad 2,456,992$
$43.5 \quad 1,697,770$
44.5
45.5
46.5
47.5
48.5
49.5
50.5
51.5
52.5
53.5
54.5
55.5
56.5
57.5
58.5
59.
60.5
61.5
62.5
63.5
64.
65.
66.
67.
$68.5 \quad 21,583$
69.
70.
71.
72.
73.
74.5
75.5
76.5
77.5
78.5

19,208
19,208
19,208
19,421
20,153
20,153
26,590
26,590
25,121
25,121

EXPERIENCE BAND 1969-2019

| RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |


| 17.446 | 0.0053 | 0.9947 | 91.97 |
| ---: | ---: | ---: | ---: |
|  | 0.0000 | 1.0000 | 91.48 |
| 2.324 | 0.0010 | 0.9990 | 91.48 |
| 52.670 | 0.0214 | 0.9786 | 91.39 |
|  | 0.0000 | 1.0000 | 89.43 |
|  | 0.0000 | 1.0000 | 89.43 |
| 44.244 | 0.0000 | 1.0000 | 89.43 |
| 2.195 | 0.0472 | 0.9528 | 89.43 |
| 1.601 | 0.0019 | 0.9975 | 85.21 |


| 18.241 | 0.0875 | 0.9125 | 84.83 |
| :--- | :--- | :--- | :--- |

$3130.0037 \quad 0.9963 \quad 77.41$
77.12
77.12
77.12
76.10
76.10
75.96
75.96
75.96
75.96
75.96
75.96
75.96
75.96
75.96
50.56
50.56
50.56
50.56
50.33
50.33
50.33
50.33
50.33
50.33
50.33
50.33
50.33
50.33

```
            DUQUESNE LIGHT COMPANY
        ACCOUNT 352 STRUCTURES AND IMPROVEMENTS
            ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1922-2019 |  |  | EXPERIENCE BAND 1969-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 25,121 |  | 0.0000 | 1.0000 | 50.33 |
| 80.5 | 25,121 | 4,205 | 0.1674 | 0.8326 | 50.33 |
| 81.5 | 20,916 | 12,239 | 0.5851 | 0.4149 | 41.91 |
| 82.5 | 8,677 |  | 0.0000 | 1.0000 | 17.38 |
| 83.5 | 8,677 |  | 0.0000 | 1.0000 | 17.38 |
| 84.5 | 8,677 | 3,165 | 0.3648 | 0.6352 | 17.38 |
| 85.5 | 5,512 |  | 0.0000 | 1.0000 | 11.04 |
| 86.5 | 5,512 |  | 0.0000 | 1.0000 | 11.04 |
| 87.5 | 5,512 |  | 0.0000 | 1.0000 | 11.04 |
| 88.5 | 5,512 |  | 0.0000 | 1.0000 | 11.04 |
| 89.5 | 2,240 |  | 0.0000 | 1.0000 | 11.04 |
| 90.5 | 2,240 |  | 0.0000 | 1.0000 | 11.04 |
| 91.5 | 2,240 |  | 0.0000 | 1.0000 | 11.04 |
| 92.5 |  |  |  |  | 11.04 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1927-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 28,019,325 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 27,479,401 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 24,465,601 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 23,194,184 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 14,846,296 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 14,928,145 |  | 0.0000 | 1.0000 | 100.00 |
| 5.5 | 15,129,964 | 79,403 | 0.0052 | 0.9948 | 100.00 |
| 6.5 | 15,252,013 |  | 0.0000 | 1.0000 | 99.48 |
| 7.5 | 16,146,912 | 5,436 | 0.0003 | 0.9997 | 99.48 |
| 8.5 | 13,743,511 |  | 0.0000 | 1.0000 | 99.44 |
| 9.5 | 5,695,529 |  | 0.0000 | 1.0000 | 99.44 |
| 10.5 | 2,563,001 | 15,688 | 0.0061 | 0.9939 | 99.44 |
| 11.5 | 2,551,092 | 16,696 | 0.0065 | 0.9935 | 98.83 |
| 12.5 | 2,442,054 | 22,826 | 0.0093 | 0.9907 | 98.19 |
| 13.5 | 2,356,702 |  | 0.0000 | 1.0000 | 97.27 |
| 14.5 | 2,152,415 |  | 0.0000 | 1.0000 | 97.27 |
| 15.5 | 2,235,397 |  | 0.0000 | 1.0000 | 97.27 |
| 16.5 | 2,157,433 |  | 0.0000 | 1.0000 | 97.27 |
| 17.5 | 2,151,488 |  | 0.0000 | 1.0000 | 97.27 |
| 18.5 | 2,412,253 |  | 0.0000 | 1.0000 | 97.27 |
| 19.5 | 3,257,622 | 20,003 | 0.0061 | 0.9939 | 97.27 |
| 20.5 | 3,982,605 |  | 0.0000 | 1.0000 | 96.67 |
| 21.5 | 3,880,319 |  | 0.0000 | 1.0000 | 96.67 |
| 22.5 | 3,790,264 |  | 0.0000 | 1.0000 | 96.67 |
| 23.5 | 4,418,334 | 33,422 | 0.0076 | 0.9924 | 96.67 |
| 24.5 | 5,104,651 |  | 0.0000 | 1.0000 | 95.94 |
| 25.5 | 4,161,493 | 1,991 | 0.0005 | 0.9995 | 95.94 |
| 26.5 | 4,151,687 |  | 0.0000 | 1.0000 | 95.89 |
| 27.5 | 3,894,682 |  | 0.0000 | 1.0000 | 95.89 |
| 28.5 | 3,842,776 |  | 0.0000 | 1.0000 | 95.89 |
| 29.5 | 4,488,109 |  | 0.0000 | 1.0000 | 95.89 |
| 30.5 | 4,648,228 |  | 0.0000 | 1.0000 | 95.89 |
| 31.5 | 4,663,407 | 3,783 | 0.0008 | 0.9992 | 95.89 |
| 32.5 | 4,655,430 | 97,253 | 0.0209 | 0.9791 | 95.82 |
| 33.5 | 4,543,910 |  | 0.0000 | 1.0000 | 93.81 |
| 34.5 | 4,543,227 | 29,223 | 0.0064 | 0.9936 | 93.81 |
| 35.5 | 4,457,583 | 34,059 | 0.0076 | 0.9924 | 93.21 |
| 36.5 | 4,422,487 |  | 0.0000 | 1.0000 | 92.50 |
| 37.5 | 4,422,487 | 7,843 | 0.0018 | 0.9982 | 92.50 |
| 38.5 | 4,167,059 |  | 0.0000 | 1.0000 | 92.33 |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 3,234,732 | 17,446 | 0.0054 | 0.9946 | 92.33 |
| 40.5 | 2,364,856 |  | 0.0000 | 1.0000 | 91.84 |
| 41.5 | 2,375,845 | 2,324 | 0.0010 | 0.9990 | 91.84 |
| 42.5 | 2,370,372 | 48,330 | 0.0204 | 0.9796 | 91.75 |
| 43.5 | 1,615,490 |  | 0.0000 | 1.0000 | 89.88 |
| 44.5 | 890,833 |  | 0.0000 | 1.0000 | 89.88 |
| 45.5 | 891,991 |  | 0.0000 | 1.0000 | 89.88 |
| 46.5 | 883,148 | 44,244 | 0.0501 | 0.9499 | 89.88 |
| 47.5 | 812,001 |  | 0.0000 | 1.0000 | 85.37 |
| 48.5 | 812,001 |  | 0.0000 | 1.0000 | 85.37 |
| 49.5 | 158,563 |  | 0.0000 | 1.0000 | 85.37 |
| 50.5 | 52,144 |  | 0.0000 | 1.0000 | 85.37 |
| 51.5 | 47,224 |  | 0.0000 | 1.0000 | 85.37 |
| 52.5 | 40,018 |  | 0.0000 | 1.0000 | 85.37 |
| 53.5 | 40,018 |  | 0.0000 | 1.0000 | 85.37 |
| 54.5 | 51,055 |  | 0.0000 | 1.0000 | 85.37 |
| 55.5 | 57,258 |  | 0.0000 | 1.0000 | 85.37 |
| 56.5 | 57,258 |  | 0.0000 | 1.0000 | 85.37 |
| 57.5 | 58,652 |  | 0.0000 | 1.0000 | 85.37 |
| 58.5 | 58,727 |  | 0.0000 | 1.0000 | 85.37 |
| 59.5 | 58,820 |  | 0.0000 | 1.0000 | 85.37 |
| 60.5 | 58,825 |  | 0.0000 | 1.0000 | 85.37 |
| 61.5 | 50,161 |  | 0.0000 | 1.0000 | 85.37 |
| 62.5 | 49,905 |  | 0.0000 | 1.0000 | 85.37 |
| 63.5 | 49,905 |  | 0.0000 | 1.0000 | 85.37 |
| 64.5 | 27,020 | 14,964 | 0.5538 | 0.4462 | 85.37 |
| 65.5 | 12,056 |  | 0.0000 | 1.0000 | 38.09 |
| 66.5 | 3,843 |  | 0.0000 | 1.0000 | 38.09 |
| 67.5 | 3,843 | 0 | 0.0000 | 1.0000 | 38.09 |
| 68.5 | 3,843 | 99 | 0.0257 | 0.9743 | 38.09 |
| 69.5 | 1,469 |  | 0.0000 | 1.0000 | 37.11 |
| 70.5 | 1,469 |  | 0.0000 | 1.0000 | 37.11 |
| 71.5 | 5,461 |  | 0.0000 | 1.0000 | 37.11 |
| 72.5 | 19,421 |  | 0.0000 | 1.0000 | 37.11 |
| 73.5 | 20,153 |  | 0.0000 | 1.0000 | 37.11 |
| 74.5 | 20,153 |  | 0.0000 | 1.0000 | 37.11 |
| 75.5 | 26,590 |  | 0.0000 | 1.0000 | 37.11 |
| 76.5 | 26,590 |  | 0.0000 | 1.0000 | 37.11 |
| 77.5 | 25,121 |  | 0.0000 | 1.0000 | 37.11 |
| 78.5 | 25,121 |  | 0.0000 | 1.0000 | 37.11 |

```
            DUQUESNE LIGHT COMPANY
                ACCOUNT 352 STRUCTURES AND IMPROVEMENTS
            ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT | ND 1927-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AgE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 25,121 |  | 0.0000 | 1.0000 | 37.11 |
| 80.5 | 25,121 | 4,205 | 0.1674 | 0.8326 | 37.11 |
| 81.5 | 20,916 | 12,239 | 0.5851 | 0.4149 | 30.90 |
| 82.5 | 8,677 |  | 0.0000 | 1.0000 | 12.82 |
| 83.5 | 8,677 |  | 0.0000 | 1.0000 | 12.82 |
| 84.5 | 8,677 | 3,165 | 0.3648 | 0.6352 | 12.82 |
| 85.5 | 5,512 |  | 0.0000 | 1.0000 | 8.14 |
| 86.5 | 5,512 |  | 0.0000 | 1.0000 | 8.14 |
| 87.5 | 5,512 |  | 0.0000 | 1.0000 | 8.14 |
| 88.5 | 5,512 |  | 0.0000 | 1.0000 | 8.14 |
| 89.5 | 2,240 |  | 0.0000 | 1.0000 | 8.14 |
| 90.5 | 2,240 |  | 0.0000 | 1.0000 | 8.14 |
| 91.5 | 2,240 |  | 0.0000 | 1.0000 | 8.14 |
| 92.5 |  |  |  |  | 8.14 |

dUQUESNE LIGHT COMPANY
ACCOUNT 353 STATION EQUIPMENT


## ACCOUNT 353 STATION EQUIPMENT

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1918-2019
EXPERIENCE BAND 1964-2019
\(\left.$$
\begin{array}{rr}\text { AGE AT } \\
\text { BEGIN OF } \\
\text { INTERVAL }\end{array}
$$ \begin{array}{r}EXPOSURES AT <br>
BEGINNING OF <br>

AGE INTERVAL\end{array}\right\}\)| 0.0 | $424,497,047$ |
| :---: | ---: |
| 0.5 | $413,100,404$ |
| 1.5 | $403,261,378$ |
| 2.5 | $402,385,614$ |
| 3.5 | $372,713,018$ |
| 4.5 | $350,114,494$ |
| 5.5 | $330,047,572$ |
| 6.5 | $311,445,926$ |
| 7.5 | $268,553,125$ |
| 8.5 | $241,080,233$ |
| 9.5 | $199,870,717$ |
| 10.5 | $173,293,823$ |
| 11.5 | $168,533,197$ |
| 12.5 | $145,072,601$ |
| 13.5 | $118,538,362$ |
| 14.5 | $112,074,842$ |
| 15.5 | $110,879,658$ |
| 16.5 | $105,905,790$ |
| 17.5 | $103,648,047$ |
| 18.5 | $101,932,698$ |
| 19.5 | $99,713,654$ |
| 20.5 | $97,423,764$ |
| 21.5 | $97,417,325$ |
| 22.5 | $89,921,852$ |
| 23.5 | $90,202,773$ |
| 24.5 | $87,806,053$ |
| 25.5 | $83,102,870$ |
| 26.5 | $82,748,847$ |
| 27.5 | $74,838,207$ |
| 28.5 | $73,317,168$ |
| 29.5 | $71,120,582$ |
| 30.5 | $70,737,547$ |
| 31.5 | $68,336,734$ |
| 32.5 | $66,077,964$ |
| 33.5 | $68,503,176$ |
| 34.5 | $66,458,328$ |
| 35.5 | $61,082,084$ |
| 36.5 | $60,051,560$ |
| 37.5 | $54,535,147$ |
| 38.5 | $53,582,191$ |


| RETIREMENTS <br> DURING AGE <br> INTERVAL | RETMT | RURV | PCT SURV |
| ---: | ---: | ---: | ---: |
| BEGIN OF |  |  |  |

## ACCOUNT 353 STATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 50,153,550 | 938,066 | 0.0187 | 0.9813 | 46.65 |
| 40.5 | 42,911,732 | 1,838,337 | 0.0428 | 0.9572 | 45.78 |
| 41.5 | 40,622,633 | 1,655,914 | 0.0408 | 0.9592 | 43.82 |
| 42.5 | 37,934,276 | 879,129 | 0.0232 | 0.9768 | 42.03 |
| 43.5 | 31,754,414 | 640,341 | 0.0202 | 0.9798 | 41.06 |
| 44.5 | 27,306,445 | 438,595 | 0.0161 | 0.9839 | 40.23 |
| 45.5 | 25,868,723 | 1,210,779 | 0.0468 | 0.9532 | 39.59 |
| 46.5 | 23,924,132 | 341,079 | 0.0143 | 0.9857 | 37.73 |
| 47.5 | 18,716,617 | 1,862,550 | 0.0995 | 0.9005 | 37.19 |
| 48.5 | 17,094,869 | 252,710 | 0.0148 | 0.9852 | 33.49 |
| 49.5 | 9,830,701 | 308,806 | 0.0314 | 0.9686 | 33.00 |
| 50.5 | 7,898,108 | 404,536 | 0.0512 | 0.9488 | 31.96 |
| 51.5 | 7,424,735 | 858,763 | 0.1157 | 0.8843 | 30.32 |
| 52.5 | 5,481,718 | 122,671 | 0.0224 | 0.9776 | 26.82 |
| 53.5 | 5,198,743 | 1,284,858 | 0.2471 | 0.7529 | 26.22 |
| 54.5 | 3,893,852 | 460,720 | 0.1183 | 0.8817 | 19.74 |
| 55.5 | 3,559,154 | 112,606 | 0.0316 | 0.9684 | 17.40 |
| 56.5 | 3,432,823 | 234,866 | 0.0684 | 0.9316 | 16.85 |
| 57.5 | 3,220,907 | 116,860 | 0.0363 | 0.9637 | 15.70 |
| 58.5 | 3,005,928 | 336,395 | 0.1119 | 0.8881 | 15.13 |
| 59.5 | 2,642,494 | 731,947 | 0.2770 | 0.7230 | 13.44 |
| 60.5 | 1,857,049 | 16,952 | 0.0091 | 0.9909 | 9.71 |
| 61.5 | 1,799,112 | 506,063 | 0.2813 | 0.7187 | 9.63 |
| 62.5 | 1,182,779 | 24,461 | 0.0207 | 0.9793 | 6.92 |
| 63.5 | 1,073,999 | 1,049 | 0.0010 | 0.9990 | 6.78 |
| 64.5 | 990,024 | 449,167 | 0.4537 | 0.5463 | 6.77 |
| 65.5 | 524,560 | 1,454 | 0.0028 | 0.9972 | 3.70 |
| 66.5 | 423,459 | 16,961 | 0.0401 | 0.9599 | 3.69 |
| 67.5 | 589,404 | 64,492 | 0.1094 | 0.8906 | 3.54 |
| 68.5 | 523,397 | 3,848 | 0.0074 | 0.9926 | 3.15 |
| 69.5 | 519,929 | 6,117 | 0.0118 | 0.9882 | 3.13 |
| 70.5 | 508,933 | 2,321 | 0.0046 | 0.9954 | 3.09 |
| 71.5 | 471,372 | 795 | 0.0017 | 0.9983 | 3.08 |
| 72.5 | 472,895 | 1,593 | 0.0034 | 0.9966 | 3.07 |
| 73.5 | 483,970 | 188 | 0.0004 | 0.9996 | 3.06 |
| 74.5 | 484,062 | 4,152 | 0.0086 | 0.9914 | 3.06 |
| 75.5 | 506,552 | 932 | 0.0018 | 0.9982 | 3.04 |
| 76.5 | 518,087 | 624 | 0.0012 | 0.9988 | 3.03 |
| 77.5 | 541,282 | 885 | 0.0016 | 0.9984 | 3.03 |
| 78.5 | 565,476 | 5,710 | 0.0101 | 0.9899 | 3.02 |


| PLACEMENT | ND 1918-2019 |  | EXPE | IENCE BA | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 588,948 | 7,715 | 0.0131 | 0.9869 | 2.99 |
| 80.5 | 590,173 | 19,275 | 0.0327 | 0.9673 | 2.95 |
| 81.5 | 386,561 | 13,586 | 0.0351 | 0.9649 | 2.86 |
| 82.5 | 372,975 | 37,994 | 0.1019 | 0.8981 | 2.75 |
| 83.5 | 373,911 | 245,874 | 0.6576 | 0.3424 | 2.47 |
| 84.5 | 141,372 | 32,722 | 0.2315 | 0.7685 | 0.85 |
| 85.5 | 200,017 | 5,619 | 0.0281 | 0.9719 | 0.65 |
| 86.5 | 194,354 | 393 | 0.0020 | 0.9980 | 0.63 |
| 87.5 | 194,054 |  | 0.0000 | 1.0000 | 0.63 |
| 88.5 | 194,054 |  | 0.0000 | 1.0000 | 0.63 |
| 89.5 | 185,418 |  | 0.0000 | 1.0000 | 0.63 |
| 90.5 | 176,022 | 12,040 | 0.0684 | 0.9316 | 0.63 |
| 91.5 | 154,538 | 83,511 | 0.5404 | 0.4596 | 0.59 |
| 92.5 | 61,220 | 422 | 0.0069 | 0.9931 | 0.27 |
| 93.5 | 54,133 |  | 0.0000 | 1.0000 | 0.27 |
| 94.5 | 53,870 |  | 0.0000 | 1.0000 | 0.27 |
| 95.5 | 53,792 |  | 0.0000 | 1.0000 | 0.27 |
| 96.5 | 53,792 | 238 | 0.0044 | 0.9956 | 0.27 |
| 97.5 | 14,550 | 238 | 0.0164 | 0.9836 | 0.27 |
| 98.5 | 976 |  | 0.0000 | 1.0000 | 0.26 |
| 99.5 |  |  |  |  | 0.26 |

## ACCOUNT 353 STATION EQUIPMENT

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1918-2019
EXPERIENCE BAND 2000-2019

| Age AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 321,592,793 |
| 0.5 | 312,689,003 |
| 1.5 | 303,105,394 |
| 2.5 | 310,542,298 |
| 3.5 | 286,189,010 |
| 4.5 | 265,386,529 |
| 5.5 | 245,075,972 |
| 6.5 | 228,413,101 |
| 7.5 | 192,706,638 |
| 8.5 | 166,496,072 |
| 9.5 | 125,465,301 |
| 10.5 | 101,303,279 |
| 11.5 | 99,170,980 |
| 12.5 | 82,032,407 |
| 13.5 | 57,863,515 |
| 14.5 | 53,468,480 |
| 15.5 | 57,315,102 |
| 16.5 | 56,798,411 |
| 17.5 | 55,658,980 |
| 18.5 | 57,006,029 |
| 19.5 | 56,463,584 |
| 20.5 | 55,835,394 |
| 21.5 | 55,964,819 |
| 22.5 | 49,504,025 |
| 23.5 | 56,818,131 |
| 24.5 | 60,994,252 |
| 25.5 | 58,381,182 |
| 26.5 | 58,705,250 |
| 27.5 | 54,949,937 |
| 28.5 | 54,098,141 |
| 29.5 | 61,443,337 |
| 30.5 | 63,455,890 |
| 31.5 | 61,102,156 |
| 32.5 | 60,529,897 |
| 33.5 | 63,022,577 |
| 34.5 | 61,025,396 |
| 35.5 | 55,733,925 |
| 36.5 | 53,747,949 |
| 37.5 | 48,679,272 |
| 38.5 | 47,711,817 |

## RETIREMENTS INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 105,989 | 0.0003 | 0.9997 | 100.00 |
| ---: | ---: | ---: | ---: |
| 281,209 | 0.0009 | 0.9991 | 99.97 |
| 964,726 | 0.0032 | 0.9968 | 99.88 |
| 504,070 | 0.0016 | 0.9984 | 99.56 |
| 621,564 | 0.0022 | 0.9978 | 99.40 |
| $1,048,731$ | 0.0040 | 0.9960 | 99.18 |
| $2,119,643$ | 0.0086 | 0.9914 | 98.79 |
| $1,043,489$ | 0.0046 | 0.9954 | 97.94 |
| 995,405 | 0.0052 | 0.9948 | 97.49 |
| 908,574 | 0.0055 | 0.9945 | 96.98 |

$\begin{array}{llll}774.147 & 0.0062 & 0.9938 & 96.46\end{array}$
$\begin{array}{llll}655,999 & 0.0065 & 0.9935 & 95.86\end{array}$
$1,458,382 \quad 0.0147 \quad 0.9853 \quad 95.24$
$\begin{array}{llll}2,335,738 & 0.0285 & 0.9715 & 93.84\end{array}$
$481,4030.0083 \quad 0.9917 \quad 91.17$
$704,666 \quad 0.0132 \quad 0.9868 \quad 90.41$
$144.917 \quad 0.0025 \quad 0.9975 \quad 89.22$
$436,000 \quad 0.0077 \quad 0.9923 \quad 88.99$
$1,773,962 \quad 0.0319 \quad 0.9681 \quad 88.31$
$1,168,6560.0205 \quad 0.9795 \quad 85.49$
$\begin{array}{llll}361.312 & 0.0064 & 0.9936 & 83.74\end{array}$
$462.481 \quad 0.0083 \quad 0.9917 \quad 83.21$
$\begin{array}{llll}755,828 & 0.0135 & 0.9865 & 82.52\end{array}$
$1,163,123 \quad 0.0235 \quad 0.9765 \quad 81.40$
$\begin{array}{llll}1,822,551 & 0.0321 & 0.9679 & 79.49\end{array}$
3,058,125 $0.0501 \quad 0.9499 \quad 76.94$
$10,239,775 \quad 0.1754 \quad 0.8246 \quad 73.08$
$\begin{array}{llll}2,277,186 & 0.0388 & 0.9612 & 60.26\end{array}$
$\begin{array}{llll}1,056,838 & 0.0192 & 0.9808 & 57.93\end{array}$
$\begin{array}{llll}939.316 & 0.0174 & 0.9826 & 56.81\end{array}$
$\begin{array}{llll}615,732 & 0.0100 & 0.9900 & 55.83\end{array}$
$1,571,217 \quad 0.0248 \quad 0.9752 \quad 55.27$
$1,102,335 \quad 0.0180 \quad 0.9820 \quad 53.90$
$1,163,889 \quad 0.0192 \quad 0.9808 \quad 52.93$
$\begin{array}{llll}1,378,154 & 0.0219 & 0.9781 & 51.91\end{array}$
$1,711,172 \quad 0.0280 \quad 0.9720 \quad 50.77$
$\begin{array}{llll}1,659,553 & 0.0298 & 0.9702 & 49.35\end{array}$
$\begin{array}{llll}917,232 & 0.0171 & 0.9829 & 47.88\end{array}$
433.434 0.0089 $0.9911 \quad 47.06$
$1,115,715 \quad 0.0234 \quad 0.9766 \quad 46.64$

## ACCOUNT 353 STATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1918-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 44,629,229 | 912,555 | 0.0204 | 0.9796 | 45.55 |
| 40.5 | 37,486,920 | 1,577,491 | 0.0421 | 0.9579 | 44.62 |
| 41.5 | 35,219,007 | 1,350,416 | 0.0383 | 0.9617 | 42.74 |
| 42.5 | 32,784,246 | 821,608 | 0.0251 | 0.9749 | 41.10 |
| 43.5 | 27,568,489 | 608,291 | 0.0221 | 0.9779 | 40.07 |
| 44.5 | 23,643,909 | 354,471 | 0.0150 | 0.9850 | 39.19 |
| 45.5 | 22,437,104 | 944,038 | 0.0421 | 0.9579 | 38.60 |
| 46.5 | 21,112,858 | 244,368 | 0.0116 | 0.9884 | 36.98 |
| 47.5 | 16,052,836 | 1,636,429 | 0.1019 | 0.8981 | 36.55 |
| 48.5 | 14,941,601 | 66,838 | 0.0045 | 0.9955 | 32.82 |
| 49.5 | 8,026,429 | 262,787 | 0.0327 | 0.9673 | 32.68 |
| 50.5 | 6,168,803 | 344,510 | 0.0558 | 0.9442 | 31.61 |
| 51.5 | 5,787,180 | 229,835 | 0.0397 | 0.9603 | 29.84 |
| 52.5 | 4,473,549 | 120,140 | 0.0269 | 0.9731 | 28.66 |
| 53.5 | 4,193,105 | 1,128,036 | 0.2690 | 0.7310 | 27.89 |
| 54.5 | 3,441,999 | 434,162 | 0.1261 | 0.8739 | 20.39 |
| 55.5 | 3,147,128 | 91,006 | 0.0289 | 0.9711 | 17.81 |
| 56.5 | 3,118,700 | 233,470 | 0.0749 | 0.9251 | 17.30 |
| 57.5 | 2,918,222 | 116,860 | 0.0400 | 0.9600 | 16.00 |
| 58.5 | 2,704,043 | 336,395 | 0.1244 | 0.8756 | 15.36 |
| 59.5 | 2,341,549 | 676,027 | 0.2887 | 0.7113 | 13.45 |
| 60.5 | 1,616,195 | 16,952 | 0.0105 | 0.9895 | 9.57 |
| 61.5 | 1,558,258 | 506,063 | 0.3248 | 0.6752 | 9.47 |
| 62.5 | 941,925 | 24,461 | 0.0260 | 0.9740 | 6.39 |
| 63.5 | 834,338 | 1,049 | 0.0013 | 0.9987 | 6.23 |
| 64.5 | 750,362 | 449,167 | 0.5986 | 0.4014 | 6.22 |
| 65.5 | 285,465 | 1,454 | 0.0051 | 0.9949 | 2.50 |
| 66.5 | 184,408 | 16,961 | 0.0920 | 0.9080 | 2.48 |
| 67.5 | 350,354 | 64,492 | 0.1841 | 0.8159 | 2.26 |
| 68.5 | 284,347 | 3,842 | 0.0135 | 0.9865 | 1.84 |
| 69.5 | 280,883 | 5,360 | 0.0191 | 0.9809 | 1.82 |
| 70.5 | 270,644 | 1,890 | 0.0070 | 0.9930 | 1.78 |
| 71.5 | 239,326 | 795 | 0.0033 | 0.9967 | 1.77 |
| 72.5 | 467,261 | 1,593 | 0.0034 | 0.9966 | 1.76 |
| 73.5 | 483,899 | 188 | 0.0004 | 0.9996 | 1.76 |
| 74.5 | 483,990 | 4,152 | 0.0086 | 0.9914 | 1.76 |
| 75.5 | 506,552 | 932 | 0.0018 | 0.9982 | 1.74 |
| 76.5 | 518,087 | 624 | 0.0012 | 0.9988 | 1.74 |
| 77.5 | 541,282 | 885 | 0.0016 | 0.9984 | 1.74 |
| 78.5 | 565,476 | 5,710 | 0.0101 | 0.9899 | 1.73 |


| PLACEMENT | ND 1918-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 588,948 | 7,715 | 0.0131 | 0.9869 | 1.71 |
| 80.5 | 590,173 | 19,275 | 0.0327 | 0.9673 | 1.69 |
| 81.5 | 386,561 | 13,586 | 0.0351 | 0.9649 | 1.64 |
| 82.5 | 372,975 | 37,994 | 0.1019 | 0.8981 | 1.58 |
| 83.5 | 373,911 | 245,874 | 0.6576 | 0.3424 | 1.42 |
| 84.5 | 141,372 | 32,722 | 0.2315 | 0.7685 | 0.49 |
| 85.5 | 200,017 | 5,619 | 0.0281 | 0.9719 | 0.37 |
| 86.5 | 194,354 | 393 | 0.0020 | 0.9980 | 0.36 |
| 87.5 | 194,054 |  | 0.0000 | 1.0000 | 0.36 |
| 88.5 | 194,054 |  | 0.0000 | 1.0000 | 0.36 |
| 89.5 | 185,418 |  | 0.0000 | 1.0000 | 0.36 |
| 90.5 | 176,022 | 12,040 | 0.0684 | 0.9316 | 0.36 |
| 91.5 | 154,538 | 83,511 | 0.5404 | 0.4596 | 0.34 |
| 92.5 | 61,220 | 422 | 0.0069 | 0.9931 | 0.16 |
| 93.5 | 54,133 |  | 0.0000 | 1.0000 | 0.15 |
| 94.5 | 53,870 |  | 0.0000 | 1.0000 | 0.15 |
| 95.5 | 53,792 |  | 0.0000 | 1.0000 | 0.15 |
| 96.5 | 53,792 | 238 | 0.0044 | 0.9956 | 0.15 |
| 97.5 | 14,550 | 238 | 0.0164 | 0.9836 | 0.15 |
| 98.5 | 976 |  | 0.0000 | 1.0000 | 0.15 |
| 99.5 |  |  |  |  | 0.15 |



## ACCOUNT 354 TOWERS AND FIXTURES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |


| 0.0 | $66,109,267$ |
| ---: | ---: |
| 0.5 | $65,511,218$ |
| 1.5 | $60,253,062$ |
| 2.5 | $60,054,442$ |
| 3.5 | $60,117,005$ |
| 4.5 | $60,385,812$ |
| 5.5 | $60,025,133$ |
| 6.5 | $60,695,678$ |
| 7.5 | $62,384,541$ |
| 8.5 | $62,225,561$ |
| 9.5 | $63,327,161$ |
| 10.5 | $61,581,541$ |
| 11.5 | $60,674,157$ |
| 12.5 | $60,988,951$ |
| 13.5 | $60,944,742$ |
| 14.5 | $57,380,481$ |
| 15.5 | $57,301,312$ |
| 16.5 | $56,741,638$ |
| 17.5 | $56,689,131$ |
| 18.5 | $56,715,471$ |
| 19.5 | $55,939,971$ |
| 20.5 | $55,699,799$ |
| 21.5 | $56,153,231$ |
| 22.5 | $56,026,973$ |
| 23.5 | $55,952,377$ |
| 24.5 | $54,957,416$ |
| 25.5 | $54,945,829$ |
| 26.5 | $55,074,495$ |
| 27.5 | $54,287,156$ |
| 28.5 | $54,348,767$ |
| 29.5 | $54,275,599$ |
| 30.5 | $52,207,144$ |
| 31.5 | $52,022,409$ |
| 32.5 | $51,100,906$ |
| 33.5 | $50,422,215$ |
| 34.5 | $50,414,424$ |
| 35.5 | $50,515,479$ |
| 36.5 | $50,725,858$ |
| 37.5 | $50,719,889$ |
| 38.5 | $46,930,629$ |
|  |  |

## RETIREMENTS INTERVAL

|  |  |
| :--- | :---: |
| RETMT | SURV |
| RATIO | RATIO |

PCT SURV BEGIN OF
INTERVAL

$$
100.00
$$

$$
99.99
$$

$$
99.99
$$

$$
99.93
$$

$$
99.86
$$

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99.77
$$

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99.74
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99.74
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99.74
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99.74
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99.69
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99.66
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99.59
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99.55
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99.46
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99.37
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99.15
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99.05
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98.97
$$

$$
98.92
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98.89
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98.86
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98.80
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98.72
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98.59
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97.64
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97.64
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97.57
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97.57
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97.56
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$$
97.35
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$$
97.28
$$

$$
96.69
$$

$$
96.69
$$

96.58
96.48
96.46
96.28
96.02
95.83

## ACCOUNT 354 TOWERS AND FIXTURES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 1964-2019

| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 43,535,256 | 702,946 | 0.0161 | 0.9839 | 94.96 |
| 40.5 | 31,940,473 | 3,974 | 0.0001 | 0.9999 | 93.42 |
| 41.5 | 31,955,225 | 202,822 | 0.0063 | 0.9937 | 93.41 |
| 42.5 | 31,752,403 | 106,079 | 0.0033 | 0.9967 | 92.82 |
| 43.5 | 32,217,410 | 2,820 | 0.0001 | 0.9999 | 92.51 |
| 44.5 | 32,352,309 | 7,879 | 0.0002 | 0.9998 | 92.50 |
| 45.5 | 29,060,567 | 16,897 | 0.0006 | 0.9994 | 92.48 |
| 46.5 | 27,543,483 | 92,149 | 0.0033 | 0.9967 | 92.42 |
| 47.5 | 18,698,909 | 106,025 | 0.0057 | 0.9943 | 92.11 |
| 48.5 | 17,893,228 | 43,859 | 0.0025 | 0.9975 | 91.59 |
| 49.5 | 16,259,007 | 292,334 | 0.0180 | 0.9820 | 91.37 |
| 50.5 | 13,727,995 | 5,343 | 0.0004 | 0.9996 | 89.73 |
| 51.5 | 13,410,623 | 9,054 | 0.0007 | 0.9993 | 89.69 |
| 52.5 | 13,015,253 | 16,525 | 0.0013 | 0.9987 | 89.63 |
| 53.5 | 12,125,767 | 9,334 | 0.0008 | 0.9992 | 89.52 |
| 54.5 | 9,975,086 | 2,847 | 0.0003 | 0.9997 | 89.45 |
| 55.5 | 9,288,267 | 142,671 | 0.0154 | 0.9846 | 89.42 |
| 56.5 | 9,011,127 | 21,448 | 0.0024 | 0.9976 | 88.05 |
| 57.5 | 8,860,035 | 78,222 | 0.0088 | 0.9912 | 87.84 |
| 58.5 | 8,744,165 |  | 0.0000 | 1.0000 | 87.06 |
| 59.5 | 8,633,218 | 2,086 | 0.0002 | 0.9998 | 87.06 |
| 60.5 | 8,288,554 | 19,570 | 0.0024 | 0.9976 | 87.04 |
| 61.5 | 8,268,984 | 21,910 | 0.0026 | 0.9974 | 86.84 |
| 62.5 | 7,574,309 |  | 0.0000 | 1.0000 | 86.61 |
| 63.5 | 4,179,764 | 3,075 | 0.0007 | 0.9993 | 86.61 |
| 64.5 | 4,177,920 |  | 0.0000 | 1.0000 | 86.54 |
| 65.5 | 2,620,704 | 13,310 | 0.0051 | 0.9949 | 86.54 |
| 66.5 | 2,357,597 |  | 0.0000 | 1.0000 | 86.10 |
| 67.5 | 2,301,471 |  | 0.0000 | 1.0000 | 86.10 |
| 68.5 | 2,048,876 |  | 0.0000 | 1.0000 | 86.10 |
| 69.5 | 1,992,640 |  | 0.0000 | 1.0000 | 86.10 |
| 70.5 | 1,978,975 |  | 0.0000 | 1.0000 | 86.10 |
| 71.5 | 1,975,715 | 5,931 | 0.0030 | 0.9970 | 86.10 |
| 72.5 | 1,970,054 |  | 0.0000 | 1.0000 | 85.84 |
| 73.5 | 1,983,081 |  | 0.0000 | 1.0000 | 85.84 |
| 74.5 | 1,981,736 |  | 0.0000 | 1.0000 | 85.84 |
| 75.5 | 1,974,981 |  | 0.0000 | 1.0000 | 85.84 |
| 76.5 | 1,977,034 |  | 0.0000 | 1.0000 | 85.84 |
| 77.5 | 1,800,187 |  | 0.0000 | 1.0000 | 85.84 |
| 78.5 | 1,789,996 |  | 0.0000 | 1.0000 | 85.84 |

```
ACCOUNT 354 TOWERS AND FIXTURES
    ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT | ND 1915-2019 |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 1,789,996 |  | 0.0000 | 1.0000 | 85.84 |
| 80.5 | 1,829,154 | 5,345 | 0.0029 | 0.9971 | 85.84 |
| 81.5 | 1,809,144 | 136,999 | 0.0757 | 0.9243 | 85.59 |
| 82.5 | 1,675,175 |  | 0.0000 | 1.0000 | 79.11 |
| 83.5 | 1,655,478 | 35,908 | 0.0217 | 0.9783 | 79.11 |
| 84.5 | 1,647,521 | 57,366 | 0.0348 | 0.9652 | 77.40 |
| 85.5 | 1,595,025 |  | 0.0000 | 1.0000 | 74.70 |
| 86.5 | 1,593,444 |  | 0.0000 | 1.0000 | 74.70 |
| 87.5 | 1,593,444 |  | 0.0000 | 1.0000 | 74.70 |
| 88.5 | 1,591,001 |  | 0.0000 | 1.0000 | 74.70 |
| 89.5 | 1,513,056 | 1,364 | 0.0009 | 0.9991 | 74.70 |
| 90.5 | 1,511,692 |  | 0.0000 | 1.0000 | 74.63 |
| 91.5 | 1,511,692 |  | 0.0000 | 1.0000 | 74.63 |
| 92.5 | 1,421,498 |  | 0.0000 | 1.0000 | 74.63 |
| 93.5 | 1,309,823 |  | 0.0000 | 1.0000 | 74.63 |
| 94.5 | 1,306,115 | 61,864 | 0.0474 | 0.9526 | 74.63 |
| 95.5 | 1,204,023 | 54,585 | 0.0453 | 0.9547 | 71.10 |
| 96.5 | 1,149,438 |  | 0.0000 | 1.0000 | 67.88 |
| 97.5 | 1,149,438 |  | 0.0000 | 1.0000 | 67.88 |
| 98.5 | 1,149,438 |  | 0.0000 | 1.0000 | 67.88 |
| 99.5 | 607,052 |  | 0.0000 | 1.0000 | 67.88 |
| 100.5 | 575,938 |  | 0.0000 | 1.0000 | 67.88 |
| 101.5 | 531,650 |  | 0.0000 | 1.0000 | 67.88 |
| 102.5 | 500,073 |  | 0.0000 | 1.0000 | 67.88 |
| 103.5 | 44,951 |  | 0.0000 | 1.0000 | 67.88 |
| 104.5 |  |  |  |  | 67.88 |

## ACCOUNT 354 TOWERS AND FIXTURES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 17,615,936 | 4,033 | 0.0002 | 0.9998 | 100.00 |
| 0.5 | 17,290,255 |  | 0.0000 | 1.0000 | 99.98 |
| 1.5 | 12,235,623 | 36,532 | 0.0030 | 0.9970 | 99.98 |
| 2.5 | 12,095,789 |  | 0.0000 | 1.0000 | 99.68 |
| 3.5 | 12,065,337 | 38,590 | 0.0032 | 0.9968 | 99.68 |
| 4.5 | 12,565,492 | 7,275 | 0.0006 | 0.9994 | 99.36 |
| 5.5 | 12,232,186 |  | 0.0000 | 1.0000 | 99.30 |
| 6.5 | 12,169,183 |  | 0.0000 | 1.0000 | 99.30 |
| 7.5 | 11,246,978 |  | 0.0000 | 1.0000 | 99.30 |
| 8.5 | 11,580,333 | 27,896 | 0.0024 | 0.9976 | 99.30 |
| 9.5 | 11,080,286 |  | 0.0000 | 1.0000 | 99.06 |
| 10.5 | 8,962,113 | 43,648 | 0.0049 | 0.9951 | 99.06 |
| 11.5 | 7,967,974 | 24,156 | 0.0030 | 0.9970 | 98.58 |
| 12.5 | 7,953,446 |  | 0.0000 | 1.0000 | 98.28 |
| 13.5 | 8,611,305 |  | 0.0000 | 1.0000 | 98.28 |
| 14.5 | 5,083,370 | 40,787 | 0.0080 | 0.9920 | 98.28 |
| 15.5 | 5,045,603 | 18,642 | 0.0037 | 0.9963 | 97.49 |
| 16.5 | 4,524,777 | 44,939 | 0.0099 | 0.9901 | 97.13 |
| 17.5 | 4,473,811 | 17,480 | 0.0039 | 0.9961 | 96.17 |
| 18.5 | 10,051,230 |  | 0.0000 | 1.0000 | 95.79 |
| 19.5 | 12,602,562 |  | 0.0000 | 1.0000 | 95.79 |
| 20.5 | 24,103,372 | 23,307 | 0.0010 | 0.9990 | 95.79 |
| 21.5 | 24,378,218 |  | 0.0000 | 1.0000 | 95.70 |
| 22.5 | 24,282,561 |  | 0.0000 | 1.0000 | 95.70 |
| 23.5 | 24,292,527 | 524,784 | 0.0216 | 0.9784 | 95.70 |
| 24.5 | 23,399,198 |  | 0.0000 | 1.0000 | 93.63 |
| 25.5 | 26,582,296 |  | 0.0000 | 1.0000 | 93.63 |
| 26.5 | 28,297,183 |  | 0.0000 | 1.0000 | 93.63 |
| 27.5 | 36,499,245 |  | 0.0000 | 1.0000 | 93.63 |
| 28.5 | 37,335,779 |  | 0.0000 | 1.0000 | 93.63 |
| 29.5 | 39,367,008 |  | 0.0000 | 1.0000 | 93.63 |
| 30.5 | 40,285,862 | 212,551 | 0.0053 | 0.9947 | 93.63 |
| 31.5 | 40,648,024 |  | 0.0000 | 1.0000 | 93.14 |
| 32.5 | 40,077,093 | 55,293 | 0.0014 | 0.9986 | 93.14 |
| 33.5 | 40,138,831 | 52,285 | 0.0013 | 0.9987 | 93.01 |
| 34.5 | 42,196,515 | 10,204 | 0.0002 | 0.9998 | 92.89 |
| 35.5 | 42,943,143 | 92,407 | 0.0022 | 0.9978 | 92.87 |
| 36.5 | 43,013,528 | 137,774 | 0.0032 | 0.9968 | 92.67 |
| 37.5 | 43,005,669 | 93,555 | 0.0022 | 0.9978 | 92.37 |
| 38.5 | 39,204,522 | 427,861 | 0.0109 | 0.9891 | 92.17 |

## ACCOUNT 354 TOWERS AND FIXTURES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 35,877,400 | 697,620 | 0.0194 | 0.9806 | 91.16 |
| 40.5 | 24,613,191 | 3,974 | 0.0002 | 0.9998 | 89.39 |
| 41.5 | 24,626,547 | 181,391 | 0.0074 | 0.9926 | 89.38 |
| 42.5 | 25,148,609 | 102,171 | 0.0041 | 0.9959 | 88.72 |
| 43.5 | 28,397,221 |  | 0.0000 | 1.0000 | 88.36 |
| 44.5 | 28,480,594 |  | 0.0000 | 1.0000 | 88.36 |
| 45.5 | 26,733,185 |  | 0.0000 | 1.0000 | 88.36 |
| 46.5 | 25,557,522 | 65,820 | 0.0026 | 0.9974 | 88.36 |
| 47.5 | 16,304,336 | 99,794 | 0.0061 | 0.9939 | 88.13 |
| 48.5 | 15,710,989 | 22,772 | 0.0014 | 0.9986 | 87.59 |
| 49.5 | 14,153,130 | 290,660 | 0.0205 | 0.9795 | 87.46 |
| 50.5 | 11,641,613 |  | 0.0000 | 1.0000 | 85.67 |
| 51.5 | 11,332,601 |  | 0.0000 | 1.0000 | 85.67 |
| 52.5 | 10,946,286 |  | 0.0000 | 1.0000 | 85.67 |
| 53.5 | 10,073,325 |  | 0.0000 | 1.0000 | 85.67 |
| 54.5 | 7,951,426 |  | 0.0000 | 1.0000 | 85.67 |
| 55.5 | 7,276,772 | 142,512 | 0.0196 | 0.9804 | 85.67 |
| 56.5 | 6,999,987 | 11,620 | 0.0017 | 0.9983 | 83.99 |
| 57.5 | 7,030,753 | 78,222 | 0.0111 | 0.9889 | 83.85 |
| 58.5 | 6,924,531 |  | 0.0000 | 1.0000 | 82.92 |
| 59.5 | 6,813,584 |  | 0.0000 | 1.0000 | 82.92 |
| 60.5 | 6,471,006 |  | 0.0000 | 1.0000 | 82.92 |
| 61.5 | 6,471,006 |  | 0.0000 | 1.0000 | 82.92 |
| 62.5 | 5,798,241 |  | 0.0000 | 1.0000 | 82.92 |
| 63.5 | 2,423,880 |  | 0.0000 | 1.0000 | 82.92 |
| 64.5 | 2,425,110 |  | 0.0000 | 1.0000 | 82.92 |
| 65.5 | 869,683 | 4,919 | 0.0057 | 0.9943 | 82.92 |
| 66.5 | 616,468 |  | 0.0000 | 1.0000 | 82.45 |
| 67.5 | 560,342 |  | 0.0000 | 1.0000 | 82.45 |
| 68.5 | 310,042 |  | 0.0000 | 1.0000 | 82.45 |
| 69.5 | 343,044 |  | 0.0000 | 1.0000 | 82.45 |
| 70.5 | 329,380 |  | 0.0000 | 1.0000 | 82.45 |
| 71.5 | 331,194 |  | 0.0000 | 1.0000 | 82.45 |
| 72.5 | 575,543 |  | 0.0000 | 1.0000 | 82.45 |
| 73.5 | 701,485 |  | 0.0000 | 1.0000 | 82.45 |
| 74.5 | 758,115 |  | 0.0000 | 1.0000 | 82.45 |
| 75.5 | 789,342 |  | 0.0000 | 1.0000 | 82.45 |
| 76.5 | 791,394 |  | 0.0000 | 1.0000 | 82.45 |
| 77.5 | 614,548 |  | 0.0000 | 1.0000 | 82.45 |
| 78.5 | 604,356 |  | 0.0000 | 1.0000 | 82.45 |

## ACCOUNT 354 TOWERS AND FIXTURES <br> ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1915-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 1,107,585 |  | 0.0000 | 1.0000 | 82.45 |
| 80.5 | 1,176,124 | 5,345 | 0.0045 | 0.9955 | 82.45 |
| 81.5 | 1,197,371 | 136,999 | 0.1144 | 0.8856 | 82.07 |
| 82.5 | 1,093,263 |  | 0.0000 | 1.0000 | 72.68 |
| 83.5 | 1,562,601 | 35,908 | 0.0230 | 0.9770 | 72.68 |
| 84.5 | 1,647,521 | 57,366 | 0.0348 | 0.9652 | 71.01 |
| 85.5 | 1,595,025 |  | 0.0000 | 1.0000 | 68.54 |
| 86.5 | 1,593,444 |  | 0.0000 | 1.0000 | 68.54 |
| 87.5 | 1,593,444 |  | 0.0000 | 1.0000 | 68.54 |
| 88.5 | 1,591,001 |  | 0.0000 | 1.0000 | 68.54 |
| 89.5 | 1,513,056 | 1,364 | 0.0009 | 0.9991 | 68.54 |
| 90.5 | 1,511,692 |  | 0.0000 | 1.0000 | 68.48 |
| 91.5 | 1,511,692 |  | 0.0000 | 1.0000 | 68.48 |
| 92.5 | 1,421,498 |  | 0.0000 | 1.0000 | 68.48 |
| 93.5 | 1,309,823 |  | 0.0000 | 1.0000 | 68.48 |
| 94.5 | 1,306,115 | 61,864 | 0.0474 | 0.9526 | 68.48 |
| 95.5 | 1,204,023 | 54,585 | 0.0453 | 0.9547 | 65.23 |
| 96.5 | 1,149,438 |  | 0.0000 | 1.0000 | 62.28 |
| 97.5 | 1,149,438 |  | 0.0000 | 1.0000 | 62.28 |
| 98.5 | 1,149,438 |  | 0.0000 | 1.0000 | 62.28 |
| 99.5 | 607,052 |  | 0.0000 | 1.0000 | 62.28 |
| 100.5 | 575,938 |  | 0.0000 | 1.0000 | 62.28 |
| 101.5 | 531,650 |  | 0.0000 | 1.0000 | 62.28 |
| 102.5 | 500,073 |  | 0.0000 | 1.0000 | 62.28 |
| 103.5 | 44,951 |  | 0.0000 | 1.0000 | 62.28 |
| 104.5 |  |  |  |  | 62.28 |



## ACCOUNT 355 POLES AND FIXTURES

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1927-2019
EXPERIENCE BAND 1967-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 54,193,858 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 53,915,273 | 6,081 | 0.0001 | 0.9999 | 100.00 |
| 1.5 | 50,196,451 | 7,036 | 0.0001 | 0.9999 | 99.99 |
| 2.5 | 48,698,581 | 10,771 | 0.0002 | 0.9998 | 99.97 |
| 3.5 | 48,437,554 | 47,262 | 0.0010 | 0.9990 | 99.95 |
| 4.5 | 48,189,044 | 69,457 | 0.0014 | 0.9986 | 99.86 |
| 5.5 | 47,071,998 | 11,871 | 0.0003 | 0.9997 | 99.71 |
| 6.5 | 28,363,840 | 4,806 | 0.0002 | 0.9998 | 99.69 |
| 7.5 | 27,778,331 | 77,258 | 0.0028 | 0.9972 | 99.67 |
| 8.5 | 13,868,638 |  | 0.0000 | 1.0000 | 99.39 |
| 9.5 | 13,548,334 |  | 0.0000 | 1.0000 | 99.39 |
| 10.5 | 10,720,275 | 1,605 | 0.0001 | 0.9999 | 99.39 |
| 11.5 | 9,959,058 | 2,966 | 0.0003 | 0.9997 | 99.38 |
| 12.5 | 9,958,051 |  | 0.0000 | 1.0000 | 99.35 |
| 13.5 | 8,975,276 | 43,882 | 0.0049 | 0.9951 | 99.35 |
| 14.5 | 7,344,617 | 80 | 0.0000 | 1.0000 | 98.86 |
| 15.5 | 7,176,690 | 272,371 | 0.0380 | 0.9620 | 98.86 |
| 16.5 | 6,062,637 | 4,427 | 0.0007 | 0.9993 | 95.11 |
| 17.5 | 6,059,078 | 3,958 | 0.0007 | 0.9993 | 95.04 |
| 18.5 | 6,056,649 | 910 | 0.0002 | 0.9998 | 94.98 |
| 19.5 | 5,796,887 | 15,416 | 0.0027 | 0.9973 | 94.96 |
| 20.5 | 5,521,743 | 26,443 | 0.0048 | 0.9952 | 94.71 |
| 21.5 | 5,519,247 |  | 0.0000 | 1.0000 | 94.26 |
| 22.5 | 5,505,687 | 3,075 | 0.0006 | 0.9994 | 94.26 |
| 23.5 | 5,524,611 | 1,942 | 0.0004 | 0.9996 | 94.20 |
| 24.5 | 5,523,944 | 41,226 | 0.0075 | 0.9925 | 94.17 |
| 25.5 | 5,517,075 | 6,572 | 0.0012 | 0.9988 | 93.47 |
| 26.5 | 4,247,925 | 9,659 | 0.0023 | 0.9977 | 93.36 |
| 27.5 | 2,911,937 | 2,240 | 0.0008 | 0.9992 | 93.14 |
| 28.5 | 2,910,783 | 494 | 0.0002 | 0.9998 | 93.07 |
| 29.5 | 2,913,995 |  | 0.0000 | 1.0000 | 93.06 |
| 30.5 | 5,038,989 | 1,273 | 0.0003 | 0.9997 | 93.06 |
| 31.5 | 5,044,034 | 17,123 | 0.0034 | 0.9966 | 93.03 |
| 32.5 | 5,836,279 | 719 | 0.0001 | 0.9999 | 92.72 |
| 33.5 | 4,989,504 |  | 0.0000 | 1.0000 | 92.71 |
| 34.5 | 4,989,008 | 26,695 | 0.0054 | 0.9946 | 92.71 |
| 35.5 | 4,998,923 | 87,582 | 0.0175 | 0.9825 | 92.21 |
| 36.5 | 4,939,528 | 21,821 | 0.0044 | 0.9956 | 90.59 |
| 37.5 | 4,907,142 | 4,273 | 0.0009 | 0.9991 | 90.19 |
| 38.5 | 2,764,311 | 14,194 | 0.0051 | 0.9949 | 90.12 |


| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 2,359,967 | 8,209 | 0.0035 | 0.9965 | 89.65 |
| 40.5 | 1,357,835 | 22,740 | 0.0167 | 0.9833 | 89.34 |
| 41.5 | 1,330,512 | 67,173 | 0.0505 | 0.9495 | 87.85 |
| 42.5 | 1,249,570 | 6,014 | 0.0048 | 0.9952 | 83.41 |
| 43.5 | 1,231,733 | 1,847 | 0.0015 | 0.9985 | 83.01 |
| 44.5 | 1,204,775 | 5,927 | 0.0049 | 0.9951 | 82.88 |
| 45.5 | 651,407 | 11,292 | 0.0173 | 0.9827 | 82.48 |
| 46.5 | 606,526 | 19,674 | 0.0324 | 0.9676 | 81.05 |
| 47.5 | 544,426 | 1,288 | 0.0024 | 0.9976 | 78.42 |
| 48.5 | 543,138 |  | 0.0000 | 1.0000 | 78.23 |
| 49.5 | 522,020 |  | 0.0000 | 1.0000 | 78.23 |
| 50.5 | 315,863 |  | 0.0000 | 1.0000 | 78.23 |
| 51.5 | 258,778 |  | 0.0000 | 1.0000 | 78.23 |
| 52.5 | 258,778 |  | 0.0000 | 1.0000 | 78.23 |
| 53.5 | 235,778 |  | 0.0000 | 1.0000 | 78.23 |
| 54.5 | 223,347 |  | 0.0000 | 1.0000 | 78.23 |
| 55.5 | 224,734 | 138,298 | 0.6154 | 0.3846 | 78.23 |
| 56.5 | 86,436 |  | 0.0000 | 1.0000 | 30.09 |
| 57.5 | 87,763 |  | 0.0000 | 1.0000 | 30.09 |
| 58.5 | 87,763 | 13,312 | 0.1517 | 0.8483 | 30.09 |
| 59.5 | 74,555 | 319 | 0.0043 | 0.9957 | 25.53 |
| 60.5 | 74,236 | 4,167 | 0.0561 | 0.9439 | 25.42 |
| 61.5 | 66,665 |  | 0.0000 | 1.0000 | 23.99 |
| 62.5 | 66,665 |  | 0.0000 | 1.0000 | 23.99 |
| 63.5 | 66,665 |  | 0.0000 | 1.0000 | 23.99 |
| 64.5 | 66,665 | 985 | 0.0148 | 0.9852 | 23.99 |
| 65.5 | 63,440 |  | 0.0000 | 1.0000 | 23.64 |
| 66.5 | 62,396 | 24,301 | 0.3895 | 0.6105 | 23.64 |
| 67.5 | 38,095 |  | 0.0000 | 1.0000 | 14.43 |
| 68.5 | 38,095 | 941 | 0.0247 | 0.9753 | 14.43 |
| 69.5 | 37,565 |  | 0.0000 | 1.0000 | 14.07 |
| 70.5 | 39,011 |  | 0.0000 | 1.0000 | 14.07 |
| 71.5 | 39,011 |  | 0.0000 | 1.0000 | 14.07 |
| 72.5 | 39,011 |  | 0.0000 | 1.0000 | 14.07 |
| 73.5 | 39,072 |  | 0.0000 | 1.0000 | 14.07 |
| 74.5 | 38,374 | 1,068 | 0.0278 | 0.9722 | 14.07 |
| 75.5 | 37,307 | 28,394 | 0.7611 | 0.2389 | 13.68 |
| 76.5 | 8,794 |  | 0.0000 | 1.0000 | 3.27 |
| 77.5 | 8,794 |  | 0.0000 | 1.0000 | 3.27 |
| 78.5 | 7,890 | 330 | 0.0418 | 0.9582 | 3.27 |

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ACCOUNT 355 POLES AND FIXTURES
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT BAND $1927-2019$ |  | EXPERIENCE BAND 1967-2019 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 |  | 7,560 |  | 0.0000 | 1.0000 |
| 80.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 81.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 82.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 83.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 84.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 85.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 86.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 87.5 | 7,560 |  | 0.0000 | 1.0000 | 3.13 |
| 88.5 |  |  |  |  |  |

## ACCOUNT 355 POLES AND FIXTURES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1927-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 48,504,221 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 48,487,422 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 44,684,323 | 2,299 | 0.0001 | 0.9999 | 100.00 |
| 2.5 | 43,204,750 |  | 0.0000 | 1.0000 | 99.99 |
| 3.5 | 42,958,140 | 34,490 | 0.0008 | 0.9992 | 99.99 |
| 4.5 | 42,778,044 | 62,139 | 0.0015 | 0.9985 | 99.91 |
| 5.5 | 41,667,518 |  | 0.0000 | 1.0000 | 99.77 |
| 6.5 | 24,401,515 |  | 0.0000 | 1.0000 | 99.77 |
| 7.5 | 25,117,610 | 66,197 | 0.0026 | 0.9974 | 99.77 |
| 8.5 | 11,214,146 |  | 0.0000 | 1.0000 | 99.51 |
| 9.5 | 10,893,842 |  | 0.0000 | 1.0000 | 99.51 |
| 10.5 | 8,092,372 |  | 0.0000 | 1.0000 | 99.51 |
| 11.5 | 7,334,319 |  | 0.0000 | 1.0000 | 99.51 |
| 12.5 | 7,474,612 |  | 0.0000 | 1.0000 | 99.51 |
| 13.5 | 7,209,235 | 42,024 | 0.0058 | 0.9942 | 99.51 |
| 14.5 | 5,612,423 |  | 0.0000 | 1.0000 | 98.93 |
| 15.5 | 5,440,865 | 264,718 | 0.0487 | 0.9513 | 98.93 |
| 16.5 | 4,264,280 | 1,485 | 0.0003 | 0.9997 | 94.11 |
| 17.5 | 4,272,650 |  | 0.0000 | 1.0000 | 94.08 |
| 18.5 | 4,273,141 |  | 0.0000 | 1.0000 | 94.08 |
| 19.5 | 4,432,173 | 10,532 | 0.0024 | 0.9976 | 94.08 |
| 20.5 | 4,202,364 | 1,053 | 0.0003 | 0.9997 | 93.86 |
| 21.5 | 4,208,033 |  | 0.0000 | 1.0000 | 93.83 |
| 22.5 | 4,207,708 |  | 0.0000 | 1.0000 | 93.83 |
| 23.5 | 4,216,046 | 1,942 | 0.0005 | 0.9995 | 93.83 |
| 24.5 | 4,222,716 | 39,064 | 0.0093 | 0.9907 | 93.79 |
| 25.5 | 4,718,954 |  | 0.0000 | 1.0000 | 92.92 |
| 26.5 | 3,537,173 | 9,561 | 0.0027 | 0.9973 | 92.92 |
| 27.5 | 2,222,708 |  | 0.0000 | 1.0000 | 92.67 |
| 28.5 | 2,223,794 |  | 0.0000 | 1.0000 | 92.67 |
| 29.5 | 2,275,443 |  | 0.0000 | 1.0000 | 92.67 |
| 30.5 | 4,619,267 |  | 0.0000 | 1.0000 | 92.67 |
| 31.5 | 4,680,549 | 16,174 | 0.0035 | 0.9965 | 92.67 |
| 32.5 | 5,473,743 |  | 0.0000 | 1.0000 | 92.35 |
| 33.5 | 4,650,664 |  | 0.0000 | 1.0000 | 92.35 |
| 34.5 | 4,736,934 | 6,017 | 0.0013 | 0.9987 | 92.35 |
| 35.5 | 4,735,531 | 68,217 | 0.0144 | 0.9856 | 92.23 |
| 36.5 | 4,667,314 | 21,304 | 0.0046 | 0.9954 | 90.91 |
| 37.5 | 4,635,446 | 2,997 | 0.0006 | 0.9994 | 90.49 |
| 38.5 | 2,494,687 | 13,188 | 0.0053 | 0.9947 | 90.43 |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 2,090,762 |  | 0.0000 | 1.0000 | 89.95 |
| 40.5 | 1,096,839 | 22,740 | 0.0207 | 0.9793 | 89.95 |
| 41.5 | 1,072,748 | 64,919 | 0.0605 | 0.9395 | 88.09 |
| 42.5 | 994,060 | 352 | 0.0004 | 0.9996 | 82.76 |
| 43.5 | 981,885 |  | 0.0000 | 1.0000 | 82.73 |
| 44.5 | 956,774 | 840 | 0.0009 | 0.9991 | 82.73 |
| 45.5 | 410,634 |  | 0.0000 | 1.0000 | 82.66 |
| 46.5 | 466,455 | 19,643 | 0.0421 | 0.9579 | 82.66 |
| 47.5 | 404,386 | 1,288 | 0.0032 | 0.9968 | 79.18 |
| 48.5 | 403,098 |  | 0.0000 | 1.0000 | 78.92 |
| 49.5 | 443,708 |  | 0.0000 | 1.0000 | 78.92 |
| 50.5 | 237,551 |  | 0.0000 | 1.0000 | 78.92 |
| 51.5 | 180,467 |  | 0.0000 | 1.0000 | 78.92 |
| 52.5 | 180,467 |  | 0.0000 | 1.0000 | 78.92 |
| 53.5 | 157,467 |  | 0.0000 | 1.0000 | 78.92 |
| 54.5 | 162,811 |  | 0.0000 | 1.0000 | 78.92 |
| 55.5 | 164,198 | 138,298 | 0.8423 | 0.1577 | 78.92 |
| 56.5 | 48,992 |  | 0.0000 | 1.0000 | 12.45 |
| 57.5 | 50,319 |  | 0.0000 | 1.0000 | 12.45 |
| 58.5 | 52,061 | 13,312 | 0.2557 | 0.7443 | 12.45 |
| 59.5 | 38,853 |  | 0.0000 | 1.0000 | 9.27 |
| 60.5 | 38,853 | 4,167 | 0.1073 | 0.8927 | 9.27 |
| 61.5 | 31,282 |  | 0.0000 | 1.0000 | 8.27 |
| 62.5 | 31,282 |  | 0.0000 | 1.0000 | 8.27 |
| 63.5 | 31,282 |  | 0.0000 | 1.0000 | 8.27 |
| 64.5 | 31,282 | 985 | 0.0315 | 0.9685 | 8.27 |
| 65.5 | 28,058 |  | 0.0000 | 1.0000 | 8.01 |
| 66.5 | 27,014 | 24,301 | 0.8996 | 0.1004 | 8.01 |
| 67.5 | 2,712 |  | 0.0000 | 1.0000 | 0.80 |
| 68.5 | 10,878 | 941 | 0.0865 | 0.9135 | 0.80 |
| 69.5 | 37,297 |  | 0.0000 | 1.0000 | 0.73 |
| 70.5 | 38,743 |  | 0.0000 | 1.0000 | 0.73 |
| 71.5 | 38,743 |  | 0.0000 | 1.0000 | 0.73 |
| 72.5 | 39,011 |  | 0.0000 | 1.0000 | 0.73 |
| 73.5 | 39,072 |  | 0.0000 | 1.0000 | 0.73 |
| 74.5 | 38,374 | 1,068 | 0.0278 | 0.9722 | 0.73 |
| 75.5 | 37,307 | 28,394 | 0.7611 | 0.2389 | 0.71 |
| 76.5 | 8,794 |  | 0.0000 | 1.0000 | 0.17 |
| 77.5 | 8,794 |  | 0.0000 | 1.0000 | 0.17 |
| 78.5 | 7,890 | 330 | 0.0418 | 0.9582 | 0.17 |

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ACCOUNT 355 POLES AND FIXTURES
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT BAND $1927-2019$ |  | EXPERIENCE BAND 2000-2019 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 |  | 7,560 |  | 0.0000 | 1.0000 |
| 80.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 81.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 82.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 83.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 84.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 85.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 86.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 87.5 | 7,560 |  | 0.0000 | 1.0000 | 0.16 |
| 88.5 |  |  |  |  |  |

duQuesne light company
ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES
ORIGINAL AND SMOOTH SURVIVOR CURVES


ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 1964-2019

| Age AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 118,284,823 |
| 0.5 | 114,334,730 |
| 1.5 | 104,223,719 |
| 2.5 | 90,967,733 |
| 3.5 | 87,206,384 |
| 4.5 | 85,074,895 |
| 5.5 | 77,218,905 |
| 6.5 | 68,740,773 |
| 7.5 | 65,491,204 |
| 8.5 | 62,138,111 |
| 9.5 | 60,054,906 |
| 10.5 | 44,783,493 |
| 11.5 | 44,828,175 |
| 12.5 | 42,597,120 |
| 13.5 | 41,231,876 |
| 14.5 | 38,295,057 |
| 15.5 | 37,359,509 |
| 16.5 | 36,440,364 |
| 17.5 | 36,339,817 |
| 18.5 | 36,305,126 |
| 19.5 | 36,445,695 |
| 20.5 | 36,546,933 |
| 21.5 | 36,707,924 |
| 22.5 | 36,725,918 |
| 23.5 | 36,698,906 |
| 24.5 | 36,607,867 |
| 25.5 | 36,534,521 |
| 26.5 | 35,420,781 |
| 27.5 | 32,652,824 |
| 28.5 | 32,786,950 |
| 29.5 | 32,684,462 |
| 30.5 | 32,743,708 |
| 31.5 | 32,818,333 |
| 32.5 | 32,707,209 |
| 33.5 | 31,725,612 |
| 34.5 | 29,139,609 |
| 35.5 | 29,058,419 |
| 36.5 | 28,994,296 |
| 37.5 | 28,929,699 |
| 38.5 | 25,537,919 |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 10,755 | 0.0001 | 0.9999 | 100.00 |
| ---: | ---: | ---: | ---: |
| 30,656 | 0.0003 | 0.9997 | 99.99 |
| 62,589 | 0.0006 | 0.9994 | 99.96 |
| 34,701 | 0.0004 | 0.9996 | 99.90 |
| 88,434 | 0.0010 | 0.9990 | 99.87 |
| 61,293 | 0.0007 | 0.9993 | 99.76 |
| 211,883 | 0.0027 | 0.9973 | 99.69 |
| 86,702 | 0.0013 | 0.9987 | 99.42 |
| 115,171 | 0.0018 | 0.9982 | 99.29 |
| 46,212 | 0.0007 | 0.9993 | 99.12 |
| 166,104 | 0.0028 | 0.9972 | 99.05 |
| 19,639 | 0.0004 | 0.9996 | 98.77 |
| 45,705 | 0.0010 | 0.9990 | 98.73 |
| 63,824 | 0.0015 | 0.9985 | 98.63 |
| 37,274 | 0.0009 | 0.9991 | 98.48 |
| 128,092 | 0.0033 | 0.9967 | 98.39 |
| 123,655 | 0.0033 | 0.9967 | 98.06 |
| 97,378 | 0.0027 | 0.9973 | 97.74 |
| 75,787 | 0.0021 | 0.9979 | 97.48 |
| 24,548 | 0.0007 | 0.9993 | 97.27 |
| 24,418 | 0.0007 | 0.9993 | 97.21 |
| 53,903 | 0.0015 | 0.9985 | 97.14 |
| 28,619 | 0.0008 | 0.9992 | 97.00 |
| 23,818 | 0.0006 | 0.9994 | 96.92 |
| 139,384 | 0.0038 | 0.9962 | 96.86 |
| 74,743 | 0.0020 | 0.9980 | 96.49 |
| 67,857 | 0.0019 | 0.9981 | 96.30 |
| 52,100 | 0.0015 | 0.9985 | 96.12 |
| 79,559 | 0.0024 | 0.9976 | 95.97 |
| 45,950 | 0.0014 | 0.9986 | 95.74 |
| 9,596 | 0.0003 | 0.9997 | 95.61 |
| 24,445 | 0.0007 | 0.9993 | 95.58 |
| 19,088 | 0.0006 | 0.9994 | 95.51 |
| 47,466 | 0.0015 | 0.9985 | 95.45 |
| 19,671 | 0.0006 | 0.9994 | 95.31 |
| 162,328 | 0.0056 | 0.9944 | 95.25 |
| 184,183 | 0.0063 | 0.9937 | 94.72 |
| 146,042 | 0.0050 | 0.9950 | 94.12 |
| 234,530 | 0.0081 | 0.9919 | 93.65 |
| 182,368 | 0.0071 | 0.9929 | 92.89 |
|  |  |  |  |

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 23,581,373 | 72,265 | 0.0031 | 0.9969 | 92.23 |
| 40.5 | 20,843,299 | 78,268 | 0.0038 | 0.9962 | 91.94 |
| 41.5 | 21,047,409 | 196,646 | 0.0093 | 0.9907 | 91.60 |
| 42.5 | 20,776,799 | 65,227 | 0.0031 | 0.9969 | 90.74 |
| 43.5 | 19,613,891 | 120,394 | 0.0061 | 0.9939 | 90.46 |
| 44.5 | 19,566,860 | 165,725 | 0.0085 | 0.9915 | 89.90 |
| 45.5 | 16,965,823 | 177,875 | 0.0105 | 0.9895 | 89.14 |
| 46.5 | 15,606,005 | 240,054 | 0.0154 | 0.9846 | 88.21 |
| 47.5 | 11,256,018 | 270,936 | 0.0241 | 0.9759 | 86.85 |
| 48.5 | 10,913,784 | 95,323 | 0.0087 | 0.9913 | 84.76 |
| 49.5 | 9,658,302 | 108,769 | 0.0113 | 0.9887 | 84.02 |
| 50.5 | 7,527,023 | 31,486 | 0.0042 | 0.9958 | 83.07 |
| 51.5 | 6,649,405 | 39,906 | 0.0060 | 0.9940 | 82.73 |
| 52.5 | 6,345,811 | 36,062 | 0.0057 | 0.9943 | 82.23 |
| 53.5 | 5,857,545 | 11,158 | 0.0019 | 0.9981 | 81.76 |
| 54.5 | 3,973,341 | 13,788 | 0.0035 | 0.9965 | 81.61 |
| 55.5 | 3,781,986 | 259,465 | 0.0686 | 0.9314 | 81.32 |
| 56.5 | 3,473,478 | 12,002 | 0.0035 | 0.9965 | 75.74 |
| 57.5 | 3,302,617 | 28,528 | 0.0086 | 0.9914 | 75.48 |
| 58.5 | 3,261,016 | 3,712 | 0.0011 | 0.9989 | 74.83 |
| 59.5 | 2,922,139 | 5,178 | 0.0018 | 0.9982 | 74.74 |
| 60.5 | 2,750,078 | 42,706 | 0.0155 | 0.9845 | 74.61 |
| 61.5 | 2,701,127 | 45 | 0.0000 | 1.0000 | 73.45 |
| 62.5 | 2,433,690 | 260 | 0.0001 | 0.9999 | 73.45 |
| 63.5 | 1,344,780 | 743 | 0.0006 | 0.9994 | 73.44 |
| 64.5 | 1,344,069 | 5,172 | 0.0038 | 0.9962 | 73.40 |
| 65.5 | 573,156 | 1,209 | 0.0021 | 0.9979 | 73.12 |
| 66.5 | 389,464 | 22,553 | 0.0579 | 0.9421 | 72.97 |
| 67.5 | 342,745 | 476 | 0.0014 | 0.9986 | 68.74 |
| 68.5 | 304,704 | 2,420 | 0.0079 | 0.9921 | 68.65 |
| 69.5 | 259,631 | 2,277 | 0.0088 | 0.9912 | 68.10 |
| 70.5 | 258,485 |  | 0.0000 | 1.0000 | 67.50 |
| 71.5 | 251,957 | 620 | 0.0025 | 0.9975 | 67.50 |
| 72.5 | 251,454 | 76 | 0.0003 | 0.9997 | 67.34 |
| 73.5 | 253,924 | 645 | 0.0025 | 0.9975 | 67.32 |
| 74.5 | 241,247 |  | 0.0000 | 1.0000 | 67.15 |
| 75.5 | 242,544 | 22,366 | 0.0922 | 0.9078 | 67.15 |
| 76.5 | 218,400 | 0 | 0.0000 | 1.0000 | 60.95 |
| 77.5 | 215,106 |  | 0.0000 | 1.0000 | 60.95 |
| 78.5 | 207,201 |  | 0.0000 | 1.0000 | 60.95 |


| PLACEMENT BAND 1915-2019 |  |  | EXPERIENCE BAND 1964-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 207,201 | 9,698 | 0.0468 | 0.9532 | 60.95 |
| 80.5 | 198,082 | 4,895 | 0.0247 | 0.9753 | 58.10 |
| 81.5 | 193,187 | 44,818 | 0.2320 | 0.7680 | 56.67 |
| 82.5 | 148,369 | 2,165 | 0.0146 | 0.9854 | 43.52 |
| 83.5 | 146,203 | 570 | 0.0039 | 0.9961 | 42.88 |
| 84.5 | 150,664 | 25,642 | 0.1702 | 0.8298 | 42.72 |
| 85.5 | 125,022 | 0 | 0.0000 | 1.0000 | 35.45 |
| 86.5 | 125,022 | 956 | 0.0076 | 0.9924 | 35.45 |
| 87.5 | 124,066 |  | 0.0000 | 1.0000 | 35.18 |
| 88.5 | 118,366 | 164 | 0.0014 | 0.9986 | 35.18 |
| 89.5 | 118,202 |  | 0.0000 | 1.0000 | 35.13 |
| 90.5 | 118,131 |  | 0.0000 | 1.0000 | 35.13 |
| 91.5 | 118,131 |  | 0.0000 | 1.0000 | 35.13 |
| 92.5 | 118,120 | 67,848 | 0.5744 | 0.4256 | 35.13 |
| 93.5 | 50,272 |  | 0.0000 | 1.0000 | 14.95 |
| 94.5 | 50,272 | 26,529 | 0.5277 | 0.4723 | 14.95 |
| 95.5 | 17,215 | 4,982 | 0.2894 | 0.7106 | 7.06 |
| 96.5 | 12,233 |  | 0.0000 | 1.0000 | 5.02 |
| 97.5 | 11,516 |  | 0.0000 | 1.0000 | 5.02 |
| 98.5 | 11,516 |  | 0.0000 | 1.0000 | 5.02 |
| 99.5 | 85 |  | 0.0000 | 1.0000 | 5.02 |
| 100.5 | 85 |  | 0.0000 | 1.0000 | 5.02 |
| 101.5 | 85 |  | 0.0000 | 1.0000 | 5.02 |
| 102.5 | 85 | 11 | 0.1313 | 0.8687 | 5.02 |
| 103.5 |  |  |  |  | 4.36 |

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1916-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |


| 0.0 | $85,307,650$ |
| ---: | ---: |
| 0.5 | $81,316,691$ |
| 1.5 | $71,022,076$ |
| 2.5 | $57,757,521$ |
| 3.5 | $53,690,088$ |
| 4.5 | $51,438,024$ |
| 5.5 | $43,619,780$ |
| 6.5 | $36,093,155$ |
| 7.5 | $34,308,921$ |
| 8.5 | $31,029,375$ |
| 9.5 | $28,261,146$ |
| 10.5 | $12,697,769$ |
| 11.5 | $12,715,107$ |
| 12.5 | $10,573,324$ |
| 13.5 | $10,080,325$ |
| 14.5 | $9,699,912$ |
| 15.5 | $8,899,039$ |
| 16.5 | $8,139,561$ |
| 17.5 | $8,150,278$ |
| 18.5 | $11,264,833$ |
| 19.5 | $13,329,235$ |
| 20.5 | $16,005,480$ |
| 21.5 | $16,143,004$ |
| 22.5 | $16,193,485$ |
| 23.5 | $17,411,557$ |
| 24.5 | $17,426,916$ |
| 25.5 | $19,744,156$ |
| 26.5 | $19,905,519$ |
| 27.5 | $21,214,464$ |
| 28.5 | $21,568,604$ |
| 29.5 | $22,851,437$ |
| 30.5 | $25,362,053$ |
| 31.5 | $26,275,405$ |
| 32.5 | $26,474,472$ |
| 33.5 | $25,930,872$ |
| 34.5 | $25,192,658$ |
| 35.5 | $25,382,138$ |
| 36.5 | $25,267,699$ |
| 37.5 | $25,222,651$ |
| 38.5 | $21,857,474$ |
|  |  |
| 20 |  |

## RETIREMENTS DURING AGE INTERVAL

EXPERIENCE BAND 2000-2019

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1916-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 20,228,493 | 53,253 | 0.0026 | 0.9974 | 92.74 |
| 40.5 | 17,681,729 | 78,268 | 0.0044 | 0.9956 | 92.50 |
| 41.5 | 17,613,614 | 143,813 | 0.0082 | 0.9918 | 92.09 |
| 42.5 | 17,653,974 | 13,967 | 0.0008 | 0.9992 | 91.34 |
| 43.5 | 17,422,789 | 78,839 | 0.0045 | 0.9955 | 91.27 |
| 44.5 | 17,374,497 | 60,011 | 0.0035 | 0.9965 | 90.85 |
| 45.5 | 15,664,438 | 158,792 | 0.0101 | 0.9899 | 90.54 |
| 46.5 | 14,664,725 | 80,377 | 0.0055 | 0.9945 | 89.62 |
| 47.5 | 10,398,422 | 102,564 | 0.0099 | 0.9901 | 89.13 |
| 48.5 | 10,216,781 | 1,563 | 0.0002 | 0.9998 | 88.25 |
| 49.5 | 9,185,217 | 48,361 | 0.0053 | 0.9947 | 88.24 |
| 50.5 | 7,114,346 | 4,490 | 0.0006 | 0.9994 | 87.77 |
| 51.5 | 6,272,257 | 1,714 | 0.0003 | 0.9997 | 87.72 |
| 52.5 | 6,006,856 | 3,332 | 0.0006 | 0.9994 | 87.69 |
| 53.5 | 5,551,319 | 10,883 | 0.0020 | 0.9980 | 87.65 |
| 54.5 | 3,681,524 | 947 | 0.0003 | 0.9997 | 87.47 |
| 55.5 | 3,503,428 | 259,199 | 0.0740 | 0.9260 | 87.45 |
| 56.5 | 3,223,193 | 12,002 | 0.0037 | 0.9963 | 80.98 |
| 57.5 | 3,068,450 | 28,439 | 0.0093 | 0.9907 | 80.68 |
| 58.5 | 3,034,571 | 3,712 | 0.0012 | 0.9988 | 79.93 |
| 59.5 | 2,695,694 | 3,598 | 0.0013 | 0.9987 | 79.83 |
| 60.5 | 2,525,213 | 42,706 | 0.0169 | 0.9831 | 79.73 |
| 61.5 | 2,476,262 |  | 0.0000 | 1.0000 | 78.38 |
| 62.5 | 2,208,870 | 260 | 0.0001 | 0.9999 | 78.38 |
| 63.5 | 1,120,550 | 479 | 0.0004 | 0.9996 | 78.37 |
| 64.5 | 1,120,102 | 5,172 | 0.0046 | 0.9954 | 78.34 |
| 65.5 | 349,190 | 1,209 | 0.0035 | 0.9965 | 77.97 |
| 66.5 | 165,497 | 22,553 | 0.1363 | 0.8637 | 77.70 |
| 67.5 | 118,779 | 476 | 0.0040 | 0.9960 | 67.12 |
| 68.5 | 86,809 | 2,420 | 0.0279 | 0.9721 | 66.85 |
| 69.5 | 62,949 | 2,044 | 0.0325 | 0.9675 | 64.98 |
| 70.5 | 73,319 |  | 0.0000 | 1.0000 | 62.87 |
| 71.5 | 68,992 | 620 | 0.0090 | 0.9910 | 62.87 |
| 72.5 | 113,574 | 76 | 0.0007 | 0.9993 | 62.31 |
| 73.5 | 116,371 | 645 | 0.0055 | 0.9945 | 62.27 |
| 74.5 | 128,039 |  | 0.0000 | 1.0000 | 61.92 |
| 75.5 | 136,597 | 22,366 | 0.1637 | 0.8363 | 61.92 |
| 76.5 | 112,454 | 0 | 0.0000 | 1.0000 | 51.78 |
| 77.5 | 109,840 |  | 0.0000 | 1.0000 | 51.78 |
| 78.5 | 101,935 |  | 0.0000 | 1.0000 | 51.78 |


| PLACEMENT BAND 1916-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 112,787 | 9,698 | 0.0860 | 0.9140 | 51.78 |
| 80.5 | 103,668 | 4,895 | 0.0472 | 0.9528 | 47.33 |
| 81.5 | 98,773 | 44,818 | 0.4538 | 0.5462 | 45.10 |
| 82.5 | 53,955 | 2,165 | 0.0401 | 0.9599 | 24.63 |
| 83.5 | 146,203 | 570 | 0.0039 | 0.9961 | 23.65 |
| 84.5 | 150,664 | 25,642 | 0.1702 | 0.8298 | 23.55 |
| 85.5 | 125,022 | 0 | 0.0000 | 1.0000 | 19.54 |
| 86.5 | 125,022 | 956 | 0.0076 | 0.9924 | 19.54 |
| 87.5 | 124,066 |  | 0.0000 | 1.0000 | 19.39 |
| 88.5 | 118,366 | 164 | 0.0014 | 0.9986 | 19.39 |
| 89.5 | 118,202 |  | 0.0000 | 1.0000 | 19.37 |
| 90.5 | 118,131 |  | 0.0000 | 1.0000 | 19.37 |
| 91.5 | 118,131 |  | 0.0000 | 1.0000 | 19.37 |
| 92.5 | 118,120 | 67,848 | 0.5744 | 0.4256 | 19.37 |
| 93.5 | 50,272 |  | 0.0000 | 1.0000 | 8.24 |
| 94.5 | 50,272 | 26,529 | 0.5277 | 0.4723 | 8.24 |
| 95.5 | 17,215 | 4,982 | 0.2894 | 0.7106 | 3.89 |
| 96.5 | 12,233 |  | 0.0000 | 1.0000 | 2.77 |
| 97.5 | 11,516 |  | 0.0000 | 1.0000 | 2.77 |
| 98.5 | 11,516 |  | 0.0000 | 1.0000 | 2.77 |
| 99.5 | 85 |  | 0.0000 | 1.0000 | 2.77 |
| 100.5 | 85 |  | 0.0000 | 1.0000 | 2.77 |
| 101.5 | 85 |  | 0.0000 | 1.0000 | 2.77 |
| 102.5 | 85 | 11 | 0.1313 | 0.8687 | 2.77 |
| 103.5 |  |  |  |  | 2.40 |



ORIGINAL LIFE TABLE

PLACEMENT BAND 1956-2017
EXPERIENCE BAND 1967-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 74,814,540 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 74,814,695 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 74,814,695 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 74,942,868 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 66,543,081 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 64,932,701 | 145,866 | 0.0022 | 0.9978 | 100.00 |
| 5.5 | 64,763,022 | 29,632 | 0.0005 | 0.9995 | 99.78 |
| 6.5 | 64,217,105 |  | 0.0000 | 1.0000 | 99.73 |
| 7.5 | 58,459,275 |  | 0.0000 | 1.0000 | 99.73 |
| 8.5 | 61,020,460 | 77,188 | 0.0013 | 0.9987 | 99.73 |
| 9.5 | 60,833,712 |  | 0.0000 | 1.0000 | 99.60 |
| 10.5 | 60,997,025 |  | 0.0000 | 1.0000 | 99.60 |
| 11.5 | 60,997,025 |  | 0.0000 | 1.0000 | 99.60 |
| 12.5 | 36,121,140 |  | 0.0000 | 1.0000 | 99.60 |
| 13.5 | 35,862,199 |  | 0.0000 | 1.0000 | 99.60 |
| 14.5 | 35,215,105 |  | 0.0000 | 1.0000 | 99.60 |
| 15.5 | 35,237,638 |  | 0.0000 | 1.0000 | 99.60 |
| 16.5 | 34,709,634 |  | 0.0000 | 1.0000 | 99.60 |
| 17.5 | 34,711,317 |  | 0.0000 | 1.0000 | 99.60 |
| 18.5 | 34,711,317 |  | 0.0000 | 1.0000 | 99.60 |
| 19.5 | 34,711,317 |  | 0.0000 | 1.0000 | 99.60 |
| 20.5 | 34,744,690 | 1,153 | 0.0000 | 1.0000 | 99.60 |
| 21.5 | 36,189,014 |  | 0.0000 | 1.0000 | 99.60 |
| 22.5 | 36,189,014 | 2,691 | 0.0001 | 0.9999 | 99.60 |
| 23.5 | 36,172,667 |  | 0.0000 | 1.0000 | 99.59 |
| 24.5 | 36,172,667 |  | 0.0000 | 1.0000 | 99.59 |
| 25.5 | 36,485,093 |  | 0.0000 | 1.0000 | 99.59 |
| 26.5 | 36,485,093 |  | 0.0000 | 1.0000 | 99.59 |
| 27.5 | 36,485,093 |  | 0.0000 | 1.0000 | 99.59 |
| 28.5 | 36,493,354 |  | 0.0000 | 1.0000 | 99.59 |
| 29.5 | 35,000,057 | 64,780 | 0.0019 | 0.9981 | 99.59 |
| 30.5 | 34,935,277 | 141,209 | 0.0040 | 0.9960 | 99.41 |
| 31.5 | 34,794,068 |  | 0.0000 | 1.0000 | 99.01 |
| 32.5 | 34,861,879 |  | 0.0000 | 1.0000 | 99.01 |
| 33.5 | 34,240,860 |  | 0.0000 | 1.0000 | 99.01 |
| 34.5 | 33,808,805 | 143,949 | 0.0043 | 0.9957 | 99.01 |
| 35.5 | 33,664,856 | 16,636 | 0.0005 | 0.9995 | 98.59 |
| 36.5 | 33,631,584 |  | 0.0000 | 1.0000 | 98.54 |
| 37.5 | 33,637,481 | 1,247 | 0.0000 | 1.0000 | 98.54 |
| 38.5 | 33,636,234 |  | 0.0000 | 1.0000 | 98.53 |

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ACCOUNT 357 UNDERGROUND CONDUIT
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT | NND 1956-2017 | EXPERIENCE BAND 1967-2019 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 32,979,363 |  | 0.0000 | 1.0000 | 98.53 |
| 40.5 | 4,352,209 |  | 0.0000 | 1.0000 | 98.53 |
| 41.5 | 4,352,209 |  | 0.0000 | 1.0000 | 98.53 |
| 42.5 | 4,534,603 |  | 0.0000 | 1.0000 | 98.53 |
| 43.5 | 4,534,603 |  | 0.0000 | 1.0000 | 98.53 |
| 44.5 | 4,535,018 |  | 0.0000 | 1.0000 | 98.53 |
| 45.5 | 4,529,121 | 1,064 | 0.0002 | 0.9998 | 98.53 |
| 46.5 | 4,528,057 |  | 0.0000 | 1.0000 | 98.51 |
| 47.5 | 4,362,469 |  | 0.0000 | 1.0000 | 98.51 |
| 48.5 | 4,362,469 |  | 0.0000 | 1.0000 | 98.51 |
| 49.5 | 4,362,469 |  | 0.0000 | 1.0000 | 98.51 |
| 50.5 | 4,362,469 |  | 0.0000 | 1.0000 | 98.51 |
| 51.5 | 4,362,469 |  | 0.0000 | 1.0000 | 98.51 |
| 52.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 53.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 54.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 55.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 56.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 57.5 | 3,970,548 |  | 0.0000 | 1.0000 | 98.51 |
| 58.5 | 3,960,113 | 11,129 | 0.0028 | 0.9972 | 98.51 |
| 59.5 | 3,685,959 |  | 0.0000 | 1.0000 | 98.23 |
| 60.5 | 3,685,959 |  | 0.0000 | 1.0000 | 98.23 |
| 61.5 | 91,709 |  | 0.0000 | 1.0000 | 98.23 |
| 62.5 | 91,709 |  | 0.0000 | 1.0000 | 98.23 |
| 63.5 |  |  |  |  | 98.23 |



## ACCOUNT 358 UNDERGROUND CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2019
EXPERIENCE BAND 1967-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 148,298,141 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 148,197,727 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 148,197,727 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 146,667,078 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 104,396,812 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 104,392,974 | 7,148 | 0.0001 | 0.9999 | 100.00 |
| 5.5 | 104,419,545 |  | 0.0000 | 1.0000 | 99.99 |
| 6.5 | 91,697,396 |  | 0.0000 | 1.0000 | 99.99 |
| 7.5 | 77,697,971 | 30,667 | 0.0004 | 0.9996 | 99.99 |
| 8.5 | 59,874,490 | 98,477 | 0.0016 | 0.9984 | 99.95 |
| 9.5 | 41,557,707 | 148,104 | 0.0036 | 0.9964 | 99.79 |
| 10.5 | 41,401,433 |  | 0.0000 | 1.0000 | 99.43 |
| 11.5 | 34,641,929 |  | 0.0000 | 1.0000 | 99.43 |
| 12.5 | 19,527,258 | 31,542 | 0.0016 | 0.9984 | 99.43 |
| 13.5 | 19,295,239 |  | 0.0000 | 1.0000 | 99.27 |
| 14.5 | 19,134,785 |  | 0.0000 | 1.0000 | 99.27 |
| 15.5 | 19,099,478 |  | 0.0000 | 1.0000 | 99.27 |
| 16.5 | 19,099,478 |  | 0.0000 | 1.0000 | 99.27 |
| 17.5 | 19,126,635 |  | 0.0000 | 1.0000 | 99.27 |
| 18.5 | 19,129,652 | 20,110 | 0.0011 | 0.9989 | 99.27 |
| 19.5 | 19,109,374 | 3,677 | 0.0002 | 0.9998 | 99.17 |
| 20.5 | 19,148,726 | 5 | 0.0000 | 1.0000 | 99.15 |
| 21.5 | 19,928,621 |  | 0.0000 | 1.0000 | 99.15 |
| 22.5 | 19,928,621 | 800,219 | 0.0402 | 0.9598 | 99.15 |
| 23.5 | 19,128,402 | 13,955 | 0.0007 | 0.9993 | 95.17 |
| 24.5 | 19,114,447 | 7,152 | 0.0004 | 0.9996 | 95.10 |
| 25.5 | 19,114,143 |  | 0.0000 | 1.0000 | 95.06 |
| 26.5 | 19,114,143 | 1 | 0.0000 | 1.0000 | 95.06 |
| 27.5 | 19,114,142 | 175,421 | 0.0092 | 0.9908 | 95.06 |
| 28.5 | 18,947,252 | 7 | 0.0000 | 1.0000 | 94.19 |
| 29.5 | 18,947,246 | 35,900 | 0.0019 | 0.9981 | 94.19 |
| 30.5 | 18,911,346 | 53,516 | 0.0028 | 0.9972 | 94.01 |
| 31.5 | 18,857,830 |  | 0.0000 | 1.0000 | 93.75 |
| 32.5 | 18,858,674 | 833,633 | 0.0442 | 0.9558 | 93.75 |
| 33.5 | 17,887,460 |  | 0.0000 | 1.0000 | 89.60 |
| 34.5 | 17,887,460 | 21,534 | 0.0012 | 0.9988 | 89.60 |
| 35.5 | 17,865,926 | 27,195 | 0.0015 | 0.9985 | 89.49 |
| 36.5 | 17,329,101 |  | 0.0000 | 1.0000 | 89.36 |
| 37.5 | 17,269,465 |  | 0.0000 | 1.0000 | 89.36 |
| 38.5 | 17,269,465 |  | 0.0000 | 1.0000 | 89.36 |

## ORIGINAL LIFE TABLE, CONT.

| PLACEMENT BAND 1951-2019 |  |  | EXPERIENCE BAND 1967-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 17,252,544 | 67,517 | 0.0039 | 0.9961 | 89.36 |
| 40.5 | 1,836,323 |  | 0.0000 | 1.0000 | 89.01 |
| 41.5 | 1,836,323 |  | 0.0000 | 1.0000 | 89.01 |
| 42.5 | 1,900,226 |  | 0.0000 | 1.0000 | 89.01 |
| 43.5 | 1,900,226 |  | 0.0000 | 1.0000 | 89.01 |
| 44.5 | 1,764,853 |  | 0.0000 | 1.0000 | 89.01 |
| 45.5 | 1,764,853 | 76,247 | 0.0432 | 0.9568 | 89.01 |
| 46.5 | 1,688,607 |  | 0.0000 | 1.0000 | 85.16 |
| 47.5 | 1,519,962 |  | 0.0000 | 1.0000 | 85.16 |
| 48.5 | 1,519,962 |  | 0.0000 | 1.0000 | 85.16 |
| 49.5 | 1,520,036 |  | 0.0000 | 1.0000 | 85.16 |
| 50.5 | 1,520,036 |  | 0.0000 | 1.0000 | 85.16 |
| 51.5 | 1,503,339 |  | 0.0000 | 1.0000 | 85.16 |
| 52.5 | 1,264,642 |  | 0.0000 | 1.0000 | 85.16 |
| 53.5 | 1,264,642 |  | 0.0000 | 1.0000 | 85.16 |
| 54.5 | 1,264,642 | 555,459 | 0.4392 | 0.5608 | 85.16 |
| 55.5 | 709,183 |  | 0.0000 | 1.0000 | 47.76 |
| 56.5 | 709,183 |  | 0.0000 | 1.0000 | 47.76 |
| 57.5 | 709,183 |  | 0.0000 | 1.0000 | 47.76 |
| 58.5 | 709,183 |  | 0.0000 | 1.0000 | 47.76 |
| 59.5 | 709,183 |  | 0.0000 | 1.0000 | 47.76 |
| 60.5 | 707,393 |  | 0.0000 | 1.0000 | 47.76 |
| 61.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 62.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 63.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 64.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 65.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 66.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 67.5 | 1,472 |  | 0.0000 | 1.0000 | 47.76 |
| 68.5 |  |  |  |  | 47.76 |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 130,461,095 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 130,360,681 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 130,360,681 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 128,830,032 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 86,559,766 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 86,555,928 |  | 0.0000 | 1.0000 | 100.00 |
| 5.5 | 86,593,417 |  | 0.0000 | 1.0000 | 100.00 |
| 6.5 | 73,871,268 |  | 0.0000 | 1.0000 | 100.00 |
| 7.5 | 60,106,693 |  | 0.0000 | 1.0000 | 100.00 |
| 8.5 | 40,837,114 |  | 0.0000 | 1.0000 | 100.00 |
| 9.5 | 23,141,909 |  | 0.0000 | 1.0000 | 100.00 |
| 10.5 | 23,109,951 |  | 0.0000 | 1.0000 | 100.00 |
| 11.5 | 16,350,447 |  | 0.0000 | 1.0000 | 100.00 |
| 12.5 | 1,235,775 |  | 0.0000 | 1.0000 | 100.00 |
| 13.5 | 1,181,056 |  | 0.0000 | 1.0000 | 100.00 |
| 14.5 | 1,187,148 |  | 0.0000 | 1.0000 | 100.00 |
| 15.5 | 1,133,105 |  | 0.0000 | 1.0000 | 100.00 |
| 16.5 | 1,642,773 |  | 0.0000 | 1.0000 | 100.00 |
| 17.5 | 1,726,550 |  | 0.0000 | 1.0000 | 100.00 |
| 18.5 | 1,729,567 |  | 0.0000 | 1.0000 | 100.00 |
| 19.5 | 2,536,923 |  | 0.0000 | 1.0000 | 100.00 |
| 20.5 | 17,216,274 | 5 | 0.0000 | 1.0000 | 100.00 |
| 21.5 | 17,996,169 |  | 0.0000 | 1.0000 | 100.00 |
| 22.5 | 17,996,169 | 800,219 | 0.0445 | 0.9555 | 100.00 |
| 23.5 | 17,195,950 |  | 0.0000 | 1.0000 | 95.55 |
| 24.5 | 17,324,474 | 3,770 | 0.0002 | 0.9998 | 95.55 |
| 25.5 | 17,327,552 |  | 0.0000 | 1.0000 | 95.53 |
| 26.5 | 17,327,552 | 1 | 0.0000 | 1.0000 | 95.53 |
| 27.5 | 17,487,665 | 175,421 | 0.0100 | 0.9900 | 95.53 |
| 28.5 | 17,320,775 | 7 | 0.0000 | 1.0000 | 94.57 |
| 29.5 | 17,320,769 |  | 0.0000 | 1.0000 | 94.57 |
| 30.5 | 17,320,769 |  | 0.0000 | 1.0000 | 94.57 |
| 31.5 | 17,336,621 |  | 0.0000 | 1.0000 | 94.57 |
| 32.5 | 17,636,476 | 833,633 | 0.0473 | 0.9527 | 94.57 |
| 33.5 | 16,665,261 |  | 0.0000 | 1.0000 | 90.10 |
| 34.5 | 16,665,261 |  | 0.0000 | 1.0000 | 90.10 |
| 35.5 | 16,665,261 | 27,195 | 0.0016 | 0.9984 | 90.10 |
| 36.5 | 16,128,436 |  | 0.0000 | 1.0000 | 89.96 |
| 37.5 | 16,068,800 |  | 0.0000 | 1.0000 | 89.96 |
| 38.5 | 16,068,800 |  | 0.0000 | 1.0000 | 89.96 |

## ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | NND 1951-2019 |  | EXPE | ENCE BA | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 16,051,880 | 67,517 | 0.0042 | 0.9958 | 89.96 |
| 40.5 | 637,448 |  | 0.0000 | 1.0000 | 89.58 |
| 41.5 | 1,834,925 |  | 0.0000 | 1.0000 | 89.58 |
| 42.5 | 1,898,828 |  | 0.0000 | 1.0000 | 89.58 |
| 43.5 | 1,898,828 |  | 0.0000 | 1.0000 | 89.58 |
| 44.5 | 1,763,456 |  | 0.0000 | 1.0000 | 89.58 |
| 45.5 | 1,763,456 | 76,247 | 0.0432 | 0.9568 | 89.58 |
| 46.5 | 1,687,209 |  | 0.0000 | 1.0000 | 85.71 |
| 47.5 | 1,518,564 |  | 0.0000 | 1.0000 | 85.71 |
| 48.5 | 1,519,962 |  | 0.0000 | 1.0000 | 85.71 |
| 49.5 | 1,520,036 |  | 0.0000 | 1.0000 | 85.71 |
| 50.5 | 1,520,036 |  | 0.0000 | 1.0000 | 85.71 |
| 51.5 | 1,503,339 |  | 0.0000 | 1.0000 | 85.71 |
| 52.5 | 1,264,642 |  | 0.0000 | 1.0000 | 85.71 |
| 53.5 | 1,264,642 |  | 0.0000 | 1.0000 | 85.71 |
| 54.5 | 1,264,642 | 555,459 | 0.4392 | 0.5608 | 85.71 |
| 55.5 | 709,183 |  | 0.0000 | 1.0000 | 48.06 |
| 56.5 | 709,183 |  | 0.0000 | 1.0000 | 48.06 |
| 57.5 | 709,183 |  | 0.0000 | 1.0000 | 48.06 |
| 58.5 | 709,183 |  | 0.0000 | 1.0000 | 48.06 |
| 59.5 | 709,183 |  | 0.0000 | 1.0000 | 48.06 |
| 60.5 | 707,393 |  | 0.0000 | 1.0000 | 48.06 |
| 61.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 62.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 63.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 64.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 65.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 66.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 67.5 | 1,472 |  | 0.0000 | 1.0000 | 48.06 |
| 68.5 |  |  |  |  | 48.06 |

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ACCOUNT 359 ROADS AND TRAILS
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ORIGINAL LIFE TABLE

| PLACEMENT | ND 1915-2018 |  | EXPERIENCE BAND |  | 1997-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 10,185,994 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 10,185,994 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 9,293,592 |  | 0.0000 | 1.0000 | 100.00 |
| 2.5 | 9,293,592 |  | 0.0000 | 1.0000 | 100.00 |
| 3.5 | 9,293,592 |  | 0.0000 | 1.0000 | 100.00 |
| 4.5 | 9,293,592 |  | 0.0000 | 1.0000 | 100.00 |
| 5.5 | 9,263,074 |  | 0.0000 | 1.0000 | 100.00 |
| 6.5 | 2,091,749 |  | 0.0000 | 1.0000 | 100.00 |
| 7.5 | 2,091,746 |  | 0.0000 | 1.0000 | 100.00 |
| 8.5 |  |  |  |  | 100.00 |
| 9.5 |  |  |  |  |  |
| 10.5 |  |  |  |  |  |
| 11.5 |  |  |  |  |  |
| 12.5 |  |  |  |  |  |
| 13.5 |  |  |  |  |  |
| 14.5 |  |  |  |  |  |
| 15.5 |  |  |  |  |  |
| 16.5 |  |  |  |  |  |
| 17.5 |  |  |  |  |  |
| 18.5 |  |  |  |  |  |
| 19.5 | 7,511 | 7,511 | 1.0000 |  |  |
| 20.5 |  |  |  |  |  |
| 21.5 |  |  |  |  |  |
| 22.5 |  |  |  |  |  |
| 23.5 |  |  |  |  |  |
| 24.5 |  |  |  |  |  |
| 25.5 |  |  |  |  |  |
| 26.5 | 4,133 |  | 0.0000 |  |  |
| 27.5 | 5,123 | 989 | 0.1931 |  |  |
| 28.5 | 4,133 |  | 0.0000 |  |  |
| 29.5 | 4,133 |  | 0.0000 |  |  |
| 30.5 | 4,354 |  | 0.0000 |  |  |
| 31.5 | 4,354 |  | 0.0000 |  |  |
| 32.5 | 4,354 |  | 0.0000 |  |  |
| 33.5 | 4,354 |  | 0.0000 |  |  |
| 34.5 | 4,354 |  | 0.0000 |  |  |
| 35.5 | 4,354 |  | 0.0000 |  |  |
| 36.5 | 4,354 |  | 0.0000 |  |  |
| 37.5 | 4,354 |  | 0.0000 |  |  |
| 38.5 | 4,354 | 4,354 | 1.0000 |  |  |

```
ACCOUNT 359 ROADS AND TRAILS
    ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1915-2018 |  |  | EXPERIENCE BAND 1997-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 |  |  |  |  |  |
| 40.5 |  |  |  |  |  |
| 41.5 |  |  |  |  |  |
| 42.5 |  |  |  |  |  |
| 43.5 |  |  |  |  |  |
| 44.5 |  |  |  |  |  |
| 45.5 |  |  |  |  |  |
| 46.5 |  |  |  |  |  |
| 47.5 |  |  |  |  |  |
| 48.5 |  |  |  |  |  |
| 49.5 |  |  |  |  |  |
| 50.5 |  |  |  |  |  |
| 51.5 |  |  |  |  |  |
| 52.5 |  |  |  |  |  |
| 53.5 |  |  |  |  |  |
| 54.5 |  |  |  |  |  |
| 55.5 | 336 | 336 | 1.0000 |  |  |
| 56.5 |  |  |  |  |  |
| 57.5 |  |  |  |  |  |
| 58.5 |  |  |  |  |  |
| 59.5 |  |  |  |  |  |
| 60.5 |  |  |  |  |  |
| 61.5 |  |  |  |  |  |
| 62.5 |  |  |  |  |  |
| 63.5 |  |  |  |  |  |
| 64.5 |  |  |  |  |  |
| 65.5 |  |  |  |  |  |
| 66.5 | 504 | 504 | 1.0000 |  |  |
| 67.5 |  |  |  |  |  |
| 68.5 |  |  |  |  |  |
| 69.5 |  |  |  |  |  |
| 70.5 |  |  |  |  |  |
| 71.5 |  |  |  |  |  |
| 72.5 |  |  |  |  |  |
| 73.5 |  |  |  |  |  |
| 74.5 |  |  |  |  |  |
| 75.5 |  |  |  |  |  |
| 76.5 |  |  |  |  |  |
| 77.5 |  |  |  |  |  |
| 78.5 |  |  |  |  |  |

```
ACCOUNT 359 ROADS AND TRAILS
    ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1915-2018 |  | EXPERIENCE BAND 1997-2019 |  |  |  |
| :---: | ---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 |  |  |  |  |  |
| 80.5 | 390 | 390 | 1.0000 |  |  |
| 81.5 | 16 | 16 | 1.0000 |  |  |
| 82.5 |  |  |  |  |  |



ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1899-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 65,152,645 | 48,721 | 0.0007 | 0.9993 | 100.00 |
| 0.5 | 63,749,180 |  | 0.0000 | 1.0000 | 99.93 |
| 1.5 | 62,875,559 | 5,319 | 0.0001 | 0.9999 | 99.93 |
| 2.5 | 61,684,561 | 25,130 | 0.0004 | 0.9996 | 99.92 |
| 3.5 | 61,311,088 | 16,752 | 0.0003 | 0.9997 | 99.88 |
| 4.5 | 61,798,244 | 44,762 | 0.0007 | 0.9993 | 99.85 |
| 5.5 | 61,048,264 | 57,708 | 0.0009 | 0.9991 | 99.78 |
| 6.5 | 60,298,493 | 44,643 | 0.0007 | 0.9993 | 99.68 |
| 7.5 | 56,120,049 | 77,902 | 0.0014 | 0.9986 | 99.61 |
| 8.5 | 55,192,233 | 37,641 | 0.0007 | 0.9993 | 99.47 |
| 9.5 | 55,253,712 | 60,980 | 0.0011 | 0.9989 | 99.40 |
| 10.5 | 50,969,077 | 135,651 | 0.0027 | 0.9973 | 99.29 |
| 11.5 | 50,217,846 | 310,698 | 0.0062 | 0.9938 | 99.03 |
| 12.5 | 48,634,030 | 128,969 | 0.0027 | 0.9973 | 98.42 |
| 13.5 | 44,835,487 | 14,226 | 0.0003 | 0.9997 | 98.15 |
| 14.5 | 44,004,624 | 79,744 | 0.0018 | 0.9982 | 98.12 |
| 15.5 | 43,241,695 | 26,788 | 0.0006 | 0.9994 | 97.95 |
| 16.5 | 42,633,766 | 640,309 | 0.0150 | 0.9850 | 97.88 |
| 17.5 | 41,333,813 | 229,219 | 0.0055 | 0.9945 | 96.41 |
| 18.5 | 41,005,132 | 205,366 | 0.0050 | 0.9950 | 95.88 |
| 19.5 | 40,494,225 | 65,521 | 0.0016 | 0.9984 | 95.40 |
| 20.5 | 39,450,458 | 123,012 | 0.0031 | 0.9969 | 95.25 |
| 21.5 | 39,058,500 | 56,618 | 0.0014 | 0.9986 | 94.95 |
| 22.5 | 38,776,351 | 335,238 | 0.0086 | 0.9914 | 94.81 |
| 23.5 | 37,264,969 | 73,808 | 0.0020 | 0.9980 | 93.99 |
| 24.5 | 35,632, 212 | 150,706 | 0.0042 | 0.9958 | 93.81 |
| 25.5 | 35,915,978 | 37,730 | 0.0011 | 0.9989 | 93.41 |
| 26.5 | 35,887,124 | 62,233 | 0.0017 | 0.9983 | 93.31 |
| 27.5 | 34,903,248 | 242,093 | 0.0069 | 0.9931 | 93.15 |
| 28.5 | 34,529,885 | 41,801 | 0.0012 | 0.9988 | 92.50 |
| 29.5 | 33,756,160 | 137,164 | 0.0041 | 0.9959 | 92.39 |
| 30.5 | 33,586,777 | 33,778 | 0.0010 | 0.9990 | 92.01 |
| 31.5 | 32,148,841 | 207,659 | 0.0065 | 0.9935 | 91.92 |
| 32.5 | 31,986,698 | 108,544 | 0.0034 | 0.9966 | 91.33 |
| 33.5 | 30,326,249 | 48,060 | 0.0016 | 0.9984 | 91.02 |
| 34.5 | 30,288,123 | 13,358 | 0.0004 | 0.9996 | 90.87 |
| 35.5 | 30,656,095 | 44,508 | 0.0015 | 0.9985 | 90.83 |
| 36.5 | 31,214,547 | 13,682 | 0.0004 | 0.9996 | 90.70 |
| 37.5 | 23,083,875 | 75,845 | 0.0033 | 0.9967 | 90.66 |
| 38.5 | 23,066,005 | 19,325 | 0.0008 | 0.9992 | 90.36 |


| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 23,581,763 | 44,248 | 0.0019 | 0.9981 | 90.29 |
| 40.5 | 15,985,092 | 21,517 | 0.0013 | 0.9987 | 90.12 |
| 41.5 | 15,250,188 | 46,259 | 0.0030 | 0.9970 | 90.00 |
| 42.5 | 15,056,001 | 20,574 | 0.0014 | 0.9986 | 89.73 |
| 43.5 | 14,976,521 | 17,384 | 0.0012 | 0.9988 | 89.60 |
| 44.5 | 13,973,150 | 22,896 | 0.0016 | 0.9984 | 89.50 |
| 45.5 | 13,768,409 | 12,146 | 0.0009 | 0.9991 | 89.35 |
| 46.5 | 12,548,788 | 17,247 | 0.0014 | 0.9986 | 89.27 |
| 47.5 | 9,480,100 | 18,002 | 0.0019 | 0.9981 | 89.15 |
| 48.5 | 9,234,782 | 11,347 | 0.0012 | 0.9988 | 88.98 |
| 49.5 | 8,783,692 | 50,296 | 0.0057 | 0.9943 | 88.87 |
| 50.5 | 8,701,731 | 16,102 | 0.0019 | 0.9981 | 88.36 |
| 51.5 | 7,505,241 | 851,699 | 0.1135 | 0.8865 | 88.20 |
| 52.5 | 6,382,115 | 18,232 | 0.0029 | 0.9971 | 78.19 |
| 53.5 | 6,353,868 | 35,056 | 0.0055 | 0.9945 | 77.97 |
| 54.5 | 6,162,494 | 11,358 | 0.0018 | 0.9982 | 77.54 |
| 55.5 | 6,054,674 | 43,791 | 0.0072 | 0.9928 | 77.39 |
| 56.5 | 5,937,735 | 49,292 | 0.0083 | 0.9917 | 76.83 |
| 57.5 | 5,840,777 | 18,366 | 0.0031 | 0.9969 | 76.20 |
| 58.5 | 5,597,630 | 37,613 | 0.0067 | 0.9933 | 75.96 |
| 59.5 | 5,437,854 | 108,674 | 0.0200 | 0.9800 | 75.45 |
| 60.5 | 4,352,675 | 6,522 | 0.0015 | 0.9985 | 73.94 |
| 61.5 | 4,085,760 | 11,255 | 0.0028 | 0.9972 | 73.83 |
| 62.5 | 3,883,744 | 23,982 | 0.0062 | 0.9938 | 73.62 |
| 63.5 | 3,660,195 | 29,583 | 0.0081 | 0.9919 | 73.17 |
| 64.5 | 3,370,013 | 177,312 | 0.0526 | 0.9474 | 72.58 |
| 65.5 | 3,073,752 | 30,990 | 0.0101 | 0.9899 | 68.76 |
| 66.5 | 2,919,348 | 7,809 | 0.0027 | 0.9973 | 68.07 |
| 67.5 | 2,895,190 | 5,592 | 0.0019 | 0.9981 | 67.88 |
| 68.5 | 2,877,211 | 22,228 | 0.0077 | 0.9923 | 67.75 |
| 69.5 | 2,808,982 | 3,850 | 0.0014 | 0.9986 | 67.23 |
| 70.5 | 2,783,252 | 28,700 | 0.0103 | 0.9897 | 67.14 |
| 71.5 | 2,690,039 | 63,170 | 0.0235 | 0.9765 | 66.45 |
| 72.5 | 2,644,784 | 3,988 | 0.0015 | 0.9985 | 64.89 |
| 73.5 | 2,646,468 | 35,250 | 0.0133 | 0.9867 | 64.79 |
| 74.5 | 2,544,290 | 12,796 | 0.0050 | 0.9950 | 63.92 |
| 75.5 | 2,536,869 | 5,819 | 0.0023 | 0.9977 | 63.60 |
| 76.5 | 2,555,081 | 49,220 | 0.0193 | 0.9807 | 63.46 |
| 77.5 | 2,482,629 | 14,920 | 0.0060 | 0.9940 | 62.23 |
| 78.5 | 2,440,418 | 1,158 | 0.0005 | 0.9995 | 61.86 |

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1899-2019

| AGE AT | EXPOSURES AT |
| :--- | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |

$79.5 \quad 2,440,740$
$80.5 \quad 2,429,126$
$81.5 \quad 2,401,719$
$82.5 \quad 2,394,420$
$83.5 \quad 2,392,103$
$84.5 \quad 2,337,220$
$85.5 \quad 2,310,502$
$86.5 \quad 2,308,798$
$87.5 \quad 2,240,799$
$88.5 \quad 2,223,510$
$89.5 \quad 2,210,165$
$90.5 \quad 2,170,553$
91.5 1,823,329
$92.51,714,751$
$93.5 \quad 1,601,411$
$94.5 \quad 1,253,508$
$95.5 \quad 693,316$
$96.5 \quad 570,556$
$97.5 \quad 317,790$
$98.5 \quad 262,400$
$99.5 \quad 233.971$
$100.5 \quad 154,704$
$101.5 \quad 109,821$
$102.5 \quad 98,186$
$103.5 \quad 98,186$
$104.5 \quad 98,145$
$105.5 \quad 77,080$
$106.5 \quad 68,708$
$107.5 \quad 68,061$
$108.5 \quad 68,061$
$109.5 \quad 64,384$
$110.5 \quad 63,689$
$111.5 \quad 63,689$
$112.5 \quad 63,689$
$113.5 \quad 62,332$
$114.5 \quad 62,332$
$115.5 \quad 41,605$
$116.5 \quad 38,681$
$117.5 \quad 34,103$
$118.5 \quad 34,103$
$119.5 \quad 28,258$
120.5

EXPERIENCE BAND 1964-2019

| RETIREMENTS |  | PCT SURV |  |
| :---: | :--- | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |


| 2,080 | 0.0009 | 0.9991 | 61.83 |
| ---: | :--- | :--- | :--- |
| 31,182 | 0.0128 | 0.9872 | 61.78 |
| 5,907 | 0.0025 | 0.9975 | 60.99 |
| 2,707 | 0.0011 | 0.9989 | 60.84 |
| 54,841 | 0.0229 | 0.9771 | 60.77 |
| 25,809 | 0.0110 | 0.9890 | 59.37 |
| 2,066 | 0.0009 | 0.9991 | 58.72 |
| 63,464 | 0.0275 | 0.9725 | 58.67 |
| 3,016 | 0.0013 | 0.9987 | 57.05 |
|  | 060 | 0.0002 | 0.9998 |

56.96
56.96
56.45
56.45
56.43
55.44
55.44
55.35
55.35
55.35
55.35
55.13
55.13
55.13
55.13
55.13
55.13
55.13
54.61
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duQuesne light company
ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS


ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1900-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 536,552,973 |
| 0.5 | 514,224,845 |
| 1.5 | 499,821,112 |
| 2.5 | 487,875,499 |
| 3.5 | 480,669,587 |
| 4.5 | 478,382,557 |
| 5.5 | 466,671,540 |
| 6.5 | 459,155,068 |
| 7.5 | 419,367,181 |
| 8.5 | 398,982,974 |
| 9.5 | 379,744,000 |
| 10.5 | 353,172,733 |
| 11.5 | 336,983,244 |
| 12.5 | 325,762,695 |
| 13.5 | 281,368,645 |
| 14.5 | 267,772,107 |
| 15.5 | 254,714,406 |
| 16.5 | 246,445,093 |
| 17.5 | 238,955,557 |
| 18.5 | 229,865,356 |
| 19.5 | 220,485,215 |
| 20.5 | 215,092,703 |
| 21.5 | 211,228,815 |
| 22.5 | 199,269,333 |
| 23.5 | 176,435,588 |
| 24.5 | 163,549,295 |
| 25.5 | 165,821,130 |
| 26.5 | 150,115,206 |
| 27.5 | 139,890,278 |
| 28.5 | 134,594,505 |
| 29.5 | 129,268,768 |
| 30.5 | 125,361,652 |
| 31.5 | 118,752,978 |
| 32.5 | 114,943,716 |
| 33.5 | 103,500,851 |
| 34.5 | 101,281,158 |
| 35.5 | 98,031,675 |
| 36.5 | 98,796,400 |
| 37.5 | 81,525,817 |
| 38.5 | 78,708,801 |


| RETIREMENTS |  |  | PCT SURV |
| :---: | :--- | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |


| 241,350 | 0.0004 | 0.9996 | 100.00 |
| ---: | ---: | ---: | ---: |
| $1,094,779$ | 0.0021 | 0.9979 | 99.96 |
| $1,120,686$ | 0.0022 | 0.9978 | 99.74 |
| $1,002,634$ | 0.0021 | 0.9979 | 99.52 |
| $1,502,927$ | 0.0031 | 0.9969 | 99.31 |
| $2,930,580$ | 0.0061 | 0.9939 | 99.00 |
| $4,235,747$ | 0.0091 | 0.9909 | 98.40 |
| $3,072,576$ | 0.0067 | 0.9933 | 97.50 |
| $1,797,706$ | 0.0043 | 0.9957 | 96.85 |
| $3,130,239$ | 0.0078 | 0.9922 | 96.44 |
| $3,875,245$ | 0.0102 | 0.9898 | 95.68 |
| $1,548,488$ | 0.0044 | 0.9956 | 94.70 |
| $2,740,680$ | 0.0081 | 0.9919 | 94.29 |
| $2,225,230$ | 0.0068 | 0.9932 | 93.52 |
| $2,471,766$ | 0.0088 | 0.9912 | 92.88 |
| $2,335,447$ | 0.0087 | 0.9913 | 92.07 |
| $1,414,003$ | 0.0056 | 0.9944 | 91.26 |
| $2,221,106$ | 0.0090 | 0.9910 | 90.76 |
| $5,642,157$ | 0.0236 | 0.9764 | 89.94 |
| $1,589,710$ | 0.0069 | 0.9931 | 87.82 |
| $2,421,285$ | 0.0110 | 0.9890 | 87.21 |
| $1,387,036$ | 0.0064 | 0.9936 | 86.25 |
| $2,208,774$ | 0.0105 | 0.9895 | 85.69 |
| $1,736,941$ | 0.0087 | 0.9913 | 84.80 |
| $1,679,599$ | 0.0095 | 0.9905 | 84.06 |
| 813,644 | 0.0050 | 0.9950 | 83.26 |
| $1,572,733$ | 0.0095 | 0.9905 | 82.84 |
| 895,184 | 0.0060 | 0.9940 | 82.06 |
| $1,022,960$ | 0.0073 | 0.9927 | 81.57 |
| 620,871 | 0.0046 | 0.9954 | 80.97 |
| $1,624,141$ | 0.0048 | 0.9952 | 80.60 |
| $1,425,482$ | 0.0114 | 0.9886 | 80.21 |
| $1,221,734$ | 0.0103 | 0.9897 | 79.30 |
| 810,437 | 0.0071 | 0.9929 | 78.48 |
| $1,309,988$ | 0.0127 | 0.9873 | 77.93 |
| $1,378,408$ | 0.0136 | 0.9864 | 76.94 |
| $1,111,981$ | 0.0113 | 0.9887 | 75.90 |
| $1,370,171$ | 0.0098 | 0.9902 | 75.03 |
| $1,402,864$ | 0.0178 | 0.9822 | 74.30 |
|  | 73.09 |  |  |
| 1,772 | 0.0162 | 0.9838 |  |
| 1,9 |  |  |  |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 77,293,210 | 1,192,350 | 0.0154 | 0.9846 | 71.79 |
| 40.5 | 72,067,981 | 696,973 | 0.0097 | 0.9903 | 70.68 |
| 41.5 | 67,314,685 | 1,140,450 | 0.0169 | 0.9831 | 70.00 |
| 42.5 | 65,334,458 | 1,508,498 | 0.0231 | 0.9769 | 68.81 |
| 43.5 | 62,434,056 | 795,219 | 0.0127 | 0.9873 | 67.22 |
| 44.5 | 56,444,765 | 1,408,187 | 0.0249 | 0.9751 | 66.37 |
| 45.5 | 53,711,451 | 507,349 | 0.0094 | 0.9906 | 64.71 |
| 46.5 | 49,817,055 | 910,330 | 0.0183 | 0.9817 | 64.10 |
| 47.5 | 40,675,928 | 466,873 | 0.0115 | 0.9885 | 62.93 |
| 48.5 | 39,628,876 | 836,348 | 0.0211 | 0.9789 | 62.21 |
| 49.5 | 35,989,299 | 511,420 | 0.0142 | 0.9858 | 60.89 |
| 50.5 | 34,507,423 | 724,727 | 0.0210 | 0.9790 | 60.03 |
| 51.5 | 32,275,131 | 2,760,284 | 0.0855 | 0.9145 | 58.77 |
| 52.5 | 28,253,150 | 1,033,968 | 0.0366 | 0.9634 | 53.74 |
| 53.5 | 26,302,147 | 788,969 | 0.0300 | 0.9700 | 51.78 |
| 54.5 | 25,259,081 | 571,246 | 0.0226 | 0.9774 | 50.22 |
| 55.5 | 23,848,299 | 572,711 | 0.0240 | 0.9760 | 49.09 |
| 56.5 | 22,801,872 | 466,489 | 0.0205 | 0.9795 | 47.91 |
| 57.5 | 22,143,939 | 273,573 | 0.0124 | 0.9876 | 46.93 |
| 58.5 | 20,685,206 | 423,859 | 0.0205 | 0.9795 | 46.35 |
| 59.5 | 19,783,647 | 597,221 | 0.0302 | 0.9698 | 45.40 |
| 60.5 | 17,525,662 | 328,380 | 0.0187 | 0.9813 | 44.03 |
| 61.5 | 16,404,558 | 302,035 | 0.0184 | 0.9816 | 43.20 |
| 62.5 | 14,934,706 | 283,612 | 0.0190 | 0.9810 | 42.41 |
| 63.5 | 13,644,139 | 218,633 | 0.0160 | 0.9840 | 41.60 |
| 64.5 | 11,588,309 | 180,637 | 0.0156 | 0.9844 | 40.94 |
| 65.5 | 11,133,518 | 339,573 | 0.0305 | 0.9695 | 40.30 |
| 66.5 | 10,145,052 | 132,042 | 0.0130 | 0.9870 | 39.07 |
| 67.5 | 9,552,897 | 130,047 | 0.0136 | 0.9864 | 38.56 |
| 68.5 | 9,106,311 | 361,360 | 0.0397 | 0.9603 | 38.03 |
| 69.5 | 7,851,990 | 245,023 | 0.0312 | 0.9688 | 36.53 |
| 70.5 | 7,258,022 | 201,183 | 0.0277 | 0.9723 | 35.39 |
| 71.5 | 6,853,586 | 105,770 | 0.0154 | 0.9846 | 34.40 |
| 72.5 | 6,738,416 | 265,024 | 0.0393 | 0.9607 | 33.87 |
| 73.5 | 6,471,809 | 117,757 | 0.0182 | 0.9818 | 32.54 |
| 74.5 | 6,319,197 | 73,854 | 0.0117 | 0.9883 | 31.95 |
| 75.5 | 6,252,819 | 79,964 | 0.0128 | 0.9872 | 31.58 |
| 76.5 | 6,138,577 | 102,026 | 0.0166 | 0.9834 | 31.17 |
| 77.5 | 5,757,972 | 126,687 | 0.0220 | 0.9780 | 30.65 |
| 78.5 | 5,412,408 | 81,218 | 0.0150 | 0.9850 | 29.98 |

PLACEMENT BAND 1900-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |
| :---: | :--- | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE |
| INTERVAL | AGE INTERVAL | INTERVAL |


| 79.5 | 5,302,740 | 140,132 | 0.0264 | 0.9736 | 29.53 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 80.5 | 5,161,286 | 218,932 | 0.0424 | 0.9576 | 28.75 |
| 81.5 | 4,930,525 | 92,817 | 0.0188 | 0.9812 | 27.53 |
| 82.5 | 4,811,418 | 147,502 | 0.0307 | 0.9693 | 27.01 |
| 83.5 | 4,617,150 | 400,780 | 0.0868 | 0.9132 | 26.18 |
| 84.5 | 4,186,336 | 121,593 | 0.0290 | 0.9710 | 23.91 |
| 85.5 | 3,971,163 | 44,811 | 0.0113 | 0.9887 | 23.22 |
| 86.5 | 3,916,174 | 121,196 | 0.0309 | 0.9691 | 22.95 |
| 87.5 | 3,792,542 | 31,430 | 0.0083 | 0.9917 | 22.24 |
| 88.5 | 3,749,956 | 31,669 | 0.0084 | 0.9916 | 22.06 |
| 89.5 | 3,373,314 | 139,525 | 0.0414 | 0.9586 | 21.87 |
| 90.5 | 3,129,311 | 67,447 | 0.0216 | 0.9784 | 20.97 |
| 91.5 | 2,791,163 | 34,825 | 0.0125 | 0.9875 | 20.52 |
| 92.5 | 2,387,340 | 7,133 | 0.0030 | 0.9970 | 20.26 |
| 93.5 | 1,967,119 | 57,784 | 0.0294 | 0.9706 | 20.20 |
| 94.5 | 1,392,736 | 3,163 | 0.0023 | 0.9977 | 19.61 |
| 95.5 | 417,510 | 309 | 0.0007 | 0.9993 | 19.56 |
| 96.5 | 379,874 | 7,103 | 0.0187 | 0.9813 | 19.55 |
| 97.5 | 225,941 | 191 | 0.0008 | 0.9992 | 19.18 |
| 98.5 | 177,659 | 2,660 | 0.0150 | 0.9850 | 19.17 |
| 99.5 | 64,531 |  | 0.0000 | 1.0000 | 18.88 |
| 100.5 | 56,722 | 17 | 0.0003 | 0.9997 | 18.88 |
| 101.5 | 11,083 |  | 0.0000 | 1.0000 | 18.87 |
| 102.5 | 4,588 |  | 0.0000 | 1.0000 | 18.87 |
| 103.5 | 3,316 |  | 0.0000 | 1.0000 | 18.87 |
| 104.5 | 3,085 |  | 0.0000 | 1.0000 | 18.87 |
| 105.5 | 2,295 |  | 0.0000 | 1.0000 | 18.87 |
| 106.5 | 2,123 |  | 0.0000 | 1.0000 | 18.87 |
| 107.5 | 2,123 |  | 0.0000 | 1.0000 | 18.87 |
| 108.5 | 1,764 |  | 0.0000 | 1.0000 | 18.87 |
| 109.5 | 1,764 |  | 0.0000 | 1.0000 | 18.87 |
| 110.5 | 1,764 |  | 0.0000 | 1.0000 | 18.87 |
| 111.5 | 1,764 |  | 0.0000 | 1.0000 | 18.87 |
| 112.5 | 1,764 |  | 0.0000 | 1.0000 | 18.87 |
| 113.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 114.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 115.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 116.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 117.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 118.5 | 1,695 |  | 0.0000 | 1.0000 | 18.87 |
| 119.5 |  |  |  |  | 18.87 |

ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1900-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 304,394,691 |
| 0.5 | 285,724,040 |
| 1.5 | 276,021,212 |
| 2.5 | 272,942,812 |
| 3.5 | 280,476,496 |
| 4.5 | 288,392,744 |
| 5.5 | 280,664,350 |
| 6.5 | 276,174,158 |
| 7.5 | 242,406,717 |
| 8.5 | 225,609,318 |
| 9.5 | 212,897,854 |
| 10.5 | 190,206,353 |
| 11.5 | 179,742,534 |
| 12.5 | 174,258,283 |
| 13.5 | 137,536,808 |
| 14.5 | 126,146,841 |
| 15.5 | 117,720,584 |
| 16.5 | 112,145,022 |
| 17.5 | 132,488,635 |
| 18.5 | 125,125,163 |
| 19.5 | 118,880,868 |
| 20.5 | 130,274,007 |
| 21.5 | 132,355,863 |
| 22.5 | 122,628,398 |
| 23.5 | 102,532,608 |
| 24.5 | 98,137,727 |
| 25.5 | 102,354,082 |
| 26.5 | 91,456,736 |
| 27.5 | 95,977,551 |
| 28.5 | 91,586,224 |
| 29.5 | 90,201,283 |
| 30.5 | 87,941,352 |
| 31.5 | 84,660,337 |
| 32.5 | 84,145,205 |
| 33.5 | 73,583,707 |
| 34.5 | 71,830,716 |
| 35.5 | 68,936,750 |
| 36.5 | 67,561,182 |
| 37.5 | 49,942,656 |
| 38.5 | 48,779,171 |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :---: |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 59,558 | 0.0002 | 0.9998 | 100.00 |
| ---: | ---: | ---: | ---: |
| 846,963 | 0.0030 | 0.9970 | 99.98 |
| 726,426 | 0.0026 | 0.9974 | 99.68 |
| 445,371 | 0.0016 | 0.9984 | 99.42 |
| 511,767 | 0.0018 | 0.9982 | 99.26 |
| $1,155,268$ | 0.0040 | 0.9960 | 99.08 |
| $2,905,110$ | 0.0104 | 0.9896 | 98.68 |
| $1,575,054$ | 0.0057 | 0.9943 | 97.66 |
| 364,610 | 0.0015 | 0.9985 | 97.10 |
| $1,909,403$ | 0.0085 | 0.9915 | 96.96 |
| $1,500,894$ | 0.0070 | 0.9930 | 96.14 |
| 541,741 | 0.0028 | 0.9972 | 95.46 |
| $1,312,606$ | 0.0073 | 0.9927 | 95.19 |
| $1,037,863$ | 0.0060 | 0.9940 | 94.49 |
| $1,267,300$ | 0.0092 | 0.9908 | 93.93 |
| $1,250,472$ | 0.0099 | 0.9901 | 93.06 |
| 562,102 | 0.0048 | 0.9952 | 92.14 |
| 972,649 | 0.0087 | 0.9913 | 91.70 |
| $4,217,965$ | 0.0318 | 0.9682 | 90.91 |
| 800,951 | 0.0064 | 0.9936 | 88.01 |
| $1,380,534$ | 0.0116 | 0.9884 | 87.45 |
| 708,474 | 0.0054 | 0.9946 | 86.43 |
| $1,588,915$ | 0.0120 | 0.9880 | 85.96 |
| $1,196,103$ | 0.0098 | 0.9902 | 84.93 |
| $1,204,697$ | 0.0117 | 0.9883 | 84.10 |
| 492,334 | 0.0050 | 0.9950 | 83.11 |
| $1,140,346$ | 0.0111 | 0.9889 | 82.70 |
| 416,930 | 0.0046 | 0.9954 | 81.78 |
| 749,165 | 0.0078 | 0.9922 | 81.40 |
| 403,170 | 0.0044 | 0.9956 | 80.77 |
| 366,382 | 0.0041 | 0.9959 | 80.41 |
| 889,787 | 0.0101 | 0.9899 | 80.09 |
| 995,106 | 0.0118 | 0.9882 | 79.28 |
| 575,699 | 0.0068 | 0.9932 | 78.34 |
| 921,248 | 0.0125 | 0.9875 | 77.81 |
| $1,090,805$ | 0.0152 | 0.9848 | 76.83 |
| 823,529 | 0.0119 | 0.9881 | 75.67 |
| 533,631 | 0.0079 | 0.9921 | 74.76 |
| 702,612 | 0.0202 | 0.9798 | 74.17 |
| 1,663 | 0.0144 | 0.9856 | 72.68 |
| 1,00 |  |  |  |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 47,409,402 | 668,857 | 0.0141 | 0.9859 | 71.63 |
| 40.5 | 46,239,726 | 218,958 | 0.0047 | 0.9953 | 70.62 |
| 41.5 | 42,208,833 | 807,773 | 0.0191 | 0.9809 | 70.28 |
| 42.5 | 41,896,353 | 1,226,758 | 0.0293 | 0.9707 | 68.94 |
| 43.5 | 40,428,747 | 645,830 | 0.0160 | 0.9840 | 66.92 |
| 44.5 | 37,685,927 | 1,035,720 | 0.0275 | 0.9725 | 65.85 |
| 45.5 | 36,141,426 | 265,377 | 0.0073 | 0.9927 | 64.04 |
| 46.5 | 33,546,562 | 694,702 | 0.0207 | 0.9793 | 63.57 |
| 47.5 | 25,290,876 | 277,875 | 0.0110 | 0.9890 | 62.25 |
| 48.5 | 24,937,434 | 553,715 | 0.0222 | 0.9778 | 61.57 |
| 49.5 | 22,708,657 | 341,748 | 0.0150 | 0.9850 | 60.20 |
| 50.5 | 21,835,955 | 559,467 | 0.0256 | 0.9744 | 59.30 |
| 51.5 | 20,123,752 | 652,783 | 0.0324 | 0.9676 | 57.78 |
| 52.5 | 18,284,983 | 997,952 | 0.0546 | 0.9454 | 55.90 |
| 53.5 | 16,413,505 | 656,207 | 0.0400 | 0.9600 | 52.85 |
| 54.5 | 15,825,169 | 434,252 | 0.0274 | 0.9726 | 50.74 |
| 55.5 | 14,631,024 | 492,207 | 0.0336 | 0.9664 | 49.35 |
| 56.5 | 13,802,090 | 362,226 | 0.0262 | 0.9738 | 47.69 |
| 57.5 | 13,790,690 | 139,707 | 0.0101 | 0.9899 | 46.44 |
| 58.5 | 12,849,954 | 300,776 | 0.0234 | 0.9766 | 45.97 |
| 59.5 | 12,113,203 | 320,207 | 0.0264 | 0.9736 | 44.89 |
| 60.5 | 10,185,048 | 115,724 | 0.0114 | 0.9886 | 43.70 |
| 61.5 | 9,458,867 | 182,111 | 0.0193 | 0.9807 | 43.21 |
| 62.5 | 8,196,123 | 228,926 | 0.0279 | 0.9721 | 42.37 |
| 63.5 | 7,000,736 | 136,395 | 0.0195 | 0.9805 | 41.19 |
| 64.5 | 5,052,687 | 91,939 | 0.0182 | 0.9818 | 40.39 |
| 65.5 | 4,691,121 | 94,216 | 0.0201 | 0.9799 | 39.65 |
| 66.5 | 3,969,141 | 64,241 | 0.0162 | 0.9838 | 38.86 |
| 67.5 | 3,504,697 | 50,007 | 0.0143 | 0.9857 | 38.23 |
| 68.5 | 3,281,773 | 322,731 | 0.0983 | 0.9017 | 37.68 |
| 69.5 | 2,627,772 | 82,963 | 0.0316 | 0.9684 | 33.98 |
| 70.5 | 2,447,733 | 90,910 | 0.0371 | 0.9629 | 32.90 |
| 71.5 | 2,683,064 | 52,750 | 0.0197 | 0.9803 | 31.68 |
| 72.5 | 3,108,029 | 141,276 | 0.0455 | 0.9545 | 31.06 |
| 73.5 | 3,799,430 | 89,262 | 0.0235 | 0.9765 | 29.65 |
| 74.5 | 4,303,627 | 55,506 | 0.0129 | 0.9871 | 28.95 |
| 75.5 | 5,412,871 | 57,086 | 0.0105 | 0.9895 | 28.58 |
| 76.5 | 5,422,620 | 95,254 | 0.0176 | 0.9824 | 28.28 |
| 77.5 | 5,286,890 | 119,795 | 0.0227 | 0.9773 | 27.78 |
| 78.5 | 5,066,047 | 75,397 | 0.0149 | 0.9851 | 27.15 |

PLACEMENT BAND 1900-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 5,220,587 | 140,047 | 0.0268 | 0.9732 | 26.75 |
| 80.5 | 5,092,809 | 217,564 | 0.0427 | 0.9573 | 26.03 |
| 81.5 | 4,907,485 | 90,097 | 0.0184 | 0.9816 | 24.92 |
| 82.5 | 4,797,204 | 147,378 | 0.0307 | 0.9693 | 24.46 |
| 83.5 | 4,604,267 | 399,852 | 0.0868 | 0.9132 | 23.71 |
| 84.5 | 4,174,618 | 121,593 | 0.0291 | 0.9709 | 21.65 |
| 85.5 | 3,960,254 | 44,585 | 0.0113 | 0.9887 | 21.02 |
| 86.5 | 3,912,343 | 119,649 | 0.0306 | 0.9694 | 20.78 |
| 87.5 | 3,790,422 | 31,430 | 0.0083 | 0.9917 | 20.15 |
| 88.5 | 3,748,195 | 31,669 | 0.0084 | 0.9916 | 19.98 |
| 89.5 | 3,371,553 | 139,525 | 0.0414 | 0.9586 | 19.81 |
| 90.5 | 3,127,551 | 67,447 | 0.0216 | 0.9784 | 18.99 |
| 91.5 | 2,789,402 | 34,825 | 0.0125 | 0.9875 | 18.58 |
| 92.5 | 2,385,580 | 7,133 | 0.0030 | 0.9970 | 18.35 |
| 93.5 | 1,965,424 | 57,784 | 0.0294 | 0.9706 | 18.29 |
| 94.5 | 1,391,041 | 3,163 | 0.0023 | 0.9977 | 17.76 |
| 95.5 | 415,814 | 309 | 0.0007 | 0.9993 | 17.72 |
| 96.5 | 378,179 | 7,103 | 0.0188 | 0.9812 | 17.70 |
| 97.5 | 224,246 | 191 | 0.0009 | 0.9991 | 17.37 |
| 98.5 | 175,964 | 2,660 | 0.0151 | 0.9849 | 17.36 |
| 99.5 | 64,531 |  | 0.0000 | 1.0000 | 17.09 |
| 100.5 | 56,722 | 17 | 0.0003 | 0.9997 | 17.09 |
| 101.5 | 11,083 |  | 0.0000 | 1.0000 | 17.09 |
| 102.5 | 4,588 |  | 0.0000 | 1.0000 | 17.09 |
| 103.5 | 3,316 |  | 0.0000 | 1.0000 | 17.09 |
| 104.5 | 3,085 |  | 0.0000 | 1.0000 | 17.09 |
| 105.5 | 2,295 |  | 0.0000 | 1.0000 | 17.09 |
| 106.5 | 2,123 |  | 0.0000 | 1.0000 | 17.09 |
| 107.5 | 2,123 |  | 0.0000 | 1.0000 | 17.09 |
| 108.5 | 1,764 |  | 0.0000 | 1.0000 | 17.09 |
| 109.5 | 1,764 |  | 0.0000 | 1.0000 | 17.09 |
| 110.5 | 1,764 |  | 0.0000 | 1.0000 | 17.09 |
| 111.5 | 1,764 |  | 0.0000 | 1.0000 | 17.09 |
| 112.5 | 1,764 |  | 0.0000 | 1.0000 | 17.09 |
| 113.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 114.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 115.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 116.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 117.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 118.5 | 1,695 |  | 0.0000 | 1.0000 | 17.09 |
| 119.5 |  |  |  |  | 17.09 |

DUQUESNE LIGHT COMPANY
ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION


ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

ORIGINAL LIFE TABLE

PLACEMENT BAND 1915-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 53,815,639 | 85,275 | 0.0016 | 0.9984 | 100.00 |
| 0.5 | 53,182,427 | 265,478 | 0.0050 | 0.9950 | 99.84 |
| 1.5 | 53,093,187 | 334,806 | 0.0063 | 0.9937 | 99.34 |
| 2.5 | 51,993,066 | 217,204 | 0.0042 | 0.9958 | 98.72 |
| 3.5 | 51,007,470 | 520,913 | 0.0102 | 0.9898 | 98.30 |
| 4.5 | 49,908,393 | 336,558 | 0.0067 | 0.9933 | 97.30 |
| 5.5 | 48,445,413 | 528,918 | 0.0109 | 0.9891 | 96.64 |
| 6.5 | 48,157,399 | 328,196 | 0.0068 | 0.9932 | 95.59 |
| 7.5 | 48,046,129 | 503,180 | 0.0105 | 0.9895 | 94.94 |
| 8.5 | 47,379,421 | 442,509 | 0.0093 | 0.9907 | 93.94 |
| 9.5 | 47,102,097 | 652,878 | 0.0139 | 0.9861 | 93.07 |
| 10.5 | 44,426,490 | 401,966 | 0.0090 | 0.9910 | 91.78 |
| 11.5 | 42,863,653 | 903,200 | 0.0211 | 0.9789 | 90.95 |
| 12.5 | 41,898,608 | 796,407 | 0.0190 | 0.9810 | 89.03 |
| 13.5 | 39,611,653 | 369,694 | 0.0093 | 0.9907 | 87.34 |
| 14.5 | 38,582,056 | 613,030 | 0.0159 | 0.9841 | 86.52 |
| 15.5 | 38,152,579 | 695,285 | 0.0182 | 0.9818 | 85.15 |
| 16.5 | 37,165,705 | 580,745 | 0.0156 | 0.9844 | 83.60 |
| 17.5 | 35,204,402 | 558,265 | 0.0159 | 0.9841 | 82.29 |
| 18.5 | 33,206,549 | 457,956 | 0.0138 | 0.9862 | 80.98 |
| 19.5 | 32,710,380 | 570,404 | 0.0174 | 0.9826 | 79.87 |
| 20.5 | 31,671,666 | 353,858 | 0.0112 | 0.9888 | 78.47 |
| 21.5 | 31,144,343 | 270,248 | 0.0087 | 0.9913 | 77.60 |
| 22.5 | 30,904,278 | 605,828 | 0.0196 | 0.9804 | 76.92 |
| 23.5 | 27,602,518 | 891,111 | 0.0323 | 0.9677 | 75.42 |
| 24.5 | 24,867,410 | 265,835 | 0.0107 | 0.9893 | 72.98 |
| 25.5 | 22,501,707 | 261,362 | 0.0116 | 0.9884 | 72.20 |
| 26.5 | 22,284,846 | 286,173 | 0.0128 | 0.9872 | 71.36 |
| 27.5 | 21,860,269 | 279,711 | 0.0128 | 0.9872 | 70.45 |
| 28.5 | 21,125,722 | 201,574 | 0.0095 | 0.9905 | 69.55 |
| 29.5 | 20,742,062 | 249,191 | 0.0120 | 0.9880 | 68.88 |
| 30.5 | 19,997,819 | 504,480 | 0.0252 | 0.9748 | 68.05 |
| 31.5 | 18,826,578 | 320,087 | 0.0170 | 0.9830 | 66.34 |
| 32.5 | 18,173,017 | 555,054 | 0.0305 | 0.9695 | 65.21 |
| 33.5 | 16,496,032 | 390,651 | 0.0237 | 0.9763 | 63.22 |
| 34.5 | 15,341,265 | 222,435 | 0.0145 | 0.9855 | 61.72 |
| 35.5 | 14,382,844 | 143,936 | 0.0100 | 0.9900 | 60.83 |
| 36.5 | 13,458,781 | 337,203 | 0.0251 | 0.9749 | 60.22 |
| 37.5 | 13,015,849 | 135,238 | 0.0104 | 0.9896 | 58.71 |
| 38.5 | 12,517,967 | 66,839 | 0.0053 | 0.9947 | 58.10 |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 12,273,648 | 287,363 | 0.0234 | 0.9766 | 57.79 |
| 40.5 | 11,873,342 | 353,029 | 0.0297 | 0.9703 | 56.44 |
| 41.5 | 10,984,121 | 123,740 | 0.0113 | 0.9887 | 54.76 |
| 42.5 | 9,876,181 | 227,256 | 0.0230 | 0.9770 | 54.14 |
| 43.5 | 8,989,820 | 147,236 | 0.0164 | 0.9836 | 52.89 |
| 44.5 | 8,038,935 | 140,517 | 0.0175 | 0.9825 | 52.03 |
| 45.5 | 7,586,721 | 330,319 | 0.0435 | 0.9565 | 51.12 |
| 46.5 | 6,948,173 | 168,734 | 0.0243 | 0.9757 | 48.89 |
| 47.5 | 6,285,852 | 64,719 | 0.0103 | 0.9897 | 47.71 |
| 48.5 | 6,116,285 | 66,634 | 0.0109 | 0.9891 | 47.21 |
| 49.5 | 4,697,553 | 93,906 | 0.0200 | 0.9800 | 46.70 |
| 50.5 | 4,041,687 | 169,411 | 0.0419 | 0.9581 | 45.77 |
| 51.5 | 3,753,555 | 241,393 | 0.0643 | 0.9357 | 43.85 |
| 52.5 | 3,407,866 | 167,494 | 0.0491 | 0.9509 | 41.03 |
| 53.5 | 3,000,988 | 70,737 | 0.0236 | 0.9764 | 39.01 |
| 54.5 | 2,850,500 | 178,435 | 0.0626 | 0.9374 | 38.09 |
| 55.5 | 2,467,093 | 99,674 | 0.0404 | 0.9596 | 35.71 |
| 56.5 | 2,203,648 | 61,606 | 0.0280 | 0.9720 | 34.27 |
| 57.5 | 2,084,653 | 102,477 | 0.0492 | 0.9508 | 33.31 |
| 58.5 | 1,811,151 | 12,799 | 0.0071 | 0.9929 | 31.67 |
| 59.5 | 1,590,976 | 83,212 | 0.0523 | 0.9477 | 31.45 |
| 60.5 | 1,378,065 | 41,313 | 0.0300 | 0.9700 | 29.80 |
| 61.5 | 1,246,366 | 6,147 | 0.0049 | 0.9951 | 28.91 |
| 62.5 | 1,194,449 | 47,744 | 0.0400 | 0.9600 | 28.77 |
| 63.5 | 888,812 | 29,237 | 0.0329 | 0.9671 | 27.62 |
| 64.5 | 798,790 | 5,744 | 0.0072 | 0.9928 | 26.71 |
| 65.5 | 664,464 | 12,139 | 0.0183 | 0.9817 | 26.52 |
| 66.5 | 599,587 | 9,772 | 0.0163 | 0.9837 | 26.03 |
| 67.5 | 553,415 | 2,766 | 0.0050 | 0.9950 | 25.61 |
| 68.5 | 542,504 | 32,413 | 0.0597 | 0.9403 | 25.48 |
| 69.5 | 510,851 | 17,173 | 0.0336 | 0.9664 | 23.96 |
| 70.5 | 432,028 | 40,942 | 0.0948 | 0.9052 | 23.15 |
| 71.5 | 340,202 | 4,731 | 0.0139 | 0.9861 | 20.96 |
| 72.5 | 325,938 | 29,783 | 0.0914 | 0.9086 | 20.67 |
| 73.5 | 298,180 | 10,501 | 0.0352 | 0.9648 | 18.78 |
| 74.5 | 277,683 | 5,241 | 0.0189 | 0.9811 | 18.12 |
| 75.5 | 250,545 | 11,602 | 0.0463 | 0.9537 | 17.77 |
| 76.5 | 239,257 | 22,325 | 0.0933 | 0.9067 | 16.95 |
| 77.5 | 217,447 | 25,688 | 0.1181 | 0.8819 | 15.37 |
| 78.5 | 191,310 | 20,499 | 0.1071 | 0.8929 | 13.55 |

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ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT BAND 1915-2019 |  |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 170,813 | 2,917 | 0.0171 | 0.9829 | 12.10 |
| 80.5 | 167,895 | 6,234 | 0.0371 | 0.9629 | 11.89 |
| 81.5 | 161,662 | 2,096 | 0.0130 | 0.9870 | 11.45 |
| 82.5 | 159,575 | 8,110 | 0.0508 | 0.9492 | 11.30 |
| 83.5 | 151,497 | 26,655 | 0.1759 | 0.8241 | 10.73 |
| 84.5 | 124,842 | 10,703 | 0.0857 | 0.9143 | 8.84 |
| 85.5 | 114,065 | 10,205 | 0.0895 | 0.9105 | 8.08 |
| 86.5 | 103,777 | 48,772 | 0.4700 | 0.5300 | 7.36 |
| 87.5 | 55,005 | 19,238 | 0.3497 | 0.6503 | 3.90 |
| 88.5 | 35,767 | 11,693 | 0.3269 | 0.6731 | 2.54 |
| 89.5 | 24,074 | 12,828 | 0.5328 | 0.4672 | 1.71 |
| 90.5 | 11,246 | 8,189 | 0.7282 | 0.2718 | 0.80 |
| 91.5 | 3,057 | 1,994 | 0.6523 | 0.3477 | 0.22 |
| 92.5 | 1,063 |  | 0.0000 | 1.0000 | 0.08 |
| 93.5 | 1,063 | 19 | 0.0176 | 0.9824 | 0.08 |
| 94.5 | 1,044 |  | 0.0000 | 1.0000 | 0.07 |
| 95.5 | 1,044 |  | 0.0000 | 1.0000 | 0.07 |
| 96.5 | 1,044 | 449 | 0.4297 | 0.5703 | 0.07 |
| 97.5 | 596 | 513 | 0.8616 | 0.1384 | 0.04 |
| 98.5 | 82 |  | 0.0000 | 1.0000 | 0.01 |
| 99.5 | 82 | 82 | 1.0000 |  | 0.01 |
| 100.5 |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 362.3 STATION EQUIPMENT - PORTABLE SUBSTATIONS

DUQUESNE LIGHT COMPANY
ACCOUNT 364.11 POLES, TOWERS AND FIXTURES ORIGINAL AND SMOOTH SURVIVOR CURVES


| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 499,398,465 |
| 0.5 | 452,572,380 |
| 1.5 | 399,842,278 |
| 2.5 | 373,815,408 |
| 3.5 | 360,262,942 |
| 4.5 | 348,597,439 |
| 5.5 | 334,443,130 |
| 6.5 | 309,148,110 |
| 7.5 | 294,192,336 |
| 8.5 | 274,831,298 |
| 9.5 | 264,802,467 |
| 10.5 | 257,870,170 |
| 11.5 | 252,723,137 |
| 12.5 | 248,106,201 |
| 13.5 | 237,599,639 |
| 14.5 | 231,678,889 |
| 15.5 | 225,671,771 |
| 16.5 | 220,818,463 |
| 17.5 | 219,841,029 |
| 18.5 | 219,182,014 |
| 19.5 | 219,222,281 |
| 20.5 | 220,163,725 |
| 21.5 | 218,340,683 |
| 22.5 | 204,282,765 |
| 23.5 | 195,037,174 |
| 24.5 | 187,015,060 |
| 25.5 | 177,782,729 |
| 26.5 | 169,524,741 |
| 27.5 | 158,343,309 |
| 28.5 | 148,363,575 |
| 29.5 | 139,492,672 |
| 30.5 | 131,128,649 |
| 31.5 | 122,494,940 |
| 32.5 | 115,436,065 |
| 33.5 | 107,862,163 |
| 34.5 | 100,136,829 |
| 35.5 | 94,819,577 |
| 36.5 | 88,855,809 |
| 37.5 | 83,041,331 |
| 38.5 | 78,491,786 |

## RETIREMENTS INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL

| $1,721,061$ | 0.0034 | 0.9966 | 100.00 |
| ---: | :--- | :--- | ---: |
| $2,837,111$ | 0.0063 | 0.9937 | 99.66 |
| $4,362,768$ | 0.0109 | 0.9891 | 99.03 |
| $3,485,349$ | 0.0093 | 0.9907 | 97.95 |
| $2,667,642$ | 0.0074 | 0.9926 | 97.04 |
| $3,412,227$ | 0.0098 | 0.9902 | 96.32 |
| $2,548,252$ | 0.0076 | 0.9924 | 95.38 |
| $1,903,539$ | 0.0062 | 0.9938 | 94.65 |
| $1,945,973$ | 0.0066 | 0.9934 | 94.07 |
| $2,276,502$ | 0.0083 | 0.9917 | 93.44 |
| $2,224,400$ | 0.0084 | 0.9916 | 92.67 |
| $1,611,472$ | 0.0062 | 0.9938 | 91.89 |
| $2,378,675$ | 0.0094 | 0.9906 | 91.32 |
| $2,124,706$ | 0.0086 | 0.9914 | 90.46 |
| $1,502,028$ | 0.0063 | 0.9937 | 89.68 |
| $1,378,591$ | 0.0060 | 0.9940 | 89.12 |
| $1,706,027$ | 0.0076 | 0.9924 | 88.59 |
| $1,066,808$ | 0.0048 | 0.9952 | 87.92 |
| $1,014,701$ | 0.0046 | 0.9954 | 87.49 |
| $1,042,070$ | 0.0048 | 0.9952 | 87.09 |
| $1,170,416$ | 0.0053 | 0.9947 | 86.67 |
| $1,396,595$ | 0.0063 | 0.9937 | 86.21 |
| $1,046,605$ | 0.0048 | 0.9952 | 85.66 |
| 641,367 | 0.0031 | 0.9969 | 85.25 |
| 597,699 | 0.0031 | 0.9969 | 84.99 |
| 433,666 | 0.0023 | 0.9977 | 84.73 |
| 630,130 | 0.0035 | 0.9965 | 84.53 |
| 528,360 | 0.0031 | 0.9969 | 84.23 |
| 499,631 | 0.0032 | 0.9968 | 83.97 |
| 497,691 | 0.0034 | 0.9966 | 83.70 |
| 526,801 | 0.0038 | 0.9962 | 83.42 |
| 499,637 | 0.0038 | 0.9962 | 83.11 |
| 521,745 | 0.0043 | 0.9957 | 82.79 |
| 439,003 | 0.0038 | 0.9962 | 82.44 |
| 487,757 | 0.0045 | 0.9955 | 82.12 |
| 416,879 | 0.0042 | 0.9958 | 81.75 |
| 475,768 | 0.0050 | 0.9950 | 81.41 |
| 437,943 | 0.0049 | 0.9951 | 81.00 |
| 503,483 | 0.0061 | 0.9939 | 80.60 |
| 447,720 | 0.0057 | 0.9943 | 80.11 |
| 105 |  |  |  |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 72,376,641 | 369,109 | 0.0051 | 0.9949 | 79.66 |
| 40.5 | 67,591,607 | 526,492 | 0.0078 | 0.9922 | 79.25 |
| 41.5 | 63,515,895 | 503,633 | 0.0079 | 0.9921 | 78.63 |
| 42.5 | 58,122,821 | 354,571 | 0.0061 | 0.9939 | 78.01 |
| 43.5 | 52,288,735 | 726,635 | 0.0139 | 0.9861 | 77.53 |
| 44.5 | 46,501,946 | 447,545 | 0.0096 | 0.9904 | 76.46 |
| 45.5 | 41,049,733 | 252,466 | 0.0062 | 0.9938 | 75.72 |
| 46.5 | 37,729,672 | 246,284 | 0.0065 | 0.9935 | 75.26 |
| 47.5 | 34,934,520 | 220,870 | 0.0063 | 0.9937 | 74.76 |
| 48.5 | 32,966,301 | 309,204 | 0.0094 | 0.9906 | 74.29 |
| 49.5 | 29,246,883 | 305,281 | 0.0104 | 0.9896 | 73.60 |
| 50.5 | 27,629,784 | 207,547 | 0.0075 | 0.9925 | 72.83 |
| 51.5 | 25,973,793 | 200,911 | 0.0077 | 0.9923 | 72.28 |
| 52.5 | 23,577,496 | 191,814 | 0.0081 | 0.9919 | 71.72 |
| 53.5 | 22,120,263 | 225,766 | 0.0102 | 0.9898 | 71.14 |
| 54.5 | 20,570,057 | 192,669 | 0.0094 | 0.9906 | 70.41 |
| 55.5 | 19,281,335 | 211,757 | 0.0110 | 0.9890 | 69.75 |
| 56.5 | 18,056,134 | 292,243 | 0.0162 | 0.9838 | 68.99 |
| 57.5 | 16,638,228 | 160,367 | 0.0096 | 0.9904 | 67.87 |
| 58.5 | 15,506,570 | 297,286 | 0.0192 | 0.9808 | 67.21 |
| 59.5 | 13,791,379 | 276,594 | 0.0201 | 0.9799 | 65.93 |
| 60.5 | 11,944,807 | 219,215 | 0.0184 | 0.9816 | 64.60 |
| 61.5 | 10,527,815 | 142,650 | 0.0135 | 0.9865 | 63.42 |
| 62.5 | 9,186,947 | 134,531 | 0.0146 | 0.9854 | 62.56 |
| 63.5 | 8,165,120 | 81,757 | 0.0100 | 0.9900 | 61.64 |
| 64.5 | 7,242,863 | 95,191 | 0.0131 | 0.9869 | 61.03 |
| 65.5 | 6,074,788 | 114,618 | 0.0189 | 0.9811 | 60.22 |
| 66.5 | 5,184,434 | 61,791 | 0.0119 | 0.9881 | 59.09 |
| 67.5 | 4,501,642 | 47,288 | 0.0105 | 0.9895 | 58.38 |
| 68.5 | 3,897,584 | 49,200 | 0.0126 | 0.9874 | 57.77 |
| 69.5 | 3,459,546 | 43,136 | 0.0125 | 0.9875 | 57.04 |
| 70.5 | 3,123,457 | 47,193 | 0.0151 | 0.9849 | 56.33 |
| 71.5 | 2,824,055 | 33,795 | 0.0120 | 0.9880 | 55.48 |
| 72.5 | 2,807,240 | 41,565 | 0.0148 | 0.9852 | 54.81 |
| 73.5 | 2,798,426 | 58,633 | 0.0210 | 0.9790 | 54.00 |
| 74.5 | 2,740,477 | 114,988 | 0.0420 | 0.9580 | 52.87 |
| 75.5 | 2,628,696 | 109,327 | 0.0416 | 0.9584 | 50.65 |
| 76.5 | 2,505,946 | 54,201 | 0.0216 | 0.9784 | 48.55 |
| 77.5 | 2,355,595 | 50,661 | 0.0215 | 0.9785 | 47.50 |
| 78.5 | 2,192,165 | 39,695 | 0.0181 | 0.9819 | 46.47 |

ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1903-2019 |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 2,115,035 | 39,006 | 0.0184 | 0.9816 | 45.63 |
| 80.5 | 2,022,528 | 41,717 | 0.0206 | 0.9794 | 44.79 |
| 81.5 | 1,962,776 | 52,473 | 0.0267 | 0.9733 | 43.87 |
| 82.5 | 1,810,848 | 53,025 | 0.0293 | 0.9707 | 42.70 |
| 83.5 | 1,688,654 | 51,446 | 0.0305 | 0.9695 | 41.44 |
| 84.5 | 1,628,702 | 54,275 | 0.0333 | 0.9667 | 40.18 |
| 85.5 | 1,504,966 | 54,113 | 0.0360 | 0.9640 | 38.84 |
| 86.5 | 1,400,846 | 44,055 | 0.0314 | 0.9686 | 37.45 |
| 87.5 | 1,296,239 | 36,836 | 0.0284 | 0.9716 | 36.27 |
| 88.5 | 1,101,824 | 24,163 | 0.0219 | 0.9781 | 35.24 |
| 89.5 | 913,567 | 29,183 | 0.0319 | 0.9681 | 34.47 |
| 90.5 | 766,768 | 31,190 | 0.0407 | 0.9593 | 33.36 |
| 91.5 | 587,244 | 24,424 | 0.0416 | 0.9584 | 32.01 |
| 92.5 | 344,167 | 9,809 | 0.0285 | 0.9715 | 30.68 |
| 93.5 | 273,724 | 2,540 | 0.0093 | 0.9907 | 29.80 |
| 94.5 | 145,577 |  | 0.0000 | 1.0000 | 29.53 |
| 95.5 | 113,673 |  | 0.0000 | 1.0000 | 29.53 |
| 96.5 | 111,773 |  | 0.0000 | 1.0000 | 29.53 |
| 97.5 | 100,382 |  | 0.0000 | 1.0000 | 29.53 |
| 98.5 | 99,138 |  | 0.0000 | 1.0000 | 29.53 |
| 99.5 | 40,531 |  | 0.0000 | 1.0000 | 29.53 |
| 100.5 | 40,452 |  | 0.0000 | 1.0000 | 29.53 |
| 101.5 | 36,650 |  | 0.0000 | 1.0000 | 29.53 |
| 102.5 | 18,459 |  | 0.0000 | 1.0000 | 29.53 |
| 103.5 | 11,189 |  | 0.0000 | 1.0000 | 29.53 |
| 104.5 | 11,179 |  | 0.0000 | 1.0000 | 29.53 |
| 105.5 | 1,819 |  | 0.0000 | 1.0000 | 29.53 |
| 106.5 | 1,819 |  | 0.0000 | 1.0000 | 29.53 |
| 107.5 |  |  |  |  | 29.53 |


| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 113,653,005 | 26,237 | 0.0002 | 0.9998 | 100.00 |
| 0.5 | 105,446,226 | 132,980 | 0.0013 | 0.9987 | 99.98 |
| 1.5 | 97,193,334 | 244,764 | 0.0025 | 0.9975 | 99.85 |
| 2.5 | 90,739,879 | 258,981 | 0.0029 | 0.9971 | 99.60 |
| 3.5 | 86,064,706 | 323,809 | 0.0038 | 0.9962 | 99.32 |
| 4.5 | 81,640,759 | 403,342 | 0.0049 | 0.9951 | 98.94 |
| 5.5 | 76,709,232 | 359,359 | 0.0047 | 0.9953 | 98.45 |
| 6.5 | 72,474,890 | 360,852 | 0.0050 | 0.9950 | 97.99 |
| 7.5 | 67,742,734 | 384,027 | 0.0057 | 0.9943 | 97.50 |
| 8.5 | 62,795,255 | 359,739 | 0.0057 | 0.9943 | 96.95 |
| 9.5 | 59,258,509 | 383,926 | 0.0065 | 0.9935 | 96.40 |
| 10.5 | 55,099,117 | 383,816 | 0.0070 | 0.9930 | 95.77 |
| 11.5 | 51,063,445 | 409,122 | 0.0080 | 0.9920 | 95.10 |
| 12.5 | 48,087,144 | 373,612 | 0.0078 | 0.9922 | 94.34 |
| 13.5 | 43,946,285 | 317,007 | 0.0072 | 0.9928 | 93.61 |
| 14.5 | 40,798,711 | 303,469 | 0.0074 | 0.9926 | 92.93 |
| 15.5 | 38,225,952 | 257,361 | 0.0067 | 0.9933 | 92.24 |
| 16.5 | 35,030,416 | 292,263 | 0.0083 | 0.9917 | 91.62 |
| 17.5 | 31,421,866 | 323,822 | 0.0103 | 0.9897 | 90.86 |
| 18.5 | 27,579,346 | 260,928 | 0.0095 | 0.9905 | 89.92 |
| 19.5 | 23,881,987 | 264,408 | 0.0111 | 0.9889 | 89.07 |
| 20.5 | 21,532,165 | 257,550 | 0.0120 | 0.9880 | 88.08 |
| 21.5 | 19,624,133 | 220,754 | 0.0112 | 0.9888 | 87.03 |
| 22.5 | 18,443,332 | 201,001 | 0.0109 | 0.9891 | 86.05 |
| 23.5 | 15,657,911 | 149,118 | 0.0095 | 0.9905 | 85.11 |
| 24.5 | 14,705,442 | 129,892 | 0.0088 | 0.9912 | 84.30 |
| 25.5 | 13,588,132 | 133,937 | 0.0099 | 0.9901 | 83.56 |
| 26.5 | 11,831,971 | 111,204 | 0.0094 | 0.9906 | 82.73 |
| 27.5 | 10,978,483 | 117,861 | 0.0107 | 0.9893 | 81.96 |
| 28.5 | 10,230,374 | 112,434 | 0.0110 | 0.9890 | 81.08 |
| 29.5 | 9,596,944 | 134,584 | 0.0140 | 0.9860 | 80.19 |
| 30.5 | 9,020,081 | 106,967 | 0.0119 | 0.9881 | 79.06 |
| 31.5 | 8,455,077 | 106,999 | 0.0127 | 0.9873 | 78.12 |
| 32.5 | 8,217,583 | 105,206 | 0.0128 | 0.9872 | 77.14 |
| 33.5 | 7,771,320 | 109,439 | 0.0141 | 0.9859 | 76.15 |
| 34.5 | 7,120,817 | 100,412 | 0.0141 | 0.9859 | 75.08 |
| 35.5 | 6,929,675 | 96,918 | 0.0140 | 0.9860 | 74.02 |
| 36.5 | 6,965,310 | 114,076 | 0.0164 | 0.9836 | 72.98 |
| 37.5 | 6,716,509 | 108,926 | 0.0162 | 0.9838 | 71.79 |
| 38.5 | 6,395,535 | 100,290 | 0.0157 | 0.9843 | 70.62 |

ACCOUNT 364.11 POLES, TOWERS AND FIXTURES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1903-1993
EXPERIENCE BAND 1964-1993

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 5,864,114 | 102,792 | 0.0175 | 0.9825 | 69.51 |
| 40.5 | 5,413,264 | 106,552 | 0.0197 | 0.9803 | 68.30 |
| 41.5 | 5,022,882 | 92,449 | 0.0184 | 0.9816 | 66.95 |
| 42.5 | 4,617,305 | 86,518 | 0.0187 | 0.9813 | 65.72 |
| 43.5 | 4,304,408 | 83,493 | 0.0194 | 0.9806 | 64.49 |
| 44.5 | 3,992,400 | 117,276 | 0.0294 | 0.9706 | 63.24 |
| 45.5 | 3,676,024 | 82,163 | 0.0224 | 0.9776 | 61.38 |
| 46.5 | 3,409,517 | 76,678 | 0.0225 | 0.9775 | 60.01 |
| 47.5 | 3,259,161 | 82,956 | 0.0255 | 0.9745 | 58.66 |
| 48.5 | 3,091,324 | 92,399 | 0.0299 | 0.9701 | 57.17 |
| 49.5 | 2,951,720 | 95,577 | 0.0324 | 0.9676 | 55.46 |
| 50.5 | 2,802,983 | 78,153 | 0.0279 | 0.9721 | 53.66 |
| 51.5 | 2,647,995 | 65,410 | 0.0247 | 0.9753 | 52.16 |
| 52.5 | 2,473,832 | 55,943 | 0.0226 | 0.9774 | 50.88 |
| 53.5 | 2,387,650 | 72,294 | 0.0303 | 0.9697 | 49.73 |
| 54.5 | 2,249,893 | 42,703 | 0.0190 | 0.9810 | 48.22 |
| 55.5 | 2,172,040 | 47,039 | 0.0217 | 0.9783 | 47.30 |
| 56.5 | 2,038,080 | 37,674 | 0.0185 | 0.9815 | 46.28 |
| 57.5 | 1,934,081 | 35,090 | 0.0181 | 0.9819 | 45.42 |
| 58.5 | 1,805,348 | 34,130 | 0.0189 | 0.9811 | 44.60 |
| 59.5 | 1,702,019 | 36,185 | 0.0213 | 0.9787 | 43.76 |
| 60.5 | 1,622,219 | 32,244 | 0.0199 | 0.9801 | 42.83 |
| 61.5 | 1,525,190 | 23,353 | 0.0153 | 0.9847 | 41.98 |
| 62.5 | 1,333,253 | 19,155 | 0.0144 | 0.9856 | 41.33 |
| 63.5 | 1,139,084 | 14,201 | 0.0125 | 0.9875 | 40.74 |
| 64.5 | 993,068 | 15,501 | 0.0156 | 0.9844 | 40.23 |
| 65.5 | 759,130 | 11,040 | 0.0145 | 0.9855 | 39.60 |
| 66.5 | 427,324 | 1,506 | 0.0035 | 0.9965 | 39.03 |
| 67.5 | 299,735 | 982 | 0.0033 | 0.9967 | 38.89 |
| 68.5 | 164,571 | 365 | 0.0022 | 0.9978 | 38.76 |
| 69.5 | 110,520 | 52 | 0.0005 | 0.9995 | 38.68 |
| 70.5 | 109,730 | 58 | 0.0005 | 0.9995 | 38.66 |
| 71.5 | 98,594 |  | 0.0000 | 1.0000 | 38.64 |
| 72.5 | 98,049 |  | 0.0000 | 1.0000 | 38.64 |
| 73.5 | 41,835 |  | 0.0000 | 1.0000 | 38.64 |
| 74.5 | 41,724 |  | 0.0000 | 1.0000 | 38.64 |
| 75.5 | 38,112 | 64 | 0.0017 | 0.9983 | 38.64 |
| 76.5 | 17,723 |  | 0.0000 | 1.0000 | 38.57 |
| 77.5 | 10,831 |  | 0.0000 | 1.0000 | 38.57 |
| 78.5 | 10,813 |  | 0.0000 | 1.0000 | 38.57 |

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            DUQUESNE LIGHT COMPANY
ACCOUNT 364.11 POLES, TOWERS AND FIXTURES
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT | BAND 1903-1993 |  | EXPERIENCE BAND | 1964-1993 |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 |  | 1,924 |  | 0.0000 | 1.0000 |
| 80.5 | 1,924 |  | 0.0000 | 1.0000 | 38.57 |
| 81.5 |  |  |  |  | 38.57 |
|  |  |  |  |  |  |



ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1913-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 529,094,558 |
| 0.5 | 473,558,576 |
| 1.5 | 418,988,741 |
| 2.5 | 384,435,445 |
| 3.5 | 367,342,905 |
| 4.5 | 352,972,006 |
| 5.5 | 339,260,782 |
| 6.5 | 322,682,003 |
| 7.5 | 304,226,791 |
| 8.5 | 302,618,107 |
| 9.5 | 248,687,093 |
| 10.5 | 232,841,108 |
| 11.5 | 220,987,693 |
| 12.5 | 217,757,125 |
| 13.5 | 206,321,988 |
| 14.5 | 188,755,568 |
| 15.5 | 179,611,389 |
| 16.5 | 174,072,217 |
| 17.5 | 167,533,212 |
| 18.5 | 151,321,384 |
| 19.5 | 149,746,418 |
| 20.5 | 144,567,246 |
| 21.5 | 143,580,353 |
| 22.5 | 137,913,991 |
| 23.5 | 131,544,229 |
| 24.5 | 130,637,980 |
| 25.5 | 127,148,903 |
| 26.5 | 122,973,740 |
| 27.5 | 116,237,544 |
| 28.5 | 110,286,890 |
| 29.5 | 105,652,180 |
| 30.5 | 101,078,805 |
| 31.5 | 98,008,228 |
| 32.5 | 94,679,411 |
| 33.5 | 90,063,950 |
| 34.5 | 85,938,598 |
| 35.5 | 82,739,670 |
| 36.5 | 78,689,371 |
| 37.5 | 74,732,176 |
| 38.5 | 70,895,846 |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :---: |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| $2,315,571$ | 0.0044 | 0.9956 | 100.00 |
| ---: | :--- | :--- | ---: |
| $4,127,023$ | 0.0087 | 0.9913 | 99.56 |
| $5,181,726$ | 0.0124 | 0.9876 | 98.69 |
| $4,825,199$ | 0.0126 | 0.9874 | 97.47 |
| $4,170,318$ | 0.0114 | 0.9886 | 96.25 |
| $4,190,462$ | 0.0119 | 0.9881 | 95.16 |
| $5,671,155$ | 0.0167 | 0.9833 | 94.03 |
| $2,731,358$ | 0.0085 | 0.9915 | 92.46 |
| $3,359,192$ | 0.0110 | 0.9890 | 91.67 |
| $2,728,025$ | 0.0090 | 0.9910 | 90.66 |
| $3,913,205$ | 0.0157 | 0.9843 | 89.84 |
| $5,053,941$ | 0.0217 | 0.9783 | 88.43 |
| $3,045,708$ | 0.0138 | 0.9862 | 86.51 |
| $4,491,640$ | 0.0206 | 0.9794 | 85.32 |
| $2,413,550$ | 0.0117 | 0.9883 | 83.56 |
| $2,094,971$ | 0.0111 | 0.9889 | 82.58 |
| $2,346,382$ | 0.0131 | 0.9869 | 81.66 |
| $2,878,747$ | 0.0165 | 0.9835 | 80.60 |
| $3,194,529$ | 0.0191 | 0.9809 | 79.27 |
| $1,377,155$ | 0.0091 | 0.9909 | 77.75 |
| $1,835,503$ | 0.0123 | 0.9877 | 77.05 |
| $1,628,943$ | 0.0113 | 0.9887 | 76.10 |
| $2,059,699$ | 0.0143 | 0.9857 | 75.24 |
| 870,572 | 0.0063 | 0.9937 | 74.16 |
| 748,722 | 0.0057 | 0.9943 | 73.70 |
| 689,532 | 0.0053 | 0.9947 | 73.28 |
| 625,417 | 0.0049 | 0.9951 | 72.89 |
| 690,486 | 0.0056 | 0.9944 | 72.53 |
| 605,951 | 0.0052 | 0.9948 | 72.12 |
| 702,551 | 0.0064 | 0.9936 | 71.75 |
| 922,476 | 0.0087 | 0.9913 | 71.29 |
| 536,582 | 0.0053 | 0.9947 | 70.67 |
| 582,371 | 0.0059 | 0.9941 | 70.29 |
| 862,907 | 0.0091 | 0.9909 | 69.88 |
| 833,576 | 0.0093 | 0.9907 | 69.24 |
| 545,327 | 0.0063 | 0.9937 | 68.60 |
| 459,671 | 0.0056 | 0.9944 | 68.16 |
| 424,373 | 0.0054 | 0.9946 | 67.78 |
| 546,020 | 0.0073 | 0.9927 | 67.42 |
| 534,114 | 0.0075 | 0.9925 | 66.93 |
| 2,50 |  |  |  |

## ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1913-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 64,945,854 | 449,535 | 0.0069 | 0.9931 | 66.42 |
| 40.5 | 60,600,324 | 611,780 | 0.0101 | 0.9899 | 65.96 |
| 41.5 | 56,269,465 | 484,604 | 0.0086 | 0.9914 | 65.30 |
| 42.5 | 50,769,954 | 534,372 | 0.0105 | 0.9895 | 64.73 |
| 43.5 | 44,742,422 | 616,708 | 0.0138 | 0.9862 | 64.05 |
| 44.5 | 38,375,734 | 320,055 | 0.0083 | 0.9917 | 63.17 |
| 45.5 | 32,714,270 | 279,746 | 0.0086 | 0.9914 | 62.64 |
| 46.5 | 29,386,508 | 249,658 | 0.0085 | 0.9915 | 62.11 |
| 47.5 | 26,616,866 | 306,256 | 0.0115 | 0.9885 | 61.58 |
| 48.5 | 24,716,460 | 207,467 | 0.0084 | 0.9916 | 60.87 |
| 49.5 | 20,728,932 | 224,409 | 0.0108 | 0.9892 | 60.36 |
| 50.5 | 19,197,662 | 153,425 | 0.0080 | 0.9920 | 59.71 |
| 51.5 | 17,840,060 | 64,953 | 0.0036 | 0.9964 | 59.23 |
| 52.5 | 16,800,723 | 73,341 | 0.0044 | 0.9956 | 59.01 |
| 53.5 | 15,651,182 | 46,299 | 0.0030 | 0.9970 | 58.76 |
| 54.5 | 14,390,576 | 38,825 | 0.0027 | 0.9973 | 58.58 |
| 55.5 | 13,346,739 | 84,760 | 0.0064 | 0.9936 | 58.42 |
| 56.5 | 12,384,980 | 92,124 | 0.0074 | 0.9926 | 58.05 |
| 57.5 | 11,302,813 | 55,048 | 0.0049 | 0.9951 | 57.62 |
| 58.5 | 10,506,584 | 118,496 | 0.0113 | 0.9887 | 57.34 |
| 59.5 | 9,174,576 | 33,409 | 0.0036 | 0.9964 | 56.69 |
| 60.5 | 7,934,981 | 32,644 | 0.0041 | 0.9959 | 56.49 |
| 61.5 | 7,009,054 | 30,026 | 0.0043 | 0.9957 | 56.26 |
| 62.5 | 6,037,728 | 40,915 | 0.0068 | 0.9932 | 56.01 |
| 63.5 | 5,133,311 | 32,955 | 0.0064 | 0.9936 | 55.64 |
| 64.5 | 4,405,623 | 54,869 | 0.0125 | 0.9875 | 55.28 |
| 65.5 | 3,695,032 | 71,571 | 0.0194 | 0.9806 | 54.59 |
| 66.5 | 2,892,209 | 111,442 | 0.0385 | 0.9615 | 53.53 |
| 67.5 | 2,255,955 | 161,446 | 0.0716 | 0.9284 | 51.47 |
| 68.5 | 1,680,892 | 78,252 | 0.0466 | 0.9534 | 47.79 |
| 69.5 | 1,180,432 | 44,397 | 0.0376 | 0.9624 | 45.56 |
| 70.5 | 795,973 | 45,436 | 0.0571 | 0.9429 | 43.85 |
| 71.5 | 591,306 | 30,832 | 0.0521 | 0.9479 | 41.34 |
| 72.5 | 482,376 | 46,221 | 0.0958 | 0.9042 | 39.19 |
| 73.5 | 392,831 | 29,412 | 0.0749 | 0.9251 | 35.43 |
| 74.5 | 326,443 | 19,274 | 0.0590 | 0.9410 | 32.78 |
| 75.5 | 297,944 | 31,222 | 0.1048 | 0.8952 | 30.85 |
| 76.5 | 244,291 | 21,968 | 0.0899 | 0.9101 | 27.61 |
| 77.5 | 169,651 | 5,427 | 0.0320 | 0.9680 | 25.13 |
| 78.5 | 100,847 | 2,761 | 0.0274 | 0.9726 | 24.33 |

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ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT BAND 1913-2019 |  |  | EXPERIENCE BAND 1964-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 83,568 | 2,393 | 0.0286 | 0.9714 | 23.66 |
| 80.5 | 81,175 | 2,974 | 0.0366 | 0.9634 | 22.98 |
| 81.5 | 70,071 | 2,992 | 0.0427 | 0.9573 | 22.14 |
| 82.5 | 47,556 | 2,955 | 0.0621 | 0.9379 | 21.20 |
| 83.5 | 25,729 | 3,536 | 0.1374 | 0.8626 | 19.88 |
| 84.5 | 4,837 | 1,103 | 0.2279 | 0.7721 | 17.15 |
| 85.5 | 1,125 | 64 | 0.0573 | 0.9427 | 13.24 |
| 86.5 | 1,060 | 131 | 0.1237 | 0.8763 | 12.48 |
| 87.5 | 929 | 29 | 0.0310 | 0.9690 | 10.94 |
| 88.5 | 900 | 233 | 0.2583 | 0.7417 | 10.60 |
| 89.5 | 668 | 2 | 0.0028 | 0.9972 | 7.86 |
| 90.5 | 666 | 197 | 0.2965 | 0.7035 | 7.84 |
| 91.5 | 468 | 242 | 0.5166 | 0.4834 | 5.51 |
| 92.5 | 226 | 150 | 0.6638 | 0.3362 | 2.67 |
| 93.5 | 76 | 28 | 0.3707 | 0.6293 | 0.90 |
| 94.5 | 48 | 48 | 1.0000 |  | 0.56 |
| 95.5 |  |  |  |  |  |

ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1917-2019
EXPERIENCE BAND 2000-2019
\(\left.\begin{array}{cc}AGE AT \& EXPOSURES AT <br>
BEGIN OF \& BEGINNING OF <br>

INTERVAL \& AGE INTERVAL\end{array}\right]\)|  |  |
| :---: | :---: |
| 0.0 | $425,991,268$ |
| 0.5 | $380,221,543$ |
| 1.5 | $328,415,120$ |
| 2.5 | $301,341,586$ |
| 3.5 | $290,305,274$ |
| 4.5 | $276,471,743$ |
| 5.5 | $264,672,094$ |
| 6.5 | $251,720,896$ |
| 7.5 | $238,530,293$ |
| 8.5 | $242,058,870$ |
| 9.5 | $191,451,004$ |
| 10.5 | $178,755,993$ |
| 11.5 | $167,960,774$ |
| 12.5 | $166,149,426$ |
| 13.5 | $157,328,575$ |
| 14.5 | $140,816,917$ |
| 15.5 | $133,123,052$ |
| 16.5 | $129,684,610$ |
| 17.5 | $124,173,255$ |
| 18.5 | $108,711,604$ |
| 19.5 | $109,640,723$ |
| 20.5 | $105,284,360$ |
| 21.5 | $106,823,716$ |
| 22.5 | $105,698,296$ |
| 23.5 | $104,790,710$ |
| 24.5 | $107,909,997$ |
| 25.5 | $109,435,934$ |
| 26.5 | $107,872,356$ |
| 27.5 | $103,047,500$ |
| 28.5 | $97,822,347$ |
| 29.5 | $96,238,681$ |
| 30.5 | $92,313,842$ |
| 31.5 | $89,738,261$ |
| 32.5 | $86,650,263$ |
| 33.5 | $82,436,186$ |
| 34.5 | $78,406,904$ |
| 35.5 | $75,236,072$ |
| 36.5 | $71,490,929$ |
| 37.5 | $67,791,623$ |
| 38.5 | $64,022,693$ |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| $2,312,183$ | 0.0054 | 0.9946 | 100.00 |
| ---: | :--- | :--- | ---: |
| $4,079,330$ | 0.0107 | 0.9893 | 99.46 |
| $4,954,880$ | 0.0151 | 0.9849 | 98.39 |
| $4,434,273$ | 0.0147 | 0.9853 | 96.91 |
| $3,698,351$ | 0.0127 | 0.9873 | 95.48 |
| $3,629,723$ | 0.0131 | 0.9869 | 94.26 |
| $5,081,081$ | 0.0192 | 0.9808 | 93.03 |
| $1,950,443$ | 0.0077 | 0.9923 | 91.24 |
| $2,714,619$ | 0.0114 | 0.9886 | 90.53 |
| $2,274,581$ | 0.0094 | 0.9906 | 89.50 |
| $3,409,524$ | 0.0178 | 0.9822 | 88.66 |
| $4,563,041$ | 0.0255 | 0.9745 | 87.08 |
| $2,561,170$ | 0.0152 | 0.9848 | 84.86 |
| $3,986,242$ | 0.0240 | 0.9760 | 83.57 |
| $2,087,174$ | 0.0133 | 0.9867 | 81.56 |
| $1,866,149$ | 0.0133 | 0.9867 | 80.48 |
| $1,997,407$ | 0.0150 | 0.9850 | 79.41 |
| $2,538,753$ | 0.0196 | 0.9804 | 78.22 |
| $2,950,775$ | 0.0238 | 0.9762 | 76.69 |
| $1,179,197$ | 0.0108 | 0.9892 | 74.87 |
| $1,619,737$ | 0.0148 | 0.9852 | 74.06 |
| $1,470,889$ | 0.0140 | 0.9860 | 72.96 |
| $1,976,437$ | 0.0185 | 0.9815 | 71.94 |
| 695,449 | 0.0066 | 0.9934 | 70.61 |
| 595,981 | 0.0057 | 0.9943 | 70.15 |
| 593,121 | 0.0055 | 0.9945 | 69.75 |
| 528,930 | 0.0048 | 0.9952 | 69.36 |
| 578,175 | 0.0054 | 0.9946 | 69.03 |
| 574,236 | 0.0056 | 0.9944 | 68.66 |
| 576,368 | 0.0059 | 0.9941 | 68.28 |
| 812,566 | 0.0084 | 0.9916 | 67.87 |
| 439,222 | 0.0048 | 0.9952 | 67.30 |
| 471,720 | 0.0053 | 0.9947 | 66.98 |
| 753,869 | 0.0087 | 0.9913 | 66.63 |
| 765,586 | 0.0093 | 0.9907 | 66.05 |
| 438,794 | 0.0056 | 0.9944 | 65.44 |
| 391,744 | 0.0052 | 0.9948 | 65.07 |
| 392,158 | 0.0055 | 0.9945 | 64.73 |
| 523,425 | 0.0077 | 0.9923 | 64.38 |
| 520,982 | 0.0081 | 0.9919 | 63.88 |
| 2,9 |  |  |  |

## ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1917-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 58,687,879 | 417,562 | 0.0071 | 0.9929 | 63.36 |
| 40.5 | 55,149,673 | 537,792 | 0.0098 | 0.9902 | 62.91 |
| 41.5 | 51,174,671 | 455,806 | 0.0089 | 0.9911 | 62.29 |
| 42.5 | 46,065,176 | 512,578 | 0.0111 | 0.9889 | 61.74 |
| 43.5 | 40,568,129 | 580,963 | 0.0143 | 0.9857 | 61.05 |
| 44.5 | 34,537,200 | 312,328 | 0.0090 | 0.9910 | 60.18 |
| 45.5 | 29,323,449 | 234,775 | 0.0080 | 0.9920 | 59.63 |
| 46.5 | 26,606,450 | 211,375 | 0.0079 | 0.9921 | 59.16 |
| 47.5 | 24,455,310 | 269,348 | 0.0110 | 0.9890 | 58.69 |
| 48.5 | 23,014,685 | 183,352 | 0.0080 | 0.9920 | 58.04 |
| 49.5 | 19,523,466 | 158,696 | 0.0081 | 0.9919 | 57.58 |
| 50.5 | 18,418,663 | 87,606 | 0.0048 | 0.9952 | 57.11 |
| 51.5 | 17,361,965 | 54,848 | 0.0032 | 0.9968 | 56.84 |
| 52.5 | 16,371,453 | 53,772 | 0.0033 | 0.9967 | 56.66 |
| 53.5 | 15,229,541 | 39,313 | 0.0026 | 0.9974 | 56.47 |
| 54.5 | 14,004,814 | 36,605 | 0.0026 | 0.9974 | 56.33 |
| 55.5 | 12,943,531 | 41,264 | 0.0032 | 0.9968 | 56.18 |
| 56.5 | 12,039,291 | 72,892 | 0.0061 | 0.9939 | 56.00 |
| 57.5 | 11,031,586 | 33,125 | 0.0030 | 0.9970 | 55.66 |
| 58.5 | 10,315,992 | 114,484 | 0.0111 | 0.9889 | 55.49 |
| 59.5 | 8,986,072 | 31,812 | 0.0035 | 0.9965 | 54.88 |
| 60.5 | 7,726,260 | 30,301 | 0.0039 | 0.9961 | 54.68 |
| 61.5 | 6,799,916 | 27,415 | 0.0040 | 0.9960 | 54.47 |
| 62.5 | 5,840,129 | 27,270 | 0.0047 | 0.9953 | 54.25 |
| 63.5 | 4,931,950 | 31,935 | 0.0065 | 0.9935 | 54.00 |
| 64.5 | 4,181,137 | 21,487 | 0.0051 | 0.9949 | 53.65 |
| 65.5 | 3,492,504 | 22,423 | 0.0064 | 0.9936 | 53.37 |
| 66.5 | 2,681,029 | 37,384 | 0.0139 | 0.9861 | 53.03 |
| 67.5 | 2,020,554 | 24,479 | 0.0121 | 0.9879 | 52.29 |
| 68.5 | 1,568,594 | 14,407 | 0.0092 | 0.9908 | 51.66 |
| 69.5 | 1,134,114 | 17,084 | 0.0151 | 0.9849 | 51.18 |
| 70.5 | 750,185 | 12,825 | 0.0171 | 0.9829 | 50.41 |
| 71.5 | 556,966 | 9,455 | 0.0170 | 0.9830 | 49.55 |
| 72.5 | 447,081 | 18,339 | 0.0410 | 0.9590 | 48.71 |
| 73.5 | 375,264 | 11,961 | 0.0319 | 0.9681 | 46.71 |
| 74.5 | 324,467 | 17,345 | 0.0535 | 0.9465 | 45.22 |
| 75.5 | 297,442 | 31,058 | 0.1044 | 0.8956 | 42.80 |
| 76.5 | 242,652 | 21,138 | 0.0871 | 0.9129 | 38.33 |
| 77.5 | 168,432 | 5,373 | 0.0319 | 0.9681 | 34.99 |
| 78.5 | 98,780 | 1,873 | 0.0190 | 0.9810 | 33.88 |

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ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES
    ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT | ND 1917-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 82,378 | 2,143 | 0.0260 | 0.9740 | 33.24 |
| 80.5 | 80,337 | 2,541 | 0.0316 | 0.9684 | 32.37 |
| 81.5 | 69,695 | 2,870 | 0.0412 | 0.9588 | 31.35 |
| 82.5 | 47,546 | 2,946 | 0.0620 | 0.9380 | 30.06 |
| 83.5 | 25,729 | 3,536 | 0.1374 | 0.8626 | 28.19 |
| 84.5 | 4,837 | 1,103 | 0.2279 | 0.7721 | 24.32 |
| 85.5 | 1,125 | 64 | 0.0573 | 0.9427 | 18.78 |
| 86.5 | 1,060 | 131 | 0.1237 | 0.8763 | 17.70 |
| 87.5 | 929 | 29 | 0.0310 | 0.9690 | 15.51 |
| 88.5 | 900 | 233 | 0.2583 | 0.7417 | 15.03 |
| 89.5 | 668 | 2 | 0.0028 | 0.9972 | 11.15 |
| 90.5 | 666 | 197 | 0.2965 | 0.7035 | 11.12 |
| 91.5 | 468 | 242 | 0.5166 | 0.4834 | 7.82 |
| 92.5 | 226 | 150 | 0.6638 | 0.3362 | 3.78 |
| 93.5 | 76 | 28 | 0.3707 | 0.6293 | 1.27 |
| 94.5 | 48 | 48 | 1.0000 |  | 0.80 |
| 95.5 |  |  |  |  |  |



## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1891-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 133,547,708 |
| 0.5 | 132,332,229 |
| 1.5 | 131,756,309 |
| 2.5 | 125,456,540 |
| 3.5 | 122,072,402 |
| 4.5 | 113,157,944 |
| 5.5 | 100,331,697 |
| 6.5 | 99,536,149 |
| 7.5 | 95,936,949 |
| 8.5 | 96,064,325 |
| 9.5 | 93,550,954 |
| 10.5 | 88,181,152 |
| 11.5 | 86,130,708 |
| 12.5 | 83,527,613 |
| 13.5 | 80,142,889 |
| 14.5 | 78,380,009 |
| 15.5 | 78,007,140 |
| 16.5 | 75,160,226 |
| 17.5 | 72,927,496 |
| 18.5 | 72,901,651 |
| 19.5 | 72,227,704 |
| 20.5 | 70,739,297 |
| 21.5 | 70,320,332 |
| 22.5 | 69,785,914 |
| 23.5 | 68,870,783 |
| 24.5 | 66,933,274 |
| 25.5 | 65,973,958 |
| 26.5 | 61,974,200 |
| 27.5 | 60,280,795 |
| 28.5 | 59,147,699 |
| 29.5 | 56,732,938 |
| 30.5 | 53,522,387 |
| 31.5 | 51,978,946 |
| 32.5 | 51,086,350 |
| 33.5 | 46,545,634 |
| 34.5 | 45,172,822 |
| 35.5 | 42,396,348 |
| 36.5 | 40,446,224 |
| 37.5 | 37,686,770 |
| 38.5 | 37,349,667 |

RETIREMENTS
DURING AGE
INTERVAL

PCT SURV BEGIN OF INTERVAL

| 10,120 | 0.0001 | 0.9999 | 100.00 |
| ---: | ---: | ---: | ---: |
| 89,249 | 0.0007 | 0.9993 | 99.99 |
| 146,832 | 0.0011 | 0.9989 | 99.92 |
| 129,146 | 0.0010 | 0.9990 | 99.81 |
| 41,467 | 0.0003 | 0.9997 | 99.71 |
| 27,972 | 0.0002 | 0.9998 | 99.68 |
| 100,674 | 0.0010 | 0.9990 | 99.65 |
| 69,972 | 0.0007 | 0.9993 | 99.55 |
| 256,189 | 0.0027 | 0.9973 | 99.48 |
| 23,337 | 0.0002 | 0.9998 | 99.22 |
| 29,958 | 0.0003 | 0.9997 | 99.19 |
| 20,321 | 0.0002 | 0.9998 | 99.16 |
| 30,288 | 0.0004 | 0.9996 | 99.14 |
| 41,904 | 0.0005 | 0.9995 | 99.10 |
| 96,216 | 0.0012 | 0.9988 | 99.05 |
| 70,527 | 0.0009 | 0.9991 | 98.93 |
| 77,930 | 0.0010 | 0.9990 | 98.85 |
| 55,210 | 0.0007 | 0.9993 | 98.75 |
| 20,935 | 0.0003 | 0.9997 | 98.67 |
| 29,885 | 0.0004 | 0.9996 | 98.65 |
| 36,671 | 0.0005 | 0.9995 | 98.61 |
| 75,921 | 0.0011 | 0.9989 | 98.56 |
| 54,577 | 0.0008 | 0.9992 | 98.45 |
| 25,579 | 0.0004 | 0.9996 | 98.37 |
| 51,972 | 0.0008 | 0.9992 | 98.34 |
| 18,033 | 0.0003 | 0.9997 | 98.26 |
| 55,918 | 0.0008 | 0.9992 | 98.24 |
| 73,746 | 0.0012 | 0.9988 | 98.15 |
| 18,501 | 0.0003 | 0.9997 | 98.04 |
| 69,279 | 0.0012 | 0.9988 | 98.01 |
| 75,002 | 0.0013 | 0.9987 | 97.89 |
| 62,470 | 0.0012 | 0.9988 | 97.76 |
| 16,940 | 0.0003 | 0.9997 | 97.65 |
| 39,468 | 0.0008 | 0.9992 | 97.62 |
| 26,029 | 0.0006 | 0.9994 | 97.54 |
| 31,095 | 0.0007 | 0.9993 | 97.49 |
| 29,939 | 0.0007 | 0.9993 | 97.42 |
| 51,891 | 0.0013 | 0.9987 | 97.35 |
| 13,438 | 0.0004 | 0.9996 | 97.23 |
| 41,613 | 0.0011 | 0.9989 | 97.19 |
|  | 0.0 |  |  |

## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1891-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |

39.5
40.5
41.5
42.5
43.5
44.5
45.5
46.5
47.5
48.5
49.5
50.5
51.5
52.5
53.5
54.5
55.5
56.5
57.5
58.5
59.
60.
61.5
62.5
63.5
64.5
65.5
66.5
67.5
68.5
69.5
70.5
71.5
72.5
73.5
74.5
75.5
76.5
77.5
78.5

35,089,654
33,859,490
31,858,008
30,923,317
29,492,072
27,719,577
24, 654, 818
22,454,963
20,990,662
17,820,315
16,410,584
15,478,115
15,154,909
14,130,590
13,813,235
12,871,144
12,605,988
$12,517,774$
11,917,247
11,245,504
10,918,351
10,784,050
10,530,814
$10,406,917$
10,054,762
9,688,901
9,178,700
8,810,789
8, 674, 043
8,553,107
8,295,071
8,125,094
8,030,965
7,998,647
7,998,714
7,923,830
7,908, 604
7,848,685
7,786,992
7,565,293

PCT SURV BEGIN OF
INTERVAL

| 27,512 | 0.0008 | 0.9992 | 97.08 |
| :--- | :--- | :--- | :--- |
| 50,939 | 0.0015 | 0.9985 | 97.01 |
| 27,720 | 0.0009 | 0.9991 | 96.86 |
| 27,976 | 0.0009 | 0.9991 | 96.78 |
| 27,160 | 0.0009 | 0.9991 | 96.69 |
| 35,989 | 0.0013 | 0.9987 | 96.60 |
| 28,585 | 0.0012 | 0.9988 | 96.47 |
| 23,814 | 0.0011 | 0.9989 | 96.36 |
| 23,844 | 0.0011 | 0.9989 | 96.26 |
| 28,176 | 0.0016 | 0.9984 | 96.15 |
| 42,598 | 0.0026 | 0.9974 | 96.00 |
| 72,261 | 0.0047 | 0.9953 | 95.75 |
| 60,152 | 0.0040 | 0.9960 | 95.30 |
| 53,629 | 0.0038 | 0.9962 | 94.92 |
| 34,308 | 0.0025 | 0.9975 | 94.56 |
| 67,718 | 0.0053 | 0.9947 | 94.33 |
| 27,210 | 0.0022 | 0.9978 | 93.83 |
| 23,317 | 0.0019 | 0.9981 | 93.63 |
| 44,430 | 0.0037 | 0.9963 | 93.46 |
| 47,044 | 0.0042 | 0.9958 | 93.11 |
| 32,154 | 0.0029 | 0.9971 | 92.72 |
| 29,765 | 0.0028 | 0.9972 | 92.44 |
| 38,576 | 0.0037 | 0.9963 | 92.19 |
| 46,647 | 0.0045 | 0.9955 | 91.85 |
| 25,154 | 0.0025 | 0.9975 | 91.44 |
| 24,430 | 0.0025 | 0.9975 | 91.21 |
| 21,082 | 0.0023 | 0.9977 | 90.98 |
| 15,666 | 0.0018 | 0.9982 | 90.77 |
| 24,051 | 0.0028 | 0.9972 | 90.61 |
| 35,300 | 0.0041 | 0.9959 | 90.36 |
| 23,368 | 0.0028 | 0.9972 | 89.99 |
| 26,030 | 0.0032 | 0.9968 | 89.73 |
| 23,407 | 0.0029 | 0.9971 | 89.45 |
| 42,212 | 0.0053 | 0.9947 | 89.19 |
| 23,186 | 0.0029 | 0.9971 | 88.71 |
| 37,237 | 0.0047 | 0.9953 | 88.46 |
| 29,679 | 0.0038 | 0.9962 | 88.04 |
| 25,195 | 0.0032 | 0.9968 | 87.71 |
| 30,336 | 0.0039 | 0.9961 | 87.43 |
| 20,790 | 0.0027 | 0.9973 | 87.09 |
|  | 0, |  |  |

## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE, CONT.
PLACEMENT BAND 1891-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 7,526,502 | 21,035 | 0.0028 | 0.9972 | 86.85 |
| 80.5 | 7,439,618 | 19,676 | 0.0026 | 0.9974 | 86.61 |
| 81.5 | 7,409,718 | 17,950 | 0.0024 | 0.9976 | 86.38 |
| 82.5 | 7,318,678 | 19,647 | 0.0027 | 0.9973 | 86.17 |
| 83.5 | 7,277,179 | 20,911 | 0.0029 | 0.9971 | 85.94 |
| 84.5 | 7,161,838 | 29,503 | 0.0041 | 0.9959 | 85.69 |
| 85.5 | 7,070,321 | 29,620 | 0.0042 | 0.9958 | 85.34 |
| 86.5 | 6,958,252 | 51,996 | 0.0075 | 0.9925 | 84.98 |
| 87.5 | 6,834,559 | 51,637 | 0.0076 | 0.9924 | 84.35 |
| 88.5 | 6,463,550 | 82,789 | 0.0128 | 0.9872 | 83.71 |
| 89.5 | 6,051,050 | 62,504 | 0.0103 | 0.9897 | 82.64 |
| 90.5 | 5,408,222 | 57,360 | 0.0106 | 0.9894 | 81.78 |
| 91.5 | 4,950,665 | 60,941 | 0.0123 | 0.9877 | 80.91 |
| 92.5 | 3,995,314 | 65,488 | 0.0164 | 0.9836 | 79.92 |
| 93.5 | 3,408,579 | 55,471 | 0.0163 | 0.9837 | 78.61 |
| 94.5 | 2,840,908 | 15,848 | 0.0056 | 0.9944 | 77.33 |
| 95.5 | 2,311,964 | 16,455 | 0.0071 | 0.9929 | 76.90 |
| 96.5 | 1,784,105 | 13,510 | 0.0076 | 0.9924 | 76.35 |
| 97.5 | 1,451,312 | 12,704 | 0.0088 | 0.9912 | 75.77 |
| 98.5 | 1,390,351 | 25,394 | 0.0183 | 0.9817 | 75.11 |
| 99.5 | 1,340,174 | 15,652 | 0.0117 | 0.9883 | 73.74 |
| 100.5 | 1,289,229 | 14,794 | 0.0115 | 0.9885 | 72.88 |
| 101.5 | 1,276,394 | 15,150 | 0.0119 | 0.9881 | 72.04 |
| 102.5 | 1,195,284 | 59,204 | 0.0495 | 0.9505 | 71.18 |
| 103.5 | 1,080,424 | 8,806 | 0.0082 | 0.9918 | 67.66 |
| 104.5 | 1,031,737 | 13,279 | 0.0129 | 0.9871 | 67.11 |
| 105.5 | 966,758 | 12,724 | 0.0132 | 0.9868 | 66.24 |
| 106.5 | 726,301 | 3,055 | 0.0042 | 0.9958 | 65.37 |
| 107.5 | 712,782 | 6,957 | 0.0098 | 0.9902 | 65.10 |
| 108.5 | 694,669 | 27,033 | 0.0389 | 0.9611 | 64.46 |
| 109.5 | 655,886 | 6,914 | 0.0105 | 0.9895 | 61.95 |
| 110.5 | 648,969 | 44,858 | 0.0691 | 0.9309 | 61.30 |
| 111.5 | 599,847 | 14,696 | 0.0245 | 0.9755 | 57.06 |
| 112.5 | 562,765 | 106,588 | 0.1894 | 0.8106 | 55.66 |
| 113.5 | 454,718 | 162,389 | 0.3571 | 0.6429 | 45.12 |
| 114.5 | 287,670 | 84,976 | 0.2954 | 0.7046 | 29.01 |
| 115.5 | 199,909 | 2,624 | 0.0131 | 0.9869 | 20.44 |
| 116.5 | 178,087 | 30,438 | 0.1709 | 0.8291 | 20.17 |
| 117.5 | 91,498 | 189 | 0.0021 | 0.9979 | 16.72 |
| 118.5 | 80,135 | 13,959 | 0.1742 | 0.8258 | 16.69 |

## DUQUESNE LIGHT COMPANY ACCOUNT 366 UNDERGROUND CONDUIT <br> ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1891-2019 |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AgE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 119.5 | 64,833 | 26,298 | 0.4056 | 0.5944 | 13.78 |
| 120.5 | 17,601 |  | 0.0000 | 1.0000 | 8.19 |
| 121.5 | 15,340 |  | 0.0000 | 1.0000 | 8.19 |
| 122.5 | 10,730 |  | 0.0000 | 1.0000 | 8.19 |
| 123.5 | 2,282 |  | 0.0000 | 1.0000 | 8.19 |
| 124.5 | 2,282 |  | 0.0000 | 1.0000 | 8.19 |
| 125.5 | 2,282 |  | 0.0000 | 1.0000 | 8.19 |
| 126.5 | 2,282 |  | 0.0000 | 1.0000 | 8.19 |
| 127.5 | 2,282 |  | 0.0000 | 1.0000 | 8.19 |
| 128.5 |  |  |  |  | 8.19 |

## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1891-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |


| 0.0 | $67,588,690$ |
| ---: | ---: |
| 0.5 | $67,918,659$ |
| 1.5 | $67,235,545$ |
| 2.5 | $61,109,869$ |
| 3.5 | $58,447,656$ |
| 4.5 | $51,359,865$ |
| 5.5 | $39,126,877$ |
| 6.5 | $42,182,717$ |
| 7.5 | $40,050,134$ |
| 8.5 | $41,037,217$ |
| 9.5 | $40,540,558$ |
| 10.5 | $38,006,662$ |
| 11.5 | $37,535,518$ |
| 12.5 | $36,057,579$ |
| 13.5 | $37,225,719$ |
| 14.5 | $37,209,738$ |
| 15.5 | $39,903,694$ |
| 16.5 | $39,899,813$ |
| 17.5 | $40,857,376$ |
| 18.5 | $41,689,438$ |
| 19.5 | $43,771,510$ |
| 20.5 | $44,087,711$ |
| 21.5 | $45,871,741$ |
| 22.5 | $46,073,917$ |
| 23.5 | $46,534,638$ |
| 24.5 | $46,291,804$ |
| 25.5 | $48,250,394$ |
| 26.5 | $46,375,968$ |
| 27.5 | $46,112,285$ |
| 28.5 | $47,982,746$ |

$29.5 \quad 46,853,437$
30.5 44,760,802
31.5 43,375,216
32.5 43,079,572
$33.5 \quad 38,418,987$
$34.5 \quad 37,288,161$
$35.5 \quad 34,263,198$
36.5 31,388,750
$37.5 \quad 28,645,056$
$38.5 \quad 28,408,998$
RETIREMENTS
DURING AGE
INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL

| 10,120 | 0.0001 | 0.9999 | 100.00 |
| ---: | ---: | ---: | ---: |
| 86,341 | 0.0013 | 0.9987 | 99.99 |
| 125,753 | 0.0019 | 0.9981 | 99.86 |
| 95,934 | 0.0016 | 0.9984 | 99.67 |
| 2,893 | 0.0000 | 1.0000 | 99.51 |
| 197 | 0.0000 | 1.0000 | 99.51 |
| 38,774 | 0.0010 | 0.9990 | 99.51 |
| 13,907 | 0.0003 | 0.9997 | 99.41 |
| 212,314 | 0.0053 | 0.9947 | 99.38 |
| 1,580 | 0.0000 | 1.0000 | 98.85 |
| 6,153 | 0.0002 | 0.9998 | 98.85 |
| 3,652 | 0.0001 | 0.9999 | 98.83 |
| 2,434 | 0.0001 | 0.9999 | 98.82 |
| 2,817 | 0.0001 | 0.9999 | 98.82 |
| 66,848 | 0.0018 | 0.9982 | 98.81 |
| 10,102 | 0.0003 | 0.9997 | 98.63 |
| 54,945 | 0.0014 | 0.9986 | 98.60 |
| 11,998 | 0.0003 | 0.9997 | 98.47 |
| 6,165 | 0.0002 | 0.9998 | 98.44 |
| 15,481 | 0.0004 | 0.9996 | 98.42 |
| 9,648 | 0.0002 | 0.9998 | 98.39 |
| 45,555 | 0.0010 | 0.9990 | 98.37 |
| 47,680 | 0.0010 | 0.9990 | 98.26 |
| 11,069 | 0.0002 | 0.9998 | 98.16 |
| 10,000 | 0.0002 | 0.9998 | 98.14 |
| 5,130 | 0.0001 | 0.9999 | 98.12 |
| 31,136 | 0.0006 | 0.9994 | 98.11 |
| 72,092 | 0.0016 | 0.9984 | 98.04 |
| 11,967 | 0.0003 | 0.9997 | 97.89 |
| 62,157 | 0.0013 | 0.9987 | 97.87 |
| 47,669 | 0.0010 | 0.9990 | 97.74 |
| 60,018 | 0.0013 | 0.9987 | 97.64 |
| 10,752 | 0.0002 | 0.9998 | 97.51 |
| 15,460 | 0.0004 | 0.9996 | 97.48 |
| 21,606 | 0.0006 | 0.9994 | 97.45 |
| 5,267 | 0.0001 | 0.9999 | 97.39 |
| 12,209 | 0.0004 | 0.9996 | 97.38 |
| 26,215 | 0.0008 | 0.9992 | 97.35 |
| 8,201 | 0.0003 | 0.9997 | 97.26 |
| 5,869 | 0.0002 | 0.9998 | 97.24 |
| 120 |  |  |  |

## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1891-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 25,858,956 | 8,333 | 0.0003 | 0.9997 | 97.22 |
| 40.5 | 24,272,401 | 12,659 | 0.0005 | 0.9995 | 97.19 |
| 41.5 | 22,410,292 | 15,808 | 0.0007 | 0.9993 | 97.13 |
| 42.5 | 21,601,386 | 14,443 | 0.0007 | 0.9993 | 97.07 |
| 43.5 | 20,456,439 | 9,803 | 0.0005 | 0.9995 | 97.00 |
| 44.5 | 19,053,179 | 21,318 | 0.0011 | 0.9989 | 96.95 |
| 45.5 | 16,491,087 | 12,738 | 0.0008 | 0.9992 | 96.85 |
| 46.5 | 14,560,842 | 9,249 | 0.0006 | 0.9994 | 96.77 |
| 47.5 | 13,215,650 | 6,421 | 0.0005 | 0.9995 | 96.71 |
| 48.5 | 10,100,276 | 14,945 | 0.0015 | 0.9985 | 96.66 |
| 49.5 | 8,872,029 | 17,815 | 0.0020 | 0.9980 | 96.52 |
| 50.5 | 7,801,972 | 30,089 | 0.0039 | 0.9961 | 96.33 |
| 51.5 | 7,606,672 | 7,486 | 0.0010 | 0.9990 | 95.95 |
| 52.5 | 6,653,125 | 20,921 | 0.0031 | 0.9969 | 95.86 |
| 53.5 | 6,360,054 | 19,258 | 0.0030 | 0.9970 | 95.56 |
| 54.5 | 5,521,975 | 28,047 | 0.0051 | 0.9949 | 95.27 |
| 55.5 | 5,305,007 | 13,652 | 0.0026 | 0.9974 | 94.79 |
| 56.5 | 5,248,118 | 10,620 | 0.0020 | 0.9980 | 94.54 |
| 57.5 | 4,715,232 | 23,410 | 0.0050 | 0.9950 | 94.35 |
| 58.5 | 4,237,929 | 15,704 | 0.0037 | 0.9963 | 93.88 |
| 59.5 | 3,954,588 | 16,755 | 0.0042 | 0.9958 | 93.53 |
| 60.5 | 3,766,154 | 17,092 | 0.0045 | 0.9955 | 93.14 |
| 61.5 | 3,295,445 | 11,848 | 0.0036 | 0.9964 | 92.72 |
| 62.5 | 3,171,605 | 9,031 | 0.0028 | 0.9972 | 92.38 |
| 63.5 | 2,881,725 | 16,376 | 0.0057 | 0.9943 | 92.12 |
| 64.5 | 2,564,714 | 8,880 | 0.0035 | 0.9965 | 91.60 |
| 65.5 | 2,138,150 | 9,087 | 0.0042 | 0.9958 | 91.28 |
| 66.5 | 1,851,394 | 5,778 | 0.0031 | 0.9969 | 90.89 |
| 67.5 | 1,780,520 | 4,935 | 0.0028 | 0.9972 | 90.61 |
| 68.5 | 2,015,392 | 30,043 | 0.0149 | 0.9851 | 90.36 |
| 69.5 | 2,113,518 | 14,975 | 0.0071 | 0.9929 | 89.01 |
| 70.5 | 2,568,014 | 21,123 | 0.0082 | 0.9918 | 88.38 |
| 71.5 | 2,906,125 | 21,683 | 0.0075 | 0.9925 | 87.65 |
| 72.5 | 3,839,711 | 35,022 | 0.0091 | 0.9909 | 87.00 |
| 73.5 | 4,416,188 | 19,326 | 0.0044 | 0.9956 | 86.20 |
| 74.5 | 4,902,742 | 29,874 | 0.0061 | 0.9939 | 85.83 |
| 75.5 | 5,458,027 | 21,642 | 0.0040 | 0.9960 | 85.30 |
| 76.5 | 5,974,029 | 20,825 | 0.0035 | 0.9965 | 84.97 |
| 77.5 | 6,286,816 | 29,968 | 0.0048 | 0.9952 | 84.67 |
| 78.5 | 6,136,612 | 18,847 | 0.0031 | 0.9969 | 84.27 |

## ACCOUNT 366 UNDERGROUND CONDUIT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1891-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 6,141,618 | 17,928 | 0.0029 | 0.9971 | 84.01 |
| 80.5 | 6,100,063 | 16,837 | 0.0028 | 0.9972 | 83.76 |
| 81.5 | 6,075,319 | 17,334 | 0.0029 | 0.9971 | 83.53 |
| 82.5 | 6,062,727 | 16,998 | 0.0028 | 0.9972 | 83.29 |
| 83.5 | 6,085,735 | 20,516 | 0.0034 | 0.9966 | 83.06 |
| 84.5 | 6,025,068 | 28,318 | 0.0047 | 0.9953 | 82.78 |
| 85.5 | 5,998,368 | 27,337 | 0.0046 | 0.9954 | 82.39 |
| 86.5 | 6,174,879 | 51,720 | 0.0084 | 0.9916 | 82.01 |
| 87.5 | 6,065,202 | 51,182 | 0.0084 | 0.9916 | 81.33 |
| 88.5 | 5,711,241 | 80,928 | 0.0142 | 0.9858 | 80.64 |
| 89.5 | 5,319,922 | 61,365 | 0.0115 | 0.9885 | 79.50 |
| 90.5 | 4,678,691 | 57,228 | 0.0122 | 0.9878 | 78.58 |
| 91.5 | 4,230,521 | 60,863 | 0.0144 | 0.9856 | 77.62 |
| 92.5 | 3,326,542 | 65,488 | 0.0197 | 0.9803 | 76.50 |
| 93.5 | 2,747,640 | 53,453 | 0.0195 | 0.9805 | 75.00 |
| 94.5 | 2,232,862 | 14,982 | 0.0067 | 0.9933 | 73.54 |
| 95.5 | 1,721,211 | 16,455 | 0.0096 | 0.9904 | 73.04 |
| 96.5 | 1,327,896 | 12,210 | 0.0092 | 0.9908 | 72.35 |
| 97.5 | 1,231,340 | 12,704 | 0.0103 | 0.9897 | 71.68 |
| 98.5 | 1,273,908 | 25,394 | 0.0199 | 0.9801 | 70.94 |
| 99.5 | 1,228,273 | 15,652 | 0.0127 | 0.9873 | 69.53 |
| 100.5 | 1,228,534 | 14,794 | 0.0120 | 0.9880 | 68.64 |
| 101.5 | 1,218,134 | 15,150 | 0.0124 | 0.9876 | 67.81 |
| 102.5 | 1,156,587 | 59,204 | 0.0512 | 0.9488 | 66.97 |
| 103.5 | 1,078,258 | 8,806 | 0.0082 | 0.9918 | 63.54 |
| 104.5 | 1,029,570 | 13,279 | 0.0129 | 0.9871 | 63.02 |
| 105.5 | 964,592 | 12,724 | 0.0132 | 0.9868 | 62.21 |
| 106.5 | 724,135 | 3,055 | 0.0042 | 0.9958 | 61.39 |
| 107.5 | 710,616 | 6,957 | 0.0098 | 0.9902 | 61.13 |
| 108.5 | 694,669 | 27,033 | 0.0389 | 0.9611 | 60.53 |
| 109.5 | 655,886 | 6,914 | 0.0105 | 0.9895 | 58.18 |
| 110.5 | 648,969 | 44,858 | 0.0691 | 0.9309 | 57.56 |
| 111.5 | 599,847 | 14,696 | 0.0245 | 0.9755 | 53.59 |
| 112.5 | 562,765 | 106,588 | 0.1894 | 0.8106 | 52.27 |
| 113.5 | 454,718 | 162,389 | 0.3571 | 0.6429 | 42.37 |
| 114.5 | 287,670 | 84,976 | 0.2954 | 0.7046 | 27.24 |
| 115.5 | 199,909 | 2,624 | 0.0131 | 0.9869 | 19.19 |
| 116.5 | 178,087 | 30,438 | 0.1709 | 0.8291 | 18.94 |
| 117.5 | 91,498 | 189 | 0.0021 | 0.9979 | 15.70 |
| 118.5 | 80,135 | 13,959 | 0.1742 | 0.8258 | 15.67 |

## DUQUESNE LIGHT COMPANY ACCOUNT 366 UNDERGROUND CONDUIT <br> ORIGINAL LIFE TABLE, CONT.

| PLACEMENT BAND 1891-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 119.5 | 64,833 | 26,298 | 0.4056 | 0.5944 | 12.94 |
| 120.5 | 17,601 |  | 0.0000 | 1.0000 | 7.69 |
| 121.5 | 15,340 |  | 0.0000 | 1.0000 | 7.69 |
| 122.5 | 10,730 |  | 0.0000 | 1.0000 | 7.69 |
| 123.5 | 2,282 |  | 0.0000 | 1.0000 | 7.69 |
| 124.5 | 2,282 |  | 0.0000 | 1.0000 | 7.69 |
| 125.5 | 2,282 |  | 0.0000 | 1.0000 | 7.69 |
| 126.5 | 2,282 |  | 0.0000 | 1.0000 | 7.69 |
| 127.5 | 2,282 |  | 0.0000 | 1.0000 | 7.69 |
| 128.5 |  |  |  |  | 7.69 |



ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1900-2019
EXPERIENCE BAND 1964-2019
\(\left.\begin{array}{cc}AGE AT \& EXPOSURES AT <br>
BEGIN OF \& BEGINNING OF <br>

INTERVAL \& AGE INTERVAL\end{array}\right]\)|  |  |
| :---: | :---: |
| 0.0 | $474,131,670$ |
| 0.5 | $451,211,220$ |
| 1.5 | $422,619,344$ |
| 2.5 | $395,173,383$ |
| 3.5 | $368,100,358$ |
| 4.5 | $345,120,877$ |
| 5.5 | $322,710,960$ |
| 6.5 | $299,661,510$ |
| 7.5 | $279,874,914$ |
| 8.5 | $262,998,984$ |
| 9.5 | $239,252,380$ |
| 10.5 | $218,923,513$ |
| 11.5 | $209,586,837$ |
| 12.5 | $199,622,781$ |
| 13.5 | $184,814,463$ |
| 14.5 | $168,730,948$ |
| 15.5 | $156,198,986$ |
| 16.5 | $148,848,728$ |
| 17.5 | $142,623,838$ |
| 18.5 | $138,407,291$ |
| 19.5 | $127,502,620$ |
| 20.5 | $119,228,858$ |
| 21.5 | $117,879,813$ |
| 22.5 | $113,932,011$ |
| 23.5 | $108,942,743$ |
| 24.5 | $105,293,620$ |
| 25.5 | $100,275,470$ |
| 26.5 | $95,205,839$ |
| 27.5 | $90,035,660$ |
| 28.5 | $84,193,804$ |
| 29.5 | $79,037,786$ |
| 30.5 | $74,441,439$ |
| 31.5 | $70,879,993$ |
| 32.5 | $67,779,366$ |
| 33.5 | $64,028,353$ |
| 34.5 | $59,707,277$ |
| 35.5 | $54,591,112$ |
| 36.5 | $52,186,755$ |
| 37.5 | $48,538,862$ |
| 38.5 | $46,708,077$ |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 236,974 | 0.0005 | 0.9995 | 100.00 |
| ---: | ---: | ---: | ---: |
| $2,076,635$ | 0.0046 | 0.9954 | 99.95 |
| $2,925,657$ | 0.0069 | 0.9931 | 99.49 |
| $2,759,439$ | 0.0070 | 0.9930 | 98.80 |
| $1,990,753$ | 0.0054 | 0.9946 | 98.11 |
| $2,175,787$ | 0.0063 | 0.9937 | 97.58 |
| $2,198,186$ | 0.0068 | 0.9932 | 96.97 |
| $2,606,915$ | 0.0087 | 0.9913 | 96.31 |
| $2,504,216$ | 0.0089 | 0.9911 | 95.47 |
| $2,360,826$ | 0.0090 | 0.9910 | 94.61 |
| $2,746,213$ | 0.0115 | 0.9885 | 93.76 |
| $1,497,069$ | 0.0068 | 0.9932 | 92.69 |
| $1,893,173$ | 0.0090 | 0.9910 | 92.05 |
| $2,010,295$ | 0.0101 | 0.9899 | 91.22 |
| $1,509,678$ | 0.0082 | 0.9918 | 90.30 |
| $1,626,602$ | 0.0096 | 0.9904 | 89.57 |
| $1,324,620$ | 0.0085 | 0.9915 | 88.70 |
| $1,465,605$ | 0.0098 | 0.9902 | 87.95 |
| $1,283,436$ | 0.0090 | 0.9910 | 87.08 |
| $1,425,685$ | 0.0103 | 0.9897 | 86.30 |
| 962,955 | 0.0076 | 0.9924 | 85.41 |
| $1,089,826$ | 0.0091 | 0.9909 | 84.77 |
| 945,163 | 0.0080 | 0.9920 | 83.99 |
| $1,122,223$ | 0.0098 | 0.9902 | 83.32 |
| $1,005,853$ | 0.0092 | 0.9908 | 82.50 |
| $1,383,382$ | 0.0131 | 0.9869 | 81.74 |
| 774,032 | 0.0077 | 0.9923 | 80.66 |
| 817,040 | 0.0086 | 0.9914 | 80.04 |
| 846,444 | 0.0094 | 0.9906 | 79.35 |
| 700,581 | 0.0083 | 0.9917 | 78.61 |
| $1,087,621$ | 0.0138 | 0.9862 | 77.95 |
| 615,541 | 0.0083 | 0.9917 | 76.88 |
| 659,472 | 0.0093 | 0.9907 | 76.24 |
| 706,456 | 0.0104 | 0.9896 | 75.53 |
| 708,049 | 0.0111 | 0.9889 | 74.75 |
| 891,656 | 0.0149 | 0.9851 | 73.92 |
| 735,561 | 0.0135 | 0.9865 | 72.82 |
| 701,956 | 0.0135 | 0.9865 | 71.84 |
| 695,680 | 0.0143 | 0.9857 | 70.87 |
| 769,129 | 0.0165 | 0.9835 | 69.85 |
| 1, |  |  |  |

## ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1900-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 43,180,498 | 805,045 | 0.0186 | 0.9814 | 68.70 |
| 40.5 | 38,863,978 | 824,478 | 0.0212 | 0.9788 | 67.42 |
| 41.5 | 35,131,323 | 900,600 | 0.0256 | 0.9744 | 65.99 |
| 42.5 | 31,303,998 | 682,047 | 0.0218 | 0.9782 | 64.30 |
| 43.5 | 27,443,984 | 604,949 | 0.0220 | 0.9780 | 62.90 |
| 44.5 | 23,740,153 | 1,064,987 | 0.0449 | 0.9551 | 61.51 |
| 45.5 | 20,587,256 | 970,429 | 0.0471 | 0.9529 | 58.75 |
| 46.5 | 17,994,474 | 841,467 | 0.0468 | 0.9532 | 55.98 |
| 47.5 | 15,369,689 | 829,749 | 0.0540 | 0.9460 | 53.37 |
| 48.5 | 11,882,716 | 1,323,881 | 0.1114 | 0.8886 | 50.49 |
| 49.5 | 9,009,234 | 574,515 | 0.0638 | 0.9362 | 44.86 |
| 50.5 | 7,728,215 | 640,640 | 0.0829 | 0.9171 | 42.00 |
| 51.5 | 6,693,461 | 454,833 | 0.0680 | 0.9320 | 38.52 |
| 52.5 | 5,802,734 | 629,897 | 0.1086 | 0.8914 | 35.90 |
| 53.5 | 4,898,028 | 233,974 | 0.0478 | 0.9522 | 32.00 |
| 54.5 | 4,533,764 | 761,708 | 0.1680 | 0.8320 | 30.47 |
| 55.5 | 3,761,695 | 311,541 | 0.0828 | 0.9172 | 25.35 |
| 56.5 | 3,452,649 | 179,556 | 0.0520 | 0.9480 | 23.25 |
| 57.5 | 3,275,479 | 170,593 | 0.0521 | 0.9479 | 22.05 |
| 58.5 | 3,107,514 | 155,049 | 0.0499 | 0.9501 | 20.90 |
| 59.5 | 2,954,065 | 58,841 | 0.0199 | 0.9801 | 19.85 |
| 60.5 | 2,894,278 | 32,028 | 0.0111 | 0.9889 | 19.46 |
| 61.5 | 2,858,539 | 45,241 | 0.0158 | 0.9842 | 19.24 |
| 62.5 | 2,800,722 | 84,573 | 0.0302 | 0.9698 | 18.94 |
| 63.5 | 2,719,509 | 187,042 | 0.0688 | 0.9312 | 18.37 |
| 64.5 | 2,528,484 | 156,559 | 0.0619 | 0.9381 | 17.10 |
| 65.5 | 2,367,325 | 82,997 | 0.0351 | 0.9649 | 16.05 |
| 66.5 | 2,272,184 | 78,088 | 0.0344 | 0.9656 | 15.48 |
| 67.5 | 2,194,427 | 24,354 | 0.0111 | 0.9889 | 14.95 |
| 68.5 | 2,171,734 | 71,453 | 0.0329 | 0.9671 | 14.78 |
| 69.5 | 2,106,249 | 32,875 | 0.0156 | 0.9844 | 14.30 |
| 70.5 | 2,079,074 | 27,555 | 0.0133 | 0.9867 | 14.07 |
| 71.5 | 2,058,395 | 96,207 | 0.0467 | 0.9533 | 13.89 |
| 72.5 | 1,980,821 | 62,666 | 0.0316 | 0.9684 | 13.24 |
| 73.5 | 1,931,616 | 92,952 | 0.0481 | 0.9519 | 12.82 |
| 74.5 | 1,846,693 | 137,562 | 0.0745 | 0.9255 | 12.20 |
| 75.5 | 1,719,042 | 885,660 | 0.5152 | 0.4848 | 11.29 |
| 76.5 | 845,207 | 726,113 | 0.8591 | 0.1409 | 5.48 |
| 77.5 | 118,922 | 23,752 | 0.1997 | 0.8003 | 0.77 |
| 78.5 | 95,170 | 3,582 | 0.0376 | 0.9624 | 0.62 |

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | NND 1900-2019 |  | EXPE | ENCE BA | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 91,587 | 390 | 0.0043 | 0.9957 | 0.59 |
| 80.5 | 91,197 | 1,207 | 0.0132 | 0.9868 | 0.59 |
| 81.5 | 89,990 | 1,890 | 0.0210 | 0.9790 | 0.58 |
| 82.5 | 88,100 | 25,657 | 0.2912 | 0.7088 | 0.57 |
| 83.5 | 62,443 | 2,707 | 0.0433 | 0.9567 | 0.41 |
| 84.5 | 59,736 | 3,855 | 0.0645 | 0.9355 | 0.39 |
| 85.5 | 55,882 | 22,808 | 0.4081 | 0.5919 | 0.36 |
| 86.5 | 32,968 | 513 | 0.0156 | 0.9844 | 0.21 |
| 87.5 | 32,455 | 3,800 | 0.1171 | 0.8829 | 0.21 |
| 88.5 | 28,686 | 4,850 | 0.1691 | 0.8309 | 0.19 |
| 89.5 | 23,836 | 19,902 | 0.8349 | 0.1651 | 0.15 |
| 90.5 | 3,934 |  | 0.0000 | 1.0000 | 0.03 |
| 91.5 | 3,934 | 747 | 0.1898 | 0.8102 | 0.03 |
| 92.5 | 3,188 | 1,094 | 0.3433 | 0.6567 | 0.02 |
| 93.5 | 2,093 |  | 0.0000 | 1.0000 | 0.01 |
| 94.5 | 2,093 |  | 0.0000 | 1.0000 | 0.01 |
| 95.5 | 1,927 |  | 0.0000 | 1.0000 | 0.01 |
| 96.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 97.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 98.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 99.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 100.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 101.5 | 1,890 |  | 0.0000 | 1.0000 | 0.01 |
| 102.5 | 1,890 | 181 | 0.0955 | 0.9045 | 0.01 |
| 103.5 | 1,710 |  | 0.0000 | 1.0000 | 0.01 |
| 104.5 | 1,431 | 661 | 0.4618 | 0.5382 | 0.01 |
| 105.5 | 770 |  | 0.0000 | 1.0000 | 0.01 |
| 106.5 | 770 |  | 0.0000 | 1.0000 | 0.01 |
| 107.5 | 770 |  | 0.0000 | 1.0000 | 0.01 |
| 108.5 | 770 |  | 0.0000 | 1.0000 | 0.01 |
| 109.5 | 644 |  | 0.0000 | 1.0000 | 0.01 |
| 110.5 | 644 |  | 0.0000 | 1.0000 | 0.01 |
| 111.5 | 644 |  | 0.0000 | 1.0000 | 0.01 |
| 112.5 | 298 |  | 0.0000 | 1.0000 | 0.01 |
| 113.5 | 298 |  | 0.0000 | 1.0000 | 0.01 |
| 114.5 | 298 |  | 0.0000 | 1.0000 | 0.01 |
| 115.5 | 298 |  | 0.0000 | 1.0000 | 0.01 |
| 116.5 | 298 |  | 0.0000 | 1.0000 | 0.01 |
| 117.5 |  |  |  |  | 0.01 |

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1902-2019
EXPERIENCE BAND 2000-2019

| Age AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 343,425,280 |
| 0.5 | 328,540,471 |
| 1.5 | 300,959,214 |
| 2.5 | 275,704,078 |
| 3.5 | 252,834,506 |
| 4.5 | 233,483,123 |
| 5.5 | 216,241,093 |
| 6.5 | 198,708,937 |
| 7.5 | 184,360,138 |
| 8.5 | 172,956,752 |
| 9.5 | 154,664,034 |
| 10.5 | 138,444,825 |
| 11.5 | 132,464,654 |
| 12.5 | 125,856,733 |
| 13.5 | 115,524,456 |
| 14.5 | 104,030,544 |
| 15.5 | 97,717,523 |
| 16.5 | 93,330,360 |
| 17.5 | 91,326,760 |
| 18.5 | 89,529,676 |
| 19.5 | 83,397,812 |
| 20.5 | 79,652,269 |
| 21.5 | 82,014,844 |
| 22.5 | 81,756,758 |
| 23.5 | 80,932,850 |
| 24.5 | 81,232,018 |
| 25.5 | 79,412,229 |
| 26.5 | 76,510,033 |
| 27.5 | 73,970,672 |
| 28.5 | 71,784,350 |
| 29.5 | 68,796,948 |
| 30.5 | 65,593,089 |
| 31.5 | 62,660,685 |
| 32.5 | 60,400,841 |
| 33.5 | 56,903,086 |
| 34.5 | 52,991,279 |
| 35.5 | 47,699,351 |
| 36.5 | 45,143,146 |
| 37.5 | 41,432,693 |
| 38.5 | 39,881,707 |

RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 191,833 | 0.0006 | 0.9994 | 100.00 |
| ---: | ---: | ---: | ---: |
| $2,002,387$ | 0.0061 | 0.9939 | 99.94 |
| $2,662,697$ | 0.0088 | 0.9912 | 99.34 |
| $2,038,281$ | 0.0074 | 0.9926 | 98.46 |
| $1,276,375$ | 0.0050 | 0.9950 | 97.73 |
| $1,317,374$ | 0.0056 | 0.9944 | 97.23 |
| $1,449,324$ | 0.0067 | 0.9933 | 96.69 |
| $1,785,600$ | 0.0090 | 0.9910 | 96.04 |
| $1,619,380$ | 0.0088 | 0.9912 | 95.18 |
| $1,590,825$ | 0.0092 | 0.9908 | 94.34 |
| $1,689,097$ | 0.0109 | 0.9891 | 93.47 |
| 847,209 | 0.0061 | 0.9939 | 92.45 |
| $1,217,739$ | 0.0092 | 0.9908 | 91.88 |
| 987,717 | 0.0078 | 0.9922 | 91.04 |
| 907,716 | 0.0079 | 0.9921 | 90.33 |
| 777,689 | 0.0075 | 0.9925 | 89.62 |
| 843,726 | 0.0086 | 0.9914 | 88.95 |
| 946,680 | 0.0101 | 0.9899 | 88.18 |
| 789,407 | 0.0086 | 0.9914 | 87.28 |
| 672,357 | 0.0075 | 0.9925 | 86.53 |
| 582,256 | 0.0070 | 0.9930 | 85.88 |
| 680,570 | 0.0085 | 0.9915 | 85.28 |
| 598,757 | 0.0073 | 0.9927 | 84.55 |
| 701,868 | 0.0086 | 0.9914 | 83.93 |
| 752,568 | 0.0093 | 0.9907 | 83.21 |
| 725,668 | 0.0089 | 0.9911 | 82.44 |
| 568,100 | 0.0072 | 0.9928 | 81.70 |
| 544,575 | 0.0071 | 0.9929 | 81.12 |
| 493,822 | 0.0067 | 0.9933 | 80.54 |
| 538,165 | 0.0075 | 0.9925 | 80.00 |
| 813,423 | 0.0118 | 0.9882 | 79.40 |
| 468,279 | 0.0071 | 0.9929 | 78.46 |
| 559,846 | 0.0089 | 0.9911 | 77.90 |
| 606,491 | 0.0100 | 0.9900 | 77.21 |
| 624,765 | 0.0110 | 0.9890 | 76.43 |
| 795,775 | 0.0150 | 0.9850 | 75.59 |
| 655,108 | 0.0137 | 0.9863 | 74.46 |
| 626,742 | 0.0139 | 0.9861 | 73.44 |
| 612,454 | 0.0148 | 0.9852 | 72.42 |
| 681,772 | 0.0171 | 0.9829 | 71.35 |
| 1,7 |  |  |  |

## ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

## ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1902-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |

40.5
41.5
42.5
43.5
44.5
45.5
46.5
47.5
48.5
49.5
50.5
51.5
52.5
53.5
54.5
55.5
56.5
57.5
58.5
59.5
60.5
61.5
62.5
63.5
64.5
65.5
66.5
67.5
68.5
69.5
70.5
71.5
72.5
73.5
74.5
75.5
76.5
77.5
78.5

36,215,020
32,141,675
28,676,231
25,037,849
21,482,574
$18,151,603$
$15,363,652$
13,150,942
10,749,292
7,490,003
4,782,238
3,718,656
2,936,848
2,235,806
1,476,819
$1,243,350$
607,320
548,208
491,990
474,926
419,244
430,519
421,035
449,771
427,097
319,316
221,674
200,736
211,459
310,196
362,278
483,277
820,472
1,007,960
1,127,019
1,268,708
1,489,117
725,352
2,064
1,970
RETIREMENTS
DURING AGE
INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :--- |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 720,506 | 0.0199 | 0.9801 | 70.13 |
| ---: | ---: | ---: | ---: |
| 738,933 | 0.0230 | 0.9770 | 68.73 |
| 828,440 | 0.0289 | 0.9711 | 67.15 |
| 605,500 | 0.0242 | 0.9758 | 65.21 |
| 538,991 | 0.0251 | 0.9749 | 63.63 |
| 975,389 | 0.0537 | 0.9463 | 62.04 |
| 878,151 | 0.0572 | 0.9428 | 58.70 |
| 739,091 | 0.0562 | 0.9438 | 55.35 |
| 740,203 | 0.0689 | 0.9311 | 52.24 |
| $1,204,839$ | 0.1609 | 0.8391 | 48.64 |
| 407,291 | 0.0852 | 0.9148 | 40.82 |
| 447,442 | 0.1203 | 0.8797 | 37.34 |
| 270,556 | 0.0921 | 0.9079 | 32.85 |
| 470,191 | 0.2103 | 0.7897 | 29.82 |
| 125,220 | 0.0848 | 0.9152 | 23.55 |
| 644,329 | 0.5182 | 0.4818 | 21.55 |
| 176,138 | 0.2900 | 0.7100 | 10.38 |
| 127,230 | 0.2321 | 0.7679 | 7.37 |
| 110,635 | 0.2249 | 0.7751 | 5.66 |
| 67,045 | 0.1412 | 0.8588 | 4. |


| 67,045 | 0.1412 | 0.8588 | 4.39 |
| :--- | :--- | :--- | :--- |


| 14.685 | 0.0350 | 0.9650 | 3.77 |
| :--- | :--- | :--- | :--- |


| 13.867 | 0.0322 | 0.9678 | 3.64 |
| :--- | :--- | :--- | :--- |
| 21.517 | 0.0511 | 0.9489 | 3.52 |


| 49,843 | 0.1108 | 0.8892 | 3.34 |
| :--- | :--- | :--- | :--- |


| 121,689 | 0.2849 | 0.7151 | 2.97 |
| :--- | :--- | :--- | :--- |

$127.857 \quad 0.4004 \quad 0.5996 \quad 2.12$
$18.486 \quad 0.0834 \quad 0.9166 \quad 1.27$

| 30,811 | 0.1535 | 0.8465 | 1.17 |
| :--- | :--- | :--- | :--- |

$14,1650.0670 \quad 0.9330 \quad 0.99$

| 63.798 | 0.2057 | 0.7943 | 0.92 |
| :--- | :--- | :--- | :--- |


| 23.926 | 0.0660 | 0.9340 | 0.73 |
| :--- | :--- | :--- | :--- |

$18,302 \quad 0.0379 \quad 0.9621 \quad 0.68$

| 79.689 | 0.0971 | 0.9029 | 0.66 |
| :--- | :--- | :--- | :--- |


| 47.117 | 0.0467 | 0.9533 | 0.59 |
| :--- | :--- | :--- | :--- |


| 87,124 | 0.0773 | 0.9227 | 0.57 |
| :--- | :--- | :--- | :--- |


| 137.422 | 0.1083 | 0.8917 | 0.52 |
| :--- | :--- | :--- | :--- |

$885,091 \quad 0.5944 \quad 0.4056 \quad 0.47$
$\begin{array}{llll}723,116 & 0.9969 & 0.0031 & 0.19\end{array}$
$94 \quad 0.0457 \quad 0.9543 \quad 0.00$
0.00

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | AND 1902-2019 |  | EXPE | IENCE BA | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 1,970 |  | 0.0000 | 1.0000 | 0.00 |
| 80.5 | 1,970 | 255 | 0.1297 | 0.8703 | 0.00 |
| 81.5 | 1,714 | 292 | 0.1702 | 0.8298 | 0.00 |
| 82.5 | 1,422 |  | 0.0000 | 1.0000 | 0.00 |
| 83.5 | 1,422 | 462 | 0.3245 | 0.6755 | 0.00 |
| 84.5 | 5,371 | 111 | 0.0206 | 0.9794 | 0.00 |
| 85.5 | 5,261 |  | 0.0000 | 1.0000 | 0.00 |
| 86.5 | 5,155 |  | 0.0000 | 1.0000 | 0.00 |
| 87.5 | 5,155 | 535 | 0.1038 | 0.8962 | 0.00 |
| 88.5 | 4,620 | 6 | 0.0014 | 0.9986 | 0.00 |
| 89.5 | 20,616 | 19,827 | 0.9617 | 0.0383 | 0.00 |
| 90.5 | 789 |  | 0.0000 | 1.0000 | 0.00 |
| 91.5 | 789 |  | 0.0000 | 1.0000 | 0.00 |
| 92.5 | 1,134 |  | 0.0000 | 1.0000 | 0.00 |
| 93.5 | 1,134 |  | 0.0000 | 1.0000 | 0.00 |
| 94.5 | 1,134 |  | 0.0000 | 1.0000 | 0.00 |
| 95.5 | 968 |  | 0.0000 | 1.0000 | 0.00 |
| 96.5 | 931 |  | 0.0000 | 1.0000 | 0.00 |
| 97.5 | 1,890 |  | 0.0000 | 1.0000 | 0.00 |
| 98.5 | 1,890 |  | 0.0000 | 1.0000 | 0.00 |
| 99.5 | 1,890 |  | 0.0000 | 1.0000 | 0.00 |
| 100.5 | 1,890 |  | 0.0000 | 1.0000 | 0.00 |
| 101.5 | 1,890 |  | 0.0000 | 1.0000 | 0.00 |
| 102.5 | 1,890 | 181 | 0.0955 | 0.9045 | 0.00 |
| 103.5 | 1,710 |  | 0.0000 | 1.0000 | 0.00 |
| 104.5 | 1,431 | 661 | 0.4618 | 0.5382 | 0.00 |
| 105.5 | 770 |  | 0.0000 | 1.0000 | 0.00 |
| 106.5 | 770 |  | 0.0000 | 1.0000 | 0.00 |
| 107.5 | 770 |  | 0.0000 | 1.0000 | 0.00 |
| 108.5 | 770 |  | 0.0000 | 1.0000 | 0.00 |
| 109.5 | 644 |  | 0.0000 | 1.0000 | 0.00 |
| 110.5 | 644 |  | 0.0000 | 1.0000 | 0.00 |
| 111.5 | 644 |  | 0.0000 | 1.0000 | 0.00 |
| 112.5 | 298 |  | 0.0000 | 1.0000 | 0.00 |
| 113.5 | 298 |  | 0.0000 | 1.0000 | 0.00 |
| 114.5 | 298 |  | 0.0000 | 1.0000 | 0.00 |
| 115.5 | 298 |  | 0.0000 | 1.0000 | 0.00 |
| 116.5 | 298 |  | 0.0000 | 1.0000 | 0.00 |
| 117.5 |  |  |  |  | 0.00 |

DUQUESNE LIGHT COMPANY
ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD
ORIGINAL AND SMOOTH SURVIVOR CURVES


| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 274,083,182 |
| 0.5 | 262,573,449 |
| 1.5 | 252,630,552 |
| 2.5 | 243,933,768 |
| 3.5 | 236,378,094 |
| 4.5 | 227,554,697 |
| 5.5 | 218,029,094 |
| 6.5 | 207,028,325 |
| 7.5 | 192,935,682 |
| 8.5 | 183,878,057 |
| 9.5 | 172,234,618 |
| 10.5 | 165,114,914 |
| 11.5 | 157,724,085 |
| 12.5 | 150,098,093 |
| 13.5 | 141,330,078 |
| 14.5 | 119,363,603 |
| 15.5 | 108,044,297 |
| 16.5 | 104,712,408 |
| 17.5 | 98,498,808 |
| 18.5 | 94,935,811 |
| 19.5 | 91,492,685 |
| 20.5 | 86,255,988 |
| 21.5 | 85,458,114 |
| 22.5 | 84,241,693 |
| 23.5 | 82,479,191 |
| 24.5 | 79,717,159 |
| 25.5 | 77,168,218 |
| 26.5 | 74,215,863 |
| 27.5 | 71,165,940 |
| 28.5 | 66,660,191 |
| 29.5 | 61,382,407 |
| 30.5 | 55,992,014 |
| 31.5 | 51,574,137 |
| 32.5 | 47,595,660 |
| 33.5 | 43,455,830 |
| 34.5 | 38,085,799 |
| 35.5 | 33,154,544 |
| 36.5 | 30,195,191 |
| 37.5 | 28,590,987 |
| 38.5 | 26,537,131 |

## RETIREMENTS INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL
$1,0028540.0037-100.00$
$1,014,321 \quad 0.0039 \quad 0.9961 \quad 99.63$
$1,229,150 \quad 0.0049 \quad 0.9951 \quad 99.25$
$1,567,543 \quad 0.0064 \quad 0.9936 \quad 98.77$
$1,740,460 \quad 0.0074 \quad 0.9926 \quad 98.13$
$1,705,357 \quad 0.0075 \quad 0.9925 \quad 97.41$
$\begin{array}{llll}1,789,879 & 0.0082 & 0.9918 & 96.68\end{array}$
$1,458,408 \quad 0.0070 \quad 0.9930 \quad 95.89$
$1,448,393 \quad 0.0075 \quad 0.9925 \quad 95.21$
$1,628,009 \quad 0.0089 \quad 0.9911 \quad 94.50$
$\begin{array}{llll}1,676,104 & 0.0097 & 0.9903 & 93.66\end{array}$
$1,815,004 \quad 0.0110 \quad 0.9890 \quad 92.75$
$\begin{array}{llll}1.944,662 & 0.0123 & 0.9877 & 91.73\end{array}$
$\begin{array}{llll}1,991,923 & 0.0133 & 0.9867 & 90.60\end{array}$
$1,845,880 \quad 0.0131 \quad 0.9869 \quad 89.39$
$1,965,877 \quad 0.0165 \quad 0.9835 \quad 88.23$
$2,104,156 \quad 0.0195 \quad 0.9805 \quad 86.77$
$\begin{array}{llll}1,751,406 & 0.0167 & 0.9833 & 85.08\end{array}$
$1,608,552 \quad 0.0163 \quad 0.9837 \quad 83.66$
$1,642.227 \quad 0.0173 \quad 0.9827 \quad 82.29$
$\begin{array}{llll}1,213,656 & 0.0133 & 0.9867 & 80.87\end{array}$
$\begin{array}{llll}1,079,238 & 0.0125 & 0.9875 & 79.80\end{array}$

| 941,864 | 0.0110 | 0.9890 | 78.80 |
| :--- | :--- | :--- | :--- |

$1,165,645 \quad 0.0138 \quad 0.9862 \quad 77.93$
$1,234,778 \quad 0.0150 \quad 0.9850 \quad 76.85$
$\begin{array}{llll}1,178,668 & 0.0148 & 0.9852 & 75.70\end{array}$
$1,152,638 \quad 0.0149 \quad 0.9851 \quad 74.58$
$\begin{array}{llll}1,214,838 & 0.0164 & 0.9836 & 73.47\end{array}$
$\begin{array}{llll}1,377,491 & 0.0194 & 0.9806 & 72.27\end{array}$
$\begin{array}{llll}1,577,315 & 0.0237 & 0.9763 & 70.87\end{array}$
$\begin{array}{llll}1,186,418 & 0.0193 & 0.9807 & 69.19\end{array}$
$\begin{array}{llll}1,733.370 & 0.0310 & 0.9690 & 67.85\end{array}$
$\begin{array}{llll}1,415,446 & 0.0274 & 0.9726 & 65.75\end{array}$
$\begin{array}{llll}1,941,117 & 0.0408 & 0.9592 & 63.95\end{array}$
$2,918,357 \quad 0.0672 \quad 0.9328 \quad 61.34$
$2,531,579 \quad 0.0665 \quad 0.9335 \quad 57.22$
$1,155,919 \quad 0.0349 \quad 0.9651 \quad 53.42$
$860,123 \quad 0.0285 \quad 0.9715 \quad 51.55$
$\begin{array}{llll}761,687 & 0.0266 & 0.9734 & 50.09\end{array}$
$\begin{array}{llll}637,790 & 0.0240 & 0.9760 & 48.75\end{array}$

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1901-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |

39.5
40.5
41.5
42.5
43.5
44.5
45.5
46.5
47.5
48.5
49.5
50.5
51.5
52.5
53.5
54.5
55.5
56.5
57.5
58.5
59.5
60.5
61.5
62.5
63.5
64.5
65.5
66.5
67.5
68.5
69.5
70.5
71.5
72.5
73.5
74.5
75.5
76.5
77.5
78.5

25,144,452
23,344,542
21,227,035
19,014,017
17,746,229
$16,656,929$
15,731,304
14, 635,027
12,991,422
12,457,796
10,656,128
9,956,346
9,425,750
8,685,561
8,056,209
7,448,301
6,863,077
6,149,445
5,278,264
4,555,440
4,076,131
3,636,152
3,175,734
2,471,553
2,305,460
1,923,598
1,811,103
1,687,903
1,307,114
1,066,748
945,720
870,645
847,055
820,045
841,002
824,049
783,701
679,097
566,454
448,249
RETIREMENTS
DURING AGE
INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL

| 610,787 | 0.0243 | 0.9757 | 47.58 |
| ---: | ---: | ---: | ---: |
| 635,304 | 0.0272 | 0.9728 | 46.42 |
| 645,204 | 0.0304 | 0.9696 | 45.16 |
| 485,389 | 0.0255 | 0.9745 | 43.79 |
| 553,979 | 0.0312 | 0.9688 | 42.67 |
| 443,979 | 0.0267 | 0.9733 | 41.34 |
| 554,546 | 0.0353 | 0.9647 | 40.24 |
| 664,708 | 0.0454 | 0.9546 | 38.82 |
| 511,439 | 0.0394 | 0.9606 | 37.06 |
| 479,830 | 0.0385 | 0.9615 | 35.60 |
| 432,554 | 0.0406 | 0.9594 | 34.23 |
| 507,032 | 0.0509 | 0.9491 | 32.84 |
| 621,118 | 0.0659 | 0.9341 | 31.16 |
| 480,653 | 0.0553 | 0.9447 | 29.11 |
| 468,826 | 0.0582 | 0.9418 | 27.50 |
| 345,073 | 0.0463 | 0.9537 | 25.90 |
| 323,722 | 0.0472 | 0.9528 | 24.70 |
| 319,961 | 0.0520 | 0.9480 | 23.53 |
| 382,873 | 0.0725 | 0.9275 | 22.31 |
| 253,628 | 0.0557 | 0.9443 | 20.69 |
| 244,629 | 0.0600 | 0.9400 | 19.54 |
| 181,251 | 0.0498 | 0.9502 | 18.37 |
| 126,887 | 0.0400 | 0.9600 | 17.45 |
| 131,140 | 0.0531 | 0.9469 | 16.75 |
| 138,502 | 0.0601 | 0.9399 | 15.86 |
| 120,579 | 0.0627 | 0.9373 | 14.91 |
| 118,169 | 0.0652 | 0.9348 | 13.98 |
| 129,967 | 0.0770 | 0.9230 | 13.07 |
| 106,941 | 0.0818 | 0.9182 | 12.06 |
| 78,297 | 0.0734 | 0.9266 | 11.07 |
| 56,455 | 0.0597 | 0.9403 | 10.26 |
| 43,837 | 0.0504 | 0.9496 | 9.65 |
| 48,400 | 0.0571 | 0.9429 | 9.16 |
| 42,262 | 0.0515 | 0.9485 | 8.64 |
| 87,240 | 0.1037 | 0.8963 | 8.19 |
| 67,310 | 0.0817 | 0.9183 | 7.34 |
| 117,222 | 0.1496 | 0.8504 | 6.74 |
| 133,183 | 0.1961 | 0.8039 | 5.73 |
| 123,729 | 0.2184 | 0.7816 | 4.61 |
| 86,619 | 0.1932 | 0.8068 | 3.60 |
|  |  |  |  |

DUQUESNE LIGHT COMPANY

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD

ORIGINAL LIFE TABLE, CONT.

| PLACEMENT BAND 1901-2019 |  |  | EXPERIENCE BAND 1964-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 367,195 | 51,399 | 0.1400 | 0.8600 | 2.91 |
| 80.5 | 321,758 | 43,191 | 0.1342 | 0.8658 | 2.50 |
| 81.5 | 283,707 | 43,378 | 0.1529 | 0.8471 | 2.16 |
| 82.5 | 243,864 | 30,470 | 0.1249 | 0.8751 | 1.83 |
| 83.5 | 215,100 | 19,297 | 0.0897 | 0.9103 | 1.60 |
| 84.5 | 198,386 | 29,139 | 0.1469 | 0.8531 | 1.46 |
| 85.5 | 170,788 | 53,444 | 0.3129 | 0.6871 | 1.25 |
| 86.5 | 117,617 | 25,631 | 0.2179 | 0.7821 | 0.86 |
| 87.5 | 92,094 | 28,063 | 0.3047 | 0.6953 | 0.67 |
| 88.5 | 65,135 | 32,098 | 0.4928 | 0.5072 | 0.47 |
| 89.5 | 33,036 | 10,703 | 0.3240 | 0.6760 | 0.24 |
| 90.5 | 22,346 | 4,342 | 0.1943 | 0.8057 | 0.16 |
| 91.5 | 18,518 | 3,470 | 0.1874 | 0.8126 | 0.13 |
| 92.5 | 15,048 | 2,090 | 0.1389 | 0.8611 | 0.10 |
| 93.5 | 13,515 | 2,309 | 0.1708 | 0.8292 | 0.09 |
| 94.5 | 11,207 | 4,670 | 0.4167 | 0.5833 | 0.07 |
| 95.5 | 6,537 | 4,021 | 0.6151 | 0.3849 | 0.04 |
| 96.5 | 2,516 | 1,358 | 0.5399 | 0.4601 | 0.02 |
| 97.5 | 1,158 | 800 | 0.6909 | 0.3091 | 0.01 |
| 98.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 99.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 100.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 101.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 102.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 103.5 | 374 | 57 | 0.1515 | 0.8485 | 0.00 |
| 104.5 | 317 |  | 0.0000 | 1.0000 | 0.00 |
| 105.5 | 317 | 16 | 0.0506 | 0.9494 | 0.00 |
| 106.5 | 301 | 301 | 1.0000 |  | 0.00 |
| 107.5 |  |  |  |  |  |


| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 206,535,981 |
| 0.5 | 199,506,586 |
| 1.5 | 188,340,794 |
| 2.5 | 178,768,853 |
| 3.5 | 169,821,329 |
| 4.5 | 161,750,792 |
| 5.5 | 152,320,607 |
| 6.5 | 142,457,599 |
| 7.5 | 129,283,786 |
| 8.5 | 122,926,383 |
| 9.5 | 113,944,594 |
| 10.5 | 110,635,259 |
| 11.5 | 105,577,535 |
| 12.5 | 101,092,099 |
| 13.5 | 94,634,642 |
| 14.5 | 75,406,096 |
| 15.5 | 66,377,436 |
| 16.5 | 65,028,517 |
| 17.5 | 59,721,888 |
| 18.5 | 58,192,932 |
| 19.5 | 55,978,587 |
| 20.5 | 52,309,134 |
| 21.5 | 53,491,772 |
| 22.5 | 54,448,947 |
| 23.5 | 54,605,756 |
| 24.5 | 53,887,962 |
| 25.5 | 54,402,329 |
| 26.5 | 53,674,371 |
| 27.5 | 52,568,276 |
| 28.5 | 49,505,161 |
| 29.5 | 46,524,800 |
| 30.5 | 42,611,876 |
| 31.5 | 38,569,021 |
| 32.5 | 35,347,579 |
| 33.5 | 31,948,862 |
| 34.5 | 27,187,087 |
| 35.5 | 22,807,138 |
| 36.5 | 20,433,763 |
| 37.5 | 19,632,118 |
| 38.5 | 18,325,749 |

## RETIREMENTS INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL

| 292,237 | 0.0014 | 0.9986 | 100.00 |
| ---: | ---: | ---: | ---: |
| 631,756 | 0.0032 | 0.9968 | 99.86 |
| 972,484 | 0.0052 | 0.9948 | 99.54 |
| $1,239,354$ | 0.0069 | 0.9931 | 99.03 |
| $1,520,210$ | 0.0090 | 0.9910 | 98.34 |
| $1,414,054$ | 0.0087 | 0.9913 | 97.46 |
| $1,335,029$ | 0.0088 | 0.9912 | 96.61 |
| $1,219,260$ | 0.0086 | 0.9914 | 95.76 |
| $1,108,443$ | 0.0086 | 0.9914 | 94.94 |
| $1,321,772$ | 0.0108 | 0.9892 | 94.13 |
| $1,400,322$ | 0.0123 | 0.9877 | 93.12 |
| $1,524,220$ | 0.0138 | 0.9862 | 91.97 |
| $1,559,087$ | 0.0148 | 0.9852 | 90.71 |
| $1,622,336$ | 0.0160 | 0.9840 | 89.37 |
| $1,492,445$ | 0.0158 | 0.9842 | 87.93 |
| $1,609,013$ | 0.0213 | 0.9787 | 86.55 |
| $1,657,572$ | 0.0250 | 0.9750 | 84.70 |
| $1,405,765$ | 0.0216 | 0.9784 | 82.58 |
| $1,272,557$ | 0.0213 | 0.9787 | 80.80 |
| $1,259,007$ | 0.0216 | 0.9784 | 79.08 |
| 873,012 | 0.0156 | 0.9844 | 77.37 |
| 710,166 | 0.0136 | 0.9864 | 76.16 |
| 605,976 | 0.0113 | 0.9887 | 75.13 |
| 824,596 | 0.0151 | 0.9849 | 74.27 |
| 937,484 | 0.0172 | 0.9828 | 73.15 |
| 641,313 | 0.0119 | 0.9881 | 71.89 |
| 852,738 | 0.0157 | 0.9843 | 71.04 |
| 943,658 | 0.0176 | 0.9824 | 69.92 |
| 899,189 | 0.0171 | 0.9829 | 68.69 |
| 979,041 | 0.0198 | 0.9802 | 67.52 |
| 973,306 | 0.0209 | 0.9791 | 66.18 |
| $1,509,964$ | 0.0354 | 0.9646 | 64.80 |
| $1,251,162$ | 0.0324 | 0.9676 | 62.50 |
| $1,756,539$ | 0.0497 | 0.9503 | 60.48 |
| $2,746,393$ | 0.0860 | 0.9140 | 57.47 |
| $2,365,270$ | 0.0870 | 0.9130 | 52.53 |
| 989,896 | 0.0434 | 0.9566 | 47.96 |
| 680,404 | 0.0333 | 0.9667 | 45.88 |
| 520,506 | 0.0265 | 0.9735 | 44.35 |
| 460,730 | 0.0251 | 0.9749 | 43.18 |
| 1,70 |  |  |  |

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1901-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 17,561,605 | 449,319 | 0.0256 | 0.9744 | 42.09 |
| 40.5 | 16,256,339 | 489,725 | 0.0301 | 0.9699 | 41.01 |
| 41.5 | 14,699,757 | 510,009 | 0.0347 | 0.9653 | 39.78 |
| 42.5 | 13,154,124 | 361,766 | 0.0275 | 0.9725 | 38.40 |
| 43.5 | 12,214,868 | 420,667 | 0.0344 | 0.9656 | 37.34 |
| 44.5 | 11,934,562 | 361,345 | 0.0303 | 0.9697 | 36.06 |
| 45.5 | 11,687,079 | 484,575 | 0.0415 | 0.9585 | 34.96 |
| 46.5 | 11,168,282 | 613,637 | 0.0549 | 0.9451 | 33.51 |
| 47.5 | 10,090,916 | 450,655 | 0.0447 | 0.9553 | 31.67 |
| 48.5 | 9,918,379 | 428,210 | 0.0432 | 0.9568 | 30.26 |
| 49.5 | 8,307,456 | 379,980 | 0.0457 | 0.9543 | 28.95 |
| 50.5 | 7,903,190 | 458,859 | 0.0581 | 0.9419 | 27.63 |
| 51.5 | 7,639,219 | 569,583 | 0.0746 | 0.9254 | 26.02 |
| 52.5 | 7,089,928 | 426,966 | 0.0602 | 0.9398 | 24.08 |
| 53.5 | 6,551,699 | 421,941 | 0.0644 | 0.9356 | 22.63 |
| 54.5 | 6,001,962 | 292,977 | 0.0488 | 0.9512 | 21.18 |
| 55.5 | 5,476,438 | 275,927 | 0.0504 | 0.9496 | 20.14 |
| 56.5 | 4,829,938 | 280,972 | 0.0582 | 0.9418 | 19.13 |
| 57.5 | 4,025,862 | 348,138 | 0.0865 | 0.9135 | 18.01 |
| 58.5 | 3,400,356 | 224,259 | 0.0660 | 0.9340 | 16.46 |
| 59.5 | 3,006,052 | 218,054 | 0.0725 | 0.9275 | 15.37 |
| 60.5 | 2,605,613 | 152,978 | 0.0587 | 0.9413 | 14.26 |
| 61.5 | 2,217,572 | 96,569 | 0.0435 | 0.9565 | 13.42 |
| 62.5 | 1,568,480 | 104,740 | 0.0668 | 0.9332 | 12.83 |
| 63.5 | 1,436,091 | 113,734 | 0.0792 | 0.9208 | 11.98 |
| 64.5 | 1,077,950 | 99,634 | 0.0924 | 0.9076 | 11.03 |
| 65.5 | 986,686 | 92,716 | 0.0940 | 0.9060 | 10.01 |
| 66.5 | 885,723 | 110,538 | 0.1248 | 0.8752 | 9.07 |
| 67.5 | 510,735 | 89,877 | 0.1760 | 0.8240 | 7.94 |
| 68.5 | 281,176 | 57,966 | 0.2062 | 0.7938 | 6.54 |
| 69.5 | 199,624 | 39,242 | 0.1966 | 0.8034 | 5.19 |
| 70.5 | 175,148 | 30,822 | 0.1760 | 0.8240 | 4.17 |
| 71.5 | 181,138 | 34,718 | 0.1917 | 0.8083 | 3.44 |
| 72.5 | 229,740 | 27,761 | 0.1208 | 0.8792 | 2.78 |
| 73.5 | 284,505 | 45,957 | 0.1615 | 0.8385 | 2.44 |
| 74.5 | 343,341 | 36,342 | 0.1058 | 0.8942 | 2.05 |
| 75.5 | 344,228 | 40,349 | 0.1172 | 0.8828 | 1.83 |
| 76.5 | 389,875 | 65,385 | 0.1677 | 0.8323 | 1.62 |
| 77.5 | 368,935 | 53,944 | 0.1462 | 0.8538 | 1.35 |
| 78.5 | 342,725 | 71,478 | 0.2086 | 0.7914 | 1.15 |

DUQUESNE LIGHT COMPANY

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD

ORIGINAL LIFE TABLE, CONT.

| PLACEMENT BAND 1901-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 314,801 | 46,407 | 0.1474 | 0.8526 | 0.91 |
| 80.5 | 277,007 | 27,952 | 0.1009 | 0.8991 | 0.78 |
| 81.5 | 252,941 | 36,834 | 0.1456 | 0.8544 | 0.70 |
| 82.5 | 219,638 | 25,921 | 0.1180 | 0.8820 | 0.60 |
| 83.5 | 194,183 | 16,555 | 0.0853 | 0.9147 | 0.53 |
| 84.5 | 177,644 | 23,866 | 0.1343 | 0.8657 | 0.48 |
| 85.5 | 154,078 | 50,358 | 0.3268 | 0.6732 | 0.42 |
| 86.5 | 105,780 | 23,782 | 0.2248 | 0.7752 | 0.28 |
| 87.5 | 83,545 | 23,627 | 0.2828 | 0.7172 | 0.22 |
| 88.5 | 59,995 | 29,658 | 0.4943 | 0.5057 | 0.16 |
| 89.5 | 30,337 | 10,368 | 0.3418 | 0.6582 | 0.08 |
| 90.5 | 19,968 | 4,342 | 0.2174 | 0.7826 | 0.05 |
| 91.5 | 15,627 | 1,870 | 0.1197 | 0.8803 | 0.04 |
| 92.5 | 13,756 | 2,090 | 0.1519 | 0.8481 | 0.04 |
| 93.5 | 11,666 | 2,309 | 0.1979 | 0.8021 | 0.03 |
| 94.5 | 9,357 | 3,726 | 0.3982 | 0.6018 | 0.02 |
| 95.5 | 5,688 | 4,021 | 0.7069 | 0.2931 | 0.01 |
| 96.5 | 1,667 | 811 | 0.4863 | 0.5137 | 0.00 |
| 97.5 | 856 | 800 | 0.9339 | 0.0661 | 0.00 |
| 98.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 99.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 100.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 101.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 102.5 | 374 |  | 0.0000 | 1.0000 | 0.00 |
| 103.5 | 374 | 57 | 0.1515 | 0.8485 | 0.00 |
| 104.5 | 317 |  | 0.0000 | 1.0000 | 0.00 |
| 105.5 | 317 | 16 | 0.0506 | 0.9494 | 0.00 |
| 106.5 | 301 | 301 | 1.0000 |  | 0.00 |
| 107.5 |  |  |  |  |  |

duQuesne light company
ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION ORIGINAL AND SMOOTH SURVIVOR CURVES


ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

ORIGINAL LIFE TABLE

PLACEMENT BAND 1906-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 107,543,542 |
| 0.5 | 104,035,745 |
| 1.5 | 99,697,851 |
| 2.5 | 95,829,448 |
| 3.5 | 91,107,129 |
| 4.5 | 87,311,279 |
| 5.5 | 82,466,854 |
| 6.5 | 76,821,624 |
| 7.5 | 72,046,985 |
| 8.5 | 67,969,832 |
| 9.5 | 63,555,692 |
| 10.5 | 57,871,628 |
| 11.5 | 54,700,971 |
| 12.5 | 49,396,944 |
| 13.5 | 44,308,670 |
| 14.5 | 43,269,935 |
| 15.5 | 41,688,133 |
| 16.5 | 39,300,135 |
| 17.5 | 37,112,567 |
| 18.5 | 33,807,875 |
| 19.5 | 31,944,393 |
| 20.5 | 30,488,890 |
| 21.5 | 29,559,228 |
| 22.5 | 27,618,849 |
| 23.5 | 26,883,682 |
| 24.5 | 26,376,432 |
| 25.5 | 25,854,010 |
| 26.5 | 25,289,205 |
| 27.5 | 24,182,626 |
| 28.5 | 22,833,192 |
| 29.5 | 21,626,742 |
| 30.5 | 20,413,839 |
| 31.5 | 19,416,108 |
| 32.5 | 18,269,741 |
| 33.5 | 17,305,947 |
| 34.5 | 16,051,824 |
| 35.5 | 15,185,149 |
| 36.5 | 14,468,874 |
| 37.5 | 13,855,660 |
| 38.5 | 13,104,230 |


| RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |
| 239,018 | 0.0022 | 0.9978 | 100.00 |
| 834,583 | 0.0080 | 0.9920 | 99.78 |
| 1,054,050 | 0.0106 | 0.9894 | 98.98 |
| 1,027,387 | 0.0107 | 0.9893 | 97.93 |
| 671,916 | 0.0074 | 0.9926 | 96.88 |
| 1,102,396 | 0.0126 | 0.9874 | 96.17 |
| 641,051 | 0.0078 | 0.9922 | 94.95 |
| 880,729 | 0.0115 | 0.9885 | 94.21 |
| 448,001 | 0.0062 | 0.9938 | 93.13 |
| 404,611 | 0.0060 | 0.9940 | 92.55 |
| 469,321 | 0.0074 | 0.9926 | 92.00 |
| 546,247 | 0.0094 | 0.9906 | 91.32 |
| 643,568 | 0.0118 | 0.9882 | 90.46 |
| 573,144 | 0.0116 | 0.9884 | 89.40 |
| 538,368 | 0.0122 | 0.9878 | 88.36 |
| 554,036 | 0.0128 | 0.9872 | 87.29 |
| 623,785 | 0.0150 | 0.9850 | 86.17 |
| 543,636 | 0.0138 | 0.9862 | 84.88 |
| 360,948 | 0.0097 | 0.9903 | 83.71 |
| 490,887 | 0.0145 | 0.9855 | 82.89 |
| 376,032 | 0.0118 | 0.9882 | 81.69 |
| 510,333 | 0.0167 | 0.9833 | 80.73 |
| 724,361 | 0.0245 | 0.9755 | 79.38 |
| 470,287 | 0.0170 | 0.9830 | 77.43 |
| 367,975 | 0.0137 | 0.9863 | 76.11 |
| 386,264 | 0.0146 | 0.9854 | 75.07 |
| 431,139 | 0.0167 | 0.9833 | 73.97 |
| 386,065 | 0.0153 | 0.9847 | 72.74 |
| 287,368 | 0.0119 | 0.9881 | 71.63 |
| 188,285 | 0.0082 | 0.9918 | 70.78 |
| 389,430 | 0.0180 | 0.9820 | 70.19 |
| 362,510 | 0.0178 | 0.9822 | 68.93 |
| 226,832 | 0.0117 | 0.9883 | 67.70 |
| 324,703 | 0.0178 | 0.9822 | 66.91 |
| 386,861 | 0.0224 | 0.9776 | 65.72 |
| 286,539 | 0.0179 | 0.9821 | 64.25 |
| 160,925 | 0.0106 | 0.9894 | 63.11 |
| 177,432 | 0.0123 | 0.9877 | 62.44 |
| 233,866 | 0.0169 | 0.9831 | 61.67 |
| 359,580 | 0.0274 | 0.9726 | 60.63 |

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1906-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 11,989,068 | 293,216 | 0.0245 | 0.9755 | 58.97 |
| 40.5 | 11,296,249 | 205,776 | 0.0182 | 0.9818 | 57.53 |
| 41.5 | 10,290,497 | 210,888 | 0.0205 | 0.9795 | 56.48 |
| 42.5 | 9,518,352 | 174,981 | 0.0184 | 0.9816 | 55.32 |
| 43.5 | 8,974,576 | 184,811 | 0.0206 | 0.9794 | 54.30 |
| 44.5 | 8,080,940 | 205,972 | 0.0255 | 0.9745 | 53.19 |
| 45.5 | 7,074,546 | 82,866 | 0.0117 | 0.9883 | 51.83 |
| 46.5 | 6,411,837 | 115,249 | 0.0180 | 0.9820 | 51.22 |
| 47.5 | 5,996,980 | 90,111 | 0.0150 | 0.9850 | 50.30 |
| 48.5 | 5,673,358 | 50,169 | 0.0088 | 0.9912 | 49.55 |
| 49.5 | 5,245,286 | 82,631 | 0.0158 | 0.9842 | 49.11 |
| 50.5 | 4,989,628 | 60,740 | 0.0122 | 0.9878 | 48.33 |
| 51.5 | 4,436,812 | 66,027 | 0.0149 | 0.9851 | 47.75 |
| 52.5 | 4,013,217 | 55,538 | 0.0138 | 0.9862 | 47.04 |
| 53.5 | 3,758,115 | 68,726 | 0.0183 | 0.9817 | 46.38 |
| 54.5 | 3,564,066 | 42,364 | 0.0119 | 0.9881 | 45.54 |
| 55.5 | 3,433,916 | 27,099 | 0.0079 | 0.9921 | 45.00 |
| 56.5 | 3,236,141 | 16,916 | 0.0052 | 0.9948 | 44.64 |
| 57.5 | 3,025,612 | 37,564 | 0.0124 | 0.9876 | 44.41 |
| 58.5 | 2,768,545 | 38,335 | 0.0138 | 0.9862 | 43.86 |
| 59.5 | 2,411,486 | 39,407 | 0.0163 | 0.9837 | 43.25 |
| 60.5 | 2,135,118 | 22,755 | 0.0107 | 0.9893 | 42.54 |
| 61.5 | 1,906,576 | 14,999 | 0.0079 | 0.9921 | 42.09 |
| 62.5 | 1,785,309 | 9,850 | 0.0055 | 0.9945 | 41.76 |
| 63.5 | 1,473,230 | 16,310 | 0.0111 | 0.9889 | 41.53 |
| 64.5 | 1,224,737 | 4,319 | 0.0035 | 0.9965 | 41.07 |
| 65.5 | 948,465 | 4,604 | 0.0049 | 0.9951 | 40.92 |
| 66.5 | 827,076 | 1,966 | 0.0024 | 0.9976 | 40.72 |
| 67.5 | 742,154 | 3,251 | 0.0044 | 0.9956 | 40.63 |
| 68.5 | 636,449 | 3,348 | 0.0053 | 0.9947 | 40.45 |
| 69.5 | 583,811 | 5,606 | 0.0096 | 0.9904 | 40.24 |
| 70.5 | 537,933 | 1,417 | 0.0026 | 0.9974 | 39.85 |
| 71.5 | 464,647 | 1,258 | 0.0027 | 0.9973 | 39.74 |
| 72.5 | 455,293 | 4,114 | 0.0090 | 0.9910 | 39.64 |
| 73.5 | 444,478 | 837 | 0.0019 | 0.9981 | 39.28 |
| 74.5 | 429,988 | 1,574 | 0.0037 | 0.9963 | 39.20 |
| 75.5 | 421,795 | 743 | 0.0018 | 0.9982 | 39.06 |
| 76.5 | 412,955 | 353 | 0.0009 | 0.9991 | 38.99 |
| 77.5 | 397,079 | 469 | 0.0012 | 0.9988 | 38.96 |
| 78.5 | 343,420 |  | 0.0000 | 1.0000 | 38.91 |


| PLACEMENT | AND 1906-2019 |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 334,608 | 499 | 0.0015 | 0.9985 | 38.91 |
| 80.5 | 331,647 | 3,279 | 0.0099 | 0.9901 | 38.86 |
| 81.5 | 320,963 |  | 0.0000 | 1.0000 | 38.47 |
| 82.5 | 279,014 | 852 | 0.0031 | 0.9969 | 38.47 |
| 83.5 | 263,644 | 587 | 0.0022 | 0.9978 | 38.35 |
| 84.5 | 258,949 | 407 | 0.0016 | 0.9984 | 38.27 |
| 85.5 | 258,437 | 841 | 0.0033 | 0.9967 | 38.21 |
| 86.5 | 248,222 | 585 | 0.0024 | 0.9976 | 38.08 |
| 87.5 | 238,416 | 6,957 | 0.0292 | 0.9708 | 37.99 |
| 88.5 | 207,176 | 6,123 | 0.0296 | 0.9704 | 36.89 |
| 89.5 | 145,428 | 2,443 | 0.0168 | 0.9832 | 35.80 |
| 90.5 | 88,347 | 752 | 0.0085 | 0.9915 | 35.19 |
| 91.5 | 56,277 | 390 | 0.0069 | 0.9931 | 34.89 |
| 92.5 | 32,436 | 1,200 | 0.0370 | 0.9630 | 34.65 |
| 93.5 | 19,585 |  | 0.0000 | 1.0000 | 33.37 |
| 94.5 | 14,777 |  | 0.0000 | 1.0000 | 33.37 |
| 95.5 | 10,701 | 615 | 0.0575 | 0.9425 | 33.37 |
| 96.5 | 9,175 |  | 0.0000 | 1.0000 | 31.45 |
| 97.5 | 8,665 |  | 0.0000 | 1.0000 | 31.45 |
| 98.5 | 7,920 |  | 0.0000 | 1.0000 | 31.45 |
| 99.5 | 7,351 |  | 0.0000 | 1.0000 | 31.45 |
| 100.5 | 7,075 |  | 0.0000 | 1.0000 | 31.45 |
| 101.5 | 1,270 |  | 0.0000 | 1.0000 | 31.45 |
| 102.5 | 1,223 |  | 0.0000 | 1.0000 | 31.45 |
| 103.5 | 578 |  | 0.0000 | 1.0000 | 31.45 |
| 104.5 | 578 |  | 0.0000 | 1.0000 | 31.45 |
| 105.5 | 578 |  | 0.0000 | 1.0000 | 31.45 |
| 106.5 | 373 |  | 0.0000 | 1.0000 | 31.45 |
| 107.5 | 313 |  | 0.0000 | 1.0000 | 31.45 |
| 108.5 | 313 |  | 0.0000 | 1.0000 | 31.45 |
| 109.5 | 313 |  | 0.0000 | 1.0000 | 31.45 |
| 110.5 | 313 |  | 0.0000 | 1.0000 | 31.45 |
| 111.5 | 297 |  | 0.0000 | 1.0000 | 31.45 |
| 112.5 | 297 |  | 0.0000 | 1.0000 | 31.45 |
| 113.5 |  |  |  |  | 31.45 |

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

ORIGINAL LIFE TABLE

PLACEMENT BAND 1906-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 61,825,752 | 233,220 | 0.0038 | 0.9962 | 100.00 |
| 0.5 | 58,942,451 | 555,586 | 0.0094 | 0.9906 | 99.62 |
| 1.5 | 54,628,578 | 839,784 | 0.0154 | 0.9846 | 98.68 |
| 2.5 | 50,523,669 | 858,331 | 0.0170 | 0.9830 | 97.17 |
| 3.5 | 45,086,107 | 523,762 | 0.0116 | 0.9884 | 95.52 |
| 4.5 | 41,131,555 | 623,069 | 0.0151 | 0.9849 | 94.41 |
| 5.5 | 36,491,895 | 420,823 | 0.0115 | 0.9885 | 92.98 |
| 6.5 | 31,053,495 | 539,050 | 0.0174 | 0.9826 | 91.90 |
| 7.5 | 27,594,076 | 266,306 | 0.0097 | 0.9903 | 90.31 |
| 8.5 | 25,127,306 | 210,190 | 0.0084 | 0.9916 | 89.44 |
| 9.5 | 22,459,571 | 258,659 | 0.0115 | 0.9885 | 88.69 |
| 10.5 | 19,891,923 | 297,402 | 0.0150 | 0.9850 | 87.67 |
| 11.5 | 17,736,628 | 322,011 | 0.0182 | 0.9818 | 86.36 |
| 12.5 | 16,231,303 | 337,235 | 0.0208 | 0.9792 | 84.79 |
| 13.5 | 14,340,239 | 320,337 | 0.0223 | 0.9777 | 83.03 |
| 14.5 | 14,394,405 | 223,066 | 0.0155 | 0.9845 | 81.17 |
| 15.5 | 14,750,344 | 183,816 | 0.0125 | 0.9875 | 79.91 |
| 16.5 | 13,789,902 | 331,148 | 0.0240 | 0.9760 | 78.92 |
| 17.5 | 12,394,036 | 190,306 | 0.0154 | 0.9846 | 77.02 |
| 18.5 | 11,719,140 | 158,033 | 0.0135 | 0.9865 | 75.84 |
| 19.5 | 11,255,414 | 169,650 | 0.0151 | 0.9849 | 74.82 |
| 20.5 | 10,765,660 | 217,122 | 0.0202 | 0.9798 | 73.69 |
| 21.5 | 11,429,092 | 218,131 | 0.0191 | 0.9809 | 72.20 |
| 22.5 | 11,502,811 | 98,630 | 0.0086 | 0.9914 | 70.83 |
| 23.5 | 11,575,391 | 215,876 | 0.0186 | 0.9814 | 70.22 |
| 24.5 | 12,248,451 | 204,645 | 0.0167 | 0.9833 | 68.91 |
| 25.5 | 13,132,627 | 209,012 | 0.0159 | 0.9841 | 67.76 |
| 26.5 | 13,813,637 | 186,284 | 0.0135 | 0.9865 | 66.68 |
| 27.5 | 13,712,943 | 131,410 | 0.0096 | 0.9904 | 65.78 |
| 28.5 | 12,980,589 | 109,697 | 0.0085 | 0.9915 | 65.15 |
| 29.5 | 12,619,734 | 244,137 | 0.0193 | 0.9807 | 64.60 |
| 30.5 | 11,971,743 | 193,761 | 0.0162 | 0.9838 | 63.35 |
| 31.5 | 12,029,900 | 131,880 | 0.0110 | 0.9890 | 62.32 |
| 32.5 | 11,477,920 | 239,000 | 0.0208 | 0.9792 | 61.64 |
| 33.5 | 10,863,107 | 289,028 | 0.0266 | 0.9734 | 60.36 |
| 34.5 | 10,087,805 | 217,059 | 0.0215 | 0.9785 | 58.75 |
| 35.5 | 9,507,277 | 80,128 | 0.0084 | 0.9916 | 57.49 |
| 36.5 | 9,324,605 | 121,185 | 0.0130 | 0.9870 | 57.00 |
| 37.5 | 9,131,382 | 190,679 | 0.0209 | 0.9791 | 56.26 |
| 38.5 | 8,854,467 | 266,427 | 0.0301 | 0.9699 | 55.09 |

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1906-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 8,434,038 | 250,029 | 0.0296 | 0.9704 | 53.43 |
| 40.5 | 8,027,624 | 145,008 | 0.0181 | 0.9819 | 51.85 |
| 41.5 | 7,456,463 | 173,894 | 0.0233 | 0.9767 | 50.91 |
| 42.5 | 7,052,179 | 127,968 | 0.0181 | 0.9819 | 49.72 |
| 43.5 | 6,947,758 | 164,636 | 0.0237 | 0.9763 | 48.82 |
| 44.5 | 6,352,664 | 185,074 | 0.0291 | 0.9709 | 47.66 |
| 45.5 | 5,609,989 | 64,800 | 0.0116 | 0.9884 | 46.27 |
| 46.5 | 5,092,838 | 106,157 | 0.0208 | 0.9792 | 45.74 |
| 47.5 | 4,744,747 | 87,183 | 0.0184 | 0.9816 | 44.79 |
| 48.5 | 4,532,634 | 33,932 | 0.0075 | 0.9925 | 43.96 |
| 49.5 | 4,163,461 | 60,736 | 0.0146 | 0.9854 | 43.63 |
| 50.5 | 3,977,631 | 25,498 | 0.0064 | 0.9936 | 43.00 |
| 51.5 | 3,532,892 | 49,185 | 0.0139 | 0.9861 | 42.72 |
| 52.5 | 3,143,430 | 47,210 | 0.0150 | 0.9850 | 42.13 |
| 53.5 | 2,929,785 | 60,277 | 0.0206 | 0.9794 | 41.49 |
| 54.5 | 2,771,441 | 36,919 | 0.0133 | 0.9867 | 40.64 |
| 55.5 | 2,657,542 | 22,008 | 0.0083 | 0.9917 | 40.10 |
| 56.5 | 2,480,068 | 10,405 | 0.0042 | 0.9958 | 39.77 |
| 57.5 | 2,304,179 | 19,986 | 0.0087 | 0.9913 | 39.60 |
| 58.5 | 2,131,828 | 34,018 | 0.0160 | 0.9840 | 39.26 |
| 59.5 | 1,792,169 | 27,187 | 0.0152 | 0.9848 | 38.63 |
| 60.5 | 1,531,324 | 17,774 | 0.0116 | 0.9884 | 38.04 |
| 61.5 | 1,319,117 | 10,984 | 0.0083 | 0.9917 | 37.60 |
| 62.5 | 1,245,016 | 9,732 | 0.0078 | 0.9922 | 37.29 |
| 63.5 | 1,007,966 | 11,857 | 0.0118 | 0.9882 | 37.00 |
| 64.5 | 807,061 | 3,214 | 0.0040 | 0.9960 | 36.56 |
| 65.5 | 624,038 | 4,078 | 0.0065 | 0.9935 | 36.42 |
| 66.5 | 544,611 | 1,465 | 0.0027 | 0.9973 | 36.18 |
| 67.5 | 494,299 | 3,050 | 0.0062 | 0.9938 | 36.08 |
| 68.5 | 414,682 | 1,325 | 0.0032 | 0.9968 | 35.86 |
| 69.5 | 421,477 | 4,363 | 0.0104 | 0.9896 | 35.75 |
| 70.5 | 431,090 | 1,211 | 0.0028 | 0.9972 | 35.38 |
| 71.5 | 388,946 | 1,258 | 0.0032 | 0.9968 | 35.28 |
| 72.5 | 406,245 | 4,114 | 0.0101 | 0.9899 | 35.16 |
| 73.5 | 406,540 | 470 | 0.0012 | 0.9988 | 34.81 |
| 74.5 | 403,585 | 1,574 | 0.0039 | 0.9961 | 34.77 |
| 75.5 | 405,208 | 743 | 0.0018 | 0.9982 | 34.63 |
| 76.5 | 399,866 | 353 | 0.0009 | 0.9991 | 34.57 |
| 77.5 | 385,206 | 466 | 0.0012 | 0.9988 | 34.54 |
| 78.5 | 332,642 |  | 0.0000 | 1.0000 | 34.49 |


| PLACEMENT BAND 1906-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 325,545 | 446 | 0.0014 | 0.9986 | 34.49 |
| 80.5 | 322,900 | 1,863 | 0.0058 | 0.9942 | 34.45 |
| 81.5 | 319,418 |  | 0.0000 | 1.0000 | 34.25 |
| 82.5 | 277,835 | 852 | 0.0031 | 0.9969 | 34.25 |
| 83.5 | 263,078 | 587 | 0.0022 | 0.9978 | 34.14 |
| 84.5 | 258,382 | 407 | 0.0016 | 0.9984 | 34.07 |
| 85.5 | 257,870 | 841 | 0.0033 | 0.9967 | 34.01 |
| 86.5 | 247,850 | 585 | 0.0024 | 0.9976 | 33.90 |
| 87.5 | 238,104 | 6,957 | 0.0292 | 0.9708 | 33.82 |
| 88.5 | 206,863 | 6,123 | 0.0296 | 0.9704 | 32.83 |
| 89.5 | 145,116 | 2,443 | 0.0168 | 0.9832 | 31.86 |
| 90.5 | 88,035 | 752 | 0.0085 | 0.9915 | 31.33 |
| 91.5 | 55,980 | 390 | 0.0070 | 0.9930 | 31.06 |
| 92.5 | 32,139 | 1,200 | 0.0373 | 0.9627 | 30.84 |
| 93.5 | 19,585 |  | 0.0000 | 1.0000 | 29.69 |
| 94.5 | 14,777 |  | 0.0000 | 1.0000 | 29.69 |
| 95.5 | 10,701 | 615 | 0.0575 | 0.9425 | 29.69 |
| 96.5 | 9,175 |  | 0.0000 | 1.0000 | 27.98 |
| 97.5 | 8,665 |  | 0.0000 | 1.0000 | 27.98 |
| 98.5 | 7,920 |  | 0.0000 | 1.0000 | 27.98 |
| 99.5 | 7,351 |  | 0.0000 | 1.0000 | 27.98 |
| 100.5 | 7,075 |  | 0.0000 | 1.0000 | 27.98 |
| 101.5 | 1,270 |  | 0.0000 | 1.0000 | 27.98 |
| 102.5 | 1,223 |  | 0.0000 | 1.0000 | 27.98 |
| 103.5 | 578 |  | 0.0000 | 1.0000 | 27.98 |
| 104.5 | 578 |  | 0.0000 | 1.0000 | 27.98 |
| 105.5 | 578 |  | 0.0000 | 1.0000 | 27.98 |
| 106.5 | 373 |  | 0.0000 | 1.0000 | 27.98 |
| 107.5 | 313 |  | 0.0000 | 1.0000 | 27.98 |
| 108.5 | 313 |  | 0.0000 | 1.0000 | 27.98 |
| 109.5 | 313 |  | 0.0000 | 1.0000 | 27.98 |
| 110.5 | 313 |  | 0.0000 | 1.0000 | 27.98 |
| 111.5 | 297 |  | 0.0000 | 1.0000 | 27.98 |
| 112.5 | 297 |  | 0.0000 | 1.0000 | 27.98 |
| 113.5 |  |  |  |  | 27.98 |



| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 56,695,165 |
| 0.5 | 53, 925,602 |
| 1.5 | 47,335,867 |
| 2.5 | 42,363,808 |
| 3.5 | 38,655,155 |
| 4.5 | 35,506,809 |
| 5.5 | 29,963,089 |
| 6.5 | 25,487,165 |
| 7.5 | 23,913,073 |
| 8.5 | 20,506,364 |
| 9.5 | 19,240,492 |
| 10.5 | 18,186,956 |
| 11.5 | 13,317,934 |
| 12.5 | 13,714,353 |
| 13.5 | 14,262,647 |
| 14.5 | 13,552,704 |
| 15.5 | 14,749,161 |
| 16.5 | 12,446,714 |
| 17.5 | 11,816,787 |
| 18.5 | 10,655,697 |
| 19.5 | 10,633,633 |
| 20.5 | 10,557,449 |
| 21.5 | 10,973,785 |
| 22.5 | 12,190,911 |
| 23.5 | 12,209,861 |
| 24.5 | 12,055,995 |
| 25.5 | 12,018,761 |
| 26.5 | 11,923,142 |
| 27.5 | 12,072,076 |
| 28.5 | 11,613,726 |
| 29.5 | 11,185,115 |
| 30.5 | 10,518,084 |
| 31.5 | 9,812,104 |
| 32.5 | 8,734,620 |
| 33.5 | 7,917,915 |
| 34.5 | 7,549,598 |
| 35.5 | 7,473,372 |
| 36.5 | 7,129,703 |
| 37.5 | 5,708,869 |
| 38.5 | 5,336,090 |


| RETIREMENTS |  |  | PCT SURV |
| :---: | :--- | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |


| 150,168 | 0.0026 | 0.9974 | 100.00 |
| ---: | ---: | ---: | ---: |
| $1,019,055$ | 0.0189 | 0.9811 | 99.74 |
| 922,891 | 0.0195 | 0.9805 | 97.85 |
| $1,189,723$ | 0.0281 | 0.9719 | 95.94 |
| $1,151,598$ | 0.0298 | 0.9702 | 93.25 |
| $1,271,206$ | 0.0358 | 0.9642 | 90.47 |
| 856,867 | 0.0286 | 0.9714 | 87.23 |
| 295,092 | 0.0116 | 0.9884 | 84.74 |
| 479,408 | 0.0200 | 0.9800 | 83.76 |

$325,100 \quad 0.0159 \quad 0.9841 \quad 82.08$
$\begin{array}{llll}135,369 & 0.0070 & 0.9930 & 80.78\end{array}$
$\begin{array}{llll}411,061 & 0.0226 & 0.9774 & 80.21\end{array}$
$940.835 \quad 0.0706 \quad 0.9294 \quad 78.39$
$\begin{array}{llll}776,230 & 0.0566 & 0.9434 & 72.86\end{array}$
$295.541 \quad 0.0207 \quad 0.9793 .73$
$161,601 \quad 0.0119 \quad 0.9881 \quad 67.31$
$865,136 \quad 0.0587 \quad 0.9413 \quad 66.51$
$269,771 \quad 0.0217 \quad 0.9783 \quad 62.60$
$\begin{array}{llll}21.825 & 0.0018 & 0.9982 & 61.25\end{array}$
$87.669 \quad 0.0082 \quad 0.9918 \quad 61.13$
$216.317 \quad 0.0203 \quad 0.9797 \quad 60.63$
$99.994 \quad 0.00950 .99050$
$\begin{array}{llll}50,523 & 0.0046 & 0.9954 & 58.84\end{array}$
$168,188 \quad 0.0138 \quad 0.9862 \quad 58.56$
$280,699 \quad 0.0230 \quad 0.9770 \quad 57.76$
$150.487 \quad 0.0125 \quad 0.9875 \quad 56.43$
$358,184 \quad 0.0298 \quad 0.9702 \quad 55.72$
$248,871 \quad 0.0209 \quad 0.9791 \quad 54.06$
$229.9520 .0190 \quad 0.9810 \quad 52.94$
$268.266 \quad 0.0231 \quad 0.9769 \quad 51.93$
$491.057 \quad 0.0439 \quad 0.9561 \quad 50.73$
$480.184 \quad 0.0457 \quad 0.9543 \quad 48.50$
$475,609 \quad 0.0485 \quad 0.9515 \quad 46.29$
617,280 0.0707 $0.9293 \quad 44.04$
$852.659 \quad 0.1077 \quad 0.8923 \quad 40.93$
$257.748 \quad 0.0341 \quad 0.9659 \quad 36.52$
$264,395 \quad 0.0354 \quad 0.9646 \quad 35.28$
$\begin{array}{llll}532.704 & 0.0747 & 0.9253 & 34.03 \\ 129.549 & 0.0227 & 0.9773 & 31.49\end{array}$
$\begin{array}{llll}129,549 & 0.0227 & 0.9773 & 31.49 \\ 108,425 & 0.0203 & 0.9797 & 30.77\end{array}$

DUQUESNE LIGHT COMPANY

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1925-2019
EXPERIENCE BAND 1993-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 5,354,524 | 396,673 | 0.0741 | 0.9259 | 30.15 |
| 40.5 | 4,967,513 | 168,370 | 0.0339 | 0.9661 | 27.91 |
| 41.5 | 4,911,585 | 118,074 | 0.0240 | 0.9760 | 26.97 |
| 42.5 | 4,981,834 | 96,787 | 0.0194 | 0.9806 | 26.32 |
| 43.5 | 5,012,814 | 44,463 | 0.0089 | 0.9911 | 25.81 |
| 44.5 | 4,718,828 | 140,072 | 0.0297 | 0.9703 | 25.58 |
| 45.5 | 4,419,521 | 295,159 | 0.0668 | 0.9332 | 24.82 |
| 46.5 | 4,053,755 | 121,942 | 0.0301 | 0.9699 | 23.16 |
| 47.5 | 3,552,485 | 44,646 | 0.0126 | 0.9874 | 22.46 |
| 48.5 | 3,339,405 | 43,579 | 0.0130 | 0.9870 | 22.18 |
| 49.5 | 3,174,954 | 109,267 | 0.0344 | 0.9656 | 21.89 |
| 50.5 | 2,934,376 | 77,152 | 0.0263 | 0.9737 | 21.14 |
| 51.5 | 2,585,011 | 157,384 | 0.0609 | 0.9391 | 20.58 |
| 52.5 | 2,125,883 | 100,364 | 0.0472 | 0.9528 | 19.33 |
| 53.5 | 1,933,512 | 40,193 | 0.0208 | 0.9792 | 18.42 |
| 54.5 | 1,858,940 | 44,138 | 0.0237 | 0.9763 | 18.03 |
| 55.5 | 1,753,743 | 67,777 | 0.0386 | 0.9614 | 17.61 |
| 56.5 | 1,595,635 | 56,942 | 0.0357 | 0.9643 | 16.93 |
| 57.5 | 1,515,336 | 90,778 | 0.0599 | 0.9401 | 16.32 |
| 58.5 | 1,374,769 | 42,613 | 0.0310 | 0.9690 | 15.34 |
| 59.5 | 1,063,048 | 93,312 | 0.0878 | 0.9122 | 14.87 |
| 60.5 | 921,166 | 36,971 | 0.0401 | 0.9599 | 13.56 |
| 61.5 | 799,880 | 23,642 | 0.0296 | 0.9704 | 13.02 |
| 62.5 | 711,252 | 19,251 | 0.0271 | 0.9729 | 12.63 |
| 63.5 | 659,706 | 20,198 | 0.0306 | 0.9694 | 12.29 |
| 64.5 | 606,150 | 28,480 | 0.0470 | 0.9530 | 11.92 |
| 65.5 | 627,171 | 27,714 | 0.0442 | 0.9558 | 11.36 |
| 66.5 | 567,173 | 21,172 | 0.0373 | 0.9627 | 10.85 |
| 67.5 | 488,393 | 8,618 | 0.0176 | 0.9824 | 10.45 |
| 68.5 | 461,218 | 834 | 0.0018 | 0.9982 | 10.26 |
| 69.5 | 435,330 |  | 0.0000 | 1.0000 | 10.25 |
| 70.5 | 379,913 | 8,537 | 0.0225 | 0.9775 | 10.25 |
| 71.5 | 348,714 | 3,066 | 0.0088 | 0.9912 | 10.02 |
| 72.5 | 341,785 | 345 | 0.0010 | 0.9990 | 9.93 |
| 73.5 | 338,707 | 27,240 | 0.0804 | 0.9196 | 9.92 |
| 74.5 | 311,353 | 7,926 | 0.0255 | 0.9745 | 9.12 |
| 75.5 | 296,419 | 8,015 | 0.0270 | 0.9730 | 8.89 |
| 76.5 | 287,002 | 9,001 | 0.0314 | 0.9686 | 8.65 |
| 77.5 | 273,909 | 2,645 | 0.0097 | 0.9903 | 8.38 |
| 78.5 | 249,162 | 7,658 | 0.0307 | 0.9693 | 8.30 |

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            DUQUESNE LIGHT COMPANY
ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1925-2019 |  |  | EXPERIENCE BAND 1993-2019 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 233,817 | 5,291 | 0.0226 | 0.9774 | 8.04 |
| 80.5 | 225,000 |  | 0.0000 | 1.0000 | 7.86 |
| 81.5 | 219,923 | 10,369 | 0.0471 | 0.9529 | 7.86 |
| 82.5 | 199,028 | 2,572 | 0.0129 | 0.9871 | 7.49 |
| 83.5 | 189,788 | 2,662 | 0.0140 | 0.9860 | 7.39 |
| 84.5 | 184,356 |  | 0.0000 | 1.0000 | 7.29 |
| 85.5 | 184,356 | 2,572 | 0.0140 | 0.9860 | 7.29 |
| 86.5 | 180,374 |  | 0.0000 | 1.0000 | 7.19 |
| 87.5 | 178,367 | 2,220 | 0.0124 | 0.9876 | 7.19 |
| 88.5 | 144,302 | 2,572 | 0.0178 | 0.9822 | 7.10 |
| 89.5 | 120,829 | 2,662 | 0.0220 | 0.9780 | 6.97 |
| 90.5 | 41,377 |  | 0.0000 | 1.0000 | 6.82 |
| 91.5 | 16,448 |  | 0.0000 | 1.0000 | 6.82 |
| 92.5 | 449 |  | 0.0000 | 1.0000 | 6.82 |
| 93.5 |  |  |  |  | 6.82 |


| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 56,520,112 |
| 0.5 | 53,818,787 |
| 1.5 | 47,203,653 |
| 2.5 | 42,240,924 |
| 3.5 | 38,173,477 |
| 4.5 | 34,719,498 |
| 5.5 | 28,807,870 |
| 6.5 | 23,937,061 |
| 7.5 | 21,458,489 |
| 8.5 | 18,030,437 |
| 9.5 | 16,992,082 |
| 10.5 | 15,565,141 |
| 11.5 | 10,792,976 |
| 12.5 | 10,410,999 |
| 13.5 | 9,433,685 |
| 14.5 | 8,745,848 |
| 15.5 | 9,413,152 |
| 16.5 | 7,075,900 |
| 17.5 | 7,958,828 |
| 18.5 | 8,327,134 |
| 19.5 | 7,945,609 |
| 20.5 | 9,109,201 |
| 21.5 | 9,537,725 |
| 22.5 | 9,640,383 |
| 23.5 | 9,714,732 |
| 24.5 | 9,850,747 |
| 25.5 | 9,898,792 |
| 26.5 | 9,917,983 |
| 27.5 | 10,936,031 |
| 28.5 | 10,511,644 |
| 29.5 | 10,148,357 |
| 30.5 | 9,462,393 |
| 31.5 | 8,847,033 |
| 32.5 | 7,990,031 |
| 33.5 | 7,169,187 |
| 34.5 | 6,373,591 |
| 35.5 | 6,250,373 |
| 36.5 | 5,814,926 |
| 37.5 | 4,373,732 |
| 38.5 | 3,938,925 |

$38.5 \quad 3,938,925$

| RETIREMENTS |  | PCT SURV |  |
| :---: | :--- | :---: | :---: |
| DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | RATIO | RATIO | INTERVAL |


| 150,168 | 0.0027 | 0.9973 | 100.00 |
| ---: | ---: | ---: | ---: |
| $1,019,055$ | 0.0189 | 0.9811 | 99.73 |
| 922,891 | 0.0196 | 0.9804 | 97.85 |
| $1,189,723$ | 0.0282 | 0.9718 | 95.93 |
| $1,151,598$ | 0.0302 | 0.9698 | 93.23 |
| $1,271,206$ | 0.0366 | 0.9634 | 90.42 |
| 856,867 | 0.0297 | 0.9703 | 87.11 |
| 295,092 | 0.0123 | 0.9877 | 84.52 |
| 479,408 | 0.0223 | 0.9777 | 83.47 |
| 325,100 | 0.0180 | 0.9820 | 81.61 |

$135.369 \quad 0.0080 \quad 0.9920 \quad 80.14$

| 411,061 | 0.0264 | 0.9736 | 79.50 |
| :--- | :--- | :--- | :--- |

$940,835 \quad 0.0872 \quad 0.9128 \quad 77.40$
$\begin{array}{llll}606,392 & 0.0582 & 0.9418 & 70.65\end{array}$
$295.541 \quad 0.0313 \quad 0.9687 \quad 66.54$
$161,601 \quad 0.0185 \quad 0.9815 \quad 64.45$
$865,136 \quad 0.0919 \quad 0.9081 \quad 63.26$
$269.771 \quad 0.0381 \quad 0.9619 \quad 57.45$
$\begin{array}{llll}21.825 & 0.0027 & 0.9973 & 55.26\end{array}$
$87.669 \quad 0.0105 \quad 0.9895 .11$
$\begin{array}{llll}125.778 & 0.0158 & 0.9842 & 54.53\end{array}$
$\begin{array}{llll}87.715 & 0.0096 & 0.9904 & 53.66\end{array}$

| 30.103 | 0.0032 | 0.9968 | 53.15 |
| :--- | :--- | :--- | :--- |

$158,308 \quad 0.0164 \quad 0.9836 \quad 52.98$
$276,865 \quad 0.0285 \quad 0.9715 \quad 52.11$
$149.209 \quad 0.0151 \quad 0.9849 \quad 50.62$
$358,184 \quad 0.0362 \quad 0.9638 \quad 49.86$
$\begin{array}{llll}248,871 & 0.0251 & 0.9749 & 48.05\end{array}$
$228,195 \quad 0.0209 \quad 0.9791 \quad 46.85$
$268.266 \quad 0.0255 \quad 0.9745 \quad 45.87$
$\begin{array}{llll}486,329 & 0.0479 & 0.9521 & 44.70\end{array}$
$475.506 \quad 0.0503 \quad 0.9497 \quad 42.56$
$475,609 \quad 0.0538 \quad 0.9462 \quad 40.42$
$\begin{array}{llll}617,280 & 0.0773 & 0.9227 & 38.25\end{array}$
$852,659 \quad 0.1189 \quad 0.8811 \quad 35.29$
$249.553 \quad 0.0392 \quad 0.9608 \quad 31.09$
$\begin{array}{llll}254.958 & 0.0408 & 0.9592 & 29.88\end{array}$
$\begin{array}{llll}527.371 & 0.0907 & 0.9093 & 28.66\end{array}$
$\begin{array}{llll}127,561 & 0.0292 & 0.9708 & 26.06 \\ 108,425 & 0.0275 & 0.9725 & 25.30\end{array}$

DUQUESNE LIGHT COMPANY

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1925-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 4,230,109 | 396,666 | 0.0938 | 0.9062 | 24.60 |
| 40.5 | 4,065,303 | 159,674 | 0.0393 | 0.9607 | 22.30 |
| 41.5 | 4,104,961 | 118,074 | 0.0288 | 0.9712 | 21.42 |
| 42.5 | 4,134,298 | 95,761 | 0.0232 | 0.9768 | 20.80 |
| 43.5 | 4,198,168 | 44,463 | 0.0106 | 0.9894 | 20.32 |
| 44.5 | 4,052,320 | 140,072 | 0.0346 | 0.9654 | 20.11 |
| 45.5 | 3,811,936 | 295,159 | 0.0774 | 0.9226 | 19.41 |
| 46.5 | 3,607,055 | 121,274 | 0.0336 | 0.9664 | 17.91 |
| 47.5 | 3,318,914 | 44,646 | 0.0135 | 0.9865 | 17.31 |
| 48.5 | 3,150,453 | 40,022 | 0.0127 | 0.9873 | 17.07 |
| 49.5 | 3,037,213 | 109,267 | 0.0360 | 0.9640 | 16.86 |
| 50.5 | 2,879,061 | 77,152 | 0.0268 | 0.9732 | 16.25 |
| 51.5 | 2,565,260 | 157,384 | 0.0614 | 0.9386 | 15.81 |
| 52.5 | 2,105,558 | 100,364 | 0.0477 | 0.9523 | 14.84 |
| 53.5 | 1,892,956 | 40,193 | 0.0212 | 0.9788 | 14.14 |
| 54.5 | 1,809,806 | 44,138 | 0.0244 | 0.9756 | 13.84 |
| 55.5 | 1,707,453 | 67,777 | 0.0397 | 0.9603 | 13.50 |
| 56.5 | 1,545,840 | 56,942 | 0.0368 | 0.9632 | 12.96 |
| 57.5 | 1,459,408 | 90,778 | 0.0622 | 0.9378 | 12.49 |
| 58.5 | 1,329,711 | 42,613 | 0.0320 | 0.9680 | 11.71 |
| 59.5 | 1,027,067 | 93,312 | 0.0909 | 0.9091 | 11.33 |
| 60.5 | 888,331 | 36,971 | 0.0416 | 0.9584 | 10.30 |
| 61.5 | 770,486 | 23,642 | 0.0307 | 0.9693 | 9.88 |
| 62.5 | 691,866 | 19,251 | 0.0278 | 0.9722 | 9.57 |
| 63.5 | 593,192 | 20,198 | 0.0340 | 0.9660 | 9.31 |
| 64.5 | 501,594 | 28,480 | 0.0568 | 0.9432 | 8.99 |
| 65.5 | 425,731 | 27,714 | 0.0651 | 0.9349 | 8.48 |
| 66.5 | 335,419 | 21,172 | 0.0631 | 0.9369 | 7.93 |
| 67.5 | 233,729 | 8,618 | 0.0369 | 0.9631 | 7.43 |
| 68.5 | 265,827 | 244 | 0.0009 | 0.9991 | 7.15 |
| 69.5 | 280,385 |  | 0.0000 | 1.0000 | 7.15 |
| 70.5 | 321,852 | 8,537 | 0.0265 | 0.9735 | 7.15 |
| 71.5 | 322,396 | 3,066 | 0.0095 | 0.9905 | 6.96 |
| 72.5 | 340,374 | 293 | 0.0009 | 0.9991 | 6.89 |
| 73.5 | 338,404 | 27,240 | 0.0805 | 0.9195 | 6.88 |
| 74.5 | 311,353 | 7,926 | 0.0255 | 0.9745 | 6.33 |
| 75.5 | 296,419 | 8,015 | 0.0270 | 0.9730 | 6.17 |
| 76.5 | 287,002 | 9,001 | 0.0314 | 0.9686 | 6.00 |
| 77.5 | 273,909 | 2,645 | 0.0097 | 0.9903 | 5.81 |
| 78.5 | 249,162 | 7,658 | 0.0307 | 0.9693 | 5.76 |

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            DUQUESNE LIGHT COMPANY
ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
ORIGINAL LIFE TABLE, CONT.
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| PLACEMENT | NND 1925-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 233,817 | 5,291 | 0.0226 | 0.9774 | 5.58 |
| 80.5 | 225,000 |  | 0.0000 | 1.0000 | 5.45 |
| 81.5 | 219,923 | 10,369 | 0.0471 | 0.9529 | 5.45 |
| 82.5 | 199,028 | 2,572 | 0.0129 | 0.9871 | 5.20 |
| 83.5 | 189,788 | 2,662 | 0.0140 | 0.9860 | 5.13 |
| 84.5 | 184,356 |  | 0.0000 | 1.0000 | 5.06 |
| 85.5 | 184,356 | 2,572 | 0.0140 | 0.9860 | 5.06 |
| 86.5 | 180,374 |  | 0.0000 | 1.0000 | 4.99 |
| 87.5 | 178,367 | 2,220 | 0.0124 | 0.9876 | 4.99 |
| 88.5 | 144,302 | 2,572 | 0.0178 | 0.9822 | 4.93 |
| 89.5 | 120,829 | 2,662 | 0.0220 | 0.9780 | 4.84 |
| 90.5 | 41,377 |  | 0.0000 | 1.0000 | 4.73 |
| 91.5 | 16,448 |  | 0.0000 | 1.0000 | 4.73 |
| 92.5 | 449 |  | 0.0000 | 1.0000 | 4.73 |
| 93.5 |  |  |  |  | 4.73 |

DUQUESNE LIGHT COMPANY


ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

ORIGINAL LIFE TABLE

PLACEMENT BAND 1961-2019
EXPERIENCE BAND 1971-2019

| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 41,723,060 | 84,307 | 0.0020 | 0.9980 | 100.00 |
| 0.5 | 40,385,994 | 211,148 | 0.0052 | 0.9948 | 99.80 |
| 1.5 | 38,735,026 | 234,632 | 0.0061 | 0.9939 | 99.28 |
| 2.5 | 37,437,806 | 213,974 | 0.0057 | 0.9943 | 98.67 |
| 3.5 | 34,609,548 | 196,305 | 0.0057 | 0.9943 | 98.11 |
| 4.5 | 33,265,798 | 189,945 | 0.0057 | 0.9943 | 97.55 |
| 5.5 | 30,409,524 | 190,765 | 0.0063 | 0.9937 | 97.00 |
| 6.5 | 27,014,607 | 171,618 | 0.0064 | 0.9936 | 96.39 |
| 7.5 | 24,582,829 | 222,865 | 0.0091 | 0.9909 | 95.78 |
| 8.5 | 22,798,570 | 171,100 | 0.0075 | 0.9925 | 94.91 |
| 9.5 | 20,464,549 | 166,278 | 0.0081 | 0.9919 | 94.20 |
| 10.5 | 19,161,985 | 179,670 | 0.0094 | 0.9906 | 93.43 |
| 11.5 | 17,633,000 | 208,033 | 0.0118 | 0.9882 | 92.55 |
| 12.5 | 16,059,635 | 170,901 | 0.0106 | 0.9894 | 91.46 |
| 13.5 | 14,505,941 | 130,853 | 0.0090 | 0.9910 | 90.49 |
| 14.5 | 14,388,879 | 143,565 | 0.0100 | 0.9900 | 89.67 |
| 15.5 | 14,275,426 | 206,941 | 0.0145 | 0.9855 | 88.78 |
| 16.5 | 13,456,242 | 124,845 | 0.0093 | 0.9907 | 87.49 |
| 17.5 | 12,301,840 | 106,169 | 0.0086 | 0.9914 | 86.68 |
| 18.5 | 11,900,416 | 119,853 | 0.0101 | 0.9899 | 85.93 |
| 19.5 | 11,672,886 | 115,564 | 0.0099 | 0.9901 | 85.07 |
| 20.5 | 11,365,611 | 122,141 | 0.0107 | 0.9893 | 84.22 |
| 21.5 | 11,279,148 | 155,449 | 0.0138 | 0.9862 | 83.32 |
| 22.5 | 10,963,069 | 146,453 | 0.0134 | 0.9866 | 82.17 |
| 23.5 | 10,599,491 | 119,733 | 0.0113 | 0.9887 | 81.07 |
| 24.5 | 10,171,457 | 156,799 | 0.0154 | 0.9846 | 80.16 |
| 25.5 | 9,730,253 | 190,237 | 0.0196 | 0.9804 | 78.92 |
| 26.5 | 9,221,634 | 195,880 | 0.0212 | 0.9788 | 77.38 |
| 27.5 | 8,832,301 | 158,789 | 0.0180 | 0.9820 | 75.73 |
| 28.5 | 8,032,503 | 160,447 | 0.0200 | 0.9800 | 74.37 |
| 29.5 | 7,411,439 | 104,683 | 0.0141 | 0.9859 | 72.89 |
| 30.5 | 6,237,149 | 180,132 | 0.0289 | 0.9711 | 71.86 |
| 31.5 | 5,650,880 | 159,256 | 0.0282 | 0.9718 | 69.78 |
| 32.5 | 5,090,505 | 121,398 | 0.0238 | 0.9762 | 67.82 |
| 33.5 | 4,579,222 | 96,204 | 0.0210 | 0.9790 | 66.20 |
| 34.5 | 4,042,285 | 106,494 | 0.0263 | 0.9737 | 64.81 |
| 35.5 | 3,680,918 | 97,028 | 0.0264 | 0.9736 | 63.10 |
| 36.5 | 3,274,698 | 137,849 | 0.0421 | 0.9579 | 61.44 |
| 37.5 | 3,132,576 | 112,159 | 0.0358 | 0.9642 | 58.85 |
| 38.5 | 3,026,829 | 88,469 | 0.0292 | 0.9708 | 56.74 |

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1961-2019 |  | EXPERIENCE BAND |  | 1971-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 2,670,591 | 97,332 | 0.0364 | 0.9636 | 55.09 |
| 40.5 | 2,255,277 | 73,211 | 0.0325 | 0.9675 | 53.08 |
| 41.5 | 1,947,476 | 74,783 | 0.0384 | 0.9616 | 51.35 |
| 42.5 | 1,704,265 | 65,191 | 0.0383 | 0.9617 | 49.38 |
| 43.5 | 1,470,159 | 69,834 | 0.0475 | 0.9525 | 47.49 |
| 44.5 | 1,416,451 | 64,969 | 0.0459 | 0.9541 | 45.24 |
| 45.5 | 913,948 | 42,028 | 0.0460 | 0.9540 | 43.16 |
| 46.5 | 592,625 | 30,887 | 0.0521 | 0.9479 | 41.18 |
| 47.5 | 473,621 | 20,587 | 0.0435 | 0.9565 | 39.03 |
| 48.5 | 338,521 | 18,997 | 0.0561 | 0.9439 | 37.34 |
| 49.5 | 230,574 | 8,019 | 0.0348 | 0.9652 | 35.24 |
| 50.5 | 144,553 | 8,239 | 0.0570 | 0.9430 | 34.01 |
| 51.5 | 113,507 | 2,532 | 0.0223 | 0.9777 | 32.08 |
| 52.5 | 73,360 | 7,428 | 0.1013 | 0.8987 | 31.36 |
| 53.5 | 28,228 | 5,916 | 0.2096 | 0.7904 | 28.19 |
| 54.5 | 11,547 |  | 0.0000 | 1.0000 | 22.28 |
| 55.5 | 9,827 |  | 0.0000 | 1.0000 | 22.28 |
| 56.5 | 9,827 |  | 0.0000 | 1.0000 | 22.28 |
| 57.5 | 9,412 |  | 0.0000 | 1.0000 | 22.28 |
| 58.5 |  |  |  |  | 22.28 |

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1961-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 29,968,187 | 8,422 | 0.0003 | 0.9997 | 100.00 |
| 0.5 | 28,476,322 | 77,863 | 0.0027 | 0.9973 | 99.97 |
| 1.5 | 26,796,448 | 146,414 | 0.0055 | 0.9945 | 99.70 |
| 2.5 | 25,460,565 | 134,404 | 0.0053 | 0.9947 | 99.15 |
| 3.5 | 22,807,160 | 139,648 | 0.0061 | 0.9939 | 98.63 |
| 4.5 | 21,862,137 | 145,334 | 0.0066 | 0.9934 | 98.03 |
| 5.5 | 19,378,886 | 132,784 | 0.0069 | 0.9931 | 97.37 |
| 6.5 | 16,440,383 | 105,096 | 0.0064 | 0.9936 | 96.71 |
| 7.5 | 14,319,843 | 153,537 | 0.0107 | 0.9893 | 96.09 |
| 8.5 | 13,320,731 | 108,834 | 0.0082 | 0.9918 | 95.06 |
| 9.5 | 11,580,667 | 73,137 | 0.0063 | 0.9937 | 94.28 |
| 10.5 | 11,601,219 | 125,608 | 0.0108 | 0.9892 | 93.69 |
| 11.5 | 10,617,327 | 155,038 | 0.0146 | 0.9854 | 92.67 |
| 12.5 | 9,567,220 | 131,770 | 0.0138 | 0.9862 | 91.32 |
| 13.5 | 8,537,986 | 101,514 | 0.0119 | 0.9881 | 90.06 |
| 14.5 | 9,001,001 | 79,390 | 0.0088 | 0.9912 | 88.99 |
| 15.5 | 9,265,126 | 138,163 | 0.0149 | 0.9851 | 88.21 |
| 16.5 | 8,900,493 | 72,866 | 0.0082 | 0.9918 | 86.89 |
| 17.5 | 7,805,173 | 53,997 | 0.0069 | 0.9931 | 86.18 |
| 18.5 | 7,458,117 | 63,899 | 0.0086 | 0.9914 | 85.58 |
| 19.5 | 7,716,690 | 69,791 | 0.0090 | 0.9910 | 84.85 |
| 20.5 | 8,133,345 | 77,603 | 0.0095 | 0.9905 | 84.08 |
| 21.5 | 8,530,543 | 135,406 | 0.0159 | 0.9841 | 83.28 |
| 22.5 | 8,499,486 | 123,934 | 0.0146 | 0.9854 | 81.96 |
| 23.5 | 8,473,973 | 111,646 | 0.0132 | 0.9868 | 80.76 |
| 24.5 | 8,144,553 | 146,143 | 0.0179 | 0.9821 | 79.70 |
| 25.5 | 8,480,786 | 158,757 | 0.0187 | 0.9813 | 78.27 |
| 26.5 | 8,465,399 | 193,958 | 0.0229 | 0.9771 | 76.80 |
| 27.5 | 8,217,186 | 158,789 | 0.0193 | 0.9807 | 75.04 |
| 28.5 | 7,618,206 | 160,447 | 0.0211 | 0.9789 | 73.59 |
| 29.5 | 7,152,377 | 104,683 | 0.0146 | 0.9854 | 72.04 |
| 30.5 | 6,112,486 | 180,132 | 0.0295 | 0.9705 | 70.99 |
| 31.5 | 5,564,376 | 159,256 | 0.0286 | 0.9714 | 68.90 |
| 32.5 | 5,059,337 | 121,398 | 0.0240 | 0.9760 | 66.93 |
| 33.5 | 4,573,316 | 96,204 | 0.0210 | 0.9790 | 65.32 |
| 34.5 | 4,042,285 | 106,494 | 0.0263 | 0.9737 | 63.95 |
| 35.5 | 3,680,918 | 97,028 | 0.0264 | 0.9736 | 62.26 |
| 36.5 | 3,274,698 | 137,849 | 0.0421 | 0.9579 | 60.62 |
| 37.5 | 3,132,576 | 112,159 | 0.0358 | 0.9642 | 58.07 |
| 38.5 | 3,026,829 | 88,469 | 0.0292 | 0.9708 | 55.99 |

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1961-2019 |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 2,670,591 | 97,332 | 0.0364 | 0.9636 | 54.35 |
| 40.5 | 2,255,277 | 73,211 | 0.0325 | 0.9675 | 52.37 |
| 41.5 | 1,947,476 | 74,783 | 0.0384 | 0.9616 | 50.67 |
| 42.5 | 1,704,265 | 65,191 | 0.0383 | 0.9617 | 48.73 |
| 43.5 | 1,470,159 | 69,834 | 0.0475 | 0.9525 | 46.86 |
| 44.5 | 1,416,451 | 64,969 | 0.0459 | 0.9541 | 44.64 |
| 45.5 | 913,948 | 42,028 | 0.0460 | 0.9540 | 42.59 |
| 46.5 | 592,625 | 30,887 | 0.0521 | 0.9479 | 40.63 |
| 47.5 | 473,621 | 20,587 | 0.0435 | 0.9565 | 38.51 |
| 48.5 | 338,521 | 18,997 | 0.0561 | 0.9439 | 36.84 |
| 49.5 | 230,574 | 8,019 | 0.0348 | 0.9652 | 34.77 |
| 50.5 | 144,553 | 8,239 | 0.0570 | 0.9430 | 33.56 |
| 51.5 | 113,507 | 2,532 | 0.0223 | 0.9777 | 31.65 |
| 52.5 | 73,360 | 7,428 | 0.1013 | 0.8987 | 30.94 |
| 53.5 | 28,228 | 5,916 | 0.2096 | 0.7904 | 27.81 |
| 54.5 | 11,547 |  | 0.0000 | 1.0000 | 21.98 |
| 55.5 | 9,827 |  | 0.0000 | 1.0000 | 21.98 |
| 56.5 | 9,827 |  | 0.0000 | 1.0000 | 21.98 |
| 57.5 | 9,412 |  | 0.0000 | 1.0000 | 21.98 |
| 58.5 |  |  |  |  | 21.98 |



| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 60,977,844 |
| 0.5 | 58,343,946 |
| 1.5 | 55,646,183 |
| 2.5 | 54,724,803 |
| 3.5 | 55,080,627 |
| 4.5 | 54,950,099 |
| 5.5 | 54,602,589 |
| 6.5 | 53,990,930 |
| 7.5 | 53,832,969 |
| 8.5 | 52,840,502 |
| 9.5 | 50,360,802 |
| 10.5 | 49,155,984 |
| 11.5 | 47,270,672 |
| 12.5 | 46,008,142 |
| 13.5 | 44,709,330 |
| 14.5 | 43,877,744 |
| 15.5 | 43,410,388 |
| 16.5 | 42,981,879 |
| 17.5 | 42,270,299 |
| 18.5 | 42,167,926 |
| 19.5 | 41,176,372 |
| 20.5 | 41,249,206 |
| 21.5 | 41,831,998 |
| 22.5 | 39,923,613 |
| 23.5 | 39,600,421 |
| 24.5 | 40,148,578 |
| 25.5 | 38,523,566 |
| 26.5 | 37,124,512 |
| 27.5 | 35,718,473 |
| 28.5 | 34,153,382 |
| 29.5 | 33,201,036 |
| 30.5 | 32,092,433 |
| 31.5 | 31,029,771 |
| 32.5 | 30,319,959 |
| 33.5 | 29,652,417 |
| 34.5 | 28,870,596 |
| 35.5 | 28,210,393 |
| 36.5 | 27,321,888 |
| 37.5 | 26,789,312 |
| 38.5 | 26,204,914 |

## RETIREMENTS INTERVAL

| RETMT | SURV |
| :--- | :---: |
| RATIO | RATIO |

PCT SURV BEGIN OF INTERVAL

| 88,381 | 0.0014 | 0.9986 | 100.00 |
| ---: | ---: | ---: | ---: |
| 204,319 | 0.0035 | 0.9965 | 99.86 |
| 266,268 | 0.0048 | 0.9952 | 99.51 |
| 275,415 | 0.0050 | 0.9950 | 99.03 |
| 283,809 | 0.0052 | 0.9948 | 98.53 |
| 348,035 | 0.0063 | 0.9937 | 98.02 |
| 239,029 | 0.0044 | 0.9956 | 97.40 |
| 141,426 | 0.0026 | 0.9974 | 96.98 |
| 160,670 | 0.0030 | 0.9970 | 96.72 |
| 116,545 | 0.0022 | 0.9978 | 96.43 |
| 117,171 | 0.0023 | 0.9977 | 96.22 |
| 176,342 | 0.0036 | 0.9964 | 96.00 |
| 239,977 | 0.0051 | 0.9949 | 95.65 |
| 62,561 | 0.0014 | 0.9986 | 95.17 |
| 454,428 | 0.0102 | 0.9898 | 95.04 |
| 292,165 | 0.0067 | 0.9933 | 94.07 |
| 235,370 | 0.0054 | 0.9946 | 93.44 |
| 670,292 | 0.0156 | 0.9844 | 92.94 |
| 695,222 | 0.0164 | 0.9836 | 91.49 |
| 620,937 | 0.0147 | 0.9853 | 89.98 |
| 57,130 | 0.0014 | 0.9986 | 88.66 |
| 468,344 | 0.0114 | 0.9886 | 88.54 |
| 396,830 | 0.0095 | 0.9905 | 87.53 |
| 28,136 | 0.0007 | 0.9993 | 86.70 |
| 50,132 | 0.0013 | 0.9987 | 86.64 |
| 323,752 | 0.0081 | 0.9919 | 86.53 |
| 29,887 | 0.0008 | 0.9992 | 85.83 |
| 328,540 | 0.0088 | 0.9912 | 85.77 |
| 20,555 | 0.0006 | 0.9994 | 85.01 |
| 42,311 | 0.0012 | 0.9988 | 84.96 |
| 47,758 | 0.0014 | 0.9986 | 84.85 |
| 44,051 | 0.0014 | 0.9986 | 84.73 |
| 50,469 | 0.0016 | 0.9984 | 84.61 |
| 42,553 | 0.0014 | 0.9986 | 84.48 |
| 57,301 | 0.0019 | 0.9981 | 84.36 |
| 43,565 | 0.0015 | 0.9985 | 84.19 |
| 51,209 | 0.0018 | 0.9982 | 84.07 |
| 59,178 | 0.0022 | 0.9978 | 83.92 |
| 50,270 | 0.0019 | 0.9981 | 83.73 |
| 61,780 | 0.0024 | 0.9976 | 83.58 |
|  | 0.0 |  |  |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 25,121,976 | 61,633 | 0.0025 | 0.9975 | 83.38 |
| 40.5 | 24,172,835 | 67,273 | 0.0028 | 0.9972 | 83.17 |
| 41.5 | 23,294,072 | 31,537 | 0.0014 | 0.9986 | 82.94 |
| 42.5 | 22,500,114 | 29,232 | 0.0013 | 0.9987 | 82.83 |
| 43.5 | 21,603,910 | 59,656 | 0.0028 | 0.9972 | 82.72 |
| 44.5 | 20,457,858 | 33,777 | 0.0017 | 0.9983 | 82.49 |
| 45.5 | 19,545,638 | 67,362 | 0.0034 | 0.9966 | 82.36 |
| 46.5 | 18,358,794 | 84,212 | 0.0046 | 0.9954 | 82.07 |
| 47.5 | 17,121,366 | 288,734 | 0.0169 | 0.9831 | 81.70 |
| 48.5 | 15,719,679 | 109,846 | 0.0070 | 0.9930 | 80.32 |
| 49.5 | 13,571,978 | 67,361 | 0.0050 | 0.9950 | 79.76 |
| 50.5 | 12,567,918 | 60,248 | 0.0048 | 0.9952 | 79.36 |
| 51.5 | 11,923,530 | 88,413 | 0.0074 | 0.9926 | 78.98 |
| 52.5 | 11,060,215 | 92,799 | 0.0084 | 0.9916 | 78.40 |
| 53.5 | 10,210,863 | 94,351 | 0.0092 | 0.9908 | 77.74 |
| 54.5 | 9,647,349 | 32,854 | 0.0034 | 0.9966 | 77.02 |
| 55.5 | 8,955,855 | 31,794 | 0.0036 | 0.9964 | 76.76 |
| 56.5 | 8,205,590 | 31,842 | 0.0039 | 0.9961 | 76.49 |
| 57.5 | 7,464,058 | 165,712 | 0.0222 | 0.9778 | 76.19 |
| 58.5 | 6,752,393 | 380,359 | 0.0563 | 0.9437 | 74.50 |
| 59.5 | 5,680,842 | 177,125 | 0.0312 | 0.9688 | 70.30 |
| 60.5 | 4,881,815 | 22,626 | 0.0046 | 0.9954 | 68.11 |
| 61.5 | 4,109,148 | 81,101 | 0.0197 | 0.9803 | 67.79 |
| 62.5 | 3,193,813 | 61,526 | 0.0193 | 0.9807 | 66.46 |
| 63.5 | 2,408,477 | 84,028 | 0.0349 | 0.9651 | 65.18 |
| 64.5 | 1,806,520 | 11,248 | 0.0062 | 0.9938 | 62.90 |
| 65.5 | 1,422,746 | 9,509 | 0.0067 | 0.9933 | 62.51 |
| 66.5 | 1,208,877 | 29,919 | 0.0247 | 0.9753 | 62.09 |
| 67.5 | 1,005,706 | 7,630 | 0.0076 | 0.9924 | 60.56 |
| 68.5 | 1,029,723 | 1,293 | 0.0013 | 0.9987 | 60.10 |
| 69.5 | 1,043,964 | 14,140 | 0.0135 | 0.9865 | 60.02 |
| 70.5 | 1,043,386 | 20,712 | 0.0199 | 0.9801 | 59.21 |
| 71.5 | 927,892 | 11,713 | 0.0126 | 0.9874 | 58.03 |
| 72.5 | 957,135 | 18,421 | 0.0192 | 0.9808 | 57.30 |
| 73.5 | 1,006,078 | 2,575 | 0.0026 | 0.9974 | 56.20 |
| 74.5 | 1,007,713 | 6,542 | 0.0065 | 0.9935 | 56.05 |
| 75.5 | 1,008,240 | 17,027 | 0.0169 | 0.9831 | 55.69 |
| 76.5 | 993,164 | 10,857 | 0.0109 | 0.9891 | 54.75 |
| 77.5 | 979,604 | 3,894 | 0.0040 | 0.9960 | 54.15 |
| 78.5 | 958,126 | 9,433 | 0.0098 | 0.9902 | 53.94 |


| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 956,466 | 47,752 | 0.0499 | 0.9501 | 53.40 |
| 80.5 | 926,185 | 34,719 | 0.0375 | 0.9625 | 50.74 |
| 81.5 | 925,284 | 10,698 | 0.0116 | 0.9884 | 48.84 |
| 82.5 | 902,782 | 8,779 | 0.0097 | 0.9903 | 48.27 |
| 83.5 | 892,775 | 20,725 | 0.0232 | 0.9768 | 47.80 |
| 84.5 | 864,541 | 20,342 | 0.0235 | 0.9765 | 46.69 |
| 85.5 | 806,493 | 13,492 | 0.0167 | 0.9833 | 45.59 |
| 86.5 | 779,746 | 15,858 | 0.0203 | 0.9797 | 44.83 |
| 87.5 | 747,382 | 8,808 | 0.0118 | 0.9882 | 43.92 |
| 88.5 | 695,997 | 17,945 | 0.0258 | 0.9742 | 43.40 |
| 89.5 | 649,983 | 6,083 | 0.0094 | 0.9906 | 42.28 |
| 90.5 | 599,544 | 7,731 | 0.0129 | 0.9871 | 41.89 |
| 91.5 | 545,981 | 4,090 | 0.0075 | 0.9925 | 41.35 |
| 92.5 | 479,151 | 4,254 | 0.0089 | 0.9911 | 41.04 |
| 93.5 | 430,053 | 1,339 | 0.0031 | 0.9969 | 40.67 |
| 94.5 | 369,101 | 1,888 | 0.0051 | 0.9949 | 40.55 |
| 95.5 | 346,587 | 983 | 0.0028 | 0.9972 | 40.34 |
| 96.5 | 319,498 | 371 | 0.0012 | 0.9988 | 40.22 |
| 97.5 | 243,224 | 397 | 0.0016 | 0.9984 | 40.18 |
| 98.5 | 159,456 | 35 | 0.0002 | 0.9998 | 40.11 |
| 99.5 | 151,241 | 35 | 0.0002 | 0.9998 | 40.10 |
| 100.5 | 147,330 | 59 | 0.0004 | 0.9996 | 40.09 |
| 101.5 | 146,111 | 69 | 0.0005 | 0.9995 | 40.08 |
| 102.5 | 144,738 | 76 | 0.0005 | 0.9995 | 40.06 |
| 103.5 | 140,981 | 106 | 0.0008 | 0.9992 | 40.04 |
| 104.5 | 125,195 | 55 | 0.0004 | 0.9996 | 40.01 |
| 105.5 | 110,120 | 58 | 0.0005 | 0.9995 | 39.99 |
| 106.5 | 87,393 | 27 | 0.0003 | 0.9997 | 39.97 |
| 107.5 | 83,016 | 8 | 0.0001 | 0.9999 | 39.96 |
| 108.5 | 73,867 | 11 | 0.0002 | 0.9998 | 39.95 |
| 109.5 | 63,182 |  | 0.0000 | 1.0000 | 39.95 |
| 110.5 | 63,182 |  | 0.0000 | 1.0000 | 39.95 |
| 111.5 | 61,544 |  | 0.0000 | 1.0000 | 39.95 |
| 112.5 | 59,259 |  | 0.0000 | 1.0000 | 39.95 |
| 113.5 | 58,880 |  | 0.0000 | 1.0000 | 39.95 |
| 114.5 | 38,335 |  | 0.0000 | 1.0000 | 39.95 |
| 115.5 | 34,134 |  | 0.0000 | 1.0000 | 39.95 |
| 116.5 | 34,134 |  | 0.0000 | 1.0000 | 39.95 |
| 117.5 | 34,134 |  | 0.0000 | 1.0000 | 39.95 |
| 118.5 | 34,134 |  | 0.0000 | 1.0000 | 39.95 |
| 119.5 | 34,036 |  | 0.0000 | 1.0000 | 39.95 |
| 120.5 |  |  |  |  | 39.95 |

PLACEMENT BAND 1899-2019

| AGE AT | EXPOSURES AT |
| :---: | :--- |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |


| 0.0 | $44,818,409$ |
| ---: | ---: |
| 0.5 | $43,346,508$ |
| 1.5 | $40,737,143$ |
| 2.5 | $41,547,327$ |
| 3.5 | $41,242,910$ |
| 4.5 | $40,610,868$ |
| 5.5 | $41,012,817$ |
| 6.5 | $41,237,580$ |
| 7.5 | $41,886,811$ |
| 8.5 | $41,776,135$ |
| 9.5 | $39,862,330$ |
| 10.5 | $39,178,153$ |
| 11.5 | $37,543,275$ |
| 12.5 | $36,540,574$ |
| 13.5 | $35,432,064$ |
| 14.5 | $34,499,611$ |
| 15.5 | $34,518,966$ |
| 16.5 | $34,626,940$ |
| 17.5 | $34,258,069$ |
| 18.5 | $34,398,801$ |
| 19.5 | $33,823,305$ |
| 20.5 | $34,194,189$ |
| 21.5 | $34,791,007$ |
| 22.5 | $32,755,740$ |
| 23.5 | $32,514,086$ |
| 24.5 | $32,541,089$ |
| 25.5 | $31,135,893$ |
| 26.5 | $30,429,149$ |
| 27.5 | $29,480,350$ |
| 28.5 | $28,281,157$ |

29.5 28,678,111
30.5 27,828,887
31.5 26,669,166
$32.5 \quad 25,977,296$
$33.5 \quad 25,569,471$
$34.5 \quad 24,729,327$
35.5 24,063,546
36.5 23,141,201
37.5 22,546,116
38.5 21,756,762
RETIREMENTS
DURING AGE
INTERVAL

EXPERIENCE BAND 2000-2019

| 79,435 | 0.0018 | 0.9982 | 100.00 |
| ---: | ---: | ---: | ---: |
| 203,566 | 0.0047 | 0.9953 | 99.82 |
| 239,565 | 0.0059 | 0.9941 | 99.35 |
| 248,755 | 0.0060 | 0.9940 | 98.77 |
| 263,473 | 0.0064 | 0.9936 | 98.18 |
| 324,731 | 0.0080 | 0.9920 | 97.55 |
| 222,950 | 0.0054 | 0.9946 | 96.77 |
| 123,323 | 0.0030 | 0.9970 | 96.25 |
| 140,538 | 0.0034 | 0.9966 | 95.96 |
| 88,151 | 0.0021 | 0.9979 | 95.64 |
| 86,357 | 0.0022 | 0.9978 | 95.43 |
| 152,490 | 0.0039 | 0.9961 | 95.23 |
| 217,322 | 0.0058 | 0.9942 | 94.86 |
| 46,209 | 0.0013 | 0.9987 | 94.31 |
| 435,237 | 0.0123 | 0.9877 | 94.19 |
| 269,839 | 0.0078 | 0.9922 | 93.03 |
| 219,127 | 0.0063 | 0.9937 | 92.30 |
| 651,530 | 0.0188 | 0.9812 | 91.72 |
| 684,919 | 0.0200 | 0.9800 | 89.99 |
| 607,379 | 0.0177 | 0.9823 | 88.19 |
| 33,823 | 0.0010 | 0.9990 | 86.64 |
| 460,996 | 0.0135 | 0.9865 | 86.55 |
| 387,287 | 0.0111 | 0.9889 | 85.38 |
| 22,730 | 0.0007 | 0.9993 | 84.43 |
| 38,925 | 0.0012 | 0.9988 | 84.37 |
| 314,938 | 0.0097 | 0.9903 | 84.27 |
| 27,340 | 0.0009 | 0.9991 | 83.46 |
| 323,673 | 0.0106 | 0.9894 | 83.38 |
| 19,205 | 0.0007 | 0.9993 | 82.50 |
| 38,209 | 0.0014 | 0.9986 | 82.44 |
| 42,563 | 0.0015 | 0.9985 | 82.33 |
| 41,971 | 0.0015 | 0.9985 | 82.21 |
| 47,771 | 0.0018 | 0.9982 | 82.08 |
| 35,872 | 0.0014 | 0.9986 | 81.94 |
| 45,418 | 0.0018 | 0.9982 | 81.82 |
| 37,780 | 0.0015 | 0.9985 | 81.68 |
| 49,352 | 0.0021 | 0.9979 | 81.55 |
| 54,340 | 0.0023 | 0.9977 | 81.39 |
| 47,473 | 0.0021 | 0.9979 | 81.20 |
| 58,977 | 0.0027 | 0.9973 | 81.02 |
|  | 0.9 |  |  |


| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 20,842,830 | 58, 052 | 0.0028 | 0.9972 | 80.81 |
| 40.5 | 20,217,744 | 65,667 | 0.0032 | 0.9968 | 80.58 |
| 41.5 | 19,838,759 | 30,950 | 0.0016 | 0.9984 | 80.32 |
| 42.5 | 19,661,130 | 27,505 | 0.0014 | 0.9986 | 80.19 |
| 43.5 | 19,340,870 | 58,455 | 0.0030 | 0.9970 | 80.08 |
| 44.5 | 18,652,975 | 32,790 | 0.0018 | 0.9982 | 79.84 |
| 45.5 | 18,013,035 | 66,383 | 0.0037 | 0.9963 | 79.70 |
| 46.5 | 17,022,132 | 69,044 | 0.0041 | 0.9959 | 79.40 |
| 47.5 | 15,983,783 | 225,737 | 0.0141 | 0.9859 | 79.08 |
| 48.5 | 14,886,658 | 80,508 | 0.0054 | 0.9946 | 77.97 |
| 49.5 | 12,926,426 | 61,660 | 0.0048 | 0.9952 | 77.54 |
| 50.5 | 12,077,324 | 59,485 | 0.0049 | 0.9951 | 77.17 |
| 51.5 | 11,541,796 | 87,892 | 0.0076 | 0.9924 | 76.79 |
| 52.5 | 10,650,417 | 92,340 | 0.0087 | 0.9913 | 76.21 |
| 53.5 | 9,730,334 | 93,160 | 0.0096 | 0.9904 | 75.55 |
| 54.5 | 9,184,590 | 32,395 | 0.0035 | 0.9965 | 74.83 |
| 55.5 | 8,475,157 | 30,744 | 0.0036 | 0.9964 | 74.56 |
| 56.5 | 7,728,752 | 31,116 | 0.0040 | 0.9960 | 74.29 |
| 57.5 | 7,002,135 | 165,265 | 0.0236 | 0.9764 | 73.99 |
| 58.5 | 6,343,629 | 380,122 | 0.0599 | 0.9401 | 72.25 |
| 59.5 | 5,254,240 | 176,404 | 0.0336 | 0.9664 | 67.92 |
| 60.5 | 4,458,343 | 21,862 | 0.0049 | 0.9951 | 65.64 |
| 61.5 | 3,673,919 | 80,836 | 0.0220 | 0.9780 | 65.31 |
| 62.5 | 2,781,880 | 60,721 | 0.0218 | 0.9782 | 63.88 |
| 63.5 | 1,994,400 | 84,006 | 0.0421 | 0.9579 | 62.48 |
| 64.5 | 1,372,708 | 11,100 | 0.0081 | 0.9919 | 59.85 |
| 65.5 | 1,006,723 | 9,166 | 0.0091 | 0.9909 | 59.37 |
| 66.5 | 769,923 | 29,624 | 0.0385 | 0.9615 | 58.83 |
| 67.5 | 538,006 | 7,476 | 0.0139 | 0.9861 | 56.56 |
| 68.5 | 560,572 | 752 | 0.0013 | 0.9987 | 55.78 |
| 69.5 | 577,403 | 14,140 | 0.0245 | 0.9755 | 55.70 |
| 70.5 | 587,942 | 20,619 | 0.0351 | 0.9649 | 54.34 |
| 71.5 | 513,071 | 11,594 | 0.0226 | 0.9774 | 52.43 |
| 72.5 | 566,992 | 18,325 | 0.0323 | 0.9677 | 51.25 |
| 73.5 | 617,368 | 2,463 | 0.0040 | 0.9960 | 49.59 |
| 74.5 | 675,667 | 3,336 | 0.0049 | 0.9951 | 49.39 |
| 75.5 | 724,005 | 11,868 | 0.0164 | 0.9836 | 49.15 |
| 76.5 | 742,129 | 6,526 | 0.0088 | 0.9912 | 48.34 |
| 77.5 | 806,997 | 3,886 | 0.0048 | 0.9952 | 47.92 |
| 78.5 | 871,029 | 9,433 | 0.0108 | 0.9892 | 47.69 |


| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 867,185 | 13,484 | 0.0155 | 0.9845 | 47.17 |
| 80.5 | 841,996 | 6,051 | 0.0072 | 0.9928 | 46.44 |
| 81.5 | 837,102 | 10,675 | 0.0128 | 0.9872 | 46.10 |
| 82.5 | 812,991 | 8,637 | 0.0106 | 0.9894 | 45.52 |
| 83.5 | 800,634 | 20,725 | 0.0259 | 0.9741 | 45.03 |
| 84.5 | 780,868 | 20,326 | 0.0260 | 0.9740 | 43.87 |
| 85.5 | 738,130 | 13,473 | 0.0183 | 0.9817 | 42.73 |
| 86.5 | 733,335 | 15,858 | 0.0216 | 0.9784 | 41.95 |
| 87.5 | 703,772 | 8,665 | 0.0123 | 0.9877 | 41.04 |
| 88.5 | 661,404 | 17,750 | 0.0268 | 0.9732 | 40.53 |
| 89.5 | 612,972 | 6,069 | 0.0099 | 0.9901 | 39.45 |
| 90.5 | 559,795 | 7,731 | 0.0138 | 0.9862 | 39.05 |
| 91.5 | 507,842 | 4,090 | 0.0081 | 0.9919 | 38.52 |
| 92.5 | 443,261 | 4,254 | 0.0096 | 0.9904 | 38.21 |
| 93.5 | 394,542 | 1,339 | 0.0034 | 0.9966 | 37.84 |
| 94.5 | 353,680 | 1,839 | 0.0052 | 0.9948 | 37.71 |
| 95.5 | 313,047 | 983 | 0.0031 | 0.9969 | 37.51 |
| 96.5 | 285,958 | 371 | 0.0013 | 0.9987 | 37.40 |
| 97.5 | 209,684 | 397 | 0.0019 | 0.9981 | 37.35 |
| 98.5 | 125,916 | 35 | 0.0003 | 0.9997 | 37.28 |
| 99.5 | 117,799 | 35 | 0.0003 | 0.9997 | 37.27 |
| 100.5 | 147,330 | 59 | 0.0004 | 0.9996 | 37.26 |
| 101.5 | 146,111 | 69 | 0.0005 | 0.9995 | 37.24 |
| 102.5 | 144,738 | 76 | 0.0005 | 0.9995 | 37.22 |
| 103.5 | 140,981 | 106 | 0.0008 | 0.9992 | 37.20 |
| 104.5 | 125,195 | 55 | 0.0004 | 0.9996 | 37.18 |
| 105.5 | 110,120 | 58 | 0.0005 | 0.9995 | 37.16 |
| 106.5 | 87,393 | 27 | 0.0003 | 0.9997 | 37.14 |
| 107.5 | 83,016 | 8 | 0.0001 | 0.9999 | 37.13 |
| 108.5 | 73,867 | 11 | 0.0002 | 0.9998 | 37.12 |
| 109.5 | 63,182 |  | 0.0000 | 1.0000 | 37.12 |
| 110.5 | 63,182 |  | 0.0000 | 1.0000 | 37.12 |
| 111.5 | 61,544 |  | 0.0000 | 1.0000 | 37.12 |
| 112.5 | 59,259 |  | 0.0000 | 1.0000 | 37.12 |
| 113.5 | 58,880 |  | 0.0000 | 1.0000 | 37.12 |
| 114.5 | 38,335 |  | 0.0000 | 1.0000 | 37.12 |
| 115.5 | 34,134 |  | 0.0000 | 1.0000 | 37.12 |
| 116.5 | 34,134 |  | 0.0000 | 1.0000 | 37.12 |
| 117.5 | 34,134 |  | 0.0000 | 1.0000 | 37.12 |
| 118.5 | 34,134 |  | 0.0000 | 1.0000 | 37.12 |
| 119.5 | 34,036 |  | 0.0000 | 1.0000 | 37.12 |
| 120.5 |  |  |  |  | 37.12 |



ACCOUNT 370 METERS AND SMART METERS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1913-2019
EXPERIENCE BAND 1964-2019

| Age AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 144,055,993 |
| 0.5 | 136,865,405 |
| 1.5 | 130,787,782 |
| 2.5 | 123,830,903 |
| 3.5 | 121,445,790 |
| 4.5 | 120,108,740 |
| 5.5 | 118,614,486 |
| 6.5 | 114,067,007 |
| 7.5 | 113,112,557 |
| 8.5 | 111,870,169 |
| 9.5 | 107,492,731 |
| 10.5 | 102,561,598 |
| 11.5 | 92,269,102 |
| 12.5 | 75,750,059 |
| 13.5 | 68,818,048 |
| 14.5 | 67,217,757 |
| 15.5 | 67,192,849 |
| 16.5 | 66,499,123 |
| 17.5 | 65,502,047 |
| 18.5 | 64,609,167 |
| 19.5 | 63,673,364 |
| 20.5 | 62,434,510 |
| 21.5 | 58,082,966 |
| 22.5 | 53,862,807 |
| 23.5 | 49,177,902 |
| 24.5 | 44,992,467 |
| 25.5 | 41,195,760 |
| 26.5 | 37,248,614 |
| 27.5 | 32,825,491 |
| 28.5 | 28,664,017 |
| 29.5 | 25,329,514 |
| 30.5 | 19,315,744 |
| 31.5 | 16,839,240 |
| 32.5 | 14,522,477 |
| 33.5 | 12,118,085 |
| 34.5 | 10,433,233 |
| 35.5 | 8,921,837 |
| 36.5 | 7,478,129 |
| 37.5 | 6,253,707 |
| 38.5 | 5,275,775 |


| RETIREMENTS <br> DURING AGE <br> INTERVAL | RETMT | SURV | PCT SURV |
| ---: | ---: | ---: | ---: |
| REGIN OF |  |  |  |

## ACCOUNT 370 METERS AND SMART METERS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1913-2019
EXPERIENCE BAND 1964-2019

| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 4,583,183 | 722,133 | 0.1576 | 0.8424 | 2.73 |
| 40.5 | 3,903,760 | 715,080 | 0.1832 | 0.8168 | 2.30 |
| 41.5 | 3,222,209 | 540,989 | 0.1679 | 0.8321 | 1.88 |
| 42.5 | 2,710,310 | 561,168 | 0.2070 | 0.7930 | 1.56 |
| 43.5 | 2,176,678 | 357,721 | 0.1643 | 0.8357 | 1.24 |
| 44.5 | 1,843,525 | 367,688 | 0.1994 | 0.8006 | 1.04 |
| 45.5 | 1,487,718 | 292,181 | 0.1964 | 0.8036 | 0.83 |
| 46.5 | 1,210,724 | 311,746 | 0.2575 | 0.7425 | 0.67 |
| 47.5 | 905,364 | 268,965 | 0.2971 | 0.7029 | 0.50 |
| 48.5 | 639,007 | 158,149 | 0.2475 | 0.7525 | 0.35 |
| 49.5 | 481,722 | 128,292 | 0.2663 | 0.7337 | 0.26 |
| 50.5 | 354,949 | 47,663 | 0.1343 | 0.8657 | 0.19 |
| 51.5 | 308,297 | 31,757 | 0.1030 | 0.8970 | 0.17 |
| 52.5 | 278,370 | 41,026 | 0.1474 | 0.8526 | 0.15 |
| 53.5 | 239,849 | 31,526 | 0.1314 | 0.8686 | 0.13 |
| 54.5 | 208,637 | 22,404 | 0.1074 | 0.8926 | 0.11 |
| 55.5 | 193,308 | 28,789 | 0.1489 | 0.8511 | 0.10 |
| 56.5 | 167,451 | 27,682 | 0.1653 | 0.8347 | 0.08 |
| 57.5 | 140,043 | 42,143 | 0.3009 | 0.6991 | 0.07 |
| 58.5 | 101,198 | 9,339 | 0.0923 | 0.9077 | 0.05 |
| 59.5 | 92,873 | 13,068 | 0.1407 | 0.8593 | 0.04 |
| 60.5 | 80,462 | 15,291 | 0.1900 | 0.8100 | 0.04 |
| 61.5 | 65,590 | 21,176 | 0.3228 | 0.6772 | 0.03 |
| 62.5 | 45,018 | 1,955 | 0.0434 | 0.9566 | 0.02 |
| 63.5 | 43,261 | 6,438 | 0.1488 | 0.8512 | 0.02 |
| 64.5 | 37,027 | 2,798 | 0.0756 | 0.9244 | 0.02 |
| 65.5 | 34,334 | 4,897 | 0.1426 | 0.8574 | 0.02 |
| 66.5 | 29,492 | 3,623 | 0.1229 | 0.8771 | 0.01 |
| 67.5 | 25,951 | 1,408 | 0.0543 | 0.9457 | 0.01 |
| 68.5 | 24,597 | 976 | 0.0397 | 0.9603 | 0.01 |
| 69.5 | 23,795 | 691 | 0.0290 | 0.9710 | 0.01 |
| 70.5 | 23,266 | 635 | 0.0273 | 0.9727 | 0.01 |
| 71.5 | 22,744 | 2,237 | 0.0983 | 0.9017 | 0.01 |
| 72.5 | 20,597 | 2,989 | 0.1451 | 0.8549 | 0.01 |
| 73.5 | 18,061 | 1,561 | 0.0864 | 0.9136 | 0.01 |
| 74.5 | 16,583 | 1,541 | 0.0929 | 0.9071 | 0.01 |
| 75.5 | 15,141 | 8,953 | 0.5913 | 0.4087 | 0.01 |
| 76.5 | 6,244 | 1,633 | 0.2615 | 0.7385 | 0.00 |
| 77.5 | 4,662 | 1,963 | 0.4210 | 0.5790 | 0.00 |
| 78.5 | 2,720 | 1,111 | 0.4084 | 0.5916 | 0.00 |

```
            DUQUESNE LIGHT COMPANY
                ACCOUNT 370 METERS AND SMART METERS
                            ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1913-2019 |  | EXPERIENCE BAND 1964-2019 |  |  |  |  |
| :---: | ---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |  |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |  |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |  |
| 79.5 |  | 1,619 |  | 960 | 0.5928 | 0.4072 |

ACCOUNT 370 METERS AND SMART METERS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1917-2019
EXPERIENCE BAND 2000-2019

| AGE AT |  |
| ---: | ---: |
| BEGIN OF |  |
| INTERVAL | EXPOSURES AT <br> BEGINNING OF <br> AGE INTERVAL |
| 0.0 | $94,501,027$ |
| 0.5 | $86,363,830$ |
| 1.5 | $79,566,110$ |
| 2.5 | $72,341,314$ |
| 3.5 | $69,463,015$ |
| 4.5 | $68,580,484$ |
| 5.5 | $69,068,361$ |
| 6.5 | $66,548,175$ |
| 7.5 | $67,279,450$ |
| 8.5 | $67,691,538$ |
| 9.5 | $65,329,933$ |
| 10.5 | $62,845,255$ |
| 11.5 | $55,513,409$ |
| 12.5 | $41,215,905$ |
| 13.5 | $36,169,558$ |
| 14.5 | $36,655,397$ |
| 15.5 | $37,456,677$ |
| 16.5 | $38,407,689$ |
| 17.5 | $39,211,099$ |
| 18.5 | $39,976,334$ |
| 19.5 | $40,725,412$ |
| 20.5 | $41,238,637$ |
| 21.5 | $39,013,823$ |
| 22.5 | $35,712,679$ |
| 23.5 | $31,965,056$ |
| 24.5 | $28,627,879$ |
| 25.5 | $25,716,899$ |
| 26.5 | $22,599,462$ |
| 27.5 | $18,900,091$ |
| 28.5 | $16,085,967$ |
| 29.5 | $13,705,935$ |
| 30.5 | $8,340,534$ |
| 31.5 | $6,462,927$ |
| 32.5 | $4,786,022$ |
| 33.5 | $3,066,612$ |
| 34.5 | $2,056,199$ |
| 35.5 | $1,429,438$ |
| 36.5 | 827,562 |
| 38.5 | 319,814 |


| RETIREMENTS <br> DURING AGE <br> INTERVAL | RETMT | RURV | PCT SURV |
| ---: | ---: | ---: | ---: |
| BEGIN OF |  |  |  |

ACCOUNT 370 METERS AND SMART METERS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1917-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 256,507 | 97,311 | 0.3794 | 0.6206 | 0.06 |
| 40.5 | 196,931 | 95,535 | 0.4851 | 0.5149 | 0.04 |
| 41.5 | 149,686 | 26,142 | 0.1746 | 0.8254 | 0.02 |
| 42.5 | 153,082 | 39,952 | 0.2610 | 0.7390 | 0.02 |
| 43.5 | 145,680 | 37,663 | 0.2585 | 0.7415 | 0.01 |
| 44.5 | 142,423 | 48,623 | 0.3414 | 0.6586 | 0.01 |
| 45.5 | 147,414 | 28,695 | 0.1947 | 0.8053 | 0.01 |
| 46.5 | 167,528 | 32,903 | 0.1964 | 0.8036 | 0.00 |
| 47.5 | 153,352 | 34,537 | 0.2252 | 0.7748 | 0.00 |
| 48.5 | 132,045 | 54,460 | 0.4124 | 0.5876 | 0.00 |
| 49.5 | 101,847 | 48,504 | 0.4762 | 0.5238 | 0.00 |
| 50.5 | 72,790 | 17,175 | 0.2360 | 0.7640 | 0.00 |
| 51.5 | 66,592 | 13,112 | 0.1969 | 0.8031 | 0.00 |
| 52.5 | 60,518 | 24,707 | 0.4083 | 0.5917 | 0.00 |
| 53.5 | 39,530 | 18,996 | 0.4806 | 0.5194 | 0.00 |
| 54.5 | 45,228 | 10,464 | 0.2314 | 0.7686 | 0.00 |
| 55.5 | 37,855 | 6,689 | 0.1767 | 0.8233 | 0.00 |
| 56.5 | 36,413 | 3,561 | 0.0978 | 0.9022 | 0.00 |
| 57.5 | 45,148 | 25,820 | 0.5719 | 0.4281 | 0.00 |
| 58.5 | 39,017 | 1,880 | 0.0482 | 0.9518 | 0.00 |
| 59.5 | 39,406 | 5,427 | 0.1377 | 0.8623 | 0.00 |
| 60.5 | 39,583 | 12,661 | 0.3199 | 0.6801 | 0.00 |
| 61.5 | 29,541 | 20,064 | 0.6792 | 0.3208 | 0.00 |
| 62.5 | 12,736 | 1,320 | 0.1037 | 0.8963 | 0.00 |
| 63.5 | 14,751 | 5,832 | 0.3954 | 0.6046 | 0.00 |
| 64.5 | 10,211 | 2,448 | 0.2397 | 0.7603 | 0.00 |
| 65.5 | 8,638 | 3,303 | 0.3824 | 0.6176 | 0.00 |
| 66.5 | 5,947 | 3,337 | 0.5611 | 0.4389 | 0.00 |
| 67.5 | 3,235 | 1,183 | 0.3656 | 0.6344 | 0.00 |
| 68.5 | 4,179 | 859 | 0.2055 | 0.7945 | 0.00 |
| 69.5 | 6,254 | 599 | 0.0958 | 0.9042 | 0.00 |
| 70.5 | 7,287 | 626 | 0.0859 | 0.9141 | 0.00 |
| 71.5 | 8,182 | 2,207 | 0.2697 | 0.7303 | 0.00 |
| 72.5 | 14,552 | 2,972 | 0.2043 | 0.7957 | 0.00 |
| 73.5 | 13,583 | 1,561 | 0.1149 | 0.8851 | 0.00 |
| 74.5 | 13,968 | 1,519 | 0.1088 | 0.8912 | 0.00 |
| 75.5 | 13,579 | 8,953 | 0.6593 | 0.3407 | 0.00 |
| 76.5 | 5,593 | 1,633 | 0.2920 | 0.7080 | 0.00 |
| 77.5 | 4,393 | 1,963 | 0.4468 | 0.5532 | 0.00 |
| 78.5 | 2,637 | 1,086 | 0.4119 | 0.5881 | 0.00 |

```
            DUQUESNE LIGHT COMPANY
                ACCOUNT 370 METERS AND SMART METERS
            ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1917-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Age AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 1,561 | 960 | 0.6148 | 0.3852 | 0.00 |
| 80.5 | 601 | 405 | 0.6729 | 0.3271 | 0.00 |
| 81.5 | 208 | 197 | 0.9470 | 0.0530 | 0.00 |
| 82.5 | 58 |  | 0.0000 | 1.0000 | 0.00 |
| 83.5 | 61 |  | 0.0000 | 1.0000 | 0.00 |
| 84.5 | 61 | 12 | 0.1901 | 0.8099 | 0.00 |
| 85.5 | 49 | 49 | 1.0000 |  | 0.00 |
| 86.5 |  |  |  |  |  |



```
                                    DUQUESNE LIGHT COMPANY
ACCOUNT 370.1 METERS - COMMUNICATION EQUIPMENT
    ORIGINAL LIFE TABLE
```

| PLACEMENT BAND 2000-2014 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 0.0 | 19,885,224 |  | 0.0000 | 1.0000 | 100.00 |
| 0.5 | 19,885,224 |  | 0.0000 | 1.0000 | 100.00 |
| 1.5 | 19,885,224 | 2,491 | 0.0001 | 0.9999 | 100.00 |
| 2.5 | 19,882,733 | 1,252 | 0.0001 | 0.9999 | 99.99 |
| 3.5 | 19,881,481 |  | 0.0000 | 1.0000 | 99.98 |
| 4.5 | 19,881,481 |  | 0.0000 | 1.0000 | 99.98 |
| 5.5 | 19,868,354 |  | 0.0000 | 1.0000 | 99.98 |
| 6.5 | 19,868,354 |  | 0.0000 | 1.0000 | 99.98 |
| 7.5 | 19,861,608 | 184,546 | 0.0093 | 0.9907 | 99.98 |
| 8.5 | 19,677,062 | 17,023,103 | 0.8651 | 0.1349 | 99.05 |
| 9.5 | 2,641,170 | 2,523,552 | 0.9555 | 0.0445 | 13.36 |
| 10.5 | 117,618 | 31 | 0.0003 | 0.9997 | 0.59 |
| 11.5 | 117,587 | 84,132 | 0.7155 | 0.2845 | 0.59 |
| 12.5 | 33,456 | 33,456 | 1.0000 |  | 0.17 |
| 13.5 |  |  |  |  |  |



ACCOUNT 373 STREET LIGHTING EQUIPMENT

## ORIGINAL LIFE TABLE

PLACEMENT BAND 1893-2019
EXPERIENCE BAND 1964-2019
\(\left.\begin{array}{rr}AGE AT \& EXPOSURES AT <br>
BEGIN OF <br>
INTERVAL \& BEGINNING OF <br>

AGE INTERVAL\end{array}\right\}\)| 0.0 | $57,012,266$ |
| :---: | ---: |
| 0.5 | $55,859,891$ |
| 1.5 | $54,914,439$ |
| 2.5 | $51,914,975$ |
| 3.5 | $49,733,598$ |
| 4.5 | $48,120,042$ |
| 5.5 | $46,139,288$ |
| 6.5 | $45,021,860$ |
| 7.5 | $43,647,676$ |
| 8.5 | $40,705,645$ |
| 9.5 | $38,173,614$ |
| 10.5 | $36,387,670$ |
| 11.5 | $35,674,447$ |
| 12.5 | $33,380,355$ |
| 13.5 | $32,444,550$ |
| 14.5 | $30,175,028$ |
| 15.5 | $29,420,530$ |
| 16.5 | $29,026,092$ |
| 17.5 | $28,314,828$ |
| 18.5 | $27,874,782$ |
| 19.5 | $26,753,749$ |
| 20.5 | $23,766,353$ |
| 21.5 | $23,461,181$ |
| 22.5 | $23,296,858$ |
| 23.5 | $22,018,712$ |
| 24.5 | $20,888,593$ |
| 25.5 | $19,553,069$ |
| 26.5 | $18,605,371$ |
| 27.5 | $18,055,824$ |
| 28.5 | $17,498,202$ |
| 29.5 | $16,952,247$ |
| 30.5 | $16,660,512$ |
| 31.5 | $16,146,858$ |
| 32.5 | $15,684,602$ |
| 33.5 | $14,819,993$ |
| 34.5 | $13,498,894$ |
| 35.5 | $11,548,567$ |
| 36.5 | $7,929,800$ |
| 37.5 | 38.5 |

## RETIREMENTS DURING AGE INTERVAL

|  |  | PCT SURV |
| :--- | :---: | :---: |
| RETMT | SURV | BEGIN OF |
| RATIO | RATIO | INTERVAL |


| 77,096 | 0.0014 | 0.9986 | 100.00 |
| ---: | ---: | ---: | ---: |
| 425,067 | 0.0076 | 0.9924 | 99.86 |
| $1,655,937$ | 0.0302 | 0.9698 | 99.10 |
| $1,261,142$ | 0.0243 | 0.9757 | 96.12 |
| $1,305,408$ | 0.0262 | 0.9738 | 93.78 |
| $1,694,960$ | 0.0352 | 0.9648 | 91.32 |
| $1,114,271$ | 0.0242 | 0.9758 | 88.10 |
| $1,653,129$ | 0.0367 | 0.9633 | 85.98 |
| $1,012,475$ | 0.0232 | 0.9768 | 82.82 |


| $1,598,497$ | 0.0419 | 0.9581 | 78.31 |
| :--- | :--- | :--- | :--- |


| 954,198 | 0.0262 | 0.9738 | 75.03 |
| :--- | :--- | :--- | :--- |


| 757.944 | 0.0212 | 0.9788 | 73.06 |
| :--- | :--- | :--- | :--- |

$1,021,6760.0306 \quad 0.9694 \quad 71.51$
$\begin{array}{llll}701.474 & 0.0216 & 0.9784 & 69.32\end{array}$
689.166 0.0228 $0.9772 \quad 67.82$
$\begin{array}{llll}581,415 & 0.0198 & 0.9802 & 66.27\end{array}$
$551.837 \quad 0.0190 \quad 0.9810 \quad 64.96$
623.247 0.0220 $0.9780 \quad 63.73$
$549.1450 .0197 \quad 0.9803 \quad 62.32$
665,290 0.0249 0.9751 61.10
$\begin{array}{llll}431.519 & 0.0182 & 0.9818 & 59.58\end{array}$
$\begin{array}{llll}333,294 & 0.0142 & 0.9858 & 58.50\end{array}$
$257.406 \quad 0.0110 \quad 0.9890 \quad 57.66$
$328.7720 .0149 \quad 0.9851 \quad 57.03$
$256.143 \quad 0.0123 \quad 0.9877 \quad 56.18$
$186.357 \quad 0.0095 \quad 0.9905 \quad 55.49$
$132.956 \quad 0.0071 \quad 0.9929 \quad 54.96$
$117.821 \quad 0.0065 \quad 0.9935 \quad 54.57$
$144,026 \quad 0.0082 \quad 0.9918 \quad 54.21$
$\begin{array}{llll}71.453 & 0.0042 & 0.9958 & 53.76\end{array}$
$86.687 \quad 0.0052 \quad 0.9948$ 53.54
$41.049 \quad 0.0025 \quad 0.9975$ 53.26
$\begin{array}{llll}71,925 & 0.0046 & 0.9954 & 53.12\end{array}$
$74.638 \quad 0.0050 \quad 0.9950 \quad 52.88$
$61.819 \quad 0.0046 \quad 0.9954 \quad 52.61$
$41.081 \quad 0.0036 \quad 0.9964 \quad 52.37$
$49.356 \quad 0.0052 \quad 0.9948 \quad 52.19$
$60.879 \quad 0.0077 \quad 0.9923 .92$
67,658 0.0096 $0.9904 \quad 51.52$

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 6,285,611 | 48,833 | 0.0078 | 0.9922 | 51.03 |
| 40.5 | 5,525,206 | 55,757 | 0.0101 | 0.9899 | 50.63 |
| 41.5 | 5,249,171 | 36,201 | 0.0069 | 0.9931 | 50.12 |
| 42.5 | 5,041,071 | 35,803 | 0.0071 | 0.9929 | 49.77 |
| 43.5 | 4,739,331 | 46,543 | 0.0098 | 0.9902 | 49.42 |
| 44.5 | 4,473,462 | 28,971 | 0.0065 | 0.9935 | 48.93 |
| 45.5 | 4,226,132 | 39,422 | 0.0093 | 0.9907 | 48.62 |
| 46.5 | 3,804,665 | 39,381 | 0.0104 | 0.9896 | 48.16 |
| 47.5 | 3,564,630 | 32,750 | 0.0092 | 0.9908 | 47.67 |
| 48.5 | 3,351,332 | 75,881 | 0.0226 | 0.9774 | 47.23 |
| 49.5 | 2,825,694 | 39,298 | 0.0139 | 0.9861 | 46.16 |
| 50.5 | 2,594,008 | 26,050 | 0.0100 | 0.9900 | 45.52 |
| 51.5 | 2,464,675 | 36,622 | 0.0149 | 0.9851 | 45.06 |
| 52.5 | 2,225,536 | 32,786 | 0.0147 | 0.9853 | 44.39 |
| 53.5 | 2,016,661 | 18,246 | 0.0090 | 0.9910 | 43.74 |
| 54.5 | 1,818,099 | 16,148 | 0.0089 | 0.9911 | 43.34 |
| 55.5 | 1,730,383 | 8,482 | 0.0049 | 0.9951 | 42.95 |
| 56.5 | 1,648,156 | 6,330 | 0.0038 | 0.9962 | 42.74 |
| 57.5 | 1,495,920 | 21,454 | 0.0143 | 0.9857 | 42.58 |
| 58.5 | 1,392,048 | 10,250 | 0.0074 | 0.9926 | 41.97 |
| 59.5 | 1,272,202 | 13,219 | 0.0104 | 0.9896 | 41.66 |
| 60.5 | 1,149,684 | 8,924 | 0.0078 | 0.9922 | 41.23 |
| 61.5 | 1,090,162 | 8,436 | 0.0077 | 0.9923 | 40.91 |
| 62.5 | 1,053,330 | 4,937 | 0.0047 | 0.9953 | 40.59 |
| 63.5 | 997,900 | 7,655 | 0.0077 | 0.9923 | 40.40 |
| 64.5 | 928,674 | 10,886 | 0.0117 | 0.9883 | 40.09 |
| 65.5 | 888,850 | 6,857 | 0.0077 | 0.9923 | 39.62 |
| 66.5 | 854,345 | 5,491 | 0.0064 | 0.9936 | 39.32 |
| 67.5 | 824,240 | 14,589 | 0.0177 | 0.9823 | 39.06 |
| 68.5 | 782,019 | 5,047 | 0.0065 | 0.9935 | 38.37 |
| 69.5 | 760,848 | 7,547 | 0.0099 | 0.9901 | 38.12 |
| 70.5 | 749,528 | 5,861 | 0.0078 | 0.9922 | 37.75 |
| 71.5 | 735,539 | 13,002 | 0.0177 | 0.9823 | 37.45 |
| 72.5 | 723,967 | 13,030 | 0.0180 | 0.9820 | 36.79 |
| 73.5 | 709,072 | 2,164 | 0.0031 | 0.9969 | 36.13 |
| 74.5 | 705,656 | 13,423 | 0.0190 | 0.9810 | 36.02 |
| 75.5 | 691,211 | 10,921 | 0.0158 | 0.9842 | 35.33 |
| 76.5 | 671,262 | 3,656 | 0.0054 | 0.9946 | 34.77 |
| 77.5 | 658,090 | 7,513 | 0.0114 | 0.9886 | 34.58 |
| 78.5 | 612,516 | 6,394 | 0.0104 | 0.9896 | 34.19 |

ACCOUNT 373 STREET LIGHTING EQUIPMENT

## ORIGINAL LIFE TABLE, CONT.

| PLACEMENT | ND 1893-2019 |  | EXPE | IENCE BA | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 594,865 | 5,270 | 0.0089 | 0.9911 | 33.83 |
| 80.5 | 567,188 | 2,897 | 0.0051 | 0.9949 | 33.53 |
| 81.5 | 563,864 | 1,658 | 0.0029 | 0.9971 | 33.36 |
| 82.5 | 527,419 | 1,191 | 0.0023 | 0.9977 | 33.26 |
| 83.5 | 521,732 | 1,193 | 0.0023 | 0.9977 | 33.19 |
| 84.5 | 492,750 | 1,972 | 0.0040 | 0.9960 | 33.11 |
| 85.5 | 447,766 | 4,147 | 0.0093 | 0.9907 | 32.98 |
| 86.5 | 413,701 | 3,235 | 0.0078 | 0.9922 | 32.67 |
| 87.5 | 399,342 | 1,363 | 0.0034 | 0.9966 | 32.42 |
| 88.5 | 342,055 | 803 | 0.0023 | 0.9977 | 32.31 |
| 89.5 | 323,260 | 1,181 | 0.0037 | 0.9963 | 32.23 |
| 90.5 | 306,458 | 754 | 0.0025 | 0.9975 | 32.11 |
| 91.5 | 218,310 | 409 | 0.0019 | 0.9981 | 32.03 |
| 92.5 | 171,207 | 445 | 0.0026 | 0.9974 | 31.97 |
| 93.5 | 127,078 | 363 | 0.0029 | 0.9971 | 31.89 |
| 94.5 | 111,472 | 1,913 | 0.0172 | 0.9828 | 31.80 |
| 95.5 | 85,675 | 261 | 0.0030 | 0.9970 | 31.25 |
| 96.5 | 75,553 | 301 | 0.0040 | 0.9960 | 31.16 |
| 97.5 | 68,119 | 781 | 0.0115 | 0.9885 | 31.04 |
| 98.5 | 60,821 | 107 | 0.0018 | 0.9982 | 30.68 |
| 99.5 | 54,591 | 12 | 0.0002 | 0.9998 | 30.63 |
| 100.5 | 54,391 | 12 | 0.0002 | 0.9998 | 30.62 |
| 101.5 | 54,119 | 264 | 0.0049 | 0.9951 | 30.61 |
| 102.5 | 52,267 | 76 | 0.0015 | 0.9985 | 30.46 |
| 103.5 | 52,047 | 88 | 0.0017 | 0.9983 | 30.42 |
| 104.5 | 51,400 | 71 | 0.0014 | 0.9986 | 30.37 |
| 105.5 | 50,530 | 198 | 0.0039 | 0.9961 | 30.33 |
| 106.5 | 40,347 | 206 | 0.0051 | 0.9949 | 30.21 |
| 107.5 | 40,140 | 53 | 0.0013 | 0.9987 | 30.05 |
| 108.5 | 38,187 | 90 | 0.0023 | 0.9977 | 30.01 |
| 109.5 | 33,947 | 135 | 0.0040 | 0.9960 | 29.94 |
| 110.5 | 33,813 | 25 | 0.0008 | 0.9992 | 29.82 |
| 111.5 | 33,760 | 93 | 0.0028 | 0.9972 | 29.80 |
| 112.5 | 30,770 | 82 | 0.0027 | 0.9973 | 29.72 |
| 113.5 | 30,637 | 169 | 0.0055 | 0.9945 | 29.64 |
| 114.5 | 29,265 | 272 | 0.0093 | 0.9907 | 29.47 |
| 115.5 | 25,121 | 253 | 0.0101 | 0.9899 | 29.20 |
| 116.5 | 19,835 | 314 | 0.0158 | 0.9842 | 28.91 |
| 117.5 | 10,023 | 433 | 0.0432 | 0.9568 | 28.45 |
| 118.5 | 3,154 | 17 | 0.0052 | 0.9948 | 27.22 |

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DUQUESNE LIGHT COMPANY
ACCOUNT 373 STREET LIGHTING EQUIPMENT
ORIGINAL LIFE TABLE, CONT.
```

| PLACEMENT BAND 1893-2019 |  | EXPERIENCE BAND | 1964-2019 |  |  |  |
| :---: | ---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |  |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |  |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |  |
|  |  | 2,935 |  | 0.0000 | 1.0000 | 27.08 |
| 119.5 | 122 |  | 0.0000 | 1.0000 | 27.08 |  |
| 120.5 | 21 |  | 0.0000 | 1.0000 | 27.08 |  |
| 121.5 | 21 |  | 0.0000 | 1.0000 | 27.08 |  |
| 122.5 | 21 |  | 0.0000 | 1.0000 | 27.08 |  |
| 123.5 | 21 |  | 0.0000 | 1.0000 | 27.08 |  |
| 124.5 | 21 |  | 0.0000 | 1.0000 | 27.08 |  |
| 125.5 |  |  |  |  | 27.08 |  |

duQuesne light company


| AGE AT | EXPOSURES AT |
| ---: | ---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | $156,615,752$ |
| 0.5 | $149,263,144$ |
| 1.5 | $136,213,061$ |
| 2.5 | $129,026,811$ |
| 3.5 | $126,029,307$ |
| 4.5 | $124,523,851$ |
| 5.5 | $111,593,565$ |
| 6.5 | $102,989,368$ |
| 7.5 | $97,431,962$ |
| 8.5 | $90,271,487$ |
| 9.5 | $88,897,519$ |
| 10.5 | $85,693,715$ |
| 11.5 | $84,372,240$ |
| 12.5 | $82,781,897$ |
| 13.5 | $58,444,683$ |
| 14.5 | $56,536,731$ |
| 15.5 | $54,423,398$ |
| 16.5 | $53,078,645$ |
| 17.5 | $50,512,222$ |
| 18.5 | $40,954,107$ |
| 19.5 | $38,215,697$ |
| 20.5 | $37,495,260$ |
| 21.5 | $35,686,378$ |
| 22.5 | $33,229,913$ |
| 23.5 | $31,960,330$ |
| 24.5 | $30,749,888$ |
| 25.5 | $30,096,272$ |
| 26.5 | $29,197,386$ |
| 27.5 | $28,622,846$ |
| 28.5 | $27,614,309$ |
| 29.5 | $23,881,915$ |
| 30.5 | $22,983,808$ |
| 31.5 | $22,239,685$ |
| 32.5 | $21,363,023$ |
| 33.5 | $20,097,604$ |
| 34.5 | $19,297,943$ |
| 35.5 | $18,308,798$ |
| 36.5 | $18,413,668$ |
| 37.5 | $8,579,856$ |
| 38.5 | $8,502,644$ |

RETIREMENTS
DURING AGE
INTERVAL

PCT SURV BEGIN OF INTERVAL

| 16,236 | 0.0001 | 0.9999 | 100.00 |
| ---: | ---: | ---: | ---: |
| 178,964 | 0.0012 | 0.9988 | 99.99 |
| 80,353 | 0.0006 | 0.9994 | 99.87 |
| 151,441 | 0.0012 | 0.9988 | 99.81 |
| 174,112 | 0.0014 | 0.9986 | 99.69 |
| 162,645 | 0.0013 | 0.9987 | 99.56 |
| 192,720 | 0.0017 | 0.9983 | 99.43 |
| 210,751 | 0.0020 | 0.9980 | 99.25 |
| 230,505 | 0.0024 | 0.9976 | 99.05 |
| 165,034 | 0.0018 | 0.9982 | 98.82 |
| 313,661 | 0.0035 | 0.9965 | 98.64 |
| 279,036 | 0.0033 | 0.9967 | 98.29 |
| 483,450 | 0.0057 | 0.9943 | 97.97 |
| 369,393 | 0.0045 | 0.9955 | 97.41 |
| 250,975 | 0.0043 | 0.9957 | 96.97 |
| 407,252 | 0.0072 | 0.9928 | 96.56 |
| 486,391 | 0.0089 | 0.9911 | 95.86 |
| 295,395 | 0.0056 | 0.9944 | 95.00 |
| 291,191 | 0.0058 | 0.9942 | 94.47 |
| 573,934 | 0.0140 | 0.9860 | 93.93 |
| 219,235 | 0.0057 | 0.9943 | 92.61 |
| 299,336 | 0.0080 | 0.9920 | 92.08 |
| 574,992 | 0.0161 | 0.9839 | 91.35 |
| 72,286 | 0.0022 | 0.9978 | 89.88 |
| 133,708 | 0.0042 | 0.9958 | 89.68 |
| 285,118 | 0.0093 | 0.9907 | 89.30 |
| 109,386 | 0.0036 | 0.9964 | 88.48 |
| 101,260 | 0.0035 | 0.9965 | 88.16 |
| 161,412 | 0.0056 | 0.9944 | 87.85 |
| 196,678 | 0.0071 | 0.9929 | 87.35 |
| 198,013 | 0.0083 | 0.9917 | 86.73 |
| 69,278 | 0.0030 | 0.9970 | 86.01 |
| 104,410 | 0.0047 | 0.9953 | 85.75 |
| 37,514 | 0.0018 | 0.9982 | 85.35 |
| 89,939 | 0.0045 | 0.9955 | 85.20 |
| 180,497 | 0.0094 | 0.9906 | 84.82 |
| 332,594 | 0.0182 | 0.9818 | 84.03 |
| 46,121 | 0.0025 | 0.9975 | 82.50 |
| 41,084 | 0.0048 | 0.9952 | 82.29 |
| 26,550 | 0.0031 | 0.9969 | 81.90 |
| 19 |  |  |  |

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1891-2019
EXPERIENCE BAND 1964-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 7,793,571 | 29,173 | 0.0037 | 0.9963 | 81.64 |
| 40.5 | 7,665,743 | 90,949 | 0.0119 | 0.9881 | 81.34 |
| 41.5 | 6,576,273 | 262,266 | 0.0399 | 0.9601 | 80.37 |
| 42.5 | 6,196,646 | 195,295 | 0.0315 | 0.9685 | 77.17 |
| 43.5 | 5,967,694 | 115,567 | 0.0194 | 0.9806 | 74.74 |
| 44.5 | 5,804,985 | 179,653 | 0.0309 | 0.9691 | 73.29 |
| 45.5 | 5,577,299 | 75,868 | 0.0136 | 0.9864 | 71.02 |
| 46.5 | 5,408,805 | 403,820 | 0.0747 | 0.9253 | 70.05 |
| 47.5 | 4,971,117 | 42,614 | 0.0086 | 0.9914 | 64.82 |
| 48.5 | 4,887,074 | 82,940 | 0.0170 | 0.9830 | 64.27 |
| 49.5 | 4,418,241 | 59,415 | 0.0134 | 0.9866 | 63.18 |
| 50.5 | 4,339,835 | 11,374 | 0.0026 | 0.9974 | 62.33 |
| 51.5 | 3,764,451 | 47,690 | 0.0127 | 0.9873 | 62.16 |
| 52.5 | 3,699,869 | 86,763 | 0.0235 | 0.9765 | 61.38 |
| 53.5 | 3,565,826 | 84,873 | 0.0238 | 0.9762 | 59.94 |
| 54.5 | 3,330,521 | 44,629 | 0.0134 | 0.9866 | 58.51 |
| 55.5 | 2,649,201 | 31,275 | 0.0118 | 0.9882 | 57.73 |
| 56.5 | 1,847,072 | 22,144 | 0.0120 | 0.9880 | 57.05 |
| 57.5 | 1,824,928 | 16,708 | 0.0092 | 0.9908 | 56.36 |
| 58.5 | 1,815,080 | 7,391 | 0.0041 | 0.9959 | 55.85 |
| 59.5 | 1,772,087 | 12,822 | 0.0072 | 0.9928 | 55.62 |
| 60.5 | 1,781,765 | 26,620 | 0.0149 | 0.9851 | 55.22 |
| 61.5 | 1,744,483 | 13,017 | 0.0075 | 0.9925 | 54.39 |
| 62.5 | 1,727,310 | 30,878 | 0.0179 | 0.9821 | 53.98 |
| 63.5 | 1,696,431 | 34,175 | 0.0201 | 0.9799 | 53.02 |
| 64.5 | 1,661,859 | 1,573 | 0.0009 | 0.9991 | 51.95 |
| 65.5 | 1,660,286 | 33,699 | 0.0203 | 0.9797 | 51.90 |
| 66.5 | 1,617,724 | 25,415 | 0.0157 | 0.9843 | 50.85 |
| 67.5 | 1,588,787 | 9,188 | 0.0058 | 0.9942 | 50.05 |
| 68.5 | 1,577,104 | 13,454 | 0.0085 | 0.9915 | 49.76 |
| 69.5 | 1,562,141 | 9,006 | 0.0058 | 0.9942 | 49.34 |
| 70.5 | 1,548,432 | 18,776 | 0.0121 | 0.9879 | 49.05 |
| 71.5 | 1,506,742 | 7,486 | 0.0050 | 0.9950 | 48.46 |
| 72.5 | 1,514,624 | 15,812 | 0.0104 | 0.9896 | 48.22 |
| 73.5 | 1,496,477 | 215 | 0.0001 | 0.9999 | 47.71 |
| 74.5 | 1,496,200 | 1,000 | 0.0007 | 0.9993 | 47.71 |
| 75.5 | 1,494,563 | 575,610 | 0.3851 | 0.6149 | 47.67 |
| 76.5 | 918,953 | 1,078 | 0.0012 | 0.9988 | 29.31 |
| 77.5 | 917,694 |  | 0.0000 | 1.0000 | 29.28 |
| 78.5 | 917,694 | 15,507 | 0.0169 | 0.9831 | 29.28 |


| PLACEMENT | ND 1891-2019 |  | EXPERIENCE BAND |  | 1964-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 902,168 | 404 | 0.0004 | 0.9996 | 28.78 |
| 80.5 | 901,764 | 904 | 0.0010 | 0.9990 | 28.77 |
| 81.5 | 900,860 | 46,145 | 0.0512 | 0.9488 | 28.74 |
| 82.5 | 854,715 | 48,165 | 0.0564 | 0.9436 | 27.27 |
| 83.5 | 806,550 | 18,427 | 0.0228 | 0.9772 | 25.73 |
| 84.5 | 787,662 | 426,785 | 0.5418 | 0.4582 | 25.15 |
| 85.5 | 215,799 | 164,447 | 0.7620 | 0.2380 | 11.52 |
| 86.5 | 51,352 | 20,907 | 0.4071 | 0.5929 | 2.74 |
| 87.5 | 30,445 |  | 0.0000 | 1.0000 | 1.63 |
| 88.5 | 13,482 |  | 0.0000 | 1.0000 | 1.63 |
| 89.5 | 13,482 |  | 0.0000 | 1.0000 | 1.63 |
| 90.5 | 13,482 |  | 0.0000 | 1.0000 | 1.63 |
| 91.5 | 13,482 |  | 0.0000 | 1.0000 | 1.63 |
| 92.5 | 13,482 |  | 0.0000 | 1.0000 | 1.63 |
| 93.5 | 13,467 |  | 0.0000 | 1.0000 | 1.63 |
| 94.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 95.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 96.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 97.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 98.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 99.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 100.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 101.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 102.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 103.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 104.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 105.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 106.5 | 12,729 |  | 0.0000 | 1.0000 | 1.63 |
| 107.5 | 12,729 | 3,848 | 0.3023 | 0.6977 | 1.63 |
| 108.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 109.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 110.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 111.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 112.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 113.5 | 8,881 |  | 0.0000 | 1.0000 | 1.13 |
| 114.5 |  |  |  |  | 1.13 |

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

## ORIGINAL LIFE TABLE

| AGE AT | EXPOSURES AT |
| :---: | :---: |
| BEGIN OF | BEGINNING OF |
| INTERVAL | AGE INTERVAL |
| 0.0 | 123,626,041 |
| 0.5 | 115,468,951 |
| 1.5 | 102,894,753 |
| 2.5 | 95,654,029 |
| 3.5 | 93,518,187 |
| 4.5 | 92,523,724 |
| 5.5 | 79,633,006 |
| 6.5 | 71,984,935 |
| 7.5 | 66,748,859 |
| 8.5 | 60,555,825 |
| 9.5 | 60,863,213 |
| 10.5 | 58,756,038 |
| 11.5 | 58,136,650 |
| 12.5 | 57,004,948 |
| 13.5 | 34,518,988 |
| 14.5 | 33,692,208 |
| 15.5 | 32,751,281 |
| 16.5 | 33,295,541 |
| 17.5 | 41,483,816 |
| 18.5 | 32,320,497 |
| 19.5 | 30,433,765 |
| 20.5 | 29,867,786 |
| 21.5 | 28,281,476 |
| 22.5 | 26,137,123 |
| 23.5 | 24,971,003 |
| 24.5 | 23,941,149 |
| 25.5 | 23,470,650 |
| 26.5 | 22,837,943 |
| 27.5 | 22,722,922 |
| 28.5 | 22,632,909 |
| 29.5 | 19,557,723 |
| 30.5 | 18,837,551 |
| 31.5 | 18,820,767 |
| 32.5 | 18,163,472 |
| 33.5 | 17,041,278 |
| 34.5 | 16,027,027 |
| 35.5 | 15,757,472 |
| 36.5 | 16,111,613 |
| 37.5 | 5,685,027 |
| 38.5 | 5,597,249 |

RETIREMENTS
DURING AGE
INTERVAL

PCT SURV BEGIN OF INTERVAL

| 16,205 | 0.0001 | 0.9999 | 100.00 |
| ---: | ---: | ---: | ---: |
| 168,573 | 0.0015 | 0.9985 | 99.99 |
| 35,695 | 0.0003 | 0.9997 | 99.84 |
| 2,000 | 0.0000 | 1.0000 | 99.81 |
| 171,024 | 0.0018 | 0.9982 | 99.80 |
| 161,390 | 0.0017 | 0.9983 | 99.62 |
| 35,568 | 0.0004 | 0.9996 | 99.45 |
| 172,029 | 0.0024 | 0.9976 | 99.40 |
| 215,493 | 0.0032 | 0.9968 | 99.17 |
| 118,856 | 0.0020 | 0.9980 | 98.85 |
| 161,626 | 0.0027 | 0.9973 | 98.65 |
| 136,752 | 0.0023 | 0.9977 | 98.39 |
| 385,135 | 0.0066 | 0.9934 | 98.16 |
| 176,191 | 0.0031 | 0.9969 | 97.51 |
| 171,463 | 0.0050 | 0.9950 | 97.21 |
| 248,190 | 0.0074 | 0.9926 | 96.73 |
| 262,487 | 0.0080 | 0.9920 | 96.01 |
| 242,370 | 0.0073 | 0.9927 | 95.24 |
| 247,035 | 0.0060 | 0.9940 | 94.55 |
| 556,156 | 0.0172 | 0.9828 | 93.99 |
| 168,767 | 0.0055 | 0.9945 | 92.37 |
| 200,966 | 0.0067 | 0.9933 | 91.86 |
| 537,869 | 0.0190 | 0.9810 | 91.24 |
| 66,360 | 0.0025 | 0.9975 | 89.51 |
| 126,843 | 0.0051 | 0.9949 | 89.28 |
| 266,488 | 0.0111 | 0.9889 | 88.82 |
| 35,766 | 0.0015 | 0.9985 | 87.84 |
| 62,177 | 0.0027 | 0.9973 | 87.70 |
| 118,479 | 0.0052 | 0.9948 | 87.46 |
| 100,835 | 0.0045 | 0.9955 | 87.01 |
| 163,024 | 0.0083 | 0.9917 | 86.62 |
| 18,080 | 0.0010 | 0.9990 | 85.90 |
| 52,750 | 0.0028 | 0.9972 | 85.81 |
| 16,910 | 0.0009 | 0.9991 | 85.57 |
| 76,524 | 0.0045 | 0.9955 | 85.49 |
| 158,983 | 0.0099 | 0.9901 | 85.11 |
| 309,806 | 0.0197 | 0.9803 | 84.27 |
| 22,070 | 0.0014 | 0.9986 | 82.61 |
| 29,568 | 0.0052 | 0.9948 | 82.50 |
| 2,084 | 0.0004 | 0.9996 | 82.07 |
| 19 |  |  |  |

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1904-2019
EXPERIENCE BAND 2000-2019

| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 39.5 | 4,946,154 | 9,364 | 0.0019 | 0.9981 | 82.04 |
| 40.5 | 4,923,590 | 87,599 | 0.0178 | 0.9822 | 81.88 |
| 41.5 | 4,096,674 | 256,549 | 0.0626 | 0.9374 | 80.42 |
| 42.5 | 3,768,516 | 194,172 | 0.0515 | 0.9485 | 75.39 |
| 43.5 | 3,572,534 | 108,399 | 0.0303 | 0.9697 | 71.50 |
| 44.5 | 3,439,645 | 174,453 | 0.0507 | 0.9493 | 69.33 |
| 45.5 | 3,229,983 | 52,993 | 0.0164 | 0.9836 | 65.82 |
| 46.5 | 3,183,681 | 70,891 | 0.0223 | 0.9777 | 64.74 |
| 47.5 | 3,093,945 | 31,938 | 0.0103 | 0.9897 | 63.30 |
| 48.5 | 3,035,709 | 59,139 | 0.0195 | 0.9805 | 62.64 |
| 49.5 | 2,606,440 | 36,964 | 0.0142 | 0.9858 | 61.42 |
| 50.5 | 2,571,394 | 11,210 | 0.0044 | 0.9956 | 60.55 |
| 51.5 | 2,060,458 | 38,475 | 0.0187 | 0.9813 | 60.29 |
| 52.5 | 2,006,170 | 83,733 | 0.0417 | 0.9583 | 59.16 |
| 53.5 | 1,888,634 | 81,104 | 0.0429 | 0.9571 | 56.69 |
| 54.5 | 1,686,012 | 39,817 | 0.0236 | 0.9764 | 54.26 |
| 55.5 | 1,020,827 | 31,229 | 0.0306 | 0.9694 | 52.98 |
| 56.5 | 233,291 | 22,048 | 0.0945 | 0.9055 | 51.36 |
| 57.5 | 226,388 | 8,537 | 0.0377 | 0.9623 | 46.50 |
| 58.5 | 242,104 | 6,203 | 0.0256 | 0.9744 | 44.75 |
| 59.5 | 240,390 | 12,682 | 0.0528 | 0.9472 | 43.60 |
| 60.5 | 258,917 | 21,810 | 0.0842 | 0.9158 | 41.30 |
| 61.5 | 227,657 | 10,917 | 0.0480 | 0.9520 | 37.82 |
| 62.5 | 212,592 | 28,869 | 0.1358 | 0.8642 | 36.01 |
| 63.5 | 183,723 | 32,797 | 0.1785 | 0.8215 | 31.12 |
| 64.5 | 150,950 | 1,100 | 0.0073 | 0.9927 | 25.56 |
| 65.5 | 149,850 | 10,982 | 0.0733 | 0.9267 | 25.38 |
| 66.5 | 130,006 | 25,415 | 0.1955 | 0.8045 | 23.52 |
| 67.5 | 101,320 | 9,188 | 0.0907 | 0.9093 | 18.92 |
| 68.5 | 106,600 | 13,454 | 0.1262 | 0.8738 | 17.20 |
| 69.5 | 135,670 | 9,006 | 0.0664 | 0.9336 | 15.03 |
| 70.5 | 284,295 | 18,776 | 0.0660 | 0.9340 | 14.04 |
| 71.5 | 261,032 | 4,337 | 0.0166 | 0.9834 | 13.11 |
| 72.5 | 828,851 | 15,812 | 0.0191 | 0.9809 | 12.89 |
| 73.5 | 1,446,596 | 215 | 0.0001 | 0.9999 | 12.64 |
| 74.5 | 1,467,963 | 1,000 | 0.0007 | 0.9993 | 12.64 |
| 75.5 | 1,466,326 | 575,610 | 0.3926 | 0.6074 | 12.63 |
| 76.5 | 890,717 | 1,078 | 0.0012 | 0.9988 | 7.67 |
| 77.5 | 889,458 |  | 0.0000 | 1.0000 | 7.67 |
| 78.5 | 889,458 |  | 0.0000 | 1.0000 | 7.67 |


| PLACEMENT BAND 1904-2019 |  |  | EXPERIENCE BAND |  | 2000-2019 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AGE AT | EXPOSURES AT | RETIREMENTS |  |  | PCT SURV |
| BEGIN OF | BEGINNING OF | DURING AGE | RETMT | SURV | BEGIN OF |
| INTERVAL | AGE INTERVAL | INTERVAL | RATIO | RATIO | INTERVAL |
| 79.5 | 889,439 | 404 | 0.0005 | 0.9995 | 7.67 |
| 80.5 | 889,035 | 904 | 0.0010 | 0.9990 | 7.66 |
| 81.5 | 888,131 | 46,145 | 0.0520 | 0.9480 | 7.65 |
| 82.5 | 841,986 | 48,165 | 0.0572 | 0.9428 | 7.26 |
| 83.5 | 793,821 | 18,427 | 0.0232 | 0.9768 | 6.84 |
| 84.5 | 774,933 | 426,785 | 0.5507 | 0.4493 | 6.68 |
| 85.5 | 203,070 | 164,447 | 0.8098 | 0.1902 | 3.00 |
| 86.5 | 38,623 | 20,907 | 0.5413 | 0.4587 | 0.57 |
| 87.5 | 17,715 |  | 0.0000 | 1.0000 | 0.26 |
| 88.5 | 752 |  | 0.0000 | 1.0000 | 0.26 |
| 89.5 | 752 |  | 0.0000 | 1.0000 | 0.26 |
| 90.5 | 752 |  | 0.0000 | 1.0000 | 0.26 |
| 91.5 | 752 |  | 0.0000 | 1.0000 | 0.26 |
| 92.5 | 752 |  | 0.0000 | 1.0000 | 0.26 |
| 93.5 | 737 |  | 0.0000 | 1.0000 | 0.26 |
| 94.5 | 8,881 |  | 0.0000 | 1.0000 | 0.26 |
| 95.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 96.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 97.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 98.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 99.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 100.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 101.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 102.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 103.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 104.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 105.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 106.5 | 12,729 |  | 0.0000 | 1.0000 | 0.26 |
| 107.5 | 12,729 | 3,848 | 0.3023 | 0.6977 | 0.26 |
| 108.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 109.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 110.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 111.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 112.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 113.5 | 8,881 |  | 0.0000 | 1.0000 | 0.18 |
| 114.5 |  |  |  |  | 0.18 |

## PART VII. DETAILED DEPRECIATION CALCULATIONS

## CUMULATIVE DEPRECIATED ORIGINAL COST

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  |  |  |  | DEPR | IATED ORIGIN | L COST |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  | PC |
| YEAR | ORIGINAL | ACCRUED |  | MOUNT | CUMULATIVE | COL 4 |
| INST | COST | DEPRECIATION | (2) | - (3) | AMOUNT | TOTAL |
| (1) | (2) | (3) |  | (4) | (5) | (6) |
| 1899 | 30,657 | 30,657 |  |  |  | 0.0 |
| 1900 | 6,001 | 6,000 |  | 1 | 1 | 0.0 |
| 1901 | 5,953 | 5,953 |  |  | 1 | 0.0 |
| 1902 | 13,352 | 13,352 |  |  | 1 | 0.0 |
| 1903 | 7,576 | 7,576 |  |  | 1 | 0.0 |
| 1904 | 24,221 | 24,221 |  |  | 1 | 0.0 |
| 1905 | 9,999 | 9,999 |  |  | 1 | 0.0 |
| 1906 | 1,398 | 1,398 |  |  | 1 | 0.0 |
| 1907 | 2,699 | 2,699 |  |  | 1 | 0.0 |
| 1908 | 25 | 25 |  |  | 1 | 0.0 |
| 1909 | 692 | 692 |  |  | 1 | 0.0 |
| 1910 | 3,877 | 3,877 |  |  | 1 | 0.0 |
| 1911 | 1,778 | 1,778 |  |  | 1 | 0.0 |
| 1912 | 479 | 479 |  |  | 1 | 0.0 |
| 1913 | 17,698 | 17,698 |  |  | 1 | 0.0 |
| 1914 | 28,893 | 28,894 |  | 1- |  | 0.0 |
| 1915 | 31,152 | 31,152 |  |  |  | 0.0 |
| 1916 | 332,793 | 332,793 |  |  |  | 0.0 |
| 1917 | 60,098 | 59,934 |  | 164 | 164 | 0.0 |
| 1918 | 116,985 | 116,807 |  | 178 | 342 | 0.0 |
| 1919 | 120,184 | 119,570 |  | 614 | 956 | 0.0 |
| 1920 | 625,990 | 618,267 |  | 7,723 | 8,679 | 0.0 |
| 1921 | 131,942 | 130,245 |  | 1,697 | 10,376 | 0.0 |
| 1922 | 565,587 | 553,590 |  | 11,997 | 22,373 | 0.0 |
| 1923 | 471,354 | 455,547 |  | 15,807 | 38,180 | 0.0 |
| 1924 | 1,792,555 | 1,750,611 |  | 41,944 | 80,124 | 0.0 |
| 1925 | 1,179,046 | 1,141,134 |  | 37,912 | 118,036 | 0.0 |
| 1926 | 1,020,063 | 977,488 |  | 42,575 | 160,611 | 0.0 |
| 1927 | 1,414,504 | 1,337,433 |  | 77,071 | 237,682 | 0.0 |
| 1928 | 1,109,742 | 1,056,698 |  | 53,044 | 290,726 | 0.0 |
| 1929 | 770,519 | 705,034 |  | 65,485 | 356,211 | 0.0 |
| 1930 | 841,408 | 777,280 |  | 64,128 | 420,339 | 0.0 |
| 1931 | 545,035 | 499,320 |  | 45,715 | 466,054 | 0.0 |
| 1932 | 157,684 | 142,383 |  | 15,301 | 481,355 | 0.0 |
| 1933 | 158,948 | 143,701 |  | 15,247 | 496,602 | 0.0 |
| 1934 | 191,151 | 169,286 |  | 21,865 | 518,467 | 0.0 |
| 1935 | 158,680 | 141,836 |  | 16,844 | 535,311 | 0.0 |
| 1936 | 142,816 | 125,803 |  | 17,013 | 552,324 | 0.0 |
| 1937 | 252,150 | 221,813 |  | 30,337 | 582,661 | 0.0 |
| 1938 | 64,993 | 56,335 |  | 8,658 | 591,319 | 0.0 |
| 1939 | 163,592 | 143,400 |  | 20,192 | 611,511 | 0.0 |
| 1940 | 92,799 | 79,335 |  | 13,464 | 624,975 | 0.0 |
| 1941 | 675,071 | 586,746 |  | 88,325 | 713,300 | 0.0 |
| 1942 | 644,797 | 560,516 |  | 84,281 | 797,581 | 0.0 |
| 1943 | 177,293 | 152,560 |  | 24,733 | 822,314 | 0.0 |

[^96]ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  |  |  |  | IATED ORIGINA | L COST |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | PCT OF |
| YEAR | ORIGINAL | ACCRUED | AMOUNT | CUMULATIVE | COL 4 |
| INST | COST | DEPRECIATION | (2) - (3) | AMOUNT | TOTAL |
| (1) | (2) | (3) | (4) | (5) | (6) |
| 1944 | 64,354 | 53,345 | 11,009 | 833,323 | 0.0 |
| 1945 | 317,600 | 279,076 | 38,524 | 871,847 | 0.0 |
| 1946 | 100,336 | 80,612 | 19,724 | 891,571 | 0.0 |
| 1947 | 209,602 | 166,658 | 42,944 | 934,515 | 0.0 |
| 1948 | 1,056,535 | 849,400 | 207,135 | 1,141,650 | 0.0 |
| 1949 | 1,399,722 | 1,114,802 | 284,920 | 1,426,570 | 0.0 |
| 1950 | 2,137,542 | 1,707,744 | 429,798 | 1,856,368 | 0.1 |
| 1951 | 1,920,040 | 1,505,684 | 414,356 | 2,270,724 | 0.1 |
| 1952 | 2,326,538 | 1,767,154 | 559,384 | 2,830,108 | 0.1 |
| 1953 | 3,582,841 | 2,787,866 | 794,975 | 3,625,083 | 0.1 |
| 1954 | 5,586,464 | 4,399,550 | 1,186,914 | 4,811,997 | 0.2 |
| 1955 | 5,196,492 | 3,911,981 | 1,284,511 | 6,096,508 | 0.2 |
| 1956 | 9,085,119 | 6,994,955 | 2,090,164 | 8,186,672 | 0.3 |
| 1957 | 6,077,664 | 4,462,191 | 1,615,473 | 9,802,145 | 0.3 |
| 1958 | 9,119,574 | 7,013,632 | 2,105,942 | 11,908,087 | 0.4 |
| 1959 | 7,345,111 | 5,317,644 | 2,027,467 | 13,935,554 | 0.4 |
| 1960 | 5,848,223 | 4,124,988 | 1,723,235 | 15,658,789 | 0.5 |
| 1961 | 5,153,039 | 3,613,820 | 1,539,219 | 17,198,008 | 0.5 |
| 1962 | 4,756,260 | 3,238,567 | 1,517,693 | 18,715,701 | 0.6 |
| 1963 | 4,874,933 | 3,318,266 | 1,556,667 | 20,272,368 | 0.6 |
| 1964 | 5,858,921 | 4,004,261 | 1,854,660 | 22,127,028 | 0.7 |
| 1965 | 8,838,418 | 6,274,430 | 2,563,988 | 24,691,016 | 0.8 |
| 1966 | 7,016,332 | 4,647,553 | 2,368,779 | 27,059,795 | 0.9 |
| 1967 | 10,254,576 | 6,847,385 | 3,407,191 | 30,466,986 | 1.0 |
| 1968 | 9,426,026 | 6,382,776 | 3,043,250 | 33,510,236 | 1.1 |
| 1969 | 13,713,147 | 9,246,147 | 4,467,000 | 37,977,236 | 1.2 |
| 1970 | 28,993,689 | 19,159,922 | 9,833,767 | 47,811,003 | 1.5 |
| 1971 | 12,541,682 | 7,782,255 | 4,759,427 | 52,570,430 | 1.7 |
| 1972 | 41,214,779 | 27,178,932 | 14,035,847 | 66,606,277 | 2.1 |
| 1973 | 21,703,164 | 13,483,910 | 8,219,254 | 74,825,531 | 2.4 |
| 1974 | 28,035,250 | 16,922,308 | 11,112,942 | 85,938,473 | 2.7 |
| 1975 | 30,638,736 | 18,533,309 | 12,105,427 | 98,043,900 | 3.1 |
| 1976 | 28,329,247 | 16,871,273 | 11,457,974 | 109,501,874 | 3.5 |
| 1977 | 21,630,842 | 12,091,045 | 9,539,797 | 119,041,671 | 3.8 |
| 1978 | 25,363,333 | 14,241,137 | 11,122,196 | 130,163,867 | 4.1 |
| 1979 | 95,767,921 | 59,570,003 | 36,197,918 | 166,361,785 | 5.3 |
| 1980 | 34,502,593 | 19,028,587 | 15,474,006 | 181,835,791 | 5.8 |
| 1981 | 28,180,734 | 15,531,986 | 12,648,748 | 194,484,539 | 6.2 |
| 1982 | 62,758,003 | 36,251,594 | 26,506,409 | 220,990,948 | 7.0 |
| 1983 | 26,662,773 | 16,993,749 | 9,669,024 | 230,659,972 | 7.3 |
| 1984 | 32,739,389 | 20,786,182 | 11,953,207 | 242,613,179 | 7.7 |
| 1985 | 31,730,488 | 19,557,129 | 12,173,359 | 254,786,538 | 8.1 |
| 1986 | 42,157,269 | 25,413,556 | 16,743,713 | 271,530,251 | 8.6 |
| 1987 | 27,010,643 | 15,899,141 | 11,111,502 | 282,641,753 | 9.0 |
| 1988 | 31,772,716 | 18,381,349 | 13,391,367 | 296,033,120 | 9.4 |

[^97]
## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021


| SUBTOTAL | $4,556,266,751$ | $1,412,449,022$ | $3,143,817,725$ |
| ---: | ---: | ---: | ---: | ---: |
| ACCOUNTS 392 | $67,175,855$ | $40,744,237$ | $26,431,618$ |

AND 396

NONDEPRECIABLE $450,244,175$ 231,861,952

TOTAL $5,073,686,781 \quad 1,685,055,211 \quad 3,170,249,347$

UTILITY PLANT IN SERVICE

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

(3)

ALLOC. BOOK
RESERVE
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL ACCRUAL (7)

BEAVER VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2031

| 1958 | $8,598.19$ | 7,517 | 7,703 | 895 | 7.73 | 116 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1976 | $616,389.78$ | 509,539 | 522,130 | 94,260 | 8.90 | 10,591 |
| 1977 | $3,380.68$ | 2,784 | 2,853 | 528 | 8.93 | 59 |
| 1980 | $840,465.37$ | 683,273 | 700,157 | 140,309 | 9.03 | 15,538 |
| 1981 | $23,903.87$ | 19,343 | 19,821 | 4,083 | 9.06 | 451 |
| 1984 | 917.10 | 739 | 757 | 160 | 9.01 | 18 |
| 1992 | $182,916.77$ | 139,218 | 142,658 | 40,259 | 9.26 | 4,348 |
| 1993 | $18,220.84$ | 13,760 | 14,100 | 4,121 | 9.24 | 446 |
| 1994 | $53,126.91$ | 39,739 | 40,721 | 12,406 | 9.26 | 1,340 |
| 1997 | $2,959.49$ | 2,146 | 2,199 | 760 | 9.28 | 82 |
| 1999 | $126,094.29$ | 89,086 | 91,287 | 34,807 | 9.35 | 3,723 |
| 2007 | $61,331.78$ | 37,173 | 38,092 | 23,240 | 9.42 | 2,467 |
| 2009 | $25,464.06$ | 14,515 | 14,874 | 10,590 | 9.43 | 1,123 |
| 2011 | $81,735.53$ | 43,083 | 44,148 | 37,588 | 9.42 | 3,990 |
| 2012 | $36,995.19$ | 18,557 | 19,016 | 17,980 | 9.44 | 1,905 |
| 2018 | $49,834.33$ | 13,465 | 13,798 | 36,037 | 9.45 | 3,813 |
| 2021 | $667,002.94$ | 33,617 | 34,448 | 632,555 | 9.43 | 67,079 |
|  |  |  |  |  |  |  |
|  | $2,799,337.12$ | $1,667,554$ | $1,708,759$ | $1,090,578$ |  | 117,089 |

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035

| 1970 | $602,056.54$ | 481,061 | 492,948 | 109,109 | 11.62 | 9,390 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1975 | $13,359.93$ | 10,409 | 10,666 | 2,694 | 12.11 | 222 |
| 1981 | $100,304.72$ | 75,466 | 77,331 | 22,974 | 12.53 | 1,834 |
| 1987 | $9,768.83$ | 7,145 | 7,322 | 2,447 | 12.67 | 193 |
| 1994 | $70,851.55$ | 48,122 | 49,311 | 21,540 | 12.99 | 1,658 |
| 1996 | $13,652.98$ | 9,052 | 9,276 | 4,377 | 12.96 | 338 |
| 2005 | $152,127.05$ | 84,339 | 86,423 | 65,704 | 13.26 | 4,955 |
| 2009 | $95,298.01$ | 46,220 | 47,362 | 47,936 | 13.27 | 3,612 |
| 2011 | $16,146.85$ | 7,121 | 7,297 | 8,850 | 13.31 | 665 |
| 2012 | $83,286.71$ | 34,656 | 35,512 | 47,774 | 13.33 | 3,584 |
| 2014 | $23,655.50$ | 8,516 | 8,726 | 14,929 | 13.33 | 1,120 |
| 2016 | $4,464,161.73$ | $1,301,303$ | $1,333,458$ | $3,130,704$ | 13.37 | 234,159 |
| 2017 | $289,694.20$ | 72,887 | 74,688 | 215,006 | 13.39 | 16,057 |
| 2018 | $1,153.02$ | 239 | 245 | 908 | 13.36 | 68 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035

| 2019 | 606.53 | 96 | 98 | 508 | 13.37 | 38 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2020 | $25,965.47$ | 2,617 | 2,682 | 23,284 | 13.38 | 1,740 |
| 2021 | $444,671.11$ | 16,097 | 16,495 | 428,176 | 13.33 | 32,121 |
|  | $6,406,760.73$ | $2,205,346$ | $2,259,839$ | $4,146,922$ |  | 311,754 |

CRESCENT SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2030

| 1975 | $692,787.29$ | 584,969 | 599,423 | 93,364 | 7.99 | 11,685 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1979 | $15,951.88$ | 13,272 | 13,600 | 2,352 | 8.11 | 290 |
| 1981 | $73,835.77$ | 60,942 | 62,448 | 11,388 | 8.15 | 1,397 |
| 1986 | $32,983.89$ | 26,816 | 27,479 | 5,505 | 8.17 | 674 |
| 1991 | $20,828.44$ | 16,390 | 16,795 | 4,033 | 8.26 | 488 |
| 1994 | $64,957.66$ | 49,836 | 51,067 | 13,890 | 8.34 | 1,665 |
| 1998 | $124,838.24$ | 92,118 | 94,394 | 30,444 | 8.35 | 3,646 |
| 2000 | $19,852.32$ | 14,298 | 14,651 | 5,201 | 8.35 | 623 |
| 2006 | $10,833.62$ | 7,019 | 7,192 | 3,641 | 8.42 | 432 |
| 2009 | $160,842.96$ | 96,104 | 98,479 | 62,364 | 8.42 | 7,407 |
| 2011 | $77,708.40$ | 43,082 | 44,147 | 33,562 | 8.44 | 3,977 |
| 2012 | $19,166.61$ | 10,143 | 10,394 | 8,773 | 8.45 | 1,038 |
| 2017 | $390,615.34$ | 135,544 | 138,893 | 251,722 | 8.47 | 29,719 |
| 2018 | $71,919.22$ | 21,044 | 21,564 | 50,355 | 8.46 | 5,952 |
|  |  |  |  |  |  |  |
|  | $1,777,121.64$ | $1,171,577$ | $1,200,526$ | 576,596 |  | 68,993 |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2049

| 1979 | $721,493.43$ | 461,604 | 473,010 | 248,483 | 21.71 | 11,446 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1996 | $81,368.78$ | 41,498 | 42,523 | 38,845 | 24.50 | 1,586 |
| 2009 | $1,062,225.02$ | 345,223 | 353,753 | 708,472 | 25.96 | 27,291 |
| 2010 | $3,141,593.88$ | 961,014 | 984,760 | $2,156,833$ | 26.09 | 82,669 |
| 2011 | $1,473,624.73$ | 422,341 | 432,777 | $1,040,848$ | 26.13 | 39,833 |
| 2016 | $532,398.85$ | 91,679 | 93,944 | 438,454 | 26.45 | 16,577 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA $65-$ R3
PROBABLE RETIREMENT YEAR.. $\quad 6-2049$

| 2018 | $92,734.81$ | 10,813 | 11,080 | 81,655 | 26.53 | 3,078 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2020 | $265,868.10$ | 14,251 | 14,603 | 251,265 | 26.51 | 9,478 |
| 2021 | $333,505.94$ | 6,203 | 6,356 | 327,150 | 26.38 | 12,401 |
|  | $7,704,813.54$ | $2,354,626$ | $2,412,808$ | $5,292,005$ |  |  |
|  | $7,304,359$ |  |  |  |  |  |

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2066

| 2011 | $673,863.54$ | 143,668 | 147,218 | 526,646 | 38.76 | 13,587 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2017 | $94,142.16$ | 9,527 | 9,762 | 84,380 | 39.95 | 2,112 |
| 2018 | $82,680.02$ | 6,631 | 6,795 | 75,885 | 40.17 | 1,889 |
|  |  |  |  |  |  |  |
|  | $850,685.72$ | 159,826 | 163,775 | 686,911 | 17,588 |  |

LOGANS FERRY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2065

| 2010 | 4,680,559.93 | 1,092,443 | 1,119,437 | 3,561,123 | 37.76 | 94,309 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2018 | 67,863.46 | 5,538 | 5,675 | 62,189 | 39.42 | 1,578 |
| 2021 | 555,821.53 | 7,003 | 7,176 | 548,645 | 39.34 | 13,946 |
|  | 5,304,244.92 | 1,104,984 | 1,132,288 | 4,171,957 |  | 109,833 |
| TECUMSEH SUBSTATION |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 65-R3 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2071 |  |  |  |  |  |  |
| 2016 | 1,319,737.74 | 149,526 | 153,221 | 1,166,517 | 43.04 | 27,103 |
| 2018 | 249,161.01 | 18,587 | 19,046 | 230,115 | 43.45 | 5,296 |
|  | 1,568,898.75 | 168,113 | 172,267 | 1,396,632 |  | 32,399 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR
(1)
ORIGINAL
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK
RESERVE
(4)
FUTURE BOOK REM. ANNUAL ACCRUALS
(5)
LIFE ACCRUAL
(6)
(7)

POTTER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2071

| 2016 | $719,743.11$ | 81,547 | 83,562 | 636,181 | 43.04 | 14,781 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2017 | $482,585.21$ | 45,604 | 46,731 | 435,854 | 43.12 | 10,108 |
| 2018 | $89,879.70$ | 6,705 | 6,871 | 83,009 | 43.45 | 1,910 |
|  | $1,292,208.02$ | 133,856 | 137,164 | $1,155,044$ | 26,799 |  |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1927 | 2,231.62 | 2,232 | 2,232 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1930 | 3,260.44 | 3,260 | 3,260 |  |  |  |
| 1942 | 1,465.05 | 1,465 | 1,465 |  |  |  |
| 1950 | 2,271.68 | 2,217 | 2,272 |  |  |  |
| 1953 | 8,198.34 | 7,869 | 8,064 | 134 | 1.81 | 74 |
| 1955 | 22,847.65 | 21,670 | 22,207 | 640 | 2.32 | 276 |
| 1957 | 254.83 | 239 | 245 | 10 | 2.83 | 4 |
| 1967 | 7,197.79 | 6,318 | 6,475 | 723 | 5.50 | 131 |
| 1968 | 4,915.08 | 4,282 | 4,388 | 527 | 5.80 | 91 |
| 1969 | 106,309.16 | 91,851 | 94,129 | 12,180 | 6.12 | 1,990 |
| 1970 | 49,447.17 | 42,349 | 43,399 | 6,048 | 6.46 | 936 |
| 1972 | 27,293.03 | 22,938 | 23,507 | 3,786 | 7.18 | 527 |
| 1973 | 16,624.26 | 13,831 | 14,174 | 2,450 | 7.56 | 324 |
| 1975 | 40,170.85 | 32,672 | 33,482 | 6,689 | 8.40 | 796 |
| 1976 | 88,044.35 | 70,729 | 72,483 | 15,561 | 8.85 | 1,758 |
| 1979 | 113,378.56 | 87,377 | 89,544 | 23,835 | 10.32 | 2,310 |
| 1980 | 89,496.62 | 67,918 | 69,602 | 19,894 | 10.85 | 1,834 |
| 1981 | 46,339.08 | 34,589 | 35,447 | 10,892 | 11.41 | 955 |
| 1983 | 1,035.72 | 798 | 818 | 218 | 11.50 | 19 |
| 1984 | 55,468.55 | 42,017 | 43,059 | 12,410 | 12.00 | 1,034 |
| 1985 | 682.59 | 508 | 521 | 162 | 12.52 | 13 |
| 1986 | 8,961.01 | 6,553 | 6,716 | 2,245 | 13.04 | 172 |
| 1987 | 1,501.33 | 1,072 | 1,099 | 403 | 13.81 | 29 |
| 1989 | 3,777.11 | 2,590 | 2,654 | 1,123 | 14.89 | 75 |
| 1990 | 32,316.86 | 21,685 | 22,223 | 10,094 | 15.45 | 653 |
| 1991 | 31,063.77 | 20,275 | 20,778 | 10,286 | 16.23 | 634 |
| 1992 | 74,639.01 | 47,560 | 48,740 | 25,899 | 16.80 | 1,542 |
| 1993 | 5,365.13 | 3,333 | 3,416 | 1,949 | 17.37 | 112 |
| 1995 | 61,979.07 | 36,295 | 37,195 | 24,784 | 18.75 | 1,322 |
| 1996 | 32,361.01 | 18,320 | 18,774 | 13,587 | 19.55 | 695 |
| 1997 | 92,809.77 | 50,934 | 52,197 | 40,613 | 20.14 | 2,017 |

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1998 | $20,962.30$ | 11,133 | 11,409 | 9,553 | 20.75 | 460 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2002 | $6,096.74$ | 2,758 | 2,826 | 3,270 | 23.60 | 139 |
| 2003 | $85,551.29$ | 36,873 | 37,787 | 47,764 | 24.42 | 1,956 |
| 2005 | $54,844.28$ | 21,356 | 21,886 | 32,959 | 25.87 | 1,274 |
| 2006 | $93,001.45$ | 34,169 | 35,016 | 57,985 | 26.69 | 2,173 |
| 2009 | $1,804,021.66$ | 543,371 | 556,847 | $1,247,175$ | 29.00 | 43,006 |
| 2010 | $223,510.21$ | 62,449 | 63,998 | 159,512 | 29.65 | 5,380 |
| 2011 | $53,335.98$ | 13,665 | 14,004 | 39,332 | 30.48 | 1,290 |
| 2012 | $68,887.19$ | 16,037 | 16,435 | 52,452 | 31.31 | 1,675 |
| 2013 | $66,782.50$ | 13,964 | 14,310 | 52,472 | 32.15 | 1,632 |
| 2016 | $1,192,897.43$ | 164,023 | 168,091 | $1,024,807$ | 34.50 | 29,705 |
| 2017 | $137,122.91$ | 15,550 | 15,936 | 121,187 | 35.18 | 3,445 |
| 2018 | $1,697,146.33$ | 150,367 | 154,096 | $1,543,050$ | 36.02 | 42,839 |
| 2019 | $756,066.80$ | 48,237 | 49,433 | 706,633 | 36.71 | 19,249 |
| 2020 | $97,009.04$ | 3,745 | 3,838 | 93,171 | 37.41 | 2,491 |
| 2021 | $222,339.05$ | 2,913 | 2,985 | 219,354 | 37.67 | 5,823 |
|  |  |  |  |  |  |  |
|  | $7,611,281.65$ | $1,906,356$ | $1,953,462$ | $5,657,820$ |  | 182,860 |
|  | $35,315,352.09$ | $10,872,238$ | $11,140,888$ | $24,174,465$ |  | $1,071,674$ |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.63 .03

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 353 STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 38-S0

| 1949 | 553.07 | 534 | 518 | 35 | 1.28 | 27 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1950 | 77.11 | 74 | 72 | 5 | 1.65 | 3 |
| 1951 | 2,272.68 | 2,152 | 2,086 | 187 | 2.02 | 93 |
| 1952 | 1,318.41 | 1,235 | 1,197 | 121 | 2.39 | 51 |
| 1953 | 72,096.40 | 66,841 | 64,786 | 7,310 | 2.77 | 2,639 |
| 1954 | 12,570.54 | 11,532 | 11,178 | 1,393 | 3.14 | 444 |
| 1955 | 66,495.83 | 60,336 | 58,481 | 8,015 | 3.52 | 2,277 |
| 1956 | 66,098.78 | 59,332 | 57,508 | 8,591 | 3.89 | 2,208 |
| 1957 | 93,797.27 | 83,257 | 80,698 | 13,099 | 4.27 | 3,068 |
| 1958 | 35,503.84 | 31,159 | 30,201 | 5,303 | 4.65 | 1,140 |
| 1959 | 59,801.96 | 51,870 | 50,276 | 9,526 | 5.04 | 1,890 |
| 1960 | 24,914.90 | 21,361 | 20,704 | 4,211 | 5.42 | 777 |
| 1961 | 87,266.17 | 73,924 | 71,652 | 15,614 | 5.81 | 2,687 |
| 1962 | 19,458.51 | 16,284 | 15,783 | 3,676 | 6.20 | 593 |
| 1963 | 21,801.89 | 18,021 | 17,467 | 4,335 | 6.59 | 658 |
| 1964 | 14,612.68 | 11,929 | 11,562 | 3,051 | 6.98 | 437 |
| 1965 | 18,760.06 | 15,122 | 14,657 | 4,103 | 7.37 | 557 |
| 1966 | 151,309.35 | 120,371 | 116,671 | 34,638 | 7.77 | 4,458 |
| 1967 | 1,024,111.66 | 804,194 | 779,473 | 244,639 | 8.16 | 29,980 |
| 1968 | 82,538.00 | 63,945 | 61,979 | 20,559 | 8.56 | 2,402 |
| 1969 | 1,604,987.44 | 1,226,130 | 1,188,439 | 416,548 | 8.97 | 46,438 |
| 1970 | 6,748,824.03 | 5,084,699 | 4,928,397 | 1,820,427 | 9.37 | 194,282 |
| 1971 | 91,334.11 | 67,827 | 65,742 | 25,592 | 9.78 | 2,617 |
| 1972 | 4,594,695.79 | 3,362,582 | 3,259,217 | 1,335,479 | 10.19 | 131,058 |
| 1973 | 804,505.96 | 580,089 | 562,257 | 242,249 | 10.60 | 22,854 |
| 1974 | 939,654.92 | 667,155 | 646,647 | 293,008 | 11.02 | 26,589 |
| 1975 | 4,055,052.35 | 2,835,333 | 2,748,176 | 1,306,876 | 11.43 | 114,337 |
| 1976 | 5,189,804.61 | 3,571,416 | 3,461,632 | 1,728,173 | 11.85 | 145,837 |
| 1977 | 1,126,163.40 | 762,232 | 738,801 | 387,362 | 12.28 | 31,544 |
| 1978 | 724,563.02 | 482,407 | 467,578 | 256,985 | 12.70 | 20,235 |
| 1979 | 6,039,369.35 | 3,952,586 | 3,831,085 | 2,208,284 | 13.13 | 168,186 |
| 1980 | 2,514,036.64 | 1,616,249 | 1,566,566 | 947,471 | 13.57 | 69,821 |
| 1981 | 1,728,034.82 | 1,091,392 | 1,057,843 | 670,192 | 14.00 | 47,871 |
| 1982 | 4,227,711.73 | 2,621,181 | 2,540,607 | 1,687,105 | 14.44 | 116,836 |
| 1983 | 1,139,046.14 | 846,311 | 820,296 | 318,750 | 13.32 | 23,930 |
| 1984 | 3,968,671.66 | 2,916,974 | 2,827,307 | 1,141,365 | 13.52 | 84,420 |
| 1985 | 753,574.70 | 544,608 | 527,867 | 225,708 | 14.01 | 16,110 |
| 1986 | 2,364,324.89 | 1,687,182 | 1,635,318 | 729,007 | 14.25 | 51,158 |
| 1987 | 1,485,892.06 | 1,045,771 | 1,013,624 | 472,268 | 14.52 | 32,525 |
| 1988 | 924,967.62 | 641,373 | 621,657 | 303,311 | 14.81 | 20,480 |
| 1989 | 1,998,807.59 | 1,364,186 | 1,322,251 | 676,557 | 15.12 | 44,746 |
| 1990 | 673,764.83 | 452,096 | 438,199 | 235,566 | 15.45 | 15,247 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

## ACCOUNT 353 STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 38-S0


## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 354 TOWERS AND FIXTURES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 80-R3

| 1915 | 30,593.01 | 27,863 | 30,593 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1916 | 326,460.13 | 296,263 | 326,460 |  |  |  |
| 1917 | 23,402.34 | 21,162 | 23,381 | 21 | 7.66 | 3 |
| 1918 | 33,761.46 | 30,419 | 33,609 | 152 | 7.92 | 19 |
| 1919 | 24,286.21 | 21,800 | 24,086 | 200 | 8.19 | 24 |
| 1920 | 431,539.17 | 385,904 | 426,371 | 5,168 | 8.46 | 611 |
| 1924 | 33,816.82 | 29,759 | 32,880 | 937 | 9.60 | 98 |
| 1925 | 3,152.44 | 2,763 | 3,053 | 99 | 9.89 | 10 |
| 1926 | 95,628.08 | 83,435 | 92,184 | 3,444 | 10.20 | 338 |
| 1927 | 77,954.20 | 67,713 | 74,814 | 3,140 | 10.51 | 299 |
| 1930 | 68,618.10 | 58,754 | 64,915 | 3,703 | 11.50 | 322 |
| 1931 | 2,165.23 | 1,845 | 2,038 | 127 | 11.84 | 11 |
| 1933 | 1,415.18 | 1,193 | 1,318 | 97 | 12.57 | 8 |
| 1934 | 1,607.75 | 1,347 | 1,488 | 120 | 12.95 | 9 |
| 1936 | 19,430.67 | 16,096 | 17,784 | 1,647 | 13.73 | 120 |
| 1941 | 9,438.58 | 7,561 | 8,354 | 1,085 | 15.91 | 68 |
| 1942 | 164,413.90 | 130,750 | 144,461 | 19,953 | 16.38 | 1,218 |
| 1943 | 181.47 | 143 | 158 | 23 | 16.86 | 1 |
| 1944 | 9,227.41 | 7,226 | 7,984 | 1,243 | 17.35 | 72 |
| 1945 | 7,011.80 | 5,446 | 6,017 | 995 | 17.86 | 56 |
| 1948 | 3,092.49 | 2,341 | 2,586 | 506 | 19.44 | 26 |
| 1949 | 17,856.77 | 13,393 | 14,797 | 3,060 | 20.00 | 153 |
| 1950 | 53,789.67 | 39,966 | 44,157 | 9,633 | 20.56 | 469 |
| 1951 | 241,637.38 | 177,785 | 196,428 | 45,209 | 21.14 | 2,139 |
| 1952 | 53,902.56 | 39,268 | 43,386 | 10,517 | 21.72 | 484 |
| 1953 | 232,757.05 | 167,818 | 185,416 | 47,341 | 22.32 | 2,121 |
| 1954 | 1,500,573.00 | 1,070,479 | 1,182,733 | 317,840 | 22.93 | 13,861 |
| 1956 | 3,285,230.29 | 2,292,697 | 2,533,118 | 752,112 | 24.17 | 31,118 |
| 1957 | 652,411.14 | 450,085 | 497,283 | 155,128 | 24.81 | 6,253 |
| 1959 | 333,421.85 | 224,560 | 248,108 | 85,314 | 26.12 | 3,266 |
| 1960 | 108,691.15 | 72,307 | 79,889 | 28,802 | 26.78 | 1,076 |
| 1961 | 41,461.95 | 27,230 | 30,085 | 11,377 | 27.46 | 414 |
| 1962 | 126,774.68 | 82,165 | 90,781 | 35,994 | 28.15 | 1,279 |
| 1963 | 132,192.79 | 84,537 | 93,402 | 38,791 | 28.84 | 1,345 |
| 1964 | 671,256.06 | 423,395 | 467,794 | 203,462 | 29.54 | 6,888 |
| 1965 | 2,102,005.80 | 1,307,195 | 1,444,272 | 657,734 | 30.25 | 21,743 |
| 1966 | 857,945.26 | 525,817 | 580,956 | 276,989 | 30.97 | 8,944 |
| 1967 | 380,286.40 | 229,598 | 253,675 | 126,611 | 31.70 | 3,994 |
| 1968 | 308,229.23 | 183,279 | 202,498 | 105,731 | 32.43 | 3,260 |
| 1969 | 2,207,678.13 | 1,292,331 | 1,427,850 | 779,828 | 33.17 | 23,510 |
| 1970 | 1,585,494.40 | 913,245 | 1,009,011 | 576,483 | 33.92 | 16,995 |
| 1971 | 801,992.20 | 454,329 | 501,972 | 300,020 | 34.68 | 8,651 |

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## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 354 TOWERS AND FIXTURES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 80-R3

| 1972 | $9,182,617.18$ | $5,114,718$ | $5,651,067$ | $3,531,550$ | 35.44 | 99,649 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1973 | $1,608,790.87$ | 880,620 | 972,965 | 635,826 | 36.21 | 17,559 |
| 1974 | $3,328,633.04$ | $1,789,540$ | $1,977,198$ | $1,351,435$ | 36.99 | 36,535 |
| 1975 | $83,976.63$ | 44,330 | 48,979 | 34,998 | 37.77 | 927 |
| 1976 | $10,400.07$ | 5,386 | 5,951 | 4,449 | 38.57 | 115 |
| 1979 | $10,120,425.19$ | $4,936,237$ | $5,453,870$ | $4,666,555$ | 40.98 | 113,874 |
| 1980 | $2,951,517.40$ | $1,409,350$ | $1,557,140$ | $1,394,377$ | 41.80 | 33,358 |
| 1981 | $3,728,711.07$ | $1,742,240$ | $1,924,938$ | $1,803,773$ | 42.62 | 42,322 |
| 1984 | $3,201.49$ | 1,549 | 1,711 | 1,490 | 40.02 | 37 |
| 1986 | $733,843.82$ | 338,669 | 374,183 | 359,661 | 41.42 | 8,683 |
| 1987 | $10,093.43$ | 4,527 | 5,002 | 5,091 | 42.42 | 120 |
| 1990 | $1,265.06$ | 526 | 581 | 684 | 44.26 | 15 |
| 1991 | $412,207.70$ | 165,955 | 183,358 | 228,850 | 45.26 | 5,056 |
| 1992 | $888,166.89$ | 348,517 | 385,064 | 503,103 | 45.68 | 11,014 |
| 1994 | $15,416.59$ | 5,681 | 6,277 | 9,140 | 47.13 | 194 |
| 1995 | $457,485.90$ | 162,453 | 179,488 | 277,998 | 48.13 | 5,776 |
| 1997 | $95,434.99$ | 31,570 | 34,881 | 60,554 | 49.57 | 1,222 |
| 1998 | $325,906.66$ | 103,378 | 114,219 | 211,688 | 50.58 | 4,185 |
| 1999 | $400,238.55$ | 122,473 | 135,316 | 264,923 | 51.03 | 5,192 |
| 2000 | $1,065,871.71$ | 311,661 | 344,343 | 721,529 | 52.03 | 13,868 |
| 2002 | $6,017.62$ | 1,608 | 1,777 | 4,241 | 53.49 | 79 |
| 2003 | $501,626.59$ | 127,112 | 140,441 | 361,186 | 54.50 | 6,627 |
| 2004 |  | 37.42 | 9 | 10 | 107 | 54.96 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 355 POLES AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R3

| 1931 | 7,560.14 | 7,478 | 7,560 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1941 | 904.49 | 855 | 904 |  |  |  |
| 1943 | 118.07 | 110 | 118 |  |  |  |
| 1945 | 698.06 | 647 | 698 |  |  |  |
| 1950 | 50.15 | 45 | 50 |  |  |  |
| 1953 | 1,044.18 | 927 | 1,026 | 18 | 6.17 | 3 |
| 1954 | 2,240.19 | 1,977 | 2,187 | 53 | 6.46 | 8 |
| 1958 | 3,403.68 | 2,927 | 3,238 | 166 | 7.70 | 22 |
| 1965 | 12,431.15 | 10,078 | 11,150 | 1,281 | 10.41 | 123 |
| 1966 | 15,055.44 | 12,083 | 13,368 | 1,687 | 10.86 | 155 |
| 1968 | 57,084.08 | 44,816 | 49,583 | 7,501 | 11.82 | 635 |
| 1969 | 209,683.24 | 162,676 | 179,979 | 29,704 | 12.33 | 2,409 |
| 1970 | 21,118.65 | 16,184 | 17,905 | 3,214 | 12.85 | 250 |
| 1972 | 46,796.16 | 34,936 | 38,652 | 8,144 | 13.94 | 584 |
| 1973 | 33,688.05 | 24,800 | 27,438 | 6,250 | 14.51 | 431 |
| 1974 | 547,441.36 | 397,141 | 439,383 | 108,058 | 15.10 | 7,156 |
| 1975 | 25,110.75 | 17,938 | 19,846 | 5,265 | 15.71 | 335 |
| 1976 | 11,823.49 | 8,315 | 9,199 | 2,624 | 16.32 | 161 |
| 1977 | 13,940.21 | 9,642 | 10,668 | 3,272 | 16.96 | 193 |
| 1978 | 4,583.18 | 3,116 | 3,447 | 1,136 | 17.61 | 65 |
| 1979 | 993,922.40 | 663,761 | 734,361 | 259,561 | 18.27 | 14,207 |
| 1980 | 424,820.94 | 278,530 | 308,156 | 116,665 | 18.94 | 6,160 |
| 1981 | 2,138,558.34 | 1,375,285 | 1,521,566 | 616,992 | 19.63 | 31,431 |
| 1982 | 10,564.59 | 6,659 | 7,367 | 3,198 | 20.33 | 157 |
| 1985 | 1,807.38 | 1,161 | 1,284 | 523 | 20.32 | 26 |
| 1986 | 846,055.70 | 531,661 | 588,211 | 257,845 | 20.99 | 12,284 |
| 1987 | 144,740.31 | 88,885 | 98,339 | 46,401 | 21.68 | 2,140 |
| 1988 | 1,657.21 | 999 | 1,105 | 552 | 22.06 | 25 |
| 1989 | 16,091.99 | 9,465 | 10,472 | 5,620 | 22.75 | 247 |
| 1992 | 1,330,919.14 | 722,423 | 799,263 | 531,656 | 24.85 | 21,395 |
| 1993 | 1,291,042.91 | 680,638 | 753,033 | 538,010 | 25.56 | 21,049 |
| 1995 | 19,948.26 | 9,886 | 10,938 | 9,010 | 26.97 | 334 |
| 1996 | 3,645.82 | 1,748 | 1,934 | 1,712 | 27.69 | 62 |
| 1997 | 13,560.21 | 6,278 | 6,946 | 6,614 | 28.41 | 233 |
| 1999 | 281,663.86 | 121,059 | 133,935 | 147,729 | 29.85 | 4,949 |
| 2000 | 258,852.47 | 106,854 | 118,219 | 140,633 | 30.58 | 4,599 |
| 2002 | 219.00 | 83 | 92 | 127 | 32.05 | 4 |
| 2003 | 911,867.15 | 329,002 | 363,996 | 547,871 | 32.78 | 16,714 |
| 2004 | 173,165.67 | 59,084 | 65,368 | 107,798 | 33.78 | 3,191 |
| 2005 | 1,618,368.49 | 523,380 | 579,049 | 1,039,319 | 34.52 | 30,108 |
| 2006 | 1,082,826.09 | 330,695 | 365,869 | 716,957 | 35.26 | 20,333 |
| 2007 | 280.64 | 81 | 90 | 191 | 36.01 | 5 |

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                                    DUQUESNE LIGHT COMPANY
    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                                    ACCOUNT 355 POLES AND FIXTURES
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
```

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 55-R3

| 2008 | $761,034.04$ | 204,414 | 226,156 | 534,878 | 36.75 | 14,555 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2009 | $2,828,156.73$ | 707,039 | 782,243 | $2,045,914$ | 37.50 | 54,558 |
| 2010 | $320,304.00$ | 74,054 | 81,931 | 238,373 | 38.25 | 6,232 |
| 2011 | $13,871,388.85$ | $2,926,863$ | $3,238,176$ | $10,633,213$ | 39.25 | 270,910 |
| 2012 | $704,839.38$ | 135,259 | 149,646 | 555,193 | 40.00 | 13,880 |
| 2013 | $18,697,627.66$ | $3,227,211$ | $3,570,470$ | $15,127,158$ | 40.76 | 371,128 |
| 2014 | $1,048,386.05$ | 160,403 | 177,464 | 870,922 | 41.52 | 20,976 |
| 2015 | $203,774.55$ | 27,143 | 30,030 | 173,745 | 42.28 | 4,109 |
| 2016 | $233,162.14$ | 26,417 | 29,227 | 203,935 | 43.04 | 4,738 |
| 2017 | $1,410,593.00$ | 131,467 | 145,450 | $1,265,143$ | 43.81 | 28,878 |
| 2018 | $3,730,558.02$ | 271,585 | 300,472 | $3,430,086$ | 44.58 | 76,942 |
| 2019 | $308,221.36$ | 16,089 | 17,801 | 290,420 | 45.35 | 6,404 |
| 2020 | $319,370.87$ | 10,092 | 11,165 | 308,206 | 45.90 | 6,715 |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  | 57,016,769.94 | $14,522,344$ | $16,066,223$ | $40,950,547$ |  | $1,082,208$ |

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR
(1)
ORIGINAL
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK RESERVE
(4)
FUTURE BOOK
ACCRUALS
(5)
REM.
LIFE
(6)
ANNUAL
ACCRUAL
(7)

SURVIVOR CURVE.. IOWA 65-R3

| 1916 | 54.15 | 53 | 54 |
| :--- | ---: | ---: | ---: |
| 1920 | $10,595.55$ | 10,271 | 10,596 |
| 1922 | 667.75 | 642 | 668 |
| 1924 | $6,118.42$ | 5,838 | 6,118 |
| 1927 | 9.69 | 9 | 10 |
| 1929 | 68.06 | 64 | 68 |
| 1931 | $5,433.13$ | 5,034 | 5,433 |
| 1941 | $7,710.70$ | 6,829 | 7,711 |
| 1942 | $3,203.33$ | 2,823 | 3,203 |
| 1943 | $2,107.91$ | 1,848 | 2,108 |
| 1945 | $11,764.41$ | 10,202 | 11,764 |
| 1948 | $6,985.41$ | 5,951 | 6,963 |
| 1950 | $42,192.03$ | 35,467 | 41,496 |
| 1951 | $36,914.02$ | 30,809 | 36,047 |
| 1952 | $23,769.59$ | 19,692 | 23,040 |
| 1953 | $179,640.40$ | 147,691 | 172,798 |
| 1954 | $753,496.89$ | 614,507 | 718,973 |
| 1956 | $1,066,396.95$ | 855,090 | $1,000,455$ |
| 1957 | $264,008.90$ | 209,787 | 245,451 |
| 1958 | $6,170.05$ | 4,856 | 5,682 |
| 1959 | $164,972.95$ | 128,603 | 150,465 |
| 1960 | $301,050.73$ | 232,273 | 271,759 |
| 1961 | $12,740.22$ | 9,726 | 11,379 |
| 1962 | $158,780.67$ | 119,892 | 140,274 |
| 1963 | $48,607.33$ | 36,283 | 42,451 |
| 1964 | $173,903.70$ | 128,287 | 150,096 |
| 1965 | $1,857,248.56$ | $1,353,507$ | $1,583,603$ |
| 1966 | $437,429.98$ | 314,748 | 368,255 |
| 1967 | $262,130.18$ | 186,152 | 217,798 |
| 1968 | $839,995.70$ | 588,518 | 688,566 |
| 1969 | $2,015,172.95$ | $1,392,021$ | $1,628,664$ |
| 1970 | $1,155,713.40$ | 786,775 | 920,526 |
| 1971 | $127,055.57$ | 85,206 | 99,691 |
| 1972 | $4,211,990.59$ | $2,781,220$ | $3,254,026$ |
| 1973 | $1,216,876.36$ | 790,787 | 925,221 |
| 1974 | $2,423,512.25$ | $1,549,182$ | $1,812,542$ |
| 1975 | $34,182.50$ | 21,477 | 25,128 |
| 1976 | $1,292,829.75$ | 798,167 | 933,855 |
| 1977 | $73,941.15$ | 44,831 | 52,452 |
| 1978 | 897.10 | 534 | 625 |
| 1979 | $2,688,256.90$ | $1,568,705$ | $1,835,384$ |
| 1980 | $1,776,207.67$ | $1,015,991$ | $1,188,709$ |
|  | 190 |  |  |

1916 -22

1924
1927
1929
1931
1941
1942
1945
1948
1950
1951
1952
1953
1954
1956
1957
1958
1959
1961
1962
1963
1964
1965

1967
1968
1969
1970
2,015,172.95
$127,055.57$
4,211,990.59
1,216,876.36
2,423,512.25
34,182.50
$1,292,829.75$
73,941.15
897.10

1,776,207.67

1,015,991
$1,188,709$

| 22 | 9.63 | 2 |
| ---: | ---: | ---: |
| 696 | 10.36 | 67 |
| 867 | 10.75 | 81 |
| 730 | 11.15 | 65 |
| 6,842 | 11.56 | 592 |
| 34,524 | 11.99 | 2,879 |
| 65,942 | 12.88 | 5,120 |
| 18,558 | 13.35 | 1,390 |
| 488 | 13.84 | 35 |
| 14,508 | 14.33 | 1,012 |
| 29,292 | 14.85 | 1,973 |
| 1,361 | 15.38 | 88 |
| 18,507 | 15.92 | 1,162 |
| 6,156 | 16.48 | 374 |
| 23,808 | 17.05 | 1,396 |
| 273,646 | 17.63 | 15,522 |
| 69,175 | 18.23 | 3,795 |
| 44,332 | 18.84 | 2,353 |
| 151,430 | 19.46 | 7,782 |
| 386,509 | 20.10 | 19,229 |
| 235,187 | 20.75 | 11,334 |
| 27,365 | 21.41 | 1,278 |
| 957,965 | 22.08 | 43,386 |
| 291,655 | 22.76 | 12,814 |
| 610,970 | 23.45 | 26,054 |
| 9,054 | 24.16 | 375 |
| 358,975 | 24.87 | 14,434 |
| 21,489 | 25.59 | 840 |
| 272 | 26.33 | 10 |
| 852,873 | 27.07 | 31,506 |
| 587,499 | 27.82 | 21,118 |

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 65-R3

| 1981 | 3,171,000.82 | 1,776,743 | 2,078,789 | 1,092,212 | 28.58 | 38,216 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1982 | 55,353.33 | 30,359 | 35,520 | 19,833 | 29.35 | 676 |
| 1983 | 24,109.87 | 14,201 | 16,615 | 7,495 | 26.86 | 279 |
| 1984 | 15,618.44 | 9,020 | 10,553 | 5,065 | 27.44 | 185 |
| 1985 | 2,602,746.60 | 1,463,004 | 1,711,714 | 891,033 | 28.44 | 31,330 |
| 1986 | 988,243.35 | 543,731 | 636,165 | 352,078 | 29.02 | 12,132 |
| 1987 | 174,703.33 | 94,025 | 110,009 | 64,694 | 29.60 | 2,186 |
| 1988 | 21,729.06 | 11,429 | 13,372 | 8,357 | 30.19 | 277 |
| 1989 | 3,311.14 | 1,689 | 1,976 | 1,335 | 31.20 | 43 |
| 1990 | 88,313.75 | 43,954 | 51,426 | 36,888 | 31.79 | 1,160 |
| 1991 | 3,533.18 | 1,714 | 2,005 | 1,528 | 32.39 | 47 |
| 1992 | 2,781,659.79 | 1,304,598 | 1,526,379 | 1,255,281 | 33.40 | 37,583 |
| 1993 | 1,156,408.53 | 527,322 | 616,967 | 539,442 | 34.00 | 15,866 |
| 1994 | 2,488.11 | 1,102 | 1,289 | 1,199 | 34.61 | 35 |
| 1995 | 17,415.72 | 7,477 | 8,748 | 8,668 | 35.23 | 246 |
| 1996 | 7,623.30 | 3,149 | 3,684 | 3,939 | 36.23 | 109 |
| 1997 | 19,530.35 | 7,800 | 9,126 | 10,404 | 36.85 | 282 |
| 1999 | 5,290.94 | 1,952 | 2,284 | 3,007 | 38.48 | 78 |
| 2000 | 1,973.69 | 700 | 819 | 1,155 | 39.10 | 30 |
| 2002 | 5,158.63 | 1,670 | 1,954 | 3,205 | 40.74 | 79 |
| 2003 | 796,351.03 | 246,072 | 287,904 | 508,447 | 41.38 | 12,287 |
| 2004 | 957,741.26 | 279,852 | 327,427 | 630,314 | 42.38 | 14,873 |
| 2005 | 2,948,040.41 | 817,197 | 956,120 | 1,991,920 | 43.02 | 46,302 |
| 2006 | 1,470,658.66 | 385,313 | 450,816 | 1,019,843 | 43.67 | 23,353 |
| 2007 | 2,315,053.18 | 567,188 | 663,610 | 1,651,443 | 44.67 | 36,970 |
| 2009 | 15,423,296.77 | 3,277,451 | 3,834,617 | 11,588,680 | 46.32 | 250,187 |
| 2010 | 2,833,792.79 | 557,124 | 651,835 | 2,181,958 | 46.98 | 46,444 |
| 2011 | 3,421,016.94 | 617,836 | 722,868 | 2,698,149 | 47.64 | 56,636 |
| 2012 | 4,440,876.88 | 725,639 | 848,998 | 3,591,879 | 48.64 | 73,846 |
| 2013 | 8,560,584.30 | 1,258,406 | 1,472,335 | 7,088,249 | 49.31 | 143,749 |
| 2014 | 7,441,388.09 | 965,892 | 1,130,094 | 6,311,294 | 50.30 | 125,473 |
| 2015 | 2,175,092.40 | 246,003 | 287,823 | 1,887,269 | 50.97 | 37,027 |
| 2016 | 4,074,498.87 | 391,967 | 458,601 | 3,615,898 | 51.65 | 70,008 |
| 2017 | 12,914,136.01 | 1,022,800 | 1,196,676 | 11,717,460 | 52.32 | 223,958 |
| 2018 | 11,857,933.56 | 735,192 | 860,175 | 10,997,759 | 52.99 | 207,544 |
| 2019 | 1,784,300.17 | 79,401 | 92,899 | 1,691,401 | 53.68 | 31,509 |
| 2020 | 4,487,115.42 | 120,255 | 140,698 | 4,346,417 | 54.37 | 79,941 |
| 2021 | 6,910,496.29 | 62,886 | 73,577 | 6,836,919 | 54.45 | 125,563 |
|  | 129,659,388.51 | 34,102,461 | 39,896,574 | 89,762,814 |  | 1,974,575 |
|  | COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT . 45.51 .52 |  |  |  |  |  |

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 357 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 60-S3

| 1956 | 91,709.41 | 76,547 | 76,461 | 15,248 | 9.92 | 1,537 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1958 | 3,594,249.57 | 2,959,865 | 2,956,528 | 637,722 | 10.59 | 60,219 |
| 1960 | 263,024.66 | 213,531 | 213,290 | 49,735 | 11.29 | 4,405 |
| 1961 | 10,434.81 | 8,405 | 8,396 | 2,039 | 11.67 | 175 |
| 1967 | 391,921.15 | 299,428 | 299,090 | 92,831 | 14.16 | 6,556 |
| 1972 | 165,588.11 | 119,666 | 119,531 | 46,057 | 16.64 | 2,768 |
| 1974 | 5,897.53 | 4,153 | 4,148 | 1,750 | 17.75 | 99 |
| 1975 | 4,528.32 | 3,145 | 3,141 | 1,387 | 18.33 | 76 |
| 1979 | 28,640,461.01 | 18,692,770 | 18,671,698 | 9,968,763 | 20.84 | 478,348 |
| 1980 | 659,680.65 | 423,073 | 422,596 | 237,085 | 21.52 | 11,017 |
| 1983 | 16,636.13 | 10,760 | 10,748 | 5,888 | 21.02 | 280 |
| 1985 | 432,054.70 | 268,090 | 267,788 | 164,267 | 22.32 | 7,360 |
| 1986 | 640,900.19 | 389,026 | 388,587 | 252,313 | 22.98 | 10,980 |
| 1990 | 1,493,297.60 | 818,476 | 817,553 | 675,745 | 25.97 | 26,020 |
| 1996 | 13,656.62 | 6,165 | 6,158 | 7,499 | 30.99 | 242 |
| 2003 | 528,003.76 | 173,872 | 173,676 | 354,328 | 37.68 | 9,404 |
| 2005 | 663,726.32 | 196,065 | 195,844 | 467,882 | 39.36 | 11,887 |
| 2006 | 258,941.50 | 71,830 | 71,749 | 187,192 | 40.37 | 4,637 |
| 2007 | 24,875,884.97 | 6,457,780 | 6,450,500 | 18,425,385 | 41.36 | 445,488 |
| 2009 | 151.78 | 34 | 34 | 118 | 43.36 | 3 |
| 2010 | 109,559.76 | 22,547 | 22,522 | 87,038 | 44.37 | 1,962 |
| 2011 | 1,291,616.16 | 242,824 | 242,550 | 1,049,066 | 45.36 | 23,128 |
| 2012 | 5,757,829.90 | 978,831 | 977,728 | 4,780,102 | 46.37 | 103,086 |
| 2013 | 766,004.08 | 116,586 | 116,455 | 649,549 | 47.36 | 13,715 |
| 2015 | 1,610,380.03 | 187,448 | 187,237 | 1,423,143 | 49.36 | 28,832 |
| 2016 | 8,399,786.68 | 826,539 | 825,606 | 7,574,181 | 50.37 | 150,371 |
| 2017 | 62,256.13 | 5,018 | 5,012 | 57,244 | 51.36 | 1,115 |
| 2019 | 100,580.89 | 4,506 | 4,501 | 96,080 | 53.36 | 1,801 |
| 2021 | 2,153,370.44 | 19,380 | 19,359 | 2,134,012 | 55.36 | 38,548 |
|  | 83,002,132.86 | 33,596,360 | 33,558,486 | 49,443,647 |  | 1,444,059 |

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 34.2 1.74


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

SURVIVOR CURVE.. IOWA 60-R3

| 1951 | 1,472.20 | 1,276 | 1,312 | 160 | 8.00 | 20 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1958 | 705,920.83 | 581,679 | 598,113 | 107,808 | 10.56 | 10,209 |
| 1959 | 1,790.10 | 1,463 | 1,504 | 286 | 10.98 | 26 |
| 1967 | 238,697.15 | 179,302 | 184,368 | 54,329 | 14.93 | 3,639 |
| 1968 | 16,696.81 | 12,386 | 12,736 | 3,961 | 15.49 | 256 |
| 1972 | 168,645.39 | 118,360 | 121,704 | 46,941 | 17.89 | 2,624 |
| 1975 | 135,372.41 | 90,609 | 93,169 | 42,203 | 19.84 | 2,127 |
| 1979 | 15,348,704.29 | 9,567,308 | 9,837,615 | 5,511,089 | 22.60 | 243,853 |
| 1980 | 16,920.12 | 10,344 | 10,636 | 6,284 | 23.32 | 269 |
| 1982 | 59,636.07 | 34,996 | 35,985 | 23,651 | 24.79 | 954 |
| 1983 | 509,630.19 | 319,844 | 328,881 | 180,749 | 22.85 | 7,910 |
| 1986 | 153,515.09 | 90,466 | 93,022 | 60,493 | 24.74 | 2,445 |
| 2000 | 167.63 | 64 | 66 | 102 | 34.99 | 3 |
| 2004 | 62,917.24 | 19,819 | 20,379 | 42,538 | 38.06 | 1,118 |
| 2005 | 168,221.02 | 50,231 | 51,650 | 116,571 | 38.75 | 3,008 |
| 2006 | 200,476.26 | 56,554 | 58,152 | 142,324 | 39.45 | 3,608 |
| 2007 | 15,114,671.61 | 4,011,434 | 4,124,770 | 10,989,902 | 40.14 | 273,789 |
| 2008 | 6,759,504.11 | 1,669,598 | 1,716,769 | 5,042,735 | 41.15 | 122,545 |
| 2009 | 59,830.99 | 13,761 | 14,150 | 45,681 | 41.85 | 1,092 |
| 2010 | 18,218,306.69 | 3,876,856 | 3,986,390 | 14,231,917 | 42.55 | 334,475 |
| 2011 | 19,282,188.42 | 3,744,601 | 3,850,398 | 15,431,790 | 43.56 | 354,265 |
| 2012 | 14,001,214.58 | 2,474,015 | 2,543,914 | 11,457,301 | 44.26 | 258,864 |
| 2013 | 12,709,057.60 | 2,020,740 | 2,077,832 | 10,631,226 | 44.97 | 236,407 |
| 2015 | 3,837.56 | 469 | 482 | 3,356 | 46.69 | 72 |
| 2016 | 42,236,831.60 | 4,392,630 | 4,516,736 | 37,720,096 | 47.41 | 795,615 |
| 2017 | 1,624,794.71 | 138,920 | 142,845 | 1,481,950 | 48.13 | 30,791 |
| 2021 | 2,560,087.00 | 25,089 | 25,798 | 2,534,289 | 50.26 | 50,424 |
|  | 150,359,107.67 | 33,502,814 | 34,449,376 | 115,909,732 |  | 2,740,408 |
|  | COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 42.3 |  |  |  |  | 1.82 |

```
                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 359 ROADS AND TRAILS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
```

YEAR
(1)

ORIGINAL
COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)

```
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}
```

SURVIVOR CURVE.. IOWA 60-R4

| 2011 | 2,091,746.25 | 386,555 | 389,521 | 1,702,225 | 46.32 | 36,749 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2012 | 2.55 |  |  | 3 | 46.99 |  |
| 2013 | 7,171,325.17 | 1,078,567 | 1,086,844 | 6,084,481 | 48.00 | 126,760 |
| 2014 | 30,518.01 | 4,053 | 4,084 | 26,434 | 48.99 | 540 |
| 2018 | 892,401.86 | 55,329 | 55,754 | 836,648 | 52.99 | 15,789 |
|  | 10,185,993.84 | 1,524,504 | 1,536,203 | 8,649,791 |  | 179,838 |
| COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 48.1 |  |  |  |  |  | 1.77 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

ALLOC. BOOK
RESERVE
(4)
$\begin{array}{cl}\text { FUTURE BOOK } & \text { REM. } \\ \text { ACCRUALS } & \text { LIFE }\end{array}$
(5)

LIFE ACCRUAL
(6)

ANNUAL
(7)

AMBRIDGE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2046

| 1981 | $5,814.48$ | 3,704 | 3,802 | 2,012 | 21.52 | 93 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1986 | $40,920.20$ | 25,420 | 26,093 | 14,827 | 21.65 | 685 |
| 1991 | $77,831.17$ | 45,103 | 46,298 | 31,533 | 22.13 | 1,425 |
| 2019 | $1,068,177.57$ | 101,263 | 103,945 | 964,232 | 23.88 | 40,378 |
| 2021 | $175,023.41$ | 3,605 | 3,700 | 171,323 | 23.77 | 7,208 |
|  |  |  |  |  |  | 49,789 |

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1922 | 57,206.67 | 54,092 | 55,525 | 1,682 | 3.81 | 441 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1927 | 394.38 | 370 | 380 | 15 | 4.29 | 3 |
| 1928 | 33,930.56 | 31,812 | 32,655 | 1,276 | 4.36 | 293 |
| 1929 | 3,137.09 | 2,937 | 3,015 | 122 | 4.44 | 27 |
| 1931 | 260.46 | 243 | 249 | 11 | 4.57 | 2 |
| 1941 | 78.27 | 72 | 74 | 4 | 5.16 | 1 |
| 1945 | 1,254.84 | 1,155 | 1,186 | 69 | 5.37 | 13 |
| 1948 | 127.30 | 117 | 120 | 7 | 5.52 | 1 |
| 1949 | 385.84 | 353 | 362 | 23 | 5.57 | 4 |
| 1953 | 853.71 | 778 | 799 | 55 | 5.74 | 10 |
| 1955 | 2,123.34 | 1,930 | 1,981 | 142 | 5.82 | 24 |
| 1956 | 59,146.45 | 53,672 | 55,094 | 4,053 | 5.86 | 692 |
| 1957 | 72,215.05 | 65,443 | 67,176 | 5,039 | 5.89 | 856 |
| 1962 | 989.74 | 890 | 914 | 76 | 6.04 | 13 |
| 1964 | 21,353.04 | 19,135 | 19,642 | 1,711 | 6.09 | 281 |
| 1966 | 13,324.36 | 11,896 | 12,211 | 1,113 | 6.14 | 181 |
| 1967 | 91,851.33 | 81,850 | 84,018 | 7,833 | 6.16 | 1,272 |
| 1970 | 20,297.02 | 17,979 | 18,455 | 1,842 | 6.21 | 297 |
| 1973 | 651.38 | 573 | 588 | 63 | 6.26 | 10 |
| 1974 | 147.54 | 129 | 132 | 15 | 6.27 | 2 |
| 1975 | 3,381.04 | 2,959 | 3,037 | 344 | 6.29 | 55 |
| 1976 | 3,414.43 | 2,981 | 3,060 | 354 | 6.30 | 56 |
| 1977 | 4,868.30 | 4,239 | 4,351 | 517 | 6.31 | 82 |
| 1978 | 47,683.89 | 41,399 | 42,496 | 5,188 | 6.32 | 821 |
| 1979 | 90,582.00 | 78,409 | 80,486 | 10,096 | 6.33 | 1,595 |
| 1980 | 13,828.46 | 11,932 | 12,248 | 1,580 | 6.34 | 249 |
| 1981 | 127,041.02 | 109,264 | 112,158 | 14,883 | 6.35 | 2,344 |
| 1983 | 258,851.69 | 222,250 | 228,137 | 30,715 | 6.34 | 4,845 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1988 | $7,768.16$ | 6,531 | 6,704 | 1,064 | 6.34 | 168 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1996 | $98,510.88$ | 78,631 | 80,714 | 17,797 | 6.45 | 2,759 |
| 1998 | $53,947.30$ | 42,343 | 43,465 | 10,483 | 6.44 | 1,628 |
| 1999 | $99,784.67$ | 77,453 | 79,505 | 20,280 | 6.49 | 3,125 |
| 2004 | $80,982.49$ | 59,101 | 60,666 | 20,316 | 6.48 | 3,135 |
| 2011 | $61,132.96$ | 37,805 | 38,806 | 22,327 | 6.48 | 3,446 |
| 2013 | $31,893.29$ | 18,109 | 18,589 | 13,305 | 6.47 | 2,056 |
| 2014 | $84,246.70$ | 45,173 | 46,370 | 37,877 | 6.49 | 5,836 |
|  |  |  |  |  |  | 36,623 |

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022

| 1918 | $6,479.65$ | 6,436 | 6,480 |
| :--- | ---: | ---: | ---: |
| 1920 | $1,139.38$ | 1,132 | 1,139 |
| 1924 | $21,829.47$ | 21,679 | 21,829 |
| 1925 | 130.20 | 129 | 130 |
| 1926 | $6,879.41$ | 6,832 | 6,879 |
| 1927 | $7,591.79$ | 7,539 | 7,592 |
| 1928 | $1,550.59$ | 1,540 | 1,551 |
| 1929 | 41.37 | 41 | 41 |
| 1936 | 124.43 | 124 | 124 |
| 1941 | 385.02 | 382 | 385 |
| 1945 | 91.20 | 91 | 91 |
| 1947 | 185.32 | 184 | 185 |
| 1948 | $3,776.50$ | 3,748 | 3,777 |
| 1950 | $3,345.31$ | 3,319 | 3,345 |
| 1951 | 363.99 | 361 | 364 |
| 1954 | 239.48 | 238 | 239 |
| 1956 | $3,964.21$ | 3,931 | 3,964 |
| 1958 | $5,227.70$ | 5,183 | 5,228 |
| 1960 | $1,588.13$ | 1,574 | 1,588 |
| 1964 | $4,364.80$ | 4,325 | 4,365 |
| 1965 | $26,341.57$ | 26,096 | 26,342 |
| 1969 | 991.16 | 981 | 991 |
| 1970 | $26,477.66$ | 26,211 | 26,478 |
| 1972 | $649,046.00$ | 642,276 | 649,046 |
| 1975 | $10,827.98$ | 10,709 | 10,828 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022

| 1978 | 10,129.72 | 10,011 | 10,130 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1982 | 19,253.95 | 19,008 | 19,254 |  |  |  |
| 1987 | 992.73 | 980 | 993 |  |  |  |
| 1989 | 8,142.94 | 8,019 | 8,143 |  |  |  |
| 1992 | 11,155.20 | 10,959 | 11,155 |  |  |  |
| 1995 | 1,769.50 | 1,735 | 1,770 |  |  |  |
| 1998 | 3,928.52 | 3,850 | 3,929 |  |  |  |
| 1999 | 113,103.99 | 110,706 | 113,104 |  |  |  |
| 2000 | 2,114.00 | 2,068 | 2,114 |  |  |  |
| 2002 | 92,388.44 | 90,079 | 92,388 |  |  |  |
| 2006 | 48,955.91 | 47,428 | 48,956 |  |  |  |
| 2007 | 3,382.83 | 3,272 | 3,383 |  |  |  |
| 2009 | 113,808.87 | 109,393 | 113,809 |  |  |  |
| 2011 | 77,040.51 | 73,527 | 77,041 |  |  |  |
| 2014 | 133,046.28 | 124,731 | 133,046 |  |  |  |
| 2019 | 56,760.10 | 47,293 | 54,016 | 2,744 | 0.50 | 2,744 |
|  | 1,478,955.81 | 1,438,120 | 1,476,212 | 2,744 |  | 2,744 |

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020

| 1925 | $5,580.60$ | 5,581 | 5,581 |
| ---: | ---: | ---: | ---: |
| 1926 | $5,585.75$ | 5,586 | 5,586 |
| 1927 | $8,368.56$ | 8,369 | 8,369 |
| 1928 | $194,910.32$ | 194,910 | 194,910 |
| 1939 | $4,857.87$ | 4,858 | 4,858 |
| 1941 | 390.66 | 391 | 391 |
| 1945 | $7,822.11$ | 7,822 | 7,822 |
| 1948 | $1,280.08$ | 1,280 | 1,280 |
| 1951 | $1,451.21$ | 1,451 | 1,451 |
| 1955 | $13,175.67$ | 13,176 | 13,176 |
| 1959 | $1,046.38$ | 1,046 | 1,046 |
| 1962 | $4,795.76$ | 4,796 | 4,796 |
| 1964 | $7,377.68$ | 7,378 | 7,378 |
| 1968 | $2,731.98$ | 2,732 | 2,732 |
| 1970 | $3,738.69$ | 3,739 | 3,739 |
| 1973 | $6,413.14$ | 6,413 | 6,413 |
| 1975 | $847,423.37$ | 847,423 | 847,423 |


|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020

| 1976 | $40,937.27$ | 40,937 | 40,937 |
| ---: | ---: | ---: | ---: |
| 1977 | $1,455.67$ | 1,456 | 1,456 |
| 1979 | $11,730.51$ | 11,731 | 11,731 |
| 1981 | $2,663.43$ | 2,663 | 2,663 |
| 1988 | $15,907.68$ | 15,908 | 15,908 |
| 1990 | $20,549.10$ | 20,549 | 20,549 |
| 1995 | $97,828.82$ | 97,829 | 97,829 |
| 1996 | $75,615.66$ | 75,616 | 75,616 |
| 1999 | $12,089.25$ | 12,089 | 12,089 |
| 2000 | $141,263.00$ | 141,263 | 141,263 |
| 2018 | $14,164.13$ | 14,164 | 14,164 |
| 2019 | $4,199.09$ | 4,199 | 4,199 |
|  |  |  |  |
|  | $1,555,353.44$ | $1,555,355$ | $1,555,353$ |

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040

| 1920 | 24,315.05 | 22,888 | 23,520 | 796 | 4.11 | 194 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1924 | 1,614.45 | 1,496 | 1,537 | 77 | 5.13 | 15 |
| 1925 | 1,528.60 | 1,411 | 1,450 | 79 | 5.39 | 15 |
| 1926 | 83.36 | 77 | 79 | 4 | 5.64 | 1 |
| 1927 | 50.34 | 46 | 47 | 3 | 5.90 | 1 |
| 1928 | 548.07 | 500 | 514 | 34 | 6.14 | 6 |
| 1930 | 1,912.18 | 1,731 | 1,779 | 133 | 6.63 | 20 |
| 1933 | 308.08 | 276 | 284 | 24 | 7.35 | 3 |
| 1942 | 539.72 | 466 | 479 | 61 | 9.47 | 6 |
| 1943 | 1,567.28 | 1,349 | 1,386 | 181 | 9.71 | 19 |
| 1951 | 245.06 | 203 | 209 | 36 | 11.71 | 3 |
| 1954 | 1,188.09 | 971 | 998 | 190 | 12.46 | 15 |
| 1956 | 52,571.01 | 42,540 | 43,714 | 8,857 | 12.94 | 684 |
| 1957 | 5,882.97 | 4,735 | 4,866 | 1,017 | 13.18 | 77 |
| 1961 | 31,163.44 | 24,548 | 25,225 | 5,938 | 14.08 | 422 |
| 1966 | 4,238.80 | 3,246 | 3,336 | 903 | 15.06 | 60 |
| 1967 | 4,490.52 | 3,419 | 3,513 | 977 | 15.23 | 64 |
| 1968 | 7,240.74 | 5,480 | 5,631 | 1,610 | 15.40 | 105 |
| 1970 | 33,996.04 | 25,419 | 26,120 | 7,876 | 15.71 | 501 |
| 1971 | 30,306.93 | 22,518 | 23,139 | 7,168 | 15.86 | 452 |
| 1974 | 1,800.27 | 1,312 | 1,348 | 452 | 16.26 | 28 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR
(1)
ORIGINAL
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK RESERVE
(4)
FUTURE BOOK REM. ANNUAL ACCRUALS
(5)
LIFE ACCRUAL
(6)
(7)

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040

| 1978 | $3,004.77$ | 2,129 | 2,188 | 817 | 16.70 | 49 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1982 | $4,055.37$ | 2,783 | 2,860 | 1,196 | 17.06 | 70 |
| 1983 | $1,364.18$ | 951 | 977 | 387 | 16.75 | 23 |
| 1987 | $5,763.19$ | 3,857 | 3,963 | 1,800 | 17.05 | 106 |
| 1988 | $25,956.73$ | 17,131 | 17,604 | 8,353 | 17.26 | 484 |
| 1991 | $107,821.95$ | 68,726 | 70,622 | 37,200 | 17.35 | 2,144 |
| 1995 | $477,943.24$ | 287,531 | 295,465 | 182,479 | 17.55 | 10,398 |
| 1996 | $191,762.77$ | 113,447 | 116,577 | 75,185 | 17.60 | 4,272 |
| 1999 | $31,380.47$ | 17,510 | 17,993 | 13,387 | 17.82 | 751 |
| 2003 | $19,787.14$ | 10,030 | 10,307 | 9,480 | 18.00 | 527 |
| 2005 | $101,833.56$ | 48,727 | 50,071 | 51,762 | 17.98 | 2,879 |
| 2009 | $104,155.00$ | 42,579 | 43,754 | 60,401 | 18.08 | 3,341 |
| 2011 | $79,727.09$ | 29,212 | 30,018 | 49,709 | 18.15 | 2,739 |
|  |  |  |  |  |  |  |
|  | $1,360,146.46$ | 809,244 | 831,573 | 528,573 |  | 30,474 |

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2049

| 1959 | 797,697.07 | 606,425 | 623,158 | 174,539 | 16.54 | 10,553 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1961 | 8,431.74 | 6,304 | 6,478 | 1,954 | 17.33 | 113 |
| 1965 | 719.03 | 519 | 533 | 186 | 18.86 | 10 |
| 1971 | 697.13 | 476 | 489 | 208 | 20.92 | 10 |
| 1980 | 8,174.05 | 5,085 | 5,225 | 2,949 | 23.32 | 126 |
| 1983 | 11,912.47 | 7,476 | 7,682 | 4,230 | 22.85 | 185 |
| 1987 | 125.06 | 74 | 76 | 49 | 23.64 | 2 |
| 1991 | 6,782.86 | 3,765 | 3,869 | 2,914 | 24.45 | 119 |
| 1996 | 85,627.02 | 43,233 | 44,426 | 41,201 | 25.01 | 1,647 |
| 2002 | 14,754.40 | 6,359 | 6,534 | 8,220 | 25.75 | 319 |
| 2007 | 7,298.88 | 2,604 | 2,676 | 4,623 | 26.15 | 177 |
| 2009 | 80,337.57 | 25,909 | 26,624 | 53,714 | 26.26 | 2,045 |
| 2011 | 303,749.19 | 86,447 | 88,832 | 214,917 | 26.40 | 8,141 |
| 2012 | 985,777.66 | 260,344 | 267,528 | 718,250 | 26.47 | 27,134 |
| 2014 | 25,571.73 | 5,639 | 5,795 | 19,777 | 26.51 | 746 |
| 2021 | 130,312.26 | 2,411 | 2,478 | 127,835 | 26.53 | 4,819 |
|  | 2,467,968.12 | 1,063,070 | 1,092,403 | 1,375,565 |  | 56,146 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

RANKIN SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2041

| 1986 | $1,408,528.92$ | 934,981 | 960,780 | 447,749 | 17.98 | 24,903 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1989 | $17,214.00$ | 11,077 | 11,383 | 5,831 | 18.01 | 324 |
| 1991 | $12,284.82$ | 7,680 | 7,892 | 4,393 | 18.28 | 240 |
| 2007 | $25,140.89$ | 10,901 | 11,202 | 13,939 | 18.94 | 736 |
|  |  |  |  |  |  |  |
|  | $1,463,168.63$ | 964,639 | 991,256 | 471,913 | 26,203 |  |

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2027

| 1965 | $86,717.90$ | 78,800 | 80,974 | 5,744 | 5.23 | 1,098 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1972 | $774,903.89$ | 695,701 | 714,898 | 60,006 | 5.32 | 11,279 |
| 1978 | $1,204.96$ | 1,068 | 1,097 | 107 | 5.37 | 20 |
| 1981 | $47,737.78$ | 41,956 | 43,114 | 4,624 | 5.39 | 858 |
| 1982 | 855.80 | 750 | 771 | 85 | 5.40 | 16 |
| 1985 | $2,475.33$ | 2,159 | 2,219 | 257 | 5.34 | 48 |
| 2001 | $87,467.22$ | 69,029 | 70,934 | 16,533 | 5.48 | 3,017 |
| 2002 | $19,435.82$ | 15,160 | 15,578 | 3,858 | 5.50 | 701 |
| 2011 | $40,721.66$ | 26,766 | 27,505 | 13,217 | 5.47 | 2,416 |
| 2012 | $47,286.97$ | 29,961 | 30,788 | 16,499 | 5.49 | 3,005 |
| 2017 | $50,419.46$ | 22,709 | 23,336 | 27,084 | 5.49 | 4,933 |
| 2019 | $21,349.56$ | 6,682 | 6,866 | 14,483 | 5.49 | 2,638 |
| 2021 | $81,654.96$ | 6,826 | 7,014 | 74,641 | 5.48 | 13,621 |
|  |  |  |  |  |  |  |
|  | $1,262,231.31$ | 997,567 | $1,025,093$ | 237,138 |  | 43,650 |

OAKLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037

| 1967 | $122,589.59$ | 96,425 | 99,086 | 23,504 | 13.29 | 1,769 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1968 | $1,102,592.83$ | 862,988 | 886,800 | 215,793 | 13.41 | 16,092 |
| 1969 | 137.16 | 107 | 110 | 27 | 13.52 | 2 |
| 1972 | $3,893.50$ | 2,985 | 3,067 | 826 | 13.83 | 60 |
| 1975 | $26,487.78$ | 19,977 | 20,528 | 5,960 | 14.08 | 423 |
| 1977 | $3,773.13$ | 2,812 | 2,890 | 884 | 14.23 | 62 |
| 1979 | $1,852.83$ | 1,363 | 1,401 | 452 | 14.37 | 31 |
| 1980 | $11,795.74$ | 8,621 | 8,859 | 2,937 | 14.43 | 204 |
| 1990 | $21,532.25$ | 14,651 | 15,055 | 6,477 | 14.80 | 438 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

## CALCULATED ACCRUED

(3)

ALLOC. BOOK
RESERVE
(4)
$\begin{array}{cl}\text { FUTURE BOOK } & \text { REM. } \\ \text { ACCRUALS } & \text { LIFE }\end{array}$
(5)

LIFE ACCRUAL
(7)

OAKLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037

| 2005 | $80,473.80$ | 41,959 | 43,117 | 37,357 | 15.15 | 2,466 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2009 | $121,348.63$ | 54,607 | 56,114 | 65,235 | 15.28 | 4,269 |
| 2012 | $1,215,217.52$ | 465,185 | 478,021 | 737,197 | 15.32 | 48,120 |
| 2013 | $145,906.66$ | 52,089 | 53,526 | 92,380 | 15.31 | 6,034 |
| 2015 | $369,559.38$ | 110,018 | 113,054 | 256,506 | 15.33 | 16,732 |
|  |  |  |  |  |  |  |
|  | $3,227,160.80$ | $1,733,787$ | $1,781,627$ | $1,445,534$ | 96,702 |  |

RACCOON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2027

| 1972 | $1,016,123.08$ | 912,265 | 937,437 | 78,686 | 5.32 | 14,791 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1977 | $3,136.98$ | 2,786 | 2,863 | 274 | 5.37 | 51 |
| 1983 | $23,306.08$ | 20,458 | 21,022 | 2,284 | 5.36 | 426 |
| 1988 | $54,050.97$ | 46,538 | 47,822 | 6,229 | 5.41 | 1,151 |
| 1995 | $31,030.02$ | 25,736 | 26,446 | 4,584 | 5.45 | 841 |
| 1999 | $38,882.18$ | 31,320 | 32,184 | 6,698 | 5.43 | 1,234 |
|  |  |  |  |  | 98,754 |  |
|  | $1,166,529.31$ | $1,039,103$ | $1,067,775$ |  | 18,494 |  |

LOGANS FERRY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028

| 1973 | $1,063,120.37$ | 935,259 | 961,066 | 102,055 | 6.26 | 16,303 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1975 | $52,517.47$ | 45,970 | 47,238 | 5,279 | 6.29 | 839 |
| 1977 | $28,147.73$ | 24,507 | 25,183 | 2,965 | 6.31 | 470 |
| 1983 | 721.44 | $4,100.12$ | 619 | 6,487 | 3,583 | 85 |
| 1985 | $17,023.86$ | 13,810 | 14,191 | 6.34 | 13 |  |
| 1994 | $34,630.44$ | 27,642 | 28,405 | 2,833 | 6.40 | 81 |
| 1996 | $44,699.67$ | 35,085 | 36,053 | 6,226 | 6.45 | 443 |
| 1998 | $39,437.60$ | 30,611 | 31,456 | 8,647 | 6.44 | 965 |
| 1999 | $92,200.47$ | 67,288 | 69,145 | 7,982 | 6.49 | 1,343 |
| 2004 | $46,659.95$ | 27,749 | 28,515 | 23,056 | 6.48 | 1,230 |
| 2012 | $62,822.52$ | 33,685 | 34,614 | 18,145 | 6.47 | 3,558 |
| 2014 | $235,451.39$ | 16,882 | 17,348 | 28,208 | 6.49 | 4,804 |
| 2021 |  |  |  | 218,104 | 6.47 | 33,710 |
|  | $1,721,533.03$ | $1,262,594$ | $1,297,433$ | 424,100 |  | 66,105 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

| YEAR <br> (1) | ORIGINAL <br> COST <br> (2) | CALCULATED ACCRUED <br> (3) | ALLOC. BOOK RESERVE (4) | FUTURE BOOK ACCRUALS (5) | REM. LIFE (6) | ANNUAL ACCRUAL (7) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PLUM SUBSTATION |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 70-R3 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2033 |  |  |  |  |  |  |
| 1978 | 1,145,253.71 | 905,644 | 930,633 | 214,620 | 10.89 | 19,708 |
| 1986 | 4,963.21 | 3,788 | 3,893 | 1,071 | 11.01 | 97 |
| 1989 | 9,580.86 | 7,130 | 7,327 | 2,254 | 11.17 | 202 |
| 1994 | 41,701.84 | 29,587 | 30,403 | 11,298 | 11.26 | 1,003 |
| 2011 | 106,685.39 | 51,188 | 52,600 | 54,085 | 11.38 | 4,753 |
| 2012 | 93,896.74 | 42,639 | 43,816 | 50,081 | 11.42 | 4,385 |
|  | 1,402,081.75 | 1,039,976 | 1,068,672 | 333,410 |  | 30,148 |

ARSENAL SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037

| 1982 | 7,783,114.46 | 5,608,901 | 5,763,667 | 2,019,448 | 14.54 | 138,889 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1990 | 26,166.39 | 17,804 | 18,295 | 7,871 | 14.80 | 532 |
| 1996 | 259,207.71 | 163,249 | 167,754 | 91,454 | 14.99 | 6,101 |
| 1999 | 102,464.79 | 61,325 | 63,017 | 39,448 | 15.09 | 2,614 |
| 2007 | 177,427.48 | 86,443 | 88,828 | 88,599 | 15.26 | 5,806 |
| 2009 | 135,829.45 | 61,123 | 62,810 | 73,020 | 15.28 | 4,779 |
| 2011 | 58,105.73 | 23,672 | 24,325 | 33,781 | 15.27 | 2,212 |
| 2012 | 94,981.11 | 36,359 | 37,362 | 57,619 | 15.32 | 3,761 |
| 2013 | 58,441.78 | 20,864 | 21,440 | 37,002 | 15.31 | 2,417 |
| 2014 | 20,965.47 | 6,887 | 7,077 | 13,888 | 15.33 | 906 |
| 2019 | 111,214.84 | 15,592 | 16,022 | 95,193 | 15.33 | 6,210 |
| 2021 | 89,488.14 | 2,828 | 2,906 | 86,582 | 15.30 | 5,659 |
|  | 8,917,407.35 | 6,105,047 | 6,273,503 | 2,643,904 |  | 179,886 |
| CARSON SUBSTATION |  |  |  |  |  |  |
| INTERIM SURVIVOR CURVE.. IOWA 70-R3 |  |  |  |  |  |  |
| PROBABLE RETIREMENT YEAR.. 6-2034 |  |  |  |  |  |  |
| 1971 | 100,584.52 | 80,801 | 83,031 | 17,554 | 11.40 | 1,540 |
| 1979 | 7,205,842.15 | 5,572,206 | 5,725,960 | 1,479,882 | 11.80 | 125,414 |
| 1981 | 24,406.12 | 18,659 | 19,174 | 5,232 | 11.88 | 440 |
| 1988 | 6,265.15 | 4,617 | 4,744 | 1,521 | 11.95 | 127 |
| 1991 | 21,864.90 | 15,673 | 16,105 | 5,759 | 12.05 | 478 |
| 1994 | 29,370.58 | 20,354 | 20,916 | 8,455 | 12.18 | 694 |
| 1999 | 28,644.53 | 18,562 | 19,074 | 9,570 | 12.22 | 783 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

CARSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2034

| 2005 | $11,591.54$ | 6,637 | 6,820 | 4,771 | 12.32 | 387 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2006 | $25,851.02$ | 14,384 | 14,781 | 11,070 | 12.36 | 896 |
| 2007 | $299,734.75$ | 162,097 | 166,570 | 133,165 | 12.31 | 10,818 |
| 2009 | $80,493.48$ | 40,448 | 41,564 | 38,929 | 12.38 | 3,145 |
| 2012 | $17,060.05$ | 7,407 | 7,611 | 9,449 | 12.38 | 763 |
| 2013 | $49,964.19$ | 20,345 | 20,906 | 29,058 | 12.38 | 2,347 |
| 2014 | $25,980.51$ | 9,800 | 10,070 | 15,910 | 12.38 | 1,285 |
|  |  |  |  |  |  | 149,117 |

FINDLAY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2043

| 1988 | $1,116,779.71$ | 703,348 | 722,755 | 394,024 | 19.69 | 20,011 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 1994 | $4,125.73$ | 2,383 | 2,449 | 1,677 | 20.12 | 83 |
| 1996 | $28,836.01$ | 16,102 | 16,546 | 12,290 | 20.16 | 610 |
| 1998 | $121,511.95$ | 65,106 | 66,902 | 54,609 | 20.36 | 2,682 |
| 1999 | $34,002.00$ | 17,824 | 18,316 | 15,686 | 20.42 | 768 |
| 2000 | $146,862.00$ | 75,149 | 77,223 | 69,639 | 20.52 | 3,394 |
| 2002 | $52,323.92$ | 25,408 | 26,109 | 26,215 | 20.66 | 1,269 |
| 2003 | $164,725.35$ | 77,717 | 79,861 | 84,864 | 20.71 | 4,098 |
| 2004 | $230,726.27$ | 105,788 | 108,707 | 122,019 | 20.67 | 5,903 |
| 2005 | $148,293.39$ | 65,813 | 67,629 | 80,664 | 20.68 | 3,901 |
| 2006 | $326,024.44$ | 139,473 | 143,321 | 182,703 | 20.73 | 8,813 |
| 2009 | $121,005.30$ | 45,232 | 46,480 | 74,525 | 20.94 | 3,559 |
| 2010 | $12,084.50$ | 4,280 | 4,398 | 7,686 | 20.97 | 367 |
| 2012 | $22,423.04$ | 6,987 | 7,180 | 15,243 | 20.99 | 726 |
| 2019 | $97,992.10$ | 10,387 | 10,674 | 87,318 | 21.08 | 4,142 |
| 2020 | $57,417.26$ | 3,813 | 3,918 | 53,499 | 21.07 | 2,539 |
|  |  |  |  |  |  | 6,865 |

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

WILSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2067

| 2012 | $638,406.46$ | 121,297 | 124,644 | 513,762 | 40.50 | 12,685 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2014 | $316,768.07$ | 48,941 | 50,292 | 266,477 | 41.04 | 6,493 |
| 2021 | $97,321.64$ | 1,168 | 1,200 | 96,121 | 41.34 | 2,325 |
|  | $1,052,496.17$ | 171,406 | 176,136 | 876,360 | 21,503 |  |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1899 | $28,100.30$ | 28,100 | 28,100 |
| ---: | ---: | ---: | ---: |
| 1900 | $5,813.46$ | 5,813 | 5,813 |
| 1902 | $4,554.84$ | 4,555 | 4,555 |
| 1903 | $2,908.81$ | 2,909 | 2,909 |
| 1904 | $20,626.73$ | 20,627 | 20,627 |
| 1906 | $1,350.58$ | 1,351 | 1,351 |
| 1909 | 691.86 | 692 | 692 |
| 1913 | $8,339.74$ | 8,340 | 8,340 |
| 1914 | $20,985.98$ | 20,986 | 20,986 |
| 1915 | 41.03 | 41 | 41 |
| 1917 | $11,593.70$ | 11,594 | 11,594 |
| 1918 | $39,696.92$ | 39,697 | 39,697 |
| 1919 | $78,107.85$ | 78,108 | 78,108 |
| 1920 | $2,771.37$ | 2,771 | 2,771 |
| 1921 | $55,676.33$ | 55,676 | 55,676 |
| 1922 | $195,107.42$ | 195,107 | 195,107 |
| 1923 | $120,383.56$ | 120,384 | 120,384 |
| 1924 | $535,123.27$ | 535,123 | 535,123 |
| 1925 | $297,935.82$ | 297,936 | 297,936 |
| 1926 | $98,509.49$ | 98,509 | 98,509 |
| 1927 | $91,925.74$ | 91,926 | 91,926 |
| 1928 | $96,311.19$ | 96,311 | 96,311 |
| 1929 | $36,238.79$ | 36,239 | 36,239 |
| 1930 | $8,903.03$ | 8,903 | 8,903 |
| 1931 | $13,977.57$ | 13,978 | 13,978 |
| 1932 | $4,946.77$ | 4,947 | 4,947 |
| 1933 | 395.74 | 396 | 396 |
| 1934 | 908.85 | 92.30 | 909 |

## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR ORIGINAL
(1)
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK RESERVE
(4)
FUTURE BOOK
ACCRUALS
(5)
REM.
LIFE
(6)
ANNUAL ACCRUAL
(7)

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1938 | 188.57 | 189 | 189 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1939 | 7,441.22 | 7,441 | 7,441 |  |  |  |
| 1940 | 1,693.29 | 1,693 | 1,693 |  |  |  |
| 1941 | 40,274.13 | 40,274 | 40,274 |  |  |  |
| 1942 | 29,450.11 | 29,450 | 29,450 |  |  |  |
| 1943 | 6,230.77 | 6,231 | 6,231 |  |  |  |
| 1944 | 5,289.57 | 5,290 | 5,290 |  |  |  |
| 1945 | 63,695.54 | 63,696 | 63,696 |  |  |  |
| 1946 | 171.42 | 170 | 171 |  |  |  |
| 1947 | 1,202.11 | 1,192 | 1,202 |  |  |  |
| 1948 | 58,943.93 | 58,132 | 58,944 |  |  |  |
| 1949 | 24,377.07 | 23,917 | 24,377 |  |  |  |
| 1950 | 43,098.11 | 42,064 | 43,098 |  |  |  |
| 1951 | 10,641.76 | 10,330 | 10,642 |  |  |  |
| 1952 | 16,361.01 | 15,794 | 16,298 | 63 | 1.56 | 40 |
| 1953 | 122,445.29 | 117,521 | 121,272 | 1,173 | 1.81 | 648 |
| 1954 | 117,371.45 | 111,972 | 115,546 | 1,825 | 2.07 | 882 |
| 1955 | 273,048.00 | 258,970 | 267,236 | 5,812 | 2.32 | 2,505 |
| 1956 | 89,826.82 | 84,697 | 87,400 | 2,426 | 2.57 | 944 |
| 1957 | 105,291.70 | 98,670 | 101,819 | 3,472 | 2.83 | 1,227 |
| 1958 | 254,951.72 | 237,444 | 245,023 | 9,929 | 3.09 | 3,213 |
| 1959 | 162,591.50 | 150,488 | 155,291 | 7,300 | 3.35 | 2,179 |
| 1960 | 131,058.07 | 120,573 | 124,422 | 6,637 | 3.60 | 1,844 |
| 1961 | 186,442.27 | 170,449 | 175,889 | 10,553 | 3.86 | 2,734 |
| 1962 | 43,519.53 | 39,535 | 40,797 | 2,723 | 4.12 | 661 |
| 1963 | 70,436.09 | 63,581 | 65,610 | 4,826 | 4.38 | 1,102 |
| 1964 | 61,290.74 | 54,958 | 56,712 | 4,579 | 4.65 | 985 |
| 1965 | 40,471.56 | 36,047 | 37,198 | 3,274 | 4.92 | 665 |
| 1966 | 36,079.01 | 31,902 | 32,920 | 3,159 | 5.21 | 606 |
| 1967 | 56,208.52 | 49,339 | 50,914 | 5,295 | 5.50 | 963 |
| 1968 | 113,620.75 | 98,976 | 102,135 | 11,486 | 5.80 | 1,980 |
| 1969 | 42,629.98 | 36,832 | 38,008 | 4,622 | 6.12 | 755 |
| 1970 | 388,011.95 | 332,309 | 342,916 | 45,096 | 6.46 | 6,981 |
| 1971 | 97,630.32 | 82,856 | 85,501 | 12,130 | 6.81 | 1,781 |
| 1972 | 598,072.01 | 502,644 | 518,688 | 79,384 | 7.18 | 11,056 |
| 1973 | 151,793.17 | 126,292 | 130,323 | 21,470 | 7.56 | 2,840 |
| 1974 | 242,254.10 | 199,348 | 205,711 | 36,543 | 7.97 | 4,585 |
| 1975 | 145,495.31 | 118,336 | 122,113 | 23,382 | 8.40 | 2,784 |
| 1976 | 84,878.45 | 68,185 | 70,361 | 14,517 | 8.85 | 1,640 |
| 1977 | 186,857.77 | 148,158 | 152,887 | 33,971 | 9.32 | 3,645 |
| 1978 | 141,589.37 | 110,723 | 114,257 | 27,332 | 9.81 | 2,786 |

[^99]
## DUQUESNE LIGHT COMPANY <br> ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 1979 | 418,823.77 | 322,775 | 333,078 | 85,746 | 10.32 | 8,309 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1980 | 79,355.43 | 60,222 | 62,144 | 17,211 | 10.85 | 1,586 |
| 1981 | 103,048.36 | 76,919 | 79,374 | 23,674 | 11.41 | 2,075 |
| 1982 | 477,672.95 | 350,507 | 361,695 | 115,978 | 11.98 | 9,681 |
| 1983 | 78,526.57 | 60,465 | 62,395 | 16,132 | 11.50 | 1,403 |
| 1984 | 67,706.56 | 51,288 | 52,925 | 14,782 | 12.00 | 1,232 |
| 1985 | 53,638.76 | 39,939 | 41,214 | 12,425 | 12.52 | 992 |
| 1986 | 144,623.59 | 105,763 | 109,139 | 35,485 | 13.04 | 2,721 |
| 1987 | 41,947.83 | 29,959 | 30,915 | 11,033 | 13.81 | 799 |
| 1988 | 186,562.08 | 130,631 | 134,801 | 51,762 | 14.34 | 3,610 |
| 1989 | 23,290.31 | 15,972 | 16,482 | 6,809 | 14.89 | 457 |
| 1990 | 678,713.15 | 455,417 | 469,953 | 208,760 | 15.45 | 13,512 |
| 1991 | 60,947.59 | 39,780 | 41,050 | 19,898 | 16.23 | 1,226 |
| 1992 | 976,326.46 | 622,115 | 641,972 | 334,354 | 16.80 | 19,902 |
| 1993 | 11,099.59 | 6,896 | 7,116 | 3,983 | 17.37 | 229 |
| 1994 | 323,150.05 | 194,601 | 200,812 | 122,338 | 18.16 | 6,737 |
| 1995 | 951,389.00 | 557,133 | 574,916 | 376,473 | 18.75 | 20,079 |
| 1996 | 441,240.68 | 249,786 | 257,759 | 183,482 | 19.55 | 9,385 |
| 1997 | 402,398.07 | 220,836 | 227,885 | 174,513 | 20.14 | 8,665 |
| 1998 | 478,538.17 | 254,152 | 262,264 | 216,274 | 20.75 | 10,423 |
| 1999 | 517,801.52 | 264,493 | 272,935 | 244,866 | 21.55 | 11,363 |
| 2000 | 54,310.47 | 26,742 | 27,596 | 26,715 | 22.17 | 1,205 |
| 2001 | 510,773.93 | 240,830 | 248,517 | 262,257 | 22.98 | 11,412 |
| 2002 | 505,441.26 | 228,662 | 235,961 | 269,481 | 23.60 | 11,419 |
| 2003 | 401,059.22 | 172,857 | 178,374 | 222,685 | 24.42 | 9,119 |
| 2004 | 337,949.99 | 138,965 | 143,401 | 194,549 | 25.06 | 7,763 |
| 2005 | 609,652.55 | 237,399 | 244,976 | 364,676 | 25.87 | 14,096 |
| 2006 | 3,347,931.66 | 1,230,030 | 1,269,291 | 2,078,641 | 26.69 | 77,881 |
| 2007 | 904,151.61 | 313,379 | 323,382 | 580,770 | 27.34 | 21,243 |
| 2008 | 649,828.33 | 210,544 | 217,264 | 432,564 | 28.17 | 15,355 |
| 2009 | 3,634,027.48 | 1,094,569 | 1,129,506 | 2,504,521 | 29.00 | 86,363 |
| 2010 | 80,241.19 | 22,419 | 23,135 | 57,107 | 29.65 | 1,926 |
| 2011 | 1,047,014.00 | 268,245 | 276,807 | 770,207 | 30.48 | 25,269 |
| 2012 | 1,177,422.45 | 274,104 | 282,853 | 894,569 | 31.31 | 28,571 |
| 2013 | 652,713.28 | 136,482 | 140,838 | 511,875 | 32.15 | 15,921 |
| 2014 | 340,610.07 | 63,353 | 65,375 | 275,235 | 32.82 | 8,386 |
| 2015 | 188,727.80 | 30,536 | 31,511 | 157,217 | 33.66 | 4,671 |
| 2016 | 553,879.00 | 76,158 | 78,589 | 475,290 | 34.50 | 13,777 |
| 2017 | 1,610,859.83 | 182,672 | 188,503 | 1,422,357 | 35.18 | 40,431 |
| 2018 | 1,009,954.39 | 89,482 | 92,338 | 917,616 | 36.02 | 25,475 |

[^100]```
                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 361 STRUCTURES AND IMPROVEMENTS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
```

(1)

ORIGINAL COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)

```
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}
OTHER SMALL STRUCTURES
```

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SURVIVOR CURVE.. IOWA 45-R3
```

SURVIVOR CURVE.. IOWA 45-R3
2019
2020
2 0 2 1

| $53,808.72$ | 2,077 | 2,143 |
| :--- | :--- | :--- |
| $85,576.41$ | 1,121 | 1,157 |

36.71
7,032
51,665 $37.41 \quad 1,381$
84,420 $37.67 \quad 2,241$
$30,587,839.75$
$14,710,422$
$15,116,326$
$15,471,514$
627,354
$71,091,070.87 \quad 41,610,230 \quad 42,712,363 \quad 28,378,707 \quad 1,497,803$
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 18.9 2.11

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\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1916 & 294.77 & 286 & 295 & & & \\
\hline 1917 & 4,465.55 & 4,302 & 4,466 & & & \\
\hline 1918 & 33,364.89 & 31,939 & 33,365 & & & \\
\hline 1919 & 5,962.81 & 5,672 & 5,963 & & & \\
\hline 1920 & 86,820.30 & 82,069 & 86,441 & 379 & 3.01 & 126 \\
\hline 1921 & 38,618.43 & 36,280 & 38,213 & 405 & 3.33 & 122 \\
\hline 1922 & 116,787.91 & 109,080 & 114,891 & 1,897 & 3.63 & 523 \\
\hline 1923 & 30,925.51 & 28,716 & 30,246 & 680 & 3.93 & 173 \\
\hline 1924 & 815,718.96 & 752,982 & 793,095 & 22,624 & 4.23 & 5,348 \\
\hline 1925 & 398,537.89 & 365,714 & 385,196 & 13,342 & 4.53 & 2,945 \\
\hline 1926 & 354,414.80 & 323,354 & 340,580 & 13,835 & 4.82 & 2,870 \\
\hline 1927 & 315,101.84 & 285,769 & 300,992 & 14,110 & 5.12 & 2,756 \\
\hline 1928 & 235,951.89 & 212,699 & 224,030 & 11,922 & 5.42 & 2,200 \\
\hline 1929 & 89,174.88 & 79,901 & 84,157 & 5,018 & 5.72 & 877 \\
\hline 1930 & 299,518.30 & 266,736 & 280,945 & 18,573 & 6.02 & 3,085 \\
\hline 1931 & 7,946.83 & 7,032 & 7,407 & 540 & 6.33 & 85 \\
\hline 1932 & 1,972.63 & 1,734 & 1,826 & 147 & 6.64 & 22 \\
\hline 1933 & 33.86 & 30 & 32 & 2 & 6.96 & \\
\hline 1934 & 1,947.42 & 1,690 & 1,780 & 167 & 7.28 & 23 \\
\hline 1935 & 15,295.46 & 13,182 & 13,884 & 1,411 & 7.60 & 186 \\
\hline 1936 & 7,504.52 & 6,423 & 6,765 & 740 & 7.93 & 93 \\
\hline 1937 & 26,189.03 & 22,256 & 23,442 & 2,747 & 8.26 & 333 \\
\hline 1938 & 11,212.57 & 9,461 & 9,965 & 1,248 & 8.59 & 145 \\
\hline 1939 & 4,027.56 & 3,374 & 3,554 & 474 & 8.93 & 53 \\
\hline 1940 & 4,767.10 & 3,963 & 4,174 & 593 & 9.28 & 64 \\
\hline 1941 & 194,824.43 & 160,713 & 169,274 & 25,550 & 9.63 & 2,653 \\
\hline 1942 & 228,499.83 & 187,039 & 197,003 & 31,497 & 9.98 & 3,156 \\
\hline 1943 & 61,553.48 & 49,981 & 52,644 & 8,909 & 10.34 & 862 \\
\hline 1944 & 12,294.09 & 9,902 & 10,429 & 1,865 & 10.70 & 174 \\
\hline 1945 & 71,950.44 & 57,482 & 60,544 & 11,406 & 11.06 & 1,031 \\
\hline 1946 & 26,408.02 & 20,915 & 22,029 & 4,379 & 11.44 & 383 \\
\hline 1947 & 33,321.00 & 26,166 & 27,560 & 5,761 & 11.81 & 488 \\
\hline 1948 & 205,623.26 & 160,049 & 168,575 & 37,048 & 12.19 & 3,039 \\
\hline 1949 & 359,619.21 & 277,364 & 292,140 & 67,479 & 12.58 & 5,364 \\
\hline 1950 & 821,063.77 & 627,441 & 660,866 & 160,198 & 12.97 & 12,351 \\
\hline 1951 & 301,233.30 & 228,006 & 240,152 & 61,081 & 13.37 & 4,569 \\
\hline 1952 & 263,030.43 & 197,178 & 207,682 & 55,348 & 13.77 & 4,019 \\
\hline 1953 & 611,324.10 & 453,823 & 477,999 & 133,325 & 14.17 & 9,409 \\
\hline 1954 & 262,007.92 & 192,552 & 202,810 & 59,198 & 14.58 & 4,060 \\
\hline 1955 & 1,765,216.67 & 1,283,789 & 1,352,179 & 413,038 & 15.00 & 27,536 \\
\hline 1956 & 970,315.22 & 698,278 & 735,476 & 234,839 & 15.42 & 15,230 \\
\hline 1957 & 1,063,895.47 & 757,302 & 797,645 & 266,250 & 15.85 & 16,798 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{rrrrrrr}
1958 & \(638,408.41\) & 449,440 & 473,382 & 165,026 & 16.28 & 10,137 \\
1959 & \(1,588,164.38\) & \(1,105,362\) & \(1,164,247\) & 423,917 & 16.72 & 25,354 \\
1960 & \(402,709.07\) & 276,991 & 291,747 & 110,962 & 17.17 & 6,463 \\
1961 & \(1,065,718.18\) & 724,305 & 762,890 & 302,828 & 17.62 & 17,187 \\
1962 & \(147,586.06\) & 99,097 & 104,376 & 43,210 & 18.07 & 2,391 \\
1963 & \(360,739.95\) & 239,203 & 251,946 & 108,794 & 18.53 & 5,871 \\
1964 & \(771,608.62\) & 505,056 & 531,961 & 239,648 & 19.00 & 12,613 \\
1965 & \(244,382.16\) & 157,827 & 166,235 & 78,147 & 19.48 & 4,012 \\
1966 & \(855,764.73\) & 545,199 & 574,243 & 281,522 & 19.96 & 14,104 \\
1967 & \(1,245,386.96\) & 782,551 & 824,239 & 421,148 & 20.44 & 20,604 \\
1968 & \(1,477,726.26\) & 915,378 & 964,142 & 513,584 & 20.93 & 24,538 \\
1969 & \(739,691.50\) & 451,478 & 475,529 & 264,162 & 21.43 & 12,327 \\
1970 & \(2,505,212.17\) & \(1,505,858\) & \(1,586,078\) & 919,134 & 21.94 & 41,893 \\
1971 & \(275,091.08\) & 162,804 & 171,477 & 103,614 & 22.45 & 4,615 \\
1972 & \(7,761,448.41\) & \(4,519,957\) & \(4,760,743\) & \(3,000,705\) & 22.97 & 130,636 \\
1973 & \(3,259,345.91\) & \(1,867,312\) & \(1,966,787\) & \(1,292,559\) & 23.49 & 55,026 \\
1974 & \(1,452,573.80\) & 818,191 & 861,777 & 590,797 & 24.02 & 24,596 \\
1975 & \(4,778,137.65\) & \(2,644,460\) & \(2,785,335\) & \(1,992,803\) & 24.56 & 81,140 \\
1976 & \(1,652,057.03\) & 898,124 & 945,969 & 706,088 & 25.10 & 28,131 \\
1977 & \(1,124,543.64\) & 600,101 & 632,069 & 492,475 & 25.65 & 19,200 \\
1978 & \(4,775,896.99\) & \(2,500,851\) & \(2,634,076\) & \(2,141,821\) & 26.20 & 81,749 \\
1979 & \(4,171,250.35\) & \(2,140,978\) & \(2,255,032\) & \(1,916,218\) & 26.77 & 71,581 \\
1980 & \(1,358,184.16\) & 683,289 & 719,689 & 638,495 & 27.33 & 23,362 \\
1981 & \(523,680.27\) & 257,939 & 271,680 & 252,000 & 27.91 & 9,029 \\
1982 & \(17,071,628.41\) & \(8,228,525\) & \(8,666,873\) & \(8,404,755\) & 28.49 & 295,007 \\
1983 & \(976,643.58\) & 594,092 & 625,740 & 350,904 & 24.79 & 14,155 \\
1984 & \(2,265,441.82\) & \(1,350,656\) & \(1,422,608\) & 842,834 & 25.40 & 33,182 \\
1985 & \(1,141,175.70\) & 670,555 & 706,277 & 434,899 & 25.61 & 16,982 \\
1986 & \(6,198,607.84\) & \(3,564,819\) & \(3,754,723\) & \(2,443,885\) & 26.23 & 93,171 \\
1987 & \(2,609,239.15\) & \(1,476,308\) & \(1,554,953\) & \(1,054,286\) & 26.48 & 39,814 \\
1988 & \(5,124,245.33\) & \(2,832,683\) & \(2,983,585\) & \(2,140,660\) & 27.10 & 78,991 \\
1989 & \(1,586,793.98\) & 861,312 & 907,196 & 679,598 & 27.38 & 24,821 \\
1990 & \(4,399,405.75\) & \(2,342,244\) & \(2,467,019\) & \(1,932,387\) & 27.67 & 69,837 \\
1991 & \(4,283,266.17\) & \(2,220,874\) & \(2,339,184\) & \(1,944,082\) & 28.32 & 68,647 \\
1992 & \(8,579,512.06\) & \(4,353,244\) & \(4,585,149\) & \(3,994,363\) & 28.64 & 139,468 \\
1993 & \(2,407,399.19\) & \(1,193,829\) & \(1,257,426\) & \(1,149,973\) & 28.97 & 39,695 \\
1994 & \(809,983.09\) & 392,032 & 412,916 & 397,067 & 29.32 & 13,543 \\
1995 & \(11,349,051.46\) & \(5,353,348\) & \(5,638,530\) & \(5,710,521\) & 29.68 & 192,403 \\
1996 & \(13,482,595.77\) & \(6,153,457\) & \(6,481,262\) & \(7,001,334\) & 30.37 & 230,535 \\
1997 & \(9,597,238.33\) & \(4,255,415\) & \(4,482,108\) & \(5,115,130\) & 30.75 & 166,346 \\
1998 & \(3,078,138.56\) & \(1,330,987\) & \(1,401,891\) & \(1,676,248\) & 30.85 & 54,335 \\
1999 & \(3,090,973.23\) & \(1,293,572\) & \(1,362,483\) & \(1,728,490\) & 31.26 & 55,294 \\
& & & & & &
\end{tabular}

\footnotetext{
Gannett Fleming
} RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{rrrrrrr}
2000 & \(6,933,905.86\) & \(2,802,685\) & \(2,951,989\) & \(3,981,917\) & 31.69 & 125,652 \\
2001 & \(4,626,453.33\) & \(1,802,004\) & \(1,898,000\) & \(2,728,453\) & 32.13 & 84,919 \\
2002 & \(5,202,006.38\) & \(1,958,035\) & \(2,062,343\) & \(3,139,663\) & 32.31 & 97,173 \\
2003 & \(6,953,097.99\) & \(2,508,678\) & \(2,642,320\) & \(4,310,778\) & 32.78 & 131,506 \\
2004 & \(10,287,894.88\) & \(3,564,756\) & \(3,754,657\) & \(6,533,238\) & 33.01 & 197,917 \\
2005 & \(11,748,153.61\) & \(3,895,688\) & \(4,103,218\) & \(7,644,936\) & 33.25 & 229,923 \\
2006 & \(43,044,859.22\) & \(13,610,784\) & \(14,335,854\) & \(28,709,005\) & 33.52 & 856,474 \\
2007 & \(7,496,848.06\) & \(2,250,554\) & \(2,370,445\) & \(5,126,403\) & 33.81 & 151,624 \\
2008 & \(15,007,135.93\) & \(4,274,032\) & \(4,501,717\) & \(10,505,419\) & 33.90 & 309,894 \\
2009 & \(23,690,832.89\) & \(6,337,298\) & \(6,674,897\) & \(17,015,936\) & 34.23 & 497,106 \\
2010 & \(16,747,522.14\) & \(4,198,604\) & \(4,422,271\) & \(12,325,251\) & 34.37 & 358,605 \\
2011 & \(21,920,016.99\) & \(5,133,668\) & \(5,407,147\) & \(16,512,870\) & 34.34 & 480,864 \\
2012 & \(38,784,645.18\) & \(8,400,754\) & \(8,848,276\) & \(29,936,369\) & 34.36 & 871,256 \\
2013 & \(6,347,318.10\) & \(1,256,769\) & \(1,323,719\) & \(5,023,599\) & 34.42 & 145,950 \\
2014 & \(10,335,960.60\) & \(1,852,204\) & \(1,950,874\) & \(8,385,087\) & 34.34 & 244,178 \\
2015 & \(4,815,773.14\) & 770,042 & 811,064 & \(4,004,709\) & 34.15 & 117,268 \\
2016 & \(5,993,692.84\) & 837,319 & 881,924 & \(5,111,769\) & 33.87 & 150,923 \\
2017 & \(14,161,797.88\) & \(1,676,757\) & \(1,766,081\) & \(12,395,717\) & 33.52 & 369,801 \\
2018 & \(13,616,213.57\) & \(1,309,880\) & \(1,379,660\) & \(12,236,554\) & 32.87 & 372,271 \\
2019 & \(21,762,449.98\) & \(1,584,306\) & \(1,668,705\) & \(20,093,745\) & 31.86 & 630,689 \\
2020 & \(17,859,516.26\) & 846,541 & 891,637 & \(16,967,879\) & 30.15 & 562,782 \\
2021 & \(26,002,556.57\) & 491,448 & 517,628 & \(25,484,928\) & 25.96 & 981,700
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. \(31.0 \quad 2.16\)

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1933 & 8.19 & 8 & 8 & & & \\
\hline 1934 & 67.19 & 65 & 67 & & & \\
\hline 1937 & 6.80 & 6 & 6 & 1 & 2.65 & \\
\hline 1941 & 218.51 & 197 & 207 & 12 & 4.46 & 3 \\
\hline 1943 & 579.55 & 511 & 538 & 42 & 5.31 & 8 \\
\hline 1945 & 10,046.37 & 8,676 & 9,138 & 908 & 6.14 & 148 \\
\hline 1946 & 908.54 & 776 & 817 & 92 & 6.55 & 14 \\
\hline 1947 & 8,897.84 & 7,522 & 7,923 & 975 & 6.96 & 140 \\
\hline 1948 & 41,171.46 & 34,437 & 36,271 & 4,900 & 7.36 & 666 \\
\hline 1949 & 59,519.78 & 49,256 & 51,880 & 7,640 & 7.76 & 985 \\
\hline 1951 & 8,071.58 & 6,538 & 6,886 & 1,186 & 8.55 & 139 \\
\hline 1952 & 34,806.91 & 27,884 & 29,369 & 5,438 & 8.95 & 608 \\
\hline 1953 & 28,466.58 & 22,558 & 23,760 & 4,707 & 9.34 & 504 \\
\hline 1954 & 121,850.26 & 95,477 & 100,563 & 21,287 & 9.74 & 2,186 \\
\hline 1955 & 56,138.93 & 43,489 & 45,806 & 10,333 & 10.14 & 1,019 \\
\hline 1956 & 245,179.30 & 187,807 & 197,811 & 47,368 & 10.53 & 4,498 \\
\hline 1957 & 44,436.70 & 33,643 & 35,435 & 9,002 & 10.93 & 824 \\
\hline 1958 & 80,465.99 & 60,189 & 63,395 & 17,071 & 11.34 & 1,505 \\
\hline 1959 & 123,025.68 & 90,930 & 95,774 & 27,252 & 11.74 & 2,321 \\
\hline 1960 & 200,755.46 & 146,551 & 154,358 & 46,397 & 12.15 & 3,819 \\
\hline 1961 & 165,877.20 & 119,579 & 125,949 & 39,928 & 12.56 & 3,179 \\
\hline 1962 & 46,181.95 & 32,871 & 34,622 & 11,560 & 12.97 & 891 \\
\hline 1963 & 156,544.21 & 109,963 & 115,821 & 40,723 & 13.39 & 3,041 \\
\hline 1964 & 125,336.36 & 86,872 & 91,500 & 33,836 & 13.81 & 2,450 \\
\hline 1965 & 60,945.22 & 41,673 & 43,893 & 17,052 & 14.23 & 1,198 \\
\hline 1966 & 233,025.28 & 157,110 & 165,479 & 67,546 & 14.66 & 4,608 \\
\hline 1967 & 82,961.51 & 55,142 & 58,079 & 24,883 & 15.09 & 1,649 \\
\hline 1968 & 116,542.97 & 76,323 & 80,389 & 36,154 & 15.53 & 2,328 \\
\hline 1969 & 543,456.11 & 350,589 & 369,265 & 174,191 & 15.97 & 10,907 \\
\hline 1970 & 1,297,010.38 & 823,744 & 867,624 & 429,386 & 16.42 & 26,150 \\
\hline 1971 & 96,964.02 & 60,613 & 63,842 & 33,122 & 16.87 & 1,963 \\
\hline 1972 & 484,593.37 & 298,078 & 313,956 & 170,637 & 17.32 & 9,852 \\
\hline 1973 & 315,270.55 & 190,704 & 200,863 & 114,408 & 17.78 & 6,435 \\
\hline 1974 & 310,630.88 & 184,651 & 194,487 & 116,144 & 18.25 & 6,364 \\
\hline 1975 & 784,036.62 & 457,877 & 482,268 & 301,769 & 18.72 & 16,120 \\
\hline 1976 & 627,946.81 & 360,165 & 379,351 & 248,596 & 19.19 & 12,954 \\
\hline 1977 & 907,059.22 & 510,575 & 537,773 & 369,286 & 19.67 & 18,774 \\
\hline 1978 & 544,270.84 & 300,557 & 316,568 & 227,703 & 20.15 & 11,300 \\
\hline 1979 & 134,075.86 & 72,579 & 76,445 & 57,631 & 20.64 & 2,792 \\
\hline 1980 & 267,920.89 & 142,057 & 149,624 & 118,297 & 21.14 & 5,596 \\
\hline 1981 & 459,602.41 & 238,584 & 251,293 & 208,309 & 21.64 & 9,626 \\
\hline 1982 & 188,133.24 & 95,572 & 100,663 & 87,470 & 22.14 & 3,951 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{rrrrrrr}
1983 & \(416,481.93\) & 275,794 & 290,485 & 125,997 & 19.64 & 6,415 \\
1984 & \(687,778.85\) & 448,776 & 472,682 & 215,097 & 19.97 & 10,771 \\
1985 & \(809,582.68\) & 520,076 & 547,780 & 261,803 & 20.32 & 12,884 \\
1986 & \(718,463.28\) & 453,997 & 478,181 & 240,282 & 20.68 & 11,619 \\
1987 & \(100,900.32\) & 62,659 & 65,997 & 34,903 & 21.06 & 1,657 \\
1988 & \(730,637.15\) & 445,469 & 469,199 & 261,438 & 21.45 & 12,188 \\
1989 & \(578,787.72\) & 346,115 & 364,552 & 214,236 & 21.85 & 9,805 \\
1990 & \(219,546.95\) & 129,313 & 136,201 & 83,346 & 21.98 & 3,792 \\
1991 & \(502,081.77\) & 289,400 & 304,816 & 197,266 & 22.41 & 8,803 \\
1992 & \(183,509.35\) & 103,389 & 108,897 & 74,612 & 22.86 & 3,264 \\
1993 & \(47,347.21\) & 26,178 & 27,572 & 19,775 & 23.05 & 858 \\
1994 & \(453,625.14\) & 244,504 & 257,529 & 196,096 & 23.52 & 8,337 \\
1995 & \(794,879.50\) & 419,219 & 441,551 & 353,328 & 23.75 & 14,877 \\
1996 & \(2,685,927.61\) & \(1,376,806\) & \(1,450,148\) & \(1,235,780\) & 24.25 & 50,960 \\
1997 & \(64,381.04\) & 32,178 & 33,892 & 30,489 & 24.52 & 1,243 \\
1998 & \(111,522.98\) & 54,245 & 57,135 & 54,388 & 24.81 & 2,192 \\
1999 & \(571,560.56\) & 270,062 & 284,448 & 287,113 & 25.12 & 11,430 \\
2000 & \(204,904.15\) & 93,846 & 98,845 & 106,059 & 25.45 & 4,167 \\
2001 & \(1,491,785.63\) & 663,546 & 698,893 & 792,893 & 25.59 & 30,984 \\
2002 & \(1,403,562.76\) & 602,128 & 634,203 & 769,360 & 25.95 & 29,648 \\
2003 & \(439,136.31\) & 181,978 & 191,672 & 247,464 & 26.14 & 9,467 \\
2004 & \(118,092.46\) & 47,119 & 49,629 & 68,463 & 26.36 & 2,597 \\
2005 & \(791,738.98\) & 303,078 & 319,223 & 472,516 & 26.60 & 17,764 \\
2006 & \(1,692,424.03\) & 621,797 & 654,920 & \(1,037,504\) & 26.69 & 38,872 \\
2007 & \(141,661.73\) & 49,709 & 52,357 & 89,305 & 26.82 & 3,330 \\
2008 & \(1,380,797.02\) & 460,358 & 484,881 & 895,916 & 26.99 & 33,194 \\
2009 & \(2,537,648.01\) & 799,359 & 841,941 & \(1,695,707\) & 27.18 & 62,388 \\
2010 & \(180,613.31\) & 53,787 & 56,652 & 123,961 & 27.11 & 4,573 \\
2011 & \(487,753.15\) & 135,693 & 142,921 & 344,832 & 27.24 & 12,659 \\
2012 & \(429,329.77\) & 111,368 & 117,301 & 312,029 & 27.13 & 11,501 \\
2013 & \(320,257.51\) & 76,477 & 80,551 & 239,707 & 27.09 & 8,849 \\
2014 & \(220,565.20\) & 48,127 & 50,691 & 169,874 & 26.87 & 6,322 \\
2015 & \(255,440.22\) & 50,143 & 52,814 & 202,626 & 26.61 & 7,615 \\
2016 & \(1,423,398.65\) & 245,821 & 258,916 & \(1,164,483\) & 26.35 & 44,193 \\
2017 & \(874,072.46\) & 129,800 & 136,714 & 737,358 & 25.80 & 28,580 \\
2018 & \(321,888.72\) & 39,431 & 41,532 & 280,357 & 25.07 & 11,183
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
    ```
(1)

ORIGINAL COST
(2)

\section*{CALCULATED}
(3)

ALLOC. BOOK RESERVE
(4)
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}
```

SURVIVOR CURVE.. IOWA 45-R0.5

| 2019 | 1,430,592.69 | 134,762 | 141,941 | 1,288,652 | 24.03 | 53,627 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2020 | 1,486,748.75 | 93,665 | 98,654 | 1,388,095 | 22.31 | 62,219 |
| 2021 | 3,055,200.03 | 80,963 | 85,276 | 2,969,924 | 18.37 | 161,673 |
|  | 39,377,633.10 | 16,103,533 | 16,961,358 | 22,416,275 |  | 998,015 |

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                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 362.3 STATION EQUIPMENT - PORTABLE SUBSTATIONS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
    ```

YEAR
(1)

ORIGINAL
COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)
```

| FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: |
| ACCRUALS | LIFE | ACCRUAL |
| $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 45-R0.5


\section*{ACCOUNT 364.11 POLES, TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
ORIGINAL
(1)
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK RESERVE
(4)
FUTURE BOOK ACCRUALS
(5)
REM. ANNUAL
LIFE ACCRUAL
(6)
(7)

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1912 & 478.86 & 459 & 479 & & & \\
\hline 1914 & 7,157.60 & 6,785 & 7,158 & & & \\
\hline 1915 & 8.28 & 8 & 8 & & & \\
\hline 1916 & 5,848.94 & 5,480 & 5,849 & & & \\
\hline 1917 & 14,895.85 & 13,879 & 14,878 & 18 & 3.96 & 5 \\
\hline 1918 & 3,158.33 & 2,926 & 3,137 & 21 & 4.26 & 5 \\
\hline 1919 & 66.19 & 61 & 65 & 1 & 4.56 & \\
\hline 1920 & 49,852.21 & 45,684 & 48,973 & 879 & 4.85 & 181 \\
\hline 1921 & 1,068.84 & 974 & 1,044 & 25 & 5.15 & 5 \\
\hline 1922 & 9,881.15 & 8,954 & 9,599 & 282 & 5.44 & 52 \\
\hline 1923 & 1,660.87 & 1,496 & 1,604 & 57 & 5.74 & 10 \\
\hline 1924 & 28,111.67 & 25,179 & 26,992 & 1,120 & 6.05 & 185 \\
\hline 1925 & 109,775.81 & 97,758 & 104,797 & 4,979 & 6.35 & 784 \\
\hline 1926 & 48,413.49 & 42,854 & 45,940 & 2,473 & 6.66 & 371 \\
\hline 1927 & 184,878.80 & 162,662 & 174,375 & 10,504 & 6.97 & 1,507 \\
\hline 1928 & 125,577.61 & 109,815 & 117,722 & 7,856 & 7.28 & 1,079 \\
\hline 1929 & 100,629.05 & 87,444 & 93,740 & 6,889 & 7.60 & 906 \\
\hline 1930 & 139,082.41 & 120,091 & 128,738 & 10,344 & 7.92 & 1,306 \\
\hline 1931 & 137,489.64 & 117,933 & 126,425 & 11,065 & 8.25 & 1,341 \\
\hline 1932 & 53,100.99 & 45,246 & 48,504 & 4,597 & 8.58 & 536 \\
\hline 1933 & 44,716.89 & 37,847 & 40,572 & 4,145 & 8.91 & 465 \\
\hline 1934 & 61,839.95 & 51,978 & 55,721 & 6,119 & 9.25 & 662 \\
\hline 1935 & 7,417.94 & 6,191 & 6,637 & 781 & 9.59 & 81 \\
\hline 1936 & 62,925.82 & 52,142 & 55,897 & 7,029 & 9.94 & 707 \\
\hline 1937 & 90,055.79 & 74,079 & 79,413 & 10,643 & 10.29 & 1,034 \\
\hline 1938 & 31,119.91 & 25,411 & 27,241 & 3,879 & 10.64 & 365 \\
\hline 1939 & 50,122.50 & 40,616 & 43,541 & 6,582 & 11.00 & 598 \\
\hline 1940 & 34,328.71 & 27,605 & 29,593 & 4,736 & 11.36 & 417 \\
\hline 1941 & 104,242.40 & 83,160 & 89,148 & 15,094 & 11.73 & 1,287 \\
\hline 1942 & 94,413.89 & 74,717 & 80,097 & 14,317 & 12.10 & 1,183 \\
\hline 1943 & 14,126.59 & 11,087 & 11,885 & 2,242 & 12.48 & 180 \\
\hline 1944 & 6,221. 63 & 4,842 & 5,191 & 1,031 & 12.86 & 80 \\
\hline 1945 & 11,507.74 & 8,879 & 9,518 & 1,990 & 13.25 & 150 \\
\hline 1946 & 20.54 & 16 & 17 & 4 & 13.64 & \\
\hline 1947 & 9,538.24 & 7,231 & 7,752 & 1,786 & 14.03 & 127 \\
\hline 1948 & 259,305.69 & 194,793 & 208,819 & 50,487 & 14.43 & 3,499 \\
\hline 1949 & 313,099.09 & 232,990 & 249,767 & 63,332 & 14.84 & 4,268 \\
\hline 1950 & 382,332.74 & 281,806 & 302,098 & 80,235 & 15.25 & 5,261 \\
\hline 1951 & 539,967.41 & 394,176 & 422,559 & 117,408 & 15.66 & 7,497 \\
\hline 1952 & 644,506.91 & 465,824 & 499,366 & 145,141 & 16.08 & 9,026 \\
\hline 1953 & 833,613.03 & 596,317 & 639,255 & 194,358 & 16.51 & 11,772 \\
\hline 1954 & 1,089,110.37 & 771,014 & 826,531 & 262,579 & 16.94 & 15,501 \\
\hline
\end{tabular}

\footnotetext{
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\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 364.11 POLES, TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{rrrr}
1955 & \(878,895.21\) & 615,684 & 660,017 \\
1956 & \(919,964.96\) & 637,315 & 683,205 \\
1957 & \(1,190,120.90\) & 815,435 & 874,151 \\
1958 & \(1,186,802.61\) & 803,952 & 861,841 \\
1959 & \(1,549,461.48\) & \(1,037,333\) & \(1,112,027\) \\
1960 & \(1,419,530.24\) & 939,090 & \(1,006,710\) \\
1961 & \(968,170.26\) & 632,651 & 678,205 \\
1962 & \(1,129,778.29\) & 728,899 & 781,384 \\
1963 & \(996,783.76\) & 634,852 & 680,565 \\
1964 & \(1,084,291.10\) & 681,607 & 730,686 \\
1965 & \(1,302,061.90\) & 807,278 & 865,406 \\
1966 & \(1,288,557.88\) & 788,018 & 844,760 \\
1967 & \(2,196,343.32\) & \(1,323,868\) & \(1,419,194\) \\
1968 & \(1,436,362.50\) & 853,156 & 914,588 \\
1969 & \(1,298,122.60\) & 759,622 & 814,319 \\
1970 & \(3,366,645.56\) & \(1,939,895\) & \(2,079,578\) \\
1971 & \(1,762,667.76\) & 999,556 & \(1,071,529\) \\
1972 & \(2,601,575.86\) & \(1,451,055\) & \(1,555,539\) \\
1973 & \(3,197,467.54\) & \(1,753,651\) & \(1,879,923\) \\
1974 & \(5,096,905.15\) & \(2,747,945\) & \(2,945,812\) \\
1975 & \(5,242,950.31\) & \(2,776,981\) & \(2,976,939\) \\
1976 & \(5,751,159.53\) & \(2,990,603\) & \(3,205,943\) \\
1977 & \(5,274,240.98\) & \(2,690,760\) & \(2,884,509\) \\
1978 & \(4,159,881.46\) & \(2,082,104\) & \(2,232,027\) \\
1979 & \(5,065,581.73\) & \(2,484,769\) & \(2,663,686\) \\
1980 & \(6,305,473.93\) & \(3,029,906\) & \(3,248,076\) \\
1981 & \(4,843,447.21\) & \(2,278,067\) & \(2,442,100\) \\
1982 & \(6,368,848.54\) & \(2,930,753\) & \(3,141,783\) \\
1983 & \(6,837,799.02\) & \(4,001,480\) & \(4,289,608\) \\
1984 & \(6,301,143.18\) & \(3,638,910\) & \(3,900,931\) \\
1985 & \(8,293,102.84\) & \(4,692,238\) & \(5,030,104\) \\
1986 & \(8,009,286.00\) & \(4,464,376\) & \(4,785,835\) \\
1987 & \(7,541,424.58\) & \(4,110,831\) & \(4,406,833\) \\
1988 & \(8,770,780.14\) & \(4,701,138\) & \(5,039,645\) \\
1989 & \(8,575,923.48\) & \(4,486,923\) & \(4,810,006\) \\
1990 & \(9,051,628.98\) & \(4,647,106\) & \(4,981,723\) \\
1991 & \(10,284,268.93\) & \(5,144,191\) & \(5,514,601\) \\
1992 & \(11,445,815.02\) & \(5,605,016\) & \(6,008,607\) \\
1993 & \(8,568,559.06\) & \(4,078,634\) & \(4,372,318\) \\
1994 & \(9,620,287.63\) & \(4,471,510\) & \(4,793,483\) \\
1995 & \(9,237,698.24\) & \(4,186,525\) & \(4,487,977\) \\
1996 & \(9,371,300.19\) & \(4,134,618\) & \(4,432,333\) \\
& & & \\
196
\end{tabular}
\begin{tabular}{rrr}
218,878 & 17.37 & 12,601 \\
236,760 & 17.82 & 13,286 \\
315,970 & 18.26 & 17,304 \\
324,962 & 18.71 & 17,368 \\
437,434 & 19.17 & 22,819 \\
412,820 & 19.63 & 21,030 \\
289,965 & 20.10 & 14,426 \\
348,394 & 20.58 & 16,929 \\
316,219 & 21.06 & 15,015 \\
353,605 & 21.54 & 16,416 \\
436,656 & 22.04 & 19,812 \\
443,798 & 22.53 & 19,698 \\
777,149 & 23.04 & 33,730 \\
521,774 & 23.55 & 22,156 \\
483,804 & 24.06 & 20,108 \\
\(1,287,068\) & 24.58 & 52,362 \\
691,139 & 25.11 & 27,524 \\
\(1,046,037\) & 25.65 & 40,781 \\
\(1,317,545\) & 26.19 & 50,307 \\
\(2,151,093\) & 26.73 & 80,475 \\
\(2,266,011\) & 27.28 & 83,065 \\
\(2,545,217\) & 27.84 & 91,423 \\
\(2,389,732\) & 28.41 & 84,116 \\
\(1,927,854\) & 28.97 & 66,547 \\
\(2,401,896\) & 29.55 & 81,282 \\
\(3,057,398\) & 30.13 & 101,474 \\
\(2,401,347\) & 30.72 & 78,169 \\
\(3,227,066\) & 31.31 & 103,068 \\
\(2,548,191\) & 27.29 & 93,375 \\
\(2,400,212\) & 27.44 & 87,471 \\
\(3,262,999\) & 28.01 & 116,494 \\
\(3,223,451\) & 28.19 & 114,347 \\
\(3,134,592\) & 28.79 & 108,878 \\
\(3,731,135\) & 29.00 & 128,660 \\
\(3,765,917\) & 29.61 & 127,184 \\
\(4,069,906\) & 29.85 & 136,345 \\
\(4,769,668\) & 30.48 & 156,485 \\
\(5,437,208\) & 30.74 & 176,877 \\
\(4,196,241\) & 31.38 & 133,723 \\
\(4,826,805\) & 31.67 & 152,409 \\
\(4,749,721\) & 31.98 & 148,522 \\
\(4,938,967\) & 32.30 & 152,909 \\
&
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 364.11 POLES, TOWERS AND FIXTURES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{rrrrrrr}
1997 & \(14,262,477.49\) & \(6,115,750\) & \(6,556,117\) & \(7,706,360\) & 32.64 & 236,102 \\
1998 & \(2,050,538.10\) & 853,024 & 914,446 & \(1,136,092\) & 32.99 & 34,437 \\
1999 & \(362,449.69\) & 145,995 & 156,507 & 205,943 & 33.36 & 6,173 \\
2000 & \(1,394,097.36\) & 542,583 & 581,652 & 812,445 & 33.75 & 24,072 \\
2001 & \(2,716,562.92\) & \(1,019,254\) & \(1,092,646\) & \(1,623,917\) & 34.14 & 47,566 \\
2002 & \(2,714,772.96\) & 979,490 & \(1,050,019\) & \(1,664,754\) & 34.55 & 48,184 \\
2003 & \(5,524,919.15\) & \(1,921,567\) & \(2,059,930\) & \(3,464,989\) & 34.69 & 99,884 \\
2004 & \(7,372,702.98\) & \(2,451,424\) & \(2,627,940\) & \(4,744,763\) & 35.13 & 135,063 \\
2005 & \(7,495,193.65\) & \(2,386,470\) & \(2,558,309\) & \(4,936,885\) & 35.32 & 139,776 \\
2006 & \(10,910,193.77\) & \(3,314,517\) & \(3,553,180\) & \(7,357,014\) & 35.52 & 207,123 \\
2007 & \(5,546,322.85\) & \(1,600,669\) & \(1,715,926\) & \(3,830,397\) & 35.75 & 107,144 \\
2008 & \(7,094,562.75\) & \(1,934,687\) & \(2,073,995\) & \(5,020,568\) & 36.00 & 139,460 \\
2009 & \(8,156,423.81\) & \(2,100,279\) & \(2,251,510\) & \(5,904,914\) & 36.04 & 163,843 \\
2010 & \(12,314,566.88\) & \(2,960,422\) & \(3,173,588\) & \(9,140,979\) & 36.34 & 251,540 \\
2011 & \(21,671,234.30\) & \(4,869,526\) & \(5,220,158\) & \(16,451,076\) & 36.23 & 454,073 \\
2012 & \(19,251,943.16\) & \(3,987,077\) & \(4,274,168\) & \(14,977,775\) & 36.37 & 411,817 \\
2013 & \(24,691,582.86\) & \(4,681,524\) & \(5,018,619\) & \(19,672,964\) & 36.34 & 541,358 \\
2014 & \(14,841,146.10\) & \(2,549,709\) & \(2,733,302\) & \(12,107,844\) & 36.17 & 334,748 \\
2015 & \(13,658,176.90\) & \(2,086,969\) & \(2,237,242\) & \(11,420,935\) & 36.05 & 316,808 \\
2016 & \(14,567,707.36\) & \(1,946,246\) & \(2,086,386\) & \(12,481,321\) & 35.65 & 350,107 \\
2017 & \(25,306,262.37\) & \(2,869,730\) & \(3,076,366\) & \(22,229,896\) & 35.18 & 631,890 \\
2018 & \(52,822,777.01\) & \(4,859,695\) & \(5,209,619\) & \(47,613,158\) & 34.52 & \(1,379,292\) \\
2019 & \(49,324,981.84\) & \(3,428,086\) & \(3,674,927\) & \(45,650,055\) & 33.47 & \(1,363,910\) \\
2020 & \(61,901,257.31\) & \(2,804,127\) & \(3,006,039\) & \(58,895,218\) & 31.61 & \(1,863,183\) \\
2021 & \(5,937,668.96\) & 106,878 & 114,574 & \(5,823,095\) & 27.28 & 213,457
\end{tabular}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1935 & 12,349.53 & 10,816 & 10,974 & 1,376 & 6.21 & 222 \\
\hline 1936 & 14,673.87 & 12,731 & 12,917 & 1,757 & 6.62 & 265 \\
\hline 1937 & 15,699.37 & 13,492 & 13,689 & 2,010 & 7.03 & 286 \\
\hline 1938 & 6,703.72 & 5,706 & 5,789 & 915 & 7.44 & 123 \\
\hline 1940 & 12,356.30 & 10,320 & 10,471 & 1,885 & 8.24 & 229 \\
\hline 1941 & 55,738.99 & 46,107 & 46,781 & 8,958 & 8.64 & 1,037 \\
\hline 1942 & 46,311.33 & 37,938 & 38,493 & 7,818 & 9.04 & 865 \\
\hline 1943 & 21,074.52 & 17,100 & 17,350 & 3,725 & 9.43 & 395 \\
\hline 1944 & 8,679.14 & 6,973 & 7,075 & 1,604 & 9.83 & 163 \\
\hline 1945 & 34,892.49 & 27,753 & 28,159 & 6,733 & 10.23 & 658 \\
\hline 1946 & 48,532.16 & 38,224 & 38,783 & 9,749 & 10.62 & 918 \\
\hline 1947 & 92,059.15 & 71,769 & 72,818 & 19,241 & 11.02 & 1,746 \\
\hline 1948 & 164,416.35 & 126,864 & 128,719 & 35,697 & 11.42 & 3,126 \\
\hline 1949 & 340,691.00 & 260,152 & 263,956 & 76,735 & 11.82 & 6,492 \\
\hline 1950 & 407,009.07 & 307,536 & 312,033 & 94,976 & 12.22 & 7,772 \\
\hline 1951 & 418,084.62 & 312,560 & 317,130 & 100,955 & 12.62 & 8,000 \\
\hline 1952 & 596,327.42 & 441,044 & 447,493 & 148,834 & 13.02 & 11,431 \\
\hline 1953 & 739,885.63 & 541,152 & 549,065 & 190,821 & 13.43 & 14,209 \\
\hline 1954 & 647,400.83 & 468,200 & 475,046 & 172,355 & 13.84 & 12,453 \\
\hline 1955 & 697,412.17 & 498,650 & 505,942 & 191,470 & 14.25 & 13,436 \\
\hline 1956 & 852,061.54 & 602,067 & 610,871 & 241,191 & 14.67 & 16,441 \\
\hline 1957 & 903,897.90 & 631,102 & 640,330 & 263,568 & 15.09 & 17,466 \\
\hline 1958 & 856,619.22 & 590,896 & 599,536 & 257,083 & 15.51 & 16,575 \\
\hline 1959 & 1,165,014.70 & 793,841 & 805,449 & 359,566 & 15.93 & 22,572 \\
\hline 1960 & 1,177,092.13 & 791,948 & 803,528 & 373,564 & 16.36 & 22,834 \\
\hline 1961 & 729,799.53 & 484,587 & 491,673 & 238,127 & 16.80 & 14,174 \\
\hline 1962 & 966,877.86 & 633,692 & 642,958 & 323,920 & 17.23 & 18,800 \\
\hline 1963 & 846,216.39 & 547,164 & 555,165 & 291,051 & 17.67 & 16,471 \\
\hline 1964 & 993,132.13 & 633,221 & 642,480 & 350,652 & 18.12 & 19,352 \\
\hline 1965 & 1,184,347.76 & 744,481 & 755,367 & 428,981 & 18.57 & 23,101 \\
\hline 1966 & 1,110,349.94 & 687,973 & 698,033 & 412,317 & 19.02 & 21,678 \\
\hline 1967 & 1,022,252.53 & 623,983 & 633,107 & 389,146 & 19.48 & 19,977 \\
\hline 1968 & 1,202,251.09 & 722,793 & 733,362 & 468,889 & 19.94 & 23,515 \\
\hline 1969 & 1,289,736.87 & 763,524 & 774,689 & 515,048 & 20.40 & 25,247 \\
\hline 1970 & 3,666,496.40 & 2,136,101 & 2,167,336 & 1,499,160 & 20.87 & 71,833 \\
\hline 1971 & 1,615,475.15 & 925,667 & 939,203 & 676,272 & 21.35 & 31,676 \\
\hline 1972 & 2,528,101.75 & 1,424,333 & 1,445,161 & 1,082,941 & 21.83 & 49,608 \\
\hline 1973 & 3,173,421.66 & 1,757,441 & 1,783,139 & 1,390,283 & 22.31 & 62,317 \\
\hline 1974 & 5,522,956.99 & 3,004,489 & 3,048,423 & 2,474,534 & 22.80 & 108,532 \\
\hline 1975 & 6,017,712.75 & 3,214,662 & 3,261,669 & 2,756,044 & 23.29 & 118,336 \\
\hline 1976 & 5,733,573.55 & 3,005,539 & 3,049,488 & 2,684,086 & 23.79 & 112,824 \\
\hline 1977 & 5,461,659.06 & 2,807,293 & 2,848,343 & 2,613,316 & 24.30 & 107,544 \\
\hline
\end{tabular}

\footnotetext{
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CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1978 & 4,352,085.33 & 2,193,451 & 2,225,525 & 2,126,560 & 24.80 & 85,748 \\
\hline 1979 & 4,442,078.81 & 2,192,610 & 2,224,672 & 2,217,407 & 25.32 & 87,575 \\
\hline 1980 & 5,976,297.96 & 2,888,942 & 2,931,186 & 3,045,112 & 25.83 & 117,891 \\
\hline 1981 & 4,047,440.07 & 1,914,439 & 1,942,433 & 2,105,007 & 26.35 & 79,886 \\
\hline 1982 & 4,377,641.92 & 2,024,222 & 2,053,821 & 2,323,821 & 26.88 & 86,452 \\
\hline 1983 & 4,396,061.43 & 2,741,824 & 2,781,917 & 1,614,144 & 23.23 & 69,485 \\
\hline 1984 & 3,894,325.42 & 2,395,010 & 2,430,031 & 1,464,294 & 23.48 & 62,363 \\
\hline 1985 & 4,473,775.87 & 2,694,108 & 2,733,503 & 1,740,273 & 24.11 & 72,181 \\
\hline 1986 & 4,562,728.54 & 2,704,785 & 2,744,336 & 1,818,393 & 24.38 & 74,585 \\
\hline 1987 & 3,764,690.91 & 2,194,815 & 2,226,909 & 1,537,782 & 24.67 & 62,334 \\
\hline 1988 & 3,525,401.98 & 2,019,350 & 2,048,878 & 1,476,524 & 24.98 & 59,108 \\
\hline 1989 & 4,715,529.38 & 2,651,071 & 2,689,837 & 2,025,692 & 25.31 & 80,035 \\
\hline 1990 & 5,073,859.29 & 2,796,711 & 2,837,606 & 2,236,253 & 25.65 & 87,183 \\
\hline 1991 & 6,328,865.86 & 3,416,322 & 3,466,278 & 2,862,588 & 26.00 & 110,100 \\
\hline 1992 & 7,047,767.49 & 3,721,221 & 3,775,635 & 3,272,132 & 26.37 & 124,085 \\
\hline 1993 & 4,750,592.93 & 2,450,356 & 2,486,187 & 2,264,406 & 26.75 & 84,651 \\
\hline 1994 & 4,249,252.02 & 2,138,224 & 2,169,490 & 2,079,762 & 27.15 & 76,603 \\
\hline 1995 & 3,186,779.99 & 1,570,764 & 1,593,733 & 1,593,047 & 27.26 & 58,439 \\
\hline 1996 & 6,986,029.80 & 3,349,103 & 3,398,076 & 3,587,954 & 27.69 & 129,576 \\
\hline 1997 & 6,120,836.21 & 2,864,551 & 2,906,438 & 3,214,398 & 27.85 & 115,418 \\
\hline 1998 & 2,259,112.05 & 1,024,733 & 1,039,717 & 1,219,395 & 28.31 & 43,073 \\
\hline 1999 & 7,921,248.55 & 3,493,271 & 3,544,352 & 4,376,897 & 28.52 & 153,468 \\
\hline 2000 & 4,976,721.48 & 2,129,041 & 2,160,173 & 2,816,548 & 28.75 & 97,967 \\
\hline 2001 & 20,002,921.57 & 8,283,210 & 8,404,332 & 11,598,590 & 29.00 & 399,951 \\
\hline 2002 & 12,777,228.78 & 5,108,336 & 5,183,033 & 7,594,196 & 29.28 & 259,365 \\
\hline 2003 & 3,861,635.92 & 1,485,958 & 1,507,687 & 2,353,949 & 29.58 & 79,579 \\
\hline 2004 & 9,355,063.24 & 3,470,728 & 3,521,479 & 5,833,584 & 29.67 & 196,616 \\
\hline 2005 & 16,610,506.25 & 5,919,984 & 6,006,550 & 10,603,956 & 29.80 & 355,837 \\
\hline 2006 & 9,780,039.59 & 3,334,994 & 3,383,760 & 6,396,280 & 29.95 & 213,565 \\
\hline 2007 & 3,863,180.86 & 1,254,761 & 1,273,109 & 2,590,072 & 30.14 & 85,935 \\
\hline 2008 & 10,537,076.68 & 3,258,064 & 3,305,706 & 7,231,371 & 30.17 & 239,687 \\
\hline 2009 & 15,224,673.75 & 4,453,217 & 4,518,335 & 10,706,339 & 30.24 & 354,046 \\
\hline 2010 & 54,623,745.32 & 15,076,154 & 15,296,607 & 39,327,138 & 30.17 & 1,303,518 \\
\hline 2011 & 1,702,010.24 & 439,629 & 446,058 & 1,255,952 & 30.15 & 41,657 \\
\hline 2012 & 24,184,973.09 & 5,814,068 & 5,899,085 & 18,285,888 & 30.02 & 609,124 \\
\hline 2013 & 10,199,079.89 & 2,253,997 & 2,286,956 & 7,912,124 & 29.96 & 264,090 \\
\hline 2014 & 13, 024,139.88 & 2,628,271 & 2,666,703 & 10,357,437 & 29.67 & 349,088 \\
\hline 2015 & 13,579,113.90 & 2,463,251 & 2,499,270 & 11,079,844 & 29.34 & 377,636 \\
\hline 2016 & 12,982,522.67 & 2,070,712 & 2,100,991 & 10,881,532 & 28.98 & 375,484 \\
\hline 2017 & 30,217,804.78 & 4,145,883 & 4,206,507 & 26,011,298 & 28.29 & 919,452 \\
\hline 2018 & 45,903,348.86 & 5,187,078 & 5,262,927 & 40,640,422 & 27.46 & 1,479,986 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
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DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2019 & 46,303,621.52 & 4,019,154 & 4,077,925 & 42,225,697 & 26.32 & 1,604,320 \\
\hline 2020 & 50,109,745.53 & 2,901,354 & 2,943,780 & 47,165,966 & 24.41 & 1,932,239 \\
\hline 2021 & 34,615,169.47 & 837,687 & 849,937 & 33,765,233 & 20.12 & 1,678,192 \\
\hline & 603,286,069.64 & 172,757,298 & 175,283,463 & 428,002,607 & & 16,162,272 \\
\hline & COMPOSITE REMAI & NG LIFE AND & NNUAL ACC & RATE, PERCE & 26 & 2.68 \\
\hline
\end{tabular}

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 366 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1917 & 4,247.02 & 4,130 & 4,121 & 126 & 2.07 & 61 \\
\hline 1918 & 164.40 & 159 & 159 & 5 & 2.31 & 2 \\
\hline 1919 & 11,573.47 & 11,183 & 11,160 & 413 & 2.53 & 163 \\
\hline 1920 & 12,845.20 & 12,371 & 12,345 & 500 & 2.77 & 181 \\
\hline 1921 & 29,948.18 & 28,742 & 28,682 & 1,266 & 3.02 & 419 \\
\hline 1922 & 178,942.56 & 171,164 & 170,806 & 8,137 & 3.26 & 2,496 \\
\hline 1923 & 308,864.23 & 294,409 & 293,793 & 15,071 & 3.51 & 4,294 \\
\hline 1924 & 327,553.34 & 311,087 & 310,436 & 17,117 & 3.77 & 4,540 \\
\hline 1925 & 347,224.16 & 328,613 & 327,926 & 19,298 & 4.02 & 4,800 \\
\hline 1926 & 366,512.53 & 345,596 & 344,873 & 21,640 & 4.28 & 5,056 \\
\hline 1927 & 652,535.99 & 613,038 & 611,756 & 40,780 & 4.54 & 8,982 \\
\hline 1928 & 300,511.42 & 281,279 & 280,691 & 19,820 & 4.80 & 4,129 \\
\hline 1929 & 448,500.55 & 418,182 & 417,307 & 31,194 & 5.07 & 6,153 \\
\hline 1930 & 260,683.76 & 242,123 & 241,617 & 19,067 & 5.34 & 3,571 \\
\hline 1931 & 256,596.64 & 237,403 & 236,907 & 19,690 & 5.61 & 3,510 \\
\hline 1932 & 70,968.42 & 65,395 & 65,258 & 5,710 & 5.89 & 969 \\
\hline 1933 & 70,910.29 & 65,077 & 64,941 & 5,969 & 6.17 & 967 \\
\hline 1934 & 54,349.89 & 49,669 & 49,565 & 4,785 & 6.46 & 741 \\
\hline 1935 & 82,790.16 & 75,339 & 75,181 & 7,609 & 6.75 & 1,127 \\
\hline 1936 & 22,529.39 & 20,412 & 20,369 & 2,160 & 7.05 & 306 \\
\hline 1937 & 63,076.51 & 56,887 & 56,768 & 6,309 & 7.36 & 857 \\
\hline 1938 & 10,865.85 & 9,753 & 9,733 & 1,133 & 7.68 & 148 \\
\hline 1939 & 59,516.19 & 53,160 & 53,049 & 6,467 & 8.01 & 807 \\
\hline 1940 & 19,220.01 & 17,080 & 17,044 & 2,176 & 8.35 & 261 \\
\hline 1941 & 187,561.77 & 165,780 & 165,433 & 22,129 & 8.71 & 2,541 \\
\hline 1942 & 59,703.80 & 52,475 & 52,365 & 7,339 & 9.08 & 808 \\
\hline 1943 & 54,579.83 & 47,688 & 47,588 & 6,992 & 9.47 & 738 \\
\hline 1944 & 6,934.53 & 6,021 & 6,008 & 927 & 9.88 & 94 \\
\hline 1945 & 74,832.13 & 64,555 & 64,420 & 10,412 & 10.30 & 1,011 \\
\hline 1946 & 8,268.73 & 7,084 & 7,069 & 1,200 & 10.75 & 112 \\
\hline 1947 & 31,578.61 & 26,859 & 26,803 & 4,776 & 11.21 & 426 \\
\hline 1948 & 93,634.42 & 79,027 & 78,862 & 14,772 & 11.70 & 1,263 \\
\hline 1949 & 154,326.22 & 129,202 & 128,932 & 25,394 & 12.21 & 2,080 \\
\hline 1950 & 225,915.28 & 187,539 & 187,147 & 38,768 & 12.74 & 3,043 \\
\hline 1951 & 96,381.31 & 79,303 & 79,137 & 17,244 & 13.29 & 1,298 \\
\hline 1952 & 158,686.64 & 129,361 & 129,090 & 29,597 & 13.86 & 2,135 \\
\hline 1953 & 353,906. 20 & 285,673 & 285,076 & 68,830 & 14.46 & 4,760 \\
\hline 1954 & 472,154.72 & 377,285 & 376,496 & 95,659 & 15.07 & 6,348 \\
\hline 1955 & 387,252.65 & 306,189 & 305,549 & 81,704 & 15.70 & 5,204 \\
\hline 1956 & 302,991.67 & 236,979 & 236,483 & 66,509 & 16.34 & 4,070 \\
\hline 1957 & 184,907.09 & 142,994 & 142,695 & 42,212 & 17.00 & 2,483 \\
\hline 1958 & 467,248.34 & 357,165 & 356,418 & 110,830 & 17.67 & 6,272 \\
\hline
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 366 UNDERGROUND CONDUIT}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{lrrr}
1959 & \(236,578.16\) & 178,695 & 178,321 \\
1960 & \(301,206.88\) & 224,782 & 224,312 \\
1961 & \(673,971.30\) & 496,670 & 495,631 \\
1962 & \(581,427.70\) & 422,971 & 422,086 \\
1963 & \(112,652.57\) & 80,885 & 80,716 \\
1964 & \(209,274.77\) & 148,223 & 147,913 \\
1965 & \(893,685.53\) & 624,266 & 622,961 \\
1966 & \(286,656.96\) & 197,372 & 196,959 \\
1967 & \(978,168.72\) & 663,717 & 662,329 \\
1968 & \(270,131.75\) & 180,521 & 180,143 \\
1969 & \(1,213,415.32\) & 798,427 & 796,757 \\
1970 & \(1,438,459.10\) & 931,359 & 929,411 \\
1971 & \(3,186,722.95\) & \(2,029,719\) & \(2,025,474\) \\
1972 & \(1,514,442.30\) & 948,238 & 946,255 \\
1973 & \(2,285,584.80\) & \(1,406,389\) & \(1,403,448\) \\
1974 & \(3,026,519.55\) & \(1,828,835\) & \(1,825,011\) \\
1975 & \(1,791,047.32\) & \(1,062,449\) & \(1,060,227\) \\
1976 & \(1,445,387.96\) & 841,216 & 839,457 \\
1977 & \(1,005,027.52\) & 573,398 & 572,199 \\
1978 & \(2,329,854.15\) & \(1,302,552\) & \(1,299,828\) \\
1979 & \(1,786,273.77\) & 977,931 & 975,886 \\
1980 & \(2,873,310.33\) & \(1,539,721\) & \(1,536,501\) \\
1981 & \(933,993.99\) & 489,413 & 488,390 \\
1982 & \(3,303,248.58\) & \(1,691,693\) & \(1,688,155\) \\
1983 & \(2,990,183.21\) & \(1,577,023\) & \(1,573,725\) \\
1984 & \(3,263,774.23\) & \(1,676,927\) & \(1,673,420\) \\
1985 & \(2,014,024.77\) & \(1,014,464\) & \(1,012,343\) \\
1986 & \(4,975,416.88\) & \(2,437,457\) & \(2,432,360\) \\
1987 & \(1,250,621.26\) & 595,421 & 594,176 \\
1988 & \(1,632,007.11\) & 754,477 & 752,899 \\
1989 & \(3,304,155.88\) & \(1,492,818\) & \(1,489,696\) \\
1990 & \(2,622,555.99\) & \(1,148,155\) & \(1,145,754\) \\
1991 & \(1,286,736.83\) & 545,576 & 544,435 \\
1992 & \(1,787,633.24\) & 732,930 & 731,397 \\
1993 & \(4,183,967.52\) & \(1,657,688\) & \(1,654,221\) \\
1994 & \(1,058,972.54\) & 407,704 & 406,851 \\
1995 & \(2,029,970.95\) & 753,119 & 751,544 \\
1996 & \(969,225.84\) & 346,014 & 345,290 \\
1997 & \(832,951.01\) & 285,702 & 285,105 \\
1998 & \(537,954.16\) & 176,987 & 176,617 \\
1999 & \(1,670,315.68\) & 526,149 & 525,049 \\
2000 & \(695,247.19\) & 209,269 & 208,831 \\
19
\end{tabular}

2000 695,247.19

224,782 224,312

495,631
422,086
147,913
622,961
196,959
180,143
796,757
929,411
,025,474
1,403,448
1,825,011
1,060,227 839,457
572,199
975,886
\(1,536,501\)
488,390
\(1,688,155\)
1,573,725
1,012,343
,432,360 594,176
752,899
1,489,696
544,435
731,397
, 654,221
751,544
345,290
285,105
525,049
208,831
\begin{tabular}{rrr}
58,257 & 18.35 & 3,175 \\
76,895 & 19.03 & 4,041 \\
178,340 & 19.73 & 9,039 \\
159,342 & 20.44 & 7,796 \\
31,937 & 21.15 & 1,510 \\
61,362 & 21.88 & 2,804 \\
270,725 & 22.61 & 11,974 \\
89,698 & 23.36 & 3,840 \\
315,840 & 24.11 & 13,100 \\
89,989 & 24.88 & 3,617 \\
416,658 & 25.65 & 16,244 \\
509,048 & 26.44 & 19,253 \\
\(1,161,249\) & 27.23 & 42,646 \\
568,187 & 28.04 & 20,263 \\
882,137 & 28.85 & 30,577 \\
\(1,201,509\) & 29.68 & 40,482 \\
730,820 & 30.51 & 23,953 \\
605,931 & 31.35 & 19,328 \\
432,829 & 32.21 & 13,438 \\
\(1,030,026\) & 33.07 & 31,147 \\
810,388 & 33.94 & 23,877 \\
\(1,336,809\) & 34.81 & 38,403 \\
445,604 & 35.70 & 12,482 \\
\(1,615,094\) & 36.59 & 44,140 \\
\(1,416,458\) & 34.50 & 41,057 \\
\(1,590,354\) & 35.49 & 44,811 \\
\(1,001,682\) & 35.96 & 27,855 \\
\(2,543,057\) & 36.96 & 68,806 \\
656,445 & 37.96 & 17,293 \\
879,108 & 38.96 & 22,564 \\
\(1,814,460\) & 39.44 & 46,006 \\
\(1,476,802\) & 40.45 & 36,509 \\
742,302 & 41.44 & 17,913 \\
\(1,056,236\) & 42.45 & 24,882 \\
\(2,529,747\) & 43.44 & 58,235 \\
652,122 & 43.93 & 14,845 \\
\(1,278,427\) & 44.93 & 28,454 \\
623,936 & 45.93 & 13,584 \\
547,846 & 46.93 & 11,674 \\
361,337 & 47.93 & 7,539 \\
\(1,145,267\) & 48.93 & 23,406 \\
486,416 & 49.93 & 9,742 \\
& &
\end{tabular}

\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{rrrrrrr}
2001 & \(270,313.39\) & 78,121 & 77,958 & 192,355 & 50.43 & 3,814 \\
2002 & \(2,330,694.59\) & 640,941 & 639,601 & \(1,691,094\) & 51.42 & 32,888 \\
2003 & \(2,972,955.84\) & 775,347 & 773,726 & \(2,199,230\) & 52.43 & 41,946 \\
2004 & \(510,956.96\) & 126,104 & 125,840 & 385,117 & 53.42 & 7,209 \\
2005 & \(2,115,056.29\) & 491,962 & 490,933 & \(1,624,123\) & 54.43 & 29,839 \\
2006 & \(3,640,373.43\) & 795,786 & 794,122 & \(2,846,251\) & 55.42 & 51,358 \\
2007 & \(2,929,505.59\) & 598,791 & 597,539 & \(2,331,967\) & 56.43 & 41,325 \\
2008 & \(2,216,090.92\) & 421,944 & 421,062 & \(1,795,029\) & 57.42 & 31,261 \\
2009 & \(5,667,872.93\) & 998,679 & 996,590 & \(4,671,283\) & 58.43 & 79,947 \\
2010 & \(3,101,970.68\) & 503,140 & 502,088 & \(2,599,883\) & 59.42 & 43,754 \\
2011 & \(116,451.36\) & 17,235 & 17,199 & 99,252 & 60.43 & 1,642 \\
2012 & \(4,063,888.98\) & 544,561 & 543,422 & \(3,520,467\) & 61.42 & 57,318 \\
2013 & \(897,168.81\) & 107,481 & 107,256 & 789,913 & 62.43 & 12,653 \\
2014 & \(13,000,494.65\) & \(1,384,553\) & \(1,381,658\) & \(11,618,837\) & 62.92 & 184,660 \\
2015 & \(9,184,107.92\) & 847,693 & 845,920 & \(8,338,188\) & 63.92 & 130,447 \\
2016 & \(3,578,240.33\) & 279,461 & 278,877 & \(3,299,363\) & 64.92 & 50,822 \\
2017 & \(6,326,126.08\) & 404,239 & 403,394 & \(5,922,732\) & 65.92 & 89,847 \\
2018 & \(938,306.15\) & 46,634 & 46,536 & 891,770 & 66.92 & 13,326 \\
2019 & \(853,324.59\) & 30,293 & 30,230 & 823,095 & 67.92 & 12,119 \\
2020 & \(2,024,004.46\) & 43,111 & 43,021 & \(1,980,983\) & 68.92 & 28,743 \\
2021 & \(53,239,816.18\) & 378,003 & 377,212 & \(52,862,604\) & 69.92 & 756,044
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 52.8 1.40

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R1.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1944 & 1,744.62 & 1,595 & 1,446 & 299 & 3.86 & 77 \\
\hline 1945 & 114.73 & 104 & 94 & 21 & 4.09 & 5 \\
\hline 1948 & 506.93 & 453 & 411 & 96 & 4.80 & 20 \\
\hline 1949 & 141.99 & 126 & 114 & 28 & 5.05 & 6 \\
\hline 1951 & 503.33 & 441 & 400 & 103 & 5.56 & 19 \\
\hline 1952 & 174.49 & 152 & 138 & 36 & 5.83 & 6 \\
\hline 1953 & 13,238.94 & 11,441 & 10,370 & 2,869 & 6.11 & 470 \\
\hline 1954 & 5,258.14 & 4,511 & 4,089 & 1,169 & 6.39 & 183 \\
\hline 1955 & 4,878.54 & 4,155 & 3,766 & 1,113 & 6.67 & 167 \\
\hline 1956 & 5.08 & 4 & 4 & 1 & 6.96 & \\
\hline 1957 & 12,507.35 & 10,492 & 9,510 & 2,997 & 7.25 & 413 \\
\hline 1958 & 6,878.27 & 5,724 & 5,188 & 1,690 & 7.55 & 224 \\
\hline 1959 & 1,404.22 & 1,159 & 1,051 & 353 & 7.85 & 45 \\
\hline 1960 & 1,949.15 & 1,596 & 1,447 & 502 & 8.16 & 62 \\
\hline 1962 & 880.56 & 708 & 642 & 239 & 8.80 & 27 \\
\hline 1963 & 6,042.06 & 4,818 & 4,367 & 1,675 & 9.12 & 184 \\
\hline 1964 & 8,206.81 & 6,482 & 5,875 & 2,332 & 9.46 & 247 \\
\hline 1965 & 116,308.30 & 90,979 & 82,462 & 33,846 & 9.80 & 3,454 \\
\hline 1966 & 276,891.88 & 214,436 & 194,362 & 82,530 & 10.15 & 8,131 \\
\hline 1967 & 399,430.53 & 306,052 & 277,402 & 122,029 & 10.52 & 11,600 \\
\hline 1968 & 369,796.06 & 280,305 & 254,065 & 115,731 & 10.89 & 10,627 \\
\hline 1969 & 720,133.44 & 539,783 & 489,253 & 230,880 & 11.27 & 20,486 \\
\hline 1970 & 1,523,368.84 & 1,128,649 & 1,022,994 & 500,375 & 11.66 & 42,914 \\
\hline 1971 & 2,521,416.36 & 1,845,677 & 1,672,899 & 848,517 & 12.06 & 70,358 \\
\hline 1972 & 1,781,711.92 & 1,287,982 & 1,167,411 & 614,301 & 12.47 & 49,262 \\
\hline 1973 & 1,570,657.50 & 1,120,758 & 1,015,841 & 554,816 & 12.89 & 43,042 \\
\hline 1974 & 1,990,692.76 & 1,401,010 & 1,269,858 & 720,835 & 13.33 & 54,076 \\
\hline 1975 & 2,950,182.37 & 2,047,427 & 1,855,763 & 1,094,419 & 13.77 & 79,479 \\
\hline 1976 & 3,038,946.22 & 2,077,971 & 1,883,448 & 1,155,498 & 14.23 & 81,202 \\
\hline 1977 & 2,889,607.00 & 1,945,659 & 1,763,522 & 1,126,085 & 14.70 & 76,604 \\
\hline 1978 & 2,810,191.61 & 1,862,230 & 1,687,903 & 1,122,289 & 15.18 & 73,932 \\
\hline 1979 & 3,569,746.44 & 2,325,904 & 2,108,171 & 1,461,575 & 15.68 & 93,213 \\
\hline 1980 & 3,374,719.41 & 2,161,305 & 1,958,981 & 1,415,738 & 16.18 & 87,499 \\
\hline 1981 & 1,540,534.03 & 968,826 & 878,132 & 662,402 & 16.70 & 39,665 \\
\hline 1982 & 3,225,308.94 & 1,991,080 & 1,804,691 & 1,420,618 & 17.22 & 82,498 \\
\hline 1983 & 2,183,696.95 & 1,555,229 & 1,409,641 & 774,056 & 15.56 & 49,747 \\
\hline 1984 & 4,839,194.05 & 3,393,243 & 3,075,594 & 1,763,600 & 15.98 & 110,363 \\
\hline 1985 & 3,811,227.09 & 2,628,984 & 2,382,879 & 1,428,348 & 16.41 & 87,041 \\
\hline 1986 & 3,252,419.60 & 2,193,757 & 1,988,395 & 1,264,025 & 17.13 & 73,790 \\
\hline 1987 & 2,609,585.32 & 1,728,589 & 1,566,772 & 1,042,813 & 17.58 & 59,318 \\
\hline 1988 & 2,999,329.37 & 1,949,264 & 1,766,789 & 1,232,540 & 18.05 & 68,285 \\
\hline 1989 & 3,551,354.27 & 2,273,577 & 2,060,743 & 1,490,611 & 18.26 & 81,633 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
}
DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
ACCOUNT 367 UNDERGROUND CONDUCTORS AND DEVICES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

SURVIVOR CURVE.. IOWA 45-R1.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1990 & 4,578,672.33 & 2,869,912 & 2,601,253 & 1,977,419 & 18.75 & 105,462 \\
\hline 1991 & 5,060,986.62 & 3,102,385 & 2,811,964 & 2,249,023 & 19.25 & 116,832 \\
\hline 1992 & 4,407,683.38 & 2,639,321 & 2,392,249 & 2,015,434 & 19.76 & 101,996 \\
\hline 1993 & 4,430,062.17 & 2,588,042 & 2,345,770 & 2,084,292 & 20.28 & 102,776 \\
\hline 1994 & 3,765,340.46 & 2,143,232 & 1,942,600 & 1,822,740 & 20.81 & 87,590 \\
\hline 1995 & 2,824,643.26 & 1,564,287 & 1,417,851 & 1,406,792 & 21.35 & 65,892 \\
\hline 1996 & 3,942,152.94 & 2,131,128 & 1,931,629 & 2,010,524 & 21.67 & 92,779 \\
\hline 1997 & 3,330,089.57 & 1,745,966 & 1,582,522 & 1,747,568 & 22.23 & 78,613 \\
\hline 1998 & 519,527.39 & 263,712 & 239,025 & 280,502 & 22.80 & 12,303 \\
\hline 1999 & 7,569,955.90 & 3,730,474 & 3,381,256 & 4,188,700 & 23.16 & 180,859 \\
\hline 2000 & 9,481,525.43 & 4,505,621 & 4,083,840 & 5,397,685 & 23.75 & 227,271 \\
\hline 2001 & 5,183,659.48 & 2,380,336 & 2,157,508 & 3,026,151 & 24.14 & 125,358 \\
\hline 2002 & 4,116,633.16 & 1,814,200 & 1,644,369 & 2,472,264 & 24.75 & 99,889 \\
\hline 2003 & 6,307,908.34 & 2,672,030 & 2,421,896 & 3,886,012 & 25.17 & 154,391 \\
\hline 2004 & 11,110,427.78 & 4,510,834 & 4,088,565 & 7,021,863 & 25.60 & 274,292 \\
\hline 2005 & 13,393,450.00 & 5,193,980 & 4,707,761 & 8,685,689 & 26.05 & 333,424 \\
\hline 2006 & 13,266,716.14 & 4,894,092 & 4,435,946 & 8,830,770 & 26.52 & 332,985 \\
\hline 2007 & 8,320,673.00 & 2,907,243 & 2,635,090 & 5,685,583 & 27.00 & 210,577 \\
\hline 2008 & 8,526,439.77 & 2,820,546 & 2,556,509 & 5,969,931 & 27.31 & 218,599 \\
\hline 2009 & 18,394,519.73 & 5,702,301 & 5,168,496 & 13,226,024 & 27.82 & 475,414 \\
\hline 2010 & 21,935,750.71 & 6,356,981 & 5,761,890 & 16,173,861 & 28.18 & 573,948 \\
\hline 2011 & 15,390,301.76 & 4,152,303 & 3,763,597 & 11,626,705 & 28.41 & 409,247 \\
\hline 2012 & 17,850,435.68 & 4,426,908 & 4,012,496 & 13,837,940 & 28.81 & 480,317 \\
\hline 2013 & 20,465,216.01 & 4,627,185 & 4,194,024 & 16,271,192 & 29.09 & 559,340 \\
\hline 2014 & 20,741,534.48 & 4,231,273 & 3,835,175 & 16,906,359 & 29.26 & 577,798 \\
\hline 2015 & 28,453,374.86 & 5,141,525 & 4,660,216 & 23,793,159 & 29.47 & 807,369 \\
\hline 2016 & 18,366,905.29 & 2,879,931 & 2,610,334 & 15,756,571 & 29.59 & 532,496 \\
\hline 2017 & 26,252,241.02 & 3,460,045 & 3,136,143 & 23,116,098 & 29.63 & 780,159 \\
\hline 2018 & 27,544,977.17 & 2,930,786 & 2,656,429 & 24,888,548 & 29.39 & 846,837 \\
\hline 2019 & 26,961,663.67 & 2,143,452 & 1,942,799 & 25,018,865 & 28.95 & 864,209 \\
\hline 2020 & 13,603,213.51 & 691,043 & 626,353 & 12,976,861 & 28.00 & 463,459 \\
\hline 2021 & 10,192,832.77 & 199,780 & 181,078 & 10,011,755 & 25.07 & 399,352 \\
\hline & 444,270,399.25 & 140,793,491 & 127,613,516 & 316,656,883 & & 12,152,207 \\
\hline
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 26.1 2.74

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 39-S0
\begin{tabular}{rrrrrrr} 
\\
1949 & \(8,729.90\) & 8,278 & 7,002 & 1,728 & 2.02 & 855 \\
1950 & \(32,876.41\) & 30,862 & 26,106 & 6,770 & 2.39 & 2,833 \\
1951 & \(102,960.24\) & 95,647 & 80,909 & 22,051 & 2.77 & 7,961 \\
1952 & \(191,136.62\) & 175,748 & 148,667 & 42,470 & 3.14 & 13,525 \\
1953 & \(2,559.82\) & 2,329 & 1,970 & 590 & 3.52 & 168 \\
1955 & \(196,495.93\) & 174,982 & 148,019 & 48,477 & 4.27 & 11,353 \\
1956 & \(30,388.90\) & 26,766 & 22,642 & 7,747 & 4.65 & 1,666 \\
1957 & \(498,423.62\) & 434,142 & 367,245 & 131,179 & 5.03 & 26,079 \\
1958 & \(234,522.61\) & 201,931 & 170,815 & 63,708 & 5.42 & 11,754 \\
1959 & \(167,291.46\) & 142,412 & 120,468 & 46,823 & 5.80 & 8,073 \\
1960 & \(193,455.37\) & 162,750 & 137,672 & 55,783 & 6.19 & 9,012 \\
1961 & \(292,475.86\) & 243,129 & 205,665 & 86,811 & 6.58 & 13,193 \\
1962 & \(489,905.09\) & 402,349 & 340,351 & 149,554 & 6.97 & 21,457 \\
1963 & \(354,561.22\) & 287,648 & 243,324 & 111,237 & 7.36 & 15,114 \\
1964 & \(219,005.12\) & 175,430 & 148,398 & 70,607 & 7.76 & 9,099 \\
1965 & \(134,263.15\) & 106,206 & 89,841 & 44,422 & 8.15 & 5,451 \\
1966 & \(157,560.15\) & 123,018 & 104,062 & 53,498 & 8.55 & 6,257 \\
1967 & \(124,572.53\) & 95,984 & 81,194 & 43,379 & 8.95 & 4,847 \\
1968 & \(49,869.30\) & 37,901 & 32,061 & 17,808 & 9.36 & 1,903 \\
1969 & \(243,854.77\) & 182,828 & 154,656 & 89,199 & 9.76 & 9,139 \\
1970 & \(1,252,318.43\) & 925,751 & 783,101 & 469,217 & 10.17 & 46,137 \\
1971 & \(80,479.38\) & 58,647 & 49,610 & 30,869 & 10.58 & 2,918 \\
1972 & \(978,147.26\) & 702,515 & 594,264 & 383,883 & 10.99 & 34,930 \\
1973 & \(582,837.02\) & 412,322 & 348,787 & 234,050 & 11.41 & 20,513 \\
1974 & \(561,727.17\) & 391,338 & 331,036 & 230,691 & 11.83 & 19,501 \\
1975 & \(570,282.11\) & 391,156 & 330,882 & 239,400 & 12.25 & 19,543 \\
1976 & \(956,306.09\) & 645,631 & 546,145 & 410,161 & 12.67 & 32,373 \\
1977 & \(1,734,020.20\) & \(1,151,563\) & 974,118 & 759,902 & 13.10 & 58,008 \\
1978 & \(1,737,754.07\) & \(1,134,892\) & 960,016 & 777,738 & 13.53 & 57,482 \\
1979 & \(1,469,149.40\) & 943,267 & 797,918 & 671,231 & 13.96 & 48,082 \\
1980 & \(1,045,211.14\) & 659,288 & 557,698 & 487,513 & 14.40 & 33,855 \\
1981 & \(1,544,964.07\) & 957,090 & 809,611 & 735,353 & 14.84 & 49,552 \\
1982 & \(1,045,278.69\) & 635,749 & 537,786 & 507,493 & 15.28 & 33,213 \\
1983 & \(2,051,407.85\) & \(1,508,605\) & \(1,276,143\) & 775,265 & 13.85 & 55,976 \\
1984 & \(2,511,092.42\) & \(1,817,529\) & \(1,537,464\) & 973,628 & 14.31 & 68,038 \\
1985 & \(2,619,517.44\) & \(1,874,003\) & \(1,585,236\) & \(1,034,281\) & 14.52 & 71,231 \\
1986 & \(2,398,197.74\) & \(1,685,693\) & \(1,425,943\) & 972,255 & 15.01 & 64,774 \\
1987 & \(2,681,442.97\) & \(1,859,313\) & \(1,572,810\) & \(1,108,633\) & 15.25 & 72,697 \\
1988 & \(2,795,887.88\) & \(1,910,710\) & \(1,616,287\) & \(1,179,601\) & 15.52 & 76,005 \\
1989 & \(4,269,530.95\) & \(2,872,540\) & \(2,429,908\) & \(1,839,623\) & 15.81 & 116,358 \\
1990 & \(3,824,090.31\) & \(2,517,781\) & \(2,129,814\) & \(1,694,276\) & 16.34 & 103,689 \\
1991 & \(3,314,862.96\) & \(2,143,390\) & \(1,813,113\) & \(1,501,750\) & 16.67 & 90,087 \\
& & & & & &
\end{tabular}
Gammett Fleming \(\quad\) VII-54 \begin{tabular}{r} 
Duquesne Light Company - FTY \\
December 31, 2021
\end{tabular}

\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 39-S0
\begin{tabular}{rrrrrrr}
1992 & \(2,108,123.59\) & \(1,343,296\) & \(1,136,306\) & 971,818 & 16.80 & 57,846 \\
1993 & \(2,050,920.03\) & \(1,280,184\) & \(1,082,919\) & 968,001 & 17.16 & 56,410 \\
1994 & \(1,914,441.89\) & \(1,168,767\) & 988,671 & 925,771 & 17.55 & 52,750 \\
1995 & \(2,223,782.42\) & \(1,331,823\) & \(1,126,601\) & \(1,097,181\) & 17.75 & 61,813 \\
1996 & \(1,232,131.88\) & 719,565 & 608,687 & 623,445 & 18.17 & 34,312 \\
1997 & \(1,119,851.50\) & 639,211 & 540,714 & 579,138 & 18.42 & 31,441 \\
1998 & \(635,579.27\) & 354,018 & 299,467 & 336,112 & 18.69 & 17,984 \\
1999 & \(5,115,437.45\) & \(2,762,336\) & \(2,336,685\) & \(2,778,752\) & 19.17 & 144,953 \\
2000 & \(2,474,179.16\) & \(1,303,398\) & \(1,102,556\) & \(1,371,623\) & 19.31 & 71,032 \\
2001 & \(2,510,296.43\) & \(1,281,255\) & \(1,083,825\) & \(1,426,471\) & 19.66 & 72,557 \\
2002 & \(5,233,542.03\) & \(2,582,230\) & \(2,184,332\) & \(3,049,210\) & 20.02 & 152,308 \\
2003 & \(2,398,121.57\) & \(1,144,623\) & 968,247 & \(1,429,875\) & 20.26 & 70,576 \\
2004 & \(10,831,288.86\) & \(4,984,559\) & \(4,216,484\) & \(6,614,805\) & 20.52 & 322,359 \\
2005 & \(20,724,052.98\) & \(9,164,176\) & \(7,752,061\) & \(12,971,992\) & 20.81 & 623,354 \\
2006 & \(7,770,699.81\) & \(3,288,560\) & \(2,781,823\) & \(4,988,877\) & 21.13 & 236,104 \\
2007 & \(6,612,467.54\) & \(2,665,486\) & \(2,254,759\) & \(4,357,709\) & 21.47 & 202,967 \\
2008 & \(7,291,329.53\) & \(2,795,496\) & \(2,364,736\) & \(4,926,594\) & 21.71 & 226,927 \\
2009 & \(7,445,760.50\) & \(2,699,088\) & \(2,283,183\) & \(5,162,578\) & 21.98 & 234,876 \\
2010 & \(12,119,348.82\) & \(4,139,970\) & \(3,502,039\) & \(8,617,310\) & 22.17 & 388,692 \\
2011 & \(9,188,915.30\) & \(2,933,102\) & \(2,481,138\) & \(6,707,777\) & 22.39 & 299,588 \\
2012 & \(15,628,093.32\) & \(4,616,539\) & \(3,905,173\) & \(11,722,920\) & 22.66 & 517,340 \\
2013 & \(10,329,394.41\) & \(2,792,035\) & \(2,361,808\) & \(7,967,586\) & 22.95 & 347,172 \\
2014 & \(10,311,958.88\) & \(2,528,492\) & \(2,138,875\) & \(8,173,084\) & 23.08 & 354,120 \\
2015 & \(10,004,518.62\) & \(2,178,984\) & \(1,843,223\) & \(8,161,296\) & 23.35 & 349,520 \\
2016 & \(8,419,406.00\) & \(1,598,003\) & \(1,351,765\) & \(7,067,641\) & 23.48 & 301,007 \\
2017 & \(10,090,295.56\) & \(1,612,429\) & \(1,363,969\) & \(8,726,327\) & 23.67 & 368,666 \\
2018 & \(12,133,883.49\) & \(1,554,350\) & \(1,314,839\) & \(10,819,044\) & 23.82 & 454,200 \\
2019 & \(9,928,879.87\) & 941,258 & 796,219 & \(9,132,661\) & 23.88 & 382,440 \\
2020 & \(14,399,205.00\) & 850,993 & 719,863 & \(13,679,342\) & 23.88 & 572,837 \\
2021 & \(27,328,484.62\) & 562,967 & 476,219 & \(26,852,266\) & 23.71 & \(1,132,529\)
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{rrrrrrr}
1943 & \(2,754.98\) & 2,430 & 2,056 & 699 & 5.31 & 132 \\
1944 & \(4,539.87\) & 3,962 & 3,351 & 1,189 & 5.73 & 208 \\
1945 & \(9,853.76\) & 8,509 & 7,198 & 2,656 & 6.14 & 433 \\
1946 & \(5,600.28\) & 4,785 & 4,048 & 1,552 & 6.55 & 237 \\
1947 & \(7,113.14\) & 6,013 & 5,086 & 2,027 & 6.96 & 291 \\
1948 & \(60,258.99\) & 50,403 & 42,636 & 17,623 & 7.36 & 2,394 \\
1949 & \(34,701.95\) & 28,718 & 24,293 & 10,409 & 7.76 & 1,341 \\
1950 & \(42,615.34\) & 34,897 & 29,520 & 13,095 & 8.15 & 1,607 \\
1951 & \(90,114.41\) & 72,993 & 61,745 & 28,369 & 8.55 & 3,318 \\
1952 & \(51,326.07\) & 41,118 & 34,782 & 16,544 & 8.95 & 1,848 \\
1953 & \(75,729.85\) & 60,011 & 50,764 & 24,966 & 9.34 & 2,673 \\
1954 & \(161,603.26\) & 126,626 & 107,114 & 54,489 & 9.74 & 5,594 \\
1955 & \(175,717.19\) & 136,123 & 115,148 & 60,569 & 10.14 & 5,973 \\
1956 & \(221,218.85\) & 169,454 & 143,343 & 77,876 & 10.53 & 7,396 \\
1957 & \(95,545.43\) & 72,338 & 61,191 & 34,354 & 10.93 & 3,143 \\
1958 & \(187,633.28\) & 140,350 & 118,723 & 68,910 & 11.34 & 6,077 \\
1959 & \(218,741.24\) & 161,674 & 136,762 & 81,979 & 11.74 & 6,983 \\
1960 & \(293,748.26\) & 214,436 & 181,393 & 112,355 & 12.15 & 9,247 \\
1961 & \(192,054.29\) & 138,450 & 117,116 & 74,938 & 12.56 & 5,966 \\
1962 & \(170,804.35\) & 121,575 & 102,841 & 67,963 & 12.97 & 5,240 \\
1963 & \(156,442.01\) & 109,891 & 92,958 & 63,484 & 13.39 & 4,741 \\
1964 & \(90,285.02\) & 62,577 & 52,934 & 37,351 & 13.81 & 2,705 \\
1965 & \(110,415.13\) & 75,500 & 63,866 & 46,549 & 14.23 & 3,271 \\
1966 & \(192,469.65\) & 129,767 & 109,771 & 82,699 & 14.66 & 5,641 \\
1967 & \(340,058.99\) & 226,027 & 191,198 & 148,861 & 15.09 & 9,865 \\
1968 & \(505,284.49\) & 330,906 & 279,916 & 225,368 & 15.53 & 14,512 \\
1969 & \(210,991.76\) & 136,113 & 115,139 & 95,853 & 15.97 & 6,002 \\
1970 & \(429,460.65\) & 272,755 & 230,726 & 198,735 & 16.42 & 12,103 \\
1971 & \(234,272.32\) & 146,446 & 123,880 & 110,392 & 16.87 & 6,544 \\
1972 & \(374,152.42\) & 230,145 & 194,682 & 179,470 & 17.32 & 10,362 \\
1973 & \(558,865.08\) & 338,052 & 285,961 & 272,904 & 17.78 & 15,349 \\
1974 & \(796,372.47\) & 473,396 & 400,450 & 395,922 & 18.25 & 21,694 \\
1975 & \(647,696.04\) & 378,254 & 319,969 & 327,727 & 18.72 & 17,507 \\
1976 & \(196,784.87\) & 112,868 & 95,476 & 101,309 & 19.19 & 5,279 \\
1977 & \(362,546.23\) & 204,074 & 172,628 & 189,918 & 19.67 & 9,655 \\
1978 & \(610,171.65\) & 336,949 & 285,028 & 325,144 & 20.15 & 16,136 \\
1979 & \(416,985.05\) & 225,727 & 190,945 & 226,040 & 20.64 & 10,952 \\
1980 & \(553,273.68\) & 293,357 & 248,153 & 305,121 & 21.14 & 14,433 \\
1981 & \(343,418.20\) & 178,272 & 150,802 & 192,616 & 21.64 & 8,901 \\
1982 & \(304,913.40\) & 154,896 & 131,028 & 173,885 & 22.14 & 7,854 \\
1983 & \(371,856.53\) & 246,243 & 208,299 & 163,558 & 19.64 & 8,328 \\
1984 & \(472,335.49\) & 308,199 & 260,708 & 211,627 & 19.97 & 10,597 \\
& & & & & &
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1985 & 655,735.65 & 421,245 & 356,335 & 299,401 & 20.32 & 14,734 \\
\hline 1986 & 658,076.62 & 415,839 & 351,762 & 306,315 & 20.68 & 14,812 \\
\hline 1987 & 902,708.35 & 560,582 & 474,202 & 428,506 & 21.06 & 20,347 \\
\hline 1988 & 498,871.52 & 304,162 & 257,293 & 241,579 & 21.45 & 11,262 \\
\hline 1989 & 704,339.70 & 421,195 & 356,293 & 348,047 & 21.85 & 15,929 \\
\hline 1990 & 947,958.62 & 558,348 & 472,312 & 475,647 & 21.98 & 21,640 \\
\hline 1991 & 920,894.06 & 530,803 & 449,011 & 471,883 & 22.41 & 21,057 \\
\hline 1992 & 420,362.67 & 236,832 & 200,338 & 220,025 & 22.86 & 9,625 \\
\hline 1993 & 1,175.47 & 650 & 550 & 625 & 23.05 & 27 \\
\hline 1994 & 66,661.12 & 35,930 & 30,394 & 36,267 & 23.52 & 1,542 \\
\hline 1995 & 43,633.95 & 23,013 & 19,467 & 24,167 & 23.75 & 1,018 \\
\hline 1996 & 119,855.11 & 61,438 & 51,971 & 67,884 & 24.25 & 2,799 \\
\hline 1997 & 218,613.26 & 109,263 & 92,427 & 126,186 & 24.52 & 5,146 \\
\hline 1998 & 110,593.10 & 53,792 & 45,503 & 65,090 & 24.81 & 2,624 \\
\hline 1999 & 876,170.64 & 413,991 & 350,199 & 525,972 & 25.12 & 20,938 \\
\hline 2000 & 979,905.25 & 448,797 & 379,642 & 600,263 & 25.45 & 23,586 \\
\hline 2001 & 1,085,143.36 & 482,672 & 408,297 & 676,846 & 25.59 & 26,450 \\
\hline 2002 & 1,554,646.80 & 666,943 & 564,173 & 990,474 & 25.95 & 38,169 \\
\hline 2003 & 1,359,363.76 & 563,320 & 476,518 & 882,846 & 26.14 & 33,774 \\
\hline 2005 & 473,495.05 & 181,254 & 153,324 & 320,171 & 26.60 & 12,037 \\
\hline 2006 & 2,351,221.87 & 863,839 & 730,729 & 1,620,493 & 26.69 & 60,715 \\
\hline 2007 & 2,232,411.93 & 783,353 & 662,646 & 1,569,766 & 26.82 & 58,530 \\
\hline 2008 & 2,704,567.94 & 901,703 & 762,759 & 1,941,809 & 26.99 & 71,945 \\
\hline 2009 & 3,134,853.89 & 987,479 & 835,318 & 2,299,536 & 27.18 & 84,604 \\
\hline 2010 & 3,475,282.71 & 1,034,939 & 875,464 & 2,599,819 & 27.11 & 95,899 \\
\hline 2011 & 3,247,587.78 & 903,479 & 764,261 & 2,483,327 & 27.24 & 91,165 \\
\hline 2012 & 3,852,601.84 & 999,365 & 845,372 & 3,007,230 & 27.13 & 110,845 \\
\hline 2013 & 4,945,318.52 & 1,180,942 & 998,970 & 3,946,349 & 27.09 & 145,675 \\
\hline 2014 & 4,117,750.46 & 898,493 & 760,044 & 3,357,706 & 26.87 & 124,961 \\
\hline 2015 & 3,489,517.33 & 684,992 & 579,441 & 2,910,076 & 26.61 & 109,360 \\
\hline 2016 & 4,279,919.71 & 739,142 & 625,247 & 3,654,673 & 26.35 & 138,697 \\
\hline 2017 & 3,463,929.38 & 514,394 & 435,131 & 3,028,798 & 25.80 & 117,395 \\
\hline 2018 & 4,381,081.19 & 536,682 & 453,984 & 3,927,097 & 25.07 & 156,645 \\
\hline 2019 & 3,772,273.91 & 355,348 & 300,592 & 3,471,682 & 24.03 & 144,473 \\
\hline 2020 & 3,127,668.36 & 197,043 & 166,680 & 2,960,988 & 22.31 & 132,720 \\
\hline 2021 & 6,808,569.58 & 180,427 & 152,625 & 6,655,945 & 18.37 & 362,327 \\
\hline & 82,363,486.38 & 24,816,968 & 20,992,901 & 61,370,585 & & 2,596,004 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1927 & 8,686.80 & 7,366 & 6,231 & 2,456 & 4.56 & 539 \\
\hline 1928 & 15,279.98 & 12,886 & 10,900 & 4,380 & 4.70 & 932 \\
\hline 1929 & 49,849.09 & 41,823 & 35,378 & 14,471 & 4.83 & 2,996 \\
\hline 1930 & 14,872.93 & 12,409 & 10,497 & 4,376 & 4.97 & 880 \\
\hline 1931 & 13,058.98 & 10,835 & 9,165 & 3,894 & 5.11 & 762 \\
\hline 1932 & 1,472.26 & 1,215 & 1,028 & 444 & 5.25 & 85 \\
\hline 1933 & 1,048.99 & 861 & 728 & 321 & 5.39 & 60 \\
\hline 1935 & 2,111.03 & 1,712 & 1,448 & 663 & 5.67 & 117 \\
\hline 1936 & 5,135.14 & 4,139 & 3,501 & 1,634 & 5.82 & 281 \\
\hline 1937 & 8,189.17 & 6,560 & 5,549 & 2,640 & 5.97 & 442 \\
\hline 1938 & 3,986.49 & 3,175 & 2,686 & 1,300 & 6.11 & 213 \\
\hline 1939 & 2,541.02 & 2,011 & 1,701 & 840 & 6.26 & 134 \\
\hline 1940 & 5,612.36 & 4,413 & 3,733 & 1,879 & 6.41 & 293 \\
\hline 1941 & 17,798.43 & 13,901 & 11,759 & 6,039 & 6.57 & 919 \\
\hline 1942 & 3,320.47 & 2,577 & 2,180 & 1,140 & 6.72 & 170 \\
\hline 1943 & 1,145.67 & 883 & 747 & 399 & 6.87 & 58 \\
\hline 1944 & 5,169.95 & 3,958 & 3,348 & 1,822 & 7.03 & 259 \\
\hline 1945 & 141.25 & 107 & 91 & 50 & 7.19 & 7 \\
\hline 1946 & 3,368.48 & 2,543 & 2,151 & 1,217 & 7.35 & 166 \\
\hline 1947 & 4,630.66 & 3,471 & 2,936 & 1,695 & 7.51 & 226 \\
\hline 1948 & 19,085.73 & 14,200 & 12,012 & 7,074 & 7.68 & 921 \\
\hline 1949 & 46,917.67 & 34,657 & 29,317 & 17,601 & 7.84 & 2,245 \\
\hline 1950 & 24,302.14 & 17,813 & 15,068 & 9,234 & 8.01 & 1,153 \\
\hline 1951 & 15,307.83 & 11,134 & 9,418 & 5,890 & 8.18 & 720 \\
\hline 1952 & 53,961.27 & 38,942 & 32,941 & 21,020 & 8.35 & 2,517 \\
\hline 1953 & 48,349.77 & 34,618 & 29,284 & 19,066 & 8.52 & 2,238 \\
\hline 1954 & 39,537.81 & 28,072 & 23,746 & 15,792 & 8.70 & 1,815 \\
\hline 1955 & 63,029.57 & 44,394 & 37,553 & 25,477 & 8.87 & 2,872 \\
\hline 1956 & 72,406.76 & 50,564 & 42,773 & 29,634 & 9.05 & 3,274 \\
\hline 1957 & 58,932.31 & 40,801 & 34,514 & 24,418 & 9.23 & 2,646 \\
\hline 1958 & 60,105.88 & 41,233 & 34,879 & 25,227 & 9.42 & 2,678 \\
\hline 1959 & 43,422.73 & 29,527 & 24,977 & 18,446 & 9.60 & 1,921 \\
\hline 1960 & 241,868.29 & 162,939 & 137,832 & 104,036 & 9.79 & 10,627 \\
\hline 1961 & 52,394.83 & 34,965 & 29,577 & 22,818 & 9.98 & 2,286 \\
\hline 1962 & 30,037.37 & 19,855 & 16,796 & 13,241 & 10.17 & 1,302 \\
\hline 1963 & 84,280.64 & 55,147 & 46,649 & 37,632 & 10.37 & 3,629 \\
\hline 1964 & 47,730.91 & 30,914 & 26,150 & 21,581 & 10.57 & 2,042 \\
\hline 1965 & 38,390.28 & 24,608 & 20,816 & 17,574 & 10.77 & 1,632 \\
\hline 1966 & 79,698.10 & 50,555 & 42,765 & 36,933 & 10.97 & 3,367 \\
\hline 1967 & 272,339.26 & 170,847 & 144,521 & 127,818 & 11.18 & 11,433 \\
\hline 1968 & 210,764.07 & 130,815 & 110,658 & 100,106 & 11.38 & 8,797 \\
\hline 1969 & 70,825.56 & 43,464 & 36,767 & 34,059 & 11.59 & 2,939 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1970 & 47,904.10 & 29,046 & 24,570 & 23,334 & 11.81 & 1,976 \\
\hline 1971 & 145,542.64 & 87,228 & 73,787 & 71,756 & 12.02 & 5,970 \\
\hline 1972 & 263,609.96 & 156,057 & 132,010 & 131,600 & 12.24 & 10,752 \\
\hline 1973 & 77,617.63 & 45,354 & 38,365 & 39,253 & 12.47 & 3,148 \\
\hline 1974 & 147,248.70 & 84,962 & 71,870 & 75,379 & 12.69 & 5,940 \\
\hline 1975 & 239,753.46 & 136,499 & 115,466 & 124,287 & 12.92 & 9,620 \\
\hline 1976 & 47,626.86 & 26,751 & 22,629 & 24,998 & 13.15 & 1,901 \\
\hline 1977 & 28,192.66 & 15,609 & 13,204 & 14,989 & 13.39 & 1,119 \\
\hline 1978 & 26,872.24 & 14,663 & 12,404 & 14,468 & 13.63 & 1,061 \\
\hline 1979 & 275.36 & 148 & 125 & 150 & 13.87 & 11 \\
\hline 1980 & 46,701.92 & 24,721 & 20,912 & 25,790 & 14.12 & 1,826 \\
\hline 1981 & 414,906.42 & 216,166 & 182,857 & 232,049 & 14.37 & 16,148 \\
\hline 1982 & 950,281.87 & 487,181 & 412,111 & 538,171 & 14.62 & 36,811 \\
\hline 1983 & 327,921.77 & 247,450 & 209,320 & 118,602 & 12.52 & 9,473 \\
\hline 1984 & 43,490.73 & 32,453 & 27,452 & 16,039 & 12.75 & 1,258 \\
\hline 1986 & 342,487.31 & 250,461 & 211,867 & 130,620 & 13.04 & 10,017 \\
\hline 1987 & 635,388.33 & 458,115 & 387,524 & 247,864 & 13.35 & 18,567 \\
\hline 1988 & 385,467.89 & 275,070 & 232,684 & 152,784 & 13.45 & 11,359 \\
\hline 1989 & 331,105.50 & 233,496 & 197,516 & 133,590 & 13.59 & 9,830 \\
\hline 1990 & 221,933.98 & 154,510 & 130,701 & 91,233 & 13.75 & 6,635 \\
\hline 1991 & 371,399.23 & 254,854 & 215,583 & 155,816 & 13.95 & 11,170 \\
\hline 1992 & 3,669.51 & 2,479 & 2,097 & 1,573 & 14.17 & 111 \\
\hline 1993 & 1,748.06 & 1,166 & 986 & 762 & 14.24 & 54 \\
\hline 1994 & 30,542.43 & 20,072 & 16,979 & 13,563 & 14.34 & 946 \\
\hline 1995 & 11,469.78 & 7,416 & 6,273 & 5,197 & 14.48 & 359 \\
\hline 1996 & 14,631.27 & 9,291 & 7,859 & 6,772 & 14.66 & 462 \\
\hline 1997 & 10,358.79 & 6,446 & 5,453 & 4,906 & 14.87 & 330 \\
\hline 1998 & 1,441.73 & 881 & 745 & 697 & 14.96 & 47 \\
\hline 1999 & 99,296.01 & 59,429 & 50,272 & 49,024 & 15.09 & 3,249 \\
\hline 2000 & 339,169.57 & 198,346 & 167,783 & 171,387 & 15.26 & 11,231 \\
\hline 2001 & 1,402,344.75 & 799,196 & 676,047 & 726,298 & 15.47 & 46,949 \\
\hline 2002 & 445,970.19 & 247,870 & 209,676 & 236,294 & 15.59 & 15,157 \\
\hline 2003 & 1,764,481.31 & 956,349 & 808,985 & 955,496 & 15.63 & 61,132 \\
\hline 2004 & 29,590.61 & 15,588 & 13,186 & 16,405 & 15.72 & 1,044 \\
\hline 2005 & 250,091.13 & 127,496 & 107,850 & 142,241 & 15.86 & 8,969 \\
\hline 2006 & 836,941.15 & 412,528 & 348,961 & 487,980 & 15.95 & 30,594 \\
\hline 2007 & 368,830.36 & 175,416 & 148,386 & 220,444 & 15.99 & 13,786 \\
\hline 2008 & 4,682,992.81 & 2,136,850 & 1,807,581 & 2,875,412 & 16.09 & 178,708 \\
\hline 2009 & 1,643,884.42 & 717,062 & 606,569 & 1,037,315 & 16.15 & 64,230 \\
\hline 2010 & 917,199.33 & 380,821 & 322,140 & 595,059 & 16.20 & 36,732 \\
\hline 2011 & 3,143,943.32 & 1,234,627 & 1,044,383 & 2,099,560 & 16.24 & 129,283 \\
\hline 2012 & 2,027,376.36 & 749,318 & 633,855 & 1,393,521 & 16.21 & 85,967 \\
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\end{tabular}

\footnotetext{
Gammett Fleming
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                    DUQUESNE LIGHT COMPANY
                        ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
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\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0


DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 40-R1.5
\begin{tabular}{rrrrrrr}
1961 & \(5,927.85\) & 5,107 & 4,320 & 1,608 & 5.54 & 290 \\
1962 & 282.59 & 241 & 204 & 79 & 5.82 & 14 \\
1964 & \(1,243.51\) & 1,045 & 884 & 360 & 6.40 & 56 \\
1965 & \(7,970.56\) & 6,637 & 5,614 & 2,357 & 6.69 & 352 \\
1966 & \(27,875.14\) & 22,997 & 19,453 & 8,422 & 7.00 & 1,203 \\
1967 & \(28,153.28\) & 23,008 & 19,463 & 8,690 & 7.31 & 1,189 \\
1968 & \(17,603.02\) & 14,250 & 12,054 & 5,549 & 7.62 & 728 \\
1969 & \(60,768.58\) & 48,691 & 41,188 & 19,581 & 7.95 & 2,463 \\
1970 & \(71,105.96\) & 56,387 & 47,698 & 23,408 & 8.28 & 2,827 \\
1971 & \(92,030.47\) & 72,198 & 61,073 & 30,957 & 8.62 & 3,591 \\
1972 & \(71,275.12\) & 55,292 & 46,772 & 24,503 & 8.97 & 2,732 \\
1973 & \(232,118.09\) & 177,977 & 150,552 & 81,566 & 9.33 & 8,742 \\
1974 & \(368,528.57\) & 279,160 & 236,144 & 132,385 & 9.70 & 13,648 \\
1975 & \(3,173.39\) & 2,374 & 2,008 & 1,165 & 10.08 & 116 \\
1976 & \(147,484.06\) & 108,880 & 92,103 & 55,381 & 10.47 & 5,289 \\
1977 & \(144,451.21\) & 105,160 & 88,956 & 55,495 & 10.88 & 5,101 \\
1978 & \(204,314.91\) & 146,596 & 124,007 & 80,308 & 11.30 & 7,107 \\
1979 & \(283,279.89\) & 200,208 & 169,358 & 113,922 & 11.73 & 9,712 \\
1980 & \(265,535.85\) & 184,747 & 156,279 & 109,257 & 12.17 & 8,978 \\
1981 & \(2,089.86\) & 1,430 & 1,210 & 880 & 12.63 & 70 \\
1982 & \(5,598.99\) & 3,765 & 3,185 & 2,414 & 13.10 & 184 \\
1983 & \(282,510.48\) & 214,256 & 181,241 & 101,269 & 12.26 & 8,260 \\
1984 & \(232,374.30\) & 174,281 & 147,426 & 84,948 & 12.50 & 6,796 \\
1985 & \(408,850.47\) & 301,445 & 254,995 & 153,855 & 13.00 & 11,835 \\
1986 & \(361,615.18\) & 263,184 & 222,630 & 138,985 & 13.28 & 10,466 \\
1987 & \(373,438.65\) & 266,710 & 225,612 & 147,827 & 13.81 & 10,704 \\
1988 & \(384,188.30\) & 269,009 & 227,557 & 156,631 & 14.34 & 10,923 \\
1989 & \(1,017,492.72\) & 701,052 & 593,026 & 424,467 & 14.67 & 28,934 \\
1990 & \(440,277.59\) & 296,791 & 251,058 & 189,220 & 15.23 & 12,424 \\
1991 & \(612,511.47\) & 405,360 & 342,898 & 269,613 & 15.59 & 17,294 \\
1992 & \(209,932.40\) & 136,246 & 115,252 & 94,680 & 15.95 & 5,936 \\
1993 & \(342,198.85\) & 216,509 & 183,147 & 159,052 & 16.55 & 9,610 \\
1994 & \(279,334.52\) & 172,852 & 146,217 & 133,118 & 16.94 & 7,858 \\
1995 & \(312,939.60\) & 188,264 & 159,254 & 153,686 & 17.55 & 8,757 \\
1996 & \(224,450.00\) & 131,640 & 111,356 & 113,094 & 17.98 & 6,290 \\
1997 & \(163,766.73\) & 93,478 & 79,074 & 84,693 & 18.42 & 4,598 \\
1998 & 347.65 & 193 & 163 & 185 & 18.87 & 10 \\
1999 & \(257,133.37\) & 138,286 & 116,977 & 140,156 & 19.34 & 7,247 \\
2000 & \(94,832.27\) & 49,341 & 41,738 & 53,094 & 19.82 & 2,679 \\
2001 & \(250,430.35\) & 125,766 & 106,387 & 144,043 & 20.32 & 7,089 \\
2002 & \(1,022,782.58\) & 494,618 & 418,402 & 604,381 & 20.82 & 29,029 \\
2003 & \(611,682.97\) & 284,066 & 240,294 & 371,389 & 21.34 & 17,403 \\
& & & & & &
\end{tabular}

\footnotetext{
Gannett Fleming
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                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
    ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 40-R1.5
\begin{tabular}{rrrrrrr}
2004 & \(4,668.88\) & 2,075 & 1,755 & 2,914 & 21.87 & 133 \\
2006 & \(1,381,978.35\) & 559,148 & 472,989 & 908,989 & 22.81 & 39,850 \\
2007 & \(1,372,589.16\) & 527,349 & 446,089 & 926,500 & 23.24 & 39,867 \\
2008 & \(1,397,594.21\) & 507,606 & 429,389 & 968,205 & 23.67 & 40,904 \\
2009 & \(1,146,733.47\) & 391,265 & 330,975 & 815,758 & 24.13 & 33,807 \\
2010 & \(2,163,967.22\) & 691,820 & 585,217 & \(1,578,750\) & 24.47 & 64,518 \\
2011 & \(1,558,358.52\) & 463,144 & 391,778 & \(1,166,581\) & 24.83 & 46,983 \\
2012 & \(2,259,053.81\) & 618,077 & 522,837 & \(1,736,217\) & 25.22 & 68,843 \\
2013 & \(3,175,219.96\) & 790,630 & 668,801 & \(2,506,419\) & 25.63 & 97,792 \\
2014 & \(2,652,083.87\) & 596,719 & 504,770 & \(2,147,314\) & 25.83 & 83,133 \\
2015 & \(1,165,272.41\) & 232,588 & 196,748 & 968,524 & 26.07 & 37,151 \\
2016 & \(2,771,734.74\) & 480,064 & 406,091 & \(2,365,644\) & 26.25 & 90,120 \\
2017 & \(1,393,142.94\) & 203,677 & 172,292 & \(1,220,851\) & 26.27 & 46,473 \\
2018 & \(1,639,153.73\) & 192,764 & 163,061 & \(1,476,093\) & 26.26 & 56,211 \\
2019 & \(1,699,840.55\) & 149,586 & 126,536 & \(1,573,305\) & 25.91 & 60,722 \\
2020 & \(1,680,536.14\) & 94,782 & 80,177 & \(1,600,359\) & 25.10 & 63,759 \\
2021 & \(4,546,252.32\) & 99,108 & 83,837 & \(4,462,415\) & 22.49 & 198,418 \\
& & & & & &
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.63 .26

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 369.2 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1926 & 2,461.06 & 2,090 & 1,840 & 621 & 9.79 & 63 \\
\hline 1927 & 20,468.83 & 17,295 & 15,222 & 5,247 & 10.08 & 521 \\
\hline 1928 & 22,188.87 & 18,646 & 16,411 & 5,778 & 10.38 & 557 \\
\hline 1929 & 27,829.43 & 23,261 & 20,473 & 7,356 & 10.67 & 689 \\
\hline 1930 & 27,353.59 & 22,737 & 20,012 & 7,342 & 10.97 & 669 \\
\hline 1931 & 30,369.53 & 25,099 & 22,091 & 8,279 & 11.28 & 734 \\
\hline 1932 & 14,099.92 & 11,588 & 10,199 & 3,901 & 11.58 & 337 \\
\hline 1933 & 11,562.66 & 9,448 & 8,316 & 3,247 & 11.89 & 273 \\
\hline 1934 & 29,387.66 & 23,867 & 21,006 & 8,382 & 12.21 & 686 \\
\hline 1935 & 11,655.69 & 9,409 & 8,281 & 3,375 & 12.53 & 269 \\
\hline 1936 & 5,966.02 & 4,787 & 4,213 & 1,753 & 12.85 & 136 \\
\hline 1937 & 11,951.17 & 9,528 & 8,386 & 3,565 & 13.18 & 270 \\
\hline 1938 & 497.45 & 394 & 347 & 150 & 13.51 & 11 \\
\hline 1939 & 12,900.40 & 10,152 & 8,935 & 3,965 & 13.85 & 286 \\
\hline 1940 & 3,894.27 & 3,044 & 2,679 & 1,215 & 14.20 & 86 \\
\hline 1941 & 18,682.09 & 14,500 & 12,762 & 5,920 & 14.55 & 407 \\
\hline 1942 & 3,648.50 & 2,812 & 2,475 & 1,174 & 14.91 & 79 \\
\hline 1943 & 1,416.24 & 1,084 & 954 & 462 & 15.27 & 30 \\
\hline 1944 & 2,508.36 & 1,905 & 1,677 & 831 & 15.64 & 53 \\
\hline 1945 & 8,539.91 & 6,435 & 5,664 & 2,876 & 16.02 & 180 \\
\hline 1946 & 2,967.36 & 2,219 & 1,953 & 1,014 & 16.40 & 62 \\
\hline 1947 & 18,118.22 & 13,438 & 11,827 & 6,291 & 16.79 & 375 \\
\hline 1948 & 106,798.91 & 78,555 & 69,140 & 37,659 & 17.19 & 2,191 \\
\hline 1949 & 30,017.14 & 21,889 & 19,266 & 10,751 & 17.60 & 611 \\
\hline 1950 & 36,811.23 & 26,612 & 23,422 & 13,389 & 18.01 & 743 \\
\hline 1951 & 25,177.89 & 18,039 & 15,877 & 9,301 & 18.43 & 505 \\
\hline 1952 & 211,456.55 & 150,102 & 132,112 & 79,345 & 18.86 & 4,207 \\
\hline 1953 & 229,893.70 & 161,634 & 142,262 & 87,632 & 19.30 & 4,541 \\
\hline 1954 & 369,731.93 & 257,389 & 226,540 & 143,192 & 19.75 & 7,250 \\
\hline 1955 & 523,170.17 & 360,585 & 317,368 & 205,802 & 20.20 & 10,188 \\
\hline 1956 & 702,975.98 & 479,535 & 422,061 & 280,915 & 20.66 & 13,597 \\
\hline 1957 & 791,498.38 & 534,198 & 470,173 & 321,325 & 21.13 & 15,207 \\
\hline 1958 & 715,041.13 & 477,319 & 420,111 & 294,930 & 21.61 & 13,648 \\
\hline 1959 & 613,396.59 & 404,934 & 356,401 & 256,996 & 22.09 & 11,634 \\
\hline 1960 & 672,653.74 & 438,880 & 386,279 & 286,375 & 22.59 & 12,677 \\
\hline 1961 & 546,240.37 & 352,199 & 309,987 & 236,253 & 23.09 & 10,232 \\
\hline 1962 & 695,924.28 & 443,248 & 390,123 & 305,801 & 23.60 & 12,958 \\
\hline 1963 & 682,591.06 & 429,295 & 377,843 & 304,748 & 24.12 & 12,635 \\
\hline 1964 & 648,037.95 & 402,380 & 354,153 & 293,885 & 24.64 & 11,927 \\
\hline 1965 & 427,725.86 & 262,033 & 230,628 & 197,098 & 25.18 & 7,828 \\
\hline 1966 & 786,685.88 & 475,402 & 418,424 & 368,262 & 25.72 & 14,318 \\
\hline 1967 & 786,645.42 & 468,723 & 412,545 & 374,100 & 26.27 & 14,241 \\
\hline
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 369.2 SERVICES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{rrrrrrr}
1968 & \(572,956.02\) & 336,457 & 296,132 & 276,824 & 26.83 & 10,318 \\
1969 & \(931,747.86\) & 539,128 & 474,512 & 457,236 & 27.39 & 16,694 \\
1970 & \(1,991,724.27\) & \(1,134,984\) & 998,953 & 992,771 & 27.96 & 35,507 \\
1971 & \(1,098,569.87\) & 616,210 & 542,355 & 556,215 & 28.54 & 19,489 \\
1972 & \(1,202,561.48\) & 663,634 & 584,095 & 618,466 & 29.13 & 21,231 \\
1973 & \(1,192,546.41\) & 647,278 & 569,700 & 622,846 & 29.72 & 20,957 \\
1974 & \(1,014,463.56\) & 541,257 & 476,386 & 538,078 & 30.32 & 17,747 \\
1975 & \(1,225,331.30\) & 642,257 & 565,280 & 660,051 & 30.93 & 21,340 \\
1976 & \(1,099,091.76\) & 565,615 & 497,824 & 601,268 & 31.55 & 19,058 \\
1977 & \(1,023,251.58\) & 516,824 & 454,881 & 568,371 & 32.17 & 17,668 \\
1978 & \(1,083,272.48\) & 536,632 & 472,315 & 610,957 & 32.80 & 18,627 \\
1979 & \(1,256,190.47\) & 610,119 & 536,994 & 719,196 & 33.43 & 21,513 \\
1980 & \(1,589,622.02\) & 756,167 & 665,538 & 924,084 & 34.08 & 27,115 \\
1981 & \(1,326,530.72\) & 617,964 & 543,899 & 782,632 & 34.72 & 22,541 \\
1982 & \(1,338,742.33\) & 610,051 & 536,934 & 801,808 & 35.38 & 22,663 \\
1983 & \(1,588,933.21\) & 886,943 & 780,640 & 808,293 & 30.47 & 26,528 \\
1984 & \(1,486,838.55\) & 814,044 & 716,478 & 770,361 & 30.99 & 24,858 \\
1985 & \(1,494,547.89\) & 801,974 & 705,855 & 788,693 & 31.52 & 25,022 \\
1986 & \(1,218,289.18\) & 640,089 & 563,372 & 654,917 & 32.07 & 20,421 \\
1987 & \(1,472,938.85\) & 757,091 & 666,351 & 806,588 & 32.62 & 24,727 \\
1988 & \(1,748,144.57\) & 878,443 & 773,159 & 974,986 & 33.17 & 29,394 \\
1989 & \(1,792,236.77\) & 879,630 & 774,204 & \(1,018,033\) & 33.72 & 30,191 \\
1990 & \(1,649,328.87\) & 794,977 & 699,696 & 949,633 & 33.86 & 28,046 \\
1991 & \(2,364,313.39\) & \(1,110,518\) & 977,419 & \(1,386,894\) & 34.44 & 40,270 \\
1992 & \(1,915,774.37\) & 875,892 & 770,914 & \(1,144,860\) & 35.02 & 32,692 \\
1993 & \(1,933,363.96\) & 859,574 & 756,551 & \(1,176,813\) & 35.60 & 33,057 \\
1994 & \(2,181,633.96\) & 947,920 & 834,309 & \(1,347,325\) & 35.79 & 37,645 \\
1995 & \(1,228,755.94\) & 517,798 & 455,738 & 773,018 & 36.39 & 21,243 \\
1996 & \(1,378,868.14\) & 562,578 & 495,151 & 883,717 & 37.00 & 23,884 \\
1997 & \(2,730,896.56\) & \(1,083,893\) & 953,985 & \(1,776,912\) & 37.23 & 47,728 \\
1998 & \(178,706.69\) & 68,445 & 60,242 & 118,465 & 37.85 & 3,130 \\
1999 & \(942,087.19\) & 349,703 & 307,790 & 634,297 & 38.11 & 16,644 \\
2000 & \(1,558,827.86\) & 556,346 & 489,666 & \(1,069,162\) & 38.74 & 27,598 \\
2001 & \(600,352.44\) & 206,761 & 181,980 & 418,372 & 39.02 & 10,722 \\
2002 & \(1,155,756.43\) & 380,937 & 335,280 & 820,476 & 39.67 & 20,683 \\
2003 & \(1,318,675.83\) & 417,229 & 367,223 & 951,453 & 39.98 & 23,798 \\
2004 & \(1,560,130.86\) & 472,408 & 415,788 & \(1,144,343\) & 40.30 & 28,396 \\
2005 & \(1,925,510.62\) & 556,087 & 489,438 & \(1,436,073\) & 40.64 & 35,336 \\
2006 & \(2,601,134.58\) & 713,751 & 628,206 & \(1,972,929\) & 40.99 & 48,132 \\
2007 & \(2,299,414.56\) & 596,928 & 525,384 & \(1,774,031\) & 41.36 & 42,892 \\
2008 & \(3,274,402.00\) & 800,264 & 704,350 & \(2,570,052\) & 41.75 & 61,558 \\
2009 & \(2,774,661.33\) & 638,172 & 561,685 & \(2,212,976\) & 41.85 & 52,879 \\
& & & & & &
\end{tabular}

\footnotetext{
Gannett Fleming
}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                                    ACCOUNT 369.2 SERVICES
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
    |  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{rrrrrrr}
2010 & \(3,949,832.46\) & 844,869 & 743,609 & \(3,206,223\) & 42.26 & 75,869 \\
2011 & \(2,405,048.81\) & 477,162 & 419,973 & \(1,985,076\) & 42.41 & 46,807 \\
2012 & \(3,945,825.89\) & 719,719 & 633,458 & \(3,312,368\) & 42.58 & 77,792 \\
2013 & \(1,436,892.98\) & 238,237 & 209,684 & \(1,227,209\) & 42.78 & 28,687 \\
2014 & \(2,129,122.65\) & 317,665 & 279,592 & \(1,849,531\) & 42.75 & 43,264 \\
2015 & \(1,705,207.23\) & 225,087 & 198,110 & \(1,507,097\) & 42.76 & 35,245 \\
2016 & \(1,358,395.67\) & 155,400 & 136,775 & \(1,221,621\) & 42.58 & 28,690 \\
2017 & \(1,078,930.21\) & 103,901 & 91,448 & 987,482 & 42.23 & 23,383 \\
2018 & \(2,512,423.82\) & 194,462 & 171,155 & \(2,341,269\) & 41.75 & 56,078 \\
2019 & \(2,315,374.59\) & 133,134 & 117,177 & \(2,198,198\) & 40.98 & 53,641 \\
2020 & \(2,998,256.72\) & 110,336 & 97,112 & \(2,901,145\) & 39.31 & 73,802 \\
2021 & \(11,324,616.13\) & 158,545 & 139,543 & \(11,185,073\) & 35.09 & 318,754 \\
& & & & & & \\
& \(111,371,995.28\) & \(37,658,178\) & \(33,144,726\) & \(78,227,270\) & & \(2,179,865\)
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 35.9 1.96

\section*{ACCOUNT 370 METERS AND SMART METERS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 18-S0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2004 & 14,102.23 & 10,292 & 7,575 & 6,527 & 6.48 & 1,007 \\
\hline 2005 & 27,122.29 & 19,154 & 14,097 & 13,025 & 6.86 & 1,899 \\
\hline 2006 & 29,592.19 & 20,229 & 14,888 & 14,704 & 7.17 & 2,051 \\
\hline 2007 & 23,525.82 & 15,522 & 11,424 & 12,102 & 7.48 & 1,618 \\
\hline 2008 & 178,068.20 & 112,753 & 82,985 & 95,083 & 7.82 & 12,159 \\
\hline 2009 & 38,991.32 & 23,590 & 17,362 & 21,629 & 8.16 & 2,651 \\
\hline 2010 & 14,072.63 & 8,109 & 5,968 & 8,105 & 8.46 & 958 \\
\hline 2011 & 14,483.42 & 7,893 & 5,809 & 8,674 & 8.77 & 989 \\
\hline 2012 & 1,089,409.57 & 557,778 & 410,517 & 678,893 & 9.05 & 75,016 \\
\hline 2013 & 2,392,779.74 & 1,138,963 & 838,260 & 1,554,520 & 9.36 & 166,081 \\
\hline 2014 & 1,861,827.41 & 813,991 & 599,086 & 1,262,741 & 9.65 & 130,854 \\
\hline 2015 & 19,558,606.47 & 7,741,296 & 5,697,483 & 13,861,123 & 9.92 & 1,397,291 \\
\hline 2016 & 32,138,870.20 & 11,261,460 & 8,288,273 & 23,850,597 & 10.20 & 2,338,294 \\
\hline 2017 & 37,019,029.42 & 11,161,237 & 8,214,510 & 28,804,519 & 10.43 & 2,761,699 \\
\hline 2018 & 31,993,502.66 & 7,905,595 & 5,818,404 & 26,175,099 & 10.66 & 2,455,450 \\
\hline 2019 & 8,636,139.05 & 1,616,685 & 1,189,857 & 7,446,282 & 10.85 & 686,293 \\
\hline 2020 & 7,196,512.08 & 865,021 & 636,643 & 6,559,869 & 10.98 & 597,438 \\
\hline 2021 & 3,756,326.10 & 163,776 & 120,537 & 3,635,790 & 10.98 & 331,128 \\
\hline & 145,982,960.80 & 43,443,344 & 31,973,678 & 114,009,283 & & 10,962,876 \\
\hline & COMPOSITE REMAI & NG LIFE AND & NUAL ACCR & RATE, PERCE & . . 10 & 7.51 \\
\hline
\end{tabular}

\footnotetext{
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 10.4 7.51
} RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1899 & 2,556.71 & 2,557 & 2,557 & & & \\
\hline 1900 & 187.13 & 182 & 187 & & & \\
\hline 1901 & 5,953.38 & 5,755 & 5,953 & & & \\
\hline 1902 & 8,797.38 & 8,372 & 8,797 & & & \\
\hline 1903 & 4,666.77 & 4,441 & 4,667 & & & \\
\hline 1904 & 3,594.33 & 3,392 & 3,594 & & & \\
\hline 1905 & 1,117.67 & 1,051 & 1,118 & & & \\
\hline 1906 & 47.17 & 44 & 47 & & & \\
\hline 1907 & 2,698.75 & 2,511 & 2,699 & & & \\
\hline 1908 & 25.33 & 23 & 25 & & & \\
\hline 1910 & 3,877.34 & 3,565 & 3,877 & & & \\
\hline 1911 & 1,777.73 & 1,627 & 1,778 & & & \\
\hline 1913 & 9,357.93 & 8,491 & 9,358 & & & \\
\hline 1914 & 749.85 & 677 & 750 & & & \\
\hline 1915 & 509.93 & 458 & 510 & & & \\
\hline 1916 & 135.27 & 121 & 135 & & & \\
\hline 1917 & 1,493.94 & 1,331 & 1,494 & & & \\
\hline 1918 & 359.77 & 319 & 360 & & & \\
\hline 1919 & 187.62 & 166 & 188 & & & \\
\hline 1920 & 6,111. 32 & 5,368 & 6,111 & & & \\
\hline 1921 & 6,630.36 & 5,795 & 6,630 & & & \\
\hline 1922 & 6,993.61 & 6,084 & 6,994 & & & \\
\hline 1923 & 9,520.02 & 8,241 & 9,520 & & & \\
\hline 1924 & 22,669.01 & 19,525 & 22,600 & 69 & 4.16 & 17 \\
\hline 1925 & 14,443.18 & 12,378 & 14,328 & 115 & 4.29 & 27 \\
\hline 1926 & 41,559.63 & 35,423 & 41,002 & 558 & 4.43 & 126 \\
\hline 1927 & 44,305.11 & 37,571 & 43,488 & 817 & 4.56 & 179 \\
\hline 1928 & 82,981.50 & 69,981 & 81,003 & 1,978 & 4.70 & 421 \\
\hline 1929 & 15,050.60 & 12,627 & 14,616 & 435 & 4.83 & 90 \\
\hline 1930 & 17,202.78 & 14,353 & 16,614 & 589 & 4.97 & 119 \\
\hline 1931 & 53,213.78 & 44,150 & 51,104 & 2,110 & 5.11 & 413 \\
\hline 1932 & 11,122.80 & 9,176 & 10,621 & 502 & 5.25 & 96 \\
\hline 1933 & 28,548.19 & 23,419 & 27,107 & 1,441 & 5.39 & 267 \\
\hline 1934 & 41,042.01 & 33,477 & 38,750 & 2,292 & 5.53 & 414 \\
\hline 1935 & 26,596.58 & 21,570 & 24,967 & 1,630 & 5.67 & 287 \\
\hline 1936 & 4,374.66 & 3,526 & 4,081 & 294 & 5.82 & 51 \\
\hline 1937 & 33,254.40 & 26,637 & 30,832 & 2,422 & 5.97 & 406 \\
\hline 1938 & 418.32 & 333 & 385 & 33 & 6.11 & 5 \\
\hline 1939 & 22,185.36 & 17,556 & 20,321 & 1,864 & 6.26 & 298 \\
\hline 1940 & 10,907.64 & 8,577 & 9,928 & 980 & 6.41 & 153 \\
\hline 1941 & 36,822.76 & 28,759 & 33,289 & 3,534 & 6.57 & 538 \\
\hline 1942 & 9,645.92 & 7,485 & 8,664 & 982 & 6.72 & 146 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 373 STREET LIGHTING EQUIPMENT
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1943 & 9,856.97 & 7,600 & 8,797 & 1,060 & 6.87 & 154 \\
\hline 1944 & 1,744.44 & 1,336 & 1,546 & 198 & 7.03 & 28 \\
\hline 1945 & 3,382.79 & 2,572 & 2,977 & 406 & 7.19 & 56 \\
\hline 1946 & 4,090.19 & 3,088 & 3,574 & 516 & 7.35 & 70 \\
\hline 1947 & 2,957.51 & 2,217 & 2,566 & 392 & 7.51 & 52 \\
\hline 1948 & 8,613.08 & 6,408 & 7,417 & 1,196 & 7.68 & 156 \\
\hline 1949 & 4,656.99 & 3,440 & 3,982 & 675 & 7.84 & 86 \\
\hline 1950 & 18,344.30 & 13,446 & 15,564 & 2,780 & 8.01 & 347 \\
\hline 1951 & 27,239.49 & 19,812 & 22,932 & 4,307 & 8.18 & 527 \\
\hline 1952 & 25,321.61 & 18,274 & 21,152 & 4,170 & 8.35 & 499 \\
\hline 1953 & 28,837.94 & 20,648 & 23,900 & 4,938 & 8.52 & 580 \\
\hline 1954 & 30,129.48 & 21,392 & 24,761 & 5,368 & 8.70 & 617 \\
\hline 1955 & 70,594.29 & 49,722 & 57,553 & 13,041 & 8.87 & 1,470 \\
\hline 1956 & 52,667.16 & 36,779 & 42,572 & 10,095 & 9.05 & 1,115 \\
\hline 1957 & 39,636.77 & 27,442 & 31,764 & 7,873 & 9.23 & 853 \\
\hline 1958 & 67,790.47 & 46,504 & 53,828 & 13,962 & 9.42 & 1,482 \\
\hline 1959 & 117,288.89 & 79,756 & 92,318 & 24,971 & 9.60 & 2,601 \\
\hline 1960 & 112,927.17 & 76,076 & 88,058 & 24,869 & 9.79 & 2,540 \\
\hline 1961 & 82,469.20 & 55,034 & 63,702 & 18,767 & 9.98 & 1,880 \\
\hline 1962 & 142,254.79 & 94,030 & 108,840 & 33,415 & 10.17 & 3,286 \\
\hline 1963 & 77,092.83 & 50,444 & 58,389 & 18,704 & 10.37 & 1,804 \\
\hline 1964 & 70,003.65 & 45,339 & 52,480 & 17,524 & 10.57 & 1,658 \\
\hline 1965 & 172,687.12 & 110,692 & 128,126 & 44,561 & 10.77 & 4,138 \\
\hline 1966 & 170,408.75 & 108,095 & 125,120 & 45,289 & 10.97 & 4,128 \\
\hline 1967 & 182,698.99 & 114,613 & 132,665 & 50,034 & 11.18 & 4,475 \\
\hline 1968 & 100,905.48 & 62,629 & 72,493 & 28,412 & 11.38 & 2,497 \\
\hline 1969 & 191,138.54 & 117,296 & 135,770 & 55,369 & 11.59 & 4,777 \\
\hline 1970 & 402,132.40 & 243,825 & 282,227 & 119,905 & 11.81 & 10,153 \\
\hline 1971 & 178,990.81 & 107,275 & 124,171 & 54,820 & 12.02 & 4,561 \\
\hline 1972 & 199,772.90 & 118,266 & 136,893 & 62,880 & 12.24 & 5,137 \\
\hline 1973 & 354,658.23 & 207,237 & 239,877 & 114,781 & 12.47 & 9,205 \\
\hline 1974 & 206,834.43 & 119,343 & 138,139 & 68,695 & 12.69 & 5,413 \\
\hline 1975 & 204,468.98 & 116,410 & 134,745 & 69,724 & 12.92 & 5,397 \\
\hline 1976 & 272,833.85 & 153,243 & 177,379 & 95,455 & 13.15 & 7,259 \\
\hline 1977 & 173,937.76 & 96,304 & 111,472 & 62,466 & 13.39 & 4,665 \\
\hline 1978 & 272,491.43 & 148,690 & 172,109 & 100,382 & 13.63 & 7,365 \\
\hline 1979 & 722,246.40 & 388,330 & 449,492 & 272,754 & 13.87 & 19,665 \\
\hline 1980 & 812,323.97 & 429,987 & 497,710 & 314,614 & 14.12 & 22,281 \\
\hline 1981 & 853,660.94 & 444,757 & 514,806 & 338,855 & 14.37 & 23,581 \\
\hline 1982 & 1,671,717.64 & 857,039 & 992,022 & 679,696 & 14.62 & 46,491 \\
\hline 1983 & 1,991,149.99 & 1,502,522 & 1,739,169 & 251,981 & 12.52 & 20,126 \\
\hline 1984 & 2,046,387.51 & 1,527,014 & 1,767,518 & 278,870 & 12.75 & 21,872 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 373 STREET LIGHTING EQUIPMENT
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1985 & 1,292,063.03 & 952,638 & 1,102,678 & 189,385 & 13.00 & 14,568 \\
\hline 1986 & 869,394.97 & 635,789 & 735,925 & 133,470 & 13.04 & 10,235 \\
\hline 1987 & 573,394.03 & 413,417 & 478,530 & 94,864 & 13.35 & 7,106 \\
\hline 1988 & 507,100.76 & 361,867 & 418,861 & 88,240 & 13.45 & 6,561 \\
\hline 1989 & 339,069.57 & 239,112 & 276,772 & 62,298 & 13.59 & 4,584 \\
\hline 1990 & 522,414.54 & 363,705 & 420,988 & 101,427 & 13.75 & 7,377 \\
\hline 1991 & 569,482.24 & 390,779 & 452,327 & 117,155 & 13.95 & 8,398 \\
\hline 1992 & 473,456.55 & 319,867 & 370,246 & 103,211 & 14.17 & 7,284 \\
\hline 1993 & 837,545.76 & 558,559 & 646,532 & 191,014 & 14.24 & 13,414 \\
\hline 1994 & 1,095,522.80 & 719,978 & 833,374 & 262,149 & 14.34 & 18,281 \\
\hline 1995 & 894,514.59 & 578,393 & 669,490 & 225,025 & 14.48 & 15,540 \\
\hline 1996 & 1,031,780.59 & 655,181 & 758,372 & 273,409 & 14.66 & 18,650 \\
\hline 1997 & 587.03 & 365 & 422 & 165 & 14.87 & 11 \\
\hline 1998 & 3,275.48 & 2,001 & 2,316 & 959 & 14.96 & 64 \\
\hline 1999 & 2,384,096.92 & 1,426,882 & 1,651,615 & 732,482 & 15.09 & 48,541 \\
\hline 2000 & 629,967.49 & 368,405 & 426,429 & 203,538 & 15.26 & 13,338 \\
\hline 2002 & 309,787.10 & 172,180 & 199,298 & 110,489 & 15.59 & 7,087 \\
\hline 2003 & 557.37 & 302 & 350 & 207 & 15.63 & 13 \\
\hline 2004 & 281,628.50 & 148,362 & 171,729 & 109,900 & 15.72 & 6,991 \\
\hline 2005 & 1,817,057.79 & 926,336 & 1,072,233 & 744,825 & 15.86 & 46,962 \\
\hline 2006 & 242,282.89 & 119,421 & 138,230 & 104,053 & 15.95 & 6,524 \\
\hline 2007 & 1,767,388.76 & 840,570 & 972,959 & 794,430 & 15.99 & 49,683 \\
\hline 2008 & 4,144.26 & 1,891 & 2,189 & 1,955 & 16.09 & 122 \\
\hline 2009 & 439,228.49 & 191,591 & 221,766 & 217,462 & 16.15 & 13,465 \\
\hline 2010 & 1,570,370.83 & 652,018 & 754,711 & 815,660 & 16.20 & 50,349 \\
\hline 2011 & 2,231,680.14 & 876,381 & 1,014,411 & 1,217,269 & 16.24 & 74,955 \\
\hline 2012 & 22,552.12 & 8,335 & 9,648 & 12,904 & 16.21 & 796 \\
\hline 2013 & 350,393.33 & 120,605 & 139,600 & 210,793 & 16.19 & 13,020 \\
\hline 2014 & 641,018.87 & 202,882 & 234,836 & 406,183 & 16.20 & 25,073 \\
\hline 2015 & 774,861.92 & 222,618 & 257,680 & 517,182 & 16.12 & 32,083 \\
\hline 2016 & 1,249,813.05 & 319,702 & 370,055 & 879,758 & 16.00 & 54,985 \\
\hline 2017 & 1,381,495.10 & 305,310 & 353,396 & 1,028,099 & 15.87 & 64,783 \\
\hline 2018 & 1,246,530.71 & 228,115 & 264,043 & 982,488 & 15.62 & 62,899 \\
\hline 2019 & 1,700,782.84 & 238,960 & 276,596 & 1,424,187 & 15.29 & 93,145 \\
\hline 2020 & 1,650,891.92 & 152,212 & 176,185 & 1,474,707 & 14.76 & 99,912 \\
\hline 2021 & 1,407,815.98 & 49,837 & 57,686 & 1,350,130 & 13.62 & 99,128 \\
\hline & 43,886,987.99 & 21,916,586 & 25,364,102 & 18,522,886 & & 1,255,027 \\
\hline \multicolumn{3}{|r|}{COMPOSITE REMAINING LIFE AND} & \multicolumn{3}{|l|}{ANNUAL ACCRUAL RATE, PERCENT . 14.8} & 2.86 \\
\hline
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

MANCHESTER FACILITY
FULLY ACCRUED
\begin{tabular}{rrrr}
1986 & \(72,753.01\) & 72,753 & 72,753 \\
1989 & \(42,805.51\) & 42,806 & 42,806 \\
1990 & \(56,762.89\) & 56,763 & 56,763 \\
1991 & \(6,822.59\) & 6,823 & 6,823 \\
1993 & \(14,855.36\) & 14,855 & 14,855 \\
1994 & \(38,204.69\) & 38,205 & 38,205 \\
1995 & \(34,201.35\) & 34,201 & 34,201 \\
1996 & \(15,914.81\) & 15,915 & 15,915 \\
1997 & \(7,985.20\) & 7,985 & 7,985 \\
1998 & \(44,526.07\) & 44,526 & 44,526 \\
1999 & \(18,639.11\) & 18,639 & 18,639 \\
2002 & \(2,790.44\) & 2,790 & 2,790 \\
2003 & \(15,761.05\) & 15,761 & 15,761 \\
2004 & \(97,964.29\) & 97,964 & 97,964 \\
2005 & \(41,986.42\) & 41,986 & 41,986 \\
2006 & \(38,137.34\) & 38,137 & 38,137 \\
2009 & \(29,612.90\) & 29,613 & 29,613 \\
& & & \\
& \(579,723.03\) & 579,722 & 579,723
\end{tabular}

MANCHESTER FACILITY - SEYMORE BUILDING INTERIM SURVIVOR CURVE.. IOWA 58-R2 PROBABLE RETIREMENT YEAR.. 6-2059
\begin{tabular}{rrrrrrr}
2009 & \(717,757.40\) & 210,877 & 213,343 & 504,415 & 30.05 & 16,786 \\
2010 & 197.41 & 54 & 55 & 143 & 30.17 & 5 \\
2011 & \(217,902.26\) & 56,044 & 56,699 & 161,203 & 30.32 & 5,317 \\
2012 & \(317,861.63\) & 75,492 & 76,375 & 241,487 & 30.50 & 7,918 \\
2013 & \(541,535.83\) & 117,838 & 119,216 & 422,320 & 30.56 & 13,819 \\
2014 & \(75,910.78\) & 14,916 & 15,090 & 60,820 & 30.67 & 1,983 \\
2015 & \(567,409.68\) & 98,843 & 99,999 & 467,411 & 30.81 & 15,171 \\
2016 & \(1,067,874.35\) & 162,103 & 163,998 & 903,876 & 30.73 & 29,413 \\
2017 & \(292,389.80\) & 37,367 & 37,804 & 254,586 & 30.71 & 8,290 \\
2018 & \(69,065.79\) & 7,086 & 7,169 & 61,897 & 30.63 & 2,021 \\
2019 & \(24,306.24\) & 1,847 & 1,869 & 22,438 & 30.39 & 738 \\
2020 & \(1,161,060.19\) & 55,383 & 56,031 & \(1,105,030\) & 29.95 & 36,896 \\
2021 & \(2,083,656.62\) & 35,839 & 36,258 & \(2,047,399\) & 28.49 & 71,864 \\
& & & & & & \\
& \(7,136,927.98\) & 873,689 & 883,905 & \(6,253,023\) & & 210,221
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

KIRKWOOD STREET HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2021
\begin{tabular}{rrrr}
1970 & \(125,095.85\) & 125,096 & 125,096 \\
1971 & \(2,145.58\) & 2,146 & 2,145 \\
& \(127,241.43\) & 127,242 & 127,241
\end{tabular}

MCKEESPORT HEADQUARTERS AND SERVICE CENTER INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2069
\begin{tabular}{rrrrrrr}
2005 & 789.49 & 263 & 266 & 523 & 33.00 & 16 \\
2011 & 345.06 & 80 & 81 & 264 & 34.55 & 8 \\
2012 & \(56,658.10\) & 12,114 & 12,256 & 44,402 & 34.94 & 1,271 \\
2013 & \(28,659.46\) & 5,603 & 5,669 & 22,991 & 34.98 & 657 \\
2014 & \(8,745,657.64\) & \(1,534,863\) & \(1,552,857\) & \(7,192,801\) & 35.24 & 204,109 \\
2017 & \(76,466.78\) & 8,641 & 8,742 & 67,724 & 35.34 & 1,916 \\
2018 & \(310,349.16\) & 28,025 & 28,354 & 281,996 & 35.26 & 7,998 \\
2020 & \(2,021.52\) & 84 & 85 & 1,937 & 34.47 & 56 \\
2021 & \(2,083,656.62\) & 31,672 & 32,043 & \(2,051,613\) & 32.50 & 63,127 \\
& \(11,304,603.83\) & \(1,621,345\) & \(1,640,353\) & \(9,664,251\) & & 279,158
\end{tabular}

EASTERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. \(6-2043\)
\begin{tabular}{rrrrrrr}
1963 & \(763,741.19\) & 581,444 & 588,260 & 175,481 & 13.56 & 12,941 \\
1966 & \(35,005.31\) & 26,099 & 26,405 & 8,600 & 14.32 & 601 \\
1967 & \(6,712.00\) & 4,968 & 5,026 & 1,686 & 14.57 & 116 \\
1968 & \(2,398.79\) & 398.78 & 1,763 & 291 & 2,784 & 615 \\
1969 & \(14,532.88\) & 10,522 & 10,645 & 104 & 15.05 & 42 \\
1970 & \(1,712.80\) & 1,231 & 1,245 & 3,888 & 15.28 & 7 \\
1971 & 309.59 & 219 & 222 & 467 & 15.51 & 254 \\
1973 & \(50,454.49\) & 35,391 & 35,806 & 88 & 15.95 & 30 \\
1974 & \(6,520.93\) & 4,538 & 4,591 & 14,649 & 16.17 & 6 \\
1975 & \(4,975.42\) & 3,342 & 3,381 & 1,930 & 16.37 & 906 \\
1979 & \(3,063.80\) & 2,039 & 2,063 & 1,594 & 17.15 & 118 \\
1980 & \(13,876.60\) & 9,147 & 9,254 & 1,001 & 17.33 & 93 \\
1981 & \(1,203.92\) & 786 & 795 & 4,622 & 17.50 & 58 \\
1982 & \(45,119.79\) & 31,268 & 31,635 & 409 & 17.67 & 264 \\
1983 & & & & 13,485 & 17.06 & 23 \\
& & & & & 790
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

EASTERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2043
\begin{tabular}{rrrrrrr}
1984 & \(187,708.72\) & 128,806 & 130,316 & 57,393 & 17.15 & 3,347 \\
1986 & \(528,650.17\) & 354,724 & 358,883 & 169,768 & 17.41 & 9,751 \\
1987 & \(7,969.56\) & 5,279 & 5,341 & 2,629 & 17.58 & 150 \\
1988 & \(159,195.66\) & 103,987 & 105,206 & 53,990 & 17.78 & 3,037 \\
1989 & \(42,559.22\) & 27,387 & 27,708 & 14,851 & 18.01 & 825 \\
1990 & \(231,419.07\) & 147,252 & 148,978 & 82,441 & 18.00 & 4,580 \\
1991 & \(459,655.52\) & 287,377 & 290,746 & 168,909 & 18.28 & 9,240 \\
1992 & \(109,592.22\) & 67,575 & 68,367 & 41,225 & 18.34 & 2,248 \\
1994 & \(47,651.72\) & 28,439 & 28,772 & 18,879 & 18.58 & 1,016 \\
1995 & \(172,803.05\) & 101,193 & 102,379 & 70,424 & 18.75 & 3,756 \\
1996 & \(114,662.00\) & 66,080 & 66,855 & 47,807 & 18.75 & 2,550 \\
1997 & \(34,103.73\) & 19,303 & 19,529 & 14,574 & 18.79 & 776 \\
1998 & \(5,020.01\) & 2,784 & 2,817 & 2,203 & 18.87 & 117 \\
1999 & \(61,540.30\) & 33,367 & 33,758 & 27,782 & 19.00 & 1,462 \\
2000 & \(86,444.69\) & 45,721 & 46,257 & 40,188 & 19.15 & 2,099 \\
2003 & \(11,430.20\) & 5,583 & 5,648 & 5,782 & 19.38 & 298 \\
2004 & \(791,163.92\) & 375,170 & 379,568 & 411,596 & 19.40 & 21,216 \\
200 & \(369,432.29\) & 169,459 & 171,446 & 197,987 & 19.47 & 10,169 \\
2007 & \(884,365.38\) & 375,678 & 380,082 & 504,283 & 19.63 & 25,689 \\
2009 & \(142,524.99\) & 55,414 & 56,064 & 86,461 & 19.65 & 4,400 \\
2010 & \(117,515.54\) & 43,246 & 43,753 & 73,763 & 19.75 & 3,735 \\
2011 & \(680,437.10\) & 235,771 & 238,535 & 441,902 & 19.80 & 22,318 \\
2012 & \(1,226,891.07\) & 397,513 & 402,173 & 824,718 & 19.82 & 41,610 \\
2013 & \(47,033.39\) & 14,110 & 14,275 & 32,758 & 19.83 & 1,652 \\
2014 & \(698,058.93\) & 191,617 & 193,863 & 504,196 & 19.82 & 25,439 \\
2017 & \(290,289.00\) & 53,703 & 54,333 & 235,956 & 19.83 & 11,899 \\
2018 & \(3,773,188.27\) & 566,733 & 573,377 & \(3,199,811\) & 19.81 & 161,525 \\
2019 & \(2,242,383.33\) & 252,268 & 255,225 & \(1,987,158\) & 19.72 & 100,769 \\
2020 & \(144,039.92\) & 10,284 & 10,405 & 133,635 & 19.51 & 6,850 \\
2021 & \(2,083,656.62\) & 53,758 & 54,388 & \(2,029,268\) & 18.88 & 107,482 \\
& & & & & &
\end{tabular}

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039
\begin{tabular}{rrrrrrr}
1963 & \(4,207.27\) & 3,293 & 3,332 & 876 & 12.19 & 72 \\
1964 & \(636,606.00\) & 495,490 & 501,299 & 135,307 & 12.38 & 10,929 \\
1967 & \(2,701.54\) & 2,068 & 2,092 & 609 & 12.92 & 47
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)
ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

\section*{ALLOC. BOOK RESERVE}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL
ACCRUAL
(7)

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1970 & 215,286.77 & 161,902 & 163,800 & 51,487 & 13.43 & 3,834 \\
\hline 1972 & 13,721.57 & 10,192 & 10,311 & 3,410 & 13.75 & 248 \\
\hline 1975 & 6,768.37 & 4,930 & 4,988 & 1,781 & 14.19 & 126 \\
\hline 1977 & 22,451.12 & 16,129 & 16,318 & 6,133 & 14.46 & 424 \\
\hline 1978 & 10,948.61 & 7,808 & 7,900 & 3,049 & 14.59 & 209 \\
\hline 1979 & 35,017.57 & 24,786 & 25,077 & 9,941 & 14.72 & 675 \\
\hline 1982 & 46,647.04 & 32,246 & 32,624 & 14,023 & 15.06 & 931 \\
\hline 1983 & 73,273.43 & 53,035 & 53,657 & 19,617 & 14.69 & 1,335 \\
\hline 1984 & 133,055.69 & 95,294 & 96,411 & 36,645 & 14.86 & 2,466 \\
\hline 1986 & 479,597.04 & 337,109 & 341,061 & 138,536 & 15.01 & 9,230 \\
\hline 1988 & 16,004.75 & 10,992 & 11,121 & 4,884 & 15.28 & 320 \\
\hline 1989 & 3,321.57 & 2,256 & 2,282 & 1,039 & 15.35 & 68 \\
\hline 1990 & 59,472.81 & 39,906 & 40,374 & 19,099 & 15.45 & 1,236 \\
\hline 1991 & 44,799.19 & 29,787 & 30,136 & 14,663 & 15.37 & 954 \\
\hline 1993 & 67,328.74 & 43,562 & 44,073 & 23,256 & 15.55 & 1,496 \\
\hline 1994 & 47,686.25 & 30,424 & 30,781 & 16,906 & 15.60 & 1,084 \\
\hline 1995 & 8,477.09 & 5,324 & 5,386 & 3,091 & 15.70 & 197 \\
\hline 1996 & 32,193.92 & 19,867 & 20,100 & 12,094 & 15.82 & 764 \\
\hline 1998 & 48,649.81 & 29,039 & 29,379 & 19,270 & 15.87 & 1,214 \\
\hline 1999 & 18,342.22 & 10,730 & 10,856 & 7,486 & 15.96 & 469 \\
\hline 2000 & 110,538.40 & 63,217 & 63,958 & 46,580 & 16.09 & 2,895 \\
\hline 2001 & 4,012.92 & 2,246 & 2,272 & 1,741 & 16.13 & 108 \\
\hline 2002 & 53,485.02 & 29,203 & 29,545 & 23,940 & 16.21 & 1,477 \\
\hline 2003 & 71,739.29 & 38,223 & 38,671 & 33,068 & 16.22 & 2,039 \\
\hline 2004 & 277,883.08 & 143,943 & 145,630 & 132,253 & 16.28 & 8,124 \\
\hline 2005 & 111,532.14 & 56,123 & 56,781 & 54,751 & 16.29 & 3,361 \\
\hline 2006 & 571,766.37 & 278,279 & 281,541 & 290,225 & 16.35 & 17,751 \\
\hline 2008 & 136,831.05 & 61,875 & 62,600 & 74,231 & 16.35 & 4,540 \\
\hline 2009 & 1,088,002.87 & 470,561 & 476,078 & 611,925 & 16.40 & 37,312 \\
\hline 2010 & 443,786.94 & 182,707 & 184,849 & 258,938 & 16.43 & 15,760 \\
\hline 2011 & 973,293.11 & 379,195 & 383,640 & 589,653 & 16.45 & 35,845 \\
\hline 2012 & 606,590.34 & 221,891 & 224,492 & 382,098 & 16.47 & 23,200 \\
\hline 2013 & 416,262.05 & 141,529 & 143,188 & 273,074 & 16.50 & 16,550 \\
\hline 2014 & 158,380.42 & 49,415 & 49,994 & 108,386 & 16.54 & 6,553 \\
\hline 2017 & 175,358.18 & 37,562 & 38,002 & 137,356 & 16.51 & 8,320 \\
\hline 2018 & 502,314.07 & 87,905 & 88,936 & 413,379 & 16.50 & 25,053 \\
\hline 2019 & 469,439.57 & 62,060 & 62,788 & 406,652 & 16.40 & 24,796 \\
\hline 2021 & 1,562,742.47 & 47,820 & 48,381 & 1,514,362 & 15.87 & 95,423 \\
\hline & 9,760,516.66 & 3,819,923 & 3,864,705 & 5,895,812 & & 367,435 \\
\hline
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline \multicolumn{7}{|l|}{WESTERN DISTRICT HEADQUARTERS} \\
\hline \multicolumn{7}{|l|}{INTERIM SURVIVOR CURVE.. IOWA 58-R2} \\
\hline \multicolumn{7}{|l|}{PROBABLE RETIREMENT YEAR.. 6-2038} \\
\hline 1968 & 557,788.70 & 428,912 & 433,940 & 123,849 & 12.59 & 9,837 \\
\hline 1969 & 188.85 & 144 & 146 & 43 & 12.75 & 3 \\
\hline 1976 & 14,704.21 & 10,781 & 10,907 & 3,797 & 13.70 & 277 \\
\hline 1977 & 11,934.29 & 8,692 & 8,794 & 3,140 & 13.82 & 227 \\
\hline 1978 & 255.94 & 185 & 187 & 69 & 13.94 & 5 \\
\hline 1983 & 1,450.41 & 1,061 & 1,073 & 377 & 14.13 & 27 \\
\hline 1984 & 215,204.85 & 156,562 & 158,397 & 56,807 & 14.05 & 4,043 \\
\hline 1985 & 27,238.65 & 19,585 & 19,815 & 7,424 & 14.26 & 521 \\
\hline 1992 & 123,857.87 & 82,576 & 83,544 & 40,314 & 14.75 & 2,733 \\
\hline 1993 & 145,724.42 & 95,945 & 97,070 & 48,655 & 14.79 & 3,290 \\
\hline 1994 & 5,242.13 & 3,402 & 3,442 & 1,800 & 14.87 & 121 \\
\hline 1995 & 93,754.40 & 59,872 & 60,574 & 33,181 & 15.00 & 2,212 \\
\hline 1996 & 3,656.21 & 2,303 & 2,330 & 1,326 & 14.99 & 88 \\
\hline 1997 & 22,292.39 & 13,817 & 13,979 & 8,313 & 15.03 & 553 \\
\hline 1998 & 22,292.39 & 13,567 & 13,726 & 8,566 & 15.11 & 567 \\
\hline 1999 & 72,480.54 & 43,213 & 43,720 & 28,761 & 15.24 & 1,887 \\
\hline 2000 & 426,623.07 & 249,489 & 252,414 & 174,209 & 15.26 & 11,416 \\
\hline 2006 & 172,736.47 & 86,472 & 87,486 & 85,251 & 15.46 & 5,514 \\
\hline 2011 & 458,794.05 & 184,527 & 186,690 & 272,104 & 15.61 & 17,431 \\
\hline 2017 & 81,446.49 & 18,179 & 18,392 & 63,054 & 15.66 & 4,026 \\
\hline 2018 & 1,387,300.30 & 253,876 & 256,852 & 1,130,448 & 15.62 & 72,372 \\
\hline 2021 & 1,562,742.47 & 50,164 & 50,752 & 1,511,990 & 15.08 & 100,265 \\
\hline & 5,407,709.10 & 1,783,324 & 1,804,230 & 3,603,479 & & 237,415 \\
\hline
\end{tabular}

CENTRAL DOWNTOWN - UNDERGROUND
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2027
\begin{tabular}{rrrrrrr}
1999 & \(18,342.22\) & 14,775 & 14,948 & 3,394 & 5.43 & 625 \\
2001 & \(6,608.19\) & 5,229 & 5,290 & 1,318 & 5.41 & 244 \\
2004 & \(15,679.72\) & 11,964 & 12,104 & 3,575 & 5.44 & 657 \\
& \(40,630.13\) & 31,968 & 32,343 & 8,287 & & 1,526
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR COST
(1)
(2)
\(\begin{array}{cc}\text { CALCULATED ALLOC. BOOK } \\ \text { ACCRUED } & \text { RESERVE }\end{array}\)
(4)
FUTURE BOOK REM. ANNUAL ACCRUALS
(5)
LIFE ACCRUAL
(6)
(7)

WOODS RUN \#1 SS\&S CENTRAL DISTRICT INTERIM SURVIVOR CURVE.. IOWA 58-R2 PROBABLE RETIREMENT YEAR.. 6-2036
\begin{tabular}{rrrrrrr}
1980 & \(19,288.25\) & 14,196 & 14,362 & 4,926 & 12.73 & 387 \\
1983 & \(2,331.70\) & 1,751 & 1,772 & 560 & 12.78 & 44 \\
1988 & \(9,342.33\) & 6,728 & 6,807 & 2,535 & 13.01 & 195 \\
1989 & \(5,588.57\) & 3,978 & 4,025 & 1,564 & 13.16 & 119 \\
1992 & \(9,149.42\) & 6,316 & 6,390 & 2,759 & 13.24 & 208 \\
1995 & \(108,248.42\) & 72,007 & 72,851 & 35,397 & 13.34 & 2,653 \\
1996 & \(19,712.60\) & 12,920 & 13,071 & 6,641 & 13.41 & 495 \\
2000 & \(21,920.47\) & 13,433 & 13,590 & 8,330 & 13.59 & 613 \\
2001 & \(608,086.00\) & 365,216 & 369,498 & 238,588 & 13.63 & 17,505 \\
2002 & \(110,216.69\) & 64,907 & 65,668 & 44,549 & 13.61 & 3,273 \\
2003 & 393.51 & 226 & 229 & 165 & 13.65 & 12 \\
2004 & \(53,270.31\) & 29,831 & 30,181 & 23,090 & 13.75 & 1,679 \\
2005 & \(29,421.83\) & 16,070 & 16,258 & 13,163 & 13.71 & 960 \\
2010 & \(128,643.52\) & 58,430 & 59,115 & 69,529 & 13.82 & 5,031 \\
2011 & \(265,847.78\) & 114,740 & 116,085 & 149,763 & 13.83 & 10,829 \\
2012 & \(204,961.73\) & 83,337 & 84,314 & 120,648 & 13.86 & 8,705 \\
2014 & \(61,180.72\) & 21,425 & 21,676 & 39,505 & 13.91 & 2,840 \\
2016 & \(168,370.19\) & 47,783 & 48,343 & 120,027 & 13.88 & 8,647 \\
2017 & \(422,802.46\) & 103,502 & 104,715 & 318,087 & 13.88 & 22,917 \\
2019 & \(9,775.80\) & 1,498 & 1,516 & 8,260 & 13.81 & 598 \\
2021 & \(1,041,828.31\) & 37,402 & 37,840 & \(1,003,988\) & 13.43 & 74,757 \\
& & & & & & \\
& \(3,300,380.61\) & \(1,075,696\) & \(1,088,307\) & \(2,212,074\) & & 162,467
\end{tabular}

WOODS RUN \#2 SOC
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2048
\begin{tabular}{rrrrrrr}
1978 & \(364,705.29\) & 235,060 & 237,816 & 126,890 & 19.37 & 6,551 \\
1980 & \(76,422.92\) & 48,166 & 48,731 & 27,692 & 19.90 & 1,392 \\
1981 & \(11,189.13\) & 6,969 & 7,051 & 4,138 & 20.16 & 205 \\
1983 & \(28,599.00\) & 19,047 & 19,270 & 9,329 & 19.31 & 483 \\
1985 & \(24,290.54\) & 15,692 & 15,876 & 8,415 & 20.00 & 421 \\
1987 & \(10,641.73\) & 6,682 & 6,760 & 3,881 & 20.45 & 190 \\
1989 & \(1,571.49\) & 960 & 971 & 600 & 20.69 & 29 \\
1990 & \(108,454.19\) & 65,246 & 66,011 & 42,443 & 20.86 & 2,035 \\
1991 & \(24,869.57\) & 14,715 & 14,888 & 9,982 & 21.05 & 474 \\
1992 & \(28,594.86\) & 16,619 & 16,814 & 11,781 & 21.26 & 554 \\
1994 & \(5,927.49\) & 3,325 & 3,364 & 2,564 & 21.52 & 119 \\
1996 & \(62,222.38\) & 33,476 & 33,868 & 28,354 & 21.90 & 1,295
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

\section*{ALLOC. BOOK RESERVE}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE ACCRUAL
(6)

ANNUAL
(7)

WOODS RUN \#2 SOC
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2048
\begin{tabular}{rrrrrrr}
1997 & \(355,041.93\) & 187,036 & 189,229 & 165,813 & 22.01 & 7,534 \\
1998 & \(664,728.08\) & 342,069 & 346,079 & 318,649 & 22.16 & 14,379 \\
2000 & \(82,102.31\) & 40,066 & 40,536 & 41,567 & 22.56 & 1,843 \\
2001 & \(1,812,941.45\) & 862,235 & 872,343 & 940,598 & 22.60 & 41,619 \\
2002 & \(1,177,675.54\) & 544,322 & 550,703 & 626,972 & 22.69 & 27,632 \\
2003 & \(478,690.44\) & 214,310 & 216,822 & 261,868 & 22.82 & 11,475 \\
2004 & \(57,959.12\) & 25,050 & 25,344 & 32,615 & 22.99 & 1,419 \\
2005 & \(9,296.15\) & 3,880 & 3,925 & 5,371 & 23.03 & 233 \\
2006 & \(138,063.48\) & 55,419 & 56,069 & 81,995 & 23.11 & 3,548 \\
2007 & \(65,303.96\) & 25,090 & 25,384 & 39,920 & 23.24 & 1,718 \\
2008 & \(25,678.51\) & 9,393 & 9,503 & 16,175 & 23.40 & 691 \\
2009 & 380.29 & 132 & 134 & 247 & 23.47 & 11 \\
2010 & \(16,712.84\) & 5,497 & 5,561 & 11,151 & 23.47 & 475 \\
2011 & \(367,093.22\) & 113,322 & 114,651 & 252,443 & 23.51 & 10,738 \\
2012 & \(716,482.47\) & 205,559 & 207,969 & 508,514 & 23.61 & 21,538 \\
2013 & \(435,240.27\) & 115,078 & 116,427 & 318,813 & 23.65 & 13,480 \\
2014 & \(74,755.32\) & 18,001 & 18,212 & 56,543 & 23.65 & 2,391 \\
2015 & \(147,042.13\) & 31,643 & 32,014 & 115,028 & 23.71 & 4,851 \\
2017 & \(2,546,958.50\) & 407,004 & 411,775 & \(2,135,183\) & 23.67 & 90,206 \\
2018 & \(6,568,086.25\) & 848,597 & 858,545 & \(5,709,541\) & 23.60 & 241,930 \\
2019 & \(1,266,839.12\) & 121,870 & 123,299 & \(1,143,540\) & 23.48 & 48,703 \\
2021 & \(3,585,870.82\) & 78,889 & 79,814 & \(3,506,057\) & 22.28 & 157,363
\end{tabular}

WOODS RUN \#3 OFFICE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1980 & \(10,643.90\) & 6,919 & 7,000 & 3,644 & 18.43 & 198 \\
1983 & \(28,554.29\) & 19,457 & 19,685 & 8,869 & 18.00 & 493 \\
1984 & \(46,864.99\) & 31,456 & 31,825 & 15,040 & 18.37 & 819 \\
1986 & \(84,544.03\) & 55,529 & 56,180 & 28,364 & 18.55 & 1,529 \\
1987 & \(584,429.17\) & 379,061 & 383,505 & 200,924 & 18.69 & 10,750 \\
1988 & \(46,209.32\) & 29,565 & 29,912 & 16,298 & 18.86 & 864 \\
1989 & \(106,558.83\) & 67,185 & 67,973 & 38,586 & 19.05 & 2,026 \\
1990 & \(2,040,384.18\) & \(1,266,262\) & \(1,281,107\) & 759,277 & 19.26 & 39,422 \\
1991 & \(175,326.20\) & 106,949 & 108,203 & 67,123 & 19.50 & 3,442 \\
1992 & \(84,302.22\) & 50,733 & 51,328 & 32,974 & 19.52 & 1,689 \\
1993 & \(137,702.35\) & 81,244 & 82,196 & 55,506 & 19.81 & 2,802
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

ALLOC. BOOK
RESERVE
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE ACCRUAL
(6)

ANNUAL
(7)

WOODS RUN \#3 OFFICE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1994 & \(73,806.25\) & 42,822 & 43,324 & 30,482 & 19.90 & 1,532 \\
1995 & \(70,875.93\) & 40,385 & 40,858 & 30,017 & 20.01 & 1,500 \\
1996 & \(454,209.21\) & 253,630 & 256,603 & 197,606 & 20.16 & 9,802 \\
1997 & \(71,092.98\) & 39,016 & 39,473 & 31,620 & 20.14 & 1,570 \\
1998 & \(54,785.65\) & 29,354 & 29,698 & 25,088 & 20.36 & 1,232 \\
1999 & \(18,672.95\) & 9,788 & 9,903 & 8,770 & 20.42 & 429 \\
2000 & \(648,980.10\) & 332,083 & 335,976 & 313,004 & 20.52 & 15,254 \\
2001 & \(5,178,656.63\) & \(2,580,007\) & \(2,610,253\) & \(2,568,403\) & 20.65 & 124,378 \\
2002 & \(506,218.24\) & 245,820 & 248,702 & 257,516 & 20.66 & 12,464 \\
2003 & \(14,587.38\) & 6,855 & 6,935 & 7,652 & 20.87 & 367 \\
2004 & \(293,940.73\) & 133,743 & 135,311 & 158,630 & 20.96 & 7,568 \\
2005 & \(1,281,401.68\) & 564,586 & 571,205 & 710,197 & 20.95 & 33,900 \\
2006 & \(21,584.04\) & 9,167 & 9,274 & 12,310 & 21.00 & 586 \\
2009 & \(144,817.12\) & 53,582 & 54,210 & 90,607 & 21.28 & 4,258 \\
2010 & \(16,168.14\) & 5,672 & 5,738 & 10,430 & 21.29 & 490 \\
2011 & \(598,331.44\) & 197,270 & 199,583 & 398,749 & 21.35 & 18,677 \\
2012 & \(158,368.55\) & 48,746 & 49,317 & 109,051 & 21.36 & 5,105 \\
2013 & \(267,842.54\) & 76,040 & 76,931 & 190,911 & 21.44 & 8,904 \\
2014 & \(768,012.69\) & 199,299 & 201,635 & 566,377 & 21.40 & 26,466 \\
2015 & \(78,728.29\) & 18,320 & 18,535 & 60,194 & 21.43 & 2,809 \\
2017 & \(1,832,738.23\) & 318,347 & 322,079 & \(1,510,659\) & 21.41 & 70,559 \\
2018 & \(130,670.74\) & 18,385 & 18,601 & 112,070 & 21.38 & 5,242 \\
2019 & \(349,048.48\) & 36,720 & 37,150 & 311,898 & 21.25 & 14,678 \\
2020 & \(11,953.25\) & 796 & 7805 & 11,148 & 21.02 & 530 \\
2021 & \(7,506,364.23\) & 180,153 & 182,265 & \(7,324,099\) & 20.29 & 360,971
\end{tabular}

WOODS RUN \#4 COMMUNICATIONS HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1980 & \(10,712.51\) & 6,964 & 7,046 & 3,667 & 18.43 & 199 \\
1983 & \(3,657.61\) & 2,492 & 2,521 & 1,136 & 18.00 & 63 \\
1986 & \(35,933.38\) & 23,601 & 23,878 & 12,056 & 18.55 & 650 \\
1988 & \(9,286.46\) & 5,941 & 6,011 & 3,276 & 18.86 & 174 \\
1994 & \(20,620.18\) & 11,964 & 12,104 & 8,516 & 19.90 & 428 \\
1996 & 744.81 & 416 & 421 & 324 & 20.16 & 16 \\
1997 & \(54,555.88\) & 29,940 & 30,291 & 24,265 & 20.14 & 1,205 \\
2000 & \(23,528.39\) & 12,039 & 12,180 & 11,348 & 20.52 & 553
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODS RUN \#4 COMMUNICATIONS HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
2001 & \(795,962.89\) & 396,549 & 401,198 & 394,765 & 20.65 & 19,117 \\
2002 & \(76,989.54\) & 37,386 & 37,824 & 39,165 & 20.66 & 1,896 \\
2003 & 442.71 & 208 & 210 & 232 & 20.87 & 11 \\
2004 & \(2,379.61\) & 1,083 & 1,096 & 1,284 & 20.96 & 61 \\
2011 & \(9,864.93\) & 3,252 & 3,290 & 6,575 & 21.35 & 308 \\
2016 & \(9,718.51\) & 1,983 & 2,006 & 7,712 & 21.46 & 359 \\
2019 & \(274,266.89\) & 28,853 & 29,191 & 245,076 & 21.25 & 11,533 \\
2020 & \(30,834.00\) & 2,054 & 2,078 & 28,756 & 21.02 & 1,368 \\
& & & & & & 37,941
\end{tabular}

WOODS RUN GUARD HOUSE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1978 & \(1,456.15\) & 966 & 977 & 479 & 18.00 & 27 \\
1980 & \(527,586.95\) & 342,979 & 347,000 & 180,587 & 18.43 & 9,799 \\
1985 & \(814,275.66\) & 540,923 & 547,264 & 267,011 & 18.45 & 14,472 \\
1986 & \(14,436.99\) & 9,482 & 9,593 & 4,844 & 18.55 & 261 \\
1987 & \(3,846.01\) & 2,495 & 2,524 & 1,322 & 18.69 & 71 \\
1988 & \(8,030.81\) & 5,138 & 5,198 & 2,833 & 18.86 & 150 \\
1990 & \(60,792.87\) & 37,728 & 38,170 & 22,623 & 19.26 & 1,175 \\
1991 & 852.26 & 520 & 526 & 326 & 19.50 & 17 \\
1996 & \(24,149.01\) & 13,485 & 13,643 & 10,506 & 20.16 & 521 \\
1998 & \(15,769.11\) & 8,449 & 8,548 & 7,221 & 20.36 & 355 \\
2000 & \(6,001.12\) & 3,071 & 3,107 & 2,894 & 20.52 & 141 \\
2001 & \(15,255.18\) & 7,600 & 7,689 & 7,566 & 20.65 & 366 \\
2009 & \(605,416.08\) & 224,004 & 226,630 & 378,786 & 21.28 & 17,800 \\
& & & & & & 45,155
\end{tabular}

RACCOON T \& D HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(6,317,725.62\) & \(4,509,845\) & \(4,562,715\) & \(1,755,011\) & 13.63 & 128,761 \\
1987 & \(9,723.43\) & 6,944 & 7,025 & 2,698 & 13.81 & 195 \\
1988 & \(44,445.57\) & 31,565 & 31,935 & 12,511 & 13.67 & 915 \\
1989 & \(146,031.48\) & 102,514 & 103,716 & 42,316 & 13.80 & 3,066 \\
1990 & \(46,056.95\) & 31,917 & 32,291 & 13,766 & 13.95 & 987
\end{tabular}

\section*{ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

\section*{ALLOC. BOOK RESERVE}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE ACCRUAL
(6)

ANNUAL
(7)

RACCOON T \& D HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1991 & \(11,020.00\) & 7,562 & 7,651 & 3,369 & 13.95 & 242 \\
2000 & \(44,538.57\) & 26,621 & 26,933 & 17,605 & 14.47 & 1,217 \\
2001 & \(4,012.94\) & 2,353 & 2,381 & 1,632 & 14.47 & 113 \\
2002 & \(5,351.86\) & 3,068 & 3,104 & 2,248 & 14.51 & 155 \\
2003 & \(44,811.29\) & 25,121 & 25,415 & 19,396 & 14.50 & 1,338 \\
2004 & \(91,719.17\) & 50,079 & 50,666 & 41,053 & 14.55 & 2,822 \\
2005 & \(21,456.35\) & 11,400 & 11,534 & 9,923 & 14.56 & 682 \\
2009 & \(73,876.90\) & 33,983 & 34,381 & 39,496 & 14.67 & 2,692 \\
2011 & \(183,925.81\) & 76,476 & 77,373 & 106,553 & 14.75 & 7,224 \\
2012 & \(36,959.20\) & 14,466 & 14,636 & 22,324 & 14.77 & 1,511 \\
2013 & \(524,331.25\) & 191,643 & 193,890 & 330,442 & 14.76 & 22,388 \\
2014 & \(291,447.41\) & 98,159 & 99,310 & 192,138 & 14.77 & 13,009 \\
2015 & \(5,559.62\) & 1,698 & 1,718 & 3,842 & 14.78 & 260 \\
2018 & \(56,915.29\) & 10,916 & 11,044 & 45,871 & 14.75 & 3,110 \\
2019 & \(1,505,125.32\) & 218,544 & 221,106 & \(1,284,019\) & 14.71 & 87,289 \\
2021 & \(179,369.15\) & 6,081 & 6,152 & 173,217 & 14.25 & 12,156 \\
& & & & & & \\
& \(9,644,403.18\) & \(5,460,955\) & \(5,524,975\) & \(4,119,428\) & & 290,132
\end{tabular}

RACCOON S \& S HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(2,384,494.57\) & \(1,702,148\) & \(1,722,103\) & 662,392 & 13.63 & 48,598 \\
1988 & \(11,180.00\) & 7,940 & 8,033 & 3,147 & 13.67 & 230 \\
1991 & \(12,027.76\) & 8,253 & 8,350 & 3,678 & 13.95 & 264 \\
1996 & \(35,462.54\) & 22,788 & 23,055 & 12,407 & 14.18 & 875 \\
2000 & 44.99 & 27 & 27 & 18 & 14.47 & 1 \\
2002 & \(5,351.86\) & 3,068 & 3,104 & 2,248 & 14.51 & 155 \\
2003 & \(2,719.34\) & 1,524 & 1,542 & 1,177 & 14.50 & 81 \\
2011 & \(69,719.58\) & 28,989 & 29,329 & 40,391 & 14.75 & 2,738 \\
2012 & \(23,737.40\) & 9,291 & 9,400 & 14,337 & 14.77 & 971 \\
2013 & \(88,027.35\) & 32,174 & 32,551 & 55,476 & 14.76 & 3,759 \\
2014 & \(101,544.73\) & 34,200 & 34,601 & 66,944 & 14.77 & 4,532 \\
2017 & \(110,769.71\) & 25,876 & 26,179 & 84,590 & 14.77 & 5,727 \\
& & & & & & \\
& \(2,845,079.83\) & \(1,876,278\) & \(1,898,274\) & 946,806 & & 67,931
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
YEAR
(1)
ORIGINAL
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK RESERVE
(4)
FUTURE BOOK ACCRUALS
(5)
REM.
LIFE
(6)
ANNUAL
ACCRUAL
(7)

RACCOON GARAGE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(1,518,371.46\) & \(1,083,874\) & \(1,096,581\) & 421,791 & 13.63 & 30,946 \\
1987 & \(2,732.66\) & 1,952 & 1,975 & 758 & 13.81 & 55 \\
1988 & \(5,314.81\) & 3,775 & 3,819 & 1,496 & 13.67 & 109 \\
1991 & \(60,628.56\) & 41,603 & 42,091 & 18,538 & 13.95 & 1,329 \\
1996 & \(10,477.93\) & 6,733 & 6,812 & 3,666 & 14.18 & 259 \\
1998 & \(32,432.02\) & 20,121 & 20,357 & 12,075 & 14.38 & 840 \\
2004 & \(1,773.48\) & 968 & 979 & 794 & 14.55 & 55 \\
2007 & \(83,517.03\) & 41,541 & 42,028 & 41,489 & 14.65 & 2,832 \\
2011 & \(44,221.68\) & 18,387 & 18,603 & 25,619 & 14.75 & 1,737 \\
2018 & \(59,727.99\) & 11,456 & 11,590 & 48,138 & 14.75 & 3,264 \\
2019 & \(111,256.63\) & 16,154 & 16,343 & 94,913 & 14.71 & 6,452 \\
2020 & \(26,926.73\) & 2,510 & 2,539 & 24,387 & 14.60 & 1,670 \\
2021 & \(59,789.72\) & 2,027 & 2,051 & 57,739 & 14.25 & 4,052 \\
& & & & & & \\
& \(2,017,170.70\) & \(1,251,101\) & \(1,265,768\) & 751,403 & & 53,600
\end{tabular}

PREBLE AVE SERVICE CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061
\begin{tabular}{rrrrrrr}
2006 & \(13,103,749.96\) & \(4,427,757\) & \(4,479,665\) & \(8,624,085\) & 30.37 & 283,967 \\
2009 & \(43,868.25\) & 12,612 & 12,760 & 31,108 & 30.98 & 1,004 \\
2010 & \(96,421.61\) & 25,947 & 26,251 & 70,170 & 31.24 & 2,246 \\
2011 & \(889,736.97\) & 223,324 & 225,942 & 663,795 & 31.34 & 21,180 \\
2012 & \(1,024,739.40\) & 237,535 & 240,320 & 784,420 & 31.48 & 24,918 \\
2013 & \(355,475.72\) & 75,219 & 76,101 & 279,375 & 31.66 & 8,824 \\
2014 & \(466,079.68\) & 89,114 & 90,159 & 375,921 & 31.72 & 11,851 \\
2015 & \(9,985.04\) & 1,693 & 1,713 & 8,272 & 31.82 & 260 \\
2016 & \(27,421.61\) & 4,042 & 4,089 & 23,332 & 31.81 & 733 \\
2017 & \(501,314.78\) & 62,063 & 62,791 & 438,524 & 31.86 & 13,764 \\
2018 & \(102,290.68\) & 10,168 & 10,287 & 92,003 & 31.71 & 2,901 \\
2019 & \(462,254.18\) & 33,976 & 34,374 & 427,880 & 31.51 & 13,579 \\
2020 & \(95,323.24\) & 4,404 & 4,456 & 90,868 & 30.97 & 2,934 \\
2021 & \(239,158.87\) & 4,018 & 4,065 & 235,094 & 29.35 & 8,010 \\
& & & & & & \\
& \(17,417,819.99\) & \(5,211,872\) & \(5,272,972\) & \(12,144,848\) & & 396,171
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODS RUN TRAINING CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2056
\begin{tabular}{rrrrrrr}
2006 & \(9,427,600.47\) & \(3,360,940\) & \(3,400,341\) & \(6,027,259\) & 27.98 & 215,413 \\
2008 & \(4,263,403.25\) & \(1,375,374\) & \(1,391,498\) & \(2,871,905\) & 28.34 & 101,338 \\
2010 & \(878,117.71\) & 251,493 & 254,441 & 623,676 & 28.66 & 21,761 \\
2011 & \(792,458.08\) & 212,220 & 214,708 & 577,750 & 28.71 & 20,124 \\
2012 & \(161,276.30\) & 39,997 & 40,466 & 120,810 & 28.81 & 4,193 \\
2013 & \(44,427.00\) & 10,085 & 10,203 & 34,224 & 28.95 & 1,182 \\
2014 & \(923,602.26\) & 189,800 & 192,025 & 731,577 & 29.00 & 25,227 \\
2015 & \(347,160.16\) & 63,391 & 64,134 & 283,026 & 29.09 & 9,729 \\
2017 & \(84,726.10\) & 11,362 & 11,495 & 73,231 & 29.06 & 2,520 \\
2018 & \(40,668.35\) & 4,384 & 4,435 & 36,233 & 28.97 & 1,251 \\
2019 & \(1,048,624.49\) & 83,890 & 84,873 & 963,751 & 28.75 & 33,522 \\
2020 & \(419,698.53\) & 21,153 & 21,401 & 398,298 & 28.26 & 14,094 \\
& & & & & & \\
& \(18,431,762.70\) & \(5,624,089\) & \(5,690,022\) & \(12,741,741\) & & 450,354
\end{tabular}

WOODS RUN \#5 TRANSPORTATION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061
\begin{tabular}{rrrrrrr}
2011 & \(157,195.44\) & 39,456 & 39,919 & 117,277 & 31.34 & 3,742 \\
2012 & \(13,010.91\) & 3,016 & 3,051 & 9,960 & 31.48 & 316 \\
2013 & \(1,009,137.65\) & 213,534 & 216,038 & 793,100 & 31.66 & 25,051 \\
2014 & \(169,891.52\) & 32,483 & 32,864 & 137,028 & 31.72 & 4,320 \\
2019 & \(178,944.62\) & 13,152 & 13,306 & 165,638 & 31.51 & 5,257 \\
2020 & \(98,561.36\) & 4,554 & 4,607 & 93,954 & 30.97 & 3,034 \\
& & & & & & 41,720
\end{tabular}

INDEPENDENT ALTERNATE OPERATIONS CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2068
\begin{tabular}{rrrrrrr}
2013 & \(4,142,612.11\) & 816,923 & 826,500 & \(3,316,112\) & 34.60 & 95,841 \\
2015 & \(116,942.76\) & 18,313 & 18,528 & 98,415 & 35.00 & 2,812 \\
& \(4,259,554.87\) & 835,236 & 845,028 & \(3,414,527\) & 98,653
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1905 & 8,881.12 & 8,881 & 8,881 & & & \\
\hline 1925 & 737.36 & 737 & 737 & & & \\
\hline 1926 & 15.05 & 15 & 15 & & & \\
\hline 1931 & 16,963.00 & 16,963 & 16,963 & & & \\
\hline 1935 & 421.35 & 421 & 421 & & & \\
\hline 1940 & 19.26 & 19 & 19 & & & \\
\hline 1942 & 180.69 & 181 & 181 & & & \\
\hline 1948 & 22,914.33 & 22,599 & 22,868 & 46 & 0.62 & 46 \\
\hline 1949 & 4,128.17 & 4,050 & 4,098 & 30 & 0.85 & 30 \\
\hline 1950 & 1,448.04 & 1,413 & 1,430 & 18 & 1.08 & 17 \\
\hline 1952 & 451.75 & 436 & 441 & 11 & 1.56 & 7 \\
\hline 1958 & 4,032.50 & 3,756 & 3,801 & 232 & 3.09 & 75 \\
\hline 1965 & 539.23 & 480 & 486 & 54 & 4.92 & 11 \\
\hline 1967 & 6,665.75 & 5,851 & 5,921 & 745 & 5.50 & 135 \\
\hline 1969 & 11,087.35 & 9,579 & 9,693 & 1,394 & 6.12 & 228 \\
\hline 1970 & 11,759.50 & 10,071 & 10,191 & 1,568 & 6.46 & 243 \\
\hline 1976 & 6,822.07 & 5,480 & 5,545 & 1,277 & 8.85 & 144 \\
\hline 1977 & 22,254.33 & 17,645 & 17,855 & 4,399 & 9.32 & 472 \\
\hline 1984 & 794.00 & 601 & 608 & 186 & 12.00 & 16 \\
\hline 1986 & 8,506.94 & 6,221 & 6,295 & 2,212 & 13.04 & 170 \\
\hline 1990 & 11,312.32 & 7,591 & 7,681 & 3,631 & 15.45 & 235 \\
\hline 1993 & 1,317.79 & 819 & 829 & 489 & 17.37 & 28 \\
\hline 1995 & 63,828.64 & 37,378 & 37,823 & 26,005 & 18.75 & 1,387 \\
\hline 1996 & 253,546.74 & 143,533 & 145,243 & 108,303 & 19.55 & 5,540 \\
\hline 1998 & 445,768.99 & 236,748 & 239,569 & 206,200 & 20.75 & 9,937 \\
\hline 1999 & 88,722.68 & 45,320 & 45,860 & 42,863 & 21.55 & 1,989 \\
\hline 2000 & 50,481.45 & 24,857 & 25,153 & 25,328 & 22.17 & 1,142 \\
\hline 2001 & 533,821.31 & 251,697 & 254,696 & 279,125 & 22.98 & 12,146 \\
\hline 2002 & 1,135.42 & 514 & 520 & 615 & 23.60 & 26 \\
\hline 2003 & 38,314.25 & 16,513 & 16,710 & 21,604 & 24.42 & 885 \\
\hline 2004 & 9,962.85 & 4,097 & 4,146 & 5,817 & 25.06 & 232 \\
\hline 2005 & 8,898.54 & 3,465 & 3,506 & 5,392 & 25.87 & 208 \\
\hline 2006 & 414,602.49 & 152,325 & 154,140 & 260,462 & 26.69 & 9,759 \\
\hline 2007 & 40,724.00 & 14,115 & 14,283 & 26,441 & 27.34 & 967 \\
\hline 2009 & 149,026.72 & 44,887 & 45,422 & 103,605 & 29.00 & 3,573 \\
\hline 2011 & 755,652.56 & 193,598 & 195,905 & 559,748 & 30.48 & 18,364 \\
\hline 2012 & 55,610.94 & 12,946 & 13,100 & 42,511 & 31.31 & 1,358 \\
\hline 2013 & 141,977.07 & 29,687 & 30,041 & 111,936 & 32.15 & 3,482 \\
\hline 2014 & 72,303.91 & 13,449 & 13,609 & 58,695 & 32.82 & 1,788 \\
\hline 2015 & 605,872.50 & 98,030 & 99,198 & 506,674 & 33.66 & 15,053 \\
\hline 2016 & 207,767.07 & 28,568 & 28,908 & 178,859 & 34.50 & 5,184 \\
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\end{tabular}
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                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
    | YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3

| 2017 | 704,279.90 | 79,865 | 80,817 | 623,463 | 35.18 | 17,722 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2018 | 807,875.53 | 71,578 | 72,431 | 735,445 | 36.02 | 20,418 |
| 2019 | 467,796.92 | 29,845 | 30,201 | 437,596 | 36.71 | 11,920 |
| 2020 | 330,900.47 | 12,773 | 12,925 | 317,975 | 37.41 | 8,500 |
| 2021 | 119,579.44 | 1,566 | 1,585 | 117,995 | 37.67 | 3,132 |
|  | 6,509,702.29 | 1,671,163 | 1,690,754 | 4,818,948 |  | 156,569 |
|  | 165,806,551.95 | 51,099,357 | 51,690,095 | 114,116,457 |  | 5,013,532 |
|  | COMPOSITE REMAI | NG LIFE AND | NNUAL ACCRU | RATE, PERCEN | . . 22. | 3.02 |

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\begin{tabular}{|c|c|c|c|c|c|c|}
\hline \multicolumn{7}{|c|}{DUQUESNE LIGHT COMPANY} \\
\hline \multicolumn{7}{|c|}{ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE} \\
\hline \multicolumn{7}{|c|}{ACCOUNT 390.15 STRUCTURES AND IMPROVEMENTS - EV CHARGING STATIONS} \\
\hline \multicolumn{7}{|c|}{CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021} \\
\hline \begin{tabular}{l}
YEAR \\
(1)
\end{tabular} & \begin{tabular}{l}
ORIGINAL COST \\
(2)
\end{tabular} & \begin{tabular}{l}
CALCULATED ACCRUED \\
(3)
\end{tabular} & \begin{tabular}{l}
ALLOC. BOOK RESERVE \\
(4)
\end{tabular} & FUTURE BOOK ACCRUALS (5) & \begin{tabular}{l}
REM. \\
LIFE \\
(6)
\end{tabular} & ANNUAL ACCRUAL (7) \\
\hline \multicolumn{7}{|l|}{SURVIVOR CURVE.. IOWA 10-L3} \\
\hline \multirow[t]{2}{*}{2021} & 1,387,500.00 & 78,532 & & 1,387,500 & 8.33 & 166,567 \\
\hline & 1,387,500.00 & 78,532 & & 1,387,500 & & 166,567 \\
\hline \multicolumn{7}{|r|}{COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT . 8.3 12.00} \\
\hline
\end{tabular}
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2002 & 5,904.89 & 5,757 & 5,758 & 147 & 0.50 & 147 \\
\hline 2003 & 206,707.26 & 191,204 & 191,226 & 15,481 & 1.50 & 10,321 \\
\hline 2004 & 15,493.02 & 13,556 & 13,558 & 1,935 & 2.50 & 774 \\
\hline 2005 & 244,565.11 & 201,766 & 201,789 & 42,776 & 3.50 & 12,222 \\
\hline 2006 & 584,112.45 & 452,687 & 452,740 & 131,372 & 4.50 & 29,194 \\
\hline 2007 & 0.08 & & & & & \\
\hline 2009 & 5,884.00 & 3,678 & 3,678 & 2,206 & 7.50 & 294 \\
\hline 2011 & 131,314.49 & 68,940 & 68,948 & 62,366 & 9.50 & 6,565 \\
\hline 2012 & 200,674.00 & 95,320 & 95,331 & 105,343 & 10.50 & 10,033 \\
\hline 2013 & 347,322.84 & 147,612 & 147,629 & 199,694 & 11.50 & 17,365 \\
\hline 2014 & 583,739.30 & 218,902 & 218,928 & 364,811 & 12.50 & 29,185 \\
\hline 2015 & 1,539,521.11 & 500,344 & 500,402 & 1,039,119 & 13.50 & 76,972 \\
\hline 2016 & 26,077.70 & 7,171 & 7,172 & 18,906 & 14.50 & 1,304 \\
\hline 2017 & 418,912.23 & 94,255 & 94,266 & 324,646 & 15.50 & 20,945 \\
\hline 2018 & 552,975.63 & 96,771 & 96,782 & 456,194 & 16.50 & 27,648 \\
\hline 2019 & 466,288.94 & 58,286 & 58,293 & 407,996 & 17.50 & 23,314 \\
\hline & 5,329,493.05 & 2,156,249 & 2,156,500 & 3,172,993 & & 266,283 \\
\hline \multicolumn{6}{|r|}{COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 11.9} & 5.00 \\
\hline
\end{tabular}
```

                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 391.2 OFFICE FURNITURE AND EQUIPMENT - E.D.P. EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
    | YEAR | COST | CALCULATED | ALLOC. BOOK | FUCRE | ACCRUED | RESERVE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(5)$ | $(6)$ | $(7)$ |  |  |  |

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SURVIVOR CURVE.. 5-SQUARE
\begin{tabular}{rrrrrrrr}
2017 & \(5,428,646.78\) & \(4,885,782\) & \(4,562,293\) & 866,354 & 0.50 & 866,354 \\
2018 & \(2,837,782.26\) & \(1,986,448\) & \(1,854,925\) & 982,857 & 1.50 & 655,238 \\
2019 & \(6,095,848.11\) & \(3,047,924\) & \(2,846,120\) & \(3,249,728\) & 2.50 & \(1,299,891\) \\
2020 & \(4,561,515.87\) & \(1,368,455\) & \(1,277,849\) & \(3,283,667\) & 3.50 & 938,191 \\
2021 & \(17,871,400.41\) & \(1,787,140\) & \(1,668,813\) & \(16,202,587\) & 4.50 & \(3,600,575\) \\
& \(36,795,193.43\) & \(13,075,749\) & \(12,210,000\) & \(24,585,193\) & & \(7,360,249\)
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.3 20.00
```

                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 393 STORES EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
    ```
YEAR
(1)
ORIGINAL
COST
(2)

(3)

(4)
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 30-SQUARE
\begin{tabular}{rrrrrrr}
1993 & \(107,936.90\) & 102,540 & 102,549 & 5,388 & 1.50 & 3,592 \\
1994 & \(102,887.68\) & 94,314 & 94,322 & 8,566 & 2.50 & 3,426 \\
2000 & \(130,828.73\) & 93,761 & 93,769 & 37,060 & 8.50 & 4,360 \\
2001 & \(8,530.94\) & 5,829 & 5,830 & 2,701 & 9.50 & 284 \\
2003 & \(61,839.75\) & 38,135 & 38,138 & 23,702 & 11.50 & 2,061 \\
2006 & \(944,989.56\) & 488,248 & 488,292 & 456,698 & 14.50 & 31,496 \\
2014 & \(22,400.00\) & 5,600 & 5,600 & 16,800 & 22.50 & 747 \\
& & & & & 828,500 & 550,914 \\
4
\end{tabular}

\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 25-SQUARE
\begin{tabular}{rrrrrrr}
1997 & \(183,835.64\) & 180,159 & 179,595 & 4,241 & 0.50 & 4,241 \\
2000 & \(195,075.03\) & 167,765 & 167,240 & 27,835 & 3.50 & 7,953 \\
2001 & \(378,459.71\) & 310,337 & 309,365 & 69,095 & 4.50 & 15,354 \\
2002 & \(583,922.00\) & 455,459 & 454,033 & 129,889 & 5.50 & 23,616 \\
2003 & \(298,630.88\) & 220,987 & 220,295 & 78,336 & 6.50 & 12,052 \\
2004 & \(321,887.03\) & 225,321 & 224,615 & 97,272 & 7.50 & 12,970 \\
2005 & \(414,543.82\) & 273,599 & 272,742 & 141,802 & 8.50 & 16,683 \\
2006 & \(2,711,903.67\) & \(1,681,380\) & \(1,676,114\) & \(1,035,790\) & 9.50 & 109,031 \\
2007 & \(764,289.56\) & 443,288 & 441,900 & 322,390 & 10.50 & 30,704 \\
2008 & \(268,216.94\) & 144,837 & 144,383 & 123,834 & 11.50 & 10,768 \\
2009 & \(1,706,958.42\) & 853,479 & 850,806 & 856,152 & 12.50 & 68,492 \\
2010 & \(1,011,921.05\) & 465,484 & 464,026 & 547,895 & 13.50 & 40,585 \\
2011 & \(1,218,704.71\) & 511,856 & 510,253 & 708,452 & 14.50 & 48,859 \\
2012 & \(2,377,461.89\) & 903,436 & 900,606 & \(1,476,856\) & 15.50 & 95,281 \\
2013 & \(1,677,887.50\) & 570,482 & 568,695 & \(1,109,192\) & 16.50 & 67,224 \\
2014 & \(1,169,820.44\) & 350,946 & 349,847 & 819,973 & 17.50 & 46,856 \\
2015 & \(1,372,966.46\) & 356,971 & 355,853 & \(1,017,113\) & 18.50 & 54,979 \\
2016 & \(2,929,954.18\) & 644,590 & 642,571 & \(2,287,383\) & 19.50 & 117,302 \\
2017 & \(1,388,523.37\) & 249,934 & 249,151 & \(1,139,372\) & 20.50 & 55,579 \\
2018 & \(1,592,694.53\) & 222,977 & 222,279 & \(1,370,416\) & 21.50 & 63,740 \\
2019 & \(2,767,616.97\) & 276,762 & 275,896 & \(2,491,721\) & 22.50 & 110,743 \\
2020 & \(2,052,350.45\) & 123,141 & 122,755 & \(1,929,595\) & 23.50 & 82,110 \\
2021 & \(1,102,434.89\) & 22,049 & 21,980 & \(1,080,455\) & 24.50 & 44,100 \\
& & & & & &
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 16.6 4.00
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 395 LABORATORY EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
    |  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{rrrrrrr}
2002 & \(79,984.00\) & 77,984 & 77,186 & 2,798 & 0.50 & 2,798 \\
2005 & \(139,720.33\) & 115,269 & 114,090 & 25,630 & 3.50 & 7,323 \\
2006 & \(58,532.76\) & 45,363 & 44,899 & 13,634 & 4.50 & 3,030 \\
2008 & 845.29 & 571 & 565 & 280 & 6.50 & 43 \\
2009 & \(31,479.93\) & 19,675 & 19,474 & 12,006 & 7.50 & 1,601 \\
2010 & \(516,042.61\) & 296,725 & 293,689 & 222,354 & 8.50 & 26,159 \\
2011 & \(42,334.35\) & 22,226 & 21,999 & 20,335 & 9.50 & 2,141 \\
2012 & \(428,035.95\) & 203,317 & 201,237 & 226,799 & 10.50 & 21,600 \\
2013 & \(67,929.97\) & 28,870 & 28,575 & 39,355 & 11.50 & 3,422 \\
2015 & \(242,718.47\) & 78,884 & 78,077 & 164,641 & 13.50 & 12,196 \\
2017 & \(181,601.91\) & 40,860 & 40,442 & 141,160 & 15.50 & 9,107 \\
2018 & \(65,052.04\) & 11,384 & 11,267 & 53,785 & 16.50 & 3,260 \\
& & & & & & \\
& \(1,854,277.61\) & 941,128 & 931,500 & 922,778 & & 92,680
\end{tabular}

\footnotetext{
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 10.0 5.00
}
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 15-SQUARE
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2007 & 1,703,443.26 & 1,646,667 & 1,636,571 & 66,872 & 0.50 & 66,872 \\
\hline 2008 & 4,225,955.80 & 3,803,360 & 3,780,041 & 445,915 & 1.50 & 297,277 \\
\hline 2009 & 4,102,141.10 & 3,418,437 & 3,397,478 & 704,663 & 2.50 & 281,865 \\
\hline 2010 & 557,365.17 & 427,315 & 424,695 & 132,670 & 3.50 & 37,906 \\
\hline 2011 & 4,340,229.69 & 3,038,161 & 3,019,533 & 1,320,697 & 4.50 & 293,488 \\
\hline 2012 & 4,819,734.12 & 3,052,482 & 3,033,766 & 1,785,968 & 5.50 & 324,721 \\
\hline 2013 & 8,143,219.35 & 4,614,518 & 4,586,225 & 3,556,994 & 6.50 & 547,230 \\
\hline 2014 & 2,275,528.91 & 1,137,764 & 1,130,788 & 1,144,741 & 7.50 & 152,632 \\
\hline 2015 & 13,005,614.18 & 5,635,723 & 5,601,169 & 7,404,445 & 8.50 & 871,111 \\
\hline 2016 & 11,888,517.73 & 4,359,163 & 4,332,435 & 7,556,083 & 9.50 & 795,377 \\
\hline 2017 & 1,458,922.84 & 437,677 & 434,994 & 1,023,929 & 10.50 & 97,517 \\
\hline 2018 & 3,264,861.41 & 761,790 & 757,119 & 2,507,742 & 11.50 & 218,065 \\
\hline 2019 & 7,068,399.18 & 1,178,090 & 1,170,867 & 5,897,532 & 12.50 & 471,803 \\
\hline 2020 & 792,914.98 & 79,291 & 78,805 & 714,110 & 13.50 & 52,897 \\
\hline 2021 & 3,487,151.85 & 116,227 & 115,514 & 3,371,638 & 14.50 & 232,527 \\
\hline & 71,133,999.57 & 33,706,665 & 33,500,000 & 37,634,000 & & 4,741,288 \\
\hline \multicolumn{3}{|r|}{COMPOSITE REMAINING LIFE AND} & NNUAL ACCRU & RATE, PERCEN & . 7.9 & 6.67 \\
\hline
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
                        ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 398 MISCELLANEOUS EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2021
    ```
(1)

ORIGINAL COST
(2)

\section*{CALCULATED}
(3)

ALLOC. BOOK RESERVE
(4)

FUTURE BOOK REM ACCRUALS
(5)

ANNUAL LIFE ACCRUAL
(6)

SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2002 & 77,503.00 & 75,565 & 74,282 & 3,221 & 0.50 & 3,221 \\
\hline 2004 & 60,334.98 & 52,793 & 51,896 & 8,439 & 2.50 & 3,376 \\
\hline 2005 & 45,054.60 & 37,170 & 36,539 & 8,516 & 3.50 & 2,433 \\
\hline 2006 & 36,150.54 & 28,017 & 27,541 & 8,610 & 4.50 & 1,913 \\
\hline 2007 & 351.23 & 255 & 251 & 100 & 5.50 & 18 \\
\hline 2015 & 10,621.54 & 3,452 & 3,393 & 7,229 & 13.50 & 535 \\
\hline & 230,015.89 & 197,252 & 193,902 & 36,114 & & 11,496 \\
\hline
\end{tabular}

\section*{PART VIII. EXPERIENCED AND ESTIMATED NET SALVAGE}

\section*{EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE}
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2017 TRANSACTION YEAR
\begin{tabular}{rrrrr}
303.00 & \(2,990,977.95\) & & & \\
350.00 & \(22,290.30\) & \(1,137.23-\) & \(29,000.00\) & \(30,137.23\) \\
352.00 & \(93,267.32\) & \(58,443.94\) & \(1,523.85\) & \(56,920.09-\) \\
353.00 & \(2,396,820.00\) & \(678,910.71\) & \(60,109.10\) & \(618,801.61-\) \\
356.00 & \(27,400.41\) & \(45,487.38\) & \(23,011.67\) & \(22,475.71-\) \\
357.00 & \(11,129.15\) & \(197,757.98\) & \(194,412.25\) & \(3,345.73-\) \\
360.00 & \(90,950.90\) & & & \\
361.00 & \(17,000.91\) & \(14,089.24\) & & \(14,089.24-\) \\
362.00 & \(1,456,115.01\) & \(1,075,470.04\) & \(28,424.69\) & \(1,047,045.35-\) \\
364.11 & \(6,259,162.37\) & \(3,135,094.68\) & \(893,246.99\) & \(2,241,847.69-\) \\
365.01 & \(6,477,151.12\) & \(1,121,162.38\) & \(597,641.05\) & \(523,521.33-\) \\
366.00 & \(78,627.23\) & \(31,923.59\) & \(1,482.81\) & \(30,440.78-\) \\
367.00 & \(2,880,853.29\) & \(547,037.25\) & \(498,352.48\) & \(48,684.77-\) \\
368.00 & \(6,845,491.37\) & \(1,077,400.80\) & \(1,095,428.06\) & \(18,027.26\) \\
369.20 & \(457,517.88\) & \(1,442,930.18\) & & \(1,442,930.18-\) \\
370.00 & \(21,380,302.84\) & \(2,008.39\) & & \(2,008.39-\) \\
370.10 & \(12,491.73\) & & & \(37,051.86-\) \\
373.00 & \(1,144,840.20\) & \(37,051.86\) & & \(60,454.26-\) \\
390.10 & \(299,416.57\) & \(60,454.26\) & & \(170,958.50\) \\
391.00 & \(1,618,904.25\) & & & \\
392.00 & \(4,448,975.34\) & \(42,884.00-\) & \(128,074.50\) & \\
393.00 & \(14,796.06\) & & & \(5,930,494.00-\)
\end{tabular}

\section*{2018 TRANSACTION YEAR}
\begin{tabular}{rrrrr}
352.00 & \(48,329.79\) & \(1,620.85\) & & \(1,620.85-\) \\
353.00 & \(3,138,131.87\) & \(934,401.09\) & \(1,999.55\) & \(932,401.54-\) \\
355.00 & \(3,803.03\) & \(1,037.79\) & & \(1,037.79-\) \\
356.00 & \(3,819.27\) & \(44,180.18\) & & \(44,180.18-\) \\
362.00 & \(1,700,184.77\) & \(652,537.25\) & \(6,716.85\) & \(645,820.40-\) \\
364.11 & \(8,815,643.61\) & \(4,527,343.88\) & \(677,169.04\) & \(3,850,174.84-\) \\
365.01 & \(10,674,256.33\) & \(1,400,699.74\) & \(1,949,544.69\) & \(548,844.95\) \\
366.00 & \(227,644.37\) & \(43,443.69\) & & \(43,443.69-\) \\
367.00 & \(7,741,079.25\) & \(1,016,492.94\) & \(2,259,047.98\) & \(1,242,555.04\) \\
368.00 & \(10,307,824.66\) & \(1,180,118.90\) & \(756,447.63\) & \(423,671.27-\) \\
369.20 & \(1,045,988.52\) & \(1,401,663.80\) & & \(1,401,663.80-\) \\
370.00 & \(25,943,853.96\) & \(277,982.71\) & & \(277,982.71-\) \\
373.00 & \(573,911.34\) & \(39,295.93\) & & \(39,295.93-\) \\
390.10 & \(17,350.21\) & & & \(111,353.20\) \\
392.00 & \(1,902,741.55\) & \(86,300.00-\) & \(25,053.20\) & \\
396.00 & \(302,297.30\) & & & \\
397.00 & \(2,171,279.67\) & & & \\
& \(74,618,139.50\) & \(11,434,518.75\) & \(5,675,978.94\) & \(5,758,539.81-\)
\end{tabular}

\section*{EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE}
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2019 TRANSACTION YEAR
\begin{tabular}{rrrrr}
353.00 & \(2,208,563.66\) & \(580,806.30\) & & \(580,806.30-\) \\
354.00 & \(645,954.25\) & & & \(196,952.91-\) \\
356.00 & \(45,999.22\) & \(196,952.91\) & & \\
357.00 & \(16,636.40\) & & & \(65,630.63-\) \\
358.00 & \(98,482.01\) & & & \(1,470,386.84-\) \\
361.00 & \(56,242.55\) & \(65,630.63\) & & \(9,931,615.48-\) \\
362.00 & \(2,079,989.64\) & \(1,470,386.84\) & \(1,038,461.30\) & \(923,300.55-\) \\
364.11 & \(6,412,418.85\) & \(3,970,076.78\) & 1, \\
365.01 & \(7,649,870.57\) & \(2,512,801.50\) & \(1,589,500.95\) & \(65,140.59-\) \\
366.00 & \(61,452.20\) & \(65,140.59\) & & \(920,289.46-\) \\
367.00 & \(5,757,578.07\) & \(1,565,025.76\) & \(644,736.30\) & \(1,032,632.06-\) \\
368.00 & \(9,099,589.71\) & \(1,633,372.56\) & \(600,740.50\) & \(1,377,092.11-\) \\
369.20 & \(318,642.04\) & \(1,377,092.11\) & & \(5,317.56-\) \\
370.00 & \(235,499.28\) & \(5,317.56\) & & \(8,466.59-\) \\
373.00 & \(1,701,296.30\) & \(43,204.27\) & & \(167,905.33-\) \\
390.10 & \(40,650.34\) & \(8,466.59\) & & \\
390.20 & \(10,174.02\) & \(11,905.33\) & & \(137,295.00\) \\
392.00 & \(1,997,054.93\) & \(30,370.00-\) & & \\
396.00 & \(97,970.01\) & & & \\
397.00 & \(5,893,626.21\) & & & \\
& \(4,427,690.26\) & \(13,475,809.73\) & \(4,010,734.05\) & \(9,465,075.68-\)
\end{tabular}

2020 TRANSACTION YEAR
\(353.00 \quad 3,671,416.21\)
354.00
355.00
356.00
361.00
362.00
364.11
365.01
366.00
367.00
368.00
369.20
370.00
373.00
390.10
390.20
392.00
396.00
397.00

708,579.21
41,009.59
992.28

40,017.31-
708,579.61
19,494.35
148,576.23
89,620.21
38,063.05
4,469.59
71,671.51
229,134.07
32,484.63
4,274,291.09
1,399,570.05
4,245,098.45
2,379,647.12
62,809.75
1,589,410.99
\(1,618,214.51\)
\(1,004,737.81\)
491.12

18,578.66
28,867.79

74,667.98
4,772.94 245.02

38,649,921.83
13,669,893.33
3,830,122.84
9,839,770.49-

EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2021 TRANSACTION YEAR
\begin{tabular}{rrrrr}
352.00 & \(17,028.69\) & \(18,022.74\) & 242.50 & \(17,780.24-\) \\
353.00 & \(7,614,504.69\) & \(2,160,774.13\) & \(125,729.15\) & \(2,035,044.98-\) \\
354.00 & \(1,033,507.72\) & \(32,636.39\) & & \(32,636.39-\) \\
356.00 & \(235,575.72\) & \(481,563.75\) & \(20,665.85\) & \(460,897.90-\) \\
361.00 & \(98,315.22\) & \(71,550.70\) & 8.74 & \(71,541.96-\) \\
362.00 & \(5,408,321.27\) & \(3,169,284.90\) & \(24,876.80\) & \(3,144,408.10-\) \\
364.11 & \(5,250,374.23\) & \(3,569,697.20\) & \(904,716.43\) & \(2,664,980.77-\) \\
365.01 & \(8,062,540.06\) & \(2,717,813.30\) & \(1,705,044.35\) & \(1,012,768.95-\) \\
366.00 & \(2,751,251.63\) & \(291,067.89\) & \(285,176.01\) & \(5,891.88-\) \\
367.00 & \(2,964,357.93\) & \(567,578.38\) & \(536,137.64\) & \(31,440.74-\) \\
368.00 & \(9,133,960.38\) & \(1,659,852.69\) & \(998,771.24\) & \(661,081.45-\) \\
369.20 & \(2,550,842.31\) & \(7,204,395.59\) & & \(7,204,395.59-\) \\
370.00 & \(278,074.50\) & \(1,221.16\) & & \(1,221.16-\) \\
373.00 & \(775,340.88\) & \(32,419.17\) & & \(32,419.17-\) \\
392.00 & \(4,157,972.17\) & \(23,659.05-\) & \(266,027.12\) & \(289,686.17\) \\
397.00 & \(6,517,245.72\) & 68.02 & & \(68.02-\) \\
& \(56,849,213.12\) & \(21,954,286.96\) & \(4,867,395.83\) & \(17,086,891.13-\)
\end{tabular}


\title{
2022 DEPRECIATION STUDY \\ CALCULATED ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2022
}

EXHIBIT JJS-3

Prepared by:

\title{
DUQUESNE LIGHT COMPANY
}

Pittsburgh, Pennsylvania

\title{
2022 DEPRECIATION STUDY CALCULATED ANNUAL DEPRECIATION ACCRUALS \\ RELATED TO ELECTRIC PLANT \\ AS OF DECEMBER 31, 2022
}

\section*{EXHIBIT JJS-3}

\section*{Excellence Delivered As Promised}

April 12, 2021

\author{
Duquesne Light Company \(4117^{\text {th }}\) Avenue \\ Pittsburgh, PA 15219 \\ Attention Jaime A. Bachota \\ Assistant Controller \\ Ladies and Gentlemen:
}

Pursuant to your request, we have determined the annual depreciation accruals applicable to the electric plant of Duquesne Light Company. The results of our study as of December 31, 2022, are presented in the attached detailed report.

The results of our study as of December 31, 2021, as well as a discussion of the methods and procedures used in the calculations and the support for the service life estimates, are included in our report titled "2021 Depreciation Study - Calculated Annual Depreciation Accruals Related to Electric Plant as of December 31, 2021." The same methods, procedures and estimates were used in both studies.

The results of our study as of December 31, 2022, are summarized on pages I-3 through I-7 of the attached report.

Respectfully submitted,
GANNETT FLEMING VALUATION AND RATE CONSULTANTS, LLC


JOHN J. SPANOS
President

JJS:mle

067908

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\section*{PART I. RESULTS OF STUDY}

\section*{PART I. RESULTS OF STUDY}

\section*{DESCRIPTION OF SUMMARY TABULATIONS}

The tables on pages I-3 through I-7 summarize the results of the depreciation studies for electric plant as of December 31, 2022. Table 1 sets forth, by depreciable group, the estimated survivor curve, original cost, book depreciation reserve as of December 31, 2022, future book accruals, calculated annual accrual amount and rate, and composite remaining life for plant in service. Table 2 presents the bringforward of the book reserve to December 31, 2022. Table 3 sets forth the calculations of the depreciation accruals for the twelve months ended December 31, 2022. Table 4 presents the amortization of experienced and estimated net salvage based on the period 2018 through 2022.

\section*{DESCRIPTION OF DETAILED TABULATIONS}

Supporting statistical data for the estimates of survivor curves are presented in Exhibit JJS 2. Supporting data for the original cost depreciation calculations in account sequence are presented in this report beginning on page II-6. The tables of the calculated original cost depreciation indicate the estimated survivor curves used in the calculations and set forth, for each installation year, the original cost, calculated accrued depreciation, allocated book reserve, future book accruals, remaining life, and calculated remaining life accrual. The amount of regular retirements, gross salvage and cost of removal are set forth by account for the years 2018 through 2022, beginning on pages III-2 through III-4.

DUQUESNE LIGHT COMPANY
TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, ORIGINAL COST, BOOK DEPRECIATION RESERVE AND CALCULATED
ANNUAL DEPRECIATION ACCRUALS RELATE ANNUAL DEPRECIATION ACCRUALS RELATED TO ELECTRIC PLANT AS OF DECEMBER 31, 2022

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NOTE: TRANSPORTATION WAS SWITCHED FROM GROUP TO INDIVIDUAL WITH GAIN LOSS
* LIFE SPAN PROCEDURE WAS USED. CURVE SHOWN IS INTERIM SURVIVOR CURVE. ** ANNUAL ACCRUAL IS CHARGED ON A VEHICLE BY VEHICLE BASIS.

duquesne light company
TABLE 2．BRINGFORWARD TO DECEMBER 31， 2022 OF THE BOOK RESERVE AS OF DECEMBER 31， 2021







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\section*{DUQUESNE LIGHT COMPANY}

TABLE 3. CALCULATION OF DEPRECIATION ACCRUALS FOR THE TWELVE MONTHS ENDED DECEMBER 31, 2022
\begin{tabular}{|c|c|c|c|c|c|}
\hline & DEPRECIABLE GROUP & \[
\begin{gathered}
\text { ORIGINAL COST } \\
\text { AS OF } \\
\text { DECEMBER 31, } 2021 \\
\hline
\end{gathered}
\] & \[
\begin{gathered}
\text { ORIGINAL COST } \\
\text { AS OF } \\
\text { DECEMBER 31, } 2022 \\
\hline
\end{gathered}
\] & ANNUAL ACCRUAL RATE & ANNUAL ACCRUAL AMOUNT* \\
\hline & (1) & (2) & (3) & (4) & (5) \\
\hline & DEPRECIABLE PLANT & & & & \\
\hline & TRANSMISSION PLANT & & & & \\
\hline 352 & STRUCTURES AND IMPROVEMENTS & 35,315,352.09 & 35,315,352.09 & 3.03 & 1,071,674 \\
\hline 353 & STATION EQUIPMENT & 488,829,134.66 & 507,572,819.68 & 3.30 & 16,431,251 \\
\hline 354 & TOWERS AND FIXTURES & 76,589,718.16 & 80,465,415.06 & 1.18 & 925,334 \\
\hline 355 & POLES AND FIXTURES & 57,016,769.94 & 68,213,615.44 & 1.90 & 1,188,469 \\
\hline 356 & OVERHEAD CONDUCTORS AND DEVICES & 129,659,388.51 & 160,803,967.31 & 1.52 & 2,211,724 \\
\hline 357 & UNDERGROUND CONDUIT & 83,002,132.86 & 83,002,132.86 & 1.74 & 1,444,059 \\
\hline 358 & UNDERGROUND CONDUCTORS AND DEVICES & 150,359,107.67 & 161,446,942.95 & 1.82 & 2,841,450 \\
\hline 359 & ROADS AND TRAILS & 10,185,993.84 & 10,185,993.84 & 1.77 & 179,838 \\
\hline & TOTAL TRANSMISSION PLANT & 1,030,957,597.73 & 1,107,006,239.23 & & 26,293,800 \\
\hline & DISTRIBUTION PLANT & & & & \\
\hline 361 & STRUCTURES AND IMPROVEMENTS & 71,091,070.87 & 72,287,236.54 & 2.11 & 1,510,404 \\
\hline 362 & STATION EQUIPMENT & 530,047,446.08 & 536,935,091.93 & 2.20 & 11,723,636 \\
\hline 364.11 & POLES, TOWERS AND FIXTURES & 597,387,302.76 & 624,017,331.77 & 2.11 & 12,911,929 \\
\hline 365.01 & OVERHEAD CONDUCTORS AND DEVICES & 603,286,069.64 & 629,457,567.34 & 2.68 & 16,512,844 \\
\hline 366 & UNDERGROUND CONDUIT & 197,042,270.50 & 219,374,891.48 & 1.40 & 2,908,475 \\
\hline 367 & UNDERGROUND CONDUCTORS AND DEVICES & 444,270,399.25 & 460,253,361.64 & 2.74 & 12,370,799 \\
\hline 368 & LINE TRANSFORMERS & 468,536,145.45 & 490,785,998.34 & 3.50 & 16,775,786 \\
\hline 369.2 & SERVICES & 111,371,995.28 & 114,962,845.55 & 1.96 & 2,215,007 \\
\hline 370 & METERS AND SMART METERS & 145,982,960.80 & 151,169,096.75 & 7.51 & 11,157,608 \\
\hline 373 & STREET LIGHTING EQUIPMENT & 43,886,987.99 & 44,729,529.77 & 2.86 & 1,267,074 \\
\hline & TOTAL DISTRIBUTION PLANT & 3,212,902,648.62 & 3,343,972,951.11 & & 89,353,561 \\
\hline & GENERAL PLANT & & & & \\
\hline 390.1 & STRUCTURES AND IMPROVEMENTS & 165,806,551.95 & 172,554,624.88 & 3.02 & 5,116,611 \\
\hline 390.15 & STRUCTURES AND IMPROVEMENTS - EV CHARGING STATIONS & 1,387,500.00 & 2,775,000.00 & 12.00 & 245,651 \\
\hline 391.1 & OFFICE FURNITURE AND EQUIPMENT - OFFICE FURNITURE & 5,329,493.05 & 5,323,588.16 & 5.00 & 266,135 \\
\hline 391.2 & OFFICE FURNITURE AND EQUIPMENT - E.D.P. EQUIPMENT & 36,795,193.43 & 41,365,236.34 & 20.00 & 7,817,328 \\
\hline 392 & TRANSPORTATION EQUIPMENT & 63,481,545.88 & 65,323,573.71 & ** & 4,012,279 \\
\hline 393 & STORES EQUIPMENT & 1,379,413.56 & 1,379,413.56 & 3.33 & 45,966 \\
\hline 394 & TOOLS, SHOP AND GARAGE EQUIPMENT & 28,490,059.14 & 29,883,989.50 & 4.00 & 1,167,091 \\
\hline 395 & LABORATORY EQUIPMENT & 1,854,277.61 & 1,774,293.33 & 5.00 & 90,681 \\
\hline 396 & POWER OPERATED EQUIPMENT & 3,694,308.85 & 3,694,308.85 & ** & 159,225 \\
\hline 397 & COMMUNICATION EQUIPMENT & 71,133,999.57 & 71,336,773.31 & 6.67 & 4,748,046 \\
\hline 398 & MISCELLANEOUS EQUIPMENT & 230,015.89 & 152,512.89 & 5.00 & 9,559 \\
\hline & TOTAL GENERAL PLANT & 379,582,358.93 & 395,563,314.53 & & 23,678,574 \\
\hline & TOTAL DEPRECIABLE PLANT & 4,623,442,605.28 & 4,846,542,504.87 & & 139,325,935 \\
\hline
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* TOTAL ACCRUALS SHOWN ARE BASED ON AVERAGE MONTHLY BALANCES
** ANNUAL ACCRUAL IS CHARGED ON A VEHICLE BY VEHICLE BASIS.
DUQUESNE LIGHT COMPANY

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\section*{PART II. DETAILED DEPRECIATION CALCULATIONS}

\section*{CUMULATIVE DEPRECIATED ORIGINAL COST}

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline & & & & DEPRE & ATED ORIGINAL & L COST \\
\hline & & & & & & \\
\hline YEAR & ORIGINAL & ACCRUED & & MOUNT & CUMULATIVE & COL 4 \\
\hline INST & Cost & DEPRECIATION & (2) & - (3) & AMOUNT & TOTAL \\
\hline (1) & (2) & (3) & & (4) & (5) & (6) \\
\hline 1899 & 30,120 & 30,120 & & & & 0.0 \\
\hline 1900 & 5,960 & 5,960 & & & & 0.0 \\
\hline 1901 & 5,508 & 5,508 & & & & 0.0 \\
\hline 1902 & 12,684 & 12,685 & & 1- & 1- & 0.0 \\
\hline 1903 & 7,225 & 7,224 & & 1 & & 0.0 \\
\hline 1904 & 23,878 & 23,879 & & 1- & 1- & 0.0 \\
\hline 1905 & 9,920 & 9,920 & & & 1- & 0.0 \\
\hline 1906 & 1,389 & 1,389 & & & 1- & 0.0 \\
\hline 1907 & 2,514 & 2,514 & & & 1- & 0.0 \\
\hline 1908 & 24 & 24 & & & 1- & 0.0 \\
\hline 1909 & 689 & 689 & & & 1- & 0.0 \\
\hline 1910 & 3,624 & 3,624 & & & 1- & 0.0 \\
\hline 1911 & 1,663 & 1,663 & & & 1- & 0.0 \\
\hline 1913 & 17,084 & 17,084 & & & 1- & 0.0 \\
\hline 1914 & 27,148 & 27,149 & & 1- & 2- & 0.0 \\
\hline 1915 & 23,069 & 23,069 & & & 2- & 0.0 \\
\hline 1916 & 257,998 & 257,587 & & 411 & 409 & 0.0 \\
\hline 1917 & 49,440 & 49,333 & & 107 & 516 & 0.0 \\
\hline 1918 & 109,424 & 109,180 & & 244 & 760 & 0.0 \\
\hline 1919 & 109,159 & 108,737 & & 422 & 1,182 & 0.0 \\
\hline 1920 & 518,215 & 511,192 & & 7,023 & 8,205 & 0.0 \\
\hline 1921 & 118,225 & 117,529 & & 696 & 8,901 & 0.0 \\
\hline 1922 & 488,640 & 482,084 & & 6,556 & 15,457 & 0.0 \\
\hline 1923 & 363,542 & 354,011 & & 9,531 & 24,988 & 0.0 \\
\hline 1924 & 1,667,412 & 1,644,453 & & 22,959 & 47,947 & 0.0 \\
\hline 1925 & 1,064,983 & 1,040,498 & & 24,485 & 72,432 & 0.0 \\
\hline 1926 & 901,540 & 872,298 & & 29,242 & 101,674 & 0.0 \\
\hline 1927 & 1,206,602 & 1,153,849 & & 52,753 & 154,427 & 0.0 \\
\hline 1928 & 1,000,833 & 965,261 & & 35,572 & 189,999 & 0.0 \\
\hline 1929 & 633,090 & 588,321 & & 44,769 & 234,768 & 0.0 \\
\hline 1930 & 741,414 & 696,324 & & 45,090 & 279,858 & 0.0 \\
\hline 1931 & 456,189 & 424,122 & & 32,067 & 311,925 & 0.0 \\
\hline 1932 & 132,926 & 121,470 & & 11,456 & 323,381 & 0.0 \\
\hline 1933 & 137,956 & 125,608 & & 12,348 & 335,729 & 0.0 \\
\hline 1934 & 166,134 & 147,694 & & 18,440 & 354,169 & 0.0 \\
\hline 1935 & 139,676 & 125,414 & & 14,262 & 368,431 & 0.0 \\
\hline 1936 & 131,019 & 115,977 & & 15,042 & 383,473 & 0.0 \\
\hline 1937 & 232,574 & 205,802 & & 26,772 & 410,245 & 0.0 \\
\hline 1938 & 60,903 & 53,314 & & 7,589 & 417,834 & 0.0 \\
\hline 1939 & 150,358 & 132,054 & & 18,304 & 436,138 & 0.0 \\
\hline 1940 & 86,250 & 74,202 & & 12,048 & 448,186 & 0.0 \\
\hline 1941 & 636,518 & 557,719 & & 78,799 & 526,985 & 0.0 \\
\hline 1942 & 617,876 & 541,563 & & 76,313 & 603,298 & 0.0 \\
\hline 1943 & 165,961 & 144,457 & & 21,504 & 624,802 & 0.0 \\
\hline 1944 & 56,211 & 47,379 & & 8,832 & 633,634 & 0.0 \\
\hline
\end{tabular}

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

DEPRECIATED ORIGINAL COST
\begin{tabular}{|c|c|c|c|c|c|}
\hline YEAR & ORIGINAL & ACCRUED & AMOUNT & CUMULATIVE & \[
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\end{gathered}
\] \\
\hline INST & COST & DEPRECIATION & (2) - (3) & AMOUNT & TOTAL \\
\hline (1) & (2) & (3) & (4) & (5) & (6) \\
\hline 1945 & 298,281 & 264,343 & 33,938 & 667,572 & 0.0 \\
\hline 1946 & 93,627 & 76,181 & 17,446 & 685,018 & 0.0 \\
\hline 1947 & 196,464 & 156,999 & 39,465 & 724,483 & 0.0 \\
\hline 1948 & 998,979 & 806,860 & 192,119 & 916,602 & 0.0 \\
\hline 1949 & 1,340,919 & 1,080,947 & 259,972 & 1,176,574 & 0.0 \\
\hline 1950 & 2,060,435 & 1,663,729 & 396,706 & 1,573,280 & 0.0 \\
\hline 1951 & 1,827,628 & 1,446,748 & 380,880 & 1,954,160 & 0.1 \\
\hline 1952 & 2,203,647 & 1,679,432 & 524,215 & 2,478,375 & 0.1 \\
\hline 1953 & 3,432,864 & 2,674,776 & 758,088 & 3,236,463 & 0.1 \\
\hline 1954 & 5,321,040 & 4,154,560 & 1,166,480 & 4,402,943 & 0.1 \\
\hline 1955 & 5,013,130 & 3,796,974 & 1,216,156 & 5,619,099 & 0.2 \\
\hline 1956 & 8,712,178 & 6,657,095 & 2,055,083 & 7,674,182 & 0.2 \\
\hline 1957 & 5,819,852 & 4,259,522 & 1,560,330 & 9,234,512 & 0.3 \\
\hline 1958 & 8,909,284 & 6,901,538 & 2,007,746 & 11,242,258 & 0.3 \\
\hline 1959 & 7,136,961 & 5,186,599 & 1,950,362 & 13,192,620 & 0.4 \\
\hline 1960 & 5,623,250 & 3,961,611 & 1,661,639 & 14,854,259 & 0.5 \\
\hline 1961 & 4,991,603 & 3,519,128 & 1,472,475 & 16,326,734 & 0.5 \\
\hline 1962 & 4,570,927 & 3,100,748 & 1,470,179 & 17,796,913 & 0.5 \\
\hline 1963 & 4,724,966 & 3,221,678 & 1,503,288 & 19,300,201 & 0.6 \\
\hline 1964 & 5,707,357 & 3,908,581 & 1,798,776 & 21,098,977 & 0.6 \\
\hline 1965 & 8,577,310 & 6,031,397 & 2,545,913 & 23,644,890 & 0.7 \\
\hline 1966 & 6,811,963 & 4,505,653 & 2,306,310 & 25,951,200 & 0.8 \\
\hline 1967 & 9,974,512 & 6,708,305 & 3,266,207 & 29,217,407 & 0.9 \\
\hline 1968 & 9,206,218 & 6,263,731 & 2,942,487 & 32,159,894 & 1.0 \\
\hline 1969 & 13,339,252 & 8,970,520 & 4,368,732 & 36,528,626 & 1.1 \\
\hline 1970 & 28,193,657 & 18,787,378 & 9,406,279 & 45,934,905 & 1.4 \\
\hline 1971 & 12,237,135 & 7,652,858 & 4,584,277 & 50,519,182 & 1.5 \\
\hline 1972 & 40,428,821 & 26,841,002 & 13,587,819 & 64,107,001 & 2.0 \\
\hline 1973 & 21,269,950 & 13,338,251 & 7,931,699 & 72,038,700 & 2.2 \\
\hline 1974 & 27,456,091 & 16,695,223 & 10,760,868 & 82,799,568 & 2.5 \\
\hline 1975 & 30,040,383 & 18,477,443 & 11,562,940 & 94,362,508 & 2.9 \\
\hline 1976 & 27,703,234 & 16,723,391 & 10,979,843 & 105,342,351 & 3.2 \\
\hline 1977 & 21,178,759 & 12,041,979 & 9,136,780 & 114,479,131 & 3.5 \\
\hline 1978 & 24,929,698 & 14,267,899 & 10,661,799 & 125,140,930 & 3.8 \\
\hline 1979 & 94,894,444 & 60,092,517 & 34,801,927 & 159,942,857 & 4.9 \\
\hline 1980 & 33,943,856 & 18,976,784 & 14,967,072 & 174,909,929 & 5.3 \\
\hline 1981 & 27,734,452 & 15,407,184 & 12,327,268 & 187,237,197 & 5.7 \\
\hline 1982 & 62,170,322 & 36,815,091 & 25,355,231 & 212,592,428 & 6.5 \\
\hline 1983 & 26,218,057 & 16,914,509 & 9,303,548 & 221,895,976 & 6.8 \\
\hline 1984 & 32,196,031 & 20,756,284 & 11,439,747 & 233,335,723 & 7.1 \\
\hline 1985 & 31,257,952 & 19,503,441 & 11,754,511 & 245,090,234 & 7.5 \\
\hline 1986 & 41,645,000 & 25,563,393 & 16,081,607 & 261,171,841 & 8.0 \\
\hline 1987 & 26,596,779 & 15,933,540 & 10,663,239 & 271,835,080 & 8.3 \\
\hline 1988 & 31,373,838 & 18,483,906 & 12,889,932 & 284,725,012 & 8.7 \\
\hline 1989 & 32,706,653 & 18,655,572 & 14,051,081 & 298,776,093 & 9.1 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{CUMULATIVE DEPRECIATED ORIGINAL COST BY YEAR INSTALLED RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022}

DEPRECIATED ORIGINAL COST
YEAR

INST (1)

ORIGINAL COSI
(2)

38,763,537
37,896,931
47,017,884
34,057,375
26,361,019
37,124,608
49,653,842
46,477,411
12,491,077
34,783,861
34,423,963
50,640,902
42,764,282
39,245,647
55,874,427
95,183,679 157,634,038 110,054,341 84,992,931 153,135,177
206,805,269 167,790,431 219,391,223 169,586,057 145,320,757 153,808,688 221,001,603 203,751,714 255,075,014 219,990,993 221,177,959 325,693,263 265,913,394

ACCRUED
DEPRECIATION (3)

22,026,685
20,934,109
25,630,022
\(17,896,451\)
13,706,470
19,068,504 25,687,638 22,607,994 6,077,343 16,799,515 \(15,680,863\) 23,147,934 18,275,191 15,683,039 22,138,265 36,363,099 59,467,038 37,090,805 30,011,045 50,770,695 62,268,201 49,117,812 59,774,615 42,620,391 32,562,129 37,941,876 46,206,774 36,763,055 39,996,461 29,241,104 20,355,110 20,714,877 5,641,800

AMOUNT
(2) - (3)
(4)

16,736,852
16,962,822
21,387,862
\(16,160,924\)
12,654,549
18,056,104
23,966,204
23,869,417
6,413,734
17,984,346
18,743,100 27,492,968 24,489,091 23,562,608 33,736,162
58,820,580
98,167,000
72,963,536
54,981,886
102,364,482
144,537,068
118,672,619
159,616,608
126,965,666
112,758,628
\(115,866,812\)
174,794,829
166,988,659 215,078,553
190,749,889
200,822,849
304,978,386
260,271,594

CUMULATIVE AMOUNT
(5)

PCT OF
COL 4
TOTAL
(6)
\begin{tabular}{rr}
\(315,512,945\) & 9.6 \\
\(332,475,767\) & 10.1 \\
\(353,863,629\) & 10.8 \\
\(370,024,553\) & 11.3 \\
\(382,679,102\) & 11.7 \\
\(400,735,206\) & 12.2 \\
\(424,701,410\) & 12.9 \\
\(448,570,827\) & 13.7 \\
\(454,984,561\) & 13.9 \\
\(472,968,907\) & 14.4 \\
\(491,712,007\) & 15.0 \\
\(519,204,975\) & 15.8 \\
\(543,694,066\) & 16.6 \\
\(567,256,674\) & 17.3 \\
\(600,992,836\) & 18.3 \\
\(659,813,416\) & 20.1 \\
\(757,980,416\) & 23.1 \\
\(830,943,952\) & 25.3 \\
\(885,925,838\) & 27.0 \\
\(988,290,320\) & 30.1 \\
\(1,132,827,388\) & 34.5 \\
\(1,251,500,007\) & 38.2 \\
\(1,411,116,615\) & 43.0 \\
\(1,538,082,281\) & 46.9 \\
\(1,650,840,909\) & 50.3 \\
\(1,766,707,721\) & 53.9 \\
\(1,941,502,550\) & 59.2 \\
\(2,108,491,209\) & 64.3 \\
\(2,323,569,762\) & 70.8 \\
\(2,514,319,651\) & 76.6 \\
\(2,715,142,500\) & 82.8 \\
\(3,020,120,886\) & 92.1 \\
\(3,280,392,480\) & 100.0
\end{tabular}

332,475,767 10.1
10.8
11.3
11.7
12.2
12.9
13.7
13.9
14.4
15.8
16.6
17.3
18.3
23.1
25.3
27.0
30.1
34.5
43.0
46.9
50.3
53.9
59.2
64.3
70.8
76.6
82.8
00.0

SUBTOTAL \(4,777,524,6221,497,132,141\) 3,280,392,477
ACCOUNTS
392 AND 396 69,017,883 40,857,123 28,160,760
NONDEPRECIABLE \(442,578,753\) 260,472,206
TOTAL \(5,289,121,258 \quad 1,798,461,469 \quad 3,308,553,237\)

UTILITY PLANT IN SERVICE

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)

ORIGINAL
COST
(2)

(3)

\section*{ALLOC. BOOK RESERVE}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE ACCRUAL
(6)

ANNUAL
(7)

BEAVER VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2031
\begin{tabular}{rrrrrrr}
1958 & \(8,598.19\) & 7,617 & 7,820 & 778 & 7.01 & 111 \\
1976 & \(616,389.78\) & 520,461 & 534,326 & 82,064 & 7.99 & 10,271 \\
1977 & \(3,380.68\) & 2,845 & 2,921 & 460 & 8.02 & 57 \\
1980 & \(840,465.37\) & 699,284 & 717,912 & 122,553 & 8.11 & 15,111 \\
1981 & \(23,903.87\) & 19,811 & 20,339 & 3,565 & 8.13 & 438 \\
1984 & 917.10 & 756 & 776 & 141 & 8.23 & 17 \\
1992 & \(182,916.77\) & 143,937 & 147,771 & 35,145 & 8.26 & 4,255 \\
1993 & \(18,220.84\) & 14,245 & 14,624 & 3,596 & 8.23 & 437 \\
1994 & \(53,126.91\) & 41,184 & 42,281 & 10,846 & 8.26 & 1,313 \\
1997 & \(2,959.49\) & 2,226 & 2,285 & 674 & 8.40 & 80 \\
1999 & \(126,094.29\) & 93,045 & 95,524 & 30,571 & 8.35 & 3,661 \\
2007 & \(61,331.78\) & 39,737 & 40,796 & 20,536 & 8.42 & 2,439 \\
2009 & \(25,464.06\) & 15,676 & 16,094 & 9,370 & 8.43 & 1,112 \\
2011 & \(81,735.53\) & 47,096 & 48,351 & 33,385 & 8.46 & 3,946 \\
2012 & \(36,995.19\) & 20,510 & 21,056 & 15,939 & 8.44 & 1,889 \\
2018 & \(49,834.33\) & 17,293 & 17,754 & 32,081 & 8.47 & 3,788 \\
2021 & \(667,002.94\) & 100,451 & 103,127 & 563,876 & 8.46 & 66,652 \\
& & & & & & \\
& \(2,799,337.12\) & \(1,786,174\) & \(1,833,756\) & 965,581 & & 115,577
\end{tabular}

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035
\begin{tabular}{rrrrrrr}
1970 & \(602,056.54\) & 489,394 & 502,431 & 99,626 & 10.82 & 9,208 \\
1975 & \(13,359.93\) & 10,618 & 10,901 & 2,459 & 11.25 & 219 \\
1981 & \(100,304.72\) & 77,251 & 79,309 & 20,996 & 11.63 & 1,805 \\
1987 & \(9,768.83\) & 7,317 & 7,512 & 2,257 & 11.90 & 190 \\
1994 & \(70,851.55\) & 49,879 & 51,208 & 19,644 & 11.98 & 1,640 \\
1996 & \(13,652.98\) & 9,371 & 9,621 & 4,032 & 12.11 & 333 \\
2005 & \(152,127.05\) & 89,451 & 91,834 & 60,293 & 12.26 & 4,918 \\
2009 & \(95,298.01\) & 49,784 & 51,110 & 44,188 & 12.34 & 3,581 \\
2011 & \(16,146.85\) & 7,780 & 7,987 & 8,160 & 12.37 & 660 \\
2012 & \(83,286.71\) & 38,304 & 39,324 & 43,962 & 12.33 & 3,565 \\
2014 & \(23,655.50\) & 9,633 & 9,890 & 13,766 & 12.38 & 1,112 \\
2016 & \(4,464,161.73\) & \(1,534,779\) & \(1,575,664\) & \(2,888,498\) & 12.40 & 232,943 \\
2017 & \(289,694.20\) & 89,052 & 91,424 & 198,270 & 12.39 & 16,002 \\
2018 & \(1,153.02\) & 307 & 315 & 838 & 12.39 & 68
\end{tabular}

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

COLLIER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2035
\begin{tabular}{rrrrrrr}
2019 & 606.53 & 134 & 138 & 469 & 12.40 & 38 \\
2020 & \(25,965.47\) & 4,357 & 4,473 & 21,492 & 12.40 & 1,733 \\
2021 & \(444,671.11\) & 48,024 & 49,303 & 395,368 & 12.39 & 31,910 \\
& \(6,406,760.73\) & \(2,515,435\) & \(2,582,443\) & \(3,824,318\) & & 309,925
\end{tabular}

CRESCENT SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2030
\begin{tabular}{rrrrrrr}
1975 & \(692,787.29\) & 597,113 & 613,019 & 79,768 & 7.09 & 11,251 \\
1979 & \(15,951.88\) & 13,580 & 13,942 & 2,010 & 7.18 & 280 \\
1981 & \(73,835.77\) & 62,413 & 64,076 & 9,760 & 7.22 & 1,352 \\
1986 & \(32,983.89\) & 27,449 & 28,180 & 4,804 & 7.36 & 653 \\
1991 & \(20,828.44\) & 16,927 & 17,378 & 3,451 & 7.26 & 475 \\
1994 & \(64,957.66\) & 51,654 & 53,030 & 11,928 & 7.34 & 1,625 \\
1998 & \(124,838.24\) & 96,038 & 98,596 & 26,242 & 7.35 & 3,570 \\
2000 & \(19,852.32\) & 14,919 & 15,316 & 4,536 & 7.44 & 610 \\
2006 & \(10,833.62\) & 7,472 & 7,671 & 3,163 & 7.42 & 426 \\
2009 & \(160,842.96\) & 103,583 & 106,342 & 54,501 & 7.46 & 7,306 \\
2011 & \(77,708.40\) & 47,091 & 48,345 & 29,363 & 7.48 & 3,926 \\
2012 & \(19,166.61\) & 11,209 & 11,508 & 7,659 & 7.45 & 1,028 \\
2017 & \(390,615.34\) & 165,621 & 170,033 & 220,582 & 7.47 & 29,529 \\
2018 & \(71,919.22\) & 27,027 & 27,747 & 44,172 & 7.48 & 5,905 \\
& & & & & & \\
& \(1,777,121.64\) & \(1,242,096\) & \(1,275,184\) & 501,938 & & 67,936
\end{tabular}

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2049
\begin{tabular}{rrrrrrr}
1979 & \(721,493.43\) & 471,178 & 483,730 & 237,764 & 20.91 & 11,371 \\
1996 & \(81,368.78\) & 42,914 & 44,057 & 37,312 & 23.75 & 1,571 \\
2009 & \(1,062,225.02\) & 371,354 & 381,246 & 680,979 & 25.11 & 27,120 \\
2010 & \(3,141,593.88\) & \(1,040,496\) & \(1,068,213\) & \(2,073,380\) & 25.24 & 82,147 \\
2011 & \(1,473,624.73\) & 460,950 & 473,229 & \(1,000,396\) & 25.26 & 39,604 \\
2016 & \(532,398.85\) & 107,970 & 110,846 & 421,553 & 25.55 & 16,499
\end{tabular}

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

BRUNOT ISLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA \(65-\) R3
PROBABLE RETIREMENT YEAR.. \(\quad 6-2049\)
\begin{tabular}{rrrrrrr}
2018 & \(92,734.81\) & 13,855 & 14,224 & 78,511 & 25.62 & 3,064 \\
2020 & \(265,868.10\) & 23,609 & 24,238 & 241,630 & 25.67 & 9,413 \\
2021 & \(333,505.94\) & 18,410 & 18,900 & 314,606 & 25.67 & 12,256 \\
& \(7,704,813.54\) & \(2,550,736\) & \(2,618,684\) & \(5,086,129\) & 203,045
\end{tabular}

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2066
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2011 & 673,863.54 & 157,280 & 161,470 & 512,394 & 37.76 & 13,570 \\
\hline 2017 & 94,142.16 & 11,598 & 11,907 & 82,235 & 39.14 & 2,101 \\
\hline 2018 & 82,680.02 & 8,483 & 8,709 & 73,971 & 39.36 & 1,879 \\
\hline & 850,685.72 & 177,361 & 182,086 & 668,600 & & 17,550 \\
\hline \multicolumn{7}{|l|}{LOGANS FERRY SUBSTATION} \\
\hline \multicolumn{7}{|l|}{INTERIM SURVIVOR CURVE.. IOWA 65-R3} \\
\hline \multicolumn{7}{|l|}{PROBABLE RETIREMENT YEAR.. 6-2065} \\
\hline 2010 & 4,680,559.93 & 1,181,841 & 1,213,323 & 3,467,236 & 37.00 & 93,709 \\
\hline 2018 & 67,863.46 & 7,085 & 7,274 & 60,590 & 38.60 & 1,570 \\
\hline 2021 & 555,821.53 & 20,677 & 21,228 & 534,594 & 38.82 & 13,771 \\
\hline & 5,304,244.92 & 1,209,603 & 1,241,825 & 4,062,420 & & 109,050 \\
\hline
\end{tabular}

TECUMSEH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2071
\begin{tabular}{rrrrrrr}
2016 & \(1,319,737.74\) & 176,713 & 181,421 & \(1,138,317\) & 42.04 & 27,077 \\
2018 & \(249,161.01\) & 23,770 & 24,403 & 224,758 & 42.67 & 5,267 \\
& \(1,568,898.75\) & 200,483 & 205,824 & \(1,363,075\) & & 32,344
\end{tabular}

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
YEAR
(1)
ORIGINAL
COST
(2)
CALCULATED
ACCRUED
(3)
ALLOC. BOOK
RESERVE
(4)
FUTURE BOOK REM. ANNUAL ACCRUALS
(5)
LIFE ACCRUAL
(6)
(7)

POTTER SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 65-R3
PROBABLE RETIREMENT YEAR.. 6-2071
\begin{tabular}{rrrrrrrr}
2016 & \(719,743.11\) & 96,374 & 98,941 & 620,802 & 42.04 & 14,767 \\
2017 & \(482,585.21\) & 55,497 & 56,975 & 425,610 & 42.34 & 10,052 \\
2018 & \(89,879.70\) & 8,575 & 8,803 & 81,076 & 42.67 & 1,900 \\
& \(1,292,208.02\) & 160,446 & 164,720 & \(1,127,488\) & 26,719
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1927 & 2,231.62 & 2,232 & 2,232 & & & \\
\hline 1930 & 3,260.44 & 3,260 & 3,260 & & & \\
\hline 1942 & 1,465.05 & 1,465 & 1,465 & & & \\
\hline 1950 & 2,271.68 & 2,229 & 2,272 & & & \\
\hline 1953 & 8,198.34 & 7,914 & 8,126 & 73 & 1.56 & 47 \\
\hline 1955 & 22,847.65 & 21,797 & 22,380 & 468 & 2.07 & 226 \\
\hline 1957 & 254.83 & 240 & 246 & 8 & 2.57 & 3 \\
\hline 1967 & 7,197.79 & 6,364 & 6,534 & 664 & 5.21 & 127 \\
\hline 1968 & 4,915.08 & 4,314 & 4,429 & 486 & 5.50 & 88 \\
\hline 1969 & 106,309.16 & 92,607 & 95,083 & 11,226 & 5.80 & 1,936 \\
\hline 1970 & 49,447.17 & 42,722 & 43,864 & 5,583 & 6.12 & 912 \\
\hline 1972 & 27,293.03 & 23,163 & 23,782 & 3,511 & 6.81 & 516 \\
\hline 1973 & 16,624.26 & 13,972 & 14,346 & 2,279 & 7.18 & 317 \\
\hline 1975 & 40,170.85 & 33,056 & 33,940 & 6,231 & 7.97 & 782 \\
\hline 1976 & 88,044.35 & 71,609 & 73,524 & 14,521 & 8.40 & 1,729 \\
\hline 1979 & 113,378.56 & 88,662 & 91,032 & 22,346 & 9.81 & 2,278 \\
\hline 1980 & 89,496.62 & 68,972 & 70,816 & 18,681 & 10.32 & 1,810 \\
\hline 1981 & 46,339.08 & 35,166 & 36,106 & 10,233 & 10.85 & 943 \\
\hline 1983 & 1,035.72 & 810 & 832 & 204 & 11.01 & 19 \\
\hline 1984 & 55,468.55 & 42,711 & 43,853 & 11,616 & 11.50 & 1,010 \\
\hline 1985 & 682.59 & 517 & 531 & 152 & 12.00 & 13 \\
\hline 1986 & 8,961.01 & 6,672 & 6,850 & 2,111 & 12.52 & 169 \\
\hline 1987 & 1,501.33 & 1,098 & 1,127 & 374 & 13.04 & 29 \\
\hline 1989 & 3,777.11 & 2,645 & 2,716 & 1,061 & 14.34 & 74 \\
\hline 1990 & 32,316.86 & 22,163 & 22,756 & 9,561 & 14.89 & 642 \\
\hline 1991 & 31,063.77 & 20,844 & 21,401 & 9,662 & 15.45 & 625 \\
\hline 1992 & 74,639.01 & 48,717 & 50,020 & 24,619 & 16.23 & 1,517 \\
\hline 1993 & 5,365.13 & 3,419 & 3,510 & 1,855 & 16.80 & 110 \\
\hline 1995 & 61,979.07 & 37,324 & 38,322 & 23,657 & 18.16 & 1,303 \\
\hline 1996 & 32,361.01 & 18,951 & 19,458 & 12,903 & 18.75 & 688 \\
\hline 1997 & 92,809.77 & 52,540 & 53,945 & 38,865 & 19.55 & 1,988 \\
\hline
\end{tabular}

ACCOUNT 352 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1998 & 20,962. 30 & 11,504 & 11,812 & 9,151 & 20.14 & 454 \\
\hline 2002 & 6,096.74 & 2,875 & 2,952 & 3,145 & 22.98 & 137 \\
\hline 2003 & 85,551.29 & 38,703 & 39,738 & 45,814 & 23.60 & 1,941 \\
\hline 2005 & 54,844.28 & 22,552 & 23,155 & 31,689 & 25.06 & 1,265 \\
\hline 2006 & 93,001.45 & 36,215 & 37,183 & 55,818 & 25.87 & 2,158 \\
\hline 2009 & 1,804,021.66 & 584,503 & 600,130 & 1,203,891 & 28.17 & 42,737 \\
\hline 2010 & 223,510.21 & 67,321 & 69,121 & 154,389 & 29.00 & 5,324 \\
\hline 2011 & 53,335.98 & 14,902 & 15,300 & 38,036 & 29.65 & 1,283 \\
\hline 2012 & 68,887.19 & 17,649 & 18,121 & 50,766 & 30.48 & 1,666 \\
\hline 2013 & 66,782.50 & 15,547 & 15,963 & 50,820 & 31.31 & 1,623 \\
\hline 2016 & 1,192,897.43 & 193,011 & 198,171 & 994,726 & 33.66 & 29,552 \\
\hline 2017 & 137,122.91 & 18,854 & 19,358 & 117,765 & 34.50 & 3,413 \\
\hline 2018 & 1,697,146.33 & 192,456 & 197,602 & 1,499,545 & 35.18 & 42,625 \\
\hline 2019 & 756,066.80 & 66,988 & 68,779 & 687,288 & 36.02 & 19,081 \\
\hline 2020 & 97,009.04 & 6,189 & 6,354 & 90,655 & 36.71 & 2,469 \\
\hline 2021 & 222,339.05 & 8,582 & 8,811 & 213,528 & 37.41 & 5,708 \\
\hline & 7,611,281.65 & 2,076,006 & 2,131,308 & 5,479,974 & & 181,337 \\
\hline & 35,315,352.09 & 11,918,340 & 12,235,830 & 23,079,523 & & 1,063,483 \\
\hline & OMPOSITE REMAI & NG LIFE AND & NNUAL ACCRU & RATE, PERCEN & .. 21 & 3.01 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 353 STATION EQUIPMENT}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 38-S0
\begin{tabular}{lrrr}
1951 & 979.07 & 937 & 914 \\
1952 & \(1,190.16\) & 1,127 & 1,100 \\
1953 & \(65,505.66\) & 61,386 & 59,888 \\
1954 & \(11,486.14\) & 10,649 & 10,389 \\
1955 & \(61,071.28\) & 56,025 & 54,658 \\
1956 & \(60,990.09\) & 55,341 & 53,991 \\
1957 & \(86,908.47\) & 78,012 & 76,109 \\
1958 & \(33,021.60\) & 29,311 & 28,596 \\
1959 & \(55,816.99\) & 48,987 & 47,792 \\
1960 & \(23,329.09\) & 20,235 & 19,741 \\
1961 & \(81,952.50\) & 70,264 & 68,550 \\
1962 & \(18,324.14\) & 15,523 & 15,144 \\
1963 & \(20,583.10\) & 17,225 & 16,805 \\
1964 & \(13,828.26\) & 11,430 & 11,151 \\
1965 & \(17,792.54\) & 14,524 & 14,170 \\
1966 & \(143,803.40\) & 115,913 & 113,085 \\
1967 & \(975,188.00\) & 775,791 & 756,865 \\
1968 & \(78,739.59\) & 61,831 & 60,323 \\
1969 & \(1,533,772.95\) & \(1,188,275\) & \(1,159,287\) \\
1970 & \(6,459,813.76\) & \(4,934,975\) & \(4,814,585\) \\
1971 & \(87,558.39\) & 65,968 & 64,359 \\
1972 & \(4,411,217.70\) & \(3,275,903\) & \(3,195,986\) \\
1973 & \(773,448.92\) & 566,041 & 552,232 \\
1974 & \(904,581.39\) & 652,248 & 636,336 \\
1975 & \(3,908,635.41\) & \(2,775,131\) & \(2,707,431\) \\
1976 & \(5,008,436.75\) & \(3,501,949\) & \(3,416,518\) \\
1977 & \(1,088,065.02\) & 748,763 & 730,497 \\
1978 & \(700,826.44\) & 474,347 & 462,775 \\
1979 & \(5,847,725.14\) & \(3,893,357\) & \(3,798,377\) \\
1980 & \(2,436,747.77\) & \(1,594,778\) & \(1,555,873\) \\
1981 & \(1,676,555.67\) & \(1,077,841\) & \(1,051,547\) \\
1982 & \(4,105,660.25\) & \(2,593,053\) & \(2,529,795\) \\
1983 & \(1,107,174.65\) & 835,253 & 814,877 \\
1984 & \(3,861,029.47\) & \(2,868,745\) & \(2,798,761\) \\
1985 & \(733,765.16\) & 539,317 & 526,160 \\
1986 & \(2,304,084.46\) & \(1,665,162\) & \(1,624,540\) \\
1987 & \(1,449,195.32\) & \(1,034,146\) & \(1,008,918\) \\
1988 & \(902,832.42\) & 635,413 & 619,912 \\
1989 & \(1,952,464.49\) & \(1,353,839\) & \(1,320,812\) \\
1990 & \(658,629.36\) & 449,515 & 438,549 \\
1991 & \(902,541.66\) & 605,605 & 590,831 \\
1992 & \(2,242,525.71\) & \(1,477,376\) & \(1,441,335\) \\
& & & 2
\end{tabular}
\begin{tabular}{rrr}
65 & 1.65 & 39 \\
90 & 2.02 & 45 \\
5,618 & 2.39 & 2,351 \\
1,097 & 2.77 & 396 \\
6,413 & 3.14 & 2,042 \\
6,999 & 3.52 & 1,988 \\
10,799 & 3.89 & 2,776 \\
4,426 & 4.27 & 1,037 \\
8,025 & 4.65 & 1,726 \\
3,588 & 5.04 & 712 \\
13,402 & 5.42 & 2,473 \\
3,180 & 5.81 & 547 \\
3,778 & 6.20 & 609 \\
2,677 & 6.59 & 406 \\
3,623 & 6.98 & 519 \\
30,718 & 7.37 & 4,168 \\
218,323 & 7.77 & 28,098 \\
18,417 & 8.16 & 2,257 \\
374,486 & 8.56 & 43,748 \\
\(1,645,229\) & 8.97 & 183,415 \\
23,199 & 9.37 & 2,476 \\
\(1,215,232\) & 9.78 & 124,257 \\
221,217 & 10.19 & 21,709 \\
268,245 & 10.60 & 25,306 \\
\(1,201,204\) & 11.02 & 109,002 \\
\(1,591,919\) & 11.43 & 139,276 \\
357,568 & 11.85 & 30,175 \\
238,051 & 12.28 & 19,385 \\
\(2,049,348\) & 12.70 & 161,366 \\
880,875 & 13.13 & 67,089 \\
625,009 & 13.57 & 46,058 \\
\(1,575,865\) & 14.00 & 112,562 \\
292,298 & 12.86 & 22,729 \\
\(1,062,268\) & 13.32 & 79,750 \\
207,605 & 13.52 & 15,355 \\
679,544 & 14.01 & 48,504 \\
440,277 & 14.25 & 30,897 \\
282,920 & 14.52 & 19,485 \\
631,652 & 14.81 & 42,650 \\
220,080 & 15.12 & 14,556 \\
311,711 & 15.45 & 20,175 \\
801,191 & 15.80 & 50,708 \\
& &
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 353 STATION EQUIPMENT}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 38-S0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1993 & 1,857,120.31 & 1,199,700 & 1,170,433 & 686,687 & 16.16 & 42,493 \\
\hline 1994 & 158,251.21 & 100,126 & 97,683 & 60,568 & 16.55 & 3,660 \\
\hline 1995 & 598,597.66 & 370,412 & 361,376 & 237,222 & 16.94 & 14,004 \\
\hline 1996 & 6,150,771.67 & 3,732,288 & 3,641,238 & 2,509,534 & 17.17 & 146,158 \\
\hline 1997 & 7,161,901.06 & 4,255,602 & 4,151,785 & 3,010,116 & 17.42 & 172,797 \\
\hline 1998 & 569,958.12 & 329,550 & 321,511 & 248,447 & 17.87 & 13,903 \\
\hline 1999 & 2,142,466.53 & 1,208,351 & 1,178,873 & 963,594 & 18.17 & 53,032 \\
\hline 2000 & 1,415,759.90 & 777,252 & 758,291 & 657,469 & 18.48 & 35,577 \\
\hline 2001 & 976,385.31 & 522,757 & 510,004 & 466,381 & 18.66 & 24,994 \\
\hline 2002 & 1,641,355.67 & 851,207 & 830,442 & 810,914 & 19.03 & 42,612 \\
\hline 2003 & 1,366,784.38 & 687,629 & 670,854 & 695,930 & 19.26 & 36,133 \\
\hline 2004 & 810,075.10 & 392,643 & 383,064 & 427,011 & 19.67 & 21,709 \\
\hline 2005 & 5,689,848.17 & 2,658,297 & 2,593,447 & 3,096,401 & 19.96 & 155,130 \\
\hline 2006 & 25,548,650.99 & 11,466,235 & 11,186,512 & 14,362,139 & 20.26 & 708,891 \\
\hline 2007 & 21,811,942.09 & 9,398,766 & 9,169,480 & 12,642,462 & 20.47 & 617,609 \\
\hline 2008 & 3,206,289.06 & 1,320,350 & 1,288,140 & 1,918,149 & 20.71 & 92,619 \\
\hline 2009 & 26,642,780.62 & 10,430,649 & 10,176,190 & 16,466,591 & 20.98 & 784,871 \\
\hline 2010 & 40,311,713.22 & 14,915,334 & 14,551,469 & 25,760,244 & 21.28 & 1,210,538 \\
\hline 2011 & 24,924,790.64 & 8,683,797 & 8,471,953 & 16,452,838 & 21.50 & 765,248 \\
\hline 2012 & 43,191,530.64 & 14,058,843 & 13,715,873 & 29,475,658 & 21.76 & 1,354,580 \\
\hline 2013 & 14,188,629.80 & 4,273,615 & 4,169,359 & 10,019,271 & 22.04 & 454,595 \\
\hline 2014 & 21,090,280.35 & 5,825,135 & 5,683,029 & 15,407,251 & 22.27 & 691,839 \\
\hline 2015 & 22,650,045.89 & 5,657,981 & 5,519,953 & 17,130,093 & 22.53 & 760,324 \\
\hline 2016 & 31,206,202.97 & 6,958,983 & 6,789,216 & 24,416,987 & 22.65 & 1,078,013 \\
\hline 2017 & 12,473,258.62 & 2,414,823 & 2,355,913 & 10,117,346 & 22.91 & 441,613 \\
\hline 2018 & 9,715,917.57 & 1,587,581 & 1,548,851 & 8,167,067 & 23.05 & 354,320 \\
\hline 2019 & 11,752,453.96 & 1,541,922 & 1,504,306 & 10,248,148 & 23.17 & 442,302 \\
\hline 2020 & 24,066,738.35 & 2,334,474 & 2,277,524 & 21,789,214 & 23.27 & 936,365 \\
\hline 2021 & 63,383,055.72 & 3,841,013 & 3,747,310 & 59,635,746 & 23.25 & 2,564,978 \\
\hline 2022 & 24,061,465.76 & 510,103 & 497,659 & 23,563,807 & 23.08 & 1,020,962 \\
\hline & 507,572,819.68 & 162,556,929 & 158,591,302 & 348,981,518 & & 16,524,691 \\
\hline \multicolumn{3}{|r|}{COMPOSITE REMAINING LIFE AND} & ANNUAL ACCRU & RATE, PERCEN & . 21 & 3.26 \\
\hline
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

ACCOUNT 354 TOWERS AND FIXTURES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 80-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1915 & 22,556.01 & 20,616 & 22,556 & & & \\
\hline 1916 & 252,506.40 & 229,970 & 252,096 & 410 & 7.14 & 57 \\
\hline 1917 & 18,416.66 & 16,713 & 18,321 & 96 & 7.40 & 13 \\
\hline 1918 & 27,129.71 & 24,532 & 26,892 & 238 & 7.66 & 31 \\
\hline 1919 & 19,802.56 & 17,842 & 19,559 & 244 & 7.92 & 31 \\
\hline 1920 & 356,767.62 & 320,242 & 351,053 & 5,715 & 8.19 & 698 \\
\hline 1924 & 29,071.80 & 25,692 & 28,164 & 908 & 9.30 & 98 \\
\hline 1925 & 2,733.67 & 2,406 & 2,637 & 97 & 9.60 & 10 \\
\hline 1926 & 83,438.03 & 73,123 & 80,158 & 3,280 & 9.89 & 332 \\
\hline 1927 & 68,455.09 & 59,727 & 65,474 & 2,981 & 10.20 & 292 \\
\hline 1930 & 61,266.34 & 52,720 & 57,792 & 3,474 & 11.16 & 311 \\
\hline 1931 & 1,940.80 & 1,662 & 1,822 & 119 & 11.50 & 10 \\
\hline 1933 & 1,280.33 & 1,085 & 1,189 & 91 & 12.20 & 7 \\
\hline 1934 & 1,460.96 & 1,231 & 1,349 & 112 & 12.57 & 9 \\
\hline 1936 & 17,798.41 & 14,833 & 16,260 & 1,538 & 13.33 & 115 \\
\hline 1941 & 8,807.23 & 7,106 & 7,790 & 1,017 & 15.45 & 66 \\
\hline 1942 & 153,935.61 & 123,321 & 135,186 & 18,750 & 15.91 & 1,179 \\
\hline 1943 & 170.46 & 136 & 149 & 21 & 16.38 & 1 \\
\hline 1944 & 8,695.29 & 6,863 & 7,523 & 1,172 & 16.86 & 70 \\
\hline 1945 & 6,627.54 & 5,190 & 5,689 & 939 & 17.35 & 54 \\
\hline 1948 & 2,948.12 & 2,252 & 2,469 & 479 & 18.90 & 25 \\
\hline 1949 & 17,067.99 & 12,920 & 14,163 & 2,905 & 19.44 & 149 \\
\hline 1950 & 51,543.66 & 38,658 & 42,377 & 9,167 & 20.00 & 458 \\
\hline 1951 & 232,096.15 & 172,447 & 189,039 & 43,057 & 20.56 & 2,094 \\
\hline 1952 & 51,896.48 & 38,183 & 41,857 & 10,039 & 21.14 & 475 \\
\hline 1953 & 224,567.97 & 163,598 & 179,338 & 45,230 & 21.72 & 2,082 \\
\hline 1954 & 1,450,899.54 & 1,046,099 & 1,146,747 & 304,153 & 22.32 & 13,627 \\
\hline 1956 & 3,188,593.72 & 2,250,350 & 2,466,863 & 721,731 & 23.54 & 30,660 \\
\hline 1957 & 634,345.12 & 442,697 & 485,290 & 149,055 & 24.17 & 6,167 \\
\hline 1959 & 325,251.19 & 221,740 & 243,074 & 82,177 & 25.46 & 3,228 \\
\hline 1960 & 106,176.41 & 71,510 & 78,390 & 27,786 & 26.12 & 1,064 \\
\hline 1961 & 40,562.76 & 26,984 & 29,580 & 10,983 & 26.78 & 410 \\
\hline 1962 & 124,180.89 & 81,556 & 89,403 & 34,778 & 27.46 & 1,266 \\
\hline 1963 & 129,651.28 & 84,030 & 92,115 & 37,536 & 28.15 & 1,333 \\
\hline 1964 & 659,112.15 & 421,502 & 462,056 & 197,056 & 28.84 & 6,833 \\
\hline 1965 & 2,066,164.00 & 1,303,233 & 1,428,621 & 637,543 & 29.54 & 21,582 \\
\hline 1966 & 844,216.02 & 525,001 & 575,513 & 268,703 & 30.25 & 8,883 \\
\hline 1967 & 374,534.40 & 229,545 & 251,630 & 122,904 & 30.97 & 3,968 \\
\hline 1968 & 303,861.13 & 183,456 & 201,107 & 102,754 & 31.70 & 3,241 \\
\hline 1969 & 2,178,106.44 & 1,295,146 & 1,419,756 & 758,350 & 32.43 & 23,384 \\
\hline 1970 & 1,565,527.55 & 916,429 & 1,004,601 & 560,927 & 33.17 & 16,911 \\
\hline 1971 & 792,471.37 & 456,464 & 500,382 & 292,089 & 33.92 & 8,611 \\
\hline
\end{tabular}

\section*{ACCOUNT 354 TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 80-R3
\begin{tabular}{rrrrrrr}
1972 & \(9,079,765.41\) & \(5,143,687\) & \(5,638,576\) & \(3,441,189\) & 34.68 & 99,227 \\
1973 & \(1,591,852.85\) & 886,662 & 971,970 & 619,883 & 35.44 & 17,491 \\
1974 & \(3,295,453.19\) & \(1,803,865\) & \(1,977,420\) & \(1,318,033\) & 36.21 & 36,400 \\
1975 & \(83,192.15\) & 44,726 & 49,029 & 34,163 & 36.99 & 924 \\
1976 & \(10,308.07\) & 5,441 & 5,964 & 4,344 & 37.77 & 115 \\
1979 & \(10,045,502.79\) & \(5,001,455\) & \(5,482,659\) & \(4,562,844\) & 40.17 & 113,588 \\
1980 & \(2,930,976.76\) & \(1,429,584\) & \(1,567,128\) & \(1,363,849\) & 40.98 & 33,281 \\
1981 & \(3,704,160.77\) & \(1,768,737\) & \(1,938,913\) & \(1,765,248\) & 41.80 & 42,231 \\
1984 & \(3,183.99\) & 1,581 & 1,733 & 1,451 & 39.02 & 37 \\
1986 & \(730,292.20\) & 343,822 & 376,902 & 353,390 & 41.02 & 8,615 \\
1987 & \(10,047.65\) & 4,637 & 5,083 & 4,965 & 41.42 & 120 \\
1990 & \(1,260.31\) & 537 & 589 & 671 & 43.83 & 15 \\
1991 & \(410,767.15\) & 170,797 & 187,230 & 223,537 & 44.26 & 5,051 \\
1992 & \(885,257.07\) & 356,404 & 390,695 & 494,562 & 45.26 & 10,927 \\
1994 & \(15,372.67\) & 5,826 & 6,387 & 8,986 & 46.69 & 192 \\
1995 & \(456,266.53\) & 168,134 & 184,311 & 271,956 & 47.13 & 5,770 \\
1997 & \(95,214.92\) & 32,535 & 35,665 & 59,550 & 49.13 & 1,212 \\
1998 & \(325,213.19\) & 107,581 & 117,932 & 207,281 & 49.57 & 4,182 \\
1999 & \(399,445.96\) & 126,704 & 138,895 & 260,551 & 50.58 & 5,151 \\
2000 & \(1,063,920.07\) & 325,560 & 356,883 & 707,037 & 51.03 & 13,855 \\
2002 & \(6,008.19\) & 1,675 & 1,836 & 4,172 & 53.03 & 79 \\
2003 & \(500,906.90\) & 133,842 & 146,719 & 354,188 & 53.49 & 6,622 \\
2004 & & 37.37 &, 9 & 9,10 & 27 & 54.50
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 354 TOWERS AND FIXTURES
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    ```
(1)

ORIGINAL COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)

FUTURE BOOK REM ACCRUALS
(5)

REM. ANNUAL
LIFE ACCRUAL
(6)
(7)

SURVIVOR CURVE.. IOWA 80-R3
\begin{tabular}{rrrrrrrr}
2020 & \(1,903,746.54\) & 68,916 & 75,547 & \(1,828,200\) & 66.47 & 27,504 \\
2021 & \(5,704,545.90\) & 124,930 & 136,950 & \(5,567,596\) & 66.99 & 83,111 \\
2022 & \(4,732,333.74\) & 35,019 & 38,388 & \(4,693,946\) & 66.62 & 70,459 \\
& & & & & & & \\
\\
& \\
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 355 POLES AND FIXTURES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1931 & 7,314.59 & 7,261 & 7,315 & & & \\
\hline 1941 & 886.31 & 842 & 886 & & & \\
\hline 1943 & 115.91 & 109 & 116 & & & \\
\hline 1945 & 686.46 & 639 & 686 & & & \\
\hline 1950 & 49.50 & 45 & 49 & & & \\
\hline 1953 & 1,032.34 & 922 & 1,011 & 21 & 5.90 & 4 \\
\hline 1954 & 2,216.00 & 1,967 & 2,157 & 59 & 6.17 & 10 \\
\hline 1958 & 3,373.21 & 2,921 & 3,203 & 170 & 7.37 & 23 \\
\hline 1965 & 12,350.82 & 10,110 & 11,087 & 1,264 & 9.98 & 127 \\
\hline 1966 & 14,962.52 & 12,131 & 13,303 & 1,660 & 10.41 & 159 \\
\hline 1968 & 56,762.85 & 45,070 & 49,425 & 7,338 & 11.33 & 648 \\
\hline 1969 & 208,556.74 & 163,736 & 179,559 & 28,998 & 11.82 & 2,453 \\
\hline 1970 & 21,010.60 & 16,300 & 17,875 & 3,136 & 12.33 & 254 \\
\hline 1972 & 46,578.57 & 35,239 & 38,644 & 7,935 & 13.39 & 593 \\
\hline 1973 & 33,538.64 & 25,038 & 27,458 & 6,081 & 13.94 & 436 \\
\hline 1974 & 545,126.28 & 401,311 & 440,093 & 105,033 & 14.51 & 7,239 \\
\hline 1975 & 25,009.53 & 18,143 & 19,896 & 5,114 & 15.10 & 339 \\
\hline 1976 & 11,778.08 & 8,414 & 9,227 & 2,551 & 15.71 & 162 \\
\hline 1977 & 13,889.22 & 9,768 & 10,712 & 3,177 & 16.32 & 195 \\
\hline 1978 & 4,567.26 & 3,159 & 3,464 & 1,103 & 16.96 & 65 \\
\hline 1979 & 990,644.34 & 673,460 & 738,542 & 252,102 & 17.61 & 14,316 \\
\hline 1980 & 423,488.45 & 282,814 & 310,144 & 113,344 & 18.27 & 6,204 \\
\hline 1981 & 2,132,182.22 & 1,397,944 & 1,533,038 & 599,144 & 18.94 & 31,634 \\
\hline 1982 & 10,534.67 & 6,775 & 7,430 & 3,105 & 19.63 & 158 \\
\hline 1985 & 1,803.01 & 1,183 & 1,297 & 506 & 19.65 & 26 \\
\hline 1986 & 844,121.50 & 542,264 & 594,667 & 249,454 & 20.32 & 12,276 \\
\hline 1987 & 144,427.72 & 90,758 & 99,529 & 44,899 & 20.99 & 2,139 \\
\hline 1988 & 1,653.82 & 1,016 & 1,114 & 540 & 21.68 & 25 \\
\hline 1989 & 16,060.89 & 9,685 & 10,621 & 5,440 & 22.06 & 247 \\
\hline 1992 & 1,328,755.23 & 741,711 & 813,388 & 515,367 & 24.14 & 21,349 \\
\hline 1993 & 1,289,064.55 & 699,704 & 767,322 & 521,743 & 24.85 & 20,996 \\
\hline 1995 & 19,921.34 & 10,190 & 11,175 & 8,746 & 26.26 & 333 \\
\hline 1996 & 3,641.19 & 1,805 & 1,979 & 1,662 & 26.97 & 62 \\
\hline 1997 & 13,544.05 & 6,493 & 7,120 & 6,424 & 27.69 & 232 \\
\hline 1999 & 281,368.65 & 125,631 & 137,772 & 143,597 & 29.13 & 4,930 \\
\hline 2000 & 258,598.42 & 111,146 & 121,887 & 136,711 & 29.85 & 4,580 \\
\hline 2002 & 218.81 & 87 & 95 & 124 & 31.32 & 4 \\
\hline 2003 & 911,141.74 & 344,685 & 377,995 & 533,147 & 32.05 & 16,635 \\
\hline 2004 & 173,037.20 & 62,432 & 68,465 & 104,572 & 32.78 & 3,190 \\
\hline 2005 & 1,617,250.03 & 551,806 & 605,131 & 1,012,119 & 33.78 & 29,962 \\
\hline 2006 & 1,082,129.85 & 349,961 & 383,780 & 698,350 & 34.52 & 20,230 \\
\hline 2007 & 280.47 & 86 & 94 & 186 & 35.26 & 5 \\
\hline
\end{tabular}
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CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL

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\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R3
\begin{tabular}{rrrrrrr}
2008 & \(760,611.95\) & 218,372 & 239,475 & 521,137 & 36.01 & 14,472 \\
2009 & \(2,826,702.44\) & 759,252 & 832,624 & \(1,994,078\) & 36.75 & 54,261 \\
2010 & \(320,152.12\) & 80,038 & 87,773 & 232,379 & 37.50 & 6,197 \\
2011 & \(13,865,327.94\) & \(3,205,664\) & \(3,515,452\) & \(10,349,876\) & 38.25 & 270,585 \\
2012 & \(704,554.90\) & 148,661 & 163,027 & 541,528 & 39.25 & 13,797 \\
2013 & \(18,690,667.11\) & \(3,586,739\) & \(3,933,354\) & \(14,757,313\) & 40.00 & 368,933 \\
2014 & \(1,048,026.57\) & 180,889 & 198,370 & 849,657 & 40.76 & 20,845 \\
2015 & \(203,710.28\) & 31,168 & 34,180 & 169,530 & 41.52 & 4,083 \\
2016 & \(233,094.61\) & 31,048 & 34,048 & 199,047 & 42.28 & 4,708 \\
2017 & \(1,410,218.31\) & 159,778 & 175,219 & \(1,234,999\) & 43.04 & 28,694 \\
2018 & \(3,729,654.23\) & 347,604 & 381,196 & \(3,348,458\) & 43.81 & 76,431 \\
2019 & \(308,153.41\) & 22,434 & 24,602 & 283,551 & 44.58 & 6,360 \\
2020 & \(319,306.60\) & 16,668 & 18,279 & 301,028 & 45.35 & 6,638 \\
2022 & \(11,239,761.39\) & 121,389 & 133,119 & \(11,106,642\) & 46.01 & 241,396 \\
& & & & & & \\
& \(68,213,615.44\) & \(15,684,465\) & \(17,199,469\) & \(51,014,146\) & & \(1,319,640\)
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 38.7 1.93

ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R3
\begin{tabular}{|c|c|c|c|}
\hline 1931 & 2,078.34 & 1,934 & 2,078 \\
\hline 1941 & 6,183.65 & 5,504 & 6,027 \\
\hline 1942 & 2,610.78 & 2,312 & 2,532 \\
\hline 1943 & 1,741.96 & 1,535 & 1,681 \\
\hline 1945 & 9,934.32 & 8,664 & 9,487 \\
\hline 1948 & 6,056.72 & 5,191 & 5,684 \\
\hline 1950 & 37,110.50 & 31,407 & 34,392 \\
\hline 1951 & 32,691.44 & 27,481 & 30,093 \\
\hline 1952 & 21,188.33 & 17,684 & 19,365 \\
\hline 1953 & 161,095.25 & 133,461 & 146,146 \\
\hline 1954 & 679,770.37 & 558,873 & 611,990 \\
\hline 1956 & 973,203.30 & 787,098 & 861,907 \\
\hline 1957 & 242,243.17 & 194,243 & 212,705 \\
\hline 1958 & 5,690.51 & 4,522 & 4,952 \\
\hline 1959 & 152,922.57 & 120,362 & 131,802 \\
\hline 1960 & 280,410.40 & 218,591 & 239,367 \\
\hline 1961 & 11,921.41 & 9,198 & 10,072 \\
\hline 1962 & 149,229.62 & 113,919 & 124,746 \\
\hline 1963 & 45,875.80 & 34,640 & 37,932 \\
\hline 1964 & 164,782.24 & 123,003 & 134,694 \\
\hline 1965 & 1,766,417.84 & 1,303,069 & 1,426,918 \\
\hline 1966 & 417,502.10 & 304,263 & 333,181 \\
\hline 1967 & 251,036.14 & 180,631 & 197,799 \\
\hline 1968 & 806,957.44 & 573,061 & 627,527 \\
\hline 1969 & 1,941,534.28 & 1,360,278 & 1,489,564 \\
\hline 1970 & 1,116,496.08 & 771,242 & 844,544 \\
\hline 1971 & 123,056.26 & 83,773 & 91,735 \\
\hline 1972 & 4,089,259.92 & 2,742,339 & 3,002,982 \\
\hline 1973 & 1,183,980.26 & 781,794 & 856,099 \\
\hline 1974 & 2,362,731.86 & 1,535,421 & 1,681,353 \\
\hline 1975 & 33,387.14 & 21,342 & 23,370 \\
\hline 1976 & 1,264,979.29 & 794,799 & 870,340 \\
\hline 1977 & 72,464.80 & 44,738 & 48,990 \\
\hline 1978 & 880.47 & 534 & 585 \\
\hline 1979 & 2,641,976.45 & 1,571,765 & 1,721,152 \\
\hline 1980 & 1,747,801.84 & 1,019,912 & 1,116,848 \\
\hline 1981 & 3,124,060.49 & 1,786,963 & 1,956,803 \\
\hline 1982 & 54,591.56 & 30,588 & 33,495 \\
\hline 1983 & 23,801.35 & 14,290 & 15,648 \\
\hline 1984 & 15,432.58 & 9,090 & 9,954 \\
\hline 1985 & 2,573,990.02 & 1,486,479 & 1,627,760 \\
\hline 1986 & 978,114.49 & 549,798 & 602,053 \\
\hline
\end{tabular}
\begin{tabular}{|c|c|c|}
\hline 157 & 7.14 & 22 \\
\hline 79 & 7.43 & 11 \\
\hline 61 & 7.71 & 8 \\
\hline 447 & 8.31 & 54 \\
\hline 373 & 9.29 & 40 \\
\hline 2,718 & 9.99 & 272 \\
\hline 2,598 & 10.36 & 251 \\
\hline 1,823 & 10.75 & 170 \\
\hline 14,949 & 11.15 & 1,341 \\
\hline 67,780 & 11.56 & 5,863 \\
\hline 111,296 & 12.43 & 8,954 \\
\hline 29,538 & 12.88 & 2,293 \\
\hline 739 & 13.35 & 55 \\
\hline 21,121 & 13.84 & 1,526 \\
\hline 41,043 & 14.33 & 2,864 \\
\hline 1,849 & 14.85 & 125 \\
\hline 24,484 & 15.38 & 1,592 \\
\hline 7,944 & 15.92 & 499 \\
\hline 30,088 & 16.48 & 1,826 \\
\hline 339,500 & 17.05 & 19,912 \\
\hline 84,321 & 17.63 & 4,783 \\
\hline 53,237 & 18.23 & 2,920 \\
\hline 179,430 & 18.84 & 9,524 \\
\hline 451,970 & 19.46 & 23,226 \\
\hline 271,952 & 20.10 & 13,530 \\
\hline 31,321 & 20.75 & 1,509 \\
\hline 1,086,278 & 21.41 & 50,737 \\
\hline 327,881 & 22.08 & 14,850 \\
\hline 681,379 & 22.76 & 29,938 \\
\hline 10,017 & 23.45 & 427 \\
\hline 394,639 & 24.16 & 16,334 \\
\hline 23,475 & 24.87 & 944 \\
\hline 295 & 25.59 & 12 \\
\hline 920,824 & 26.33 & 34,972 \\
\hline 630,954 & 27.07 & 23,308 \\
\hline 1,167,257 & 27.82 & 41,957 \\
\hline 21,097 & 28.58 & 738 \\
\hline 8,153 & 26.29 & 310 \\
\hline 5,479 & 26.86 & 204 \\
\hline 946,230 & 27.44 & 34,484 \\
\hline 376,061 & 28.44 & 13,223 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 356 OVERHEAD CONDUCTORS AND DEVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1987 & 173,038.16 & 95,206 & 104,255 & 68,783 & 29.02 & 2,370 \\
\hline 1988 & 21,536.52 & 11,591 & 12,693 & 8,844 & 29.60 & 299 \\
\hline 1989 & 3,283.88 & 1,727 & 1,891 & 1,393 & 30.19 & 46 \\
\hline 1990 & 87,640.76 & 44,714 & 48,964 & 38,677 & 31.20 & 1,240 \\
\hline 1991 & 3,508.21 & 1,746 & 1,912 & 1,596 & 31.79 & 50 \\
\hline 1992 & 2,763,428.06 & 1,340,263 & 1,467,647 & 1,295,781 & 32.39 & 40,006 \\
\hline 1993 & 1,149,385.53 & 539,062 & 590,297 & 559,089 & 33.40 & 16,739 \\
\hline 1994 & 2,474.14 & 1,128 & 1,235 & 1,239 & 34.00 & 36 \\
\hline 1995 & 17,325.66 & 7,672 & 8,401 & 8,925 & 34.61 & 258 \\
\hline 1996 & 7,586.90 & 3,257 & 3,567 & 4,020 & 35.23 & 114 \\
\hline 1997 & 19,444.36 & 8,032 & 8,795 & 10,649 & 36.23 & 294 \\
\hline 1999 & 5,271.29 & 2,032 & 2,225 & 3,046 & 37.48 & 81 \\
\hline 2000 & 1,966.98 & 726 & 795 & 1,172 & 38.48 & 30 \\
\hline 2002 & 5,143.94 & 1,740 & 1,905 & 3,239 & 40.11 & 81 \\
\hline 2003 & 794,282.81 & 257,109 & 281,546 & 512,737 & 40.74 & 12,586 \\
\hline 2004 & 955,490.17 & 295,246 & 323,307 & 632,183 & 41.38 & 15,278 \\
\hline 2005 & 2,941,747.14 & 859,579 & 941,277 & 2,000,470 & 42.38 & 47,203 \\
\hline 2006 & 1,467,812.82 & 406,878 & 445,549 & 1,022,264 & 43.02 & 23,763 \\
\hline 2007 & 2,311,002.30 & 605,483 & 663,030 & 1,647,972 & 43.67 & 37,737 \\
\hline 2009 & 15,401,549.10 & 3,534,656 & 3,870,604 & 11,530,945 & 45.32 & 254,434 \\
\hline 2010 & 2,830,206.31 & 601,419 & 658,580 & 2,171,626 & 46.32 & 46,883 \\
\hline 2011 & 3,417,141.68 & 671,810 & 735,662 & 2,681,480 & 46.98 & 57,077 \\
\hline 2012 & 4,436,388.12 & 801,212 & 877,362 & 3,559,026 & 47.64 & 74,707 \\
\hline 2013 & 8,552,929.26 & 1,397,549 & 1,530,378 & 7,022,551 & 48.64 & 144,378 \\
\hline 2014 & 7,435,496.89 & 1,093,018 & 1,196,903 & 6,238,594 & 49.31 & 126,518 \\
\hline 2015 & 2,173,569.32 & 282,129 & 308,944 & 1,864,625 & 50.30 & 37,070 \\
\hline 2016 & 4,071,983.63 & 460,541 & 504,313 & 3,567,671 & 50.97 & 69,996 \\
\hline 2017 & 12,907,141.44 & 1,241,667 & 1,359,679 & 11,547,462 & 51.65 & 223,571 \\
\hline 2018 & 11,852,356.53 & 938,707 & 1,027,925 & 10,824,432 & 52.32 & 206,889 \\
\hline 2019 & 1,783,567.80 & 110,581 & 121,091 & 1,662,477 & 52.99 & 31,373 \\
\hline 2020 & 4,485,514.91 & 199,605 & 218,576 & 4,266,939 & 53.68 & 79,488 \\
\hline 2021 & 6,908,363.50 & 185,144 & 202,741 & 6,705,622 & 54.37 & 123,333 \\
\hline 2022 & 32,239,195.85 & 293,377 & 321,261 & 31,917,935 & 54.45 & 586,188 \\
\hline & 160,803,967.31 & 35,660,397 & 39,049,662 & 121,754,305 & & 625,724 \\
\hline
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 46.4 1.63

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 357 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 60-S3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1956 & 91,709.41 & 77,036 & 77,469 & 14,240 & 9.60 & 1,483 \\
\hline 1958 & 3,594,249.57 & 2,980,244 & 2,996,978 & 597,272 & 10.25 & 58,270 \\
\hline 1960 & 263,024.66 & 215,109 & 216,317 & 46,708 & 10.93 & 4,273 \\
\hline 1961 & 10,434.81 & 8,471 & 8,519 & 1,916 & 11.29 & 170 \\
\hline 1967 & 391,921.15 & 302,367 & 304,065 & 87,856 & 13.71 & 6,408 \\
\hline 1972 & 165,588.11 & 121,128 & 121,808 & 43,780 & 16.11 & 2,718 \\
\hline 1974 & 5,897.53 & 4,208 & 4,232 & 1,666 & 17.19 & 97 \\
\hline 1975 & 4,528.32 & 3,189 & 3,207 & 1,321 & 17.75 & 74 \\
\hline 1979 & 28,640,461.01 & 19,002,946 & 19,109,647 & 9,530,814 & 20.19 & 472,056 \\
\hline 1980 & 659,680.65 & 430,554 & 432,972 & 226,709 & 20.84 & 10,879 \\
\hline 1983 & 16,636.13 & 10,973 & 11,035 & 5,601 & 20.38 & 275 \\
\hline 1985 & 432,054.70 & 273,836 & 275,374 & 156,681 & 21.67 & 7,230 \\
\hline 1986 & 640,900.19 & 397,679 & 399,912 & 240,988 & 22.32 & 10,797 \\
\hline 1990 & 1,493,297.60 & 839,532 & 844,246 & 649,052 & 25.31 & 25,644 \\
\hline 1996 & 13,656.62 & 6,369 & 6,405 & 7,252 & 30.32 & 239 \\
\hline 2003 & 528,003.76 & 183,270 & 184,299 & 343,705 & 36.68 & 9,370 \\
\hline 2005 & 663,726.32 & 206,751 & 207,912 & 455,814 & 38.68 & 11,784 \\
\hline 2006 & 258,941.50 & 76,491 & 76,920 & 182,022 & 39.36 & 4,625 \\
\hline 2007 & 24,875,884.97 & 6,900,570 & 6,939,316 & 17,936,569 & 40.37 & 444,304 \\
\hline 2009 & 151.78 & 37 & 37 & 115 & 42.37 & 3 \\
\hline 2010 & 109,559.76 & 24,519 & 24,657 & 84,903 & 43.36 & 1,958 \\
\hline 2011 & 1,291,616.16 & 265,815 & 267,308 & 1,024,308 & 44.37 & 23,086 \\
\hline 2012 & 5,757,829.90 & 1,082,472 & 1,088,550 & 4,669,280 & 45.36 & 102,938 \\
\hline 2013 & 766,004.08 & 130,221 & 130,952 & 635,052 & 46.37 & 13,695 \\
\hline 2015 & 1,610,380.03 & 216,113 & 217,326 & 1,393,054 & 48.37 & 28,800 \\
\hline 2016 & 8,399,786.68 & 977,735 & 983,225 & 7,416,562 & 49.36 & 150,254 \\
\hline 2017 & 62,256.13 & 6,126 & 6,160 & 56,096 & 50.37 & 1,114 \\
\hline 2019 & 100,580.89 & 6,296 & 6,331 & 94,250 & 52.37 & 1,800 \\
\hline 2021 & 2,153,370.44 & 57,710 & 58,035 & 2,095,336 & 54.37 & 38,538 \\
\hline & 83,002,132.86 & 34,807,767 & 35,003,214 & 47,998,919 & & 1,432,882 \\
\hline
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 33.5 1.73

\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 60-R3
\begin{tabular}{rrrrrrr}
1951 & \(1,354.21\) & 1,181 & 1,213 & 141 & 7.69 & 18 \\
1958 & \(682,721.48\) & 567,225 & 582,440 & 100,281 & 10.15 & 9,880 \\
1959 & \(1,734.81\) & 1,429 & 1,467 & 268 & 10.56 & 25 \\
1967 & \(234,265.23\) & 178,119 & 182,897 & 51,368 & 14.38 & 3,572 \\
1968 & \(16,406.10\) & 12,324 & 12,655 & 3,751 & 14.93 & 251 \\
1972 & \(166,364.12\) & 118,480 & 121,658 & 44,706 & 17.27 & 2,589 \\
1975 & \(133,852.47\) & 91,064 & 93,507 & 40,345 & 19.18 & 2,103 \\
1979 & \(15,214,168.21\) & \(9,663,583\) & \(9,922,792\) & \(5,291,376\) & 21.89 & 241,726 \\
1980 & \(16,780.81\) & 10,460 & 10,741 & 6,040 & 22.60 & 267 \\
1982 & \(59,202.52\) & 35,472 & 36,423 & 22,780 & 24.05 & 947 \\
1983 & \(506,148.08\) & 323,884 & 332,572 & 173,576 & 22.23 & 7,808 \\
1986 & \(152,648.85\) & 91,925 & 94,391 & 58,258 & 24.11 & 2,416 \\
2000 & 167.28 & 67 & 69 & 98 & 34.00 & 3 \\
2004 & \(62,823.35\) & 20,920 & 21,481 & 41,342 & 37.06 & 1,116 \\
2005 & \(167,990.92\) & 52,917 & 54,336 & 113,655 & 38.06 & 2,986 \\
2006 & \(200,225.61\) & 59,787 & 61,391 & 138,835 & 38.75 & 3,583 \\
2007 & \(15,097,412.46\) & \(4,258,980\) & \(4,373,219\) & \(10,724,193\) & 39.45 & 271,843 \\
2008 & \(6,752,475.11\) & \(1,792,107\) & \(1,840,177\) & \(4,912,298\) & 40.14 & 122,379 \\
2009 & \(59,774.39\) & 14,764 & 15,160 & 44,614 & 41.15 & 1,084 \\
2010 & \(18,202,674.39\) & \(4,186,615\) & \(4,298,914\) & \(13,903,760\) & 41.85 & 332,228 \\
2011 & \(19,267,198.48\) & \(4,100,060\) & \(4,210,037\) & \(15,057,161\) & 42.55 & 353,870 \\
2012 & \(13,991,383.77\) & \(2,717,127\) & \(2,790,009\) & \(11,201,375\) & 43.56 & 257,148 \\
2013 & \(12,701,009.59\) & \(2,244,268\) & \(2,304,466\) & \(10,396,544\) & 44.26 & 234,897 \\
2015 & \(3,835.60\) & 5,541 & 5,956 & 3,280 & 45.69 & 72 \\
2016 & \(42,217,507.80\) & \(5,158,979\) & \(5,297,359\) & \(36,920,149\) & 46.69 & 790,751 \\
2017 & \(1,624,130.68\) & 168,910 & 173,441 & \(1,450,690\) & 47.41 & 30,599 \\
2021 & \(2,559,439.37\) & 74,480 & 76,478 & \(2,482,961\) & 50.05 & 49,610 \\
2022 & \(11,353,247.26\) & 111,262 & 114,246 & \(11,239,001\) & 50.26 & 223,617 \\
& & & & & &
\end{tabular}

\footnotetext{
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 42.2 1.83
}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 359 ROADS AND TRAILS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    ```
(1)

ORIGINAL COST
(2)

\section*{CALCULATED ACCRUED}
(3)

ALLOC. BOOK RESERVE
(4)
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 60-R4
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2011 & 2,091,746.25 & 423,369 & 426,058 & 1,665,688 & 45.32 & 36,754 \\
\hline 2012 & 2.55 & & & 3 & 46.32 & \\
\hline 2013 & 7,171,325.17 & 1,206,217 & 1,213,877 & 5,957,448 & 46.99 & 126,781 \\
\hline 2014 & 30,518.01 & 4,590 & 4,619 & 25,899 & 48.00 & 540 \\
\hline 2018 & 892,401.86 & 71,035 & 71,487 & 820,915 & 52.00 & 15,787 \\
\hline & 10,185,993.84 & 1,705,211 & 1,716,041 & 8,469,953 & & 179,862 \\
\hline \multicolumn{6}{|r|}{COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT . 47.1} & 1.77 \\
\hline
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

ALLOC. BOOK
RESERVE
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL
ACCRUAL
(7)

AMBRIDGE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2046
\begin{tabular}{rrrrrrr}
1981 & \(5,814.48\) & 3,789 & 3,866 & 1,949 & 20.65 & 94 \\
1986 & \(40,920.20\) & 26,140 & 26,670 & 14,251 & 20.64 & 690 \\
1991 & \(77,831.17\) & 46,341 & 47,280 & 30,551 & 21.41 & 1,427 \\
2019 & \(1,068,177.57\) & 141,320 & 144,183 & 923,994 & 22.96 & 40,244 \\
2021 & \(175,023.41\) & 10,746 & 10,964 & 164,060 & 22.95 & 7,149 \\
& & & & & & 49,604
\end{tabular}

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1922 & 52,582.64 & 50,020 & 51,033 & 1,549 & 3.41 & 454 \\
\hline 1927 & 368.12 & 348 & 355 & 13 & 3.81 & 3 \\
\hline 1928 & 31,754.88 & 29,995 & 30,603 & 1,152 & 3.87 & 298 \\
\hline 1929 & 2,944.17 & 2,778 & 2,834 & 110 & 3.93 & 28 \\
\hline 1931 & 245.76 & 232 & 237 & 9 & 4.04 & 2 \\
\hline 1941 & 75.50 & 71 & 72 & 3 & 4.49 & 1 \\
\hline 1945 & 1,218.72 & 1,135 & 1,158 & 61 & 4.65 & 13 \\
\hline 1948 & 124.18 & 115 & 117 & 7 & 4.76 & 1 \\
\hline 1949 & 376.85 & 350 & 357 & 20 & 4.80 & 4 \\
\hline 1953 & 837.65 & 774 & 790 & 48 & 4.93 & 10 \\
\hline 1955 & 2,087.55 & 1,924 & 1,963 & 125 & 4.99 & 25 \\
\hline 1956 & 58,200.50 & 53,586 & 54,672 & 3,529 & 5.02 & 703 \\
\hline 1957 & 71,118.54 & 65,412 & 66,737 & 4,381 & 5.04 & 869 \\
\hline 1962 & 978.21 & 894 & 912 & 66 & 5.16 & 13 \\
\hline 1964 & 21,129.51 & 19,256 & 19,646 & 1,483 & 5.20 & 285 \\
\hline 1966 & 13,198.58 & 11,993 & 12,236 & 963 & 5.23 & 184 \\
\hline 1967 & 91,030.47 & 82,582 & 84,255 & 6,776 & 5.25 & 1,291 \\
\hline 1970 & 20,141.52 & 18,182 & 18,550 & 1,591 & 5.29 & 301 \\
\hline 1973 & 647.10 & 581 & 593 & 54 & 5.32 & 10 \\
\hline 1974 & 146.62 & 131 & 134 & 13 & 5.33 & 2 \\
\hline 1975 & 3,361.12 & 3,005 & 3,066 & 295 & 5.34 & 55 \\
\hline 1976 & 3,395.31 & 3,029 & 3,090 & 305 & 5.35 & 57 \\
\hline 1977 & 4,842.39 & 4,310 & 4,397 & 445 & 5.36 & 83 \\
\hline 1978 & 47,444.35 & 42,131 & 42,984 & 4,460 & 5.37 & 831 \\
\hline 1979 & 90,150.61 & 79,873 & 81,491 & 8,660 & 5.37 & 1,613 \\
\hline 1980 & 13,765.95 & 12,164 & 12,410 & 1,356 & 5.38 & 252 \\
\hline 1981 & 126,496.20 & 111,472 & 113,730 & 12,766 & 5.39 & 2,368 \\
\hline 1983 & 257,862.32 & 227,125 & 231,726 & 26,136 & 5.35 & 4,885 \\
\hline
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

DRAVOSBURG SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028
\begin{tabular}{rrrrrrr}
1988 & \(7,745.87\) & 6,708 & 6,844 & 902 & 5.34 & 169 \\
1996 & \(98,340.59\) & 81,564 & 83,216 & 15,124 & 5.45 & 2,775 \\
1998 & \(53,866.43\) & 44,079 & 44,972 & 8,894 & 5.44 & 1,635 \\
1999 & \(99,644.81\) & 80,792 & 82,429 & 17,216 & 5.48 & 3,142 \\
2004 & \(80,903.79\) & 62,409 & 63,673 & 17,230 & 5.48 & 3,144 \\
2011 & \(61,099.60\) & 41,389 & 42,227 & 18,872 & 5.48 & 3,444 \\
2013 & \(31,878.83\) & 20,198 & 20,607 & 11,272 & 5.49 & 2,053 \\
2014 & \(84,211.71\) & 51,184 & 52,221 & 31,991 & 5.49 & 5,827 \\
2022 & \(133,045.26\) & 11,123 & 11,348 & 121,697 & 5.48 & 22,207 \\
& \(1,567,262.21\) & \(1,222,914\) & \(1,247,688\) & 319,574 & & 59,037
\end{tabular}

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022
\begin{tabular}{lrrr}
1918 & \(6,479.65\) & 6,480 & 6,480 \\
1920 & \(1,139.38\) & 1,139 & 1,139 \\
1924 & \(21,829.47\) & 21,829 & 21,829 \\
1925 & 130.20 & 130 & 130 \\
1926 & \(6,879.41\) & 6,879 & 6,879 \\
1927 & \(7,591.79\) & 7,592 & 7,592 \\
1928 & \(1,550.59\) & 1,551 & 1,551 \\
1929 & 41.37 & 41 & 41 \\
1936 & 124.43 & 124 & 124 \\
1941 & 385.02 & 385 & 385 \\
1945 & 91.20 & 91 & 91 \\
1947 & 185.32 & 185 & 185 \\
1948 & \(3,776.50\) & 3,776 & 3,777 \\
1950 & \(3,345.31\) & 3,345 & 3,345 \\
1951 & 363.99 & 364 & 364 \\
1954 & 239.48 & 239 & 239 \\
1956 & \(3,964.21\) & 3,964 & 3,964 \\
1958 & \(5,227.70\) & 5,228 & 5,228 \\
1960 & \(1,588.13\) & 1,588 & 1,588 \\
1964 & \(4,364.80\) & 4,365 & 4,365 \\
1965 & \(26,341.57\) & 26,342 & 26,342 \\
1969 & 991.16 & 991 & 991 \\
1970 & \(26,477.66\) & 26,478 & 26,478 \\
1972 & \(649,046.00\) & 649,046 & 649,046
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

NORTH SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2022
\begin{tabular}{rrrr}
1975 & \(10,827.98\) & 10,828 & 10,828 \\
1978 & \(10,129.72\) & 10,130 & 10,130 \\
1982 & \(19,253.95\) & 19,254 & 19,254 \\
1987 & 992.73 & 993 & 993 \\
1989 & \(8,142.94\) & 8,143 & 8,143 \\
1992 & \(11,155.20\) & 11,155 & 11,155 \\
1995 & \(1,769.50\) & 1,770 & 1,770 \\
1998 & \(3,928.52\) & 3,929 & 3,929 \\
1999 & \(113,103.99\) & 113,104 & 113,104 \\
2000 & \(2,114.00\) & 2,114 & 2,114 \\
2002 & \(92,388.44\) & 92,388 & 92,388 \\
2006 & \(48,955.91\) & 48,956 & 48,956 \\
2007 & \(3,382.83\) & 3,383 & 3,383 \\
2009 & \(113,808.87\) & 113,809 & 113,809 \\
2011 & \(77,040.51\) & 77,041 & 77,041 \\
2014 & \(133,046.28\) & 133,046 & 133,046 \\
2019 & \(56,760.10\) & 56,760 & 56,760 \\
2022 & \(119,616.56\) & 119,617 & 119,616 \\
& & & \\
& \(1,598,572.37\) & \(1,598,572\) & \(1,598,572\)
\end{tabular}

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020
\begin{tabular}{rrrr}
1925 & \(5,580.60\) & 5,581 & 5,581 \\
1926 & \(5,585.75\) & 5,586 & 5,586 \\
1927 & \(8,368.56\) & 8,369 & 8,369 \\
1928 & \(194,910.32\) & 194,910 & 194,910 \\
1939 & \(4,857.87\) & 4,858 & 4,858 \\
1941 & 390.66 & 391 & 391 \\
1945 & \(7,822.11\) & 7,822 & 7,822 \\
1948 & \(1,280.08\) & 1,280 & 1,280 \\
1951 & \(1,451.21\) & 1,451 & 1,451 \\
1955 & \(13,175.67\) & 13,176 & 13,176 \\
1959 & \(1,046.38\) & 1,046 & 1,046 \\
1962 & \(4,795.76\) & 4,796 & 4,796 \\
1964 & \(7,377.68\) & 7,378 & 7,378 \\
1968 & \(2,731.98\) & 2,732 & 2,732 \\
1970 & \(3,738.69\) & 3,739 & 3,739
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

VALLEY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2020
\begin{tabular}{rrrr}
1973 & \(6,413.14\) & 6,413 & 6,413 \\
1975 & \(847,423.37\) & 847,423 & 847,423 \\
1976 & \(40,937.27\) & 40,937 & 40,937 \\
1977 & \(1,455.67\) & 1,456 & 1,456 \\
1979 & \(11,730.51\) & 11,731 & 11,731 \\
1981 & \(2,663.43\) & 2,663 & 2,663 \\
1988 & \(15,907.68\) & 15,908 & 15,908 \\
1990 & \(20,549.10\) & 20,549 & 20,549 \\
1995 & \(97,828.82\) & 97,829 & 97,829 \\
1996 & \(75,615.66\) & 75,616 & 75,616 \\
1999 & \(12,089.25\) & 12,089 & 12,089 \\
2000 & \(141,263.00\) & 141,263 & 141,263 \\
2018 & \(14,164.13\) & 14,164 & 14,164 \\
2019 & \(4,199.09\) & 4,199 & 4,199 \\
& & & \\
& \(1,555,353.44\) & \(1,555,355\) & \(1,555,353\)
\end{tabular}

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1920 & 14,374.82 & 13,584 & 13,882 & 493 & 3.85 & 128 \\
\hline 1924 & 1,188.20 & 1,106 & 1,130 & 58 & 4.87 & 12 \\
\hline 1925 & 1,157.95 & 1,073 & 1,097 & 61 & 5.13 & 12 \\
\hline 1926 & 64.81 & 60 & 61 & 3 & 5.38 & 1 \\
\hline 1927 & 39.86 & 37 & 38 & 2 & 5.63 & \\
\hline 1928 & 442.76 & 406 & 415 & 28 & 5.88 & 5 \\
\hline 1930 & 1,587.43 & 1,443 & 1,475 & 113 & 6.37 & 18 \\
\hline 1933 & 263.54 & 237 & 242 & 21 & 7.06 & 3 \\
\hline 1942 & 487.91 & 424 & 433 & 55 & 9.08 & 6 \\
\hline 1943 & 1,423.28 & 1,233 & 1,260 & 163 & 9.30 & 18 \\
\hline 1951 & 230.13 & 193 & 197 & 33 & 11.17 & 3 \\
\hline 1954 & 1,127.23 & 931 & 951 & 176 & 11.86 & 15 \\
\hline 1956 & 50,184.58 & 41,068 & 41,968 & 8,217 & 12.32 & 667 \\
\hline 1957 & 5,631.94 & 4,587 & 4,688 & 944 & 12.54 & 75 \\
\hline 1961 & 30,134.74 & 24,056 & 24,583 & 5,552 & 13.38 & 415 \\
\hline 1966 & 4,138.08 & 3,218 & 3,289 & 850 & 14.29 & 59 \\
\hline 1967 & 4,390.49 & 3,396 & 3,470 & 920 & 14.46 & 64 \\
\hline 1968 & 7,090.25 & 5,454 & 5,574 & 1,517 & 14.61 & 104 \\
\hline 1970 & 33,377.46 & 25,386 & 25,942 & 7,435 & 14.91 & 499 \\
\hline
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODVILLE SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2040
\begin{tabular}{rrrrrrr}
1971 & \(29,789.04\) & 22,529 & 23,023 & 6,766 & 15.04 & 450 \\
1974 & \(1,775.01\) & 1,319 & 1,348 & 427 & 15.41 & 28 \\
1978 & \(2,972.18\) & 2,151 & 2,198 & 774 & 15.83 & 49 \\
1982 & \(4,021.46\) & 2,826 & 2,888 & 1,134 & 16.16 & 70 \\
1983 & \(1,353.47\) & 962 & 983 & 370 & 16.06 & 23 \\
1987 & \(5,728.38\) & 3,925 & 4,011 & 1,717 & 16.31 & 105 \\
1988 & \(25,810.52\) & 17,541 & 17,925 & 7,885 & 16.26 & 485 \\
1991 & \(107,327.68\) & 70,321 & 71,862 & 35,466 & 16.58 & 2,139 \\
1995 & \(476,304.56\) & 296,023 & 302,511 & 173,794 & 16.75 & 10,376 \\
1996 & \(191,150.65\) & 117,022 & 119,587 & 71,564 & 16.79 & 4,262 \\
1999 & \(31,301.20\) & 18,242 & 18,642 & 12,659 & 16.82 & 753 \\
2003 & \(19,751.33\) & 10,553 & 10,784 & 8,967 & 17.00 & 527 \\
2005 & \(101,679.54\) & 51,602 & 52,733 & 48,947 & 16.98 & 2,883 \\
2009 & \(104,047.62\) & 45,791 & 46,795 & 57,253 & 17.17 & 3,334 \\
2011 & \(79,659.98\) & 31,976 & 32,677 & 46,983 & 17.15 & 2,740 \\
2022 & \(199,563.23\) & 5,628 & 5,751 & 193,812 & 17.20 & 11,268 \\
& & & & & & 4,596
\end{tabular}

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2049
\begin{tabular}{rrrrrrr}
1959 & \(797,697.07\) & 613,365 & 626,808 & 170,889 & 15.94 & 10,721 \\
1961 & \(8,431.74\) & 6,381 & 6,521 & 1,911 & 16.70 & 114 \\
1965 & 719.03 & 697.13 & 526 & 538 & 182 & 18.17 \\
1971 & \(8,174.05\) & 5,196 & 5,310 & 203 & 20.16 & 10 \\
1980 & \(11,912.47\) & 7,623 & 7,790 & 2,864 & 22.48 & 10 \\
1983 & 125.06 & 76 & 78 & 4,122 & 22.23 & 127 \\
1987 & \(6,782.86\) & 3,889 & 3,974 & 47 & 22.98 & 185 \\
1991 & \(85,627.02\) & 44,697 & 45,677 & 2,809 & 23.45 & 2 \\
1996 & \(14,754.40\) & 6,684 & 6,830 & 39,950 & 24.26 & 120 \\
2002 & \(7,298.88\) & 2,783 & 2,844 & 7,924 & 24.75 & 1,647 \\
2007 & \(80,337.57\) & 27,877 & 28,488 & 4,455 & 25.15 & 320 \\
2009 & \(903,749.19\) & 94,648 & 96,722 & 207,027 & 25.40 & 177 \\
2011 & & & & & 2,041 \\
& & & & & & 851
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)
ORIGINAL
COST
(2)

\section*{CALCULATED
ACCRUED}
(3)

\section*{ALLOC. BOOK RESERVE}
(4)
\begin{tabular}{cl} 
FUTURE BOOK & REM. \\
ACCRUALS & LIFE
\end{tabular}
(6)

ANNUAL ACCRUAL (7)

FORBES SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2049
\begin{tabular}{rrrrrrr}
2012 & \(985,777.66\) & 287,748 & 294,054 & 691,723 & 25.47 & 27,158 \\
2014 & \(25,571.73\) & 6,367 & 6,507 & 19,065 & 25.63 & 744 \\
2021 & \(130,312.26\) & 7,167 & 7,324 & 122,988 & 25.75 & 4,776 \\
& & & & & & \\
& \(2,967,968.12\) & \(1,115,511\) & \(1,139,959\) & \(1,328,009\) & 56,303
\end{tabular}

RANKIN SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2041
\begin{tabular}{lrr}
1986 & \(1,388,756.38\) & 947,965 \\
1989 & \(17,023.88\) & 11,236 \\
1991 & \(12,169.36\) & 7,859 \\
2007 & \(25,086.45\) & 11,587 \\
2022 & \(199,557.41\) & 5,348 \\
& \(1,642,593.48\) & 983,995 \\
& \\
BRUNOT ISLAND SUBSTATION \\
INTERIM SURVIVOR CURVE.. IOWA \\
PROBABLE RETIREMENT YEAR. & \(6-2027\)
\end{tabular}
\begin{tabular}{rrrrrrr}
1965 & \(86,717.90\) & 80,193 & 81,951 & 4,767 & 4.31 & 1,106 \\
1972 & \(774,903.89\) & 709,843 & 725,400 & 49,504 & 4.37 & 11,328 \\
1978 & \(1,204.96\) & 1,092 & 1,116 & 89 & 4.41 & 20 \\
1981 & \(47,737.78\) & 42,985 & 43,927 & 3,811 & 4.43 & 860 \\
1982 & 855.80 & 769 & 786 & 70 & 4.43 & 16 \\
1985 & \(2,475.33\) & 2,209 & 2,257 & 218 & 4.52 & 48 \\
2001 & \(87,467.22\) & 72,405 & 73,992 & 13,475 & 4.47 & 3,015 \\
2002 & \(19,435.82\) & 15,937 & 16,286 & 3,150 & 4.50 & 700 \\
2011 & \(40,721.66\) & 29,271 & 29,913 & 10,809 & 4.50 & 2,402 \\
2012 & \(47,286.97\) & 33,120 & 33,846 & 13,441 & 4.49 & 2,994 \\
2017 & \(50,419.46\) & 27,761 & 28,369 & 22,050 & 4.49 & 4,911 \\
2019 & \(21,349.56\) & 9,347 & 9,552 & 11,798 & 4.49 & 2,628 \\
2021 & \(81,654.96\) & 20,446 & 20,894 & 60,761 & 4.49 & 13,533 \\
& & & & & & \\
& \(1,262,231.31\) & \(1,045,378\) & \(1,068,289\) & 193,942 & & 43,561
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)

ORIGINAL
COST
(2)

(3)

ALLOC. BOOK
RESERVE
(4)
\(\begin{array}{cl}\text { FUTURE BOOK } & \text { REM. } \\ \text { ACCRUALS } & \text { LIFE }\end{array}\)
(5)

LIFE ACCRUAL
(6)

ANNUAL
(7)

OAKLAND SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1967 & 121,320.26 & 96,986 & 99,112 & 22,209 & 12.49 & 1,778 \\
\hline 1968 & 1,091,826.85 & 869,072 & 888,119 & 203,708 & 12.59 & 16,180 \\
\hline 1969 & 135.89 & 108 & 110 & 26 & 12.70 & 2 \\
\hline 1972 & 3,862.93 & 3,018 & 3,084 & 779 & 12.97 & 60 \\
\hline 1975 & 26,310.95 & 20,243 & 20,687 & 5,624 & 13.21 & 426 \\
\hline 1977 & 3,750.43 & 2,854 & 2,917 & 834 & 13.35 & 62 \\
\hline 1979 & 1,842.88 & 1,386 & 1,416 & 427 & 13.47 & 32 \\
\hline 1980 & 11,735.64 & 8,774 & 8,966 & 2,769 & 13.53 & 205 \\
\hline 1990 & 21,471.29 & 15,073 & 15,403 & 6,068 & 13.80 & 440 \\
\hline 2005 & 80,395.61 & 44,314 & 45,285 & 35,110 & 14.25 & 2,464 \\
\hline 2009 & 121,263.94 & 58,934 & 60,226 & 61,038 & 14.28 & 4,274 \\
\hline 2012 & 1,214,569.43 & 514,006 & 525,271 & 689,298 & 14.31 & 48,169 \\
\hline 2013 & 145,835.36 & 58,188 & 59,463 & 86,372 & 14.31 & 6,036 \\
\hline 2015 & 369,411.12 & 126,893 & 129,674 & 239,737 & 14.33 & 16,730 \\
\hline 2022 & 133,044.78 & 4,497 & 4,596 & 128,449 & 14.31 & 8,976 \\
\hline
\end{tabular}

RACCOON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2027
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1972 & 1,003,309.03 & 919,071 & 939,213 & 64,096 & 4.37 & 14,667 \\
\hline 1977 & 3,107.95 & 2,822 & 2,884 & 224 & 4.41 & 51 \\
\hline 1983 & 23,156.37 & 20,855 & 21,312 & 1,844 & 4.36 & 423 \\
\hline 1988 & 53,798.51 & 47,698 & 48,743 & 5,055 & 4.41 & 1,146 \\
\hline 1995 & 30,939.90 & 26,633 & 27,217 & 3,723 & 4.45 & 837 \\
\hline 1999 & 38,798.65 & 32,552 & 33,265 & 5,533 & 4.51 & 1,227 \\
\hline 2022 & 199,564.58 & 19,996 & 20,434 & 179,130 & 4.49 & 39,895 \\
\hline & 1,352,674.99 & 1,069,627 & 1,093,069 & 259,606 & & 58,246 \\
\hline \multicolumn{7}{|l|}{LOGANS FERRY SUBSTATION} \\
\hline \multicolumn{7}{|l|}{INTERIM SURVIVOR CURVE.. IOWA 70-R3} \\
\hline \multicolumn{7}{|l|}{PROBABLE RETIREMENT YEAR.. 6-2028} \\
\hline 1973 & 1,063,120.37 & 954,459 & 975,377 & 87,743 & 5.32 & 16,493 \\
\hline 1975 & 52,517.47 & 46,958 & 47,987 & 4,530 & 5.34 & 848 \\
\hline 1977 & 28,147.73 & 25,055 & 25,604 & 2,544 & 5.36 & 475 \\
\hline 1983 & 721.44 & 635 & 649 & 73 & 5.35 & 14 \\
\hline
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)
ORIGINAL
COST
(2)

(3)

\section*{ALLOC. BOOK RESERVE}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL
ACCRUAL
(7)

LOGANS FERRY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2028
\begin{tabular}{rrrrrrr}
1985 & \(4,100.12\) & 3,583 & 3,662 & 439 & 5.42 & 81 \\
1994 & \(17,023.86\) & 14,314 & 14,628 & 2,396 & 5.40 & 444 \\
1996 & \(34,630.44\) & 28,722 & 29,351 & 5,279 & 5.45 & 969 \\
1998 & \(44,699.67\) & 36,578 & 37,380 & 7,320 & 5.44 & 1,346 \\
1999 & \(39,437.60\) & 31,976 & 32,677 & 6,761 & 5.48 & 1,234 \\
2004 & \(92,200.47\) & 71,123 & 72,682 & 19,519 & 5.48 & 3,562 \\
2012 & \(46,659.95\) & 30,670 & 31,342 & 15,318 & 5.47 & 2,800 \\
2014 & \(62,822.52\) & 38,184 & 39,021 & 23,802 & 5.49 & 4,336 \\
2021 & \(235,451.39\) & 50,528 & 51,635 & 183,816 & 5.49 & 33,482 \\
& & & & & & \\
& \(1,721,533.03\) & \(1,332,785\) & \(1,361,995\) & 359,538 & & 66,084
\end{tabular}

PLUM SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2033
\begin{tabular}{rrrrrrr}
1978 & \(1,132,240.18\) & 915,360 & 935,421 & 196,819 & 9.97 & 19,741 \\
1986 & \(4,929.81\) & 3,869 & 3,954 & 976 & 10.01 & 98 \\
1989 & \(9,528.42\) & 7,310 & 7,470 & 2,058 & 10.17 & 202 \\
1994 & \(41,541.95\) & 30,546 & 31,215 & 10,327 & 10.26 & 1,007 \\
2011 & \(106,592.95\) & 55,897 & 57,122 & 49,471 & 10.43 & 4,743 \\
2012 & \(93,823.05\) & 47,090 & 48,122 & 45,701 & 10.42 & 4,386 \\
2022 & \(133,041.95\) & 6,093 & 6,227 & 126,815 & 10.42 & 12,170 \\
& & & & & & 42,347
\end{tabular}

ARSENAL SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(7,783,114.46\) & \(5,745,028\) & \(5,870,937\) & \(1,912,177\) & 13.63 & 140,292 \\
1990 & \(26,166.39\) & 18,369 & 18,772 & 7,395 & 13.80 & 536 \\
1996 & \(259,207.71\) & 169,677 & 173,396 & 85,812 & 13.98 & 6,138 \\
1999 & \(102,464.79\) & 64,051 & 65,455 & 37,010 & 14.09 & 2,627 \\
2007 & \(177,427.48\) & 92,404 & 94,429 & 82,998 & 14.26 & 5,820 \\
2009 & \(135,829.45\) & 66,013 & 67,460 & 68,370 & 14.28 & 4,788 \\
2011 & \(58,105.73\) & 25,857 & 26,424 & 31,682 & 14.34 & 2,209 \\
2012 & \(94,981.11\) & 40,196 & 41,077 & 53,904 & 14.31 & 3,767 \\
2013 & \(58,441.78\) & 23,318 & 23,829 & 34,613 & 14.31 & 2,419
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)
ORIGINAL
COST
(2)

\section*{CALCULATED
ACCRUED}
(3)

\section*{ALLOC. BOOK}
(4)
\(\begin{array}{cl}\text { FUTURE BOOK } & \text { REM. } \\ \text { ACCRUALS } & \text { LIFE }\end{array}\)
(5)

LIFE ACCRUAL
(6)

ANNUAL
(7)

ARSENAL SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
2014 & \(20,965.47\) & 7,805 & 7,976 & 12,989 & 14.33 & 906 \\
2019 & \(111,214.84\) & 21,798 & 22,276 & 88,939 & 14.36 & 6,194 \\
2021 & \(89,488.14\) & 8,466 & 8,652 & 80,837 & 14.35 & 5,633 \\
& \(8,917,407.35\) & \(6,282,982\) & \(6,420,681\) & \(2,496,726\) & \\
& \(8,981,329\)
\end{tabular}

CARSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2034
\begin{tabular}{rrrrrrr}
1971 & \(100,327.76\) & 82,100 & 83,899 & 16,428 & 10.53 & 1,560 \\
1979 & \(7,192,966.70\) & \(5,688,054\) & \(5,812,714\) & \(1,380,252\) & 10.89 & 126,745 \\
1981 & \(24,366.30\) & 19,078 & 19,496 & 4,870 & 10.95 & 445 \\
1988 & \(6,257.84\) & 4,728 & 4,832 & 1,426 & 11.16 & 128 \\
1991 & \(21,843.10\) & 16,168 & 16,522 & 5,321 & 11.06 & 481 \\
1994 & \(29,345.58\) & 21,076 & 21,538 & 7,808 & 11.18 & 698 \\
1999 & \(28,626.05\) & 19,374 & 19,799 & 8,827 & 11.22 & 787 \\
2005 & \(11,586.33\) & 7,035 & 7,189 & 4,397 & 11.32 & 388 \\
2006 & \(25,840.11\) & 15,308 & 15,643 & 10,197 & 11.35 & 898 \\
2007 & \(299,615.99\) & 172,759 & 176,545 & 123,071 & 11.38 & 10,815 \\
2009 & \(80,465.43\) & 43,669 & 44,626 & 35,839 & 11.38 & 3,149 \\
2012 & \(17,055.18\) & 8,183 & 8,362 & 8,693 & 11.38 & 764 \\
2013 & \(49,950.88\) & 22,683 & 23,180 & 26,771 & 11.42 & 2,344 \\
2014 & \(25,974.05\) & 11,083 & 11,326 & 14,648 & 11.42 & 1,283 \\
2022 & \(133,048.75\) & 5,588 & 5,710 & 127,338 & 11.40 & 11,170 \\
& & & & & & \\
& \(8,047,270.05\) & \(6,136,886\) & \(6,271,383\) & \(1,775,887\) & & 161,655
\end{tabular}

FINDLAY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2043
\begin{tabular}{rrrrrrr}
1988 & \(1,116,779.71\) & 724,343 & 740,218 & 376,562 & 18.69 & 20,148 \\
1994 & \(4,125.73\) & 2,469 & 2,523 & 1,603 & 19.12 & 84 \\
1996 & \(28,836.01\) & 16,659 & 17,024 & 11,812 & 19.37 & 610 \\
1998 & \(121,511.95\) & 67,585 & 69,066 & 52,446 & 19.55 & 2,683 \\
1999 & \(34,002.00\) & 18,538 & 18,944 & 15,058 & 19.60 & 768 \\
2000 & \(146,862.00\) & 78,645 & 80,369 & 66,493 & 19.52 & 3,406 \\
2002 & \(52,323.92\) & 26,706 & 27,291 & 25,033 & 19.66 & 1,273 \\
2003 & \(164,725.35\) & 81,901 & 83,696 & 81,029 & 19.72 & 4,109
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

FINDLAY SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2043
\begin{tabular}{rrrrrrr}
2004 & \(230,726.27\) & 111,395 & 113,836 & 116,890 & 19.82 & 5,898 \\
2005 & \(148,293.39\) & 69,550 & 71,074 & 77,219 & 19.81 & 3,898 \\
2006 & \(326,024.44\) & 147,950 & 151,192 & 174,832 & 19.86 & 8,803 \\
2009 & \(121,005.30\) & 48,838 & 49,908 & 71,097 & 19.95 & 3,564 \\
2010 & \(12,084.50\) & 4,653 & 4,755 & 7,330 & 19.97 & 367 \\
2012 & \(22,423.04\) & 7,722 & 7,891 & 14,532 & 19.99 & 727 \\
2019 & \(97,992.10\) & 14,503 & 14,821 & 83,171 & 20.14 & 4,130 \\
2020 & \(57,417.26\) & 6,327 & 6,466 & 50,952 & 20.18 & 2,525 \\
& & & & & & 62,993
\end{tabular}

WILSON SUBSTATION
INTERIM SURVIVOR CURVE.. IOWA 70-R3
PROBABLE RETIREMENT YEAR.. 6-2067
\begin{tabular}{rrrrrrr}
2012 & \(638,406.46\) & 133,427 & 136,351 & 502,055 & 39.75 & 12,630 \\
2014 & \(316,768.07\) & 55,466 & 56,682 & 260,087 & 40.04 & 6,496 \\
2021 & \(97,321.64\) & 3,445 & 3,520 & 93,801 & 40.87 & 2,295 \\
& \(1,052,496.17\) & 192,338 & 196,553 & 855,943 & & 21,421
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{rrrr}
1899 & \(27,966.85\) & 27,967 & 27,967 \\
1900 & \(5,786.82\) & 5,787 & 5,787 \\
1902 & \(4,534.85\) & 4,535 & 4,535 \\
1903 & \(2,896.48\) & 2,896 & 2,896 \\
1904 & \(20,540.51\) & 20,541 & 20,541 \\
1906 & \(1,345.22\) & 1,345 & 1,345 \\
1909 & 689.29 & 689 & 689 \\
1913 & \(8,311.90\) & 8,312 & 8,312 \\
1914 & \(20,917.02\) & 20,917 & 20,917 \\
1915 & 40.90 & 41 & 41 \\
1917 & \(11,558.59\) & 11,559 & 11,559 \\
1918 & \(39,579.39\) & 39,579 & 39,579 \\
1919 & \(77,881.14\) & 77,881 & 77,881 \\
1920 & \(2,763.59\) & 2,764 & 2,764 \\
1921 & \(55,522.19\) & 55,522 & 55,522 \\
1922 & \(194,585.94\) & 194,586 & 194,586
\end{tabular} RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{rrrrr}
1923 & \(120,067.69\) & 120,068 & 120,068 & \\
1924 & \(533,753.01\) & 533,753 & 533,753 & \\
1925 & \(297,195.24\) & 297,195 & 297,195 & \\
1926 & \(98,267.98\) & 98,268 & 98,268 & \\
1927 & \(91,709.27\) & 91,709 & 91,709 & \\
1928 & \(96,087.57\) & 96,088 & 96,088 & \\
1929 & \(36,157.08\) & 36,157 & 36,157 & \\
1930 & \(8,883.46\) & 8,883 & 8,883 & \\
1931 & \(13,947.40\) & 13,947 & 13,947 & \\
1932 & \(4,936.49\) & 4,936 & 4,936 & \\
1933 & 394.93 & 395 & 395 & \\
1934 & 907.05 & 42.22 & 907 & 91.05 \\
1935 & \(3,721.23\) & 188.23 & 151 & 1,721
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{rrrrrrr}
1964 & \(61,238.12\) & 55,278 & 56,672 & 4,566 & 4.38 & 1,042 \\
1965 & \(40,437.75\) & 36,259 & 37,173 & 3,264 & 4.65 & 702 \\
1966 & \(36,050.09\) & 32,109 & 32,919 & 3,131 & 4.92 & 636 \\
1967 & \(56,164.20\) & 49,662 & 50,914 & 5,250 & 5.21 & 1,008 \\
1968 & \(113,535.49\) & 99,659 & 102,172 & 11,363 & 5.50 & 2,066 \\
1969 & \(42,598.64\) & 37,108 & 38,044 & 4,555 & 5.80 & 785 \\
1970 & \(387,736.39\) & 335,004 & 343,452 & 44,285 & 6.12 & 7,236 \\
1971 & \(97,563.48\) & 83,557 & 85,664 & 11,899 & 6.46 & 1,842 \\
1972 & \(597,670.27\) & 507,225 & 520,015 & 77,655 & 6.81 & 11,403 \\
1973 & \(151,696.54\) & 127,492 & 130,707 & 20,990 & 7.18 & 2,923 \\
1974 & \(242,102.45\) & 201,429 & 206,508 & 35,594 & 7.56 & 4,708 \\
1975 & \(145,408.03\) & 119,655 & 122,672 & 22,736 & 7.97 & 2,853 \\
1976 & \(84,829.11\) & 68,994 & 70,734 & 14,095 & 8.40 & 1,678 \\
1977 & \(186,751.98\) & 150,023 & 153,806 & 32,946 & 8.85 & 3,723 \\
1978 & \(141,513.05\) & 112,204 & 115,033 & 26,480 & 9.32 & 2,841 \\
1979 & \(418,601.95\) & 327,347 & 335,602 & 83,000 & 9.81 & 8,461 \\
1980 & \(79,315.49\) & 61,126 & 62,667 & 16,648 & 10.32 & 1,613 \\
1981 & \(102,997.82\) & 78,164 & 80,135 & 22,863 & 10.85 & 2,107 \\
1982 & \(477,446.64\) & 356,385 & 365,372 & 112,075 & 11.41 & 9,823 \\
1983 & \(78,490.97\) & 61,388 & 62,936 & 15,555 & 11.01 & 1,413 \\
1984 & \(67,676.43\) & 52,111 & 53,425 & 14,251 & 11.50 & 1,239 \\
1985 & \(53,616.28\) & 40,614 & 41,638 & 11,978 & 12.00 & 998 \\
1986 & \(144,564.16\) & 107,642 & 110,356 & 34,208 & 12.52 & 2,732 \\
1987 & \(41,931.32\) & 30,664 & 31,437 & 10,494 & 13.04 & 805 \\
1988 & \(186,491.43\) & 133,192 & 136,551 & 49,941 & 13.81 & 3,616 \\
1989 & \(23,281.71\) & 16,302 & 16,713 & 6,569 & 14.34 & 458 \\
1990 & \(678,476.68\) & 465,299 & 477,032 & 201,444 & 14.89 & 13,529 \\
1991 & \(60,926.76\) & 40,882 & 41,913 & 19,014 & 15.45 & 1,231 \\
1992 & \(976,009.85\) & 637,042 & 653,106 & 322,904 & 16.23 & 19,896 \\
1993 & \(11,096.11\) & 7,070 & 7,248 & 3,848 & 16.80 & 229 \\
1994 & \(323,051.99\) & 200,712 & 205,773 & 117,279 & 17.37 & 6,752 \\
1995 & \(951,115.15\) & 572,762 & 587,205 & 363,910 & 18.16 & 20,039 \\
1996 & \(441,116.22\) & 258,318 & 264,832 & 176,284 & 18.75 & 9,402 \\
1997 & \(402,291.43\) & 227,737 & 233,480 & 168,812 & 19.55 & 8,635 \\
1998 & \(478,414.60\) & 262,554 & 269,175 & 209,240 & 20.14 & 10,389 \\
1999 & \(517,673.54\) & 274,936 & 281,869 & 235,805 & 20.75 & 11,364 \\
2000 & \(54,297.66\) & 27,735 & 28,434 & 25,863 & 21.55 & 1,200 \\
2001 & \(510,656.24\) & 251,447 & 257,788 & 252,869 & 22.17 & 11,406 \\
2002 & \(505,332.54\) & 238,264 & 244,272 & 261,060 & 22.98 & 11,360 \\
2003 & \(400,974.74\) & 181,401 & 185,975 & 214,999 & 23.60 & 9,110 \\
2004 & \(337,882.54\) & 145,627 & 149,299 & 188,583 & 24.42 & 7,722 \\
& & & & & 0 &
\end{tabular}

ACCOUNT 361 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{rrrrrrr}
2005 & \(609,535.68\) & 250,641 & 256,961 & 352,574 & 25.06 & 14,069 \\
2006 & \(3,347,310.92\) & \(1,303,443\) & \(1,336,311\) & \(2,011,000\) & 25.87 & 77,735 \\
2007 & \(903,994.21\) & 332,127 & 340,502 & 563,492 & 26.69 & 21,112 \\
2008 & \(649,717.69\) & 225,192 & 230,871 & 418,847 & 27.34 & 15,320 \\
2009 & \(3,633,447.71\) & \(1,177,237\) & \(1,206,923\) & \(2,426,525\) & 28.17 & 86,139 \\
2010 & \(80,228.81\) & 24,165 & 24,774 & 55,454 & 29.00 & 1,912 \\
2011 & \(1,046,859.37\) & 292,493 & 299,869 & 746,991 & 29.65 & 25,194 \\
2012 & \(1,177,258.11\) & 301,614 & 309,220 & 868,038 & 30.48 & 28,479 \\
2013 & \(652,624.30\) & 151,931 & 155,762 & 496,862 & 31.31 & 15,869 \\
2014 & \(340,567.06\) & 71,213 & 73,009 & 267,558 & 32.15 & 8,322 \\
2015 & \(188,704.57\) & 35,099 & 35,984 & 152,720 & 32.82 & 4,653 \\
2016 & \(553,814.50\) & 89,607 & 91,867 & 461,948 & 33.66 & 13,724 \\
2017 & \(1,610,681.36\) & 221,469 & 227,054 & \(1,383,628\) & 34.50 & 40,105 \\
2018 & \(1,009,846.05\) & 114,517 & 117,405 & 892,441 & 35.18 & 25,368 \\
2019 & \(276,305.62\) & 24,481 & 25,098 & 251,207 & 36.02 & 6,974 \\
2020 & \(53,803.50\) & 3,433 & 3,520 & 50,284 & 36.71 & 1,370 \\
2021 & \(85,568.68\) & 3,303 & 3,386 & 82,182 & 37.41 & 2,197 \\
2022 & \(66,526.10\) & 871 & 893 & 65,633 & 37.67 & 1,742 \\
& & & & & &
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 17.5 2.24

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 362.1 STATION EQUIPMENT - COMPANY STATIONS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{lrrr}
1916 & 214.39 & 209 & 214 \\
1917 & \(4,418.60\) & 4,284 & 4,419 \\
1918 & \(33,020.07\) & 31,813 & 33,020 \\
1919 & \(5,902.29\) & 5,650 & 5,902 \\
1920 & \(85,954.20\) & 81,766 & 85,954 \\
1921 & \(38,239.73\) & 36,147 & 38,240 \\
1922 & \(115,662.10\) & 108,659 & 115,577 \\
1923 & \(30,632.45\) & 28,611 & 30,433 \\
1924 & \(808,119.98\) & 750,380 & 798,156 \\
1925 & \(394,888.11\) & 364,517 & 387,726 \\
1926 & \(351,224.00\) & 322,297 & 342,818 \\
1927 & \(312,315.28\) & 284,944 & 303,086 \\
1928 & \(233,901.55\) & 212,128 & 225,634 \\
1929 & \(88,413.07\) & 79,700 & 84,774 \\
1930 & \(297,002.75\) & 266,114 & 283,057 \\
1931 & \(7,881.21\) & 7,019 & 7,466 \\
1932 & \(1,956.62\) & 1,731 & 1,841 \\
1933 & 33.59 & 30 & 32 \\
1934 & \(1,932.14\) & 1,688 & 1,795 \\
1935 & \(15,177.51\) & 13,169 & 14,007 \\
1936 & \(7,447.67\) & 6,419 & 6,828 \\
1937 & \(25,993.96\) & 22,246 & 23,662 \\
1938 & \(11,130.45\) & 9,459 & 10,061 \\
1939 & \(3,998.55\) & 3,374 & 3,589 \\
1940 & \(4,733.34\) & 3,965 & 4,217 \\
1941 & \(193,467.48\) & 160,824 & 171,064 \\
1942 & \(226,934.66\) & 187,201 & 199,120 \\
1943 & \(61,138.87\) & 50,045 & 53,231 \\
1944 & \(12,212.76\) & 9,917 & 10,548 \\
1945 & \(71,482.27\) & 57,575 & 61,241 \\
1946 & \(26,238.99\) & 20,963 & 22,298 \\
1947 & \(33,111.20\) & 26,224 & 27,894 \\
1948 & \(204,349.62\) & 160,470 & 170,687 \\
1949 & \(357,427.72\) & 278,207 & 295,920 \\
1950 & \(816,140.75\) & 629,465 & 669,543 \\
1951 & \(299,456.08\) & 228,838 & 243,408 \\
1952 & \(261,505.39\) & 197,936 & 210,539 \\
1953 & \(607,836.85\) & 455,659 & 484,671 \\
1954 & \(260,536.88\) & 193,412 & 205,726 \\
1955 & \(1,755,461.35\) & \(1,290,106\) & \(1,372,247\) \\
1956 & \(965,036.42\) & 701,842 & 746,528 \\
1957 & \(1,058,197.19\) & 761,521 & 810,007 \\
& & & 3
\end{tabular}
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{rrrrrrr}
1958 & \(635,041.72\) & 452,035 & 480,816 & 154,226 & 15.85 & 9,730 \\
1959 & \(1,579,917.09\) & \(1,112,262\) & \(1,183,079\) & 396,838 & 16.28 & 24,376 \\
1960 & \(400,651.38\) & 278,853 & 296,607 & 104,044 & 16.72 & 6,223 \\
1961 & \(1,060,358.63\) & 729,336 & 775,773 & 284,586 & 17.17 & 16,575 \\
1962 & \(146,854.89\) & 99,808 & 106,163 & 40,692 & 17.62 & 2,309 \\
1963 & \(358,979.24\) & 241,037 & 256,384 & 102,595 & 18.07 & 5,678 \\
1964 & \(767,897.81\) & 509,185 & 541,605 & 226,293 & 18.53 & 12,212 \\
1965 & \(243,223.96\) & 159,202 & 169,338 & 73,886 & 19.00 & 3,889 \\
1966 & \(851,767.46\) & 550,088 & 585,112 & 266,655 & 19.48 & 13,689 \\
1967 & \(1,239,652.92\) & 789,770 & 840,054 & 399,599 & 19.96 & 20,020 \\
1968 & \(1,471,021.58\) & 924,331 & 983,183 & 487,839 & 20.44 & 23,867 \\
1969 & \(736,385.94\) & 456,154 & 485,197 & 251,189 & 20.93 & 12,001 \\
1970 & \(2,494,171.41\) & \(1,522,342\) & \(1,619,269\) & 874,902 & 21.43 & 40,826 \\
1971 & \(273,895.29\) & 164,636 & 175,118 & 98,777 & 21.94 & 4,502 \\
1972 & \(7,728,166.71\) & \(4,573,684\) & \(4,864,889\) & \(2,863,278\) & 22.45 & 127,540 \\
1973 & \(3,245,556.67\) & \(1,890,082\) & \(2,010,423\) & \(1,235,134\) & 22.97 & 53,772 \\
1974 & \(1,446,509.77\) & 828,720 & 881,484 & 565,026 & 23.49 & 24,054 \\
1975 & \(4,758,451.62\) & \(2,680,293\) & \(2,850,946\) & \(1,907,506\) & 24.02 & 79,413 \\
1976 & \(1,645,338.78\) & 910,613 & 968,591 & 676,748 & 24.56 & 27,555 \\
1977 & \(1,120,035.25\) & 608,896 & 647,664 & 472,371 & 25.10 & 18,820 \\
1978 & \(4,756,991.64\) & \(2,538,521\) & \(2,700,148\) & \(2,056,844\) & 25.65 & 80,189 \\
1979 & \(4,154,944.22\) & \(2,175,695\) & \(2,314,221\) & \(1,840,723\) & 26.20 & 70,257 \\
1980 & \(1,352,940.28\) & 694,424 & 738,638 & 614,302 & 26.77 & 22,947 \\
1981 & \(521,683.08\) & 262,454 & 279,164 & 242,519 & 27.33 & 8,874 \\
1982 & \(17,007,309.13\) & \(8,376,950\) & \(8,910,308\) & \(8,097,001\) & 27.91 & 290,111 \\
1983 & \(973,008.00\) & 599,568 & 637,742 & 335,266 & 24.60 & 13,629 \\
1984 & \(2,257,108.83\) & \(1,372,999\) & \(1,460,417\) & 796,692 & 24.79 & 32,138 \\
1985 & \(1,137,031.35\) & 677,898 & 721,060 & 415,971 & 25.40 & 16,377 \\
1986 & \(6,176,367.71\) & \(3,629,234\) & \(3,860,306\) & \(2,316,062\) & 25.61 & 90,436 \\
1987 & \(2,599,985.88\) & \(1,495,252\) & \(1,590,454\) & \(1,009,532\) & 26.23 & 38,488 \\
1988 & \(5,106,283.14\) & \(2,889,135\) & \(3,073,085\) & \(2,033,198\) & 26.48 & 76,782 \\
1989 & \(1,581,295.89\) & 874,140 & 929,796 & 651,500 & 27.10 & 24,041 \\
1990 & \(4,384,338.13\) & \(2,379,819\) & \(2,531,341\) & \(1,852,997\) & 27.38 & 67,677 \\
1991 & \(4,268,766.46\) & \(2,272,691\) & \(2,417,393\) & \(1,851,373\) & 27.67 & 66,909 \\
1992 & \(8,550,807.23\) & \(4,433,594\) & \(4,715,880\) & \(3,834,927\) & 28.32 & 135,414 \\
1993 & \(2,399,443.69\) & \(1,217,478\) & \(1,294,994\) & \(1,104,450\) & 28.64 & 38,563 \\
1994 & \(807,339.92\) & 400,360 & 425,851 & 381,489 & 28.97 & 13,168 \\
1995 & \(11,312,456.84\) & \(5,475,229\) & \(5,823,835\) & \(5,488,622\) & 29.32 & 187,197 \\
1996 & \(13,439,641.00\) & \(6,339,479\) & \(6,743,112\) & \(6,696,529\) & 29.68 & 225,624 \\
1997 & \(9,567,029.31\) & \(4,366,392\) & \(4,644,399\) & \(4,922,630\) & 30.37 & 162,089 \\
1998 & \(3,068,566.60\) & \(1,360,602\) & \(1,447,231\) & \(1,621,336\) & 30.75 & 52,726 \\
1999 & \(3,081,478.22\) & \(1,332,431\) & \(1,417,266\) & \(1,664,212\) & 30.85 & 53,945 \\
& & & & & &
\end{tabular}
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 55-R1
\begin{tabular}{rrrrrrr}
2000 & \(6,912,866.08\) & \(2,893,034\) & \(3,077,233\) & \(3,835,633\) & 31.26 & 122,701 \\
2001 & \(4,612,592.38\) & \(1,864,410\) & \(1,983,116\) & \(2,629,476\) & 31.69 & 82,975 \\
2002 & \(5,186,632.70\) & \(2,020,193\) & \(2,148,818\) & \(3,037,815\) & 32.13 & 94,548 \\
2003 & \(6,932,806.46\) & \(2,609,508\) & \(2,775,655\) & \(4,157,151\) & 32.31 & 128,665 \\
2004 & \(10,258,248.47\) & \(3,701,176\) & \(3,936,829\) & \(6,321,419\) & 32.78 & 192,844 \\
2005 & \(11,714,727.39\) & \(4,059,153\) & \(4,317,598\) & \(7,397,129\) & 33.01 & 224,088 \\
2006 & \(42,923,947.19\) & \(14,233,581\) & \(15,139,828\) & \(27,784,119\) & 33.25 & 835,613 \\
2007 & \(7,476,059.58\) & \(2,363,930\) & \(2,514,441\) & \(4,961,619\) & 33.52 & 148,020 \\
2008 & \(14,966,058.50\) & \(4,492,811\) & \(4,778,867\) & \(10,187,192\) & 33.81 & 301,307 \\
2009 & \(23,626,830.41\) & \(6,728,921\) & \(7,157,349\) & \(16,469,481\) & 33.90 & 485,825 \\
2010 & \(16,702,937.82\) & \(4,468,036\) & \(4,752,514\) & \(11,950,424\) & 34.23 & 349,121 \\
2011 & \(21,862,440.48\) & \(5,480,914\) & \(5,829,882\) & \(16,032,558\) & 34.37 & 466,470 \\
2012 & \(38,684,126.31\) & \(9,059,822\) & \(9,636,658\) & \(29,047,468\) & 34.34 & 845,879 \\
2013 & \(6,331,087.66\) & \(1,371,314\) & \(1,458,625\) & \(4,872,463\) & 34.36 & 141,806 \\
2014 & \(10,309,887.32\) & \(2,041,358\) & \(2,171,331\) & \(8,138,556\) & 34.42 & 236,448 \\
2015 & \(4,803,790.07\) & 860,839 & 915,648 & \(3,888,142\) & 34.34 & 113,225 \\
2016 & \(5,978,982.45\) & 956,039 & \(1,016,910\) & \(4,962,072\) & 34.15 & 145,302 \\
2017 & \(14,127,518.54\) & \(1,973,614\) & \(2,099,273\) & \(12,028,246\) & 33.87 & 355,130 \\
2018 & \(13,583,751.81\) & \(1,608,316\) & \(1,710,717\) & \(11,873,035\) & 33.52 & 354,207 \\
2019 & \(21,711,328.39\) & \(2,088,630\) & \(2,221,612\) & \(19,489,716\) & 32.87 & 592,933 \\
2020 & \(17,818,154.54\) & \(1,297,162\) & \(1,379,752\) & \(16,438,403\) & 31.86 & 515,957 \\
2021 & \(25,943,192.21\) & \(1,229,707\) & \(1,308,002\) & \(24,635,190\) & 30.15 & 817,088 \\
2022 & \(7,311,144.36\) & 138,181 & 146,979 & \(7,164,165\) & 25.96 & 275,969 \\
& & & & & & \\
& \(490,578,533.88\) & \(160,242,845\) & \(170,443,153\) & \(320,135,381\) & & \(10,239,901\)
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1934 & 33.51 & 33 & 34 & & & \\
\hline 1937 & 6.69 & 6 & 6 & 1 & 2.18 & \\
\hline 1941 & 215.14 & 196 & 208 & 7 & 4.02 & 2 \\
\hline 1943 & 570.96 & 509 & 541 & 30 & 4.89 & 6 \\
\hline 1945 & 9,902.96 & 8,642 & 9,192 & 711 & 5.73 & 124 \\
\hline 1946 & 895.82 & 774 & 823 & 73 & 6.14 & 12 \\
\hline 1947 & 8,775.65 & 7,498 & 7,975 & 801 & 6.55 & 122 \\
\hline 1948 & 40,616.60 & 34,334 & 36,520 & 4,097 & 6.96 & 589 \\
\hline 1949 & 58,732.54 & 49,126 & 52,253 & 6,480 & 7.36 & 880 \\
\hline 1951 & 7,968.83 & 6,526 & 6,941 & 1,028 & 8.15 & 126 \\
\hline 1952 & 34,371.94 & 27,841 & 29,613 & 4,759 & 8.55 & 557 \\
\hline 1953 & 28,117.34 & 22,525 & 23,959 & 4,158 & 8.95 & 465 \\
\hline 1954 & 120,384.09 & 95,397 & 101,470 & 18,914 & 9.34 & 2,025 \\
\hline 1955 & 55,475.67 & 43,469 & 46,236 & 9,240 & 9.74 & 949 \\
\hline 1956 & 242,334.78 & 187,729 & 199,679 & 42,656 & 10.14 & 4,207 \\
\hline 1957 & 43,930.44 & 33,651 & 35,793 & 8,137 & 10.53 & 773 \\
\hline 1958 & 79,566.54 & 60,241 & 64,076 & 15,491 & 10.93 & 1,417 \\
\hline 1959 & 121,674.86 & 91,013 & 96,806 & 24,869 & 11.34 & 2,193 \\
\hline 1960 & 198,590.03 & 146,780 & 156,123 & 42,467 & 11.74 & 3,617 \\
\hline 1961 & 164,119.66 & 119,807 & 127,433 & 36,687 & 12.15 & 3,020 \\
\hline 1962 & 45,701.62 & 32,946 & 35,043 & 10,659 & 12.56 & 849 \\
\hline 1963 & 154,944.16 & 110,286 & 117,306 & 37,638 & 12.97 & 2,902 \\
\hline 1964 & 124,077.26 & 87,157 & 92,705 & 31,372 & 13.39 & 2,343 \\
\hline 1965 & 60,343.58 & 41,825 & 44,487 & 15,857 & 13.81 & 1,148 \\
\hline 1966 & 230,765.82 & 157,793 & 167,837 & 62,929 & 14.23 & 4,422 \\
\hline 1967 & 82,170.57 & 55,401 & 58,928 & 23,243 & 14.66 & 1,585 \\
\hline 1968 & 115,450.32 & 76,736 & 81,621 & 33,829 & 15.09 & 2,242 \\
\hline 1969 & 538,446.88 & 352,623 & 375,069 & 163,378 & 15.53 & 10,520 \\
\hline 1970 & 1,285,259.67 & 829,134 & 881,913 & 403,347 & 15.97 & 25,257 \\
\hline 1971 & 96,099.72 & 61,034 & 64,919 & 31,181 & 16.42 & 1,899 \\
\hline 1972 & 480,342.80 & 300,267 & 319,381 & 160,962 & 16.87 & 9,541 \\
\hline 1973 & 312,550.26 & 192,253 & 204,491 & 108,059 & 17.32 & 6,239 \\
\hline 1974 & 307,994.33 & 186,303 & 198,162 & 109,832 & 17.78 & 6,177 \\
\hline 1975 & 777,484.57 & 462,168 & 491,588 & 285,897 & 18.25 & 15,666 \\
\hline 1976 & 622,779.14 & 363,703 & 386,855 & 235,924 & 18.72 & 12,603 \\
\hline 1977 & 899,711.42 & 516,038 & 548,887 & 350,824 & 19.19 & 18,282 \\
\hline 1978 & 539,929.82 & 303,921 & 323,267 & 216,663 & 19.67 & 11,015 \\
\hline 1979 & 133,022.14 & 73,457 & 78,133 & 54,889 & 20.15 & 2,724 \\
\hline 1980 & 265,845.65 & 143,910 & 153,071 & 112,775 & 20.64 & 5,464 \\
\hline 1981 & 456,095.53 & 241,831 & 257,225 & 198,871 & 21.14 & 9,407 \\
\hline 1982 & 186,718.45 & 96,927 & 103,097 & 83,621 & 21.64 & 3,864 \\
\hline 1983 & 413,393.13 & 277,593 & 295,263 & 118,130 & 19.32 & 6,114 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{rrrrrrr}
1984 & \(682,747.28\) & 452,115 & 480,895 & 201,852 & 19.64 & 10,278 \\
1985 & \(803,743.34\) & 524,443 & 557,827 & 245,916 & 19.97 & 12,314 \\
1986 & \(713,350.88\) & 458,257 & 487,428 & 225,923 & 20.32 & 11,118 \\
1987 & \(100,191.60\) & 63,311 & 67,341 & 32,851 & 20.68 & 1,589 \\
1988 & \(725,570.42\) & 450,579 & 479,261 & 246,309 & 21.06 & 11,696 \\
1989 & \(574,827.08\) & 350,472 & 372,781 & 202,046 & 21.45 & 9,419 \\
1990 & \(218,063.32\) & 130,402 & 138,703 & 79,360 & 21.85 & 3,632 \\
1991 & \(498,729.81\) & 293,752 & 312,451 & 186,279 & 21.98 & 8,475 \\
1992 & \(182,298.75\) & 105,077 & 111,766 & 70,533 & 22.41 & 3,147 \\
1993 & \(47,038.74\) & 26,502 & 28,189 & 18,850 & 22.86 & 825 \\
1994 & \(450,704.04\) & 249,194 & 265,057 & 185,647 & 23.05 & 8,054 \\
1995 & \(789,818.73\) & 425,712 & 452,811 & 337,008 & 23.52 & 14,329 \\
1996 & \(2,669,018.10\) & \(1,407,640\) & \(1,497,244\) & \(1,171,774\) & 23.75 & 49,338 \\
1997 & \(63,980.49\) & 32,796 & 34,884 & 29,096 & 24.25 & 1,200 \\
1998 & \(110,836.74\) & 55,396 & 58,922 & 51,915 & 24.52 & 2,117 \\
1999 & \(568,081.47\) & 276,315 & 293,904 & 274,177 & 24.81 & 11,051 \\
2000 & \(203,670.34\) & 96,234 & 102,360 & 101,310 & 25.12 & 4,033 \\
2001 & \(1,482,906.53\) & 679,171 & 722,404 & 760,503 & 25.45 & 29,882 \\
2002 & \(1,395,298.24\) & 620,629 & 660,135 & 735,163 & 25.59 & 28,729 \\
2003 & \(436,578.28\) & 187,292 & 199,214 & 237,364 & 25.95 & 9,147 \\
2004 & \(117,411.97\) & 48,656 & 51,753 & 65,659 & 26.14 & 2,512 \\
2005 & \(787,228.94\) & 314,104 & 334,098 & 453,131 & 26.36 & 17,190 \\
2006 & \(1,682,886.33\) & 644,209 & 685,216 & 997,670 & 26.60 & 37,506 \\
2007 & \(140,871.90\) & 51,756 & 55,051 & 85,821 & 26.69 & 3,215 \\
2008 & \(1,373,181.84\) & 481,850 & 512,522 & 860,660 & 26.82 & 32,090 \\
2009 & \(2,523,811.81\) & 841,439 & 895,001 & \(1,628,811\) & 26.99 & 60,349 \\
2010 & \(179,639.00\) & 56,586 & 60,188 & 119,451 & 27.18 & 4,395 \\
2011 & \(485,149.98\) & 144,478 & 153,675 & 331,475 & 27.11 & 12,227 \\
2012 & \(427,063.28\) & 118,809 & 126,372 & 300,691 & 27.24 & 11,039 \\
2013 & \(318,585.88\) & 82,641 & 87,902 & 230,684 & 27.13 & 8,503 \\
2014 & \(219,426.12\) & 52,399 & 55,734 & 163,692 & 27.09 & 6,043 \\
2015 & \(254,134.97\) & 55,452 & 58,982 & 195,153 & 26.87 & 7,263 \\
2016 & \(1,416,204.79\) & 278,001 & 295,697 & \(1,120,508\) & 26.61 & 42,109 \\
2017 & \(869,704.09\) & 150,198 & 159,759 & 709,945 & 26.35 & 26,943 \\
2018 & \(320,296.93\) & 47,564 & 50,592 & 269,705 & 25.80 & 10,454 \\
2019 & \(1,423,592.70\) & 174,390 & 185,491 & \(1,238,102\) & 25.07 & 49,386 \\
& & & & & &
\end{tabular}
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline \multicolumn{7}{|c|}{DUQUESNE LIGHT COMPANY} \\
\hline \multicolumn{7}{|c|}{ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE} \\
\hline \multicolumn{7}{|c|}{ACCOUNT 362.2 STATION EQUIPMENT - CUSTOMER HIGH TENSION} \\
\hline \multicolumn{7}{|c|}{CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022} \\
\hline \begin{tabular}{l}
YEAR \\
(1)
\end{tabular} & \begin{tabular}{l}
ORIGINAL COST \\
(2)
\end{tabular} & \begin{tabular}{l}
CALCULATED ACCRUED \\
(3)
\end{tabular} & \begin{tabular}{l}
ALLOC. BOOK RESERVE \\
(4)
\end{tabular} & \begin{tabular}{l}
FUTURE BOOK \\
ACCRUALS \\
(5)
\end{tabular} & \begin{tabular}{l}
REM. \\
LIFE \\
(6)
\end{tabular} & \begin{tabular}{l}
ANNUAL ACCRUAL \\
(7)
\end{tabular} \\
\hline \multicolumn{7}{|l|}{SURVIVOR CURVE.. IOWA 45-R0.5} \\
\hline 2020 & 1,479,553.56 & 139,374 & 148,246 & 1,331,308 & 24.03 & 55,402 \\
\hline 2021 & 3,040,576.99 & 191,556 & 203,749 & 2,836,828 & 22.31 & 127,155 \\
\hline \multirow[t]{2}{*}{2022} & 1,288,593.83 & 34,148 & 36,322 & 1,252,272 & 18.37 & 68,169 \\
\hline & 40,410,779.98 & 16,692,302 & 17,754,856 & 22,655,924 & & 993,670 \\
\hline & COMPOSITE REMAI & ING LIFE AND & ANNUAL ACCRUA & RATE, PERCEN & . . 22 & 2.46 \\
\hline
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 362.3 STATION EQUIPMENT - PORTABLE SUBSTATIONS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    ```
(1)

ORIGINAL
COST
(2)

\section*{CALCULATED \\ ACCRUED}
(3)

ALLOC. BOOK RESERVE
(4)
```

| FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: |
| ACCRUALS | LIFE | ACCRUAL |
| $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2010 & 473,644.39 & 149,198 & 158,695 & 314,949 & 27.18 & 11,588 \\
\hline 2011 & 3,843,562.05 & 1,144,613 & 1,217,474 & 2,626,088 & 27.11 & 96,868 \\
\hline 2013 & 83,022.68 & 21,536 & 22,907 & 60,116 & 27.13 & 2,216 \\
\hline 2015 & 12,783.07 & 2,789 & 2,967 & 9,816 & 26.87 & 365 \\
\hline 2021 & 1,532,765.88 & 96,564 & 102,710 & 1,430,056 & 22.31 & 64,099 \\
\hline & 5,945,778.07 & 1,414,700 & 1,504,753 & 4,441,025 & & 175,136 \\
\hline
\end{tabular}

\section*{ACCOUNT 364.11 POLES, TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1914 & 5,527.70 & 5,270 & 5,528 & & & \\
\hline 1915 & 7.23 & 7 & 7 & & & \\
\hline 1916 & 5,149.55 & 4,853 & 5,150 & & & \\
\hline 1917 & 13,197.87 & 12,365 & 13,198 & & & \\
\hline 1918 & 2,817.06 & 2,625 & 2,812 & 5 & 3.96 & 1 \\
\hline 1919 & 59.37 & 55 & 59 & & & \\
\hline 1920 & 44,953.29 & 41,419 & 44,373 & 580 & 4.56 & 127 \\
\hline 1921 & 968.85 & 888 & 951 & 18 & 4.85 & 4 \\
\hline 1922 & 8,995.69 & 8,197 & 8,782 & 214 & 5.15 & 42 \\
\hline 1923 & 1,518.70 & 1,376 & 1,474 & 45 & 5.44 & 8 \\
\hline 1924 & 25,811.82 & 23,257 & 24,916 & 896 & 5.74 & 156 \\
\hline 1925 & 101,147.73 & 90,597 & 97,059 & 4,089 & 6.05 & 676 \\
\hline 1926 & 44,772.00 & 39,870 & 42,714 & 2,058 & 6.35 & 324 \\
\hline 1927 & 171,534.94 & 151,838 & 162,667 & 8,868 & 6.66 & 1,332 \\
\hline 1928 & 116,865.15 & 102,821 & 110,154 & 6,711 & 6.97 & 963 \\
\hline 1929 & 93,930.24 & 82,140 & 87,998 & 5,932 & 7.28 & 815 \\
\hline 1930 & 130,170.61 & 113,114 & 121,182 & 8,989 & 7.60 & 1,183 \\
\hline 1931 & 129,015.19 & 111,398 & 119,343 & 9,672 & 7.92 & 1,221 \\
\hline 1932 & 49,953.74 & 42,848 & 45,904 & 4,050 & 8.25 & 491 \\
\hline 1933 & 42,160.00 & 35,923 & 38,485 & 3,675 & 8.58 & 428 \\
\hline 1934 & 58,435.76 & 49,459 & 52,987 & 5,449 & 8.91 & 612 \\
\hline 1935 & 7,024.37 & 5,904 & 6,325 & 699 & 9.25 & 76 \\
\hline 1936 & 59,703.07 & 49,832 & 53,386 & 6,317 & 9.59 & 659 \\
\hline 1937 & 85,609.04 & 70,937 & 75,996 & 9,613 & 9.94 & 967 \\
\hline 1938 & 29,636.25 & 24,378 & 26,117 & 3,519 & 10.29 & 342 \\
\hline 1939 & 47,814.86 & 39,043 & 41,828 & 5,987 & 10.64 & 563 \\
\hline 1940 & 32,802.94 & 26,582 & 28,478 & 4,325 & 11.00 & 393 \\
\hline 1941 & 99,763.39 & 80,224 & 85,946 & 13,817 & 11.36 & 1,216 \\
\hline 1942 & 90,494.37 & 72,193 & 77,342 & 13,152 & 11.73 & 1,121 \\
\hline 1943 & 13,559.80 & 10,731 & 11,496 & 2,064 & 12.10 & 171 \\
\hline 1944 & 5,980.17 & 4,693 & 5,028 & 952 & 12.48 & 76 \\
\hline 1945 & 11,075.93 & 8,620 & 9,235 & 1,841 & 12.86 & 143 \\
\hline 1946 & 19.79 & 15 & 16 & 4 & 13.25 & \\
\hline 1947 & 9,203.26 & 7,039 & 7,541 & 1,662 & 13.64 & 122 \\
\hline 1948 & 250,494.57 & 189,900 & 203,444 & 47,051 & 14.03 & 3,354 \\
\hline 1949 & 302,802.57 & 227,468 & 243,691 & 59,112 & 14.43 & 4,096 \\
\hline 1950 & 370,163.46 & 275,453 & 295,099 & 75,064 & 14.84 & 5,058 \\
\hline 1951 & 523,329.13 & 385,730 & 413,241 & 110,088 & 15.25 & 7,219 \\
\hline 1952 & 625,284.11 & 456,457 & 489,012 & 136,272 & 15.66 & 8,702 \\
\hline 1953 & 809,538.41 & 585,102 & 626,833 & 182,705 & 16.08 & 11,362 \\
\hline 1954 & 1,058,652.43 & 757,296 & 811,308 & 247,344 & 16.51 & 14,981 \\
\hline 1955 & 855,100.47 & 605,351 & 648,526 & 206,574 & 16.94 & 12,194 \\
\hline
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 364.11 POLES, TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{rrrr}
1956 & \(895,839.20\) & 627,553 & 672,311 \\
1957 & \(1,159,899.63\) & 803,532 & 860,841 \\
1958 & \(1,157,618.67\) & 793,166 & 849,736 \\
1959 & \(1,512,544.28\) & \(1,024,613\) & \(1,097,690\) \\
1960 & \(1,386,791.11\) & 928,429 & 994,646 \\
1961 & \(946,537.91\) & 626,182 & 670,843 \\
1962 & \(1,105,319.94\) & 722,271 & 773,785 \\
1963 & \(975,898.16\) & 629,620 & 674,526 \\
1964 & \(1,062,273.23\) & 676,562 & 724,816 \\
1965 & \(1,276,453.96\) & 802,404 & 859,633 \\
1966 & \(1,264,020.54\) & 783,693 & 839,588 \\
1967 & \(2,155,804.71\) & \(1,318,382\) & \(1,412,412\) \\
1968 & \(1,410,699.64\) & 850,313 & 910,959 \\
1969 & \(1,275,653.91\) & 757,700 & 811,741 \\
1970 & \(3,310,156.89\) & \(1,937,005\) & \(2,075,156\) \\
1971 & \(1,734,056.90\) & 999,181 & \(1,070,445\) \\
1972 & \(2,560,637.01\) & \(1,452,060\) & \(1,555,624\) \\
1973 & \(3,148,714.81\) & \(1,756,227\) & \(1,881,485\) \\
1974 & \(5,021,676.60\) & \(2,754,139\) & \(2,950,570\) \\
1975 & \(5,167,910.82\) & \(2,786,227\) & \(2,984,946\) \\
1976 & \(5,671,443.36\) & \(3,003,937\) & \(3,218,184\) \\
1977 & \(5,203,409.18\) & \(2,705,773\) & \(2,898,754\) \\
1978 & \(4,105,689.89\) & \(2,094,600\) & \(2,243,991\) \\
1979 & \(5,001,700.90\) & \(2,503,451\) & \(2,682,002\) \\
1980 & \(6,228,343.26\) & \(3,055,127\) & \(3,273,025\) \\
1981 & \(4,785,971.92\) & \(2,299,755\) & \(2,463,778\) \\
1982 & \(6,295,649.37\) & \(2,961,096\) & \(3,172,287\) \\
1983 & \(6,761,494.26\) & \(4,032,555\) & \(4,320,165\) \\
1984 & \(6,232,935.90\) & \(3,647,514\) & \(3,907,662\) \\
1985 & \(8,206,025.33\) & \(4,738,980\) & \(5,076,973\) \\
1986 & \(7,927,566.52\) & \(4,485,417\) & \(4,805,326\) \\
1987 & \(7,466,775.71\) & \(4,161,981\) & \(4,458,822\) \\
1988 & \(8,686,416.46\) & \(4,734,966\) & \(5,072,673\) \\
1989 & \(8,495,687.27\) & \(4,553,688\) & \(4,878,466\) \\
1990 & \(8,969,422.66\) & \(4,692,802\) & \(5,027,502\) \\
1991 & \(10,193,332.21\) & \(5,233,257\) & \(5,606,503\) \\
1992 & \(11,347,315.14\) & \(5,675,927\) & \(6,080,745\) \\
1993 & \(8,496,824.10\) & \(4,160,895\) & \(4,457,658\) \\
1994 & \(9,541,760.47\) & \(4,541,878\) & \(4,865,814\) \\
1995 & \(9,164,251.55\) & \(4,259,544\) & \(4,563,343\) \\
1996 & \(9,298,647.53\) & \(4,214,147\) & \(4,514,708\) \\
1997 & \(14,154,506.35\) & \(6,244,968\) & \(6,690,371\) \\
& 19 & & \\
196
\end{tabular}
\begin{tabular}{rrr}
223,528 & 17.37 & 12,869 \\
299,059 & 17.82 & 16,782 \\
307,883 & 18.26 & 16,861 \\
414,854 & 18.71 & 22,173 \\
392,145 & 19.17 & 20,456 \\
275,695 & 19.63 & 14,045 \\
331,535 & 20.10 & 16,494 \\
301,372 & 20.58 & 14,644 \\
337,457 & 21.06 & 16,024 \\
416,821 & 21.54 & 19,351 \\
424,433 & 22.04 & 19,257 \\
743,393 & 22.53 & 32,996 \\
499,741 & 23.04 & 21,690 \\
463,913 & 23.55 & 19,699 \\
\(1,235,001\) & 24.06 & 51,330 \\
663,612 & 24.58 & 26,998 \\
\(1,005,013\) & 25.11 & 40,024 \\
\(1,267,230\) & 25.65 & 49,405 \\
\(2,071,107\) & 26.19 & 79,080 \\
\(2,182,965\) & 26.73 & 81,667 \\
\(2,453,259\) & 27.28 & 89,929 \\
\(2,304,655\) & 27.84 & 82,782 \\
\(1,861,699\) & 28.41 & 65,530 \\
\(2,319,699\) & 28.97 & 80,072 \\
\(2,955,318\) & 29.55 & 100,011 \\
\(2,322,194\) & 30.13 & 77,072 \\
\(3,123,362\) & 30.72 & 101,672 \\
\(2,441,329\) & 26.73 & 91,333 \\
\(2,325,274\) & 27.29 & 85,206 \\
\(3,129,052\) & 27.44 & 114,033 \\
\(3,122,241\) & 28.01 & 111,469 \\
\(3,007,954\) & 28.19 & 106,703 \\
\(3,613,743\) & 28.79 & 125,521 \\
\(3,617,221\) & 29.00 & 124,732 \\
\(3,941,921\) & 29.61 & 133,128 \\
\(4,586,829\) & 29.85 & 153,663 \\
\(5,266,570\) & 30.48 & 172,788 \\
\(4,039,166\) & 30.74 & 131,398 \\
\(4,675,946\) & 31.38 & 149,010 \\
\(4,600,909\) & 31.67 & 145,277 \\
\(4,783,940\) & 31.98 & 149,592 \\
\(7,464,135\) & 32.30 & 231,088 \\
&
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 364.11 POLES, TOWERS AND FIXTURES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 58-R1
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1998 & 2,035,403.19 & 872,781 & 935,029 & 1,100,374 & 32.64 & 33,712 \\
\hline 1999 & 359,835.26 & 149,691 & 160,367 & 199,468 & 32.99 & 6,046 \\
\hline 2000 & 1,384,267.54 & 557,583 & 597,351 & 786,917 & 33.36 & 23,589 \\
\hline 2001 & 2,697,856.16 & 1,050,006 & 1,124,894 & 1,572,962 & 33.75 & 46,606 \\
\hline 2002 & 2,696,476.24 & 1,011,718 & 1,083,876 & 1,612,600 & 34.14 & 47,235 \\
\hline 2003 & 5,488,502.19 & 1,980,252 & 2,121,487 & 3,367,015 & 34.55 & 97,453 \\
\hline 2004 & 7,325,171.60 & 2,547,695 & 2,729,402 & 4,595,770 & 34.69 & 132,481 \\
\hline 2005 & 7,447,877.85 & 2,476,419 & 2,653,042 & 4,794,836 & 35.13 & 136,488 \\
\hline 2006 & 10,842,876.70 & 3,452,372 & 3,698,602 & 7,144,275 & 35.32 & 202,273 \\
\hline 2007 & 5,512,843.74 & 1,674,802 & 1,794,252 & 3,718,592 & 35.52 & 104,690 \\
\hline 2008 & 7,052,660.96 & 2,035,398 & 2,180,567 & 4,872,094 & 35.75 & 136,282 \\
\hline 2009 & 8,109,398.84 & 2,211,433 & 2,369,157 & 5,740,242 & 36.00 & 159,451 \\
\hline 2010 & 12,245,124.03 & 3,153,119 & 3,378,006 & 8,867,118 & 36.04 & 246,035 \\
\hline 2011 & 21,551,838.56 & 5,181,062 & 5,550,585 & 16,001,254 & 36.34 & 440,321 \\
\hline 2012 & 19,148,429.13 & 4,302,652 & 4,609,526 & 14,538,903 & 36.23 & 401,295 \\
\hline 2013 & 24,561,834.63 & 5,086,756 & 5,449,553 & 19,112,282 & 36.37 & 525,496 \\
\hline 2014 & 14,765,079.25 & 2,799,459 & 2,999,122 & 11,765,957 & 36.34 & 323,774 \\
\hline 2015 & 13,589,872.01 & 2,334,740 & 2,501,258 & 11,088,614 & 36.17 & 306,569 \\
\hline 2016 & 14,496,570.62 & 2,215,076 & 2,373,060 & 12,123,511 & 36.05 & 336,297 \\
\hline 2017 & 25,185,953.88 & 3,364,843 & 3,604,830 & 21,581,124 & 35.65 & 605,361 \\
\hline 2018 & 52,577,790.41 & 5,962,321 & 6,387,565 & 46,190,225 & 35.18 & 1,312,968 \\
\hline 2019 & 49,101,962.88 & 4,517,381 & 4,839,570 & 44,262,393 & 34.52 & 1,282,225 \\
\hline 2020 & 61,628,996.73 & 4,283,215 & 4,588,702 & 57,040,295 & 33.47 & 1,704,222 \\
\hline 2021 & 5,912,212.01 & 267,823 & 286,925 & 5,625,287 & 31.61 & 177,959 \\
\hline 2022 & 31,199,775.22 & 561,596 & 601,650 & 30,598,126 & 27.28 & 1,121,632 \\
\hline & 624,017,331.77 & 179,884,978 & 192,714,514 & 431,302,818 & & 13,205,512 \\
\hline & \multicolumn{6}{|l|}{COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT . 32.7 2.1} \\
\hline
\end{tabular}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{rrrrrrr}
1935 & \(10,853.77\) & 9,597 & 9,719 & 1,135 & 5.79 & 196 \\
1936 & \(13,425.65\) & 11,758 & 11,908 & 1,518 & 6.21 & 244 \\
1937 & \(14,430.42\) & 12,520 & 12,680 & 1,750 & 6.62 & 264 \\
1938 & \(6,187.51\) & 5,318 & 5,386 & 802 & 7.03 & 114 \\
1940 & \(11,487.35\) & 9,686 & 9,809 & 1,678 & 7.84 & 214 \\
1941 & \(51,983.65\) & 43,417 & 43,970 & 8,014 & 8.24 & 973 \\
1942 & \(43,318.03\) & 35,833 & 36,290 & 7,028 & 8.64 & 813 \\
1943 & \(19,766.26\) & 16,193 & 16,399 & 3,367 & 9.04 & 372 \\
1944 & \(8,161.14\) & 6,622 & 6,706 & 1,455 & 9.43 & 154 \\
1945 & \(32,888.52\) & 26,423 & 26,760 & 6,129 & 9.83 & 623 \\
1946 & \(45,847.82\) & 36,467 & 36,932 & 8,916 & 10.23 & 872 \\
1947 & \(87,152.08\) & 68,641 & 69,516 & 17,636 & 10.62 & 1,661 \\
1948 & \(155,965.16\) & 121,590 & 123,139 & 32,826 & 11.02 & 2,979 \\
1949 & \(323,794.71\) & 249,840 & 253,024 & 70,771 & 11.42 & 6,197 \\
1950 & \(387,523.80\) & 295,913 & 299,684 & 87,840 & 11.82 & 7,431 \\
1951 & \(398,754.48\) & 301,299 & 305,139 & 93,615 & 12.22 & 7,661 \\
1952 & \(569,689.86\) & 425,900 & 431,327 & 138,363 & 12.62 & 10,964 \\
1953 & \(707,942.81\) & 523,595 & 530,267 & 177,676 & 13.02 & 13,646 \\
1954 & \(620,378.34\) & 453,745 & 459,527 & 160,851 & 13.43 & 11,977 \\
1955 & \(669,259.70\) & 484,009 & 490,177 & 179,083 & 13.84 & 12,940 \\
1956 & \(818,790.06\) & 585,435 & 592,895 & 225,895 & 14.25 & 15,852 \\
1957 & \(869,742.03\) & 614,560 & 622,391 & 247,351 & 14.67 & 16,861 \\
1958 & \(825,292.47\) & 576,219 & 583,562 & 241,730 & 15.09 & 16,019 \\
1959 & \(1,123,771.13\) & 775,177 & 785,055 & 338,716 & 15.51 & 21,839 \\
1960 & \(1,136,744.63\) & 774,578 & 784,449 & 352,296 & 15.93 & 22,115 \\
1961 & \(705,574.10\) & 474,710 & 480,759 & 224,815 & 16.36 & 13,742 \\
1962 & \(935,791.27\) & 621,365 & 629,283 & 306,508 & 16.80 & 18,245 \\
1963 & \(819,859.93\) & 537,336 & 544,183 & 275,677 & 17.23 & 16,000 \\
1964 & \(963,162.43\) & 622,781 & 630,717 & 332,445 & 17.67 & 18,814 \\
1965 & \(1,149,715.43\) & 733,059 & 742,401 & 407,314 & 18.12 & 22,479 \\
1966 & \(1,078,883.02\) & 678,186 & 686,828 & 392,055 & 18.57 & 21,112 \\
1967 & \(994,172.48\) & 615,989 & 623,839 & 370,333 & 19.02 & 19,471 \\
1968 & \(1,170,237.32\) & 714,313 & 723,416 & 446,821 & 19.48 & 22,937 \\
1969 & \(1,256,440.35\) & 755,372 & 764,998 & 491,442 & 19.94 & 24,646 \\
1970 & \(3,574,714.32\) & \(2,116,231\) & \(2,143,199\) & \(1,431,515\) & 20.40 & 70,172 \\
1971 & \(1,576,258.39\) & 918,328 & 930,030 & 646,228 & 20.87 & 30,964 \\
1972 & \(2,468,578.27\) & \(1,414,495\) & \(1,432,520\) & \(1,036,058\) & 21.35 & 48,527 \\
1973 & \(3,100,944.90\) & \(1,747,072\) & \(1,769,335\) & \(1,331,610\) & 21.83 & 60,999 \\
1974 & \(5,400,585.49\) & \(2,990,844\) & \(3,028,957\) & \(2,371,628\) & 22.31 & 106,303 \\
1975 & \(5,888,339.90\) & \(3,203,257\) & \(3,244,077\) & \(2,644,263\) & 22.80 & 115,976 \\
1976 & \(5,613,953.90\) & \(2,998,974\) & \(3,037,190\) & \(2,576,764\) & 23.29 & 110,638 \\
1977 & \(5,351,062.99\) & \(2,805,027\) & \(2,840,772\) & \(2,510,291\) & 23.79 & 105,519
\end{tabular}
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1978 & 4,266,535.13 & 2,192,999 & 2,220,945 & 2,045,590 & 24.30 & 84,181 \\
\hline 1979 & 4,357,296.72 & 2,196,078 & 2,224,063 & 2,133,234 & 24.80 & 86,018 \\
\hline 1980 & 5,865,525.61 & 2,895,223 & 2,932,117 & 2,933,409 & 25.32 & 115,853 \\
\hline 1981 & 3,974,569.33 & 1,921,307 & 1,945,791 & 2,028,778 & 25.83 & 78,543 \\
\hline 1982 & 4,301,066.76 & 2,034,405 & 2,060,330 & 2,240,737 & 26.35 & 85,037 \\
\hline 1983 & 4,321,331.87 & 2,731,082 & 2,765,885 & 1,555,447 & 23.00 & 67,628 \\
\hline 1984 & 3,829,973.27 & 2,388,754 & 2,419,194 & 1,410,779 & 23.23 & 60,731 \\
\hline 1985 & 4,401,892.33 & 2,707,164 & 2,741,662 & 1,660,230 & 23.48 & 70,708 \\
\hline 1986 & 4,491,419.03 & 2,704,733 & 2,739,200 & 1,752,219 & 24.11 & 72,676 \\
\hline 1987 & 3,707,442.90 & 2,197,772 & 2,225,779 & 1,481,664 & 24.38 & 60,774 \\
\hline 1988 & 3,473,221.84 & 2,024,888 & 2,050,691 & 1,422,531 & 24.67 & 57,662 \\
\hline 1989 & 4,647,568.58 & 2,662,127 & 2,696,051 & 1,951,518 & 24.98 & 78,123 \\
\hline 1990 & 5,002,627.34 & 2,812,477 & 2,848,317 & 2,154,310 & 25.31 & 85,117 \\
\hline 1991 & 6,242,276.64 & 3,440,743 & 3,484,589 & 2,757,688 & 25.65 & 107,512 \\
\hline 1992 & 6,953,755.90 & 3,753,637 & 3,801,470 & 3,152,286 & 26.00 & 121,242 \\
\hline 1993 & 4,688,779.43 & 2,475,676 & 2,507,224 & 2,181,555 & 26.37 & 82,729 \\
\hline 1994 & 4,195,292.86 & 2,163,932 & 2,191,507 & 2,003,786 & 26.75 & 74,908 \\
\hline 1995 & 3,147,265.88 & 1,583,704 & 1,603,885 & 1,543,381 & 27.15 & 56,846 \\
\hline 1996 & 6,901,402.15 & 3,401,701 & 3,445,049 & 3,456,353 & 27.26 & 126,792 \\
\hline 1997 & 6,048,356.67 & 2,899,582 & 2,936,532 & 3,111,825 & 27.69 & 112,381 \\
\hline 1998 & 2,232,948.01 & 1,045,020 & 1,058,337 & 1,174,611 & 27.85 & 42,176 \\
\hline 1999 & 7,831,470.15 & 3,552,355 & 3,597,623 & 4,233,847 & 28.31 & 149,553 \\
\hline 2000 & 4,921,489.82 & 2,170,377 & 2,198,035 & 2,723,455 & 28.52 & 95,493 \\
\hline 2001 & 19,785,430.39 & 8,464,207 & 8,572,068 & 11,213,362 & 28.75 & 390,030 \\
\hline 2002 & 12,641,041.63 & 5,234,655 & 5,301,361 & 7,339,681 & 29.00 & 253,092 \\
\hline 2003 & 3,821,266.68 & 1,527,742 & 1,547,210 & 2,274,057 & 29.28 & 77,666 \\
\hline 2004 & 9,259,094.94 & 3,562,900 & 3,608,303 & 5,650,792 & 29.58 & 191,034 \\
\hline 2005 & 16,443,217.32 & 6,100,434 & 6,178,173 & 10,265,044 & 29.67 & 345,974 \\
\hline 2006 & 9,683,301.07 & 3,451,129 & 3,495,107 & 6,188,194 & 29.80 & 207,658 \\
\hline 2007 & 3,825,638.76 & 1,304,543 & 1,321,167 & 2,504,472 & 29.95 & 83,622 \\
\hline 2008 & 10,436,450.36 & 3,389,759 & 3,432,955 & 7,003,495 & 30.14 & 232,365 \\
\hline 2009 & 15,081,792.78 & 4,663,290 & 4,722,715 & 10,359,078 & 30.17 & 343,357 \\
\hline 2010 & 54,119,945.17 & 15,830,084 & 16,031,810 & 38,088,135 & 30.24 & 1,259,528 \\
\hline 2011 & 1,686,582.63 & 465,497 & 471,429 & 1,215,154 & 30.17 & 40,277 \\
\hline 2012 & 23,969,523.20 & 6,191,328 & 6,270,225 & 17,699,298 & 30.15 & 587,041 \\
\hline 2013 & 10,109,782.46 & 2,430,392 & 2,461,363 & 7,648,419 & 30.02 & 254,777 \\
\hline 2014 & 12,912,065.01 & 2,853,566 & 2,889,930 & 10,022,135 & 29.96 & 334,517 \\
\hline 2015 & 13,464,266.44 & 2,717,089 & 2,751,713 & 10,712,553 & 29.67 & 361,057 \\
\hline 2016 & 12,874,598.59 & 2,335,452 & 2,365,213 & 10,509,386 & 29.34 & 358,193 \\
\hline 2017 & 29,970,897.95 & 4,780,358 & 4,841,275 & 25,129,623 & 28.98 & 867,137 \\
\hline 2018 & 45,534,673.57 & 6,247,357 & 6,326,968 & 39,207,706 & 28.29 & 1,385,921 \\
\hline 2019 & 45,938,062.71 & 5,191,001 & 5,257,151 & 40,680,912 & 27.46 & 1,481,461 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
}
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DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE ACCOUNT 365.01 OVERHEAD CONDUCTORS AND DEVICES CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 50-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2020 & 49,720,864.70 & 4,315,771 & 4,370,768 & 45,350,097 & 26.32 & 1,723,028 \\
\hline 2021 & 34,351,091.23 & 1,988,928 & 2,014,273 & 32,336,818 & 24.41 & 1,324,737 \\
\hline 2022 & 33,023,045.66 & 799,158 & 809,342 & 32,213,703 & 20.12 & 1,601,079 \\
\hline & 629,457,567.34 & 182,212,050 & 184,534,010 & 444,923,557 & & 16,675,759 \\
\hline & COMPOSITE REMAI & NG LIFE AND & NNUAL ACCR & RATE, PERCE & 26 & 2.65 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 366 UNDERGROUND CONDUIT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1917 & 442.09 & 431 & 430 & 12 & 1.85 & 6 \\
\hline 1918 & 59.28 & 58 & 58 & 1 & 2.07 & \\
\hline 1919 & 5,336.41 & 5,172 & 5,159 & 177 & 2.31 & 77 \\
\hline 1920 & 6,494.98 & 6,276 & 6,260 & 235 & 2.53 & 93 \\
\hline 1921 & 17,232.56 & 16,596 & 16,554 & 679 & 2.77 & 245 \\
\hline 1922 & 110,203.12 & 105,765 & 105,496 & 4,707 & 3.02 & 1,559 \\
\hline 1923 & 202,318.17 & 193,523 & 193,031 & 9,287 & 3.26 & 2,849 \\
\hline 1924 & 226,177.39 & 215,592 & 215,044 & 11,133 & 3.51 & 3,172 \\
\hline 1925 & 247,728.48 & 235,275 & 234,677 & 13,051 & 3.77 & 3,462 \\
\hline 1926 & 271,887.87 & 257,315 & 256,661 & 15,227 & 4.02 & 3,788 \\
\hline 1927 & 495,652.26 & 467,365 & 466,177 & 29,475 & 4.28 & 6,887 \\
\hline 1928 & 234,182.73 & 220,008 & 219,449 & 14,734 & 4.54 & 3,245 \\
\hline 1929 & 356,745.06 & 333,913 & 333,064 & 23,681 & 4.80 & 4,934 \\
\hline 1930 & 210,710.48 & 196,466 & 195,967 & 14,743 & 5.07 & 2,908 \\
\hline 1931 & 211,043.65 & 196,017 & 195,519 & 15,525 & 5.34 & 2,907 \\
\hline 1932 & 59,005.75 & 54,592 & 54,453 & 4,553 & 5.61 & 812 \\
\hline 1933 & 59,751.76 & 55,059 & 54,919 & 4,833 & 5.89 & 821 \\
\hline 1934 & 46,262.39 & 42,456 & 42,348 & 3,914 & 6.17 & 634 \\
\hline 1935 & 71,137.40 & 65,010 & 64,845 & 6,292 & 6.46 & 974 \\
\hline 1936 & 19,542.06 & 17,783 & 17,738 & 1,804 & 6.75 & 267 \\
\hline 1937 & 55,094.44 & 49,916 & 49,789 & 5,305 & 7.05 & 752 \\
\hline 1938 & 9,570.31 & 8,631 & 8,609 & 961 & 7.36 & 131 \\
\hline 1939 & 52,763.64 & 47,361 & 47,241 & 5,523 & 7.68 & 719 \\
\hline 1940 & 17,157.11 & 15,325 & 15,286 & 1,871 & 8.01 & 234 \\
\hline 1941 & 168,526.25 & 149,764 & 149,383 & 19,143 & 8.35 & 2,293 \\
\hline 1942 & 53,960.81 & 47,694 & 47,573 & 6,388 & 8.71 & 733 \\
\hline 1943 & 49,639.55 & 43,630 & 43,519 & 6,121 & 9.08 & 674 \\
\hline 1944 & 6,341.77 & 5,541 & 5,527 & 815 & 9.47 & 86 \\
\hline 1945 & 68,830.76 & 59,764 & 59,612 & 9,219 & 9.88 & 933 \\
\hline 1946 & 7,647.29 & 6,597 & 6,580 & 1,067 & 10.30 & 104 \\
\hline 1947 & 29,361.19 & 25,153 & 25,089 & 4,272 & 10.75 & 397 \\
\hline 1948 & 87,509.52 & 74,429 & 74,240 & 13,270 & 11.21 & 1,184 \\
\hline 1949 & 144,969.88 & 122,355 & 122,044 & 22,926 & 11.70 & 1,959 \\
\hline 1950 & 213,230.09 & 178,516 & 178,062 & 35,168 & 12.21 & 2,880 \\
\hline 1951 & 91,401.64 & 75,875 & 75,682 & 15,720 & 12.74 & 1,234 \\
\hline 1952 & 151,154.92 & 124,370 & 124,054 & 27,101 & 13.29 & 2,039 \\
\hline 1953 & 338,507.01 & 275,951 & 275,250 & 63,257 & 13.86 & 4,564 \\
\hline 1954 & 453,469.53 & 366,041 & 365,111 & 88,359 & 14.46 & 6,111 \\
\hline 1955 & 373,226.93 & 298,234 & 297,476 & 75,751 & 15.07 & 5,027 \\
\hline 1956 & 293,057.17 & 231,712 & 231,123 & 61,934 & 15.70 & 3,945 \\
\hline 1957 & 179,372.64 & 140,293 & 139,936 & 39,437 & 16.34 & 2,414 \\
\hline 1958 & 454,500.38 & 351,479 & 350,586 & 103,914 & 17.00 & 6,113 \\
\hline
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 366 UNDERGROUND CONDUIT}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{lrrr}
1959 & \(230,690.26\) & 176,340 & 175,892 \\
1960 & \(294,287.24\) & 222,284 & 221,719 \\
1961 & \(659,777.87\) & 492,372 & 491,120 \\
1962 & \(570,010.60\) & 420,058 & 418,990 \\
1963 & \(110,595.41\) & 80,455 & 80,250 \\
1964 & \(205,707.13\) & 147,698 & 147,323 \\
1965 & \(879,429.70\) & 622,874 & 621,291 \\
1966 & \(282,414.63\) & 197,275 & 196,774 \\
1967 & \(964,627.49\) & 664,175 & 662,487 \\
1968 & \(266,670.73\) & 180,944 & 180,484 \\
1969 & \(1,198,951.81\) & 801,224 & 799,187 \\
1970 & \(1,422,553.69\) & 936,040 & 933,661 \\
1971 & \(3,154,217.34\) & \(2,042,261\) & \(2,037,070\) \\
1972 & \(1,500,082.19\) & 955,447 & 953,018 \\
1973 & \(2,265,743.71\) & \(1,418,650\) & \(1,415,044\) \\
1974 & \(3,002,184.57\) & \(1,847,334\) & \(1,842,638\) \\
1975 & \(1,777,825.48\) & \(1,074,287\) & \(1,071,556\) \\
1976 & \(1,435,599.80\) & 851,598 & 849,433 \\
1977 & \(998,757.42\) & 581,277 & 579,799 \\
1978 & \(2,316,659.34\) & \(1,321,724\) & \(1,318,364\) \\
1979 & \(1,776,964.66\) & 993,448 & 990,923 \\
1980 & \(2,859,726.47\) & \(1,565,614\) & \(1,561,634\) \\
1981 & \(929,966.05\) & 498,341 & 497,074 \\
1982 & \(3,290,275.59\) & \(1,724,104\) & \(1,719,722\) \\
1983 & \(2,979,595.17\) & \(1,612,557\) & \(1,608,458\) \\
1984 & \(3,253,227.71\) & \(1,715,752\) & \(1,711,391\) \\
1985 & \(2,008,201.83\) & \(1,031,814\) & \(1,029,191\) \\
1986 & \(4,962,368.91\) & \(2,499,545\) & \(2,493,192\) \\
1987 & \(1,247,674.00\) & 611,235 & 609,681 \\
1988 & \(1,628,563.37\) & 775,359 & 773,388 \\
1989 & \(3,297,860.15\) & \(1,524,601\) & \(1,520,726\) \\
1990 & \(2,618,142.84\) & \(1,182,877\) & \(1,179,870\) \\
1991 & \(1,284,786.76\) & 562,480 & 561,050 \\
1992 & \(1,785,235.23\) & 756,940 & 755,016 \\
1993 & \(4,178,977.29\) & \(1,713,381\) & \(1,709,026\) \\
1994 & \(1,057,848.61\) & 419,120 & 418,055 \\
1995 & \(2,028,084.35\) & 780,812 & 778,827 \\
1996 & \(968,423.08\) & 359,285 & 358,372 \\
1997 & \(832,350.89\) & 297,149 & 296,394 \\
1998 & \(537,611.98\) & 184,401 & 183,932 \\
1999 & \(1,669,385.95\) & 549,228 & 547,832 \\
2000 & \(694,911.19\) & 218,897 & 218,341 \\
& & &
\end{tabular}
\begin{tabular}{rrr}
54,798 & 17.67 & 3,101 \\
72,568 & 18.35 & 3,955 \\
168,658 & 19.03 & 8,863 \\
151,021 & 19.73 & 7,654 \\
30,345 & 20.44 & 1,485 \\
58,384 & 21.15 & 2,760 \\
258,139 & 21.88 & 11,798 \\
85,641 & 22.61 & 3,788 \\
302,140 & 23.36 & 12,934 \\
86,187 & 24.11 & 3,575 \\
399,765 & 24.88 & 16,068 \\
488,893 & 25.65 & 19,060 \\
\(1,117,147\) & 26.44 & 42,252 \\
547,064 & 27.23 & 20,090 \\
850,700 & 28.04 & 30,339 \\
\(1,159,547\) & 28.85 & 40,192 \\
706,269 & 29.68 & 23,796 \\
586,167 & 30.51 & 19,212 \\
418,958 & 31.35 & 13,364 \\
998,295 & 32.21 & 30,993 \\
786,042 & 33.07 & 23,769 \\
\(1,298,092\) & 33.94 & 38,247 \\
432,892 & 34.81 & 12,436 \\
\(1,570,554\) & 35.70 & 43,993 \\
\(1,371,137\) & 33.49 & 40,942 \\
\(1,541,837\) & 34.50 & 44,691 \\
979,011 & 35.49 & 27,586 \\
\(2,469,177\) & 35.96 & 68,665 \\
637,993 & 36.96 & 17,262 \\
855,175 & 37.96 & 22,528 \\
\(1,777,134\) & 38.96 & 45,614 \\
\(1,438,273\) & 39.44 & 36,467 \\
723,737 & 40.45 & 17,892 \\
\(1,030,219\) & 41.44 & 24,860 \\
\(2,469,951\) & 42.45 & 58,185 \\
639,794 & 43.44 & 14,728 \\
\(1,249,257\) & 43.93 & 28,437 \\
610,051 & 44.93 & 13,578 \\
535,957 & 45.93 & 11,669 \\
353,680 & 46.93 & 7,536 \\
\(1,121,554\) & 47.93 & 23,400 \\
476,570 & 48.93 & 9,740 \\
& &
\end{tabular}

\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 75-R4
\begin{tabular}{rrrrrrr}
2001 & \(270,198.36\) & 81,330 & 81,123 & 189,075 & 49.93 & 3,787 \\
2002 & \(2,329,848.30\) & 673,326 & 671,614 & \(1,658,234\) & 50.43 & 32,882 \\
2003 & \(2,972,009.87\) & 817,303 & 815,226 & \(2,156,784\) & 51.42 & 41,944 \\
2004 & \(510,817.38\) & 133,221 & 132,882 & 377,935 & 52.43 & 7,208 \\
2005 & \(2,114,559.13\) & 521,873 & 520,546 & \(1,594,013\) & 53.42 & 29,839 \\
2006 & \(3,639,633.57\) & 846,579 & 844,427 & \(2,795,207\) & 54.43 & 51,354 \\
2007 & \(2,929,003.10\) & 640,280 & 638,653 & \(2,290,350\) & 55.42 & 41,327 \\
2008 & \(2,215,762.42\) & 452,902 & 451,751 & \(1,764,011\) & 56.43 & 31,260 \\
2009 & \(5,667,166.70\) & \(1,079,029\) & \(1,076,286\) & \(4,590,881\) & 57.42 & 79,953 \\
2010 & \(3,101,641.22\) & 546,509 & 545,120 & \(2,556,521\) & 58.43 & 43,754 \\
2011 & \(116,440.90\) & 18,887 & 18,839 & 97,602 & 59.42 & 1,643 \\
2012 & \(4,063,584.05\) & 601,410 & 599,881 & \(3,463,703\) & 60.43 & 57,318 \\
2013 & \(897,111.56\) & 120,213 & 119,907 & 777,205 & 61.42 & 12,654 \\
2014 & \(12,999,814.33\) & \(1,557,378\) & \(1,553,420\) & \(11,446,394\) & 62.43 & 183,348 \\
2015 & \(9,183,702.93\) & 978,064 & 975,578 & \(8,208,125\) & 62.92 & 130,453 \\
2016 & \(3,578,109.78\) & 330,260 & 329,421 & \(3,248,689\) & 63.92 & 50,824 \\
2017 & \(6,325,935.96\) & 494,056 & 492,800 & \(5,833,136\) & 64.92 & 89,851 \\
2018 & \(938,282.65\) & 59,956 & 59,804 & 878,479 & 65.92 & 13,326 \\
2019 & \(853,307.39\) & 42,409 & 42,301 & 811,006 & 66.92 & 12,119 \\
2020 & \(2,023,970.72\) & 71,851 & 71,668 & \(1,952,303\) & 67.92 & 28,744 \\
2021 & \(53,239,103.83\) & \(1,133,993\) & \(1,131,111\) & \(52,107,993\) & 68.92 & 756,065 \\
2022 & \(23,826,712.12\) & 169,170 & 168,740 & \(23,657,973\) & 69.92 & 338,358
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 54.1 1.40

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R1.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1944 & 1,261.56 & 1,160 & 1,065 & 197 & 3.64 & 54 \\
\hline 1945 & 101.75 & 93 & 85 & 17 & 3.86 & 4 \\
\hline 1948 & 456.96 & 411 & 377 & 80 & 4.55 & 18 \\
\hline 1949 & 128.59 & 115 & 106 & 23 & 4.80 & 5 \\
\hline 1951 & 459.71 & 406 & 373 & 87 & 5.30 & 16 \\
\hline 1952 & 159.98 & 140 & 129 & 31 & 5.56 & 6 \\
\hline 1953 & 12,182.73 & 10,604 & 9,738 & 2,445 & 5.83 & 419 \\
\hline 1954 & 4,855.52 & 4,196 & 3,853 & 1,003 & 6.11 & 164 \\
\hline 1955 & 4,520.01 & 3,878 & 3,561 & 959 & 6.39 & 150 \\
\hline 1956 & 4.72 & 4 & 4 & 1 & 6.67 & \\
\hline 1957 & 11,661.19 & 9,858 & 9,053 & 2,608 & 6.96 & 375 \\
\hline 1958 & 6,431.83 & 5,396 & 4,955 & 1,477 & 7.25 & 204 \\
\hline 1959 & 1,316.86 & 1,096 & 1,006 & 311 & 7.55 & 41 \\
\hline 1960 & 1,832.94 & 1,513 & 1,389 & 444 & 7.85 & 57 \\
\hline 1962 & 832.44 & 676 & 621 & 211 & 8.48 & 25 \\
\hline 1963 & 5,726.20 & 4,606 & 4,230 & 1,496 & 8.80 & 170 \\
\hline 1964 & 7,796.63 & 6,216 & 5,708 & 2,089 & 9.12 & 229 \\
\hline 1965 & 110,753.68 & 87,471 & 80,327 & 30,427 & 9.46 & 3,216 \\
\hline 1966 & 264,262.83 & 206,712 & 189,830 & 74,433 & 9.80 & 7,595 \\
\hline 1967 & 382,040.72 & 295,868 & 271,705 & 110,336 & 10.15 & 10,871 \\
\hline 1968 & 354,435.82 & 271,576 & 249,397 & 105,039 & 10.52 & 9,985 \\
\hline 1969 & 691,607.73 & 524,239 & 481,425 & 210,183 & 10.89 & 19,301 \\
\hline 1970 & 1,465,846.74 & 1,098,740 & 1,009,008 & 456,839 & 11.27 & 40,536 \\
\hline 1971 & 2,430,693.83 & 1,800,877 & 1,653,802 & 776,892 & 11.66 & 66,629 \\
\hline 1972 & 1,720,645.36 & 1,259,512 & 1,156,650 & 563,995 & 12.06 & 46,766 \\
\hline 1973 & 1,519,393.70 & 1,098,355 & 1,008,654 & 510,740 & 12.47 & 40,957 \\
\hline 1974 & 1,928,836.96 & 1,376,341 & 1,263,937 & 664,900 & 12.89 & 51,583 \\
\hline 1975 & 2,862,930.20 & 2,014,873 & 1,850,322 & 1,012,608 & 13.33 & 75,965 \\
\hline 1976 & 2,953,416.06 & 2,049,671 & 1,882,278 & 1,071,138 & 13.77 & 77,788 \\
\hline 1977 & 2,812,224.70 & 1,922,943 & 1,765,899 & 1,046,326 & 14.23 & 73,530 \\
\hline 1978 & 2,738,594.49 & 1,843,978 & 1,693,383 & 1,045,211 & 14.70 & 71,103 \\
\hline 1979 & 3,483,226.04 & 2,308,229 & 2,119,720 & 1,363,506 & 15.18 & 89,823 \\
\hline 1980 & 3,296,911.77 & 2,148,136 & 1,972,701 & 1,324,211 & 15.68 & 84,452 \\
\hline 1981 & 1,506,746.57 & 964,981 & 886,173 & 620,574 & 16.18 & 38,354 \\
\hline 1982 & 3,158,016.56 & 1,986,045 & 1,823,848 & 1,334,169 & 16.70 & 79,890 \\
\hline 1983 & 2,140,354.06 & 1,547,048 & 1,420,703 & 719,651 & 15.15 & 47,502 \\
\hline 1984 & 4,747,810.44 & 3,381,391 & 3,105,238 & 1,642,572 & 15.56 & 105,564 \\
\hline 1985 & 3,742,744.82 & 2,624,413 & 2,410,081 & 1,332,664 & 15.98 & 83,396 \\
\hline 1986 & 3,196,803.67 & 2,205,155 & 2,025,063 & 1,171,741 & 16.41 & 71,404 \\
\hline 1987 & 2,567,111.76 & 1,731,517 & 1,590,107 & 977,005 & 17.13 & 57,035 \\
\hline 1988 & 2,952,855.10 & 1,955,971 & 1,796,230 & 1,156,625 & 17.58 & 65,792 \\
\hline 1989 & 3,498,954.94 & 2,273,971 & 2,088,259 & 1,410,696 & 18.05 & 78,155 \\
\hline
\end{tabular}

\footnotetext{
Gannett Fleming
}


SURVIVOR CURVE.. IOWA 45-R1.5
\begin{tabular}{rrrrrrr}
1990 & \(4,514,327.09\) & \(2,890,072\) & \(2,654,044\) & \(1,860,283\) & 18.26 & 101,877 \\
1991 & \(4,993,234.19\) & \(3,129,759\) & \(2,874,157\) & \(2,119,077\) & 18.75 & 113,017 \\
1992 & \(4,351,452.74\) & \(2,667,441\) & \(2,449,595\) & \(1,901,858\) & 19.25 & 98,798 \\
1993 & \(4,376,179.98\) & \(2,620,457\) & \(2,406,448\) & \(1,969,732\) & 19.76 & 99,683 \\
1994 & \(3,721,660.42\) & \(2,174,194\) & \(1,996,631\) & \(1,725,029\) & 20.28 & 85,061 \\
1995 & \(2,793,378.07\) & \(1,589,991\) & \(1,460,139\) & \(1,333,239\) & 20.81 & 64,067 \\
1996 & \(3,900,499.61\) & \(2,160,097\) & \(1,983,685\) & \(1,916,815\) & 21.35 & 89,781 \\
1997 & \(3,296,485.34\) & \(1,782,080\) & \(1,636,540\) & \(1,659,945\) & 21.67 & 76,601 \\
1998 & \(514,517.88\) & 269,762 & 247,731 & 266,787 & 22.23 & 12,001 \\
1999 & \(7,500,170.70\) & \(3,807,087\) & \(3,496,168\) & \(4,004,003\) & 22.80 & 175,614 \\
2000 & \(9,397,911.45\) & \(4,631,291\) & \(4,253,061\) & \(5,144,850\) & 23.16 & 222,144 \\
2001 & \(5,139,905.33\) & \(2,442,483\) & \(2,243,009\) & \(2,896,896\) & 23.75 & 121,975 \\
2002 & \(4,083,354.10\) & \(1,875,076\) & \(1,721,942\) & \(2,361,412\) & 24.14 & 97,822 \\
2003 & \(6,259,040.28\) & \(2,758,359\) & \(2,533,088\) & \(3,725,952\) & 24.75 & 150,544 \\
2004 & \(11,027,891.71\) & \(4,671,415\) & \(4,289,908\) & \(6,737,984\) & 25.17 & 267,699 \\
2005 & \(13,297,990.13\) & \(5,398,984\) & \(4,958,058\) & \(8,339,932\) & 25.60 & 325,779 \\
2006 & \(13,175,945.97\) & \(5,109,632\) & \(4,692,336\) & \(8,483,610\) & 26.05 & 325,666 \\
2007 & \(8,266,000.94\) & \(3,049,328\) & \(2,800,294\) & \(5,465,707\) & 26.52 & 206,098 \\
2008 & \(8,472,620.27\) & \(2,960,334\) & \(2,718,568\) & \(5,754,052\) & 27.00 & 213,113 \\
2009 & \(18,282,974.06\) & \(6,048,008\) & \(5,554,077\) & \(12,728,897\) & 27.31 & 466,089 \\
2010 & \(21,807,963.51\) & \(6,760,469\) & \(6,208,352\) & \(15,599,612\) & 27.82 & 560,734 \\
2011 & \(15,304,183.51\) & \(4,435,152\) & \(4,072,940\) & \(11,231,244\) & 28.18 & 398,554 \\
2012 & \(17,754,502.04\) & \(4,790,165\) & \(4,398,960\) & \(13,355,542\) & 28.41 & 470,100 \\
2013 & \(20,359,601.00\) & \(5,049,181\) & \(4,636,823\) & \(15,722,778\) & 28.81 & 545,740 \\
2014 & \(20,638,760.88\) & \(4,666,424\) & \(4,285,325\) & \(16,353,436\) & 29.09 & 562,167 \\
2015 & \(28,318,041.34\) & \(5,776,880\) & \(5,305,091\) & \(23,012,950\) & 29.26 & 786,499 \\
2016 & \(18,283,064.46\) & \(3,303,750\) & \(3,033,938\) & \(15,249,126\) & 29.47 & 517,446 \\
2017 & \(26,137,261.38\) & \(4,098,323\) & \(3,763,620\) & \(22,373,641\) & 29.59 & 756,122 \\
2018 & \(27,429,256.36\) & \(3,615,176\) & \(3,319,930\) & \(24,109,326\) & 29.63 & 813,680 \\
2019 & \(26,853,044.24\) & \(2,857,164\) & \(2,623,824\) & \(24,229,220\) & 29.39 & 824,404 \\
2020 & \(13,550,676.34\) & \(1,077,279\) & 989,299 & \(12,561,377\) & 28.95 & 433,899 \\
2021 & \(10,155,109.12\) & 515,880 & 473,749 & \(9,681,360\) & 28.00 & 345,763 \\
2022 & \(19,709,409.03\) & 386,304 & 354,756 & \(19,354,653\) & 25.07 & 772,024 \\
& & & & & &
\end{tabular}

\footnotetext{
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 25.9 2.72
}

Gannett Fleming

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 39-S0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1949 & 6,912.40 & 6,620 & 5,704 & 1,208 & 1.65 & 732 \\
\hline 1950 & 27,572.97 & 26,145 & 22,529 & 5,044 & 2.02 & 2,497 \\
\hline 1951 & 87,854.85 & 82,471 & 71,066 & 16,789 & 2.39 & 7,025 \\
\hline 1952 & 165,434.72 & 153,684 & 132,430 & 33,005 & 2.77 & 11,915 \\
\hline 1953 & 2,242.68 & 2,062 & 1,777 & 466 & 3.14 & 148 \\
\hline 1955 & 175,483.65 & 157,981 & 136,133 & 39,351 & 3.89 & 10,116 \\
\hline 1956 & 27,345.77 & 24,352 & 20,984 & 6,362 & 4.27 & 1,490 \\
\hline 1957 & 451,637.89 & 397,789 & 342,777 & 108,861 & 4.65 & 23,411 \\
\hline 1958 & 213,781.26 & 186,210 & 160,458 & 53,323 & 5.03 & 10,601 \\
\hline 1959 & 153,331.53 & 132,023 & 113,765 & 39,567 & 5.42 & 7,300 \\
\hline 1960 & 178,172.91 & 151,675 & 130,699 & 47,474 & 5.80 & 8,185 \\
\hline 1961 & 270,560.85 & 227,617 & 196,139 & 74,422 & 6.19 & 12,023 \\
\hline 1962 & 455,018.56 & 378,248 & 325,939 & 129,080 & 6.58 & 19,617 \\
\hline 1963 & 330,511.57 & 271,443 & 233,904 & 96,608 & 6.97 & 13,861 \\
\hline 1964 & 204,841.76 & 166,184 & 143,202 & 61,640 & 7.36 & 8,375 \\
\hline 1965 & 125,964.05 & 100,901 & 86,947 & 39,017 & 7.76 & 5,028 \\
\hline 1966 & 148,248.60 & 117,269 & 101,051 & 47,198 & 8.15 & 5,791 \\
\hline 1967 & 117,517.18 & 91,754 & 79,065 & 38,452 & 8.55 & 4,497 \\
\hline 1968 & 47,161.95 & 36,339 & 31,314 & 15,848 & 8.95 & 1,771 \\
\hline 1969 & 231,143.35 & 175,669 & 151,375 & 79,768 & 9.36 & 8,522 \\
\hline 1970 & 1,189,601.71 & 891,892 & 768,549 & 421,053 & 9.76 & 43,141 \\
\hline 1971 & 76,603.05 & 56,627 & 48,796 & 27,807 & 10.17 & 2,734 \\
\hline 1972 & 932,799.72 & 679,750 & 585,745 & 347,055 & 10.58 & 32,803 \\
\hline 1973 & 556,812.77 & 399,908 & 344,603 & 212,210 & 10.99 & 19,309 \\
\hline 1974 & 537,548.65 & 380,283 & 327,692 & 209,857 & 11.41 & 18,392 \\
\hline 1975 & 546,612.08 & 380,808 & 328,144 & 218,468 & 11.83 & 18,467 \\
\hline 1976 & 917,996.87 & 629,654 & 542,577 & 375,420 & 12.25 & 30,647 \\
\hline 1977 & 1,666,965.29 & 1,125,418 & 969,779 & 697,186 & 12.67 & 55,027 \\
\hline 1978 & 1,672,840.92 & 1,110,934 & 957,298 & 715,543 & 13.10 & 54,622 \\
\hline 1979 & 1,416,124.63 & 924,843 & 796,943 & 619,182 & 13.53 & 45,764 \\
\hline 1980 & 1,008,746.84 & 647,666 & 558,098 & 450,649 & 13.96 & 32,281 \\
\hline 1981 & 1,492,850.10 & 941,645 & 811,421 & 681,429 & 14.40 & 47,321 \\
\hline 1982 & 1,011,179.41 & 626,416 & 539,786 & 471,393 & 14.84 & 31,765 \\
\hline 1983 & 1,986,674.65 & 1,475,305 & 1,271,279 & 715,396 & 13.69 & 52,257 \\
\hline 1984 & 2,434,428.85 & 1,790,279 & 1,542,694 & 891,735 & 13.85 & 64,385 \\
\hline 1985 & 2,542,143.26 & 1,840,003 & 1,585,541 & 956,602 & 14.31 & 66,848 \\
\hline 1986 & 2,329,645.09 & 1,666,628 & 1,436,143 & 893,502 & 14.52 & 61,536 \\
\hline 1987 & 2,607,288.33 & 1,832,663 & 1,579,216 & 1,028,072 & 15.01 & 68,492 \\
\hline 1988 & 2,721,059.73 & 1,886,783 & 1,625,852 & 1,095,208 & 15.25 & 71,817 \\
\hline 1989 & 4,158,991.41 & 2,842,255 & 2,449,188 & 1,709,803 & 15.52 & 110,168 \\
\hline 1990 & 3,728,300.37 & 2,508,400 & 2,161,503 & 1,566,797 & 15.81 & 99,102 \\
\hline 1991 & 3,234,557.55 & 2,129,633 & 1,835,117 & 1,399,441 & 16.34 & 85,645 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.1 LINE TRANSFORMERS - OVERHEAD
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 39-S0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1992 & 2,058,739.89 & 1,331,181 & 1,147,086 & 911,654 & 16.67 & 54,688 \\
\hline 1993 & 2,004,474.07 & 1,277,251 & 1,100,615 & 903,859 & 16.80 & 53,801 \\
\hline 1994 & 1,872,556.45 & 1,168,850 & 1,007,205 & 865,351 & 17.16 & 50,428 \\
\hline 1995 & 2,176,774.58 & 1,328,921 & 1,145,139 & 1,031,636 & 17.55 & 58,783 \\
\hline 1996 & 1,207,001.18 & 722,873 & 622,904 & 584,097 & 17.75 & 32,907 \\
\hline 1997 & 1,097,804.24 & 641,118 & 552,455 & 545,349 & 18.17 & 30,014 \\
\hline 1998 & 623,522.97 & 355,907 & 306,687 & 316,836 & 18.42 & 17,201 \\
\hline 1999 & 5,021,921.96 & 2,797,211 & 2,410,373 & 2,611,549 & 18.69 & 139,730 \\
\hline 2000 & 2,430,665.76 & 1,312,560 & 1,131,041 & 1,299,625 & 19.17 & 67,795 \\
\hline 2001 & 2,467,845.87 & 1,300,061 & 1,120,270 & 1,347,576 & 19.31 & 69,786 \\
\hline 2002 & 5,148,565.13 & 2,627,828 & 2,264,415 & 2,884,150 & 19.66 & 146,701 \\
\hline 2003 & 2,360,793.29 & 1,164,815 & 1,003,728 & 1,357,065 & 20.02 & 67,785 \\
\hline 2004 & 10,669,816.70 & 5,092,704 & 4,388,413 & 6,281,404 & 20.26 & 310,040 \\
\hline 2005 & 20,429,041.03 & 9,401,445 & 8,101,280 & 12,327,761 & 20.52 & 600,768 \\
\hline 2006 & 7,665,104.18 & 3,389,509 & 2,920,760 & 4,744,344 & 20.81 & 227,984 \\
\hline 2007 & 6,527,117.96 & 2,762,276 & 2,380,269 & 4,146,849 & 21.13 & 196,254 \\
\hline 2008 & 7,201,939.48 & 2,903,102 & 2,501,620 & 4,700,319 & 21.47 & 218,925 \\
\hline 2009 & 7,359,562.28 & 2,821,656 & 2,431,437 & 4,928,125 & 21.71 & 226,998 \\
\hline 2010 & 11,987,102.85 & 4,345,325 & 3,744,392 & 8,242,711 & 21.98 & 375,010 \\
\hline 2011 & 9,094,985.54 & 3,106,847 & 2,677,188 & 6,417,798 & 22.17 & 289,481 \\
\hline 2012 & 15,479,178.15 & 4,940,954 & 4,257,649 & 11,221,529 & 22.39 & 501,185 \\
\hline 2013 & 10,238,258.87 & 3,024,382 & 2,606,128 & 7,632,131 & 22.66 & 336,811 \\
\hline 2014 & 10,228,571.01 & 2,764,783 & 2,382,430 & 7,846,141 & 22.95 & 341,880 \\
\hline 2015 & 9,930,966.02 & 2,435,073 & 2,098,316 & 7,832,650 & 23.08 & 339,370 \\
\hline 2016 & 8,364,245.01 & 1,821,733 & 1,569,798 & 6,794,447 & 23.35 & 290,983 \\
\hline 2017 & 10,032,142.33 & 1,904,101 & 1,640,775 & 8,391,367 & 23.48 & 357,384 \\
\hline 2018 & 12,074,782.13 & 1,929,550 & 1,662,704 & 10,412,078 & 23.67 & 439,885 \\
\hline 2019 & 9,889,461.69 & 1,266,840 & 1,091,643 & 8,797,819 & 23.82 & 369,346 \\
\hline 2020 & 14,357,054.14 & 1,361,049 & 1,172,824 & 13,184,230 & 23.88 & 552,103 \\
\hline 2021 & 27,280,635.91 & 1,612,286 & 1,389,316 & 25,891,320 & 23.88 & 1,084,226 \\
\hline 2022 & 17,974,264.04 & 370,270 & 319,064 & 17,655,200 & 23.71 & 744,631 \\
\hline & 297,445,404.49 & 102,936,690 & 88,701,146 & 208,744,258 & & 9,868,311 \\
\hline \multicolumn{3}{|r|}{COMPOSITE REMAINING LIFE AND} & ANNUAL ACCRU & RATE, PERCEN & . . 21 & 3.32 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{rrrrrrr}
1945 & \(3,482.82\) & 3,039 & 2,619 & 864 & 5.73 & 151 \\
1946 & \(3,397.05\) & 2,934 & 2,528 & 869 & 6.14 & 142 \\
1947 & \(5,040.07\) & 4,306 & 3,711 & 1,329 & 6.55 & 203 \\
1948 & \(46,225.06\) & 39,075 & 33,671 & 12,554 & 6.96 & 1,804 \\
1949 & \(27,921.26\) & 23,354 & 20,124 & 7,797 & 7.36 & 1,059 \\
1950 & \(35,381.12\) & 29,280 & 25,231 & 10,150 & 7.76 & 1,308 \\
1951 & \(76,453.92\) & 62,607 & 53,949 & 22,505 & 8.15 & 2,761 \\
1952 & \(44,281.31\) & 35,868 & 30,908 & 13,373 & 8.55 & 1,564 \\
1953 & \(66,181.74\) & 53,019 & 45,687 & 20,495 & 8.95 & 2,290 \\
1954 & \(142,746.56\) & 113,118 & 97,474 & 45,273 & 9.34 & 4,847 \\
1955 & \(156,600.03\) & 122,706 & 105,736 & 50,864 & 9.74 & 5,222 \\
1956 & \(198,658.09\) & 153,894 & 132,611 & 66,047 & 10.14 & 6,514 \\
1957 & \(86,381.18\) & 66,168 & 57,017 & 29,364 & 10.53 & 2,789 \\
1958 & \(170,627.27\) & 129,184 & 111,319 & 59,308 & 10.93 & 5,426 \\
1959 & \(199,991.57\) & 149,594 & 128,906 & 71,086 & 11.34 & 6,269 \\
1960 & \(269,835.73\) & 199,438 & 171,857 & 97,979 & 11.74 & 8,346 \\
1961 & \(177,205.87\) & 129,360 & 111,470 & 65,736 & 12.15 & 5,410 \\
1962 & \(158,229.09\) & 114,066 & 98,291 & 59,938 & 12.56 & 4,772 \\
1963 & \(145,466.03\) & 103,540 & 89,221 & 56,245 & 12.97 & 4,337 \\
1964 & \(84,241.21\) & 59,174 & 50,991 & 33,250 & 13.39 & 2,483 \\
1965 & \(103,354.33\) & 71,636 & 61,729 & 41,625 & 13.81 & 3,014 \\
1966 & \(180,708.95\) & 123,565 & 106,477 & 74,232 & 14.23 & 5,217 \\
1967 & \(320,173.73\) & 215,868 & 186,015 & 134,159 & 14.66 & 9,151 \\
1968 & \(477,014.74\) & 317,057 & 273,210 & 203,805 & 15.09 & 13,506 \\
1969 & \(199,682.98\) & 130,770 & 112,685 & 86,998 & 15.53 & 5,602 \\
1970 & \(407,410.43\) & 262,825 & 226,478 & 180,932 & 15.97 & 11,329 \\
1971 & \(222,740.66\) & 141,465 & 121,901 & 100,840 & 16.42 & 6,141 \\
1972 & \(356,492.26\) & 222,847 & 192,029 & 164,463 & 16.87 & 9,749 \\
1973 & \(533,561.08\) & 328,199 & 282,811 & 250,750 & 17.32 & 14,477 \\
1974 & \(761,770.45\) & 460,787 & 397,063 & 364,707 & 17.78 & 20,512 \\
1975 & \(620,684.41\) & 368,960 & 317,935 & 302,749 & 18.25 & 16,589 \\
1976 & \(188,905.48\) & 110,321 & 95,064 & 93,841 & 18.72 & 5,013 \\
1977 & \(348,604.96\) & 199,946 & 172,295 & 176,310 & 19.19 & 9,188 \\
1978 & \(587,635.00\) & 330,774 & 285,030 & 302,605 & 19.67 & 15,384 \\
1979 & \(402,187.41\) & 222,096 & 191,381 & 210,806 & 20.15 & 10,462 \\
1980 & \(534,406.34\) & 289,290 & 249,283 & 285,123 & 20.64 & 13,814 \\
1981 & \(332,162.53\) & 176,119 & 151,763 & 180,400 & 21.14 & 8,534 \\
1982 & \(295,305.04\) & 153,296 & 132,096 & 163,209 & 21.64 & 7,542 \\
1983 & \(360,591.42\) & 242,137 & 208,651 & 151,940 & 19.32 & 7,864 \\
1984 & \(458,570.06\) & 303,665 & 261,670 & 196,900 & 19.64 & 10,025 \\
1985 & \(637,358.89\) & 415,877 & 358,364 & 278,995 & 19.97 & 13,971 \\
1986 & \(640,326.45\) & 411,346 & 354,459 & 285,867 & 20.32 & 14,068 \\
& & & & & &
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.3 LINE TRANSFORMERS - CONVENTIONAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 45-R0.5
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1987 & 879,278.99 & 555,616 & 478,778 & 400,501 & 20.68 & 19,367 \\
\hline 1988 & 486,405.25 & 302,058 & 260,285 & 226,120 & 21.06 & 10,737 \\
\hline 1989 & 687,389.74 & 419,102 & 361,143 & 326,247 & 21.45 & 15,210 \\
\hline 1990 & 925,985.33 & 553,739 & 477,160 & 448,825 & 21.85 & 20,541 \\
\hline 1991 & 900,317.36 & 530,287 & 456,951 & 443,366 & 21.98 & 20,171 \\
\hline 1992 & 411,310.96 & 237,080 & 204,293 & 207,018 & 22.41 & 9,238 \\
\hline 1993 & 1,151.05 & 649 & 559 & 592 & 22.86 & 26 \\
\hline 1994 & 65,325.04 & 36,118 & 31,123 & 34,202 & 23.05 & 1,484 \\
\hline 1995 & 42,789.25 & 23,063 & 19,874 & 22,915 & 23.52 & 974 \\
\hline 1996 & 117,613.84 & 62,030 & 53,452 & 64,162 & 23.75 & 2,702 \\
\hline 1997 & 214,660.91 & 110,035 & 94,818 & 119,843 & 24.25 & 4,942 \\
\hline 1998 & 108,658.54 & 54,308 & 46,798 & 61,861 & 24.52 & 2,523 \\
\hline 1999 & 861,335.26 & 418,953 & 361,014 & 500,321 & 24.81 & 20,166 \\
\hline 2000 & 963,822.64 & 455,406 & 392,426 & 571,397 & 25.12 & 22,747 \\
\hline 2001 & 1,067,880.03 & 489,089 & 421,451 & 646,429 & 25.45 & 25,400 \\
\hline 2002 & 1,530,630.38 & 680,824 & 586,670 & 943,960 & 25.59 & 36,888 \\
\hline 2003 & 1,338,968.68 & 574,418 & 494,979 & 843,990 & 25.95 & 32,524 \\
\hline 2005 & 466,769.97 & 186,241 & 160,485 & 306,285 & 26.36 & 11,619 \\
\hline 2006 & 2,318,687.79 & 887,594 & 764,845 & 1,553,843 & 26.60 & 58,415 \\
\hline 2007 & 2,202,285.73 & 809,120 & 697,223 & 1,505,063 & 26.69 & 56,391 \\
\hline 2008 & 2,668,955.00 & 936,536 & 807,018 & 1,861,937 & 26.82 & 69,423 \\
\hline 2009 & 3,094,524.08 & 1,031,714 & 889,034 & 2,205,490 & 26.99 & 81,715 \\
\hline 2010 & 3,431,603.91 & 1,080,955 & 931,465 & 2,500,139 & 27.18 & 91,985 \\
\hline 2011 & 3,207,667.09 & 955,243 & 823,138 & 2,384,529 & 27.11 & 87,958 \\
\hline 2012 & 3,806,299.93 & 1,058,913 & 912,472 & 2,893,828 & 27.24 & 106,235 \\
\hline 2013 & 4,887,189.27 & 1,267,737 & 1,092,416 & 3,794,773 & 27.13 & 139,874 \\
\hline 2014 & 4,070,415.66 & 972,015 & 837,591 & 3,232,825 & 27.09 & 119,336 \\
\hline 2015 & 3,450,290.14 & 752,853 & 648,738 & 2,801,552 & 26.87 & 104,263 \\
\hline 2016 & 4,232,855.37 & 830,910 & 716,000 & 3,516,855 & 26.61 & 132,163 \\
\hline 2017 & 3,426,684.39 & 591,788 & 509,947 & 2,916,737 & 26.35 & 110,692 \\
\hline 2018 & 4,334,990.95 & 643,746 & 554,720 & 3,780,271 & 25.80 & 146,522 \\
\hline 2019 & 3,733,469.93 & 457,350 & 394,101 & 3,339,369 & 25.07 & 133,202 \\
\hline 2020 & 3,096,187.68 & 291,661 & 251,326 & 2,844,862 & 24.03 & 118,388 \\
\hline 2021 & 6,741,541.22 & 424,717 & 365,981 & 6,375,560 & 22.31 & 285,771 \\
\hline 2022 & 4,473,183.97 & 118,539 & 102,146 & 4,371,038 & 18.37 & 237,944 \\
\hline & 85,315,119.91 & 25,892,977 & 22,312,130 & 63,002,990 & & 2,636,385 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

\section*{ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1927 & 6,295.11 & 5,366 & 4,624 & 1,671 & 4.43 & 377 \\
\hline 1928 & 12,340.69 & 10,465 & 9,018 & 3,323 & 4.56 & 729 \\
\hline 1929 & 40,557.91 & 34,204 & 29,474 & 11,084 & 4.70 & 2,358 \\
\hline 1930 & 12,174.12 & 10,214 & 8,801 & 3,373 & 4.83 & 698 \\
\hline 1931 & 10,761.91 & 8,979 & 7,737 & 3,025 & 4.97 & 609 \\
\hline 1932 & 1,220.07 & 1,012 & 872 & 348 & 5.11 & 68 \\
\hline 1933 & 874.47 & 721 & 621 & 253 & 5.25 & 48 \\
\hline 1935 & 1,778.19 & 1,450 & 1,249 & 529 & 5.53 & 96 \\
\hline 1936 & 4,347.85 & 3,526 & 3,038 & 1,310 & 5.67 & 231 \\
\hline 1937 & 6,964.27 & 5,613 & 4,837 & 2,127 & 5.82 & 365 \\
\hline 1938 & 3,406.73 & 2,729 & 2,352 & 1,055 & 5.97 & 177 \\
\hline 1939 & 2,180.06 & 1,736 & 1,496 & 684 & 6.11 & 112 \\
\hline 1940 & 4,836.36 & 3,827 & 3,298 & 1,538 & 6.26 & 246 \\
\hline 1941 & 15,396.54 & 12,107 & 10,433 & 4,964 & 6.41 & 774 \\
\hline 1942 & 2,883.52 & 2,252 & 1,941 & 943 & 6.57 & 144 \\
\hline 1943 & 998.62 & 775 & 668 & 331 & 6.72 & 49 \\
\hline 1944 & 4,521.86 & 3,486 & 3,004 & 1,518 & 6.87 & 221 \\
\hline 1945 & 123.99 & 95 & 82 & 42 & 7.03 & 6 \\
\hline 1946 & 2,965.88 & 2,255 & 1,943 & 1,023 & 7.19 & 142 \\
\hline 1947 & 4,091.00 & 3,089 & 2,662 & 1,429 & 7.35 & 194 \\
\hline 1948 & 16,910.82 & 12,678 & 10,925 & 5,986 & 7.51 & 797 \\
\hline 1949 & 41,698.45 & 31,024 & 26,734 & 14,964 & 7.68 & 1,948 \\
\hline 1950 & 21,660.32 & 16,000 & 13,787 & 7,873 & 7.84 & 1,004 \\
\hline 1951 & 13,681.30 & 10,028 & 8,641 & 5,040 & 8.01 & 629 \\
\hline 1952 & 48,361.54 & 35,175 & 30,311 & 18,051 & 8.18 & 2,207 \\
\hline 1953 & 43,439.97 & 31,349 & 27,014 & 16,426 & 8.35 & 1,967 \\
\hline 1954 & 35,617.74 & 25,502 & 21,975 & 13,643 & 8.52 & 1,601 \\
\hline 1955 & 55,271.65 & 39,243 & 33,816 & 21,456 & 8.70 & 2,466 \\
\hline 1956 & 65,585.38 & 46,194 & 39,806 & 25,779 & 8.87 & 2,906 \\
\hline 1957 & 53,500.09 & 37,361 & 32,194 & 21,306 & 9.05 & 2,354 \\
\hline 1958 & 54,688.07 & 37,862 & 32,626 & 22,062 & 9.23 & 2,390 \\
\hline 1959 & 39,595.23 & 27,162 & 23,406 & 16,189 & 9.42 & 1,719 \\
\hline 1960 & 221,003.23 & 150,282 & 129,499 & 91,504 & 9.60 & 9,532 \\
\hline 1961 & 47,977.21 & 32,321 & 27,851 & 20,126 & 9.79 & 2,056 \\
\hline 1962 & 27,556.89 & 18,390 & 15,847 & 11,710 & 9.98 & 1,173 \\
\hline 1963 & 77,478.25 & 51,213 & 44,131 & 33,347 & 10.17 & 3,279 \\
\hline 1964 & 43,959.05 & 28,764 & 24,786 & 19,173 & 10.37 & 1,849 \\
\hline 1965 & 35,423.44 & 22,943 & 19,770 & 15,653 & 10.57 & 1,481 \\
\hline 1966 & 73,671.11 & 47,223 & 40,692 & 32,979 & 10.77 & 3,062 \\
\hline 1967 & 252,185.59 & 159,969 & 137,846 & 114,340 & 10.97 & 10,423 \\
\hline 1968 & 195,509.95 & 122,649 & 105,687 & 89,823 & 11.18 & 8,034 \\
\hline 1969 & 65,806.71 & 40,844 & 35,196 & 30,611 & 11.38 & 2,690 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1970 & 44,585.25 & 27,361 & 23,577 & 21,008 & 11.59 & 1,813 \\
\hline 1971 & 135,668.74 & 82,260 & 70,884 & 64,785 & 11.81 & 5,486 \\
\hline 1972 & 246,122.81 & 147,509 & 127,109 & 119,014 & 12.02 & 9,901 \\
\hline 1973 & 72,578.43 & 42,966 & 37,024 & 35,554 & 12.24 & 2,905 \\
\hline 1974 & 137,897.00 & 80,577 & 69,434 & 68,463 & 12.47 & 5,490 \\
\hline 1975 & 224,859.28 & 129,744 & 111,801 & 113,058 & 12.69 & 8,909 \\
\hline 1976 & 44,731.60 & 25,467 & 21,945 & 22,787 & 12.92 & 1,764 \\
\hline 1977 & 26,517.08 & 14,894 & 12,834 & 13,683 & 13.15 & 1,041 \\
\hline 1978 & 25,309.01 & 14,013 & 12,075 & 13,234 & 13.39 & 988 \\
\hline 1979 & 259.70 & 142 & 122 & 138 & 13.63 & 10 \\
\hline 1980 & 44,103.72 & 23,713 & 20,434 & 23,670 & 13.87 & 1,707 \\
\hline 1981 & 392,340.04 & 207,677 & 178,956 & 213,384 & 14.12 & 15,112 \\
\hline 1982 & 899,741.75 & 468,765 & 403,938 & 495,804 & 14.37 & 34,503 \\
\hline 1983 & 310,869.32 & 235,763 & 203,158 & 107,711 & 12.58 & 8,562 \\
\hline 1984 & 41,280.39 & 31,150 & 26,842 & 14,438 & 12.52 & 1,153 \\
\hline 1986 & 325,860.04 & 240,257 & 207,031 & 118,829 & 13.00 & 9,141 \\
\hline 1987 & 605,231.08 & 442,605 & 381,395 & 223,836 & 13.04 & 17,165 \\
\hline 1988 & 367,597.98 & 265,038 & 228,385 & 139,213 & 13.35 & 10,428 \\
\hline 1989 & 316,107.79 & 225,575 & 194,379 & 121,729 & 13.45 & 9,050 \\
\hline 1990 & 212,115.60 & 149,584 & 128,897 & 83,219 & 13.59 & 6,124 \\
\hline 1991 & 355,354.25 & 247,398 & 213,184 & 142,170 & 13.75 & 10,340 \\
\hline 1992 & 3,514.70 & 2,412 & 2,078 & 1,437 & 13.95 & 103 \\
\hline 1993 & 1,676.08 & 1,132 & 975 & 701 & 14.17 & 49 \\
\hline 1994 & 29,314.60 & 19,550 & 16,846 & 12,469 & 14.24 & 876 \\
\hline 1995 & 11,019.95 & 7,242 & 6,240 & 4,780 & 14.34 & 333 \\
\hline 1996 & 14,071.34 & 9,099 & 7,841 & 6,230 & 14.48 & 430 \\
\hline 1997 & 9,972.16 & 6,332 & 5,456 & 4,516 & 14.66 & 308 \\
\hline 1998 & 1,389.25 & 865 & 745 & 644 & 14.87 & 43 \\
\hline 1999 & 95,772.36 & 58,517 & 50,424 & 45,348 & 14.96 & 3,031 \\
\hline 2000 & 327,439.38 & 195,972 & 168,870 & 158,569 & 15.09 & 10,508 \\
\hline 2001 & 1,355,080.67 & 792,451 & 682,860 & 672,221 & 15.26 & 44,051 \\
\hline 2002 & 431,329.70 & 245,815 & 211,820 & 219,510 & 15.47 & 14,189 \\
\hline 2003 & 1,708,064.20 & 949,342 & 818,054 & 890,010 & 15.59 & 57,089 \\
\hline 2004 & 28,669.56 & 15,539 & 13,390 & 15,280 & 15.63 & 978 \\
\hline 2005 & 242,514.61 & 127,757 & 110,089 & 132,426 & 15.72 & 8,424 \\
\hline 2006 & 812,272.32 & 414,096 & 356,829 & 455,443 & 15.86 & 28,716 \\
\hline 2007 & 358,256.80 & 176,585 & 152,164 & 206,093 & 15.95 & 12,921 \\
\hline 2008 & 4,552,508.81 & 2,165,173 & 1,865,743 & 2,686,766 & 15.99 & 168,028 \\
\hline 2009 & 1,599,479.66 & 729,843 & 628,910 & 970,570 & 16.09 & 60,321 \\
\hline 2010 & 893,268.02 & 389,644 & 335,759 & 557,509 & 16.15 & 34,521 \\
\hline 2011 & 3,064,966.09 & 1,272,574 & 1,096,585 & 1,968,381 & 16.20 & 121,505 \\
\hline 2012 & 1,978,558.10 & 776,980 & 669,528 & 1,309,030 & 16.24 & 80,605 \\
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\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 368.5 LINE TRANSFORMERS - NETWORK
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
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SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{lrrrrrrr}
2013 & \(3,073,245.56\) & \(1,135,872\) & 978,788 & \(2,094,458\) & 16.21 & 129,208 \\
2014 & \(4,300,756.88\) & \(1,480,321\) & \(1,275,601\) & \(3,025,156\) & 16.19 & 186,853 \\
2015 & \(2,421,009.08\) & 766,249 & 660,281 & \(1,760,728\) & 16.20 & 108,687 \\
2016 & \(3,100,686.35\) & 890,827 & 767,631 & \(2,333,055\) & 16.12 & 144,730 \\
2017 & \(3,802,272.50\) & 972,621 & 838,113 & \(2,964,160\) & 16.00 & 185,260 \\
2018 & \(5,356,272.03\) & \(1,183,736\) & \(1,020,032\) & \(4,336,240\) & 15.87 & 273,235 \\
2019 & \(3,544,691.93\) & 648,679 & 558,971 & \(2,985,721\) & 15.62 & 191,147 \\
2020 & \(3,012,312.73\) & 423,230 & 364,700 & \(2,647,613\) & 15.29 & 173,160 \\
2021 & \(6,756,541.55\) & 622,953 & 536,802 & \(6,219,740\) & 14.76 & 421,392 \\
2022 & \(4,483,048.05\) & 158,700 & 136,753 & \(4,346,295\) & 13.62 & 319,111 \\
\\
& \(63,868,407.02\) & \(20,880,643\) & \(17,992,972\) & \(45,875,435\) & & \(3,014,615\)
\end{tabular}

DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE

ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 40-R1.5
\begin{tabular}{rrrrrrr}
1961 & \(4,135.94\) & 3,592 & 3,095 & 1,041 & 5.26 & 198 \\
1962 & 212.68 & 183 & 158 & 55 & 5.54 & 10 \\
1964 & 975.17 & 826 & 712 & 263 & 6.10 & 43 \\
1965 & \(6,370.01\) & 5,351 & 4,611 & 1,759 & 6.40 & 275 \\
1966 & \(22,666.87\) & 18,876 & 16,266 & 6,401 & 6.69 & 957 \\
1967 & \(23,251.50\) & 19,182 & 16,529 & 6,722 & 7.00 & 960 \\
1968 & \(14,741.18\) & 12,047 & 10,381 & 4,360 & 7.31 & 596 \\
1969 & \(51,527.38\) & 41,711 & 35,943 & 15,584 & 7.62 & 2,045 \\
1970 & \(60,966.50\) & 48,849 & 42,093 & 18,874 & 7.95 & 2,374 \\
1971 & \(79,697.62\) & 63,200 & 54,460 & 25,238 & 8.28 & 3,048 \\
1972 & \(62,282.62\) & 48,861 & 42,104 & 20,179 & 8.62 & 2,341 \\
1973 & \(204,510.49\) & 158,649 & 136,709 & 67,801 & 8.97 & 7,559 \\
1974 & \(327,175.79\) & 250,862 & 216,169 & 111,007 & 9.33 & 11,898 \\
1975 & \(2,837.35\) & 2,149 & 1,852 & 985 & 9.70 & 102 \\
1976 & \(132,748.47\) & 99,296 & 85,564 & 47,184 & 10.08 & 4,681 \\
1977 & \(130,840.89\) & 96,593 & 83,235 & 47,606 & 10.47 & 4,547 \\
1978 & \(186,175.56\) & 135,536 & 116,792 & 69,384 & 10.88 & 6,377 \\
1979 & \(259,604.99\) & 186,267 & 160,507 & 99,098 & 11.30 & 8,770 \\
1980 & \(244,667.76\) & 172,919 & 149,005 & 95,663 & 11.73 & 8,155 \\
1981 & \(1,935.64\) & 1,347 & 1,161 & 775 & 12.17 & 64 \\
1982 & \(5,211.45\) & 3,566 & 3,073 & 2,138 & 12.63 & 169 \\
1983 & \(264,190.60\) & 203,480 & 175,340 & 88,851 & 11.78 & 7,543 \\
1984 & \(218,272.18\) & 165,538 & 142,645 & 75,627 & 12.26 & 6,169 \\
1985 & \(385,653.14\) & 289,240 & 249,240 & 136,413 & 12.50 & 10,913 \\
1986 & \(342,450.29\) & 252,489 & 217,571 & 124,879 & 13.00 & 9,606 \\
1987 & \(354,966.21\) & 258,344 & 222,617 & 132,349 & 13.28 & 9,966 \\
1988 & \(366,462.63\) & 261,728 & 225,533 & 140,930 & 13.81 & 10,205 \\
1989 & \(973,730.64\) & 681,806 & 587,516 & 386,215 & 14.34 & 26,933 \\
1990 & \(422,633.17\) & 291,194 & 250,924 & 171,709 & 14.67 & 11,705 \\
1991 & \(589,646.64\) & 397,481 & 342,512 & 247,135 & 15.23 & 16,227 \\
1992 & \(202,636.97\) & 134,105 & 115,559 & 87,078 & 15.59 & 5,586 \\
1993 & \(331,126.05\) & 214,901 & 185,181 & 145,945 & 15.95 & 9,150 \\
1994 & \(270,918.51\) & 171,410 & 147,705 & 123,214 & 16.55 & 7,445 \\
1995 & \(304,159.92\) & 188,214 & 162,185 & 141,975 & 16.94 & 8,381 \\
1996 & \(218,585.28\) & 131,501 & 113,315 & 105,270 & 17.55 & 5,998 \\
1997 & \(159,780.40\) & 93,711 & 80,751 & 79,029 & 17.98 & 4,395 \\
1998 & 393.76 & 39 & 194 & 167 & 173 & 18.42
\end{tabular}
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                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
    ACCOUNT 368.7 LINE TRANSFORMERS - UNDERGROUND RESIDENTIAL DISTRIBUTION
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

|  | ORIGINAL | CALCULATED | ALLOC. BOOK | FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | COST | ACCRUED | RESERVE | ACCRUALS | LIFE | ACCRUAL |
| $(1)$ | $(2)$ | $(3)$ | $(4)$ | $(5)$ | $(6)$ | $(7)$ |

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SURVIVOR CURVE.. IOWA 40-R1.5
\begin{tabular}{lrrrrrr}
2004 & \(4,598.70\) & 2,136 & 1,841 & 2,758 & 21.34 & 129 \\
2006 & \(1,363,740.92\) & 580,545 & 500,259 & 863,482 & 22.26 & 38,791 \\
2007 & \(1,355,587.65\) & 548,471 & 472,621 & 882,967 & 22.81 & 38,710 \\
2008 & \(1,381,326.12\) & 530,705 & 457,311 & 924,015 & 23.24 & 39,760 \\
2009 & \(1,134,174.01\) & 411,932 & 354,964 & 779,210 & 23.67 & 32,920 \\
2010 & \(2,141,640.29\) & 730,728 & 629,672 & \(1,511,968\) & 24.13 & 62,659 \\
2011 & \(1,543,195.24\) & 493,360 & 425,131 & \(1,118,064\) & 24.47 & 45,691 \\
2012 & \(2,238,306.89\) & 665,225 & 573,228 & \(1,665,079\) & 24.83 & 67,059 \\
2013 & \(3,147,687.57\) & 861,207 & 742,107 & \(2,405,581\) & 25.22 & 95,384 \\
2014 & \(2,630,374.67\) & 654,963 & 564,385 & \(2,065,990\) & 25.63 & 80,608 \\
2015 & \(1,156,269.68\) & 260,161 & 224,182 & 932,088 & 25.83 & 36,085 \\
2016 & \(2,751,536.85\) & 549,207 & 473,255 & \(2,278,282\) & 26.07 & 87,391 \\
2017 & \(1,383,569.72\) & 239,634 & 206,494 & \(1,177,076\) & 26.25 & 44,841 \\
2018 & \(1,628,535.01\) & 238,092 & 205,165 & \(1,423,370\) & 26.27 & 54,182 \\
2019 & \(1,689,464.60\) & 198,681 & 171,205 & \(1,518,260\) & 26.26 & 57,816 \\
2020 & \(1,670,876.21\) & 147,037 & 126,703 & \(1,544,173\) & 25.91 & 59,598 \\
2021 & \(4,521,659.77\) & 255,022 & 219,754 & \(4,301,906\) & 25.10 & 171,391 \\
2022 & \(2,988,911.85\) & 65,158 & 56,147 & \(2,932,765\) & 22.49 & 130,403 \\
& & & & & &
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.83 .22

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 369.2 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{rrrrrrr}
1931 & \(4,358.98\) & 3,623 & 2,731 & 1,628 & 10.97 & 148 \\
1932 & \(5,261.71\) & 4,349 & 3,279 & 1,983 & 11.28 & 176 \\
1933 & \(5,993.46\) & 4,926 & 3,714 & 2,279 & 11.58 & 197 \\
1934 & \(17,965.36\) & 14,679 & 11,066 & 6,899 & 11.89 & 580 \\
1935 & \(7,862.20\) & 6,385 & 4,814 & 3,048 & 12.21 & 250 \\
1936 & \(4,302.28\) & 3,473 & 2,618 & 1,684 & 12.53 & 134 \\
1937 & \(8,981.99\) & 7,206 & 5,433 & 3,549 & 12.85 & 276 \\
1938 & 383.12 & 305 & 230 & 153 & 13.18 & 12 \\
1939 & \(10,091.54\) & 7,994 & 6,027 & 4,065 & 13.51 & 301 \\
1940 & \(3,081.75\) & 2,425 & 1,828 & 1,254 & 13.85 & 91 \\
1941 & \(14,959.51\) & 11,691 & 8,814 & 6,146 & 14.20 & 433 \\
1942 & \(2,957.09\) & 2,295 & 1,730 & 1,227 & 14.55 & 84 \\
1943 & \(1,161.61\) & \(2,081.28\) & 1,595 & 675 & 487 & 14.91
\end{tabular}

\title{
DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
}

\section*{ACCOUNT 369.2 SERVICES}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{rrrrrrr}
1973 & \(1,142,787.65\) & 630,647 & 475,437 & 667,351 & 29.13 & 22,909 \\
1974 & \(974,262.03\) & 528,800 & 398,656 & 575,606 & 29.72 & 19,368 \\
1975 & \(1,179,227.99\) & 629,165 & 474,320 & 704,908 & 30.32 & 23,249 \\
1976 & \(1,059,841.45\) & 555,516 & 418,797 & 641,044 & 30.93 & 20,726 \\
1977 & \(988,578.53\) & 508,742 & 383,535 & 605,044 & 31.55 & 19,177 \\
1978 & \(1,048,461.38\) & 529,557 & 399,227 & 649,234 & 32.17 & 20,181 \\
1979 & \(1,217,927.61\) & 603,337 & 454,849 & 763,079 & 32.80 & 23,265 \\
1980 & \(1,543,711.03\) & 749,765 & 565,239 & 978,472 & 33.43 & 29,269 \\
1981 & \(1,290,206.70\) & 613,738 & 462,690 & 827,517 & 34.08 & 24,282 \\
1982 & \(1,303,989.22\) & 607,463 & 457,959 & 846,030 & 34.72 & 24,367 \\
1983 & \(1,549,830.44\) & 881,544 & 664,586 & 885,244 & 29.94 & 29,567 \\
1984 & \(1,452,185.70\) & 810,610 & 611,109 & 841,077 & 30.47 & 27,603 \\
1985 & \(1,461,531.35\) & 800,188 & 603,252 & 858,279 & 30.99 & 27,695 \\
1986 & \(1,192,772.72\) & 640,042 & 482,520 & 710,253 & 31.52 & 22,533 \\
1987 & \(1,443,686.89\) & 758,513 & 571,834 & 871,853 & 32.07 & 27,186 \\
1988 & \(1,715,220.52\) & 881,623 & 664,645 & \(1,050,576\) & 32.62 & 32,206 \\
1989 & \(1,760,236.67\) & 884,519 & 666,829 & \(1,093,408\) & 33.17 & 32,964 \\
1990 & \(1,621,413.68\) & 795,790 & 599,937 & \(1,021,477\) & 33.72 & 30,293 \\
1991 & \(2,326,338.67\) & \(1,121,295\) & 845,331 & \(1,481,008\) & 33.86 & 43,739 \\
1992 & \(1,886,566.02\) & 886,120 & 668,036 & \(1,218,530\) & 34.44 & 35,381 \\
1993 & \(1,905,374.05\) & 871,137 & 656,740 & \(1,248,634\) & 35.02 & 35,655 \\
1994 & \(2,151,632.74\) & 956,616 & 721,182 & \(1,430,451\) & 35.60 & 40,181 \\
1995 & \(1,212,719.58\) & 526,927 & 397,244 & 815,476 & 35.79 & 22,785 \\
1996 & \(1,361,761.80\) & 573,846 & 432,616 & 929,146 & 36.39 & 25,533 \\
1997 & \(2,698,671.16\) & \(1,101,058\) & 830,075 & \(1,868,596\) & 37.00 & 50,503 \\
1998 & \(176,699.84\) & 70,132 & 52,872 & 123,828 & 37.23 & 3,326 \\
1999 & \(932,013.59\) & 356,961 & 269,109 & 662,905 & 37.85 & 17,514 \\
2000 & \(1,542,956.75\) & 572,746 & 431,787 & \(1,111,170\) & 38.11 & 29,157 \\
2001 & \(594,529.85\) & 212,188 & 159,966 & 434,564 & 38.74 & 11,217 \\
2002 & \(1,145,062.57\) & 394,360 & 297,303 & 847,760 & 39.02 & 21,726 \\
2003 & \(1,307,027.70\) & 430,796 & 324,772 & 982,256 & 39.67 & 24,761 \\
2004 & \(1,546,965.69\) & 489,460 & 368,998 & \(1,177,968\) & 39.98 & 29,464 \\
2005 & \(1,909,977.45\) & 578,341 & 436,005 & \(1,473,972\) & 40.30 & 36,575 \\
2006 & \(2,581,088.18\) & 745,418 & 561,962 & \(2,019,126\) & 40.64 & 49,683 \\
2007 & \(2,282,452.32\) & 626,305 & 472,164 & \(1,810,288\) & 40.99 & 44,164 \\
2008 & \(3,251,269.28\) & 844,030 & 636,305 & \(2,614,964\) & 41.36 & 63,224 \\
2009 & \(2,755,881.62\) & 673,537 & 507,772 & \(2,248,110\) & 41.75 & 53,847 \\
2010 & \(3,924,218.99\) & 902,570 & 680,437 & \(3,243,782\) & 41.85 & 77,510 \\
2011 & \(2,390,116.89\) & 511,246 & 385,422 & \(2,004,695\) & 42.26 & 47,437 \\
2012 & \(3,922,377.18\) & 778,200 & 586,676 & \(3,335,701\) & 42.41 & 78,654 \\
2013 & \(1,428,714.48\) & 260,598 & 196,462 & \(1,232,252\) & 42.58 & 28,940 \\
2014 & \(2,117,518.08\) & 351,084 & 264,678 & \(1,852,840\) & 42.78 & 43,311 \\
& & & & & &
\end{tabular}

\footnotetext{
Gannett Fleming
}
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                                    DUQUESNE LIGHT COMPANY
                                ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 369.2 SERVICES
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
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\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 65-R1.5
\begin{tabular}{rrrrrrrr}
2015 & \(1,696,309.04\) & 253,089 & 190,801 & \(1,505,508\) & 42.75 & 35,217 \\
2016 & \(1,351,610.89\) & 178,413 & 134,503 & \(1,217,108\) & 42.76 & 28,464 \\
2017 & \(1,073,781.13\) & 122,841 & 92,608 & 981,173 & 42.58 & 23,043 \\
2018 & \(2,500,953.72\) & 240,842 & 181,568 & \(2,319,386\) & 42.23 & 54,923 \\
2019 & \(2,305,265.84\) & 178,428 & 134,515 & \(2,170,751\) & 41.75 & 51,994 \\
2020 & \(2,985,742.55\) & 171,680 & 129,428 & \(2,856,315\) & 40.98 & 69,700 \\
2021 & \(11,279,448.67\) & 415,084 & 312,927 & \(10,966,522\) & 39.31 & 278,975 \\
2022 & \(5,989,263.99\) & 83,850 & 63,214 & \(5,926,050\) & 35.09 & 168,881 \\
& & & & & & & \\
\\
& \\
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT
\end{tabular}

\section*{ACCOUNT 370 METERS AND SMART METERS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 18-S0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2004 & 13,981.76 & 10,475 & 8,832 & 5,150 & 6.19 & 832 \\
\hline 2005 & 26,995.28 & 19,701 & 16,611 & 10,384 & 6.48 & 1,602 \\
\hline 2006 & 29,459.36 & 20,804 & 17,541 & 11,918 & 6.86 & 1,737 \\
\hline 2007 & 23,425.29 & 16,014 & 13,502 & 9,923 & 7.17 & 1,384 \\
\hline 2008 & 177,345.48 & 117,013 & 98,661 & 78,684 & 7.48 & 10,519 \\
\hline 2009 & 38,841.00 & 24,594 & 20,737 & 18,104 & 7.82 & 2,315 \\
\hline 2010 & 14,021.40 & 8,483 & 7,153 & 6,868 & 8.16 & 842 \\
\hline 2011 & 14,434.18 & 8,317 & 7,013 & 7,421 & 8.46 & 877 \\
\hline 2012 & 1,085,942.90 & 591,839 & 499,019 & 586,924 & 8.77 & 66,924 \\
\hline 2013 & 2,385,698.27 & 1,221,478 & 1,029,909 & 1,355,789 & 9.05 & 149,811 \\
\hline 2014 & 1,856,812.66 & 883,843 & 745,227 & 1,111,586 & 9.36 & 118,759 \\
\hline 2015 & 19,510,699.58 & 8,530,078 & 7,192,277 & 12,318,423 & 9.65 & 1,276,521 \\
\hline 2016 & 32,068,106.76 & 12,692,557 & 10,701,940 & 21,366,167 & 9.92 & 2,153,847 \\
\hline 2017 & 36,948,061.69 & 12,946,601 & 10,916,142 & 26,031,920 & 10.20 & 2,552,149 \\
\hline 2018 & 31,941,754.65 & 9,630,439 & 8,120,065 & 23,821,690 & 10.43 & 2,283,959 \\
\hline 2019 & 8,624,724.18 & 2,131,169 & 1,796,931 & 6,827,793 & 10.66 & 640,506 \\
\hline 2020 & 7,189,403.34 & 1,345,856 & 1,134,781 & 6,054,622 & 10.85 & 558,030 \\
\hline 2021 & 3,754,274.28 & 451,264 & 380,490 & 3,373,784 & 10.98 & 307,266 \\
\hline 2022 & 5,465,114.69 & 238,279 & 200,909 & 5,264,205 & 10.98 & 479,436 \\
\hline & 151,169,096.75 & 50,888,804 & 42,907,740 & 108,261,356 & & 10,607,316 \\
\hline
\end{tabular}

ACCOUNT 373 STREET LIGHTING EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1899 & 2,153.22 & 2,153 & 2,153 & & & \\
\hline 1900 & 172.92 & 173 & 173 & & & \\
\hline 1901 & 5,508.24 & 5,371 & 5,508 & & & \\
\hline 1902 & 8,149.65 & 7,878 & 8,150 & & & \\
\hline 1903 & 4,328.34 & 4,119 & 4,328 & & & \\
\hline 1904 & 3,337.60 & 3,176 & 3,338 & & & \\
\hline 1905 & 1,039.03 & 981 & 1,039 & & & \\
\hline 1906 & 43.90 & 41 & 44 & & & \\
\hline 1907 & 2,514.17 & 2,350 & 2,514 & & & \\
\hline 1908 & 23.62 & 22 & 24 & & & \\
\hline 1910 & 3,623.66 & 3,343 & 3,624 & & & \\
\hline 1911 & 1,663.11 & 1,529 & 1,663 & & & \\
\hline 1913 & 8,771.90 & 7,994 & 8,772 & & & \\
\hline 1914 & 703.52 & 638 & 704 & & & \\
\hline 1915 & 465.14 & 420 & 465 & & & \\
\hline 1916 & 127.20 & 114 & 127 & & & \\
\hline 1917 & 1,406.09 & 1,258 & 1,406 & & & \\
\hline 1918 & 338.91 & 302 & 339 & & & \\
\hline 1919 & 176.90 & 157 & 177 & & & \\
\hline 1920 & 5,766.95 & 5,090 & 5,767 & & & \\
\hline 1921 & 6,261.76 & 5,500 & 6,262 & & & \\
\hline 1922 & 6,610.05 & 5,777 & 6,610 & & & \\
\hline 1923 & 9,005.22 & 7,835 & 9,005 & & & \\
\hline 1924 & 21,460.36 & 18,578 & 21,460 & & & \\
\hline 1925 & 13,683.84 & 11,786 & 13,659 & 25 & 4.16 & 6 \\
\hline 1926 & 39,405.05 & 33,770 & 39,137 & 268 & 4.29 & 62 \\
\hline 1927 & 42,040.16 & 35,832 & 41,527 & 513 & 4.43 & 116 \\
\hline 1928 & 78,796.69 & 66,820 & 77,440 & 1,357 & 4.56 & 298 \\
\hline 1929 & 14,301.54 & 12,061 & 13,978 & 324 & 4.70 & 69 \\
\hline 1930 & 16,358.50 & 13,725 & 15,906 & 452 & 4.83 & 94 \\
\hline 1931 & 50,638.31 & 42,249 & 48,964 & 1,674 & 4.97 & 337 \\
\hline 1932 & 10,591.90 & 8,788 & 10,185 & 407 & 5.11 & 80 \\
\hline 1933 & 27,204.39 & 22,444 & 26,011 & 1,193 & 5.25 & 227 \\
\hline 1934 & 39,136.75 & 32,105 & 37,208 & 1,929 & 5.39 & 358 \\
\hline 1935 & 25,378.82 & 20,701 & 23,991 & 1,388 & 5.53 & 251 \\
\hline 1936 & 4,176.95 & 3,388 & 3,926 & 251 & 5.67 & 44 \\
\hline 1937 & 31,772.22 & 25,608 & 29,678 & 2,094 & 5.82 & 360 \\
\hline 1938 & 399.93 & 320 & 371 & 29 & 5.97 & 5 \\
\hline 1939 & 21,223.61 & 16,901 & 19,587 & 1,637 & 6.11 & 268 \\
\hline 1940 & 10,441.30 & 8,263 & 9,576 & 865 & 6.26 & 138 \\
\hline 1941 & 35,270.14 & 27,734 & 32,142 & 3,128 & 6.41 & 488 \\
\hline 1942 & 9,244.81 & 7,220 & 8,367 & 878 & 6.57 & 134 \\
\hline
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 373 STREET LIGHTING EQUIPMENT
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{rrrrrrr}
1943 & \(9,452.44\) & 7,335 & 8,501 & 951 & 6.72 & 142 \\
1944 & \(1,673.83\) & 1,291 & 1,496 & 178 & 6.87 & 26 \\
1945 & \(3,247.76\) & 2,487 & 2,882 & 366 & 7.03 & 52 \\
1946 & \(3,929.18\) & 2,987 & 3,462 & 467 & 7.19 & 65 \\
1947 & \(2,842.70\) & 2,146 & 2,487 & 356 & 7.35 & 48 \\
1948 & \(8,283.35\) & 6,210 & 7,197 & 1,086 & 7.51 & 145 \\
1949 & \(4,481.18\) & 3,334 & 3,864 & 617 & 7.68 & 80 \\
1950 & \(17,661.08\) & 13,046 & 15,119 & 2,542 & 7.84 & 324 \\
1951 & \(26,238.87\) & 19,233 & 22,290 & 3,949 & 8.01 & 493 \\
1952 & \(24,404.43\) & 17,750 & 20,571 & 3,833 & 8.18 & 469 \\
1953 & \(27,807.99\) & 20,068 & 23,257 & 4,551 & 8.35 & 545 \\
1954 & \(29,068.46\) & 20,813 & 24,121 & 4,947 & 8.52 & 581 \\
1955 & \(68,143.17\) & 48,382 & 56,071 & 12,072 & 8.70 & 1,388 \\
1956 & \(50,864.16\) & 35,825 & 41,519 & 9,345 & 8.87 & 1,054 \\
1957 & \(38,298.61\) & 26,745 & 30,996 & 7,303 & 9.05 & 807 \\
1958 & \(65,533.42\) & 45,371 & 52,582 & 12,951 & 9.23 & 1,403 \\
1959 & \(113,439.16\) & 77,819 & 90,187 & 23,252 & 9.42 & 2,468 \\
1960 & \(109,273.27\) & 74,306 & 86,116 & 23,157 & 9.60 & 2,412 \\
1961 & \(79,838.81\) & 53,785 & 62,333 & 17,506 & 9.79 & 1,788 \\
1962 & \(137,782.30\) & 91,946 & 106,559 & 31,223 & 9.98 & 3,129 \\
1963 & \(74,703.76\) & 49,379 & 57,227 & 17,477 & 10.17 & 1,718 \\
1964 & \(67,865.16\) & 44,406 & 51,464 & 16,401 & 10.37 & 1,582 \\
1965 & \(167,486.05\) & 108,476 & 125,716 & 41,770 & 10.57 & 3,952 \\
1966 & \(165,350.62\) & 105,990 & 122,835 & 42,516 & 10.77 & 3,948 \\
1967 & \(177,354.84\) & 112,501 & 130,381 & 46,974 & 10.97 & 4,282 \\
1968 & \(97,996.95\) & 61,476 & 71,246 & 26,751 & 11.18 & 2,393 \\
1969 & \(185,709.69\) & 115,264 & 133,583 & 52,127 & 11.38 & 4,581 \\
1970 & \(390,878.51\) & 239,870 & 277,993 & 112,886 & 11.59 & 9,740 \\
1971 & \(174,055.49\) & 105,535 & 122,308 & 51,747 & 11.81 & 4,382 \\
1972 & \(194,344.14\) & 116,476 & 134,988 & 59,356 & 12.02 & 4,938 \\
1973 & \(345,164.06\) & 204,337 & 236,813 & 108,351 & 12.24 & 8,852 \\
1974 & \(201,380.34\) & 117,673 & 136,375 & 65,005 & 12.47 & 5,213 \\
1975 & \(199,158.21\) & 114,914 & 133,177 & 65,981 & 12.69 & 5,199 \\
1976 & \(265,854.37\) & 151,359 & 175,415 & 90,439 & 12.92 & 7,000 \\
1977 & \(169,555.60\) & 95,234 & 110,370 & 59,186 & 13.15 & 4,501 \\
1978 & \(265,730.87\) & 147,127 & 170,510 & 95,221 & 13.39 & 7,111 \\
1979 & \(704,597.93\) & 384,478 & 445,584 & 259,014 & 13.63 & 19,003 \\
1980 & \(792,779.15\) & 426,254 & 493,999 & 298,780 & 13.87 & 21,541 \\
1981 & \(833,439.74\) & 441,165 & 511,280 & 322,160 & 14.12 & 22,816 \\
1982 & \(1,632,735.00\) & 850,655 & 985,851 & 646,884 & 14.37 & 45,016 \\
1983 & \(1,945,445.01\) & \(1,475,425\) & \(1,709,917\) & 235,528 & 12.58 & 18,722 \\
1984 & \(2,000,154.27\) & \(1,509,316\) & \(1,749,194\) & 250,960 & 12.52 & 20,045
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 373 STREET LIGHTING EQUIPMENT
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. IOWA 30-L0
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1985 & 1,263,333.87 & 942,700 & 1,092,525 & 170,809 & 12.75 & 13,397 \\
\hline 1986 & 850,369.67 & 626,978 & 726,625 & 123,745 & 13.00 & 9,519 \\
\hline 1987 & 561,046.54 & 410,293 & 475,502 & 85,545 & 13.04 & 6,560 \\
\hline 1988 & 496,357.09 & 357,873 & 414,750 & 81,607 & 13.35 & 6,113 \\
\hline 1989 & 332,002.52 & 236,917 & 274,571 & 57,432 & 13.45 & 4,270 \\
\hline 1990 & 511,703.94 & 360,854 & 418,205 & 93,499 & 13.59 & 6,880 \\
\hline 1991 & 557,998.60 & 388,479 & 450,221 & 107,778 & 13.75 & 7,838 \\
\hline 1992 & 464,067.25 & 318,443 & 369,054 & 95,013 & 13.95 & 6,811 \\
\hline 1993 & 821,212.31 & 554,811 & 642,988 & 178,224 & 14.17 & 12,578 \\
\hline 1994 & 1,074,516.04 & 716,595 & 830,485 & 244,031 & 14.24 & 17,137 \\
\hline 1995 & 877,652.26 & 576,793 & 668,464 & 209,188 & 14.34 & 14,588 \\
\hline 1996 & 1,012,661.93 & 654,787 & 758,853 & 253,809 & 14.48 & 17,528 \\
\hline 1997 & 576.34 & 366 & 424 & 152 & 14.66 & 10 \\
\hline 1998 & 3,216.86 & 2,002 & 2,320 & 897 & 14.87 & 60 \\
\hline 1999 & 2,342,172.20 & 1,431,067 & 1,658,509 & 683,663 & 14.96 & 45,699 \\
\hline 2000 & 619,091.26 & 370,526 & 429,414 & 189,677 & 15.09 & 12,570 \\
\hline 2002 & 304,652.62 & 173,622 & 201,216 & 103,437 & 15.47 & 6,686 \\
\hline 2003 & 548.34 & 305 & 353 & 195 & 15.59 & 13 \\
\hline 2004 & 277,171.37 & 150,227 & 174,103 & 103,068 & 15.63 & 6,594 \\
\hline 2005 & 1,789,018.04 & 942,455 & 1,092,241 & 696,777 & 15.72 & 44,324 \\
\hline 2006 & 238,643.16 & 121,660 & 140,996 & 97,647 & 15.86 & 6,157 \\
\hline 2007 & 1,741,586.11 & 858,428 & 994,859 & 746,727 & 15.95 & 46,817 \\
\hline 2008 & 4,085.60 & 1,943 & 2,252 & 1,834 & 15.99 & 115 \\
\hline 2009 & 433,212.62 & 197,675 & 229,092 & 204,121 & 16.09 & 12,686 \\
\hline 2010 & 1,549,607.32 & 675,939 & 783,367 & 766,240 & 16.15 & 47,445 \\
\hline 2011 & 2,203,276.69 & 914,800 & 1,060,190 & 1,143,087 & 16.20 & 70,561 \\
\hline 2012 & 22,276.77 & 8,748 & 10,138 & 12,139 & 16.24 & 747 \\
\hline 2013 & 346,305.79 & 127,995 & 148,337 & 197,969 & 16.21 & 12,213 \\
\hline 2014 & 633,910.26 & 218,192 & 252,870 & 381,040 & 16.19 & 23,536 \\
\hline 2015 & 766,754.50 & 242,678 & 281,247 & 485,508 & 16.20 & 29,970 \\
\hline 2016 & 1,237,574.14 & 355,555 & 412,064 & 825,510 & 16.12 & 51,210 \\
\hline 2017 & 1,368,974.23 & 350,184 & 405,839 & 963,135 & 16.00 & 60,196 \\
\hline 2018 & 1,236,248.40 & 273,211 & 316,633 & 919,615 & 15.87 & 57,947 \\
\hline 2019 & 1,688,348.08 & 308,968 & 358,073 & 1,330,275 & 15.62 & 85,165 \\
\hline 2020 & 1,640,695.87 & 230,518 & 267,155 & 1,373,541 & 15.29 & 89,833 \\
\hline 2021 & 1,401,271.54 & 129,197 & 149,730 & 1,251,542 & 14.76 & 84,793 \\
\hline 2022 & 1,619,669.34 & 57,336 & 66,449 & 1,553,220 & 13.62 & 114,040 \\
\hline & 44,729,529.77 & 22,311,823 & 25,853,255 & 18,876,275 & & 1,279,895 \\
\hline
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 14.7 2.86

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

MANCHESTER FACILITY
FULLY ACCRUED
\begin{tabular}{rrrr}
1986 & \(72,753.01\) & 72,753 & 72,753 \\
1989 & \(42,805.51\) & 42,806 & 42,806 \\
1990 & \(56,762.89\) & 56,763 & 56,763 \\
1991 & \(6,822.59\) & 6,823 & 6,823 \\
1993 & \(14,855.36\) & 14,855 & 14,855 \\
1994 & \(38,204.69\) & 38,205 & 38,205 \\
1995 & \(34,201.35\) & 34,201 & 34,201 \\
1996 & \(15,914.81\) & 15,915 & 15,915 \\
1997 & \(7,985.20\) & 7,985 & 7,985 \\
1998 & \(44,526.07\) & 44,526 & 44,526 \\
1999 & \(18,639.11\) & 18,639 & 18,639 \\
2002 & \(2,790.44\) & 2,790 & 2,790 \\
2003 & \(15,761.05\) & 15,761 & 15,761 \\
2004 & \(97,964.29\) & 97,964 & 97,964 \\
2005 & \(41,986.42\) & 41,986 & 41,986 \\
2006 & \(38,137.34\) & 38,137 & 38,137 \\
2009 & \(29,612.90\) & 29,613 & 29,613 \\
& & & \\
& \(579,723.03\) & 579,722 & 579,723
\end{tabular}

MANCHESTER FACILITY - SEYMORE BUILDING INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2059
\begin{tabular}{rrrrrrr}
2009 & \(717,757.40\) & 225,806 & 229,733 & 488,024 & 29.42 & 16,588 \\
2010 & 197.41 & 59 & 60 & 137 & 29.52 & 5 \\
2011 & \(217,902.26\) & 60,882 & 61,941 & 155,961 & 29.65 & 5,260 \\
2012 & \(317,861.63\) & 82,771 & 84,211 & 233,651 & 29.82 & 7,835 \\
2013 & \(541,535.83\) & 130,185 & 132,449 & 409,087 & 30.02 & 13,627 \\
2014 & \(75,910.78\) & 16,716 & 17,007 & 58,904 & 30.11 & 1,956 \\
2015 & \(567,409.68\) & 113,198 & 115,167 & 452,243 & 30.09 & 15,030 \\
2016 & \(1,067,874.35\) & 189,441 & 192,736 & 875,139 & 30.13 & 29,045 \\
2017 & \(292,389.80\) & 45,028 & 45,811 & 246,579 & 30.21 & 8,162 \\
2018 & \(69,065.79\) & 8,951 & 9,107 & 59,959 & 30.22 & 1,984 \\
2019 & \(24,306.24\) & 2,535 & 2,579 & 21,727 & 30.06 & 723 \\
2020 & \(1,161,060.19\) & 89,634 & 91,193 & \(1,069,867\) & 29.86 & 35,829 \\
2021 & \(2,083,656.62\) & 100,849 & 102,603 & \(1,981,054\) & 29.46 & 67,246 \\
2022 & \(1,139,614.58\) & 20,057 & 20,406 & \(1,119,209\) & 27.99 & 39,986 \\
& & & & & & \\
& \(8,276,542.56\) & \(1,086,112\) & \(1,105,001\) & \(7,171,542\) & & 243,276
\end{tabular}

\section*{ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)
ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

ALLOC. BOOK
RESERVE
(4)
\begin{tabular}{cl} 
FUTURE BOOK & REM. \\
ACCRUALS & LIFE
\end{tabular}
(5)

LIFE ACCRUAL
(6)

ANNUAL
(7)

KIRKWOOD STREET HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2021
\begin{tabular}{rrrr}
1970 & \(125,095.85\) & 125,096 & 125,096 \\
1971 & \(2,145.58\) & 2,146 & 2,145 \\
& \(127,241.43\) & 127,242 & 127,241
\end{tabular}

MCKEESPORT HEADQUARTERS AND SERVICE CENTER INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2069
\begin{tabular}{rrrrrrr}
2005 & 789.49 & 278 & 283 & 507 & 32.25 & 16 \\
2011 & 345.06 & 87 & 89 & 257 & 34.16 & 8 \\
2012 & \(56,658.10\) & \(28,659.46\) & 13,269 & 6,179 & 13,500 & 4,287 \\
2013 & \(8,745,657.64\) & \(1,724,644\) & \(1,754,709\) & \(6,990,949\) & 34.60 & 202,051 \\
2014 & \(76,466.78\) & 10,384 & 10,565 & 65,902 & 34.99 & 1,883 \\
2017 & \(310,349.16\) & 35,318 & 35,934 & 274,415 & 35.03 & 7,834 \\
2018 & \(2,021.52\) & 136 & 138 & 1,883 & 34.68 & 54 \\
2020 & \(2,083,656.62\) & 87,930 & 89,463 & \(1,994,194\) & 34.09 & 58,498 \\
2021 & 17,436 & 17,740 & \(1,121,875\) & 32.18 & 34,862 \\
2022 & \(1,139,614.58\) & & & & 34 & \\
& \(12,444,218.41\) & \(1,895,661\) & \(1,928,707\) & \(10,515,511\) & & 307,110
\end{tabular}

EASTERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2043
\begin{tabular}{rrrrrrr}
1963 & \(763,741.19\) & 588,699 & 598,961 & 164,780 & 13.02 & 12,656 \\
1966 & \(35,005.31\) & 26,459 & 26,920 & 8,085 & 13.74 & 588 \\
1967 & \(6,712.00\) & 5,040 & 5,128 & 1,584 & 13.97 & 113 \\
1968 & \(2,398.79\) & 398.78 & 1,789 & 1,820 & 579 & 14.20 \\
1969 & \(14,532.88\) & 10,690 & 10,876 & 99 & 14.42 & 41 \\
1970 & \(1,712.80\) & 309.59 & 1,251 & 1,273 & 3,657 & 14.64 \\
1971 & 203 & 227 & 440 & 14.86 & 7 \\
1973 & \(6,554.49\) & 36,034 & 36,662 & 83 & 15.28 & 30 \\
1974 & \(4,975.42\) & 4,621 & 3,413 & 4,702 & 13,792 & 15.48 \\
1975 & \(3,063.80\) & 2,083 & 1,472 & 1,519 & 15.68 & 5 \\
1979 & \(13,876.60\) & 9,353 & 9,519 & 16.41 & 891 \\
1980 & \(1,203.92\) & 804 & 818 & 944 & 16.58 & 92 \\
1981 & & & & 4,361 & 16.74 & 57 \\
1982 & & & 386 & 16.90 & 261 \\
& & & & & 23
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

EASTERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2043
\begin{tabular}{rrrrrrr}
1983 & \(45,119.79\) & 31,900 & 32,456 & 12,664 & 16.37 & 774 \\
1984 & \(187,708.72\) & 131,528 & 133,821 & 53,888 & 16.45 & 3,276 \\
1986 & \(528,650.17\) & 362,760 & 369,084 & 159,566 & 16.69 & 9,561 \\
1987 & \(7,969.56\) & 5,403 & 5,497 & 2,472 & 16.86 & 147 \\
1988 & \(159,195.66\) & 106,550 & 108,407 & 50,788 & 17.05 & 2,979 \\
1989 & \(42,559.22\) & 28,089 & 28,579 & 13,981 & 17.26 & 810 \\
1990 & \(231,419.07\) & 151,163 & 153,798 & 77,621 & 17.25 & 4,500 \\
1991 & \(459,655.52\) & 295,375 & 300,524 & 159,131 & 17.52 & 9,083 \\
1992 & \(109,592.22\) & 69,525 & 70,737 & 38,855 & 17.58 & 2,210 \\
1994 & \(47,651.72\) & 29,334 & 29,845 & 17,806 & 17.80 & 1,000 \\
1995 & \(172,803.05\) & 104,546 & 106,368 & 66,435 & 17.95 & 3,701 \\
1996 & \(114,662.00\) & 68,361 & 69,553 & 45,109 & 17.95 & 2,513 \\
1997 & \(34,103.73\) & 20,002 & 20,351 & 13,753 & 17.98 & 765 \\
1998 & \(5,020.01\) & 2,891 & 2,941 & 2,079 & 18.05 & 115 \\
1999 & \(61,540.30\) & 34,709 & 35,314 & 26,226 & 18.17 & 1,443 \\
2000 & \(86,444.69\) & 47,648 & 48,479 & 37,966 & 18.32 & 2,072 \\
2003 & \(11,430.20\) & 5,861 & 5,963 & 5,467 & 18.52 & 295 \\
2004 & \(791,163.92\) & 395,186 & 402,075 & 389,089 & 18.54 & 20,986 \\
2005 & \(369,432.29\) & 179,101 & 182,223 & 187,209 & 18.60 & 10,065 \\
2007 & \(884,365.38\) & 400,264 & 407,241 & 477,124 & 18.75 & 25,447 \\
2009 & \(142,524.99\) & 59,461 & 60,498 & 82,027 & 18.86 & 4,349 \\
2010 & \(117,515.54\) & 46,712 & 47,526 & 69,989 & 18.95 & 3,693 \\
2011 & \(680,437.10\) & 257,477 & 261,965 & 418,472 & 18.89 & 22,153 \\
2012 & \(1,226,891.07\) & 436,773 & 444,387 & 782,504 & 19.00 & 41,184 \\
2013 & \(47,033.39\) & 15,681 & 15,954 & 31,079 & 18.99 & 1,637 \\
2014 & \(698,058.93\) & 215,421 & 219,176 & 478,883 & 19.05 & 25,138 \\
2017 & \(290,289.00\) & 64,967 & 66,100 & 224,189 & 19.07 & 11,756 \\
2018 & \(3,773,188.27\) & 721,434 & 734,010 & \(3,039,178\) & 19.03 & 159,705 \\
2019 & \(2,242,383.33\) & 349,363 & 355,453 & \(1,886,930\) & 18.97 & 99,469 \\
2020 & \(144,039.92\) & 16,824 & 17,117 & 126,923 & 18.91 & 6,712 \\
2021 & \(2,083,656.62\) & 154,399 & 157,091 & \(1,926,566\) & 18.74 & 102,805 \\
2022 & \(1,139,614.58\) & 30,542 & 31,074 & \(1,108,540\) & 18.16 & 61,043 \\
& & & & & &
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1963 & 4,207.27 & 3,337 & 3,395 & 812 & 11.60 & 70 \\
\hline 1964 & 636,606.00 & 502,448 & 511,207 & 125,399 & 11.77 & 10,654 \\
\hline 1967 & 2,701.54 & 2,099 & 2,136 & 566 & 12.28 & 46 \\
\hline 1970 & 215,286.77 & 164,606 & 167,475 & 47,811 & 12.75 & 3,750 \\
\hline 1972 & 13,721.57 & 10,374 & 10,555 & 3,167 & 13.04 & 243 \\
\hline 1975 & 6,768.37 & 5,026 & 5,114 & 1,655 & 13.45 & 123 \\
\hline 1977 & 22,451.12 & 16,461 & 16,748 & 5,703 & 13.70 & 416 \\
\hline 1978 & 10,948.61 & 7,974 & 8,113 & 2,836 & 13.82 & 205 \\
\hline 1979 & 35,017.57 & 25,328 & 25,770 & 9,248 & 13.94 & 663 \\
\hline 1982 & 46,647.04 & 33,011 & 33,586 & 13,061 & 14.26 & 916 \\
\hline 1983 & 73,273.43 & 54,120 & 55,063 & 18,210 & 13.98 & 1,303 \\
\hline 1984 & 133,055.69 & 97,330 & 99,027 & 34,029 & 14.13 & 2,408 \\
\hline 1986 & 479,597.04 & 344,830 & 350,841 & 128,756 & 14.26 & 9,029 \\
\hline 1988 & 16,004.75 & 11,264 & 11,460 & 4,544 & 14.52 & 313 \\
\hline 1989 & 3,321.57 & 2,314 & 2,354 & 967 & 14.58 & 66 \\
\hline 1990 & 59,472.81 & 40,977 & 41,691 & 17,781 & 14.67 & 1,212 \\
\hline 1991 & 44,799.19 & 30,625 & 31,159 & 13,640 & 14.58 & 936 \\
\hline 1993 & 67,328.74 & 44,888 & 45,671 & 21,658 & 14.75 & 1,468 \\
\hline 1994 & 47,686.25 & 31,397 & 31,944 & 15,742 & 14.79 & 1,064 \\
\hline 1995 & 8,477.09 & 5,502 & 5,598 & 2,879 & 14.87 & 194 \\
\hline 1996 & 32,193.92 & 20,559 & 20,917 & 11,277 & 15.00 & 752 \\
\hline 1998 & 48,649.81 & 30,153 & 30,679 & 17,971 & 15.03 & 1,196 \\
\hline 1999 & 18,342.22 & 11,163 & 11,358 & 6,985 & 15.11 & 462 \\
\hline 2000 & 110,538.40 & 65,903 & 67,052 & 43,487 & 15.24 & 2,853 \\
\hline 2001 & 4,012.92 & 2,347 & 2,388 & 1,625 & 15.26 & 106 \\
\hline 2002 & 53,485.02 & 30,593 & 31,126 & 22,359 & 15.34 & 1,458 \\
\hline 2003 & 71,739.29 & 40,145 & 40,845 & 30,894 & 15.34 & 2,014 \\
\hline 2004 & 277,883.08 & 151,669 & 154,313 & 123,570 & 15.40 & 8,024 \\
\hline 2005 & 111,532.14 & 59,335 & 60,369 & 51,163 & 15.39 & 3,324 \\
\hline 2006 & 571,766.37 & 295,260 & 300,407 & 271,359 & 15.45 & 17,564 \\
\hline 2008 & 136,831.05 & 66,062 & 67,214 & 69,617 & 15.53 & 4,483 \\
\hline 2009 & 1,088,002.87 & 505,269 & 514,077 & 573,926 & 15.57 & 36,861 \\
\hline 2010 & 443,786.94 & 197,485 & 200,928 & 242,859 & 15.59 & 15,578 \\
\hline 2011 & 973,293.11 & 413,066 & 420,267 & 553,026 & 15.60 & 35,450 \\
\hline 2012 & 606,590.34 & 243,971 & 248,224 & 358,366 & 15.61 & 22,957 \\
\hline 2013 & 416,262.05 & 157,389 & 160,133 & 256,129 & 15.63 & 16,387 \\
\hline 2014 & 158,380.42 & 55,734 & 56,706 & 101,675 & 15.65 & 6,497 \\
\hline 2017 & 175,358.18 & 45,628 & 46,423 & 128,935 & 15.64 & 8,244 \\
\hline 2018 & 502,314.07 & 112,117 & 114,071 & 388,243 & 15.66 & 24,792 \\
\hline
\end{tabular}

\section*{ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

NORTHERN DIVISION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2039
\begin{tabular}{rrrrrrr}
2019 & \(469,439.57\) & 85,907 & 87,405 & 382,035 & 15.62 & 24,458 \\
2021 & \(1,562,742.47\) & 138,303 & 140,714 & \(1,422,029\) & 15.45 & 92,041 \\
2022 & \(854,710.94\) & 27,436 & 27,914 & 826,797 & 15.08 & 54,827 \\
& \(10,615,227.60\) & \(4,189,405\) & \(4,262,436\) & \(6,352,792\) & 415,407
\end{tabular}

WESTERN DISTRICT HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. \(6-2038\)
\begin{tabular}{rrrrrrr}
1968 & \(557,788.70\) & 435,767 & 443,363 & 114,425 & 11.92 & 9,599 \\
1969 & 188.85 & 147 & 150 & 39 & 12.06 & 3 \\
1976 & \(14,704.21\) & 10,999 & 11,191 & 3,513 & 12.94 & 271 \\
1977 & \(11,934.29\) & 8,873 & 9,028 & 2,907 & 13.05 & 223 \\
1978 & 255.94 & 189 & 192 & 64 & 13.16 & 5 \\
1983 & \(1,450.41\) & 1,083 & 1,102 & 349 & 13.41 & 26 \\
1984 & \(215,204.85\) & 159,897 & 162,684 & 52,520 & 13.32 & 3,943 \\
1985 & \(27,238.65\) & 20,020 & 20,369 & 6,870 & 13.52 & 508 \\
1992 & \(123,857.87\) & 84,991 & 86,473 & 37,385 & 13.95 & 2,680 \\
1993 & \(145,724.42\) & 98,874 & 100,598 & 45,127 & 13.98 & 3,228 \\
1994 & \(5,242.13\) & 3,511 & 3,572 & 1,670 & 14.05 & 119 \\
1995 & \(93,754.40\) & 61,878 & 62,957 & 30,798 & 14.17 & 2,173 \\
1996 & \(3,656.21\) & 2,383 & 2,425 & 1,232 & 14.15 & 87 \\
1997 & \(22,292.39\) & 14,325 & 14,575 & 7,718 & 14.18 & 544 \\
1998 & \(22,292.39\) & 14,091 & 14,337 & 7,956 & 14.26 & 558 \\
1999 & \(72,480.54\) & 44,967 & 45,751 & 26,730 & 14.38 & 1,859 \\
2000 & \(426,623.07\) & 260,155 & 264,690 & 161,933 & 14.40 & 11,245 \\
2006 & \(172,736.47\) & 91,775 & 93,375 & 79,362 & 14.56 & 5,451 \\
2011 & \(458,794.05\) & 201,044 & 204,549 & 254,245 & 14.75 & 17,237 \\
2017 & \(81,446.49\) & 22,088 & 22,473 & 58,973 & 14.78 & 3,990 \\
2018 & \(1,387,300.30\) & 324,073 & 329,722 & \(1,057,578\) & 14.77 & 71,603 \\
2021 & \(1,562,742.47\) & 145,648 & 148,187 & \(1,414,555\) & 14.60 & 96,887 \\
2022 & \(854,710.94\) & 28,975 & 29,480 & 825,231 & 14.25 & 57,911 \\
& & & & & & \\
& \(6,262,420.04\) & \(2,035,753\) & \(2,071,241\) & \(4,191,179\) & & 290,150
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

CENTRAL DOWNTOWN - UNDERGROUND
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2027
\begin{tabular}{rrrrrrr}
1999 & \(18,342.22\) & 15,431 & 15,700 & 2,642 & 4.43 & 596 \\
2001 & \(6,608.19\) & 5,484 & 5,580 & 1,029 & 4.41 & 233 \\
2004 & \(15,679.72\) & 12,647 & 12,867 & 2,812 & 4.44 & 633 \\
& & & & & & 1,462
\end{tabular}

WOODS RUN \#1 SS\&S CENTRAL DISTRICT
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2036
\begin{tabular}{rrrrrrr}
1980 & \(19,288.25\) & 14,524 & 14,777 & 4,511 & 11.91 & 379 \\
1983 & \(2,331.70\) & 1,796 & 1,827 & 504 & 11.78 & 43 \\
1988 & \(9,342.33\) & 6,897 & 7,017 & 2,325 & 12.23 & 190 \\
1989 & \(5,588.57\) & 4,100 & 4,171 & 1,417 & 12.16 & 117 \\
1992 & \(9,149.42\) & 6,502 & 6,615 & 2,534 & 12.42 & 204 \\
1995 & \(108,248.42\) & 74,421 & 75,718 & 32,530 & 12.50 & 2,602 \\
1996 & \(19,712.60\) & 13,373 & 13,606 & 6,106 & 12.56 & 486 \\
2000 & \(21,920.47\) & 14,007 & 14,251 & 7,669 & 12.71 & 603 \\
2001 & \(608,086.00\) & 381,756 & 388,411 & 219,675 & 12.75 & 17,229 \\
2002 & \(110,216.69\) & 68,004 & 69,189 & 41,027 & 12.72 & 3,225 \\
2003 & 393.51 & 238 & 242 & 151 & 12.76 & 12 \\
2004 & \(53,270.31\) & 31,440 & 31,988 & 21,282 & 12.85 & 1,656 \\
2005 & \(29,421.83\) & 16,991 & 17,287 & 12,135 & 12.80 & 948 \\
2010 & \(128,643.52\) & 63,190 & 64,292 & 64,352 & 12.95 & 4,969 \\
2011 & \(265,847.78\) & 125,055 & 127,235 & 138,613 & 12.95 & 10,704 \\
2012 & \(204,961.73\) & 91,679 & 93,277 & 111,685 & 12.97 & 8,611 \\
2014 & \(61,180.72\) & 24,179 & 24,600 & 36,580 & 13.01 & 2,812 \\
2016 & \(168,370.19\) & 56,135 & 57,114 & 111,257 & 12.99 & 8,565 \\
2017 & \(422,802.46\) & 125,826 & 128,019 & 294,783 & 12.98 & 22,711 \\
2019 & \(9,775.80\) & 2,076 & 2,112 & 7,664 & 12.98 & 590 \\
2021 & \(1,041,828.31\) & 108,767 & 110,663 & 931,165 & 12.87 & 72,352 \\
2022 & \(569,807.29\) & 21,767 & 22,146 & 547,661 & 12.59 & 43,500
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODS RUN \#2 SOC
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2048
\begin{tabular}{rrrrrrr}
1978 & \(364,705.29\) & 239,677 & 243,855 & 120,850 & 18.68 & 6,469 \\
1980 & \(76,422.92\) & 49,174 & 50,031 & 26,392 & 19.19 & 1,375 \\
1981 & \(11,189.13\) & 7,120 & 7,244 & 3,945 & 19.44 & 203 \\
1983 & \(28,599.00\) & 19,430 & 19,769 & 8,830 & 18.64 & 474 \\
1985 & \(24,290.54\) & 16,032 & 16,311 & 7,979 & 19.32 & 413 \\
1987 & \(10,641.73\) & 6,838 & 6,957 & 3,685 & 19.75 & 187 \\
1989 & \(1,571.49\) & 984 & 1,001 & 570 & 19.98 & 29 \\
1990 & \(108,454.19\) & 66,970 & 68,137 & 40,317 & 20.13 & 2,003 \\
1991 & \(24,869.57\) & 15,121 & 15,385 & 9,485 & 20.31 & 467 \\
1992 & \(28,594.86\) & 17,094 & 17,392 & 11,203 & 20.52 & 546 \\
1994 & \(5,927.49\) & 3,412 & 3,471 & 2,456 & 21.00 & 117 \\
1996 & \(62,222.38\) & 34,627 & 35,231 & 26,992 & 21.12 & 1,278 \\
1997 & \(355,041.93\) & 192,859 & 196,221 & 158,821 & 21.45 & 7,404 \\
1998 & \(664,728.08\) & 353,369 & 359,529 & 305,199 & 21.59 & 14,136 \\
2000 & \(82,102.31\) & 41,749 & 42,477 & 39,626 & 21.75 & 1,822 \\
2001 & \(1,812,941.45\) & 900,307 & 916,001 & 896,940 & 21.79 & 41,163 \\
2002 & \(1,177,675.54\) & 567,404 & 577,295 & 600,380 & 22.05 & 27,228 \\
2003 & \(478,690.44\) & 224,027 & 227,932 & 250,758 & 22.17 & 11,311 \\
2004 & \(57,959.12\) & 26,377 & 26,837 & 31,122 & 22.15 & 1,405 \\
2005 & \(9,296.15\) & 4,083 & 4,154 & 5,142 & 22.34 & 230 \\
2006 & \(138,063.48\) & 58,539 & 59,559 & 78,504 & 22.41 & 3,503 \\
2007 & \(65,303.96\) & 26,618 & 27,082 & 38,222 & 22.52 & 1,697 \\
2008 & \(25,678.51\) & 10,053 & 10,228 & 15,450 & 22.54 & 685 \\
2009 & 380.29 & 142 & 5,933 & 6,036 & 236 & 22.60
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODS RUN \#3 OFFICE BUILDING
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1980 & 10,643.90 & 7,067 & 7,190 & 3,454 & 17.70 & 195 \\
\hline 1983 & 28,554.29 & 19,851 & 20,197 & 8,357 & 17.32 & 483 \\
\hline 1984 & 46,864.99 & 32,117 & 32,677 & 14,188 & 17.68 & 802 \\
\hline 1986 & 84,544.03 & 56,780 & 57,770 & 26,774 & 17.85 & 1,500 \\
\hline 1987 & 584,429.17 & 387,944 & 394,707 & 189,722 & 17.98 & 10,552 \\
\hline 1988 & 46,209.32 & 30,290 & 30,818 & 15,391 & 18.13 & 849 \\
\hline 1989 & 106,558.83 & 68,901 & 70,102 & 36,457 & 18.31 & 1,991 \\
\hline 1990 & 2,040,384.18 & 1,299,725 & 1,322,382 & 718,002 & 18.52 & 38,769 \\
\hline 1991 & 175,326.20 & 109,894 & 111,810 & 63,517 & 18.75 & 3,388 \\
\hline 1992 & 84,302.22 & 52,200 & 53,110 & 31,192 & 18.76 & 1,663 \\
\hline 1993 & 137,702.35 & 83,682 & 85,141 & 52,562 & 19.04 & 2,761 \\
\hline 1994 & 73,806.25 & 44,173 & 44,943 & 28,863 & 19.12 & 1,510 \\
\hline 1995 & 70,875.93 & 41,710 & 42,437 & 28,439 & 19.23 & 1,479 \\
\hline 1996 & 454,209.21 & 262,397 & 266,971 & 187,238 & 19.37 & 9,666 \\
\hline 1997 & 71,092.98 & 40,423 & 41,128 & 29,965 & 19.35 & 1,549 \\
\hline 1998 & 54,785.65 & 30,472 & 31,003 & 23,782 & 19.55 & 1,216 \\
\hline 1999 & 18,672.95 & 10,180 & 10,357 & 8,315 & 19.60 & 424 \\
\hline 2000 & 648,980.10 & 346,036 & 352,068 & 296,912 & 19.70 & 15,072 \\
\hline 2001 & 5,178,656.63 & 2,694,455 & 2,741,425 & 2,437,231 & 19.82 & 122,968 \\
\hline 2002 & 506,218.24 & 256,349 & 260,818 & 245,401 & 19.98 & 12,282 \\
\hline 2003 & 14,587.38 & 7,197 & 7,322 & 7,265 & 20.02 & 363 \\
\hline 2004 & 293,940.73 & 140,856 & 143,311 & 150,629 & 20.11 & 7,490 \\
\hline 2005 & 1,281,401.68 & 596,492 & 606,890 & 674,512 & 20.09 & 33,575 \\
\hline 2006 & 21,584.04 & 9,687 & 9,856 & 11,728 & 20.26 & 579 \\
\hline 2009 & 144,817.12 & 57,666 & 58,671 & 86,146 & 20.40 & 4,223 \\
\hline 2010 & 16,168.14 & 6,124 & 6,231 & 9,937 & 20.50 & 485 \\
\hline 2011 & 598,331.44 & 214,681 & 218,423 & 379,908 & 20.55 & 18,487 \\
\hline 2012 & 158,368.55 & 53,544 & 54,477 & 103,891 & 20.56 & 5,053 \\
\hline 2013 & 267,842.54 & 84,478 & 85,951 & 181,892 & 20.62 & 8,821 \\
\hline 2014 & 768,012.69 & 223,953 & 227,857 & 540,156 & 20.65 & 26,158 \\
\hline 2015 & 78,728.29 & 20,957 & 21,322 & 57,406 & 20.67 & 2,777 \\
\hline 2017 & 1,832,738.23 & 385,058 & 391,770 & 1,440,968 & 20.68 & 69,679 \\
\hline 2018 & 130,670.74 & 23,403 & 23,811 & 106,860 & 20.63 & 5,180 \\
\hline 2019 & 349,048.48 & 50,682 & 51,565 & 297,483 & 20.60 & 14,441 \\
\hline 2020 & 11,953.25 & 1,301 & 1,324 & 10,630 & 20.49 & 519 \\
\hline 2021 & 7,506,364.23 & 516,438 & 525,441 & 6,980,924 & 20.29 & 344,057 \\
\hline & 23,897,374.95 & 8,267,163 & 8,411,278 & 15,486,097 & & 771,006 \\
\hline
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

WOODS RUN \#4 COMMUNICATIONS HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1980 & \(10,712.51\) & 7,113 & 7,237 & 3,476 & 17.70 & 196 \\
1983 & \(3,657.61\) & 2,543 & 2,587 & 1,070 & 17.32 & 62 \\
1986 & \(35,933.38\) & 24,133 & 24,554 & 11,380 & 17.85 & 638 \\
1988 & \(9,286.46\) & 6,087 & 6,193 & 3,093 & 18.13 & 171 \\
1994 & \(20,620.18\) & 12,341 & 12,556 & 8,064 & 19.12 & 422 \\
1996 & 744.81 & 430 & 437 & 307 & 19.37 & 16 \\
1997 & \(54,555.88\) & 31,020 & 31,561 & 22,995 & 19.35 & 1,188 \\
2000 & \(23,528.39\) & 12,545 & 12,764 & 10,765 & 19.70 & 546 \\
2001 & \(795,962.89\) & 414,139 & 421,358 & 374,604 & 19.82 & 18,900 \\
2002 & \(76,989.54\) & 38,988 & 39,668 & 37,322 & 19.98 & 1,868 \\
2003 & 442.71 & 218 & 222 & 221 & 20.02 & 11 \\
2004 & \(2,379.61\) & 1,140 & 1,160 & 1,220 & 20.11 & 61 \\
2011 & \(9,864.93\) & 3,540 & 3,602 & 6,263 & 20.55 & 305 \\
2016 & \(9,718.51\) & 2,325 & 2,366 & 7,353 & 20.67 & 356 \\
2019 & \(274,266.89\) & 39,824 & 40,518 & 233,749 & 20.60 & 11,347 \\
2020 & \(30,834.00\) & 3,355 & 3,413 & 27,421 & 20.49 & 1,338 \\
& & & & & & \\
& \(1,359,498.30\) & 599,741 & 610,196 & 749,302 & & 37,425
\end{tabular}

WOODS RUN GUARD HOUSE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2045
\begin{tabular}{rrrrrrr}
1978 & \(1,456.15\) & 985 & 1,002 & 454 & 17.29 & 26 \\
1980 & \(527,586.95\) & 350,291 & 356,397 & 171,190 & 17.70 & 9,672 \\
1985 & \(814,275.66\) & 552,730 & 562,365 & 251,910 & 17.75 & 14,192 \\
1986 & \(14,436.99\) & 9,696 & 9,865 & 4,572 & 17.85 & 256 \\
1987 & \(3,846.01\) & 2,553 & 2,598 & 1,249 & 17.98 & 69 \\
1988 & \(8,030.81\) & 5,264 & 5,356 & 2,675 & 18.13 & 148 \\
1990 & \(60,792.87\) & 38,725 & 39,400 & 21,393 & 18.52 & 1,155 \\
1991 & 852.26 & 534 & 543 & 309 & 18.75 & 16 \\
1996 & \(24,149.01\) & 13,951 & 14,194 & 9,955 & 19.37 & 514 \\
1998 & \(15,769.11\) & 8,771 & 8,924 & 6,845 & 19.55 & 350 \\
2000 & \(6,001.12\) & 3,200 & 3,256 & 2,745 & 19.70 & 139 \\
2001 & \(15,255.18\) & 7,937 & 8,075 & 7,180 & 19.82 & 362 \\
2009 & \(605,416.08\) & 241,077 & 245,279 & 360,137 & 20.40 & 17,654 \\
& & & & & & 4,553
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

ALLOC. BOOK
RESERVE
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL ACCRUAL
(7)

RACCOON T \& D HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(6,317,725.62\) & \(4,618,573\) & \(4,699,085\) & \(1,618,641\) & 12.81 & 126,358 \\
1987 & \(9,723.43\) & 7,145 & 7,270 & 2,454 & 12.81 & 192 \\
1988 & \(44,445.57\) & 32,356 & 32,920 & 11,526 & 12.89 & 894 \\
1989 & \(146,031.48\) & 105,172 & 107,005 & 39,026 & 13.01 & 3,000 \\
1990 & \(46,056.95\) & 32,783 & 33,354 & 12,702 & 13.16 & 965 \\
1991 & \(11,020.00\) & 7,776 & 7,912 & 3,108 & 13.14 & 237 \\
2000 & \(44,538.57\) & 27,756 & 28,240 & 16,299 & 13.60 & 1,198 \\
2001 & \(4,012.94\) & 2,459 & 2,502 & 1,511 & 13.59 & 111 \\
2002 & \(5,351.86\) & 3,214 & 3,270 & 2,082 & 13.63 & 153 \\
2003 & \(44,811.29\) & 26,389 & 26,849 & 17,962 & 13.61 & 1,320 \\
2004 & \(91,719.17\) & 52,775 & 53,695 & 38,024 & 13.65 & 2,786 \\
2005 & \(21,456.35\) & 12,016 & 12,225 & 9,231 & 13.75 & 671 \\
2009 & \(73,876.90\) & 36,503 & 37,139 & 36,738 & 13.82 & 2,658 \\
2011 & \(183,925.81\) & 83,539 & 84,995 & 98,931 & 13.82 & 7,159 \\
2012 & \(36,959.20\) & 15,952 & 16,230 & 20,729 & 13.83 & 1,499 \\
2013 & \(524,331.25\) & 213,193 & 216,909 & 307,422 & 13.86 & 22,181 \\
2014 & \(291,447.41\) & 110,750 & 112,681 & 178,767 & 13.87 & 12,889 \\
2015 & \(5,559.62\) & 1,947 & 1,981 & 3,579 & 13.91 & 257 \\
2018 & \(56,915.29\) & 13,933 & 14,176 & 42,739 & 13.88 & 3,079 \\
2019 & \(1,505,125.32\) & 303,433 & 308,723 & \(1,196,403\) & 13.86 & 86,321 \\
2021 & \(179,369.15\) & 17,650 & 17,958 & 161,411 & 13.74 & 11,748 \\
2022 & \(315,000.00\) & 11,308 & 11,505 & 303,495 & 13.43 & 22,598
\end{tabular}

RACCOON \(S\) \& S HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(2,384,494.57\) & \(1,743,185\) & \(1,773,572\) & 610,922 & 12.81 & 47,691 \\
1988 & \(11,180.00\) & 8,139 & 8,281 & 2,899 & 12.89 & 225 \\
1991 & \(12,027.76\) & 8,487 & 8,635 & 3,393 & 13.14 & 258 \\
1996 & \(35,462.54\) & 23,590 & 24,001 & 11,461 & 13.34 & 859 \\
2000 & 44.99 & 28 & 28 & 17 & 13.60 & 1 \\
2002 & \(5,351.86\) & 3,214 & 3,270 & 2,082 & 13.63 & 153 \\
2003 & \(2,719.34\) & 1,601 & 1,629 & 1,090 & 13.61 & 80 \\
2011 & \(69,719.58\) & 31,667 & 32,219 & 37,501 & 13.82 & 2,714 \\
2012 & \(23,737.40\) & 10,245 & 10,424 & 13,314 & 13.83 & 963
\end{tabular}

\section*{DUQUESNE LIGHT COMPANY \\ ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)

ORIGINAL
COST
(2)

CALCULATED
ACCRUED
(3)

\section*{ALLOC. BOOK}
(4)

FUTURE BOOK
ACCRUALS
(5)

REM.
LIFE
(6)

ANNUAL
ACCRUAL
(7)

RACCOON S \& S HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
2013 & \(88,027.35\) & 35,792 & 36,416 & 51,611 & 13.86 & 3,724 \\
2014 & \(101,544.73\) & 38,587 & 39,260 & 62,285 & 13.87 & 4,491 \\
2017 & \(110,769.71\) & 31,436 & 31,984 & 78,786 & 13.88 & 5,676 \\
& \(2,845,079.83\) & \(1,935,971\) & \(1,969,719\) & 875,361 & 66,835
\end{tabular}

RACCOON GARAGE
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2037
\begin{tabular}{rrrrrrr}
1982 & \(1,518,371.46\) & \(1,110,005\) & \(1,129,354\) & 389,017 & 12.81 & 30,368 \\
1987 & \(2,732.66\) & 2,008 & 2,043 & 690 & 12.81 & 54 \\
1988 & \(5,314.81\) & 3,869 & 3,936 & 1,378 & 12.89 & 107 \\
1991 & \(60,628.56\) & 42,780 & 43,526 & 17,103 & 13.14 & 1,302 \\
1996 & \(10,477.93\) & 6,970 & 7,091 & 3,386 & 13.34 & 254 \\
1998 & \(32,432.02\) & 20,899 & 21,263 & 11,169 & 13.52 & 826 \\
2004 & \(1,773.48\) & 1,020 & 1,038 & 736 & 13.65 & 54 \\
2007 & \(83,517.03\) & 44,272 & 45,044 & 38,473 & 13.74 & 2,800 \\
2011 & \(44,221.68\) & 20,085 & 20,435 & 23,787 & 13.82 & 1,721 \\
2018 & \(59,727.99\) & 14,621 & 14,876 & 44,852 & 13.88 & 3,231 \\
2019 & \(111,256.63\) & 22,429 & 22,820 & 88,437 & 13.86 & 6,381 \\
2020 & \(26,926.73\) & 4,125 & 4,197 & 22,730 & 13.81 & 1,646 \\
2021 & \(59,789.72\) & 5,883 & 5,986 & 53,804 & 13.74 & 3,916 \\
2022 & \(105,000.00\) & 3,770 & 3,836 & 101,164 & 13.43 & 7,533 \\
& & & & & & \\
& \(2,122,170.70\) & \(1,302,736\) & \(1,325,445\) & 796,726 & & 60,193
\end{tabular}

PREBLE AVE SERVICE CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061
\begin{tabular}{rrrrrrr}
2006 & \(13,103,749.96\) & \(4,670,176\) & \(4,751,588\) & \(8,352,162\) & 29.80 & 280,274 \\
2009 & \(43,868.25\) & 13,503 & 13,738 & 30,130 & 30.36 & 992 \\
2010 & \(96,421.61\) & 27,962 & 28,449 & 67,972 & 30.60 & 2,221 \\
2011 & \(889,736.97\) & 242,542 & 246,770 & 642,967 & 30.69 & 20,950 \\
2012 & \(1,024,739.40\) & 260,386 & 264,925 & 759,814 & 30.82 & 24,653 \\
2013 & \(355,475.72\) & 83,395 & 84,849 & 270,627 & 30.99 & 8,733 \\
2014 & \(466,079.68\) & 99,834 & 101,574 & 364,505 & 31.18 & 11,690 \\
2015 & \(9,985.04\) & 1,932 & 1,966 & 8,019 & 31.26 & 257 \\
2016 & \(27,421.61\) & 4,722 & 4,804 & 22,617 & 31.24 & 724
\end{tabular}

\section*{ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS}

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022

YEAR
(1)
ORIGINAL
COST
(2)

\section*{CALCULATED
ACCRUED}
(3)

\section*{ALLOC. BOOK RESERVE}
(4)
\begin{tabular}{cl} 
FUTURE BOOK & REM. \\
ACCRUALS & LIFE
\end{tabular}
(5)

LIFE ACCRUAL
(6)

ANNUAL
(7)

PREBLE AVE SERVICE CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061
\begin{tabular}{rrrrrrr}
2017 & \(501,314.78\) & 74,997 & 76,304 & 425,010 & 31.26 & 13,596 \\
2018 & \(102,290.68\) & 12,848 & 13,072 & 89,219 & 31.34 & 2,847 \\
2019 & \(462,254.18\) & 46,595 & 47,407 & 414,847 & 31.22 & 13,288 \\
2020 & \(95,323.24\) & 7,130 & 7,254 & 88,069 & 30.94 & 2,846 \\
2021 & \(239,158.87\) & 11,240 & 11,436 & 227,723 & 30.45 & 7,479 \\
2022 & \(420,000.00\) & 7,140 & 7,264 & 412,736 & 28.91 & 14,277 \\
& & & & & & 404,827
\end{tabular}

WOODS RUN TRAINING CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2056
\begin{tabular}{rrrrrrr}
2006 & \(9,427,600.47\) & \(3,546,663\) & \(3,608,489\) & \(5,819,112\) & 27.36 & 212,687 \\
2008 & \(4,263,403.25\) & \(1,464,905\) & \(1,490,441\) & \(2,772,962\) & 27.70 & 100,107 \\
2010 & \(878,117.71\) & 271,163 & 275,890 & 602,228 & 27.98 & 21,524 \\
2011 & \(792,458.08\) & 230,605 & 234,625 & 557,833 & 28.02 & 19,908 \\
2012 & \(161,276.30\) & 43,867 & 44,632 & 116,645 & 28.11 & 4,150 \\
2013 & \(44,427.00\) & 11,187 & 11,382 & 33,045 & 28.23 & 1,171 \\
2014 & \(923,602.26\) & 213,537 & 217,259 & 706,343 & 28.26 & 24,994 \\
2015 & \(347,160.16\) & 72,626 & 73,892 & 273,268 & 28.34 & 9,642 \\
2017 & \(84,726.10\) & 13,743 & 13,983 & 70,744 & 28.40 & 2,491 \\
2018 & \(40,668.35\) & 5,563 & 5,660 & 35,008 & 28.39 & 1,233 \\
2019 & \(1,048,624.49\) & 115,244 & 117,253 & 931,372 & 28.35 & 32,853 \\
2020 & \(419,698.53\) & 34,331 & 34,929 & 384,769 & 28.08 & 13,703 \\
& & & & & & \\
& \(18,431,762.70\) & \(6,023,434\) & \(6,128,435\) & \(12,303,328\) & & 444,463
\end{tabular}

WOODS RUN \#5 TRANSPORTATION HEADQUARTERS
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2061
\begin{tabular}{rrrrrrr}
2011 & \(157,195.44\) & 42,851 & 43,598 & 113,597 & 30.69 & 3,701 \\
2012 & \(13,010.91\) & 3,306 & 3,364 & 9,647 & 30.82 & 313 \\
2013 & \(1,009,137.65\) & 236,744 & 240,871 & 768,267 & 30.99 & 24,791 \\
2014 & \(169,891.52\) & 36,391 & 37,025 & 132,866 & 31.18 & 4,261 \\
2019 & \(178,944.62\) & 18,038 & 18,352 & 160,592 & 31.22 & 5,144 \\
2020 & \(98,561.36\) & 7,372 & 7,501 & 91,061 & 30.94 & 2,943 \\
& & & & & & 41,153
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}
```

INDEPENDENT ALTERNATE OPERATIONS CENTER
INTERIM SURVIVOR CURVE.. IOWA 58-R2
PROBABLE RETIREMENT YEAR.. 6-2068

| 2013 | $4,142,612.11$ | 901,432 | 917,146 | $3,225,466$ | 34.17 | 94,395 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2015 | $116,942.76$ | 20,874 | 21,238 | 95,705 | 34.52 | 2,772 |
|  | $4,259,554.87$ | 922,306 | 938,384 | $3,321,171$ | 97,167 |  |

```

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1905 & 8,881.12 & 8,881 & 8,881 & & & \\
\hline 1925 & 737.36 & 737 & 737 & & & \\
\hline 1926 & 15.05 & 15 & 15 & & & \\
\hline 1931 & 16,963.00 & 16,963 & 16,963 & & & \\
\hline 1935 & 421.35 & 421 & 421 & & & \\
\hline 1940 & 19.26 & 19 & 19 & & & \\
\hline 1942 & 180.69 & 181 & 181 & & & \\
\hline 1948 & 22,914.33 & 22,716 & 22,914 & & & \\
\hline 1949 & 4,128.17 & 4,071 & 4,128 & & & \\
\hline 1950 & 1,448.04 & 1,421 & 1,446 & 2 & 0.85 & 2 \\
\hline 1952 & 451.75 & 439 & 447 & 5 & 1.32 & 4 \\
\hline 1958 & 4,032.50 & 3,779 & 3,846 & 186 & 2.83 & 66 \\
\hline 1965 & 539.23 & 484 & 493 & 47 & 4.65 & 10 \\
\hline 1967 & 6,665.75 & 5,894 & 5,999 & 667 & 5.21 & 128 \\
\hline 1969 & 11,087.35 & 9,658 & 9,830 & 1,257 & 5.80 & 217 \\
\hline 1970 & 11,759.50 & 10,160 & 10,341 & 1,418 & 6.12 & 232 \\
\hline 1976 & 6,822.07 & 5,549 & 5,648 & 1,174 & 8.40 & 140 \\
\hline 1977 & 22,254.33 & 17,878 & 18,197 & 4,058 & 8.85 & 459 \\
\hline 1984 & 794.00 & 611 & 622 & 172 & 11.50 & 15 \\
\hline 1986 & 8,506.94 & 6,334 & 6,447 & 2,060 & 12.52 & 165 \\
\hline 1990 & 11,312.32 & 7,758 & 7,896 & 3,416 & 14.89 & 229 \\
\hline 1993 & 1,317.79 & 840 & 855 & 463 & 16.80 & 28 \\
\hline 1995 & 63,828.64 & 38,438 & 39,123 & 24,706 & 18.16 & 1,360 \\
\hline 1996 & 253,546.74 & 148,477 & 151,123 & 102,424 & 18.75 & 5,463 \\
\hline 1998 & 445,768.99 & 244,638 & 248,997 & 196,772 & 20.14 & 9,770 \\
\hline 1999 & 88,722.68 & 47,121 & 47,961 & 40,762 & 20.75 & 1,964 \\
\hline 2000 & 50,481.45 & 25,786 & 26,246 & 24,236 & 21.55 & 1,125 \\
\hline 2001 & 533,821.31 & 262,854 & 267,538 & 266,283 & 22.17 & 12,011 \\
\hline 2002 & 1,135.42 & 535 & 545 & 591 & 22.98 & 26 \\
\hline 2003 & 38,314.25 & 17,333 & 17,642 & 20,672 & 23.60 & 876 \\
\hline 2004 & 9,962.85 & 4,294 & 4,371 & 5,592 & 24.42 & 229 \\
\hline
\end{tabular}

ACCOUNT 390.1 STRUCTURES AND IMPROVEMENTS
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

OTHER SMALL STRUCTURES
SURVIVOR CURVE.. IOWA 45-R3
\begin{tabular}{rrrrrrr}
2005 & \(8,898.54\) & 3,659 & 3,724 & 5,174 & 25.06 & 206 \\
2006 & \(414,602.49\) & 161,446 & 164,323 & 250,280 & 25.87 & 9,675 \\
2007 & \(40,724.00\) & 14,962 & 15,229 & 25,495 & 26.69 & 955 \\
2009 & \(149,026.72\) & 48,285 & 49,145 & 99,881 & 28.17 & 3,546 \\
2011 & \(755,652.56\) & 211,129 & 214,891 & 540,761 & 29.65 & 18,238 \\
2012 & \(55,610.94\) & 14,248 & 14,502 & 41,109 & 30.48 & 1,349 \\
2013 & \(141,977.07\) & 33,052 & 33,641 & 108,336 & 31.31 & 3,460 \\
2014 & \(72,303.91\) & 15,119 & 15,388 & 56,915 & 32.15 & 1,770 \\
2015 & \(605,872.50\) & 112,692 & 114,700 & 491,172 & 32.82 & 14,966 \\
2016 & \(207,767.07\) & 33,617 & 34,216 & 173,551 & 33.66 & 5,156 \\
2017 & \(704,279.90\) & 96,838 & 98,564 & 605,716 & 34.50 & 17,557 \\
2018 & \(807,875.53\) & 91,613 & 93,246 & 714,630 & 35.18 & 20,314 \\
2019 & \(467,796.92\) & 41,447 & 42,186 & 425,611 & 36.02 & 11,816 \\
2020 & \(330,900.47\) & 21,111 & 21,487 & 309,413 & 36.71 & 8,429 \\
2021 & \(119,579.44\) & 4,616 & 4,698 & 114,881 & 37.41 & 3,071 \\
2022 & \(210,000.00\) & 2,751 & 2,800 & 207,200 & 37.67 & 5,500 \\
& & & & & & \\
\\
& 6,719,702.29 & \(1,820,870\) & \(1,852,612\) & \(4,867,090\) & & 160,527 \\
& 172,554,624.86 & \(55,864,786\) & \(56,826,265\) & \(115,728,359\) & & \(5,254,485\) \\
& & & & & & \\
\hline
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 390.15 STRUCTURES AND IMPROVEMENTS - EV CHARGING STATIONS
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, }202
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(1)

ORIGINAL COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)

FUTURE BOO ACCRUALS
(5)

ANNUAL
(6)

SURVIVOR CURVE.. IOWA 10-L3
\begin{tabular}{rrrrrrr}
2021 & \(1,387,500.02\) & 235,320 & 184,184 & \(1,203,316\) & 7.34 & 163,940 \\
2022 & \(1,387,500.00\) & 78,532 & 61,467 & \(1,326,033\) & 8.33 & 159,188 \\
& \(2,775,000.02\) & 313,852 & 245,651 & \(2,529,349\) & & 323,128 \\
& & & & & & \\
\\
& \\
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT
\end{tabular}
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{rrrrrrr}
2003 & \(206,707.26\) & 201,540 & 199,674 & 7,033 & 0.50 & 7,033 \\
2004 & \(15,493.02\) & 14,331 & 14,198 & 1,295 & 1.50 & 863 \\
2005 & \(244,565.11\) & 213,994 & 212,013 & 32,552 & 2.50 & 13,021 \\
2006 & \(584,112.45\) & 481,893 & 477,432 & 106,680 & 3.50 & 30,480 \\
2007 & 0.08 & & & & & \\
2009 & \(5,884.00\) & 3,972 & 3,935 & 1,949 & 6.50 & 300 \\
2011 & \(131,314.49\) & 75,506 & 74,807 & 56,507 & 8.50 & 6,648 \\
2012 & \(200,674.00\) & 105,354 & 104,379 & 96,295 & 9.50 & 10,136 \\
2013 & \(347,322.84\) & 164,978 & 163,451 & 183,872 & 10.50 & 17,512 \\
2014 & \(583,739.30\) & 248,089 & 245,792 & 337,947 & 11.50 & 29,387 \\
2015 & \(1,539,521.11\) & 577,320 & 571,975 & 967,546 & 12.50 & 77,404 \\
2016 & \(26,077.70\) & 8,475 & 8,397 & 17,681 & 13.50 & 1,310 \\
2017 & \(418,912.23\) & 115,201 & 114,134 & 304,778 & 14.50 & 21,019 \\
2018 & \(552,975.63\) & 124,420 & 123,268 & 429,708 & 15.50 & 27,723 \\
2019 & \(466,288.94\) & 81,601 & 80,845 & 385,444 & 16.50 & 23,360 \\
& & & & & & \\
& \(5,323,588.16\) & \(2,416,674\) & \(2,394,300\) & \(2,929,288\) & & 266,196
\end{tabular}

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 11.0 5.00
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                                    DUQUESNE LIGHT COMPANY
                    ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                ACCOUNT 391.2 OFFICE FURNITURE AND EQUIPMENT - E.D.P. EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    (1)
    ```
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YEAR

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YEAR

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ORIGINAL
COST
(2)

(3)

ALLOC. BOOK RESERVE
(4)
```

| FUTURE BOOK | REM. | ANNUAL |
| :---: | :---: | :---: |
| ACCRUALS | LIFE | ACCRUAL |
| $(5)$ | $(6)$ | $(7)$ |

(5)
(6)

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SURVIVOR CURVE.. 5-SQUARE
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2018 2,837,782.26 2,554,004 2,464,129 373,653 0.50 373,653
2019 6,095,848.11 4,267,094 4,116,936 1,978,912 1.50 1,319,275
2020 4,561,515.87 2,280,758
2021 17,871,400.41
41,365,236.34 15,463,145 14,919,000 26,446,236 8,273,077

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    COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.2 20.00
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                            DUQUESNE LIGHT COMPANY
                        ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                        ACCOUNT 393 STORES EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    ```

YEAR
(1)

ORIGINAL
COST
(2)

(3)

(4)
\begin{tabular}{ccc} 
FUTURE BOOK & REM. & ANNUAL \\
ACCRUALS & LIFE & ACCRUAL \\
\((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 30-SQUARE
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 1993 & 107,936.90 & 106,138 & 105,300 & 2,637 & 0.50 & 2,637 \\
\hline 1994 & 102,887.68 & 97,743 & 96,971 & 5,917 & 1.50 & 3,945 \\
\hline 2000 & 130,828.73 & 98,122 & 97,347 & 33,482 & 7.50 & 4,464 \\
\hline 2001 & 8,530.94 & 6,114 & 6,066 & 2,465 & 8.50 & 290 \\
\hline 2003 & 61,839.75 & 40,196 & 39,879 & 21,961 & 10.50 & 2,092 \\
\hline 2006 & 944,989.56 & 519,744 & 515,640 & 429,350 & 13.50 & 31,804 \\
\hline 2014 & 22,400.00 & 6,347 & 6,297 & 16,103 & 21.50 & 749 \\
\hline & 1,379,413.56 & 874,404 & 867,500 & 511,914 & & 45,981 \\
\hline
\end{tabular}
DUQUESNE LIGHT COMPANY
ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
ACCOUNT 394 TOOLS, SHOP AND GARAGE EQUIPMENT
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 25-SQUARE
\begin{tabular}{rrrrrrr}
2000 & \(195,075.03\) & 175,568 & 175,545 & 19,530 & 2.50 & 7,812 \\
2001 & \(378,459.71\) & 325,475 & 325,433 & 53,027 & 3.50 & 15,151 \\
2002 & \(583,922.00\) & 478,816 & 478,754 & 105,168 & 4.50 & 23,371 \\
2003 & \(298,630.88\) & 232,932 & 232,902 & 65,729 & 5.50 & 11,951 \\
2004 & \(321,887.03\) & 238,196 & 238,165 & 83,722 & 6.50 & 12,880 \\
2005 & \(414,543.82\) & 290,181 & 290,143 & 124,401 & 7.50 & 16,587 \\
2006 & \(2,711,903.67\) & \(1,789,856\) & \(1,789,623\) & 922,281 & 8.50 & 108,504 \\
2007 & \(764,289.56\) & 473,860 & 473,798 & 290,492 & 9.50 & 30,578 \\
2008 & \(268,216.94\) & 155,566 & 155,546 & 112,671 & 10.50 & 10,731 \\
2009 & \(1,706,958.42\) & 921,758 & 921,638 & 785,320 & 11.50 & 68,289 \\
2010 & \(1,011,921.05\) & 505,961 & 505,895 & 506,026 & 12.50 & 40,482 \\
2011 & \(1,218,704.71\) & 560,604 & 560,531 & 658,174 & 13.50 & 48,754 \\
2012 & \(2,377,461.89\) & 998,534 & 998,404 & \(1,379,058\) & 14.50 & 95,107 \\
2013 & \(1,677,887.50\) & 637,597 & 637,514 & \(1,040,374\) & 15.50 & 67,121 \\
2014 & \(1,169,820.44\) & 397,739 & 397,687 & 772,133 & 16.50 & 46,796 \\
2015 & \(1,372,966.46\) & 411,890 & 411,837 & 961,129 & 17.50 & 54,922 \\
2016 & \(2,929,954.18\) & 761,788 & 761,689 & \(2,168,265\) & 18.50 & 117,204 \\
2017 & \(1,388,523.37\) & 305,475 & 305,435 & \(1,083,088\) & 19.50 & 55,543 \\
2018 & \(1,592,694.53\) & 286,685 & 286,648 & \(1,306,047\) & 20.50 & 63,710 \\
2019 & \(2,767,616.97\) & 387,466 & 387,416 & \(2,380,201\) & 21.50 & 110,707 \\
2020 & \(2,052,350.45\) & 205,235 & 205,209 & \(1,847,141\) & 22.50 & 82,095 \\
2021 & \(1,102,434.89\) & 66,146 & 66,137 & \(1,036,298\) & 23.50 & 44,098 \\
2022 & \(1,577,766.00\) & 31,555 & 31,551 & \(1,546,215\) & 24.50 & 63,111 \\
& & & & & & \\
& \(29,883,989.50\) & \(10,638,883\) & \(10,637,500\) & \(19,246,490\) & & \(1,195,504\)
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 395 LABORATORY EQUIPMENT
    CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL

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\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{rrrrrrr}
2005 & \(139,720.05\) & 122,255 & 122,247 & 17,473 & 2.50 & 6,989 \\
2006 & \(58,532.76\) & 48,290 & 48,287 & 10,246 & 3.50 & 2,927 \\
2008 & 845.29 & 613 & 613 & 232 & 5.50 & 42 \\
2009 & \(31,479.93\) & 21,249 & 21,248 & 10,232 & 6.50 & 1,574 \\
2010 & \(516,042.61\) & 322,527 & 322,507 & 193,536 & 7.50 & 25,805 \\
2011 & \(42,334.35\) & 24,342 & 24,340 & 17,994 & 8.50 & 2,117 \\
2012 & \(428,035.95\) & 224,719 & 224,705 & 203,331 & 9.50 & 21,403 \\
2013 & \(67,929.97\) & 32,267 & 32,265 & 35,665 & 10.50 & 3,397 \\
2015 & \(242,718.47\) & 91,019 & 91,014 & 151,704 & 12.50 & 12,136 \\
2017 & \(181,601.91\) & 49,941 & 49,938 & 131,664 & 14.50 & 9,080 \\
2018 & \(65,052.04\) & 14,637 & 14,636 & 50,416 & 15.50 & 3,253 \\
& & & & & & \\
& & & & & & 851,800
\end{tabular}
CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
\begin{tabular}{ccccccc} 
& ORIGINAL & CALCULATED & ALLOC. BOOK & FUTURE BOOK & REM. & ANNUAL \\
YEAR & COST & ACCRUED & RESERVE & ACCRUALS & LIFE & ACCRUAL \\
\((1)\) & \((2)\) & \((3)\) & \((4)\) & \((5)\) & \((6)\) & \((7)\)
\end{tabular}

SURVIVOR CURVE.. 15-SQUARE
\begin{tabular}{rrrrrrr}
2008 & \(4,225,955.80\) & \(4,085,105\) & \(4,034,532\) & 191,424 & 0.50 & 191,424 \\
2009 & \(4,102,141.10\) & \(3,691,927\) & \(3,646,221\) & 455,920 & 1.50 & 303,947 \\
2010 & \(557,365.17\) & 464,469 & 458,719 & 98,646 & 2.50 & 39,458 \\
2011 & \(4,340,229.69\) & \(3,327,524\) & \(3,286,329\) & \(1,053,901\) & 3.50 & 301,115 \\
2012 & \(4,819,734.12\) & \(3,373,814\) & \(3,332,046\) & \(1,487,688\) & 4.50 & 330,597 \\
2013 & \(8,143,219.35\) & \(5,157,345\) & \(5,093,497\) & \(3,049,722\) & 5.50 & 554,495 \\
2014 & \(2,275,528.91\) & \(1,289,474\) & \(1,273,510\) & \(1,002,019\) & 6.50 & 154,157 \\
2015 & \(13,005,614.18\) & \(6,502,807\) & \(6,422,303\) & \(6,583,311\) & 7.50 & 877,775 \\
2016 & \(11,888,517.73\) & \(5,151,651\) & \(5,087,874\) & \(6,800,644\) & 8.50 & 800,076 \\
2017 & \(1,458,922.84\) & 534,943 & 528,320 & 930,603 & 9.50 & 97,958 \\
2018 & \(3,264,861.41\) & 979,458 & 967,332 & \(2,297,529\) & 10.50 & 218,812 \\
2019 & \(7,068,399.18\) & \(1,649,270\) & \(1,628,853\) & \(5,439,546\) & 11.50 & 473,004 \\
2020 & \(792,914.98\) & 132,155 & 130,519 & 662,396 & 12.50 & 52,992 \\
2021 & \(3,487,151.85\) & 348,715 & 344,398 & \(3,142,754\) & 13.50 & 232,797 \\
2022 & \(1,906,217.00\) & 63,534 & 62,747 & \(1,843,470\) & 14.50 & 127,136 \\
& & & & & & \\
\\
& 71,336,773.31 & \(36,752,191\) & \(36,297,200\) & \(35,039,573\) & & \(4,755,743\)
\end{tabular}
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                                    DUQUESNE LIGHT COMPANY
            ACCOUNT 101 AND 106 ELECTRIC PLANT IN SERVICE
                    ACCOUNT 398 MISCELLANEOUS EQUIPMENT
                        CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
                RELATED TO ORIGINAL COST AS OF DECEMBER 31, 2022
    ```
(1)

ORIGINAL COST
(2)

\section*{CALCULATED}
(3)

ALLOC. BOOK RESERVE
(4)

FUTURE BOOK REM ACCRUALS
(5)

ANNUAL
LIFE ACCRUAL
(6)
(7)

SURVIVOR CURVE.. 20-SQUARE
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline 2004 & 60,334.98 & 55,810 & 55,811 & 4,524 & 1.50 & 3,016 \\
\hline 2005 & 45,054.60 & 39,423 & 39,424 & 5,631 & 2.50 & 2,252 \\
\hline 2006 & 36,150.54 & 29,824 & 29,824 & 6,327 & 3.50 & 1,808 \\
\hline 2007 & 351.23 & 272 & 272 & 79 & 4.50 & 18 \\
\hline 2015 & 10,621.54 & 3,983 & 3,983 & 6,639 & 12.50 & 531 \\
\hline & 152,512.89 & 129,312 & 129,314 & 23,199 & & 7,625 \\
\hline
\end{tabular}

\section*{PART III. EXPERIENCED AND ESTIMATED NET SALVAGE}

\section*{EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE}
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2018 TRANSACTION YEAR
\begin{tabular}{rrrrr}
352.00 & \(48,329.79\) & \(1,620.85\) & & \(1,620.85-\) \\
353.00 & \(3,138,131.87\) & \(934,401.09\) & \(1,999.55\) & \(932,401.54-\) \\
355.00 & \(3,803.03\) & \(1,037.79\) & & \(1,037.79-\) \\
356.00 & \(3,819.27\) & \(44,180.18\) & & \(44,180.18-\) \\
362.00 & \(1,700,184.77\) & \(652,537.25\) & \(6,716.85\) & \(645,820.40-\) \\
364.11 & \(8,815,643.61\) & \(4,527,343.88\) & \(677,169.04\) & \(3,850,174.84-\) \\
365.01 & \(10,674,256.33\) & \(1,400,699.74\) & \(1,949,544.69\) & \(548,844.95\) \\
366.00 & \(227,644.37\) & \(43,443.69\) & & \(43,443.69-\) \\
367.00 & \(7,741,079.25\) & \(1,016,492.94\) & \(2,259,047.98\) & \(1,242,555.04\) \\
368.00 & \(10,307,824.66\) & \(1,180,118.90\) & \(756,447.63\) & \(423,671.27-\) \\
369.20 & \(1,045,988.52\) & \(1,401,663.80\) & & \(1,401,663.80-\) \\
370.00 & \(25,943,853.96\) & \(277,982.71\) & & \(277,982.71-\) \\
373.00 & \(573,911.34\) & \(39,295.93\) & & \(39,295.93-\) \\
390.10 & \(17,350.21\) & & & \(111,353.20\) \\
392.00 & \(1,902,741.55\) & \(86,300.00-\) & \(25,053.20\) & \\
396.00 & \(302,297.30\) & & & \\
397.00 & \(2,171,279.67\) & & & \\
& \(74,618,139.50\) & \(11,434,518.75\) & \(5,675,978.94\) & \(5,758,539.81-\)
\end{tabular}

2019 TRANSACTION YEAR
\begin{tabular}{rrrrr}
353.00 & \(2,208,563.66\) & \(580,806.30\) & & \(580,806.30-\) \\
354.00 & \(645,954.25\) & & & \(196,952.91-\) \\
356.00 & \(45,999.22\) & \(196,952.91\) & & \\
357.00 & \(16,636.40\) & & & \(65,630.63-\) \\
358.00 & \(98,482.01\) & & & \(1,470,386.84-\) \\
361.00 & \(56,242.55\) & \(65,630.63\) & & \(2,931,615.48-\) \\
362.00 & \(2,079,989.64\) & \(1,470,386.84\) & \(1,038,461.30\) & \(923,300.55-\) \\
364.11 & \(6,412,418.85\) & \(3,970,076.78\) & \(1,05,140.59-\) \\
365.01 & \(7,649,870.57\) & \(2,512,801.50\) & \(1,589,500.95\) & \(920,289.46-\) \\
366.00 & \(61,452.20\) & \(65,140.59\) & & \(1,032,632.06-\) \\
367.00 & \(5,757,578.07\) & \(1,565,025.76\) & \(644,736.30\) & \(1,377,092.11-\) \\
368.00 & \(9,099,589.71\) & \(1,633,372.56\) & \(600,740.50\) & \(5,317.56-\) \\
369.20 & \(318,642.04\) & \(1,377,092.11\) & & \(8,466.59-\) \\
370.00 & \(235,499.28\) & \(5,317.56\) & & \(11,905.33-\) \\
373.00 & \(1,701,296.30\) & \(43,204.27\) & & \(167,665.00\) \\
390.10 & \(40,650.34\) & \(8,466.59\) & & \\
390.20 & \(10,174.02\) & \(11,905.33\) & & \(137,295.00\) \\
392.00 & \(1,997,054.93\) & \(30,370.00-\) & & \\
396.00 & \(97,970.01\) & & & \\
397.00 & \(5,893,626.21\) & & & \\
& \(4,427,690.26\) & \(13,475,809.73\) & \(4,010,734.05\) & \(9,465,075.68-\)
\end{tabular}

\section*{EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE}
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2020 TRANSACTION YEAR
\begin{tabular}{|c|c|c|c|c|}
\hline 352.00 & 24,188.90 & 41,009.59 & 992.28 & 40,017.31- \\
\hline 353.00 & 3,671,416.21 & 897,620.21 & 8,206.17 & 889,414.04- \\
\hline 354.00 & 708,579.61 & 38,063.05 & & 38,063.05- \\
\hline 355.00 & 19,494.35 & 4,469.59 & & 4,469.59- \\
\hline 356.00 & 148,576.23 & 229,134.07 & & 229,134.07- \\
\hline 361.00 & 71,671.51 & 32,484.63 & & 32,484.63- \\
\hline 362.00 & 4,274,291.09 & 1,399,570.05 & & 1,399,570.05- \\
\hline 364.11 & 2,187,353.77 & 4,245,098.45 & 860,073.01 & 3,385,025.44- \\
\hline 365.01 & 4,183,197.74 & 2,379,647.12 & 1,336,981.27 & 1,042,665.85- \\
\hline 366.00 & 172,634.86 & 62,809.75 & & 62,809.75- \\
\hline 367.00 & 4,323,718.86 & 1,589,410.99 & 874,677.23 & 714,733.76- \\
\hline 368.00 & 4,839,314.97 & 1,618,214.51 & 457,751.16 & 1,160,463.35- \\
\hline 369.20 & & 1,004,737.81 & & 1,004,737.81- \\
\hline 370.00 & 33,617.81 & 491.12 & & 491.12- \\
\hline 373.00 & 1,288,041.69 & 18,578.66 & & 18,578.66- \\
\hline 390.10 & 7,113.61 & 28,867.79 & & 28,867.79- \\
\hline 390.20 & 10,174.02 & & & \\
\hline 392.00 & 2,298,354.30 & 74,667.98 & 273,931.47 & 199,263.49 \\
\hline 396.00 & 111,968.47 & 4,772.94 & 17,510.25 & 12,737.31 \\
\hline 397.00 & 10,276,213.83 & 245.02 & & 245.02- \\
\hline & 38,649,921.83 & 13,669,893.33 & 3,830,122.84 & 9,839,770.49- \\
\hline
\end{tabular}

2021 TRANSACTION YEAR
\begin{tabular}{rrrrr}
352.00 & \(17,028.69\) & \(18,022.74\) & 242.50 & \(17,780.24-\) \\
353.00 & \(7,614,504.69\) & \(2,160,774.13\) & \(125,729.15\) & \(2,035,044.98-\) \\
354.00 & \(1,033,507.72\) & \(32,636.39\) & & \(32,636.39-\) \\
356.00 & \(235,575.72\) & \(481,563.75\) & \(20,665.85\) & \(460,897.90-\) \\
361.00 & \(98,315.22\) & \(71,550.70\) & 8.74 & \(71,541.96-\) \\
362.00 & \(5,408,321.27\) & \(3,169,284.90\) & \(24,876.80\) & \(3,144,408.10-\) \\
364.11 & \(5,250,374.23\) & \(3,569,697.20\) & \(904,716.43\) & \(2,664,980.77-\) \\
365.01 & \(8,062,540.06\) & \(2,717,813.30\) & \(1,705,044.35\) & \(1,012,768.95-\) \\
366.00 & \(2,751,251.63\) & \(291,067.89\) & \(285,176.01\) & \(5,891.88-\) \\
367.00 & \(2,964,357.93\) & \(567,578.38\) & \(536,137.64\) & \(31,440.74-\) \\
368.00 & \(9,133,960.38\) & \(1,659,852.69\) & \(998,771.24\) & \(661,081.45-\) \\
369.20 & \(2,550,842.31\) & \(7,204,395.59\) & & \(7,204,395.59-\) \\
370.00 & \(278,074.50\) & \(1,221.16\) & & \(1,221.16-\) \\
373.00 & \(775,340.88\) & \(32,419.17\) & & \(32,419.17-\) \\
392.00 & \(4,157,972.17\) & \(23,659.05-\) & \(266,027.12\) & \(289,686.17\) \\
397.00 & \(6,517,245.72\) & 68.02 & & \(68.02-\) \\
& & & & \\
& \(56,849,213.12\) & \(21,954,286.96\) & \(4,867,395.83\) & \(17,086,891.13-\)
\end{tabular}

EXPERIENCED AND ESTIMATED RETIREMENTS BY ACCOUNT AND ASSOCIATED COST OF REMOVAL, GROSS SALVAGE, AND NET SALVAGE
\begin{tabular}{ccccc} 
& REGULAR & COST OF & GROSS & NET \\
ACCT & RETIREMENTS & REMOVAL & SALVAGE & SALVAGE
\end{tabular}

2022 TRANSACTION YEAR
\begin{tabular}{rrrrr}
353.00 & \(5,324,749.51\) & \(1,511,008.46\) & \(87,921.18\) & \(1,423,087.28-\) \\
354.00 & \(857,161.29\) & \(27,067.68\) & & \(27,067.68-\) \\
355.00 & \(43,894.51\) & \(12,429.29\) & & \(12,429.29-\) \\
356.00 & \(1,099,067.33\) & \(2,246,712.82\) & \(96,415.54\) & \(2,150,297.28-\) \\
358.00 & \(266,730.80\) & \(47,226.21\) & \(47,226.21\) & \\
361.00 & \(134,416.66\) & \(97,824.19\) & 11.95 & \(97,812.24-\) \\
362.00 & \(1,723,469.08\) & \(1,009,955.63\) & \(7,927.49\) & \(1,002,028.14-\) \\
364.11 & \(4,635,551.19\) & \(3,151,682.79\) & \(798,773.41\) & \(2,352,909.38-\) \\
365.01 & \(6,976,617.12\) & \(2,351,757.96\) & \(1,475,396.28\) & \(876,361.68-\) \\
366.00 & \(1,494,231.00\) & \(158,081.75\) & \(154,881.81\) & \(3,199.94-\) \\
367.00 & \(3,761,856.60\) & \(720,273.50\) & \(680,374.29\) & \(39,899.21-\) \\
368.00 & \(7,716,888.14\) & \(1,402,337.76\) & \(843,818.63\) & \(558,519.13-\) \\
369.20 & \(2,409,987.12\) & \(6,806,575.40\) & & \(6,806,575.40-\) \\
370.00 & \(279,720.47\) & \(1,228.39\) & & \(1,228.39-\) \\
373.00 & \(779,440.80\) & \(32,590.60\) & & \(32,590.60-\) \\
392.00 & \(4,157,972.17\) & \(23,659.05-\) & \(266,027.12\) & \(289,686.17\) \\
397.00 & \(1,703,443.26\) & 17.78 & & \(17.78-\) \\
& & & & \\
& \(43,365,197.05\) & \(19,553,111.16\) & \(4,458,773.91\) & \(15,094,337.25-\)
\end{tabular}

BEFORE THE

\section*{PENNSYLVANIA PUBLIC UTILITY COMMISSION}

\section*{Docket No. R-2021-3024750}

\section*{Duquesne Light Company}

Statement No. 2-R

Rebuttal Testimony of Jaime A. Bachota

Dated: July 26, 2021

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\section*{Q. Please state your full name, business affiliation and address.}
A. My name is Jaime A. Bachota. I am the Assistant Controller of Duquesne Light Company ("Duquesne Light" or the "Company"). My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. Did you pre viously submit testimony in this proceeding on behalf of Duquesne Light Company?
A. Yes I did. I submitted my direct testimony (Statement No. 2) on April 8, 2021.

\section*{Q. What is the purpose of your rebuttal testimony?}
A. My rebuttal testimony responds to portions of the direct testimony of the following witnesses:
- Office of Consumer Advocate ("OCA") witnesses Lafayette K. Morgan as to operation and maintenance expense adjustments, CloudBased Software Implementation Costs, Capitalized Pension Adjustment and COVID-Related Regulatory Assets.
- Bureau of Investigation \& Enforcement ("I\&E") witnesses Christopher Keller and Christine Wilson as to operation and maintenance expense adjustments and COVID-19 related costs.
- Natural Resources Defense Council ("NRDC") witness Amanda Levin as to COVID-19 related costs.

The order in which I will address the issues raised by these witnesses is outlined in the table of contents to this testimony.

\section*{II. Operating Income Elements}

\section*{Operating and Maintenance Expenses}

\section*{Q. Please describe the Company's claim for rate case expense.}
A. Included in the Company's proposed revenue requirement is a claim for prudent rate case filing expenses to be normalized and recovered over a three-year period.
Q. What was I\&E Witness Keller's recommendation related to rate case filing expenses?
A. On page 6 of Mr. Keller's direct testimony he recommends a 43-month normalization period.
Q. Do you agree with I\&E Witness Keller's proposal to incre ase the normalization period to \(\mathbf{4 3}\) months?
A. No. Please see rebuttal testimony of Mr. Robert O'Brien for further discussion as to why we believe that the three-year normalization is appropriate.
Q. Please describe the Company's claim in the Fully Projected Future Test Year ("FPFTY") for salary and wage expense?
A. Included in the Company's direct claim in the FPFTY were salary and wage expenses of \(\$ 93,662,000\). This claim is based on budgeted salary and wages for the FPFTY with adjustments for anticipated wage increases and for anticipated vacancies.
Q. What assertions did I\&E Witness Keller and OCA Witness Morgan make in their direct testimony about the Company's salary and wage expense?
A. Mr. Keller, on pages 10 and 11 of his direct testimony, and Mr. Morgan on page 20 asserted that the Company's proposed claim does not accurately represent what the Company will pay in the twelve months that make up the FPFTY. Mr. Keller and Mr. Morgan propose to remove all annualization adjustments made by the Company in the FPFTY in order to reflect the anticipated amount to be incurred during that period. Mr. Keller and Mr. Morgan have also reduced the staffing levels requested by the Company based upon historical vacancy records. Mr. Keller recommends a reduction to FPFTY salary and wage expense of \(\$ 2,490,000\). Mr. Morgan recommends a reduction to FPFTY salary and wage expense of \(\$ 4,878,000\).
Q. Do you agree with I\&E Witness Keller's and OCA Witness Morgan's proposal to remove the annualization of salary and wage expense in the FPFTY?
A. No, I do not. Please see the rebuttal testimony of Robert L. O'Brien for further discussion of why we believe annualizing adjustments are appropriate.
Q. What assertions about the Company's vacancy levels did I\&E Witness Keller make in his direct testimony?
A. Mr. Keller asserted on page 13 of his direct testimony that the Company's vacancy reserve of 100 that was included in the FPFTY claim is not adequate. Mr. Keller calculated an average monthly vacancy rate of 132 positions for the period from January 2018 to March 2021. Mr. Keller then multiplied the additional 32 vacancies ( 132 vacancies less the 100 vacancies included in the Company's FPFTY claim) by an average salary to arrive at a recommended reduction to distribution salary and wage expense of \(\$ 1,489,000\). Mr. Keller's assertion would project 1,610 employees in FPFTY (I\&E St. No. 2, pp. 13-14).
Q. What assertions about the Company's vacancy levels did OCA Witness Morgan make in his direct testimony?
A. Mr. Morgan also questioned the Company's vacancy reserve of 100. He proposed to instead use the Company's actual average vacancies during the HTY, 2020, which produced a proposed reduction in payroll expense of \(\$ 2,689,000\) (as well as consequent adjustments to 401k expense and payroll tax expense, which I discuss separately below). Mr. Morgan's calculation would project 1,594 employees in the FPFTY (OCA St. 1, p. 21; Exhibit LKM-9).

\section*{Q. Do you agree with I\&E Witness Keller's or OCA Witness Morgan's calculation of expected vacancies during the FPFTY?}
A. No, I do not. There are several reasons why their calculations are not appropriate to use as a basis for the number of vacancies in the FPFTY. The COVID-19 pandemic substantially impacted the Company's operations starting in March of
2020. As a result of this unexpected event, the Company elected to defer the hiring of personnel so as to generate cash flows to fund the Company's infrastructure investment program. The Company's HTY vacancy levels were therefore not representative of future levels. \({ }^{1}\) Second, the Company has demonstrated its projections are accurate or even slightly conservative. In the Company's last filed base distribution rate case (Docket No. R-2018-3000124), the Company's claim included a projected 1,582 employees as of the end of the FPFTY. At the time the Company filed rebuttal testimony in that proceeding, the Company had 1,504 employees. As of the end of the FPFTY used in that proceeding, the Company's actual headcount was 1,584 employees, more than projected.

\section*{Q. Why do you expect the Company to add additional people to its employee complement during the second half of the FTY and throughout the FPFTY? The Company's current headcount as of the end of June 2021 is 1,577 employees. The Company projects to be at 1,642 employees by the end of the FTY. Of the 65 positions to be filled, 21 have been awarded as part of the Company's Electrical Distribution Technology ("EDT") program. These students will commence employment in August 2021. The remainder of the open positions are actively being recruited. Taking into account the EDT hires, through June 2021 the Company has increased its headcount by 14 employees since the end of the HTY. By simply continuing to hire at the Company's historical pace as well as implementing additional retention strategies, the Company's headcount will approximate where we expected to be from a headcount perspective as of the end of the FPFTY.}

\section*{Q. Did I\&E Witness Keller propose any other adjustments in his direct testimony related to his adjustment to salary and wages?}

\footnotetext{
\({ }^{1}\) In addition, Mr. Morgan does not adequately explain his analysis. He states that he determined that the Company's "actual number of vacancies exceed the number of vacancies reflected in the vacancy factor in every month" for the period January 2018 through March 2021. However, he did not explain whether or how this analysis supports his decision to use the HTY as the bas is for his recommendation.
}
A. Yes, he did. Mr. Keller has recommended a reduction in the Company's payroll tax expense, health insurance expense and 401k expense claims based upon recognition of the adjustments that he made to the Company's salary and wage expense claim. Mr. Keller multiplied his adjustment to salary and wage expense of \(\$ 2,490,000\) by an implied payroll tax rate of \(8.9 \%\). This calculation produced a reduction to FPFTY payroll taxes of \(\$ 222,000\). Mr. Keller multiplied his adjustment to headcount of 32 employees by an implied average health insurance expense per employee of \(\$ 4,085\). This calculation produced a reduction to FPFTY health insurance expense of \(\$ 131,000\). Mr. Keller has multiplied his adjustment of \(\$ 5,243,000\) by an implied 401 k expense rate of \(6.8 \%\). This calculation produced a reduction to FPFTY 401k expense of \(\$ 169,000\).

\section*{Q. Did OCA Witness Morgan propose any other adjustments in his direct testimony related to his adjustment to salary and wages?}
A. Yes. Like Mr. Keller, Mr. Morgan utilized the same basic approach as Mr. Keller but arrived at a different revised headcount number. Mr. Morgan recommends reductions to the Company's payroll tax expense and 401k expense, which he premised on his proposal to adjust the Company's vacancy factor to match the Company's actual average vacancies during the HTY (2020). Mr. Morgan's approach yielded proposed reductions in the Company's payroll tax expense of \(\$ 373,000\) and 401k expense of \(\$ 244,000\) (OCA St. 1, p. 21, lines 9-23).

\section*{Q. Do you agree with I\&E Witness Keller's or OCA Witness Morgan's proposed adjustments?}
A. No, I do not. I do not believe an adjustment is necessary in relation to Mr. Keller's and Mr. Morgan's adjustments of FPFTY salary and wage amounts as previously discussed in this testimony. Accordingly, their corresponding adjustments to payroll tax expense, health insurance expense or 401k expense have no merit.
Q. What is the Company's claim regarding incentive compensation expense?
A. Included in the Company's distribution claim in the FPFTY was incentive compensation expense of \(\$ 10,607,000\). The Company's claim is based on budgeted incentive compensation levels calculated on an employee by employee basis, taking into account each employee's expected salary, short term incentive payout percentage and long-term incentive award target amount.

\section*{Q. What assertions did I\&E Witness Keller make in his direct testimony about the Company's incentive compensation claim?}
A. Mr. Keller asserts that the Company's claim should be based upon a three-year historical average of incentive compensation payouts (I\&E St. No. 2, p. 17). Mr. Keller proposes this adjustment based upon the premise that not all goals will be met each and every year and that using a prior three year average for the years 2018, 2019 and 2020 provides a more supported and realistic incentive compensation amount. Mr. Keller's adjustment results in a reduction of \(\$ 2,967,000\) to the Company's total incentive compensation expense claim (I\&E St. No. 2, p.18).

\section*{Q. Do you agree with the adjustment that I\&E Witness Keller has proposed?}
A. No, I do not. Mr. Keller's calculation is not an accurate estimate of incentive compensation amounts to be paid to employees in the FPFTY. Incentive compensation payments are based upon a variety of factors, most of which are ignored in Mr. Keller's calculated adjustment.
Q. Please explain why using a historical average of Short Term Incentive Plan ("STIP") expenses would not yield an appropriate estimate for the FPFTY? Our STIP is based upon a percentage of salary target as determined by each eligible employees' job level. For instance, a supervisor with a salary of \(\$ 100,000\) would have a STIP target percentage of \(10 \%\) or \(\$ 10,000\). The STIP payout is then determined by Company Key Performance Indicators ("KPI") and earnings performance, as well as each individual employees' performance during the year. In the historical period utilized by Mr. Keller in his estimate, several
factors impact payout amounts. The Company also adjusted its STIP plan to put additional emphasis on individual employee performance. And lastly, between the end of 2018 and the end of 2020, non-union employees have increased from 701 to 763. This increase in employees has increased the number of participants in the STIP plans. These factors are not taken into account in Mr. Keller's calculation and therefore his calculation should be rejected.
Q. Please explain why using a historical ave rage of Long Term Incentive Plan ("LTIP") expenses would not yield an appropriate estimate for the FPFTY?
A. In conformity with generally accepted accounting principles in the United States ("GAAP"), the Company is required to expense multiyear compensation plans ratably over the plan period. The Company's LTIP program is based on annual grants with an associated 3 years performance period; LTIP payouts are based on cumulative calculations at the end of the 3 -year performance period. In any given year, there can be as many as three plans outstanding. While the structure of the LTIP plan has not changed in the period Mr. Keller is using for his calculation, the make-up of the LTIP has been inconsistent in the 3-years that Mr. Keller is using. In each of the years, the Company's executive team was missing key positions which understated incentive compensation.
Q. Does the Company budget incentive compensation amounts assuming that all targets are met?
A. No, we do not. STIP amounts are budgeted at \(90 \%\) of targeted amounts. LTIP amounts are budgeted at \(100 \%\) of targeted amounts. However, both incentive plans allow a participant to earn above the targeted compensation amount.

\section*{Q. What assertion does OCA Witness Morgan make regarding the Company's incentive compensation claim?}
A. Mr. Morgan is recommending to remove the portion of incentive plan costs that are associated with earnings goals or increasing earnings (OCA St. No. 1, pp 2223). He is asserting that these types of goals are targeted towards increasing
shareholder value and therefore not properly recoverable from ratepayers. Mr. Morgan concludes that a reduction to FPFTY incentive compensation expenses of \(\$ 6,695,000\) is warranted.

\section*{Q. Do you agree with the adjustment OCA Witness Morgan has proposed?}
A. No, I do not. As an initial matter, I note that Duquesne Light's incentive compensation program as a whole includes both financial and operating metrics and goals which benefit customers. The overall plan includes safety, reliability and customer service metrics which improve the operational effectiveness of the Company. Eligible employees are all responsible for customer service, regulatory compliance and/or ensuring safe and reliable service to customers. Moreover, the achievement of financial goals provides important and direct benefits to customers. Consistent financial performance will allow the Company to place debt in capital markets at reasonable rates. In addition, good financial performance provides an internal source of capital which reduces the need to go to the capital markets for financing. It also can defer the need to file for rate increases and reduce the amount of any requested rate increase. The inclusion of financial goals also helps to ensure there are sufficient funds to pay incentives. Clearly, achievement of these financial goals is a direct benefit to customers, and therefore should be fully reflected in rates. In addition, those employees eligible to receive incentive compensation under these plans are key in the process of establishing the operating and customer-focused goals for the Company, and are a driving force behind ensuring that these goals are achieved.

The use of incentive compensation to drive results is standard business practice. It helps to attract and retain talented personnel and to incent personnel to make decisions that enhance operational and financial results. The focus on financial results benefits the rate payer as it incentivizes management to manage the business efficiently and effectively. To further emphasize the value of incentive programs generally, it must be recognized that incentive compensation is only one part of the Company's total compensation package, which is market driven, reasonable, and appropriate. Compensation is an integral cost of doing
business and fundamental to attracting, hiring, motivating, and retaining talent at the Company. Incentive compensation is a normal cost of doing business and, therefore, should be fully reflected in rates.

If the Company did not have incentive compensation, it would have to increase the level of its base salary compensation in order to remain competitive with other employers to attract qualified candidates. This too would increase costs to customers and would eliminate the benefits of incentive compensation described above. If the Company were not to pay competitively, it would increase its risk of not attracting, hiring, motivating, and retaining the Company's talent. This would lead to reduced quality of service due to increased turnover and higher costs of recruiting, hiring and training which could result in increased cost to customers. Incentive compensation is an element of employee pay that is contingent upon performance or the results achieved. This pay is considered "at risk" for each performance period, requiring sustained performance to receive this reward.

For these reasons, Mr. Morgan's adjustment should be rejected.

\section*{Q. What recommendation did I\&E Witness Wilson recommend regarding the Company's claim for pension expense?}
A. Ms. Wilson recommends that the Company include disregarded language from the Company's 2018 Commission order (Docket No. R-2018-3000124).

\section*{Q. Do you agree with Witness Wilson's recommendation?}
A. Yes, I do. As I clarified in discovery and Witness Wilson acknowledges in her direct testimony (I\&E St. 1, p. 7, lines 7-10), this language was inadvertently left out of my original testimony and should be included in the resolution of this case.

\section*{Q. What recommendation did OCA Witness Morgan make for postretirement benefits expense?}
A. Mr. Morgan asserts that the amount that the Company is utilizing for other postretirement benefits expense ("OPEBs") is not derived from the 2-year average

OPEB expense as previously discussed in my direct testimony. Mr. Morgan recommends an adjustment to reduce OPEB expense by \(\$ 318,000\) which reflects the average of the two most recent historical years (OCA St. No 1, p. 23).

\section*{Q. Do you agree with OCA Witness Morgan's recommendation?}
A. No, I do not. In my prior testimony, it is stated that the Company's claim for OPEB expenses is as follows: "The Company has incorporated a two year average into its ratemaking calculations for the portion of actuarially determined net periodic cost for postretirement benefits that will be recovered as an expense for ratemaking purposes. Two years was selected to be consistent with the treatment in its last distribution rate case settlement." (DLC St. 2, p. 36, lines 1620.) In addition, "Any difference between the annual book accrual and the ratemaking allowance will be deferred and amortized over a reasonable period as an increase or decrease to the rate allowance for OPEBs in the next rate proceeding. This procedure is consistent with the Commission's requirement that the rate allowance be placed in the trust without regard to the actual annual accrual. As of December 31, 2020, the Company had recorded a regulatory liability of approximately \(\$ 2.0\) million related to OPEBs. The Company has amortized this amount over a three year period in its ratemaking calculations." (DLC St. 2, p. 37, lines 4-13.) Mr. Morgan's recommendation does not take into account the regulatory liability portion which represents the difference between actual book accruals and the ratemaking allowance. As part of preparation for rebuttal, the Company performed a true up of its OPEB expense claim which warranted a further credit of the distribution portion of the OPEB expense claim of \(\$ 68,000\). See rebuttal adjustments within Mr. Robert O'Brien's rebuttal testimony.

\section*{II. Cloud Based Software Implementation Costs, AFUDC, and Rate Base Reporting}

\section*{Q. What concerns did OCA Witness Morgan have regarding the Company's inclusion of cloud-based implementation costs in the Company's claim?}
A. Mr. Morgan cites 3 main concerns associated with the Company's claim (OCA St. No. 1, pp 8-10). His allegations concern: 1 . Cloud based implementation costs are recorded as operating expenses and no adjustment was made to operating expenses in the Company's claim, 2. The adoption of the FERC's accounting directive and the impact on the Company's claim and 3. Rate base is overstated or operating expenses are overstated.

\section*{Q. Do you agree with the concerns that Mr. Morgan cites in his testimony?}
A. No, I do not. On the first concern regarding the recording of cloud-based implementation costs, these costs are originally included within operating expenses but then are adjusted to a regulatory asset account which is in compliance with the Commission's Order in the 2018 rate case (R-20183000124). As these amounts are already removed from the operating expenses there is no need for an adjustment by Mr. O'Brien.

Secondly, the Company did adopt the FERC's accounting for FERC reporting purposes, but not for GAAP purposes as the Company's previous settlement agreement allows for regulatory asset treatment for cloud-based implementation costs. The adjustment from the regulatory asset to rate base is only performed as an adjustment for ratemaking purposes and the Company's books and records show these amounts as a regulatory asset. As such, the Company needed to make this ratemaking adjustment (as prescribed in the last case's settlement) in order to get the cloud-based implementation costs and related depreciation impacts into rate base. However, due to the issuance of GAAP guidance (ASU 2018-15) subsequent to the Company's rate case settlement agreement, cloud base costs would now be included in rate base without regulatory asset treatment.

Last, based on the above discussion, the Company is not double counting the cloud-based implementation costs in its operating expenses and is properly recording them within rate base for ratemaking purposes.

\section*{Q. Do you agree with OCA Witness Morgan's recommendation?}
A. No, I do not. The Company cannot elect to capitalize cloud-based information system implementation costs under GAAP without the Company-proposed language. The accounting rules do not allow it. However, the Company agrees that the prudency of these costs should be reviewed at each rate proceeding. If the costs are not deemed to be prudent, the Company will not be permitted to recover them. However, if the Company is not permitted to capitalize these costs, it runs the risk of not collecting them. The Company also believes deferring these costs as a regulatory asset will reduce the volatility on earnings that may exist as amounts are reclassified from expense to capital in conjunction with each base rate case proceeding.

\section*{Q. What recommendation does OCA Witness Morgan related to AFUDC on Land Held for Future Use?}
A. Mr. Morgan requests that the Commission not allow the Company to accrue AFUDC on land held for future use (OCA St. No. 1, p. 28).

\section*{Q. Do you agree with OCA Witness Morgan's Recommendation?}
A. No, I do not. Per FERC Accounting Release No. 5, "Capitalization of Interest During Construction" (AR-5 Revised).

> The capitalization period for AFUDC begins when two conditions are present: (1) capital expenditures for the project have been incurred; and (2) activities that are necessary to get the construction project ready for its intended use are in progress. AFUDC capitalization shall continue as long as these two conditions are present. The term "activities" is to be construed broadly and includes all the actions required to prepare the construction project for its intended use, including activities prior to physical construction, such as the development of plans or the process of obtaining permits from governmental authorities.

AFUDC on land and land rights is part of the cost of constructing a new facility, and as such, these costs should be capitalized as part of the construction cost of the facility to be recovered through depreciation rather than as part of the
cost of the land which is not depreciated. Accordingly, AFUDC accrued on the cost of land and land rights is transferred to the related construction project as part of the cost of the facility constructed. This transfer is made when the facility being constructed is placed in-service. In some circumstances, the Company needs to secure land in critical areas for future use which ultimately saves customers money over the long-term. As the Company is able to justify the time between the purchase of land and the construction as being reasonable based upon the above discussion, AFUDC treatment on land is allowable under AR-5 (Revised).

\section*{Q. What does I\&E Witness Kubas recommend regarding plant additions that the Company projects to be in service during the FTY and FPFTY? \\ A. Mr. Kubas recommends that the Company provide the Commission's Bureaus of Technical Utility Services and Investigation and Enforcement with an update to DLC Exhibit No. 2, Book 6, Schedule C-2, pages 1-4 no later than April 1, 2022, including an update to actual capital expenditures, plant additions and retirements by month from January 1, 2021 through December 31, 2021 (DLC Exhibit No. 2, Book 5, Schedule C-2, pages 1-4) and an additional update for actuals from January 1, 2022 through December 31, 2022, no later than April 1, 2023 (I\&E St. No. 4, pp 7-8).}

\section*{Q. Do you agree with I\&E Witness Kubas' recommendation?}
A. Mr. Kubas does not identify any authority that would obligate the Company to provide the requested updates. Nevertheless, the Company agrees to provide the Commission's Bureaus of Technical Utility Services and Investigation and Enforcement with an update to DLC Exhibit No. 2, Schedule C-2, page 3, no later than April 1, 2022, including actual plant additions and retirements by month from January 1, 2021 through December 31, 2021 and an additional update for actuals from January 1, 2022 through December 31, 2022, no later than April 1, 2023.

\section*{Q. What assertion did I\&E Witness Keller make in relation to the Company's advertising expense claim?}
A. Included in the Company's direct claim in the FPFTY was a \(\$ 158,000\) advertising expense related to the Pittsburgh Home and Garden Show Sponsorship. Mr. Keller asserts that the fee includes sponsorship expenses that are not necessary to provide safe and reliable service to ratepayers. Mr. Keller's proposes an adjustment to reduce the Company's membership claim by \(\$ 158,000\) (I\&E St. No. 2, p. 23).
Q. Do you agree with the adjustment proposed by I\&E Witness Keller?
A. I disagree with Witness Keller's averment that the Company's sponsorship costs should not be recovered from ratepayers. However, the Company will accept his adjustment here. Please see the rebuttal testimony of Mr. Robert O'Brien for rebuttal adjustments.

\section*{Q. What assertion did I\&E Witness Keller make in relation to the Company's eligible customer listing solicitations claim?}
A. Included in the Company's claim was a deferral of \(\$ 339,000\) to be normalized over a three-year period ( \(\$ 113,000\) per year). Mr. Keller recommends that the Company's claimed three-year normalization of the eligible customer listing solicitation be changed to use a 43-month normalization period in line with the Company's historic filing frequency. Mr. Keller proposes an adjustment to reduce the Company's claim by \(\$ 54,000\) ( \(\$ 18,000\) per year) based on the revised normalization period (I\&E St. No 2, pp. 24-25).

\section*{Q. Do you agree with the adjustment proposed by I\&E Witness Keller?}
A. No. Please see rebuttal testimony of Mr. Robert O'Brien for further discussion as to why we believe that the three-year normalization is appropriate.

\section*{IV. COVID-19 Related Regulatory Asset}
Q. What is the Company's claim for COVID-related uncollectible expenses?
A. Through June 30, 2021, the Company maintains a regulatory asset totaling \$6.1 million on its books and records, which represents incremental uncollectible expenses incurred above those embedded in rates in accordance with the Pennsylvania Public Utility Commission's May 13, 2020 Secretarial Letter directing the use of regulatory asset treatment for such incremental costs. The Company is requesting a three-year recovery period or \(\$ 2.1\) million per year. In addition, the Company is also proposing to continue regulatory asset treatment to be recovered in future rate proceedings.
Q. What do I\&E Witness Wilson, OCA Witness Morgan and NRDC Witness Levin recommend regarding the Company's COVID-19 related uncollectible regulatory asset?
A. I\&E Witness Wilson recommends a normalization period of 43 months vs. the Company's proposed three years. OCA Witness Morgan recommends a normalization period of five years and NRDC Witness Levin recommends a normalization period such as 6 years (or over two expected rate case periods). In addition, I\&E Witness Wilson and OCA Witness Morgan recommend that the Company discontinue recording a regulatory asset for COVID-19 related incremental uncollectible costs after the conclusion of the rate case or the effective date of new rates for this proceeding.
Q. Do you agree with the Witness' recommendation for a longer normalization period?
A. No, I do not. Please see the rebuttal testimony of Robert O'Brien for additional discussion regarding the Company's proposed three-year normalization.
Q. Do you agree with I\&E Witness Wils on and OCA Witness Morgan's recommendation to discontinue recording a regulatory asset for COVID-19 related incremental uncollectible costs after the conclusion of the rate case or the effective date of ne w rates for this proceeding?
A. In part. With respect to COVID-19 related incremental uncollectible expense, the premise of the parties' arguments to discontinue regulatory accounting treatment is that the Company's new rates, including the uncollectible percentage established in this case, should account for continued incremental uncollectible expense. I do not believe that this is correct for several reasons. First, the Company excluded the effects of COVID when it established its uncollectible claim for the FPFTY by excluding 2020 from the historic calculation. Therefore, the uncollectible expense amount in the FPFTY does not account for the future effects of COVID on uncollectible expense. Second, as required under to Commission's COVID-related Orders, the Company has entered into payment arrangements with many customers that were delinquent due to COVID. It is too early to determine how many of these payment arrangements will default and the effect that this will have on uncollectible expense. It is also unknown whether the PUC may issue another termination moratorium in the event of potential subsequent COVID incidents. Fourth, after the effective date of new rates, the continuing regulatory asset will be based upon the uncollectible expense established in this case. For these reasons, I believe that it is appropriate to continue tracking incremental uncollectible expense after the effective date of new rates in this proceeding.

With respect to non-uncollectible incremental expenses related to COVID19: based on current conditions and the Commission's July 15, 2021 Order lifting its March 26, 2020 Order effective September 30, 2021 (see Docket No. M-20203019262), the Company agrees to discontinue recording a regulatory asset upon the effective date of new rates set in this proceeding. However, the Company reserves the right to seek regulatory asset treatment in the event of future extraordinary, nonrecurring events outside the Company's control, which could conceivably include re-imposition of government mandates associated with new or resurgent public health emergencies.
Q. Please respond to OCA's argument that the Company does not need a higher level of protection for incremental uncollectible expense because it filed for a rate increase (OCA St. No. 1, p. 26).
A. I disagree with this assertion. The Company is entitled to recover its reasonable expenses, and the Commission has expressly authorized utilities to recover incremental COVID related expenses, including incremental uncollectible expenses associated with Commission-mandated termination moratoriums and deferred payment arrangements.
Q. What is the Company's claim for other extraordinary, nonrecurring incremental COVID-19 related expenses outside of incremental uncollectible expenses?
A. In the Company's original claim, an estimated \(\$ 5.8\) million was projected to be related to the Company's other extraordinary, nonrecurring incremental COVID19 related expenses net of savings outside of incremental uncollectible expenses. This claim represented the time period of March 2020 through June 2021.
Q. Does the Company recommend a change to the original claim of \(\$ 5.8\) million covering the period March 2020 through June 2021?
A. Yes. The Company is proposing three updates to its original claim. First, upon further review of the Company's 2020 other extraordinary, nonrecurring incremental COVID-19 related expenses outside of incremental uncollectible expenses, it was noted that 2021 estimated outside services were included in the 2020 amounts. The Company proposes a \(\$ 0.5\) million reduction in COVID-19 expenses associated with this double counted expense. Second, the Company trued up its other extraordinary, nonrecurring incremental COVID-19 related expenses outside of incremental uncollectible expenses for the period of January 1, 2021 through June 30, 2021. This resulted in an increase to the expenses of approximately \(\$ 0.7\) million. Lastly, the Company further scrutinized its claimed COVID-19 savings amounts in 2020 and 2021. This resulted in an increase in savings of approximately \(\$ 1.5\) million related to additional employee expenses
associated with travel, training and parking as well as adjustments related to the Company's utilities variances noted within the time period of March 2020 through June 2021. In total, the Company proposes to reduce its original claim by \(\$ 1.3\) million or \(\$ 0.4\) million per year. Please see rebuttal adjustments maintained within the rebuttal testimony of Robert O'Brien.
Q. What does I\&E Witness Wilson recommend regarding the Company's COVID-19 related costs, net of savings (excluding the COVID-19 uncollectible expense deferral)?
A. I\&E Witness Wilson recommends that the claim should be disallowed, along with the Company's proposal to continue to include incremental costs above what is included in this proceeding as a regulatory asset to be recovered in a future rate proceeding (I\&E St. No. 1, p. 14).

\section*{Q. What is I\&E Witness Wilson's basis for disallowance?}
A. I\&E Witness Wilson states that the Company did not seek nor receive special permission to defer for accounting purposes any other incremental COVID-19 related costs, the Company has not specifically identified any amount(s) directly attributable to additional call center staffing expenses in collecting aged receivables, and the Commission has not provided the basis for recovery of forgone late payments and reconnection fees (I\&E St. No. 1, pp. 18-20).

\section*{Q. Do you agree with I\&E Witness Wils on's basis for dis allowance?}
A. No, I do not. First, at the Pennsylvania Public Utility Commission Public Meeting held on July 15, 2021, an Order regarding the Public Utility Service Moratorium (M-2020-3019244) and COVID-19 Cost Tracking and Creation of a Regulatory Asset (M-2020-3019775), the Commission confirmed "that utilities shall continue tracking extraordinary, nonrecurring incremental COVID-19 related expenses and shall maintain detailed accounting records of such expenses. Additionally, the Commission hereby confirms that electric, natural gas, water, wastewater, steam, and all rate base/rate of return telecommunications utilities are
authorized to create a regulatory asset for any incremental expenses incurred above those embedded in rates resulting from the directives contained in this Order. To be eligible for inclusion in a utility's COVID-19 designated regulatory asset, the utility must maintain detailed records of the incremental extraordinary, nonrecurring expenses incurred as a result of compliance with the Commission's March 13 Emergency Order, the October 13 Order, the March 18, 2021, Order and this Order." The above order did not require the Company to seek special permission for the deferral of its costs. Second, the Company maintains detailed records via separate work orders which tracked all incremental costs incurred as well as records of savings incurred by the Company. Finally, the Company believes that foregone late payment fees and reconnection fees represent the reimbursement of costs associated with collection and reconnect activities.

\section*{Q. What did I\&E Witness Wilson recommend regarding the deferral of other incremental COVID-19 related costs, net of savings, via a regulatory asset?}
A. Witness Wilson believes that the Company should treat any allowed regulatory asset as an amortizable vs. a normalized amount. In addition, Witness Wilson recommends that the frequency of amortization should be 43 months as cited in I\&E Witness Keller in his direct testimony (I\&E St. No 1, p. 21).

\section*{Q. Do you agree with I\&E Witness Wilson's recommendation regarding the treatment of the proposed regulatory asset?}
A. Yes, I agree that the regulatory asset should be amortized.

\section*{Q. Do you agree with I\&E Witness Wils on's recommendation for a 43-month amortization period?}
A. No, I do not. Please see further discussion maintained in the rebuttal testimony of Robert O'Brien.
Q. Ms. Wilson also argues that there should be a state wide proceeding to address incremental COVID costs other than uncollectible expense. Do you agree?
A. No. I believe that the Commission has given statewide guidance in its recent Order that I discussed above.
Q. Ms. Wilson further states that the Company did not provide detail of expenses incurred in complying with the Commission's Orders, such as additional call center staffing in collecting uncollectible expense (I\&E St. No. 1, p. 18). Do you agree with this statement?
A. No. I think that Ms. Wilson is improperly narrowing the scope of the Commission's directives with respect to other COVID related incremental expenses.
Q. What is OCA Witness Morgan's recommendation related to the Company's claim for its extraordinary, nonrecurring incremental COVID-19 related expenses, net of savings and outside of incremental uncollectible expenses?
A. Witness Morgan's recommendation for the Company's claim for its net incremental COVID-19 costs is to first reduce the Company's claim by \(\$ 2,480,000\) for additional savings in medical claims, employee related expenses and utilities, and then remove the claim in its entirety based on alleged immateriality and the assertion that the Commission did not guarantee recovery of any of the costs that may have been deferred.
Q. Do you agree with OCA Witness Morgan's recommendation for reducing the Company's claim by \(\mathbf{\$ 2 , 4 8 0 , 0 0 0 ?}\)
A. Yes, in part. The Company has made adjustments of approximately \(\$ 1.4\) million which are the result of further review of additional savings incurred during the pandemic. Specifically, the Company included additional savings amounts related to employee expenses (approximately \(\$ 1.1\) million) and utilities expense (approximately \(\$ 0.5\) million). It should be noted that these adjustments reflect
amounts within the timeframe of the pandemic and therefore do not represent the full variances shown within the calculations provided by Mr. Morgan (OCA St. No. 1, p. 27). Please see the Company's rebuttal adjustments described above which account for a reduction of approximately \(\$ 1.4\) million to its original claim. Rebuttal adjustments are discussed further within the rebuttal testimony of Robert O'Brien.
Q. Do you agree with OCA Witness Morgan's recommendation for removing the remainder of the claim based on immate riality and no guarante by the Commission to recover these costs?
A. No, I do not. Based upon the Commission's stance on regulatory asset for these costs and our records regarding the net costs, the Company should be permitted to recover of the full amount of the net costs. In addition, there should be no materiality assessed to prudent and reasonable extraordinary, nonrecurring incremental COVID-19 related non uncollectible expenses, net of savings.
Q. What is NRDC Witness Levin's recommendation as it relates to the Company's claim for extraordinary, nonrecurring incremental COVID-19 related non-uncollectible expenses, net of savings?
A. Witness Levin recommends that the Commission not approve the Company's request for cost recovery without further review of actual versus expected 2020 expenses (NRDC St. 1, p. 4, lines 2-4). Witness Levin also recommends a longer amortization period than the Company's proposed three years (NRDC St. 1, p. 4, lines 11-14).
Q. Do you agree with NRDC Witness Levin's recommendation regarding the disallowance of cost recovery without further revie w of Company documentation?
A. I do not agree with this recommendation. As discussed above, the Company maintains detailed records regarding the make-up of its claim for prudent and reasonable extraordinary, nonrecurring incremental COVID-19 related expenses,
net of savings and outside of incremental uncollectible expenses. This rate proceeding is appropriate venue for the Commission and the parties to conduct the type of review Ms. Levin suggests - a fact confirmed by the robust discovery and testimony that NRDC, as well as other parties, have been engaged in on this topic. It would be unreasonable to further postpone the Company's recovery of these costs pending the vague "further review" Ms. Levin suggests, nor would such proceeding be an efficient use of the parties (or the Commission's) resources.

\section*{Q. Ms. Levin questions the Company's quantification of extraordinary, nonrecurring incremental COVID-19 related savings (NRDC St. 1, pp. 1819). Please respond.}
A. Ms. Levin suggests that a portion of the Company's estimated \(\$ 399,000\) reduction in utility expenses should be deemed attributable to COVID-19 and deducted from the Company's claim (NRDC St. 1, p. 18, line \(12-\) p. 19, line 4). She also suggests that the Company may have realized additional COVID-19 related savings as well that should be reflected in the Company's claim, though she declines to identify any specific line items or quantify the Company's alleged associated savings (NRDC St. 1, p. 19, lines 5-15).

In addition, the Company did revise its original claim as discussed above to account for errors, additional savings, including utilities and employee expenses, and 2021 actual costs incurred. The Company believes that this revised claim is for prudent and reasonable incremental costs.

\section*{Q. Do you agree with NRDC Witness Levin's recommendation regarding the imposition of a longer amortization period?}
A. No. Initially, I note that while Ms. Levin states that a six-year amortization period "could be warranted," (NRDC St. 1, p. 21, lines 12-13) (emphasis added), she does not actually make a specific recommendation. She instead punts, stating in discovery that "A period of six years . . . was mentioned as one possible length of time for the Commission to consider as an alternative," (Exhibit JAB-1-R (DLCNRDC I-5)). In any event, I do not agree with increasing the amortization beyond
three years. Please see rebuttal testimony of Robert O' Brien regarding the use of the three-year period.

\section*{V. Capitalized Pension Adjustment}

\section*{Q. Describe the Company's historical and current claim as it relates to pension treatment.}
A. The Company filed its first rate case in approximately 20 years in 2006. At this time, the Company continued to budget its pension expense using the actuarially determined net periodic pension cost. As part of the 2006 proceeding (R00061346) the Company requested to recover annual contributions that it planned to make to the pension plans vs. the net periodic pension cost. The accounting treatment proposed at this time requested that the Commission authorize the Company to record annually the difference between the contribution to the pension trust and the annual net periodic pension cost accrual as either a regulatory asset or liability as it was noted that over extended periods of time, the contributions must be essentially the same as the sum of the actuarially determined net periodic pension cost. The Joint Petition for Settlement of All Issues dated in September of 2006 (found at Exhibit JAB-2-R) reflected a level of pension expense commensurate with the Company's expected Pension contributions of \(\$ 20\) million per year and committed the Company to fund \(\$ 20.0\) million annually to its pension plans during the period rates set in that proceeding remain effective. Should the Company's ERISA minimum contribution exceed \(\$ 20.0\) million, the Company was required to contribute the ERISA minimum contribution requirement. As noted at paragraph 17 of the Company's 2006 settlement agreement:
...rates reflects a level of pension expense based upon expected Pension contributions of \(\$ 20\) million per year. Duquesne Light commits to fund \(\$ 20\) million annually to its pension plans during the period rates set in this proceeding remain effective, provided that such funding does not exceed the amount that is deductible under the Internal Revenue Code, in which case, Duquesne Light will fund the amount that is deductible...

The capitalization of the pension contributions is inherent in the settlement because recovery was limited to the expense component of the contribution and the settlement distinguishes pension expense from pension contributions. The capitalized portion of pension contributions is described further in the 2010 rate case settlement in order to provide more clarity and to perform the adjustment as of January 1, 2007. (See excerpt below).

In the Company's 2010 rate case (R-2010-2179522), the Company, consistent with the 2006 rate case requested recovery of the annual contributions that it planned to make to the pension plans. The expense claim for pensions in this proceeding was based on projected pension plan contributions required under the Pension Protection Act of 2006. It was noted in this proceeding that the criteria used to determine these contributions was different from the criteria required to be used to determine the net periodic pension costs under ASC 715. The accounting treatment proposed at this time was consistent with the 2006 proceeding where the difference between the contribution and the net periodic pension cost would be recorded as a regulatory asset or liability, with the amount being reversed over time as pension contributions ultimately reflect the net periodic pension cost. The Commission approved the Joint Petition for Settlement of All Issues in December 2010 (provided as Exhibit JAB-3-R). As part of this settlement, the Company agreed to deposit \(\$ 55.0\) million of pension contributions to its pension trust per year. The Settlement provided for recovery of the expense component of \(\$ 27.5\) million ( \(50 \%\) of the average cash contributions) and allowed the Company to include the other \(50 \%\) of actual pension contributions from January 1, 2007 forward in rate base for ratemaking purposes. The Company also agreed to reporting requirements annually that would attest to the actual contributions to the pension trust each calendar year. As noted at paragraph 37 of the settlement agreement:

Duquesne Light will deposit into its pension trusts an amount equal to \(\$ 55,000,000\) per year... The Settlement provides for recovery of the expense component of \(\$ 27,500,000\) ( \(50 \%\) of the average cash contribution) of projected future pension contributions. Additionally, Duquesne Light will be permitted to include the other
\(50 \%\) of actual pension contributions from January 1, 2007, forward, net of related accumulated deferred income taxes, in rate base for rate making purposes. The rate base adjustment for pensions shall be the amount necessary to adjust the SFAS 87 capitalized pension amounts to equal accumulated capitalized pension contributions, net of applicable deferred income taxes from January 1, 2007 forward. The depreciation expense for book and ratemaking purposes will be based on the SFAS 87 capitalized amounts. The adjustment amounts will be used for reporting rate base in reports to the Commission.

In its 2013 rate case (R-2013-2372129) and its 2018 rate case (R-2018-3000124), (see Exhibits JAB-4-R and JAB-5-R, respectively) the Company requested and was permitted to use the same recovery mechanisms as described within the 2010 settlement agreement whereby the Company was required to deposit \(\$ 37.2\) million into its pension trust per year for the 2013 proceeding and \(\$ 10.0\) million into its pension trust per year for the 2018 rate case. \(\$ 18.6\) million and \(\$ 5.0\) million ( \(50 \%\) of contribution) represented the allowable expense recovery portion in the 2013 and 2018 settlement agreements, respectively. These settlement agreements also specifically continued to allow the same rate base treatment noted in the prior 2010 settlement agreement and the same reporting requirements.

Consistent with our 2006, 2010, 2013 and 2018 distribution rate cases, the Company is requesting recovery in this case of the expense component of the annual contributions that we plan to make to the pension plan. These contributions totaling \(\$ 10.0\) million per year reflect voluntary pension contributions in order to offset service costs as to not degrade the pension plan's funded status and to continue to foster the Company's de-risking strategies. The Company is also requesting consistent, previously approved rate base treatment of the non-expensed portion of the contribution reporting requirements.

\section*{Q. Did the Company meet all of the requirements as laid out in the Settlement agreements discussed above?}
A. Yes. The Company met all requirements as stipulated within the respective settlement agreements. The most critical requirement was to make the projected contributions to the pension trust.
Q. What were the Company's pension contributions to its pension trust from December 31, 2006 through June 30, 2021?
A. The Company contributed \(\$ 488.3\) million to its pension trust during this time period.

\section*{Q. Why does the Company utilize contributions for its basis for ratemaking claims?}
A. The Company utilizes pension contributions for its basis in ratemaking as contributions are determined to be less volatile than using the net periodic pension cost accrual. It was the Company's understanding that the Commission favored using contributions for ratemaking purposes. As stated previously, the Company's annual net periodic pension cost accrual will likely differ from the pension contributions on a year to year basis and use of net periodic pension cost accruals could lead to the Company over or under recovering the costs of the pension plan.

\section*{Q. What are the primary drivers of contributions and the volatility associated with those amounts?}
A. The primary drivers of cash contributions are legal requirements, plan design, interest rates and asset returns.
1. Legal Requirements - The Company will make all legally required contributions to the plan in accordance with ERISA and PPA.
2. Plan Design- The Company has closed the pension plan to new salaried employees in an effort to slow the liability growth of the plan.
3. The Level of Interest Rates - specifically, the interest rates used under PPA to discount future expected benefit payments to determine the present value of those payments. These rates are reset each year as of the measurement date and can
have a significant impact on the level of pension obligations and pension expense.
Generally, if interest rates decrease by \(1 \%\), it can increase obligations by approximately \(10 \%\).
4. Pension Trust Asset Returns - as market returns rise and fall, so do the assets held in trust to meet pension obligations. Generally, if market values of pension trust assets fall, the plan will experience an increase in required contributions.
Q. What was the Company's net periodic pension cost for the years ended December 31, 2006 through December 31, 2020?
A. The Company's actuarially determined net periodic pension cost for the years ended December 31, 2006 through December 31, 2020 are shown in the table as follows:
\begin{tabular}{|l|l|}
\hline Year Ended December 31, & \begin{tabular}{l} 
Net Periodic Pension Cost/(Gain) \\
(ASC 715)
\end{tabular} \\
\hline 2006 & \(\$ 7.4\) million \\
\hline 2007 & \(\$ 10.1\) million \\
\hline 2008 & \((\$ 1.6\) million) \\
\hline 2009 & \(\$ 1.2\) million \\
\hline 2010 & \(\$ 18.2\) million \\
\hline 2011 & \(\$ 32.1\) million \\
\hline 2012 & \(\$ 37.2\) million \\
\hline 2013 & \(\$ 35.4\) million \\
\hline 2014 & \(\$ 21.6\) million \\
\hline 2015 & \(\$ 24.0\) million \\
\hline 2016 & \(\$ 16.9\) million \\
\hline 2017 & \(\$ 20.9\) million \\
\hline 2018 & \(\$ 21.3\) million \\
\hline 2019 & \(\$ 15.4\) million \\
\hline 2020 & \(\$ 18.0\) million \\
\hline
\end{tabular}

It should be noted that the Company's projected net periodic pension costs above are representative of the cash contribution amounts that the Company made. If the Company had not made cash contributions, the projected net periodic pension cost would have been increased in each year.
Q. What was the funded status of the Company's pension plan for the time period December 31, 2006 through December 31, 2021?
A. The Company's funded status of the Company's pension plan for the years ended December 31, 2006 through December 31, 2020 is shown in the table below. As noted below, the funded status of the plan significantly increased between 2010 and 2021. This is a direct result of the continued contributions and earnings on the contributions including the amounts reflected in the Company's capitalized pension adjustment. The Company's expected funded status as of December 31, 2021 is \(\$ 72.0\) million of a deficit.
\begin{tabular}{|l|l|}
\hline Year Ended: & (Underfunded)/Overfunded Status \\
\hline 2006 & \(\$ 6.5\) million \\
\hline 2007 & \(\$ 19.1\) million \\
\hline 2008 & \((\$ 218.0\) million) \\
\hline 2009 & \((\$ 266.0)\) million \\
\hline 2010 & \((\$ 260.6)\) million \\
\hline 2011 & \((\$ 345.2)\) million \\
\hline 2012 & \((\$ 366.6)\) million \\
\hline 2013 & \((\$ 261.8)\) million \\
\hline 2014 & \((\$ 238.6)\) million \\
\hline 2015 & \((\$ 117.9)\) million \\
\hline 2016 & \((\$ 91.0)\) million \\
\hline 2017 & \((\$ 69.5)\) million \\
\hline 2018 & \\
\hline 2019 & \\
\hline 2020 & \\
\hline
\end{tabular}
Q. What is the Company's capitalization adjustment claim to rate base in the current proceeding and for each of the prior proceedings back to January 1, 2007?
A. The Company's current claim and historical claims are as follows:
\begin{tabular}{|l|l|}
\hline Rate case proceeding: & \begin{tabular}{l} 
Capitalized Pension Adjustment \\
included in claim
\end{tabular} \\
\hline 2010 rate case R-2010-2179522 & \(\$ 38.0\) million \\
\hline 2013 rate case R-2013-2372129 & \(\$ 59.4\) million \\
\hline 2018 rate case R-2018-3000124 & \(\$ 81.4\) million \\
\hline 2021 rate case R-2021-3024750 & \(\$ 74.4\) million \\
\hline
\end{tabular}

Once the Company's pension is fully funded, the Company will not be required to make contributions to its plan and the cumulative rate base adjustment reflecting the difference between the ASC 715 expense and pension contributions will continue to decrease until they converge at the end of the pension.

\section*{Q. How is the Company's pension, both expense and capital, recorded in the Company's books and records? \\ A. The Company's books and records capitalize approximately \(50 \%\) of the Company's pension cost as computed under ASC 715. The \(50 \%\) capitalization rate approximates the Company's historic annual percentage of capitalized labor costs. As provided in the Company's last 4 rate case proceedings, the Company records \(50 \%\) of cash contributions as expense. Any differences between the cash contribution and the pension cost as computed under ASC 715 is recorded as a regulatory asset or liability.}

\section*{Q. How is the Company's capitalized pension recorded for ratemaking purposes?}
A. In accordance with the Company's past settlement agreements discussed above, for ratemaking purposes, the Company makes a pro forma adjustment to rate base
for the portion of \(50 \%\) of the Company's cash contributions to pensions that has not been capitalized under ASC 715 pension cost that is recorded in the Company's books and records. The use of cash contributions for ratemaking purposes to fund both pension expense and pension cost capitalized amounts contributed to the pension trust is in accordance with the settlement agreements of the Company's 2006, 2010, 2013 and 2018 rate cases.

\section*{Q. What is OCA Witness Morgan's interpretation of the Company's accounting for the expense and capital portions of the pension?}
A. As noted on page 12 of Mr. Morgan's direct testimony (OCA St. No. 1), he states that once ASC 715 , "costs are determined, the costs are broken down into the expense and capital components and such amounts are actually recorded in the Company's books and records for financial reporting purposes."

\section*{Q. Do you agree with OCA Witness Morgan's interpretation?}
A. No, I do not. The Company's accounting treatment is discussed further above.
Q. Why does the Company belie ve that the capitalized pension adjustment is an appropriate adjustment to rate base in its claim?
A. The Company moved to pension cash contributions in its 2006 settled rate case. Therefore, consistent and reasonable ratemaking requires that cash contributions be used for both expense and amounts capitalized and included in rate base. The cash contributions in the pension trust that are reflected in the pension capitalization adjustment are the amounts that were deposited by the Company in the pension trust in excess of the ASC 715 capitalized amounts and continue to benefit customers. If these amounts had not been put in the trust, the Company's underfunded status would be higher and greater future contributions would be required. In addition, the Company believes that it should be able to earn a reasonable rate of return on all capital expenditures incurred through the end of the fully projected future test year as it does for all plant items, including amounts attributable to labor benefits charged to capital projects. Not including capitalized
pension costs in rate base would be inconsistent with all other capital charges, as well as inconsistent with the prior approved rate treatment of such costs. As there is volatility in both the pension cash contributions and the ASC 715 pension costs, the Company believes that maintaining consistency with regard to pension expense and capitalized pension costs for ratemaking purposes is appropriate. The Company believes that capitalization of the excess pension contributions provides fair treatment for the Company and its shareholders. In this regard, the Company made \(\$ 30.0\) million of contributions to the pension trust through 2021 pursuant to its commitment in the last case. Only \(\$ 15.0\) million of the expense component has been collected in rates with the remainder being capitalized for ratemaking purposes. The Company has not been able to earn a return on the \(\$ 15.0\) million that is being capitalized for ratemaking purposes since the last rate case. The Company will be denied the ability to earn a fair rate of return if this amount in not included in rate base in this proceeding. The Company already experiences regulatory lag in recovering a return on its investment in capitalized pension costs. Given the significant variance between pension cash contributions made by the Company and the Company's capitalized net periodic service cost, directing the Company to use an accounting pension cost amount for capitalized pension costs will result in an unreasonable amount of regulatory lag on its cash investment because this amount likely will not catch up to the capitalized amount on a contribution basis for years into the future. In addition, obtaining financing for future pension contributions, or any other financing need, is always more difficult if the application for the funds does not receive an appropriate regulatory return.

\section*{Q. What is the basis for your statement that the capitalized pension adjustment is an investment by the Company?}
A. The settlements required contributions to the pension trust in excess of ASC 715 capitalized amounts. If the settlements had not done so the Company could have contributed less to the pension trust and invested that amount, which is significant, in additional plant replacements that would have provided and would
continue to provide a return to the Company. While the Company is not indicating that would be the preferred option, it illustrates that the investment of these funds in the pension trusts represents an investment of the Company's capital which deserves a return.
Q. What is OCA Witness Morgan's recommendation related to the Company's capitalized pension claim?
A. Mr. Morgan recommends an adjustment to remove the Company's Capitalized Pension Adjustment from the Company's rate base claim (OCA St. No. 1, pp. 1617).

\section*{Q. Do you agree with OCA Witness Morgan's recommendation?}
A. No, I do not. Mr. Morgan's recommendation should be rejected.

\section*{Q. What is OCA Witness Morgan's basis for the disallowance of the Company's capitalized pension adjustment?}
A. Mr. Morgan asserts two main items that result in his proposed disallowance of the Company's capitalized pension adjustment. First, Mr. Morgan notes that capitalized pension contributions should not be plant investments, but instead considered a deferred debit or a regulatory asset. Second, Mr. Morgan sites the most recent PECO Gas rate case whereby the Commission denied inclusion of the Pension Asset in rate base (OCA St. No. 1, pp 15-16).
Q. Do you agree with OCA Witness Morgan's arguments for disallowance?
A. No, I do not. As it relates to Mr. Morgan's assertion that the capitalized pension adjustment should not be a rate base item, the Company's settlement agreements associated with 2006, 2010, 2013 and 2018 allow the Company to utilize this treatment. As an example, if the capitalized component of pension contributions exceeds the capitalized portion determined under ASC 715, and the Company is restricted to including only the capitalized net periodic pension cost in rate base as Mr. Morgan proposes, the Company will have lost and will continue to lose a
return on the greater capitalized pension contribution amount for all future years until the net periodic pension costs catch up to the cash contributions. Secondly, regarding the most recent PECO Gas rate case, this was the first time that PECO Gas was proposing the ratemaking adjustment similar to the Company. Based on discovery response DLC-OCA-I-4 maintained at Exhibit JAB-1-R, Mr. Morgan notes that PECO did not have a series of prior settlements that required specific contributions to the pension trust and that provided for inclusion of the capital portion of contributions in excess of ASC 715 amounts to be included in rate base. These were an exchange of commitments between the settling parties to provide a rational basis to fund the pension trust and provide reasonable recovery of the costs. In this regard, the Company continued to make voluntary contributions to the trust as required between rate cases based on the express commitment that the pension capitalization adjustment would be included in rate base as agreed to by the parties and the Company in previous settlements (shown above and within the exhibits). In addition, the Company's claim for depreciation, unlike PECO's, does not include adjustments due to this ratemaking mechanism. Mr. Morgan now proposes to change that commitment retroactively by eliminating the adjustment accumulated over the 16 year period. Further, in order to continue to provide consistent and reasonable ratemaking, the Company should be permitted to continue follow the prior settlement agreements in its 2006, 2010, 2013 and 2018 rate cases in this case. These prior settlements, which explicitly provide for inclusion of the capitalized pension adjustment in future cases were reasonable, provided benefits to customers and employees and should be reflected as I\&E has done in the direct testimony of Ms. Wilson in this proceeding (I\&E St. No, 1, pp. 4-7).

\section*{Q. Do you agree with OCA Witness Morgan's claim that the capitalized pension adjustment should be recorded as a regulatory asset or a deferred debit?}
A. No, I do not. As stated above, the Company records benefits attributable to labor within their capital accounts. Employees' time and hence their labor costs are budgeted to be charged to either expense or capital depending on the work that
they performed. The cost of employee benefits, including pension costs, is allocated to expense or capital in the same proportion as is the related labor costs and therefore these costs should not be considered non-rate base assets.
Q. Mr. Morgan also claims that including the capitalized pension adjustment violates the policy that expenses should not be include \(d\) in rate base. Please respond.
A. Mr. Morgan's claim is erroneous. None of the amounts that are included in the capitalized pension adjustment have been recovered from customers as expenses. Instead, as I have explained previously, these are Company provided funds that have not been charged to customers and have been invested in the pension trusts for the benefit of customers and employees but are not reflected in plant due to the differences between ASC 715 based accruals and cash contributions. The Company has managed it pension contributions prudently and avoided any over recovery from customers due to the use of volatile ASC 715 amounts for ratemaking purposes. The capitalized pension adjustment provides fair treatment to the Company and should be continued.

\section*{VI. Conclusion}

\section*{Q. Does this complete your prepared rebuttal testimony at this time?}
A. Yes, it does.

BEFORE THE

\title{
PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 5-R

REBUTTAL TESTIMONY OF KRYSIA KUBIAK

Subjects: New Business Stimulus Rider and Crisis Recovery Program

Dated: July 26, 2021

\section*{I. INTRODUCTION}
Q. Please state your name, title, and business address.
A. My name is Krysia Kubiak. I am the Director of External Affairs for Duquesne Light Company ("Duquesne Light" or the "Company"). My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. Have you previously submitted testimony in this proceeding on behalf of Duquesne Light?
A. Yes. On April 16, 2021, I submitted direct testimony ("Duquesne Light Statement No. 5"), which proposed the New Business Stimulus Rider ("NBSR") and the Crisis Recovery Program ("CRP").
Q. What is the purpose of your rebuttal testimony?
A. The purpose of my rebuttal testimony is to respond to and evaluate the testimonies submitted by non-Company parties in this proceeding that address the NBSR and/or CRP. Parties other than Duquesne Light who submitted direct testimony related to the NBSR and CRP include: the Pennsylvania Public Utility Commission's ("PUC or the "Commission") Bureau of Investigation \& Enforcement ("I\&E"), the Office of Consumer Advocate ("OCA"), and the Office of Small Business Advocate ("OSBA").

\section*{Q. How is your rebuttal testimony organized?}
A. Section I is this introductory section. Section II responds to I\&E witness Ms. Christine Wilson's direct testimony (labeled "I\&E Statement No. 1"), which recommended
disallowance of the NBSR and the CRP entirely. Section III responds to certain aspects of OCA witness Mr. Noah D. Eastman's direct testimony (labeled "OCA Statement No. 5"), which discusses the current economic climate in the Commonwealth of Pennsylvania based on employment data and the State Coincident Index. Section IV responds to OSBA Robert D. Knecht's direct testimony (labeled "OSBA Statement No. 1"), which broadly evaluates the NBSR and CRP.
Q. Do you have any changes, corrections, or clarifications to make to your direct testimony?
A. Yes, I do. My direct testimony inadvertently states that the Neighborhood Assistance Program ("NAP") is defined by the United States Department of Housing and Urban Development. Instead, my direct testimony should reflect that NAP is a state-wide government assistance program administered by the Commonwealth of Pennsylvania's Department of Community and Economic Development. More information about NAP can be found online at dced.pa.gov. Duquesne Light will include the updated definition in a subsequent compliance tariff filing.
Q. Are you sponsoring any exhibits with your rebuttal testimony?
A. No.

\section*{II. RESPONSES TO I\&E WITNESS}

CHRISTINE WILSON'S DIRECT TESTIMONY

\section*{Q. Is Ms. Wilson's characterization of the NBSR's terms and enrollment eligibility accurate?}
A. Ms. Wilson correctly indicates that the Company's NBSR involves providing a temporary, 30 percent discount on the variable base distribution portion (distribution kilowatt hour and demand) of the enrolled customers' bills. By way of background, the discount associated with the NBSR will end 2 years from the date on which the enrolled customer commences service or until December 31, 2024, whichever occurs earlier. The eligibility criteria for the NBSR are as follows: (1) only available to new customers who apply electric service after June 1, 2021, and (2) are (or will be) billed in accordance with the General Service Small ("GS"), General Service Medium Heating ("GMH"), General Service Medium < 25 kW or General Service Medium \(\geq 25 \mathrm{~kW}\) (collectively, "GM") rate schedules, and (3) seeking to establish electric service in a vacant storefront after June 1, 2021, and (4) the storefront must be within a Local Neighborhood Commercial ("LNC") District, as defined by City of Pittsburgh Code of Ordinances, or Qualified Low-Income Census Tract ("QCT") as defined by the United States Department of Housing and Urban Development, or Neighborhood Assistance Program ("NAP") district, as defined by the Commonwealth of Pennsylvania's Department of Community and Economic Development. The terms and conditions of the NBSR are more fully set forth in the Company's proposed Rider No. 25.
Q. Please summarize Ms. Wils on's position and recommendation regarding the NBSR.
A. Ms. Wilson indicates that she disagrees with the NBSR proposal and recommends disallowance of the program in its entirety. She further explains that shareholder-funded charitable contributions may still be made to the local community.

\section*{Q. Do you support Ms. Wilson's recommendation for the Commission to disallow the NBSR? \\ A. No.}

\section*{Q. Please explain why you disagree with Ms. Wilson's recommendation.}
A. Ms. Wilson places an unreasonable amount of emphasis on the increased vaccination rates and the rescission of many of the COVID-19 governmental orders that limited businesses' occupancies or required temporary shutdowns. To elaborate, while vaccination rates are slowly increasing, major factors continue to contribute significant headwinds against the eventuality that vaccination will usher in an imminent return to previous levels of in-person consumer behavior. Vaccine hesitancy, COVID-19 variants, labor market shortages and resulting pay rate pressure, uncertainty around possible future governmental restrictions, and uncertainty around consumer behavior related to the exponential growth of online shopping are continuing issues which are both exacerbated by the pandemic and contribute significant risk to any business with in-person transactions in their business model.

In a time of unprecedented uncertainty, the Company has been mindful in designing the NBSR to plan conservatively for the likelihood of a slow or uneven economic recovery, rather than prognosticate with any certainty around the vagaries of consumer confidence in the neighborhood retail marketplace. The suggestion that vaccination will have a linear correlation to a return to business activity in neighborhood business districts is a hopeful suggestion, but not one that is borne out by any supporting research.

Notably, Ms. Wilson's testimony fails to recognize that a portion of the Commission's mission, located on the Commission's website at https://www.puc.pa.gov/about-the-puc/, includes furthering economic development. The purpose of the NBSR is to stimulate economic growth in areas that need it the most, which is aligned with the PUC's mission statement.

\section*{Q. Please respond to Ms. Wilson's comparis on of the NBSR to charitable contributions.}
A. Ms. Wilson's suggestion that the Company may make charitable contributions from shareholder funds does not acknowledge the fact that substantial charitable dollars have already been and continue to be directed toward customer and community assistance through partnerships with the Pittsburgh Foundation Emergency Action Fund and the Dollar Energy Fund, among others. The Company currently makes annual charitable giving a high priority, with approximately \(\$ 2\) million per year donated to the community. Secondly, the suggestion that charitable funds should be directed toward private, for-profit organizations, would both complicate the well-established non-profit mission for charitable giving and is a highly unusual suggestion which is misaligned to the reality that many community-based non-profit organizations themselves have undergone severe economic consequences from the pandemic and are also in need of charitable support. Unlike the NBSR proposal, which would establish qualification criteria for uniform evaluation and allow an eligible business to have some continuing benefit and predictability around their expense burden, the Company's charitable programs typically award funds for a one-time project or proposal that is evaluated on the basis of its merits for having a positive impact on the community. For instance, in the recently completed first round of the Company's

Community Impact Grant charitable program, 135 applications were received totaling \(\$ 1,197,330\). in requested funds. It is unclear if the suggestion to use charitable funds is informed by this context, since it implies that the Company would have to choose "winner and loser" businesses to receive one-off charitable support. This is not the case with the Company's proposed NBSR program and is not in keeping with how the Company administers its charitable giving.

In summary, it is appropriate and reasonable to recover the costs of the NBSR from the GS, GM, and GMH rate classes because it delivers direct value to the Company's business customers over the 2-year enrollment period, whereas charitable contributions provide one-time value to a subset of organizations (non-profits).

\section*{Q. How, if at all, does the NBSR ge nerally differ from the list of non-Company assistance programs listed in Ms. Wilson's testimony?}
A. Ms. Wilson's testimony regarding the availability of aid programs helpfully underscores the severity of the need for these programs in one respect by the sheer proliferation of these previously non-existent programs. However, it is a false equivalency to suggest that by virtue of their existence these programs meet the needs of businesses impacted by the pandemic. The Company recognizes that this pandemic has created widespread and disproportionate economic impacts and its proposal aims to be one of many options for assistance upon which businesses can rely. The NBSR is meant to offer a reasonable level of assistance but in no way is meant to supplant other much needed sources of assistance. Furthermore, Ms. Wilson acknowledges that the list of programs is not validated for
eligibility nor availability and a search for information on these programs \({ }^{1}\) does indeed indicate that certain programs have or will expire, undermining the assertion that other programs are or will be available to support businesses at the same time that the Company's NBSR would be available. Finally, many of these programs are either directed toward businesses that were impacted during the pandemic or were in existence before the pandemic created disproportionate and emergent need for assistance. NBSR is being proposed to assist new businesses as they fill vacancies in business districts which, if left unfilled, could threaten neighboring businesses. Vacancies in neighborhood business districts can have a powerful effect on the perception and economic health of not just that commercial district, but on the neighborhood overall. \({ }^{2}\) A June 2021 report from the National Bureau of Economic Research \({ }^{3}\) inspired hopeful, if misleading, headlines \({ }^{4}\) touting the record number of new business applications. A closer read provides a clearer picture that Nonstore Retail category businesses accounted for nearly \(33 \%\) of these applications and that "...In the pandemic, the surge in new business applications has been especially large for likely nonemployer businesses with the surge four times larger than the increase in the Great Recession." In other words, this wave of new business applications is predominated by a shift toward self-employed, remote workers that authors referred to as a "restructuring" of the economy toward more remote work, leaving risks and unanswered questions for those looking to invest in and startup a business in a retail location that would depend on in-person interactions. "The dramatic rise in sectors such as Nonstore Retail is

\footnotetext{
\({ }^{1}\) https://www.nytimes .com/2021/05/04/business/paycheck-protection-program-closes.html
https://communityinnovation.berkeley.edu/sites/default/files/what_difference_can_a_few_stores_make_retail_and_n eighborhood_revitalization.pdf?width \(=1200 \&\) height \(=800\) \&iframe=true
\({ }^{3}\) https://www.nber.org/system/files/working_papers/w28912/w28912.pdf
\({ }^{4}\) https://www.cbsnews.com/news/new-business-applications-surged-during-pandemic/
}
consistent with the shift towards remote interactions between businesses and consumers." The report emphasizes the long road ahead of the Retail Trade and Food \& Accommodations sectors which together accounted for over 2.6 million job losses, according to the report.

Inadequate funding in the critical early stage of new business startups is often cited as a top reason for business failure and keeping expenses low is similarly a priority for new businesses \({ }^{5}\) and the NBSR is designed to assist new businesses in our region succeed at a time of unprecedented uncertainty and indeterminant risk.
Q. Please summarize Ms. Wilson's position and recommendation regarding the CRP.
A. Ms. Wilson indicates that she disagrees with the CRP proposal and recommends disallowance of the program in its entirety, while again suggesting that shareholder-funded charitable contributions could be made.

\section*{Q. Is Ms. Wilson's characterization of the CRP's terms and enrollment eligibility accurate?}
A. Yes. Ms. Wilson correctly states that Duquesne Light's CRP is a temporary program designed to assist existing GS, GM, or GMH customers who did not have an overdue account balance on February 29, 2020, but have since accumulated a balance because of governmental restrictions related to the COVID-19 pandemic. By way of further explanation, CRP customers will have their delinquent account balances "frozen" for 6 billing cycles, beginning with the first bill that renders 6 or more days after enrollment.

\footnotetext{
\({ }^{5}\) https://www.lendingtree.com/business/small/failure-rate/
}

After the due date for the sixth bill issued since the CRP customer enrolled has lapsed, the Company will evaluate whether the customer paid their non-frozen electric charges in full. If the enrolled customer paid all their non-frozen electric charges, then \(25 \%\) of the customer's frozen balance will be forgiven, and the customer will receive an 18 -month payment arrangement on any remaining balance, unless the customer agrees to a shorter payment arrangement timeframe. If the enrolled customer did not make the appropriate payment, then no portion of the customer's frozen balance will be forgiven, and the customer will receive up to an 18 -month payment arrangement on the entire delinquent balance. Enrollment in the CRP will end on June 30, 2022. The terms and conditions of the CRP are more fully set forth in the Company's proposed Rider No. 26.

\section*{Q. Do you support Ms. Wilson's recommendation for the Commission to disallow the CRP? \\ A. No.}
Q. Please explain why you disagree with Ms. Wilson's recommendation.
A. Ms. Wilson suggests that the proposed CRP program is similar to a charitable contribution, but more substantially, the proposed CRP program is more analogous to existing residential customer assistance programs ("CAP"), wherein a customer's arrearage serves a reasonable indicator of the customer's need for assistance and bears on the amount of benefit the customer can receive through the program. In the case of business customers in the Company's service territory, current aggregate arrearage data indicates that 9046
customers who would be in the eligible rate classes currently owe a total of \$6,610,399. This does not include any monies currently owed, but only reflects past due balances.

Ms. Wilson theorizes that some customers have taken drastic steps to remain current, but does not provide evidence to substantiate this assertion. While it could be reasonable to assume some customers have gone to greater lengths than others to remain current, it is also reasonable to recognize that the pandemic has disproportionately impacted certain businesses more than others, and the exceptional level of arrearages experienced during the pandemic points to a severity of impact that we cannot assume could be remedied by frugal "belt tightening."
Q. Do you agree with Ms. Wilson's comparis on of the CRP to a charitable contribution?
A. No.
Q. Why do you disagree with Ms. Wilson's comparison of the CRP to a charitable contribution?
A. The analogy that the CRP is comparable to a charitable contribution is flawed for several significant reasons described earlier in my testimony, but not least of which is that charitable contributions are generally restricted to non-profit organizations. Directing charitable giving toward for-profit businesses could dilute the Company's charitable giving program and negatively impact non-profits.
Q. How, if at all, does the CRP generally differ from the list of non-Company assistance programs listed in Ms. Wils on's testimony?
A. The CRP complies with the Commission's recommendation that utilities provide businesses with 18 -month payment arrangements, but also goes a step further, allowing businesses to manage their arrearage by giving them the opportunity to (1) return to good standing by paying their bills regularly and (2) reduce their balance, which also reduces their monthly payment arrangement installment. Besides being a program that is analogous to the CAP, with Commission-approved precedent for arrearage forgiveness, and in compliance with the current Commission recommendation regarding payment arrangements, the CRP is distinguished from other non-Company assistance programs by being oriented toward long-term recovery, rather than temporary mitigation. In designing the CRP, the Company anticipated that businesses would seek relief from any and all available sources, but that for the most severely impacted, such relief may prove insufficient \({ }^{6}\). As programs created to abate the worst impacts of the pandemic run out of funds or expire, businesses that experienced the deepest reductions to their revenue and that are seeing a modest return toward economic health, but that are also still struggling with unexpected workforce availability issues, \({ }^{7}\) risk being left at the edge of an assistance cliff. The CRP is designed to meet seriously impacted businesses at that cliff's edge and provide them patient assistance for the arrearage they are still carrying with a reasonable degree of forgiveness to reduce their burden moving forward.

\footnotetext{
\({ }^{6} \mathrm{https}: / / \mathrm{www} . e a t e r . c o m / 2021 / 5 / 18 / 22442063 /\) restaurant-revitalization-fund-sba-applications-exceed-funding
\({ }^{7} \mathrm{https}\) ://www.wsj.com/articles/millions-are-une mployed-why-cant-companies-find-workers11620302440
}
Q. Please respond to Ms. Wilson's allegation that the CRP forces new and existing customers to fund a program for recipients without a "say" in the types of businesses who are enrolled in the CRP.
A. While it is straightforward to list Commission-approved Company programs where the costs are socialized across the entire rate class, such as in the case of the residential Customer Assistance Program ("CAP"), various Energy Efficiency/Act 129 programs, and the Hardship Fund, where other customers do not have a direct "say" in who receives the funds, it would be uncommon, if not unprecedented, to think of a customer assistance program where members of the rate class were given a "say" or de facto veto over which customers could participate.

\section*{III. RESPONSES TO OCA WITNESS}

\section*{NOAH D. EASTMAN'S DIRECT TESTIMONY}
Q. How, if at all, does the Census B ureau Small Business Pulse Survey data provided in Mr. Eastman's testimony support the implementation of the NBSR?
A. The Census Bureau Small Business Pulse Survey data provided in Mr. Eastman's testimony presents a well-researched picture of uncertainty. With highly disparate responses to the question of how long do businesses expect to return to normal operation, over \(35 \%\) responded that operations had already or were nearly returned to normal. What was most telling were the more than \(40 \%\) of businesses which expected a prolonged return to normal, ranging from more than 6 months to "never." This level of widespread pessimism is not surprising after a year of unprecedented global economic uncertainty, and was exactly the economic environment that the Company was preparing for in developing
the NBSR. To the extent that new business entrepreneurs share this pessimistic outlook, they may elect to sit on the sidelines until economic conditions improve. The NBSR is focused acutely on addressing that new business hesitancy by creating an incentive to help encourage new businesses to move forward with their venture, targeting vacant storefronts for activation.
Q. How, if at all, does the unemployment data provided in Mr. Eastman's testimony support the implementation of the NBSR?
A. The unemployment data provided in Mr. Eastman's testimony reiterates the uncertainty evident in the Pulse Survey data using a different perspective. Mr. Eastman's Figure 6 data point scatter plot illustrates the widely divergent expectations from economic forecasters for GDP growth and resulting payroll gains. Again, this high level of uncertainty was a key basis for developing the NBSR. New businesses opening in previously vacant storefronts will send a strong signal to the business and broader community about the emerging economic recovery, helping to restore confidence and temper the current atmosphere of uncertainty.
Q. How, if at all, does the State Coincident Index information outlined in Mr. Eastman's testimony support the implementation of the NBSR?
A. I believe Mr. Eastman summarized the State Coincident Index information appropriately, when he states, "The economy is beginning to recover, but there is still a large amount to be done before we can declare normality." (OCA St. 5, p. 14, lines 5-6.) The NBSR is one
substantive initiative the Company believes is warranted to assist in the economic recovery of our region.
Q. How, if at all, does the Census Bureau Small Business Pulse Survey data provided in Mr. Eastman's testimony support the implementation of the CRP?
A. As described above, the Census Bureau Small Business Pulse Survey data provided in Mr. Eastman's testimony speaks to the pervasive uncertainty that lingers for many businesses. With more than \(40 \%\) of businesses expecting a prolonged return to normal, this data points to the need for business assistance policies which take a long-term outlook on recovery and provide patient terms to give businesses the room the get back on their feet and return to good standing. The CRP is designed to be directly responsive to those needs.
Q. How, if at all, does the unemployment data provided in Mr. Eastman's testimony support the implementation of the CRP?
A. With expert economists unable to provide consensus forecasts for GDP and job growth, as illustrated by in Mr. Eastman's testimony, businesses are in need of programs such as the proposed CRP that would assist with past arrearages and provide a long runway that account for the uncertain timeline as our communities return to economic prosperity.
Q. How, if at all, does the State Coincident Index information outline din Mr. Eastman's testimony support the implementation of the CRP?
A. I believe Mr. Eastman summarized the State Coincident Index information appropriately, when he states, "The economy is beginning to recover, but there is still a large amount to
be done before we can declare normality." (OCA St. 5, p. 14, lines 5-6.) The CRP is another substantive initiative the Company believes is warranted to assist in the economic recovery of our region.
Q. Are Mr. Knecht's characterizations of the terms and eligibility for the NBSR and CRP accurate?
A. Broadly, yes. For general descriptions of the two programs, please refer to the portion of my rebuttal that responds to Ms. Wilson's direct testimony, above.
Q. Do you agree with Mr. Knecht's characterization that the NBSR is potentially in legal conflict with Section 1304 of the Public Utility Code ("Section 1304")?
A. No. The assertion that the NBSR contradicts Section 1304 calls for a legal conclusion, which I understand will be addressed by counsel in briefs.
Q. Do you agree with Mr. Knecht's assertion that the NBSR is inequitable and discriminatory?
A. No.

\section*{Q. Why do you disagree with Mr. Knecht's assertion that the NBSR is inequitable and discriminatory?}
A. Central to the assertion that the Company's proposal is inequitable and discriminatory is the question of how the Company should best serve its customers, and whether a community-serving entity such as the Company should take into account the economic conditions of its communities when designing its rate structure. The question remains, in the face of an unprecedented economic impact from a global pandemic, is the utility's role in its community to simply continue providing safe, reliable service as he asserts, or is it reasonable to consider that additional assistance may be needed? Setting aside the suggestion that the shareholder contribution is insufficient - when that contribution toward charitable giving alone is annually approximately \(\$ 2\) million - the scale of the economic problem presented by the pandemic demands a more resourceful approach. With more than 9000 small and mid-sized business customers in arrears in excess of \(\$ 6.6\) million, as detailed previously in my testimony, the Company's proposals attempt to leverage economic development incentives for the equitable benefit of the entire rate class. As the rate discount of the NBSR and the arrearage forgiveness of the CRP are socialized across the rate class, the Company projects a modest and reasonable impact to the rates of noneligible ratepayers. While not equal, these impacts are indeed equitable. Neighboring businesses that have not suffered an economic hardship and resultant arrearage from the pandemic or that are not contemplating the risk to their capital of a new business venture in the midst of unprecedented uncertainty will see economic development benefits that inure real value to them as members of the business community. As businesses receive assistance through these programs, and remain viable through the downturn caused by the
pandemic, neighboring businesses that do not receive assistance through these programs nevertheless realize the benefits of a healthy, thriving local economy. But for these assistance programs, incumbent businesses could continue to falter and vacant storefronts could remain vacant, putting downward pressure on Company revenue representing a material risk to drive increased rates for all customers. The assertion that the NBSR is discriminatory \({ }^{8}\) does not hold water, as the program eligibility will be clearly defined and open to all members of the rate class, without regard to business type. Eligibility criteria are modeled after well-established governmental policies that best align with addressing the disproportionate economic impacts of the pandemic.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony over the course of this proceeding as may be necessary.

\footnotetext{
\({ }^{8}\) As stated previously, the assertion that the NBSR contradicts Section 1304 calls for a legal conclusion, which I understand will be addressed by counsel in briefs.
}

\section*{BEFORE THE}

PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company

\author{
Statement No. 6-R
}
Q. Please state your full name and business address.
A. My name is Yvonne Phillips. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, Meter Operations.
Q. Did you pre viously submit direct testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 6, on April 16, 2021.
Q. What is the purpose of your rebuttal testimony?
A. I respond to the direct testimony of Teresa Ringenbach, Nationwide Energy Partners ("NEP") Statement No. 1, regarding metering of multitenant buildings.
Q. Please summarize Ms. Ringenbach's testimony.
A. Ms. Ringenbach describes NEP's business model as it pertains to submetering multi-tenant buildings, and articulates an interest in implementing this business model in the Company's service territory. Ms. Ringenbach objects to the Company's existing and proposed tariff rules 18 and 41, alleging that they,
"operating together, unreasonably bar the use of master meters in circumstances where their use would promote conservation and provide benefits to tenants that would be unavailable to them if they were individually metered residential customers of the utility." (NEP St. No. 1, p. 4, lines 3-5). She acknowledges that the Company has proposed a tariff rule 41.1 to allow master metering in limited circumstances, which I described in my direct testimony, but alleges that the scope of this proposed rule is "unreasonably narrow." Ms. Ringenbach proposes a new Rule 41.2 to the Company's tariff that would accommodate NEP's submetering business model in the Company's service territory.
Q. Do you agree with Ms. Ringenbach's position that the Company should allow expanded tenant submetering?
A. No.
Q. Why do you disagree with Ms. Ringenbach's position?
A. I disagree with Ms. Ringenbach's position for several reasons, which I will discuss further below. As a threshold matter, it appears from Ms. Ringenbach's testimony that NEP seeks to step into the utility's shoes with respect to submetered tenants. I believe it would be inappropriate for an unregulated entity such as NEP to fill such a role.
Q. Why do you say that "NEP seeks to step into the utility's shoes with respect to submetered tenants"?
A. NEP's business model, as described in Ms. Ringenbach's testimony, involves the performance of several functions that would otherwise be performed by a utility. Together with a submetered building's landlord (or "Property Owner,") NEP performs metering, billing, payment processing, service termination, electric supply acquisition, customer service, and limited customer service functions. For buildings in its service territory, these functions (and others) would otherwise be performed by Duquesne Light, subject to the oversight of the Pennsylvania Public Utility Commission.

\section*{Q. Why is it inappropriate for NEP to fill this role?}
A. It is inappropriate for at least two reasons.

First, NEP is not subject to the same governmental oversight as regulated utilities such as Duquesne Light. In fact, in several respects, NEP acts as both utility and regulator - it establishes its own rates (within some limitations, which I discuss below), determines the types and quality of service it will offer, and adjudicates its own tenant dispute procedures. \({ }^{1}\) As a result, NEP-submetered tenants enjoy substantially fewer due process and service-quality rights than they would as individually-metered customers of Duquesne Light.

Second, despite charging tenants rates that approach (and, as discussed below, often exceed) Duquesne Light's corresponding rates for residential customers, NEP delivers fewer products and services.

\footnotetext{
\({ }^{1}\) Exhibit YP-1-R (DLC-NEP I-6.m).
}

\section*{I. MS. RINGENBACH'S CRITIQUES OF DUQUESNE LIGHT'S PROPOSAL}
Q. Please summarize the purpose of this section of your testimony.
A. In this section, I respond to Ms. Ringenbach's critiques of the Company's proposal to allow master metering in certain instances, as well as her miscellaneous criticisms of the Company as they pertain to master metering more generally.

Ms. Ringenbach also proposes a new tariff rule, Rule 41.2, that would accommodate submetering (including but not limited to submetering by NEP) in the Company's service territory. I address this proposal in Section II of my testimony.
Q. Ms. Ringenbach critiques Duquesne Light for not performing studies in the last five years analyzing potential impacts of master metering, such as interor intra-class revenue allocation impacts that might result from allowing existing customers to adopt master metering (NEP St. No 1, p. 6). Please respond.
A. Duquesne Light did not perform such studies because they concern a hypothetical scenario that Duquesne Light is not proposing, and which - as I discuss further below - I believe is inadvisable for several reasons.
Q. Ms. Ringenbach states that NEP was "neither informed nor invited to" the master metering collaborative conducted purs uant to the settlement in Docket No. R-2018-3000124 (NEP St. No. 1, p. 8, lines 10-16). Please respond.
A. The purpose of Ms. Ringenbach's statement is not clear. As Ms. Ringenbach acknowledges, NEP was not party to the proceeding at Docket No. R-20183000124 that originated the collaborative (NEP St. No. 1, p. 8, line 12). Nevertheless, the settlement in that proceeding is public record, and several entities that were not party to that proceeding participated in the collaborative, including Solar United Neighbors, Sierra Club, Retail Energy Suppliers Association, and Housing Authority of the City of Pittsburgh. It seems somewhat surprising that NEP would have been unaware of the collaborative if, as Ms. Ringenbach suggests, it has been in contact with customers in Duquesne Light's service territory that wish to adopt master metering.

Finally, to the extent Ms. Ringenbach is attempting to suggest that Duquesne Light has not been sufficiently transparent in its communications, such implication should be rejected out of hand. As Ms. Ringenbach's testimony indicates, the Company engaged directly with NEP via email and videoconference during the development of its master metering proposal. And as a party to this proceeding, NEP has ample opportunity to conduct discovery regarding the Company's proposal, and to advocate for its own.

\section*{Q. Ms. Ringenbach suggests that the Company's existing tariff rules 18 and 41 are inconsistent with the Public Utility Regulatory Policies Act of 1978 ("PURPA") (NEP St. No. 1, p. 4, lines 5-13). Please respond.}
A. The cited lines of Ms. Ringenbach's testimony read:

While tariff Rules 18 and 41, were put in place more than 40 years ago, they appear to have been implemented as a full ban on master
metering and in my opinion not consistent with the Public Utility Regulatory Policies Act of 1978 (PURPA). The policy behind PURPA was to incentivize residential customers (including tenants in multifamily buildings) to conserve electric energy by metering and paying based on their actual usage rather than being billed without regard to their actual individual use. Tariff Rules 18 and 41 effectively and unnecessarily prohibit submetering arrangements that could achieve the higher conservation benefits than individual metering.

I am not an attorney, and neither is Ms. Ringenbach (Exhibit YP-1-R (DLC-NEP I-14)). Therefore, I will not opine on whether Duquesne Light's existing tariff rules are consistent with the requirements of PURPA; I understand that such issues will be addressed in briefs. However, I will note that Rule 41, which requires all residential dwelling units connected after January 1, 1981 to be individually metered, was added to the tariff via Supplement No. 33 to Tariff No. 14 and became effective July 15, 1979 - shortly after PURPA became law.
Q. You indicated in your direct testimony that, despite tariff rules requiring individual metering for buildings connected after 1981, the Company still has master-metered residential buildings in its service territory. Does Ms. Ringenbach critique the Company's energy efficiency offerings to these customers?
A. Yes. I note at the outset that these critiques of Ms. Ringenbach's apply only to a master metering configuration that, per tariff rule 41 , has not been allowed since 1981 and is therefore likely to become less common over time. That said, I summarize and respond to Ms. Ringenbach's comments below.
Q. With respect to owners of these buildings, Ms. Ringenbach avers, "Property owners under the current DLC rules who invest in energy efficiency or demand response for a tenant will likely not recover their investment and therefore may not be incented to make such an investment" (NEP St. 1, p. 15, lines 17-20). Ple ase respond to Ms. Ringenbach's assertion.
A. Ms. Ringenbach attempts to describe, in-part, the "split incentives" barrier to energy efficiency program participation by multifamily owner-operators and occupying tenants. Split incentives exist when the property owner does not pay the electric bill for a given unit, so is less motivated to spend capital on high efficiency equipment to reduce energy use. Conversely, the tenant does not own the building, so has less incentive to invest in the building to save energy.

The Company's energy efficiency programs address split incentives through a direct-install program design. Energy saving equipment is installed at no cost to the tenant. In the cases where the owner-operator owns the equipment being replaced a cost share is negotiated where the facility receives new equipment and pays a negotiated amount for its cost-share. See the Company's Phase IV Energy Efficiency and Conservation Plan ("EE\&CP") at Docket No. M-2020-3015228.
Q. With respect to te nants of these buildings, Ms. Ringenbach states, "a tenant does not have the ability to install or use utility weathe rization, efficiency or technology programs des pite paying toward EE\&C programs. In othe r words, tenants have the costs but not the benefits of these programs" (NEP St. 1, p. 19, lines 2-13). Please respond.
A. Ms. Ringenbach is incorrect. Pursuant to the Company's Phase IV EE\&CP, Duquesne Light multifamily facility treatments include LED lighting, advanced power strips, ENERGY STAR dehumidifiers, refrigerators, freezers, room air conditioners, connected (smart) thermostats, heat pump water heaters, ductless mini-split heat pumps, central air conditioners, air source heat pumps, air sealing, ceiling insulation, basement wall insulation, exterior wall insulations, floor insulation, electric water heater insulation, pipe wrap, faucet aerators and low flow showerheads on a direct-install basis.

Further, it is not reasonable to assume, as Ms. Ringenbach does, that customers cannot install program-subsidized equipment. Consistent with the Company's EE\&CP, independent sampling is performed to establish program impacts and In Service Rates for technologies provided to participating tenants. The "return" in these energy efficiency investments are independently verified.
Q. Ms. Ringenbach alleges that "most energy efficiency programs require some form of baseline reduction in kilowatt-hours (' kWh '). To achieve this objective, properties typically must show a \(20 \%\) or more reduction in usage" (NEP St. 1, p. 12, lines 12-13). Please respond.
A. Ms. Ringenbach's comments are not reflective of the Company's energy efficiency programs. Pursuant to the Company's Phase IV EE\&CP and relevant Commis sion directive, Duquesne Light's baseline assumptions with respect to energy efficiency savings are established in the Technical Reference Manual, and apply on a measure-
specific basis. There is no such \(20 \%\) minimum reduction in usage associated with the Company's programs.
Q. Ms. Ringenbach states, "DLC's proposed and existing tariff Rules 18 and 41 disconnect any tenant control, shift the costs into a likely 'non-energy' (i.e., rent) related recovery and provide no control over how or what costs tenants pay for their usage" (NEP St. 1, p. 17, lines 19-21). Please respond.
A. Ms. Ringenbach is simply wrong. The Company's "existing tariff Rules 18 and 41" require individual residential metering, which obviously does not disconnect tenants from their electric bills.

Ms. Ringenbach walked back her statement in discovery, stating that it "was made in reference to the Duquesne proposal to allow master metering without submetering of tenants." (Exhibit YP-1-R) DLC-NEP I-22)). However, even as so modified, Ms. Ringenbach's statement remains incorrect, because the Company's proposal is specifically targeted to buildings where tenants would be unlikely to be responsible for utility bills even if they were individually metered. See my direct testimony, DLC St. 6, p. 7 lines 14-17.
Q. Before discussing NEP's proposal, do you have anything further to add regarding the Company's position on its proposed Rule 41.1?
A. Yes. I observe that NEP and the Company have each proposed changes to the Company's master metering rules. The Company's proposal is entirely distinct from NEP's. In the event the Commission opts to deny the Company's proposal,
such determination would not suggest that NEP's proposal should be approved. To the contrary: NEP's proposal should be rejected regardless of the Commission's decision on the Company's proposal.

In fact, the Company would prefer to see both proposals be denied, then for both to be approved. The Company believes that the status quo, in which residential master metering is prohibited, is preferable to a scenario in which NEP's proposal is accepted. Therefore, although the Company believes that its master metering proposal is reasonable, it is willing to withdraw its proposal to the extent needed to protect its customers from NEP's proposal.

\section*{II. NEP'S PROPOSAL}
Q. Ms. Ringenbach alleges several energy efficiency benefits attributable to NEP's proposed submetering model (NEP St. 1, pp. 15-20). Do you agree?
A. No. I agree with Ms. Ringenbach that, compared to master metering, individual tenant submetering can enable different energy efficiency offerings. However, such observation is of little import here, because the Company already requires individual metering for new residential buildings, by which the Company already offers an array of energy efficiency services via its EE\&CP.

To the extent Ms. Ringenbach's comments are intended to suggest that NEP's energy efficiency offerings are superior to the Company's offerings to individually-metered tenants, she does not provide supporting evidence. Ms. Ringenbach does not, for example, quantify the alleged costs or benefits of NEP's
energy efficiency offerings, \({ }^{2}\) or attempt to compare them to Duquesne Light's offerings (the costs and benefits of which are public record, and were vetted by stakeholders as part of the recent Commission proceeding at Docket No. P-20203015228). Instead, Ms. Ringenbach's alleged energy efficiency benefits attributable to submetering tend to be hypothetical, speculative, and/or vague.
Q. Ms. Ringenbach avers that it is "economically bene ficial" for all tenants to be submetered by NEP, as compared to being an individually-metered customer of Duquesne Light (NEP St. No. 1, p. 23, lines 7-9; Exhibit YP-1-R (DLC-NEP I-36)). Do you agree?
A. No. I disagree with Ms. Ringenbach's assertion for three reasons. First, it appears that the rates NEP charges frequently exceed what tenants would or could otherwise pay as an individually-metered utility customer. Second, NEP-submetered tenants do not have access to the utility's assistance programs, such as CAP, which could substantially reduce their bills. Finally, whether a given product is "economically beneficial" - i.e., the product's value - is a function of the product's quality as well as its price. Based on NEP's descriptions of the services it provides, it appears that its tenants do not receive a level of value commensurate with what they would otherwise receive from Duquesne Light. I discuss each of these in further detail below.

\footnotetext{
\({ }^{2}\) For example, Ms. Ringenbach states that NEP's submetering model facilitates tenant participation in PJM demand response programs, and " \([t]\) hebenefits of this participation are a sharing of the revenue between the Property Owner, NEP and the participating tenants who receive credits on theirelectricity bills" (NEP St. 1, p. 20, lines 6-8). However, in discovery, NEP failed to quantify the actual value of credits to participating tenants, stating instead that "[demand response] credits are determined by the agreement with the property owner." Exhibit YP-1-R (DLC-NEP I-31).
}
Q. Please summarize how NEP sets its rates for electric service.
A. According to NEP's response to DLC-NEP I-6.a:

The rates charged to residential tenants by NEP are the approved rates of the local electric utility. NEP employs a team of qualified individuals to monitor the approved rates of the local electric utilities in each service territory in which it operates, including all riders and fees, and to incorporate those rates into NEP's billing system on a monthly basis. In order to ensure that amounts billed by NEP do not exceed those that would be billed by the local utility in compliance with \(66 \mathrm{Pa.C.S}\). Section 1313, Price upon resale of public utility services, each component of the utility's rates are rounded down to the nearest cent prior to being summed for a total billing amount.

NEP states that it then subtracts \(\$ 2\) from the tenant's monthly bill "to mimic the benefits residents are likely to realize by successfully shopping for an electric generation supplier" (NEP St. No. 1, p. 10, lines 22-23). NEP clarifies that this \(\$ 2\) credit "is specific to the DLC tariff as a requirement of NEP's proposed master option in the Duquesne service territory," (Exhibit YP-1-R (DLC-NEP III-3)); it appears that NEP may not offer this credit in other Pennsylvania EDC service territories. See Exhibit YP-1-R (DLC-NEP Attachment I-7.a).
Q. Do you agree that NEP's bill-calculation method produces bills that are less than what its tenants would otherwise be charged as individually-metered customers of Duquesne Light?
A. No. In fact, in several respects, it appears that NEP's tenants may be charged more for electric service than they would otherwise be charged as individually-metered customers of Duquesne Light.

\section*{Q. Please explain.}
A. First, NEP appears to charge rates for electric service other than basic electric delivery and supply that are frequently higher than the corresponding utility rates. In each of the below examples, NEP's rate is higher than Duquesne Light's corresponding rate. I have also included comparisons to corresponding rates contained in PECO's tariff because NEP's example bills and customer notices concern service provided in PECO's service territory:
- Service reconnection: NEP charges customers \(\$ 50\) to reconnect service following termination for non-payment. See Exhibit YP-1-R (DLC-NEP Attachment I-7.a, "Disconnect Notice"). NEP avers in discovery that this fee is "analogous to the \(\$ 50.00\) fee for reconnection of service in DLC tariff rule 40.A" (Exhibit YP-1-R (DLC-NEP III-5)). However, in fact, Duquesne Light's applicable tariffed rate for service reconnection (i.e., for remote reconnects of customer premises equipped with a smart meter, which comprises nearly all of Duquesne Light's residential customers) is \(\$ 20\). See Exhibit YP-2-R (Tariff Rule 40). PECO's corresponding tariffed rate for service reconnection is also \(\$ 20\). See Exhibit YP-3-R (PECO Tariff Rule 18.7).
- Late payment charges: NEP charges a monthly fee of \(\$ 20\) to customers with an arrearage of \(\$ 100\) or more (Exhibit TR-9; Exhibit YP-1-R (DLC-NEP I-6.h)). This corresponds to an effective monthly late payment charge rate of up to \(20 \%\) \((\$ 20 / \$ 100=20 \%)\). By comparison, Duquesne Light's late payment fee rate is 1.25\% per month. See Exhibit YP-2-R (Tariff Rates RS, RH, and RA). PECO's
tariffed rate for residential late fees is \(1.5 \%\) per month. See Exhibit YP-3-R (PECO Tariff Rule 17.5).
- Payment processing charges: NEP charges \(\$ 3.50\) for payments made over the phone (Exhibit YP-1-R (DLC-NEP I-51)). By comparison, Duquesne Light charges no such fee, for a corresponding effective rate of \(\$ 0\). I am not aware if PECO charges a fee for payments made over the phone, but PECO's tariff does not appear to include such a fee, so it is possible that PECO's corresponding effective rate is also \(\$ 0\).
- Returned payment charges: NEP charges a fee of \(\$ 30\) for payments not honored by the tenant's bank (returned payments) (Exhibit TR-9; Exhibit YP-1-R (DLC-NEP Attachment I-7.a; DLC-NEP III-4)). By comparison, Duquesne Light's tariffed rate for returned payment charge is \(\$ 20\). See Exhibit YP-2-R (Tariff Rule 21.3). PECO's corresponding tariffed rate for returned payment charge is also \(\$ 20\). See Exhibit YP-3-R (PECO Tariff Rule 17.10).
- Deferred payment arrangement charges: NEP charges a \(1 \%\) monthly interest rate on customer debt subject to a deferred payment plan (Exhibit YP-1-R (DLC-NEP I-6.k; DLC-NEP III-1)). By comparison, Duquesne Light imposes no such charge, for a corresponding effective rate of \(0 \%\). I am not aware if PECO imposes such a charge, but PECO's tariff does not appear to include such a charge, so it is possible that PECO's corresponding effective rate is also \(0 \%\).

This list may not be comprehensive; it does not include other charges billed by NEP that may or may not be directly related to basic electric service. For example, NEP's bills to its tenants may include additional charges associated with
"other community utility or service bills," (Exhibit YP-1-R (DLC-NEP I-53)). NEP asserts that such charges are "assessed under authority derived from the lease agreement between the property owner and resident," to which NEP is not a party (Exhibit YP-1-R (DLC-NEP I-5)). As such, the nature of these "other community utility or service bills," and the extent to which they are associated with basic electric service and/or correspond to utility rates, are not immediately clear. However, it is clear that such charges are relevant here, inasmuch as a tenant's nonpayment of these charges is grounds for NEP to terminate their electric service (Exhibit YP-1-R (DLC-NEP I-53)).

I am not an attorney, so I will not opine on whether NEP's rates in excess of the corresponding utility rates constitute violations of Section 1313 of the Public Utility Code. I understand that such issues will be addressed in briefs.

\section*{Q. Are there other ways in which NEP's tenants would be charge d less if they were individually-metered customers of Duquesne Light?}
A. Yes. NEP's rates for electric delivery and supply exceed, on a total bill basis, the corresponding rates that a typical residential customer would pay by participating in Duquesne Light's Standard Offer Program. The Standard Offer Program, which is available to all residential customers not enrolled in CAP, allows customers to enroll with an electric generation supplier (EGS) at a supply rate (inclusive of transmission charges) of 7\% below Duquesne Light's then-effective Price to Compare for default electric supply. See Docket No. P-2020-3019522. At Duquesne Light's proposed distribution rates, the monthly bill for a typical default
service customer on Rate RS using 600 kWh per month will be \(\$ 107.85\), of which \(\$ 42.39\) comprises charges for electric supply and transmission. Enrolling in the Standard Offer Program would reduce the supply and transmission portion of the customer's bill by \(7 \%\), yielding a total bill of about \(\$ 104.88\). By comparison, NEP would charge this customer about \(\$ 105.80\), plus or minus a few cents depending on rounding.

\section*{Q. Ms. Ringe nbach acknowledges that NEP's te nants cannot choose their own electric supplier (Exhibit YP-1-R (DLC-NEP I-6.j)), but avers that other services provided by NEP replace the benefits that tenants would otherwise receive from shopping. Do you agree?}
A. No. Ms. Ringenbach avers that NEP's practice of choosing zero-carbon electric supply, together with the \(\$ 2\) monthly bill "credit" provided to tenants, "mimic[s] the benefits residents are likely to realize by successfully shopping for an electric generation supplier" (NEP St. No. 1, p. 10, line \(20-\mathrm{p} .11\), line 3). This is not accurate. First, NEP offers no evidence that its \(\$ 2\) "credit" is comparable to the savings a customer could realize by shopping for electric supply. And as I discussed above, the typical residential Duquesne Light customer can save around \(\$ 3\) per month simply by participating in the Standard Offer Program. Second, while NEP's practice of choosing zero-carbon electric supply is laudable, it is not necessarily consistent with the preferences of all of its tenants. For example, some tenants may prefer a time-of-use supply option, which can incent load-shifting to off-peak hours. NEP does not offer such an option (Exhibit YP-1-R (DLC-NEP I-6.u)).

\section*{Q. With respect to low-income customers or tenants, Ms. Ringenbach avers that} the \(\$ \mathbf{2}\) monthly "cre dit" is comparable to CAP. Do you agree ?
A. No. In discovery, Ms. Ringenbach acknowledged that she did not compare NEP's charges to what a tenant would be charged by Duquesne Light if enrolled in CAP (Exhibit YP-1-R (DLC-NEP I-45)). In fact, NEP's \$2 monthly "credit" falls far short of the bill savings that a low-income tenant could otherwise realize as an individually-metered customer to Duquesne Light. DLC's CAP, available to residential customers whose total gross household income is at or below \(150 \%\) of the FPL, offers participating customers a Percent of Income Payment Plan (PIPP), an opportunity for arrearage forgiveness over a 24-month period of time with each full monthly payment, protections against loss of electric service, and referrals to other Duquesne Light and community programs and services. Through CAP, the Company annually provides (among other financial benefits) approximately \(\$ 24.5\) million in bill credits to about 36,000 participating customers. See DLC St. 7, pp. 7-8; Docket No. M-2019-3008227. This translates to an average monthly bill discount of about \(\$ 57\) per customer.

Moreover, CAP is not the only payment-assistance program that is unavailable to NEP's tenants. Low-income tenants submetered by NEP will also lose access to the Company's Hardship Fund and Smart Comfort programs, as well as LIHEAP. The Company partners with Dollar Energy to provide a Hardship Fund which matches customer contributions up to \(\$ 375,000\) annually. The Hardship Fund provides additional bill-payment assistance to lower-income residential
customers at or below \(300 \%\) of the FPL who are unable to pay their electric service. The Company also offers LIURP, which targets residential customers whose gross household income is less than \(150 \%\) of FPL and senior citizens whose gross household income is less than \(200 \%\) of FPL with base load electric usage more than 500 kWh per month and have been residing at their current address for at least six months. The objective of this program is to reduce the energy usage and electric bills of low-income customers, provide safer living conditions for low-income customers through the reduction of secondary heating devices, educate the customer on current conservation practices, and make tailored referrals to other assistance programs such as CAP, Dollar Energy Fund, LIHEAP, and other weatherization programs.
Q. Ms. Ringenbach states that "NEP does not typically service low income properties" (Exhibit YP-1-R (DLC-NEP I-6.p)). Does this impact your critique of NEP's lack of comparable payment assistance programs for low-income tenants?
A. No. First, just because a given building is not a "low income property" does not mean that its residents do not have low incomes. Even if it were the case the NEP's tenants are less likely to be low-income than Duquesne Light's overall residential customer population, this fact would not undermine the value of assistance programs to those tenants who have low incomes, including those who experience a loss of income while living in an NEP-submetered building. Recent experiences with the COVID-19 pandemic demonstrate that someone's economic security can
change quickly, and tenants who have experienced loss of income have fewer options for support for their utility bills in a NEP building.
Q. Why do you say that NEP's tenants do not receive a level of value commensurate with what they would otherwise receive from Duquesne Light?
A. As discussed above, NEP charges rates that approach, and may frequently exceed, the rates that a tenant would or could otherwise pay as an individually-metered Duquesne Light customer. However, the scope of services that NEP provides in return is markedly lower than what Duquesne Light would provide. Thus, an NEP tenant realizes less "bang for their buck" than they would as an individuallymetered Duquesne Light customer.
Q. Please explain the ways in which NEP appears to provide a reduced scope of services compared to Duquesne Light.
A. There are several respects in which NEP's services fall short of Duquesne Light's standard. Some of these I have already discussed elsewhere in testimony: NEP does not provide low-income assistance programs, and its energy efficiency programs are not clearly superior to Duquesne Light's. Some of these I discussed already in my direct testimony: individually-metered tenants can choose their own electric supplier; are entitled to the smart meter functionalities described in Duquesne Light's smart meter plan; and are not subject to potential misuse of landlord-owned submeter. Additionally, NEP does not provide its tenants with other functionalities,
programs, services, or due process comparable to those Duquesne Light provides its customers.

Additionally, it appears that tenants may not have control over how their payments are applied. Since multiple services (electric, water, community charges, etc.) are included on a single bill, the question is what happens when the tenant is behind on their charges. For example, during the COVID-19 emergency, tenants could not be evicted from their apartments for failure to pay their rent. Pennsylvania electric distribution companies, including Duquesne Light, were also restricted from terminating service for nonpayment during the emergency. However, NEP terminated service to 27 residential tenants in 2020 (Exhibit YP-1R (DLC-NEP I-2)). Some of these tenants' service may have been terminated multiple times. In other words, though NEP may not have formally evicted those tenants, it may have effected constructive eviction by terminating their electric service.

\section*{Q. How do the functionalities of NEP's submetering systems fall short of those provided by Duquesne Light?}
A. Duquesne Light has deployed smart meter technology as provided under Act 129 of 2008, the Commission's Implementation Order entered June 24, 2009 at Docket No. M-2009-2092655, and the Company's Smart Meter Plan at Docket No. P-2015-2497267. NEP states they use the ITRON Centron II and Sentinel meters, which do not offer full functionalities required under Commission directive for Duquesne Light's smart meters. For example, NEC's AMI Centron

II and Sentinel meters cannot be reprogrammed over the air, and do not have the data protocols for network communication as specified in ANSI Standard C12.22. See Exhibit YP-1-R (DLC-NEP I-10). The importance of this capability is to give individual customers the flexibility to automatically switch between different rates and rate structures, such as net metering or time-of-use metering (which NEP also does not offer to tenants, see Exhibit YP-1-R (DLC-NEP I-6.u; I-10). Duquesne Light's meters also support automatic load control, at customer request, via a Zigbee interface with customers' smart devices.

Additionally, pursuant to Commission directive, the Company's smart meters "provide customers with direct access to and use of price and consumption information." It appears that NEP does not have (or does not employ) such functionality, as its tenant bills do not include a per-kWh rate for electricity. See Exhibit TR-9 and Exhibit YP-1-R (DLC-NEP Attachment I-7.a).

\section*{Q. What other programs and services does Duquesne Light provide to residential customers that are superior to NEP's corresponding offerings?}
A. Examples of such programs and services include:
- Budget billing: Duquesne Light allows customer to spread bills out over 12month periods. NEP does not offer budget billing. (Exhibit YP-1-R (DLC-NEP I-6.s)).
- Deferred payment plans: Duquesne Light offers payment arrangements pursuant to the Commission's regulations and other applicable Commission Orders. Depending on the customer's income, this can include payment
arrangements as long as 5 years with zero up-front payment. In contrast, NEP appears to only offer payment arrangements up to 9 months in duration and with \(30 \%\) to \(50 \%\) of the tenant's balance due up-front. (Exhibit YP-1-R (DLC-NEP I-6.k)). Additionally, as I discussed earlier, NEP charges a fee for customers to participate in a deferred payment plan, whereas Duquesne Light does not.
- Bill payment terms: Consistent with Commission requirements, Duquesne Light's bills are due within a minimum of 20 days of issuance, and the balance becomes subject to collections actions and late payment charges following an additional 5-day grace period, for a minimum of 25 days. In contrast, NEP's bills are due within 14 days of issuance, and the amount is deemed overdue (and subject to NEP's late payment charges) following a 7-day grace period, for a total of 21 days. (Exhibit YP-1-R (DLC-NEP I-6.h)).
- Post-termination notices: Duquesne Light posts a notice at a customer's residence upon termination of electric service. NEP does not. (Exhibit YP-1-R (DLC-NEP I-7.d)).
- Winter termination protections: Duquesne Light does not terminate service to residential customers for nonpayment during the period December 1 through March 31 (the "winter moratorium"). NEP, however, does. (Exhibit YP-1-R (CAUSE-PA-NEP I-39.))

This list is likely not comprehensive. Because some responsibilities related to utility functions and charges appear to be distributed between NEP and the landlord (for example, when and how to proceed with service termination, see Exhibit YP-1-R (DLC-NEP I-6.i)), it is difficult to fully assess the scope or level
of such services provided to tenants. In my view, this opacity further diminis hes the relative value of NEP's services.

\section*{Q. Do NEP's tenants receive less due process than they would as individuallymetered customers of Duquesne Light?}
A. Yes. As an Electric Distribution Company, Duquesne Light is subject to extensive governmental oversight and regulation, which provide for a high degree of transparency, and entitle customers to a broad array of protections, that NEP's tenants do not appear to enjoy. As I am not an attorney, I am not expert in the relevant statutes and regulations governing EDCs, and I understand that such issues will be addressed in briefs. But I would note for the record the following facts:
- NEP does not follow a public, transparent process (such as this rate proceeding) to establish its rates (Exhibit YP-1-R (DLC-NEP I-6.c)). NEP determines certain of its rates by referring to the corresponding EDC's delivery and default supply rates, which may or may not bear any resemblance to NEP's cost structure. Other rates of NEP - such as service reconnection, late payment, interest rates, "community charges," etc. - appear to be established either at NEP's sole discretion, or through agreements between NEP and landlords to which tenants are not privy (Exhibit YP-1-R (DLC-NEP I-6.v)).
- NEP does not maintain a public tariff articulating uniform standards, terms, programs, and rules applicable to the electric service it provides to tenants. Rather, such terms are contained within tenants' leases with their landlords, and/or in landlords' contracts with NEP (Exhibit YP-1-R (DLC-NEP I-7.b)).

This raises the prospects that such terms might not be consistent, comparable to Duquesne Light's programs or tariffs, or binding on NEP. Furthermore, it does not appear that NEP's terms are subject to prior review or approval by an independent regulatory body.
- NEP frequently does not provide tenants with information directly relevant to their electric service, including (but not necessarily limited to) post-termination notices (Exhibit YP-1-R (DLC-NEP I-7.d)); changes in upcoming rate or service changes (Exhibit YP-1-R (DLC-NEP I-7.e-f)); or information on how to file complaints concerning electric service (Exhibit YP-1-R (DLC-NEP I46).

\section*{Q. Does Ms. Ringenbach respond to your concern in direct testimony that allowing existing buildings to convert from individual to master metering may produce shifts in revenue allocation?}
A. Yes. Ms. Ringenbach avers, "Based upon our experience in Pennsylvania and other states, we have no reason to believe that implementing master metering in Duquesne's service territory along the lines of NEP's business model would trigger a significant shift in DLC's inter or intra class revenue allocations between now and its next likely rate case" (NEP St. 1, p. 24, lines 3-6).

\section*{Q. Do you agree?}
A. No. First, Ms. Ringenbach's definition of "significant shift" in this context borders on the absurd. She states in discovery that a " \([s]\) ignificant shift would be a change
that would lead to a \(\mathbf{1 0 \%}\) or [sic] reduction in total revenue due to residential customer load to commercial load switching due to master metering without any other reductions in costs to serve" (Exhibit YP-1-R (DLC-NEP I-43)) (emphasis added). The Company's projected 2022 total revenues at proposed rates are approximately \(\$ 1,045,000,000\). See DLC Exhibit 1, DFR IV-A, p. 3 of 6 . Thus, by Ms. Ringenbach's reckoning, an annual revenue reduction of \(\$ 100\) million would not be "significant." I respectfully disagree.

Second, Ms. Ringenbach fails to present any evidence to disturb the fact that customer migration from residential to commercial classes necessarily has revenue allocation impacts. While I am admittedly not a rate design expert, I understand that the number of customers in a given rate class, and those customers' loads, are fundamental facts that inform the development of rates. Ms. Ringenbach does not offer any such facts, nor does she estimate the number of buildings or customers that might switch rate classes under NEP's proposed rule.

\section*{Q. Do you have any additional concerns regarding NEP's proposed tariff rule} 41.2?
A. Yes. Setting aside my substantive concerns articulated above regarding NEP's submetering proposal, the NEP's proposed tariff rule is also unreasonably vague, and would likely be impractical in application.

\section*{Q. Please explain.}

\begin{abstract}
A. NEP's proposed tariff rule, included as Exhibit TR-11, articulates eligibility criteria for master metered buildings, and then proposes the following process by which master metering would be implemented:

Customers or their authorized representative permitted to use Master Metering under this Rule shall also comply with the following:
1.The Company may request and the Customer or its authorized representative shall provide within 60 days of a request information to certify ongoing compliance with the above criteria: and

The Company shall provide a Commission approved form for Customer or Authorized Representative contact information and required details to ensure proper delivery of such a request; Customers or their authorized representative shall notify Duquesne of their decision to Master Meter under this Rule and shall submit the notice to the Company using a form previously reviewed and approved by the Commission. The Company shall make the form available on its website. The Company shall advise the Customer if the form has any deficiencies within fourteen (14) days of its submission. The Company shall participate in a Commission staff mediation of any unresolved deficiencies should one be requested by the Customer or its authorized representative.
\end{abstract}

NEP thus proposes a novel mediation process, to be administered by Commission staff, to resolve potential deficiencies in customers' master metering requests.

NEP does not provide evidence to indicate whether the Commission is willing or equipped to assume this role; the Commission bureau(s) responsible to administer the mediation process; how such mediation process should proceed; or whether or how Commission staff review would differ from the Commission's existing complaint procedures. Moreover, NEP did not provide a copy of the master metering request form that it proposes would be the subject of Commission staff's review (see Exhibit YP-1-R (DLC-NEP I-41)), which further obscures the nature of the Commission staff's task, and its associated workload.

Finally, I observe that for all the ways in which I believe NEP's submetering operations would harm customers, there is little in NEP's proposed Rule 41.2 that would prevent NEP (or any other submetering company) from implementing something even more detrimental to customers in the future. The standards to which Rule 41.2 would hold submetering companies are quite low, and include almost nothing in the way of tenant protections. Even if the Commission determines that NEP's services as described in its presentation in this case are acceptable - which the Commission should not do - it still should not approve Rule 41.2, which would open the door to tenant abuses not described in NEP's presentation.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 7-R

Rebuttal Testimony of Katherine M. Scholl
Subject: Residential COVID-19 Debt Relief, Universal Service, and Various Customer Service Issues
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\section*{I. Introduction and Summary}

\section*{Q. Please state your full name and business address.}
A. My name is Katherine Scholl. My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh PA 15219

\section*{Q. What is your position at Duquesne Light Company ("Duquesne Light" or "Company")?}
A. I am the Director Billing and of Revenue Management.
Q. Have you pre viously submitted testimony in this proceeding on behalf of Duquesne Light?
A. Yes. On April 16, 2021, I submitted direct testimony (Duquesne Light Statement No. 7) which details the Company's residential customer assistance programs and proposals.
Q. What is the purpose of your rebuttal testimony?
A. The purpose of my rebuttal testimony is to respond to the direct testimonies submitted by non-Company parties in this proceeding that address residential customer assistance proposals. Specifically, this includes: the Pennsylvania Public Utility Commission's ("PUC" or the "Commission") Bureau of Investigation \& Enforcement ("I\&E") Witness Wilson; the Office of Consumer Advocate ("OCA") Witness Colton; The Coalition for Affordable Utility Service and Energy Efficiency of Pennsylvania ("CAUSE-PA") Witness Geller; the Natural Resources Defense Council ("NRDC") Witness Levin, and The Pennsylvania Weatherization Providers Task Force ("PWPTF") Witness Brady.
Q. How is your rebuttal testimony organized?
A. Section II responds to I\&E Witness Christine Wilson's direct testimony (I\&E Statement No. 1), which recommended disallowance of the Residential Covid-19 Debt Relief Program. Section III responds to certain aspects of OCA Witness

Rodger Colton's (OCA Statement No. 4) which discusses the Residential COVID-19 Debt Relief program, universal services and the current economic conditions resulting from the pandemic. Section IV responds to CAUSE-PA's Witness Harry Geller testimony (CAUSE-PA Statement No. 1) recommending various changes to low income programs for residential customers. Section V responds to the direct testimony of NRDC Witness Amanda Levin related to residential COVID-19 Debt relief. Finally, Section VI responds to the direct testimony (PWPTF Statement No. 1) of PWPTF Witness Eugene Brady related to universal services. My rebuttal testimony is organized by witness for the convenience of the parties. However, I make use of cross-references as necessary and appropriate to avoid repetition.

\section*{Q. Are you sponsoring any exhibits with your rebuttal testimony? \\ A. Yes. I am sponsoring various responses to interrogatories, including Duquesne Light's responses to OCA-II-22-26, CAUSE-PA-I-4, CAUSE-PA-I-5, CAUSE-PA-I-31, CAUSE-PA-III-14, and NRDC responses to DLC-I-1 through I-3. These responses are attached and marked as Exhibit KS-1-R. \\ II. I\&E Recommendation regarding Residential Covid-19 Debt Relief Program}

\section*{Q. Have you re viewed I\&E Witness Wils on's testimony in this proceeding?}
A. Yes. I have read Witness Wilson's testimony.
Q. Please summarize I\&E Witness Wilson's testimony regarding the Company's proposed Residential Covid-19 Debt Relief Program.
A. Witness Wilson recommends that the Residential COVID-19 Debt Relief program be disallowed in its entirety for two reasons. First, Witness Wilson suggests that more people are becoming vaccinated, and the economy is reopening, although unemployment remains substantially higher than the pre-pandemic levels.

Second, Witness Wilson notes that PUC Chairman Brown Dutrieuille believes that it is time to return to normal collection practices in light of the extended payment arrangements made available by the Commission on March 11, 2021.

Witness Wilson also states that if the Commission approves the Residential COVID-19 Debt Relief Program it should be funded by shareholders, and that if cost recovery is permitted, the \(\$ 3.5\) million cost should be normalized over a 43 month period.

\section*{Q. Do you agree with Witness Wilson's recommendations?}
A. No. As admitted by Witness Wilson, unemployment rates remain substantially higher than pre-pandemic levels. Uncoincidentally, residential delinquency levels in 2021 closely mirror those of 2020, and are notably higher than in 2019:

Average Residential Delinquency (\$) / Acct
\begin{tabular}{|l|c|c|c|}
\hline & April & May & June \\
\hline 2019 & \(\$ 371\) & \(\$ 354\) & \(\$ 339\) \\
\hline 2020 & \(\$ 459\) & \(\$ 458\) & \(\$ 462\) \\
\hline 2021 & \(\$ 459\) & \(\$ 483\) & \(\$ 460\) \\
\hline
\end{tabular}

What's more, the unemployment rate in Duquesne Light's service territory is a single, incomplete indicator of customer need. While flexible and extended payment arrangements have been given to customers, Duquesne Light specific data suggests that its customers are struggling to maintain those payment arrangements. The table below shows that Duquesne Light customers have higher delinquent balances than in 2019 prior to the pandemic.

Total Delinquency (\$) on Residential Payment Arrangements
\begin{tabular}{|l|c|c|c|}
\hline & April & May & June \\
\hline 2019 & \(\$ 11,006,803\) & \(\$ 10,330,660\) & \(\$ 9,090,630\) \\
\hline 2020 & \(\$ 15,631,452\) & \(\$ 15,656,454\) & \(\$ 15,932,650\) \\
\hline 2021 & \(\$ 8,698,791\) & \(\$ 13,506,150\) & \(\$ 16,275,686\) \\
\hline
\end{tabular}

\section*{Q. Do you agree that shareholders should be required to fund the Residential COVID-19 Debt Relief program if approved by the Commission?}
A. No. The Company's proposed short-term matching fund program incentivizes customers who may be struggling to pay household expenses to prioritize payment to Duquesne Light, which is preferable to customers continuing to amass large uncollectible balances, the cost of which would ultimately be borne by customers.

There is a correlation between higher customer delinquencies and the mandatory extended moratorium on collections. While well-intended, the mandatory moratorium resulted in higher, unaffordable account delinquencies for some customers. The costs associated with the Residential COVID-19 Debt Relief program are analogous to uncollectible expenses, which are recoverable. For these reasons, the Company believes that the Residential COVID-19 Debt Relief program should be approved, including appropriate cost recovery.

It is also important to note that the Company is encouraging customers to apply for available assistance programs as appropriate. The Company's Customer Service Representatives are trained to screen customers who indicate they are having trouble paying their bill for any available energy assistance programs, including CAP, LIHEAP, hardship fund (Dollar Energy Fund), Renters Assistance, etc. Energy assistance programs are also routinely featured in the Company's email blasts to customers, television commercials, and social media posts.

The Company is also fully utilizing traditional collection methods, such as termination for nonpayment. However, as the provider of an essential service, terminations for nonpayment should be deployed a last resort. This is particularly true as customers and the community continue to endure the effects of a deadly health pandemic. New and more contagious variants of the COVID-19 virus continue to penetrate communities causing illness and hospitalizations, particularly among unvaccinated populations. As reported by the Wall Street Journal \({ }^{1}\) :

The country has reported an average of 32,287 new coronavirus cases each day over the past week, according to a Wall Street Journal analysis of Johns Hopkins data, more than double what the seven-day average was 10 days ago. The uptick in cases has touched every state and Washington, D.C., with the seven-day average of newly reported cases exceeding the 14-day average in each place for the past four days, according to the data.

Coronavirus-related hospitalizations have also jumped, rising \(35.8 \%\) between July 7 and July 13 compared with the previous seven days, according to the Centers for Disease Control and Prevention.

Doctors and epidemiologists point to the Delta variant, also known as B.1.617.2, as a main cause. The variant, now dominant in the U.S., is estimated to be 40\%-80\% more infectious than the Alpha variant. First detected in India late last year, Delta played a significant role in a record-setting surge of infections there and has since led to increases in cases around the world. Existing Covid-19 vaccines are effective against the variant, though no vaccine is \(100 \%\) effective.

\footnotetext{
1 "Delta Variant Helps Push Covid-19 Cases Higher in Every State", The Wall Street Journal, July 19, 2021. https://www.wsj.com/articles/delta-variant-helps-push-covid-19-cases-higher-in-every-state11626733436.
}

Duquesne Light has extended considerable effort to address delinquencies above and beyond what is required by the Commission. Nonetheless, data indicates that some customers need additional assistance to address their delinquency and maintain electric distribution service. The proposed Residential COVID-19 Debt Relief program provides a balanced approach to helping those in need while mitigating the burden on other customers.

Finally, Duquesne Light Witness Robert O'Brien (DLC Statement No.10-R) addresses I\&E’s proposal related to the appropriate normalization period.

\section*{III. OCA recommendations regarding Residential Covid-19 Debt Relief}

Program, universal service and residential de posits
Q. Have you reviewed OCA Witness Colton's testimony in this proceeding?
A. Yes. I have read Witness Colton's testimony.

\section*{Q. Please summarize Witnesses Colton's position and recommendations related to Residential COVID-19 Debt Relief.}
A. Witness Colton recommends that the Commission approve Duquesne Light's Residential COVID-19 Debt Relief program with substantial modifications, including:
- That the minimum income eligibility of \(150 \%\) should be eliminated, allowing customers to choose enrollment in the Customer Assistance Program ("CAP") or the Residential COVID-19 Debt Relief program, but not both.
- That the program remain open until December 2022.
- That eligibility be open to residential customers with an arrearage of \(\$ 100\) and 60 days past due.
- That the \(\$ 3\) million budget be reserved exclusively for debt forgiveness.
- That matching forgiveness is granted for each payment up to \(\$ 300\) regardless of whether the payment is on-time or in full, and that there are no limits on the resources that qualify for matching forgiveness.
- That the proposed budget restriction of \(\$ 3\) million be eliminated and to the extent that actual program expenditures exceed \(\$ 3\) million, Duquesne be allowed to reconcile those expenditures and collect the excess through the Universal Service Rider.

\section*{Q. Do you agree with Witness Colton's proposed modifications to the Residential COVID-19 Debt Relief program?}
A. In part. Duquesne Light generally refers payment-troubled customers to its universal services programs, including CAP. Accordingly, customers requesting the Residential COVID-19 Debt Relief program would be referred to universal services as necessary and appropriate based on the information provided to the Company. As the Company's CAP is voluntary, non-CAP customers whose income is at or below \(150 \%\) of the federal poverty level may choose to enroll in CAP, the Residential COVID-19 Debt Relief program, or no program at all. Thus, Duquesne Light agrees to remove the \(150 \%\) income threshold from the Residential COVID-19 Debt Relief program guidelines. As a practical matter, however, the Company will encourage customers to enroll in the assistance program that is most advantageous to them based on their unique circumstances and program eligibility criteria.

The Company also agrees that limiting eligibility to residential customers with and arrearage of \(\$ 100\) and 60 days past due would help to target customers most in need. Accordingly, Duquesne Light accepts OCA's proposed modification regarding the age of the arrearage.

The Company does not agree with the remaining proposed modifications to the Residential COVID-19 Debt Relief program described above.
Q. Please explain why the Company does not support extending the program to December 2022.
A. The Company designed and proposed a short, three (3) month matching forgiveness program for a several reasons.

First, the three-month timing - January through March -- aligns with the months leading up to the end of the winter moratorium. The Company intends to encourage customers to maximize the funds available to them by combining energy assistance grants with the Residential Covid-19 Relief program such that a typical grant of up to \(\$ 300\) would be matched to achieve \(\$ 600\) in debt reduction.

Second, the Company seeks to engage with customers more frequently during the moratorium, encouraging them to seek assistance prior to the typical "rush" that occurs on or around April 1. As proposed, the Residential Covid-19 Relief program is timed to create a sense of urgency to maximize access to available funds.

\section*{Q. Does the Company support reserving the \(\mathbf{\$ 3}\) million budget exclusively for debt forgiveness as proposed by OCA Witness Colton?}
A. The Company intends to reserve the \(\$ 3\) million budget for matching debt forgiveness. The administrative funds \((\$ 500,000)\) will be used to support technical development; customer communications; and any waived reconnection fees.
Q. Please clarify how the Company's Residential COVID-19 Debt Relief matching forgiveness will be applied if approved by the Commission as proposed.
A. As proposed, customers would apply to participate in the program. Upon successful verification of income, the customer will then be encouraged to apply for any available assistance. A single, one-time payment - be it paid directly by the customer or via an energy assistance grant - will be matched, up to \(\$ 300\).
Q. Do you agree that customers should receive matching forgiveness for each payment up to \(\mathbf{\$ 3 0 0}\) ?
A. No. This proposed modification is a fundamental deviation from the purpose, intent and design of the program. As described above, the program is designed to marry Residential Covid-19 program funds with available energy assistance grants. With a maximum of \(\$ 300\) per customer, we can serve a minimum of 10,000 and allow an optimal number of customers to participate. Allowing an individual customer to participate more than once would ultimately lower the number of customers who could receive assistance from the program.
Q. OCA Witness Colton also proposes that the budget restriction of \(\mathbf{\$ 3}\) million be eliminated and to the extent that actual program expenditures exceed \(\mathbf{\$ 3}\) million, Duquesne be allowed to reconcile those expenditures and collect the excess through the Universal Service Rider. Do you agree with this proposal?
A. I do not. The Company seeks to strike a balance between serving customers through this program and through traditional universal services programs. In both types of programs, the costs are borne by residential customers. Setting an appropriate limit on this expense is important for maintaining affordability and ensuring that all residential customers are not unduly burdened by the on-going impacts of COVD-19.
Q. What, if anything, does OCA Witness Colton recommend related to Duquesne Light's low-income and universal service program outreach?
A. Witness Colton recommends that Duquesne Light be directed to submit a detailed three (3) year outreach plan to the Commission's Bureau of Consumer Services (BCS) with the goal of expanding the identification of confirmed low-income customers, expanding CAP, and expanding the number of customers enrolled in CAP particularly for customers at or below \(50 \%\) of the federal poverty level.

\section*{Q. Do you agree with these recommendations?}
A. No. At the outset, the appropriate proceeding to address Duquesne Light's Universal Service and Energy Conservation Plan ("USECP") design elements is in the Company's USECP docket. \({ }^{2}\) Customer outreach, use of community-based organizations, etc. are design elements of the Company's universal service programs (CAP, Hardship Fund and LIURP) that are not directly related to ratemaking impacts or rate consequences of the Company's proposals. Therefore these issues are appropriately addressed in the Company's USECP docket. Indeed, these issues have been raised in the Company's USECP proceedings.

Additionally, Witness Colton's suggestion to require a three-year customer outreach plan places additional burden on the Bureau of Consumer Services (BCS) to review the proposed plan. In 2019, the Commission moved to have USECPs span five years rather than three. If Witness Colton's community outreach plan proposal is required by the Commission, it should align with the timing of the Company's five-year USECP. Otherwise, the proposal threatens to undo efforts to mitigate and streamline the USECP review process. Additionally, the Company's USECP provides information regarding community outreach and the use of CBOs. Requiring a separate three-year Commission-approved plan would reduce the Company's operational flexibility to develop and implement customer communication and outreach strategies, and is unnecessary and duplicative.

\section*{Q. Does Duquesne Light proactively work to identify low-income customers within its service territory?}
A. Absolutely. During the Discovery phase of this proceeding, Witness Colton asked the Company to outline targeted (emphasis added) outreach efforts made to low income customers. I responded by outlining various targeted initiatives undertaken by the Company (see OCA-II-22-26). As I understand it, targeted outreach is

\footnotetext{
\({ }^{2}\) Indeed, theOCA and CAUSE-PA are parties to the Company's current USECP proceeding.
}
outreach that is specifically addressed to an individual. As such, my response included only those tactics that were directed to individual customers, including targeted emails and targeted phone calls. In my response to CAUSE-PA-I-31, I outlined the Company's community and grass-roots efforts and referred Mr. Colton to that response in response to his questions about community and gross-roots efforts.

It appears that Witness Colton also views community and grass-roots efforts as "targeted outreach." In stating that "Duquesne has undertaken no identifiable efforts to work with specifically identified community-based organizations to provide low income outreach"" and "when asked to do so, it did not provide the name of even one community organization with whom it worked to expand its lowincome outreach" Witness Colton failed to acknowledge the significant number of activities undertaken with community partner from 2019 through the present time. As explained in my response to CAUSE-PA-5 CAUSE-PA-I-31, which is attached and marked Exhibit KS-1-R and incorporated by reference, Duquesne Light proactively identifies confirmed low-income customers and participates in a plethora of outreach events.

\section*{Q. Q. Do you agree with Witness Colton's conclusion that Duquesne Light is under-serving its low-income customers?}
A. I do not. Duquesne Light is mindful of the needs of low-income customers as well as the non-CAP residential customers that fund low income programs. As my response to the previous question indicates - and as outlined in CAUSE-PA-I-31, the Company goes to great lengths to work with community partners to reach lowincome customers and to encourage participation in energy assistance programs. In the past five-years, Duquesne Light has made great strides to enhance the services provided to its most economically vulnerable customers. While enrollment in CAP may be lower for some customer segments, the full extent of Duquesne Light's efforts must be recognized. This includes:
- Significant community and customer outreach as detailed above

\footnotetext{
\({ }^{3}\) OCA St. 4 , p. 47 line 10.
}
- providing greater affordability through implementation of the percentage of payment plan (PIPP)
- providing additional grant funding though the Hardship fund in 2020
- providing CAP customers an opportunity to earn forgiveness of their entire delinquent balance in January 2021
- personal, targeted outreach to high use customers for LIURP
- waiving late payment fees
- waiving reconnection fees, and
- granting flexible payment arrangements.

Accordingly, I do not believe that Duquesne Light is underserving its low income customers. To the contrary, I believe the Company has admirably worked to balance the needs of its customers to ensure reasonable, affordable service for all customer populations.

\section*{Q. Witness Colton states that Duquesne Light's Universal Se rvice costs should be allocated to all customer classes. Do you agree with this recommendation? \\ A. No. As explained in my direct testimony (Duquesne Light Statement No. 7, p. 11 lines 6-14), Duquesne Light has not proposed changes to the existing costs allocation of its universal service programs. Commercial and industrial customers are not eligible for the universal service programs and therefore do not directly contribute to the costs of the programs, or directly benefit from the programs. It is my view that that costs and benefits identified in Witness Colton's testimony are ancillary, at best. Duquesne Light continues to believe that the program costs are appropriately borne by the residential customer class.}
Q. In your direct testimony you proposed to set the bad debt offset in Duquesne Light's Universal Se rvice Rider (Rider No. 5) at 35,853. Witness Colton recommends that the bad debt trigger be set at \(\mathbf{3 5 , 0 0 0}\). Do you agree with this recommendation?
A. No. The proposed trigger of 35,863 is reasonable and appropriate. It aligns with the number of customers enrolled in CAP at the end of 2019, just before the pandemic began. At present, the Company has 34,654 customers in CAP. Setting the trigger at 35,863 allows for an increase of 1,199 , or \(3.5 \%\). Further, if the Commission accepts Witness Colton's proposal to increase outreach and enrollment in CAP for customers at \(0-50 \%\) of the FPL, enrollment may be higher. Accordingly, the proposed bad debt trigger of 35,853 is appropriate.
Q. Witness Colton also proposes that Duquesne Light Tariff Rule No. 5 be modified to provide that security deposits be paid in no fewer than four (4) twenty-five percent ( \(\mathbf{2 5 \%}\) ) installments with the first installment billed no less than 30 days after the reconnection of service. Do you agree with Witness Colton's proposal?
A. The Company currently allows customers to pay the security deposit in four (4) \(25 \%\) installments, which is more generous than Commission regulations allow. Historically, Duquesne Light has required payment of a portion of the balance as a condition of service prior to reconnection, as permitted by Commission regulations.

The proposed language states " \([\mathrm{w}]\) hen the Company determines a deposit is required for new service or for reconnection of service as described in Rule No. 40, such deposit shall be payable within a reasonable time period after commencing or reconnecting electric service."

The proposed language was intended to grant the Company the flexibility to allow customers and applicants additional time to pay security deposits without being in conflict with the tariff language. The Company does not believe that codifying the current rule is the best way to achieve the desired goal. Accordingly, the Company proposes the following amendment:
"When the Company determines a deposit is required for new service or for reconnection of service as described in Rule No. 40, such deposit shall be payable within a reasonable time period after commencing or reconnecting service, but not a shorter time period than required by applicable regulations in Chapter 56 of the Pennsylvania Code."

\section*{Q. Please respond to Witness Colton's testimony regarding Duquesne Light's termination efforts.}
A. Witness Colton concludes that Duquesne Light's performance on collection is not exemplary because data demonstrates an increase in terminations for nonpayment in 2017, 2018, and 2019. Notably, Duquesne Light implemented a moratorium on terminations in 2015-2016 due to the implementation of its new customer care and billing system ("FOCUS"). As shown in the chart below, terminations were uncharacteristically low in 2015 and 2016.
\begin{tabular}{rrr} 
& Terminations & \begin{tabular}{r} 
Termination \\
Rate
\end{tabular} \\
2010 & 21,915 & \(4.18 \%\) \\
2011 & 22,927 & \(4.37 \%\) \\
2012 & 23,533 & \(4.50 \%\) \\
2013 & 25,649 & \(4.90 \%\) \\
2014 & 23,853 & \(4.50 \%\) \\
2015 & 16,601 & \(3.20 \%\) \\
2016 & 12,726 & \(2.40 \%\) \\
2017 & 21,575 & \(4.10 \%\) \\
2018 & 26,119 & \(4.90 \%\) \\
2019 & 27,688 & \(5.10 \%\)
\end{tabular}

An increase in termination for nonpayment following a moratorium is not necessarily indicative of poor performance, rather it's a return to historical trends.

Additionally, Duquesne Light adamantly disagrees that its lower delinquency is indicative of poor performance. Quite the opposite. Duquesne Light strives to
maintain a low percentage of billings in arrears to avoid high uncollectibles, which helps mitigate rate increases.

Witness Colton notes, "Duquesne had one of the highest termination rates in the state despite having the second lowest percentage of residential customers in arrears." While terminations are always considered to be a last resort, the statistics cited by Mr. Colton actually highlight how Duquesne has used all appropriate means - including terminations - to most appropriately manage customers' debt levels.

\section*{IV. CAUSE-PA recommendations regarding low-income residential customer assistance programs}
Q. Have you reviewed the testimony of CAUSE-PA witness Harry Geller?
A. Yes. I have reviewed the testimony. In total, Witness Geller makes eighteen (18) recommendations including, but not limited to, a recommendation that the Company's rate increase be denied because rates are "already unaffordable," and that the Company be required to provide additional services to low-income customers at an incremental cost of at least \(\$ 4\) million.
Q. Please summarize the recommendations that you will address in your rebuttal testimony.
A. On pages 52 through 54 of CAUSE-PA Statement No 1, Witness Geller recommends that the Commission:
- Require DLC to provide matching additional funding in the amount of \(\$ 3\) million (plus associated administrative costs) for DLC's Hardship Fund as a temporary COVID-19 debt relief measure.
- Require DLC to screen residential customers who apply for the COVID-19 Debt Relief Program for eligibility for low income assistance programs and other sources of assistance, such as LIHEAP, ERAP, and the Homeowner Assistance Fund. DLC should also be required to work with stakeholders through its Advisory Group in
order to better coordinate referrals to available sources of assistance, such as through CBOs
- Require DLC to offer more flexible payment arrangements to customers who enroll in the COVID-19 Debt Relief Program, in line with the payment arrangement lengths set forth in the Commission Order at M-2020-3019244, for the duration of the COVID-19 Debt Relief Program
- Require DLC to actively monitor and investigate if CAP customers' usage levels giving rise to reaching the CAP maximum level has been caused by factors beyond the household's control and CAP participants would be eligible for adjustments to their maximum CAP credits based on extenuating circumstances, including but not limited to the list provided in DLC's USECP. If this is the case, the household should not be sanctioned by loss of CAP rate.
- Require DLC to actively notifying all customers when they reach 50, 75 , and \(90 \%\) of their CAP maximum levels and advise them of possible exemptions.
- Require DLC to classify "de facto" heating customers as heating customers, so that they receive the higher level of maximum CAP credits.
- To the extent any increase in rates is approved, require DLC to increase its maximum CAP credit thresholds by an amount equal to the annual average increase in residential rates.
- Require DLC to closely track and report on the number CAP customers who exceed their maximum CAP credit limit. If more than \(5 \%\) of DLC's CAP customers exceed \(100 \%\) of their maximum CAP credit threshold prior to the 11th month of a given program year, DLC should be required to further increase the maximum CAP credit thresholds such that no more than 5\% of CAP customers exceed the maximum CAP credit threshold in a given year.
- Require DLC to increase its annual LIURP budget by \(\$ 1\) million.
- Require DLC to carryover any unspent LIURP funds from a previous program year in order to ensure that low income customers are able to sufficiently access LIURP services in order to improve their energy efficiency and monthly bills.
- Require DLC to eliminate its requirement that applicants for residential service provide a notarized application as a condition of establishing service.
- Require DLC to accept alternative identification, including ITINs, social security cards, birth certificates, health insurance cards, school identification, work identification, or government benefit letters or cards that do not list an address if they are presented in combination with another utility bill or lease.
Q. Do you agree with Witness Gellers' recommendations?
A. As stated above (page 12), the Company believes that the appropriate proceeding to address USECP design elements is in the Company's USECP docket. Accordingly and perhaps unsurprisingly to CAUSE-PA, Duquesne Light is opposed to the recommendations advanced by Witness Geller on behalf of CAUSE-PA with limited exceptions as discussed below.
Q. Do you agree that Duquesne Light should provide matching additional funding in the amount of \(\$ 3\) million for the Company's Hardship Fund as a temporary COVID-19 debt relief measure?
A. No. At the beginning of the COVID pandemic in 2020, the Company provided additional funding to the Company's Hardship Fund. In the midst of the pandemic, the Company launched a new CAP and provided the opportunity for arrearage forgiveness totaling over \(\$ 10\) million. The Company also proposed a \(\$ 3\) million Residential COVID-19 Debt Relief program in this proceeding. I do not believe it's necessary to add an additional \(\$ 3\) million to the hardship fund.

\section*{Q. Will Duquesne Light screen residential customers who apply for the COVID19 Debt Relief Program for eligibility for low income assistance programs}
and other sources of assistance, such as LIHEAP, ERAP, and the Homeowner Assistance Fund?
A. Yes. In the normal course of business, customers who apply for any type of income-qualified program are evaluated for participation in any and all relevant programs that provide payment assistance.
Q. Does Duquesne Light intend to work with stakeholders through its Advisory Group in order to better coordinate referrals to available sources of assistance, such as through CBOs?
A. Yes. The Company intends to continue to work with stakeholders through the Advisory group as it has for many years. We meet with this group a minimum of three times per year, but also schedule interim meetings as necessary to support collaborative initiatives. The Company is also in daily contact with the CBOs who support the CAP program - Holy Family Institute and Catholic Charities, and we are in frequent contact with various organizations throughout the service territory, including Salvation Army, St. Vincent de Paul, North Hills Community Outreach, South Hills Interfaith Movement (SHIM), etc. Further, the Company is partnering with other local utilities - namely Peoples Natural Gas and Pittsburgh Water \& Sewer Authority - to coordinate referrals across utilities.
Q. Will Duquesne Light offer payment arrangement lengths as set forth in the Commission Order at M-2020-3019244, for the duration of the COVID-19 Debt Relief Program?
A. Based on the Commission's most recent Order, the protections afforded to customers through the noted emergency order noted will end on September 30, 2021. I maintain that 36 months is an appropriate length of time for payment arrangements made through the COVID-19 Debt Relief Program. The Company is committed to offering reasonable terms to customers and will continue to follow applicable Commission regulations regarding restoration payment arrangements granted for 60 months.

\section*{Q. Please explain how Duques ne Light manages exceptions from its CAP maximum credits?}
A. The Company has a two-fold approach to managing exceptions to the CAP maximum credits.

First, the Company recently appointed a full-time employee of Holy Family Institute - one of the CBOs who serve as administrators of the CAP program - to be a Customer Success Associate. This person actively reviews a list of customers who are near or who have reached their CAP maximum discount. She engages in conversation with the customer and determines if an exception is appropriate based on extraordinary circumstances, and also provides appropriate referrals to grant monies, energy efficiency programs, etc.

Secondly, the internal team responsible for managing the CAP program routinely reviews the list of customers who have been granted said exceptions and ensures that they remain in place through program events such as recertification. This extra step ensures that no customer is mistakenly denied the exceptions that have been granted.
Q. In your view, is Duquesne Light's process for managing exceptions to the CAP maximum credits appropriate considering rele vant factors such as cost containment, administrative costs and incentivizing conservation?
A. Yes, very much so. The Company's approach is both generous and fair. At the present time, we have 182 customers who have been granted exceptions to the CAP maximum discount. Most customers are granted a \(10 \%-50 \%\) increase, though in extreme situations we have granted overages of \(70 \%-100 \%\) beyond the stated maximum discount.
Q. Does Duquesne Light notify all CAP customers when they reach 50, 75, and \(\mathbf{9 0 \%}\) of their CAP maximum levels?
A. All CAP customers are provided with their CAP credit usage monthly. The Company instituted a new bill design earlier this year. For CAP customers, the amount of discount used year-to-date and the reset date are clearly noted and presented in graphical form on each bill. Research conducted prior to launching this bill design garnered positive feedback from CAP customers.

While the Company does not conduct targeted outreach to CAP customers at these specific thresholds, the Customer Success Associate described above begins targeted outreach when a customer is at \(70 \%\) of the maximum discount.
Q. Do you agree that "de facto" he ating customers should be treated as heating customers for purposes of determining the CAP max?
A. No. Treating "de facto" heating customers as electric heating customers for purposes of determining the CAP max could create a perverse incentive, or reduce customer's incentive to eliminate their reliance of space heaters. Of the utmost importance is providing a safe source of heating. Therefore, the preferred approach is to help customers gain access to an appropriate, safe heating source for their home. Customers who are relying on space heaters rather than a gaspowered unit should be referred to an appropriate energy efficiency program. This approach emphasizes safety by avoiding reliance on dangerous space heaters, and helps to maintain program affordability for both CAP customers as well as other residential customers who bear the cost of such programs.
Q. Do you support increasing Duquesne Light's maximum CAP cre dit thresholds by an amount equal to the annual average increase in residential rates, to extent an increase is approved?
A. No. The CAP maximum is as an important cost containment mechanism. A blanket increase would needlessly inflate the overall program costs to non-CAP residential customers because a significant percentage of CAP customers do not hit their CAP max. Given that \(90 \%\) of CAP customers do not exceed the CAP maximum, the current CAP maximums remain appropriate. As explained in my
response to CAUSE-PA-III-14, there is no evidence that the proposed rate increase, if granted, will result in a substantially higher number of customers exceeding the CAP maximum. CAUSE-PA-III-14 is attached and incorporated by reference as Exhibit KS-R-1.

Additionally, in his direct testimony Witness Geller (p. 36-37) outlined the number of customers who reached the CAP maximum in prior years, under a different program with different maximum discounts. Witness Geller then refers to data I provided and states, "... 309 CAP customers have already exceeded their maximum CAP credits at current rates and an additional 641 CAP customers have exceeded between 70-99\% of their maximum CAP credits."

While true, it is worth noting that the 309 customers who reached their max represent less than \(1 \%\) of all CAP customers. In total, customers who have used at least \(70 \%\) of their discount equate to fewer than \(3 \%\) of all CAP customers. Being 5 months into the new program, these figures track very closely with CAUSEPA's preference to maintain the percentage of customers hitting the maximum discount at \(5 \%\). Given current data, making any changes to the maximum annual discounts is premature.

Finally, the current USECP proceeding addresses how on-going analysis will be conducted and resolutions will be reached should the number of customers hitting the maximum annual discount grow.

\section*{Q. Witness Geller also suggest that no more than \(5 \%\) of CAP customers should hit the ir CAP max. Do you agree?}
A. No. The maximum annual discounts were set such that \(5-10 \%\) of customers would be likely to hit the maximum. In the first 5 months of the program, the actual experience appears to be on-target with this expectation.

Further, the maximum annual discount needs to serve as an incentive for customers to conserve energy, and to balance the costs borne by other customers to support the program.

\section*{Q. Does the Company support incre asing the LIURP budget by \(\$ 1\) million?}
A. No. Upon information and belief, Duquesne Light has continuously served all willing customers through its LIURP programs. At the current funding levels, Duquesne Light has unused LIURP budget dollars, despite serving all willing customers. In its pending USECP, Duquesne Light addresses program design changes it intends to make, subject to Commission approval, to help ensure that the funding currently available to customers is appropriately utilized.

Additionally, as noted several times in my testimony, the Company makes every effort to balance the needs of all customers in its provision of universal service. While seeking to protect low-income customers facing a proposed rate increase is admirable, it should be noted that these proposed protections come at a cost to the customers who fund the programs, including customers whose income is at 151\(250 \%\) of the federal poverty level. These low and moderate income customers should have affordable electric distribution service too. I do not believe that a rate increase borne by all customers should be unduly compounded with additional universal services funding, as doing so would further raise rates for a majority of the Company's residential customers. Rather, the Company's efforts to better utilize available resources are the appropriate recourse at this time.

\section*{Q. Does Duquesne Light support carrying over any unspent LIURP funds from a pre vious program year?}
A. Duquesne Light strongly supports efforts to help customers conserve energy, including low-income customers. This includes maintaining available LIURP funding during the USECP five year plan.

\section*{Q. Please explain Duquesne Light's service application requirements.}
A. A vast majority of Duquesne Light applications for service are paperless. As described in CAUSE-PA-I-4, which is attached as marked as Exhibit KS-1-R, the Company utilizes a web-based Applicant Service Tool (AST) to manage customer applications for utility service. To apply for service, applicants must provide their name, age, address to where they are applying, and an address where credit has been established. The AST then sends applicant's information to TransUnion to detect potential "Red Flags."

By way of background, the Fair Credit Reporting Act "Red Flags Rule" requires companies, including Duquesne Light, to have policies in place to protect customers from identity theft. Duquesne Light implemented a confidential written Identity Theft Program Prevention (ITPP) Program designed to detect and mitigate potential identity theft in its daily operations. Pursuant to Duquesne Light's ITPP, applications are characterized as low, medium or high risks relative to potential identity theft. The AST captures key data elements relevant to the applicant which guides the user step by step through the validation process via a series of questions. The AST functionality includes TransUnion validation which determines if an application is low, medium or high risk. Under the Company's ITPP, a low risk applicant may establish service, a medium risk applicant may be required to provide knowledge-based authentication or over the phone code, however a high risk applicant is required to provide a notarized application to verify their identity. Examples of high risk applicants include applicants that provide a SSN that may belong to a deceased person, or where there is an active fraud alert on the applicants credit file. These procedures are designed to protect consumers from identity theft by verifying the identity of the applicant.

The above-described process was implemented in January, 2021. Through the end of May, 2021, the Company processed 15,581 applications through the AST. Only 42 customers - or \(0.26 \%\)-- were asked to provide a notarized application.

Duquesne Light believes that it is appropriate to balance administrative burden and ease with protecting customers and the Company from fraud. Duquesne Light's application process is appropriately designed to balance those objectives.

\section*{Q. Please explain which forms of identification Duquesne Light currently accepts to establish service. \\ A. With the implementation of the AST, which includes identity verification through TransUnion, most customers are not required to provide further identification. Applicants who do not have a current or former address in the United States are required to submit a written or emailed application along with a non-expired, government issued form of identification. \\ V. NRDC recommendations regarding Residential Covid-19 debt relief program.}

\section*{Q. Have you revie we d the testimony of NRDC Witness Amanda Levin?}
A. Yes. I have reviewed the testimony. Witness Levin recommends three (3) changes to the Company's Residential COVID-19 Debt Relief program. First, Witness Levin recommends that the Commission defer cost recovery associated with the administrative costs of the program. Second, Witness Levin recommends that the Company be required to waive any and all late fees and reconnections until at least December 2021 regardless of a customer's ability to pay their balance. Finally, Witness Levin recommends that Duquesne Light be required to track and reports quarterly to the Commission information including geographical and income data.

\section*{Q. Do you agree with NRDC's recommendations?}
A. Duquesne Light is not opposed to tracking its administrative costs associated with the Residential COVID-19 Debt Relief Program and creating a regulatory liability for unused portions of the programs administrative costs to be refunded, if applicable, in a future rate case.

However, I do not agree that late payment charges and reconnections fees should continue to be waived. This issue has been decided by the Commission and the Emergency Declaration has been lifted in its entirety. There is no basis upon which to require the Company to waive these fees.

Finally, I also disagree with Witness Levin's recommendation that Duquesne Light should be required to track and report certain geographic and income data to the Commission for purposes of monitoring service equity. First, Duquesne Light is not aware of any other Pennsylvania electric distribution company that reports this data to the PUC. Accordingly, it is unclear how any data reported by Duquesne Light would be measured by the Commission.

Additionally, if the Commission desires to amend certain reporting requirements, it should do so in a generic rulemaking similar to the recent Diversity Rulemaking at docket no. L-2020-3017284 to ensure consistency in the data being reported. Individual rate cases are not the appropriate forum to establish reporting requirements related to macro, non-utility specific socio-economic equity issues.

\section*{Q. Is the re anything else that you would like to address with respect to NRDC Witness Levin's testimony? \\ A. Yes. I want to emphasize that Duquesne Light's leadership team and employees have demonstrated a tireless commitment to diversity, equity and inclusion within our organization, and the communities we serve through actions, not just reports and words. Because equity is critically important to Duquesne Light, I also want to be abundantly clear that there is no evidence that the disparities discussed throughout Witness Levin's testimony are occurring as a result of Duquesne Light Company policies and action, nor are they specific to Duquesne Light's service territory. In response to questions propounded on NRDC regarding its statements about racial and ethnic inequity, which are attached, incorporated by reference and marked as Exhibit KS-1-R, NRDC admits that these statements are not specific to Duquesne Light or its service territory.}

\section*{VI. PWPTF recommendations regarding univers al service programs.}
Q. Have you revie wed the testimony of Pennsylvania Weatherization Providers Taskforce ("PWPTF") Witness Eugene M. Brady?
A. Yes. I have review Witness Brady's testimony. In summary, Witness Brady states that if rate relief is granted, there should be an increase in universal service funding, including increasing LIURP funding by \(\$ 689,500\) and a minimum Hardship contribution by Duquesne Light of \(\$ 500,000\) to be distributed in accordance with the percentage of low-income customers in the counties. Witness Brady also suggests that Duquesne Light should partner with PWPTF member agencies to implement LIURP.

\section*{Q. Do you agree with Witness Brady's recommendations?}
A. No. As mentioned above, the Company believes that the appropriate proceeding to address its USECP design elements is in the Company's USECP docket.

With respect to LIURP funding, Witness Brady's suggestion that rate relief - if granted - should require additional LIURP funding amounts to adding a further rate increase to customers who fund LIURP and other universal services programs today via Rider 5. As stated above, Duquesne Light does not believe that nonCAP residential customers should continue to be pressed to pay an everincreasing amount in support of low-income programs.

As explained above, the Company already made an additional contribution to the Hardship fund in 2020. We have also proposed additional COVID-19 Debt Relief programs in this proceeding.

Finally, as explained above, the Company's use of CBOs is, and has been exemplary. Duquesne Light has partners with CBOs to administer its universal service programs since the program's inception. CBOs are chosen using the Company's competitive procurement process to ensure services are cost-
competitive and the selection process is fair and unbiased. The Company's current use of CBOs and procurement process are appropriate.

\section*{Q. Does this conclude your direct testimony?}
A. Yes.

\title{
BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

\author{
Statement No. 8-R
}

Rebuttal Testimony of Sarah J. Olexsak
Subject: Transportation Electrification Programs

Date: July 26, 2021

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\section*{I. INTRODUCTION AND PURPOSE OF REBUTTAL TESTIMONY}
Q. Please state your full name, business affiliation and address.
A. My name is Sarah J. Olexsak. I am the Manager, Transportation Electrification for Duquesne Light Company ("Duquesne Light" or "Company"). My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. Did you previously submit testimony in this proceeding on behalf of Duquesne Light Company?
A. Yes, I did. I submitted my direct testimony (Duquesne Light Statement No. 8) on April 16, 2021.
Q. What is the purpose of your rebuttal testimony?
A. The purpose of my rebuttal testimony is to respond to Bureau of Investigation and Enforcement ("I\&E") Witnesses Keller and Cline (I\&E Statement Nos. 2 and 5, respectively), Office of Consumer Advocate ("OCA") witness Nelson (OCA Statement No. 6), Office of Small Business Advocate ("OSBA") witness Knecht (OSBA Statement No. 1), Coalition for Affordable Utility Services and Energy Efficiency in Pennsylvania ("CAUSE-PA") witness Geller (CAUSE-PA Statement No. 1), ChargePoint witness Deal (ChargePoint Statement No. 1), and Natural Resources Defense Council ("NRDC") witness Harris (NRDC Statement No. 2) with respect to the Company's proposed Transportation Electrification Programs ("TE Programs").
Q. Are you sponsoring any Exhibits along with your rebuttal testimony?
A. Yes, I am sponsoring Exhibits SO-1-R through SO-11-R.

\section*{Q. Please summarize the positions of the other parties with respect to the Company's proposed TE Programs.}
A. Parties took diverse positions on the Company's TE Programs proposal, which, taken together, further evidence the reasonableness of the Company's balanced approach.

I\&E witnesses Keller and Cline (I\&E Statement Nos. 2 and 5, respectively) both present testimony regarding the Company's proposed TE Programs. Witness Cline recommends that the TE Programs be approved by the Commission. Mr. Keller indicates that he accepts the premise of all three pilots within the Charging Infrastructure Portfolio as well as the three components of the Customer Portfolio. Mr. Keller and Mr. Cline both suggest TE Programs reporting requirements.

OCA witness Nelson (OCA Statement No. 6) expresses concern that the Company's TE Program proposal lacks an adequate evaluation and assessment plan and that the proposal's load management offerings are insufficient. Mr. Nelson recommends rejection of the Home Charging Pilot and denial of the Company's request for make-ready and charging station capital recovery for the proposed Charging Infrastructure Portfolio. In the alternative, Mr. Nelson proposes that such funds could be provided to customers as a rebate. Additionally, Mr. Nelson suggests that the Commission require the Company to submit an evaluation and assessment plan, reduction of the Awareness, Education, and Engagement (AEE) budget by 75\%, rejection of the Fleet Advisory Service, and not permit pilot activity through 2024. Lastly, Mr. Nelson encourages the Commission to require the Company to file an electric vehicle (EV) load management proposal within 18 months of a final order in the case.

CAUSE-PA witness Geller's testimony (CAUSE-PA Statement No. 1) focuses on how the proposed TE Programs will impact the Company's low income customers. Mr. Gellar avers that low-income customer lack ability to access EVs and EV charging infrastructure, yet recognizes "that there are likely tangible emission benefits as a result of transportation electrification that can help to lessen the historical burden of emissions in low income communities and communities of color"(CAUSE-PA Statement No.1, p. 45, lines 7-9). Mr. Geller recommends that the Company focus investment in infrastructure that supports the electrification of accessible transportation options, specifically in or serving Environmental Justice (EJ) Areas over infrastructure that supports personal vehicle charging. He also recommends that the Company's low income customers be exempted from costs related to the Home Charging Pilot.

In his testimony, OSBA witness Knecht provides policy positions that describe OSBA's stance on electric utility EV charging infrastructure programs (OSBA Statement No. 1, p. 32-34). Mr. Knecht argues that the Company's proposed TE Programs are not consistent with OSBA's policy positions, and that the demand for charging infrastructure can and should be met by unregulated entities. Mr. Knecht recommends the rejection of the Public, Workplace, and Multi-Unit Dwelling Make-Ready Charging Pilot and the Fleet and Transit Charging Pilot, and indicates that he refrains from taking a position on the Home Charging Pilot.

NRDC witness Harris generally supports the Company's TE proposals. She states that the Company's proposal takes ".... a holistic, portfolio approach to support the growing EV market..." and points out that the TE Programs, "...will only support a small percentage of the charging infrastructure in its service territory that will be needed as EV deployments increase." (NRDC Statement No. 2, p. 4, lines 11-14). Ms. Harris provides a
number of recommended modifications and additions to the proposal including expansion of utility ownership of charging stations for multi-unit dwelling customers, increased funding for charging infrastructure to support medium- and heavy-duty fleets, and increased prioritization of fleets servicing EJ Areas.

ChargePoint witness Deal (ChargePoint Statement No. 1) indicates support for the Company's proposed Charging Infrastructure Portfolio and Fleet Electrification Advisory Service. Mr. Deal provides a number of recommended modifications to these programs, including the addition of charging station software and equipment eligibility requirements, vendor neutral marketing communications, and permitting customer charging station choice in the Home Charging Pilot.

Though not a party to this proceeding, Joshua Cohen also provided on-the-record oral testimony on behalf of Greenlots, Inc., at the public input hearing held June 22, 2021. Mr. Cohen expressed support for the Company's proposed TE programs. Tr. 36-40. Grant Ervin also provided on-the-record testimony on behalf of the City of Pittsburgh, also not a party to this proceeding, in support of the Company's proposed TE programs. Tr. 78-85.

Party comments in opposition to the Company's TE proposals can be sorted into two categories: critiques of the Company's approach to TE generally, and critiques specific to individual programs within the Company's proposed TE Programs. My rebuttal testimony addresses parties' general objections first, then responds to program-specific critiques.

\section*{II. LOAD MANAGEMENT}
Q. Please summarize intervenor comments about load management.
A. OCA Witness Nelson and NRDC witness Harris each discuss load management. Mr. Nelson recommends that the Company's TE proposals be rejected, primarily due to alleged lack of associated load management programs. He argues that frontloading utility EV infrastructure without a load management plan will lead to overbuilding and that "[1]arge transportation electrification efforts by a utility should not be authorized until a comprehensive load management plan has been developed and implemented" (OCA Statement 6, p. 27, lines 6-8), which he argues the Company's existing and proposed load management initiatives do not satisfy.

NRDC witness Harris urges the Company to encourage customers to charge offpeak, stating that "shifting charging to off-peak hours when there is excess load on the grid will help to maximize the benefits not only to EV drivers but put downward pressure on rates for all customers" (see NRDC Statement 2, p. 25, lines 1-3). Witness Harris notes that the Company obtained approval to offer an EV TOU rate as part of the Company's Default Service Plan.

\section*{Q. Please expand on witness Nelson's position with respect to load management and utility EV programs.}
A. Mr. Nelson places load management at the center of his analysis of the Company's proposed TE Programs. He calls load management "the utility's central responsibility" with respect to transportation electrification, and argues, "[G]iven the significant ratepayer impacts of unmanaged EV charging, it is incumbent on the utility to address load management concerns" (OCA Statement 6, p. 27, lines 3-5). Witness Nelson alleges that the Company's current and future efforts with respect to EV load management do not meet this standard, and the Company's proposed TE Programs should therefore be rejected. He
also suggests that the Company develop a range of load management offerings including passive, active, and automated load management (OCA Statement 6, p. 28, lines 4-5).

\section*{Q. Do you agree with Mr. Nelson's position as it relates to load management and the Company's TE proposals?}
A. No. First, Mr. Nelson's singular focus on load management frequently comes at the expense of other relevant factors that independently justify approval of the Company's proposals. The Company agrees with Mr. Nelson that load management (including but not limited to with respect to EVs) is an important consideration. However, Mr. Nelson fails to consider other factors - including, most significantly, the projected benefits of the Company's proposed programs - that warrant the programs' approval.

Second, Mr. Nelson fails to produce quantitative evidence to support his recommendations related to load management. For example, Mr. Nelson does not attempt to estimate the implementation costs of any of his suggested load management initiatives, see Exhibit SO-1-R (DLC-OCA-I-62-64), nor does he project the benefits they would produce in Duquesne Light's service territory. Rather, Mr. Nelson instead cites examples from other states, and admits at one point that "these figures may not be directly applicable to Pennsylvania" (OCA St. 6, p. 23, lines 9-13). There is no evidence that the benefits of Mr. Nelson's recommendations would outweigh the costs.

Third, even if one were to ignore these shortcomings and accept Mr. Nelson's basic premises regarding load management, Mr. Nelson is incorrect with respect to the Company's current and future load management initiatives. As I discuss further below, the Company's proposals in this proceeding clearly constitute load management offerings; and
as Company witness Harchick discusses in DLC St. 18-R, the Company is actively developing additional load management capabilities for future implementation.

Finally, Mr. Nelson's recommendation is ultimately self-defeating, in that it would deprive the Company of tools to develop the data, experience, and customer feedback that can inform future EV load management offerings. He criticizes the Company for not producing a chicken, while also urging the Commission to deny the Company's request for an egg. Mr. Harchick addresses this further in his rebuttal testimony.

\section*{Q. Does the Company offer load management programs?}
A. Yes. With respect to programs not specifically related to TE, pursuant to the Company's smart meter plan (Docket No. P-2015-2497267), the Company supports customer load control via its smart meter network. Further details regarding third party load control are available on the Company's website. \({ }^{1}\) The Company also offered demand response programs through its Energy Efficiency and Conservation Plans until the Commission excluded demand response from Phase IV, which commenced June 1, 2021. See the Commission's Implementation Order entered June 18, 2020, at Docket No. M-20203015228.

Specifically with respect to TE, as of June 1, 2021, the Company offers a timebased supply rate as part of its default service plan. \({ }^{2}\) Residential customers who drive EVs and commercial and industrial customers (C\&I) with demands less than 200kW that lease or own at least one electric vehicle or have an electric vehicle charging station on their

\footnotetext{
\({ }^{1}\) Exhibit SO-2-R (https://www.duquesnelight.com/energy-money-savings/home-energy-center/third-party-load-control-program-info).
\({ }^{2}\) Exhibit SO-3-R WholeHome EV Rate. Duquesne Light Company. (https://www.duquesnelight.com/energy-money-savings/electric-vehicles/wholehome-ev-rate) Business EVRate. Duquesne Light Company. (https://www.duquesnelight.com/energy-money-savings/electric-vehicles/business-ev-rate).
}
premise are eligible to enroll. As Mr. Nelson acknowledges in DLC-OCA-I-65, the EV time-of-use (TOU) rate is a passive load management program because it incents loadshifting from on-peak to off-peak periods (Exhibit SO-1-R (DLC-OCA-I-65)).
Q. Has the Company proposed additional load management offerings as part of this proce eding?
A. Yes. The Company has proposed a Residential Subscription Rate pilot (see DLC Everett Statement No. 17). This rate is designed in part to encourage customers, including EV drivers, to manage their peak demand.
Q. Do the load management programs offered and proposed by the Company meet the definition of load management as described by OCA Witness Nelson?
A. Yes. Witness Nelson identifies passive load management as "altering customer behavior to affect charging times. This can be accomplished through rate design or other financial incentives for off-peak charging and for avoiding on-peak charging" (OCA St. 6, p. 28, lines 8-10). As I discussed in my direct testimony, the Company's EV TOU Rate and proposed Residential Subscription Rate Pilot both incent efficient charging behavior.
Q. Please summarize Mr. Nelson's critique of the Company's EV TOU Rate as a load management offering.
A. Mr. Nelson agrees that the Company's EV TOU Rate is a passive load management offering. In DLC-OCA I-65, he admits that "For customers that participate, the EV TOU will undoubtedly result in customers charging more during off-peak hours. There are numerous studies that support similar load shifting."

His critique of the EV TOU Rate appears to be grounded in a concern that the Company is not placing an adequate emphasis on it (Exhibit SO-1-R (DLC-OCA-I-65)):

> The Company . . . was silent as to its plans to market or sign customers up for its already approved EV TOU. The Company's lack of attention to the EV TOU rate in this case, indicates the Company may not be committed to increasing participation, which would lead to a lack of load shifting through the rate.

\section*{Q. Do you agree with this critique?}
A. No. First, witness Nelson fails to appreciate that since EV TOU Rate is a supply rate, it is not subject to modification through this proceeding. The EV TOU Rate, including estimated participation along with education and marketing initiatives, were only recently resolved in the Company's DSP IX Proceeding, Docket No. P-2020-3019522. OCA signed the stipulation resolving EV TOU Rate issues in that proceeding.

Even though it is not part of this proceeding, in the interest of allaying Mr. Nelson's concern, I wish to be clear that the Company is not ignoring its EV TOU Rate. The Company has begun and will continue to promote this rate option through email, social and online marketing communicating with residential and business customers. Additionally, the Company will soon launch a rate advisor tool to help residential customers determine if the EV TOU Rate is the most cost-effective choice for them. The Company anticipates that learnings from the EV TOU Rate will help to inform future load management initiatives.
Q. Please summarize Mr. Nelson's critique of the Company's proposed Residential Subscription Rate Pilot as a load management offering.
A. Mr. Nelson agrees that "a voluntary subscription rate could, under circumstances, provide a beneficial price signal for the distribution system," but he "do[es] not find framing the
rate as a load management offering to be persuasive" because (i) it focuses on noncoincident peak instead of system peak, and (ii) he believes it will be difficult for customers to understand (OCA St. 6, pp. 38-39).

\section*{Q. Do you agree with this critique?}
A. No. First, I note that Mr. Nelson does not appear to dispute the premise that a subscription rate can incent customers to more efficiently manage their loads, which fits it within his own definition of a load management offering. Rather, he takes issue with certain design aspects of the Company's proposal. For the reasons discussed in the rebuttal testimonies of Company witnesses Neiswonger and Everett, his concerns are unfounded.
Q. Does Witness Nelson provide evidence comparing the relative costs and benefits of the load management initiatives he discusses, as applied to Duquesne Light?
A. No. When asked in discovery, witness Nelson did not provide estimates of the costs and benefits of such initiatives. \({ }^{3}\) In fact, Witness Nelson notes that the "costs and benefits of managed EV will vary by service territory due to numerous differences in existing and planned infrastructure and technologies, among other things such as market prices. \({ }^{4}{ }^{4}\) As I mentioned above, Mr. Nelson presents no evidence to indicate that the benefits of his preferred approaches would outweigh the costs.
Q. Does Witness Nelson provide evidence indicating customer demand for additional load management programs in the Company's service territory?

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\({ }^{3}\) Exhibit SO-1-R (DLC-OCA-I-63; DLC-OCA-I-64).
\({ }^{4}\) Exhibit SO-1-R (DLC-OCA-I-60).
}
A. No. When asked to provide evidence of customer interest in passive managed charging, Witness Nelson cites only a Company-conducted survey of EV drivers \({ }^{5}\) which shows customer interest in an EV TOU Rate, like the rate the Company now offers.
Q. Does OCA Witness Nelson provide any evidence that the Company's proposed TE Pilots will le ad to "overbuilding"(OCA Statement 6, p. 27, lines 10)?
A. No. Witness Nelson argues:

Large transportation electrification efforts by a utility should not be authorized until a comprehensive load management plan has been developed and implemented. Frontloading utility investment on EV infrastructure, without a comprehensive load management plan, will lead to overbuilding because the utility will not likely have an accurate understanding of how load management options can reduce the need for infrastructure, nor will the utility be capable of integrating the impacts of load management into their distribution system plans." (OCA Statement 6, p.27, lines 6-13).

Witness Nelson's statements are unfounded. The components of the proposed Charging Infrastructure Portfolio are all designed to be relatively modest pilots that hardly qualify as "large." For example, the Company's proposed Make-Ready Pilot would meet only between \(7-10 \%\) of the projected public and workplace Level 2 charging stations needed in our region. \({ }^{6}\) Second, Mr. Nelson's response to DLC-OCA I-55 demonstrates that his concern regarding over-building is grounded in theory (namely, the alleged Averch Johnson capital bias effect), and is not necessarily applicable to the Company's proposals in this case. \({ }^{7}\) Mr. Nelson presents no actual evidence that the Company's proposals will lead to over-building EV infrastructure.

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\({ }^{5}\) Exhibit SO-1-R (OCA-XI-12 - Attachment 1).
\({ }^{6}\) Exhibit SO-1-R (OSBA-I-9 Attachment 2).
\({ }^{7}\) Exhibit SO-1-R (DLC-OCA-I-55) ("Forclarity, the referenced testimony [OCA St. 6, p. 20, line 15] states,
'Approving the Company's request to rate base these costs would re-enforce the incentive to over-build EV infras tructure, which already appears to be negatively influencing the Company's TEproposals.' It does not state
}
Q. How does the Company respond to OCA Witness Nelson's recommendation that the Company's proposed charging infrastructure pilots be rejected or scaled back until the Company submits a comprehensive load management plan?
A. As I mention earlier, the Company currently offers a load management program and has proposed an additional program as part of this proceeding. DLC Witness Harchick outlines in his testimony (DLC Statement 18-R) that the Company is in the process of implementing an Outage Management System (OMS). He identifies that until an OMS system is completed, the Company has limited ability to efficiently implement active or automated load management.

The multi-year charging and load data gathered as part of the proposed charging infrastructure portfolio pilots, along with the completion of the OMS system, will position the Company to have a much more complete view of the effects of EV charging on the Company's grid, as described in Witness Harchick's rebuttal testimony (DLC St. 18-R). With that holistic view, the Company can evaluate the load management offerings that best meet the needs of our customers. Rejecting or scaling back the proposed TE charging infrastructure pilots will deprive the Company of valuable insights and lessen its ability to develop comprehensive load management proposals.
Q. What next steps does OCA witness Nelson recommend with respect to load management?
that the TE Programs will lead to an over-build of EV infrastructure. In fact, Irecommended keeping a portion of the TEPrograms using a differentstructure.")(Emphas is added.)
A. Witness Nelson recommends that within 18 months of the rate case final order that the Company "file a comprehensive EV load management proposal that includes a description of the Company's future offerings, investments required to offer each type of load management offering, and estimated timeline to implement the offerings, to what customer segments the offerings may be made available, and a proposed implementation plan for ALM to mitigate customer and utility infrastructure requirements" (OCA St. 6, p. 34, line \(15-\) p. 35, line 2). Witness Nelson also calls for the Company to present an overview of the load management proposal six months before the load management filing and a stakeholder meeting after the 18-month filing with time for formal comments from stakeholders and additional comments from the Company (OCA St. 6, p. 35, lines 6-16).

\section*{Q. Does the Company agree with OCA witness Nelson's load management recommendations?}
A. No. As I described earlier, the Company currently offers a load management program and has proposed another load management program as part of this proceeding. Mr. Nelson presents no evidence that additional load management programs are needed or cost effective at this time. Mr. Nelson's proposal to reject or scale back the Company's TE proposals based on the lack of a "comprehensive load management proposal" would restrict the Company's ability to gather the necessary data and information to prepare such a proposal. Regardless, the timeframe Mr. Nelson recommends for such a filing is insufficient to collect useful data based on the implementation of the proposed charging infrastructure pilots.
Q. Summarize NRDC Witness Harris' load manage ment recommendations.
A. Witness Harris recommends that "DLC should make taking service on this rate [EV TOU] a default requirement for participation in the TE Charging Infrastructure programs, utilizing an "opt-out" model to allow site-host flexibility if the TOU rate does not suit their charging or energy needs. Further, it should be the default arrangement that price signals are seen by end-users" (NRDC Statement 2, p. 25, lines 11-15). Additionally, Witness Harris recommends that since "some fleets may be over the \(200-\mathrm{kW}\) load maximum requirement, DLC should develop a rate that allows for larger customers to shift charging to off-peak hours and maximizes the benefits to fleets and the grid" (NRDC Statement 2, p. 25, lines 16-18).
Q. Do you agree with NRDC Witness Harris' recommendation to make the EV-TOU Rate a "default requirement" for participation in the TE Charging Infras tructure programs?
A. No, I do not. Requiring participating customers to enroll in the EV TOU Rate and to pass those price signals along to end-users could be detrimental to customer participation in these programs. Many customers will be installing charging infrastructure for the first time. Requiring them to simultaneously navigate a new rate, as well as end-user customer pricing requirements, could lead some customers to decide not to participate and/or bias the sample of customers who do participate. However, the Company will commit to including information about the EV TOU Rate, as well as options for separate metering, in its educational materials for the Company's Charging Infrastructure Pilots.
Q. Do you agree with NRDC Witness Harris' recommendation to develop a rate "that allows for larger customers [with demands of at least 200 kW ] to shift charging to offpeak hours" (NRDC St. 2, p. 25, lines 16-18)?
A. The Company's existing default service offerings already reflect this recommendation. Under the Company's Default Service Plan IX, default service customers with loads greater than 200 kW take service under Rider 9 - Hourly Price Service.

\section*{III. MARKET COMPETITIVENESS}
Q. Do any witnesses argue that the TE Programs will interfere with the EV charging competitive marketplace?
A. Yes. Mr. Nelson argues, "Not only would utility ownership of Electric Vehicle Supply Equipment (EVSE) stifle competition in this market, but also there is simply no need to use ratepayer funds to address a need that can already be met by the market" (OCA St. 6, p. 20, lines 2-5). Additionally, in testimony submitted on behalf of the Pennsylvania Office of Small Business Advocate ("OSBA"), Mr. Knecht argues that the Fleet and Transit Charging Pilot is "anti-competitive, in that it gives DLC a significant competitive advantage vis-à-vis unregulated firms for providing this infrastructure;" and that it will "discourage unregulated entities from pursuing this business, and therefore may serve to actually delay the adoption of this technology for vehicle fleets," including transit fleets (OSBA Statement No. 1, p. 33, lines 36-37).
Q. Do you agree with these witnesses' suggestions that the Company's TE Programs will impede the competitive EV charging marketplace?
A. No. The Company's TE proposals will not stifle competition among unregulated entities; they will encourage it. As I discussed in my direct testimony and discovery responses, \({ }^{8}\) the Company's proposed infrastructure deployments represent a small fraction of the charging infrastructure needed in the Company's service territory in the coming years, and market neutrality will be maintained by holding competitive solicitations for all charging station products and services offered in the proposed programs (Duquesne Light St. 8, pp. 20-21). As described below, all marketing or other program materials distributed in support of the TE Programs will be vendor neutral.

\section*{Q. Do you agree with these witnesses' suggestions that EV charging infrastructure represents "a need that can already be met by the market" without the Company's TE Programs?}
A. No. As I discussed in my direct testimony, EV charging need in the Company's service territory is projected to significantly outpace supply over the next several years (Duquesne Light Statement No. 8, pp. 22-23). This market gap is further supported by the testimony of Greenlots witness Cohen, as I discuss below.

In contrast, Mr. Nelson failed to provide any evidence to support his suggestion to the contrary. Mr. Nelson asserts in testimony that "the market for EV chargers is already mature and highly competitive," but in discovery he declined to provide any empirical evidence for this assertion, which he admitted was not specific to the Company's service territory in any event. \({ }^{9}\) And when asked to provide evidence for his assertion "there is simply no need to use ratepayer funds to address a need that can already be met by the

\footnotetext{
\({ }^{8}\) See Exhibit SO-1-R (OCA-IV-15 and OSBA-I-9d-h).
\({ }^{9}\) Exhibit SO-1-R (DLC-OCA-I-50).
}
market," Mr. Nelson was unable to do so. \({ }^{10} \mathrm{He}\) responded instead that "it is unclear what needs or goals the Company is referencing" - in spite of the fact that the Company's reference was to Mr. Nelson's own testimony.

Mr. Nelson also states, "The impacts that utility ownership has on competitive markets" - which presumably refers to market-suppressing impacts - "is well documented in the energy industry and through basic economic theory. The Company offered no empirical evidence or supporting theory that suggests the EVSE market would differ." \({ }^{11}\) As support for this assertion, Mr. Nelson cites three papers: one by NARUC, and two authored in part M.J. Bradley and Associates that were issued seven months apart and share much of the same content. Each paper addresses regulatory considerations that attend utility investment in transportation electrification, and includes high-level summaries of arguments related to competitive considerations. However, these papers do not offer any empirical evidence that utility ownership produces market-suppressing impacts. If anything, these papers weigh in favor of the Company's proposals. For example, 'Utility Investment in Electric Vehicle Charging Infrastructure: Key Regulatory Considerations" provides at p .10 :

Critics of the utility owner-operator model argue that utility ownership of charging infrastructure may limit market competition. While it may be appropriate for utilities to directly develop PEV charging infrastructure in some situations, utilities could also offer site hosts with a choice of vendors and conduct competitive solicitations for charging equipment, software, and network services to avoid limiting the private market. \({ }^{12}\)

\footnotetext{
\({ }^{10}\) Exhibit SO-1-R (DLC-OCA-I-52).
\({ }^{11}\) Exhibit SO-1-R (DLC-OCA-I-51).
\({ }^{12}\) Exhibit SO-4-R.
}

As I discussed in my direct testimony and above, Duquesne Light's proposals include precisely the types of competitive solicitations that this paper suggests could overcome market-suppression concerns.
Q. ChargePoint Witness Deal proposes that all communications with customers are vendor neutral and that the Company file all marketing materials in an annual informational filing. Does the Company agree with these proposals?
A. Yes, in part. The proposal by Witness Deal for vendor neutral communications is consistent with the Company's approach in the EV ChargeUp Pilot and the Company's proposed approach for TE Programs. The Company has proposed to have a competitive solicitation to qualify vendors. The vendor list will be shared with customers and customers will conduct their own due diligence when selecting a vendor. Any marketing or other program material and guidance provided to customers will be vendor neutral. The Company does not agree with ChargePoint's recommendation to file all marketing materials in an annual informational filing as the request is unnecessary and burdensome.
Q. Do witnesses Nelson or Knecht find support for their assertions in the comments or testimony of any compe titive participants in the EV charging marketplace?
A. No; in fact, the opposite is the case. Two competitive EV charging providers, ChargePoint, Inc., and Greenlots, have submitted testimony in this proceeding. Both rebut Mr. Nelson's and Mr. Knecht's concerns. Greenlots witness Mr. Cohen affirms that proposals like the Company's TE Programs are needed to spur the competitive EV charging marketplace in his oral testimony (TR. 37-38), "Unfortunately, a sustainable and competitive market in the deployment of public charging infrastructure remains aspirational at this time, and it is
unlikely to arise prior to the adoption of a critical mass of electrical vehicles. The economics simply don't support sufficient private investments to adequately grow the infrastructure market to support current and future drivers." Mr. Cohen and ChargePoint witness Deal also both emphasize that by supporting the charging marketplace in a competitively-neutral manner (including providing multiple options to participating customers), the Company's proposals can expand opportunities for unregulated entities. (Greenlots TR. 39, lines 1-14; Chargepoint St. 1, p. 7, lines 8-18.) This alignment is particularly notable given that Greenlots and ChargePoint are competitors of each other. ChargePoint witness Mr. Deal supports the proposed Make-Ready and Fleet and Transit Charging Pilots, and conditionally supports the proposed Home Charging Pilot. ChargePoint and Greenlots' testimony in support of the Pilot directly bely witness Nelson and Knecht's concerns regarding impacts of the Pilot on the competitive EV charging marketplace.
Q. Do you agree with OSBA witness Knecht's assertion that the Company's proposal represents the provision of "utility subsidies" (OSBA Statement No.1, p. 32-34)?
A. No. The Company demonstrates throughout its testimony that the benefits of the proposed TE Programs outweigh the costs (DLC St. No. 8, p. 8-12). In fact, the Home Charging Pilot and Fleet Charging Pilot both present a positive benefit cost ratio (DLC St. 17, p. 62, lines 12-19). Mr. Knecht does not dispute this fact.
Q. Do you agree with OSBA witness Knecht's claim that benefits of the TE Programs flow to the Company's shareholders and not the Company's ratepayers (OSBA Statement No. 1, p. 32, lines 5-7)?
A. No. Mr. Knecht himself agrees that, where increased electric distribution loads attributable to a program are reflected in the calculation of electric delivery rates, then the benefits of the increased loads accrue to customers. \({ }^{13}\) As Company witness Mobley explained in his direct testimony, DLC St. 3, the Company's annual sales forecast includes an adjustment for incremental EV loads. Mr. Knecht did not dispute the Company’s sales forecast.
Q. Do you agree with OSBA witness Knecht's assertion that the Company's TE Programs proposal "is an inequitable and regressive method for funding government programs" (OSBA Statement No.1, p. 32, lines 24-25)?
A. No. Witness Knecht presents a false comparison. First, as I discuss above, the Company's TE proposals are cost-effective, and will provide significant benefits to customers. My testimony also clearly demonstrates that governmental taxing authorities are not adequately filling the charging market gap. The Commonwealth of Pennsylvania and local governments within the Company's service territory have recognized the need for more EV charging infrastructure (Duquesne Light, Statement No. 8, p. 12-13). In fact, the City of Pittsburgh witness Grant Ervin provided on-the-record testimony at the public hearing in support of the Company's proposed TE Programs, stating, "DLC's specific efforts on vehicle electrification are very important and laudable, and have had explicit focus on environmental justice areas in our community. However, they also illustrate the need to increase resources to help achieve Pittsburgh's goals." (TR. 83).

\section*{IV. BENEFIT TO LOW-INCOME CUSTOMERS}

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\({ }^{13}\) Exhibit SO-1-R (DLC-OSBA-I-2)
}
Q. Do any of the witnesses question the value of the proposed transportation electrification programs to low income customers?
A. Yes. CAUSE-PA witness Geller argues that it is difficult to determine the precise needs for EVs and EV infrastructure amongst low income customers in the Company's service territory, citing that the majority of existing EV owners have high incomes. Mr. Geller argues the average cost to purchase a new EV is too high for low income families. As such, Mr. Geller concludes that adding EV charging infrastructure to low income communities and communities of color is likely to lead to rising rents and tenant displacement ("green gentrification"). While Mr. Geller acknowledges that transportation electrification has associated benefits for disadvantaged communities, especially with respect to air quality, he questions if the benefits would be meaningful for low income communities since personal EVs are currently mostly owned by higher income households (CAUSE-PA Statement No. 1, pp. 44-45).
Q. Do you agree with Mr. Geller's averment that low-income customers are not "able to access EVs and infrastructure related to EVs" (CAUSE-PA St. 1, p. 44, lines 10-11)?
A. No. The Company's proposed transportation electrification programs will benefit low income customers. As Mr. Geller notes in his testimony, there is currently a lack of EV ownership amongst low income customers (CAUSE-PA Statement No. 1, page 44). As the price of new EVs continue to drop and the used EV market expands, purchasing an EV will become more attainable for all customers, especially with the state and federal incentives available to those purchasing or leasing an electric vehicle. There are a variety of new plug-in electric vehicle models with a cost lower than \(\$ 30,000\) after potential
incentives with more models rapidly entering the market at lower prices points. \({ }^{14}\) This figure is much lower than the average figure cited in Mr. Geller's testimony, "estimated to be approximately \(\$ 55,600\) in 2019," (CAUSE-PA Statement No. 1, page 44), which is skewed upwards due to much of the early EV market being saturated with luxury vehicles. In the past ten years, the cost of EV batteries, the most expensive part of an EV, has dropped by more than \(89 \%\) and it will continue to drop in the coming years indicating the upfront cost of EVs will also continue dropping. \({ }^{15}\) All of this does not include the lifetime fuel and maintenance savings offered by EVs. On average, EVs are less than half as expensive to fuel and maintain as gas-powered vehicles. As such, typical EV owners save \(\$ 6,000\) to \(\$ 10,000\) on total ownership costs over the life of the vehicle. \({ }^{16}\)

However, I acknowledge many low income customers cannot afford a new vehicle of any type, which is why it's also important to note the used market for EVs is growing. Used EVs that were originally priced greater than \(\$ 30,000\), now start as low as \(\$ 6,000\) for a model that is less than four years old and has fewer than 40,000 miles. \({ }^{17}\) Again, this does not include the fuel and maintenance savings and shows that in most cases, the total cost of owning an EV is already less than owning a gas-powered vehicle. These are savings all customers, especially low income customers, should be aware of and able to experience. Data projections show that savings from EVs relative to income are significantly higher

\footnotetext{
\({ }^{14}\) Exhibit SO-5-R, Edmunds (2021, June). "Cheapest Electric Cars," Retrieved from: https://www.edmunds.com/electric-car/articles/cheapest-electric-cars/.
\({ }^{15}\) Exhibit SO-6-R, Bloomberg (2020, December). "Batteries For Electric Cars Speed Toward a Tipping Point," Retrieved from: https://www.bloomberg.com/news/articles/2020-12-16/electric-cars-are-about-to-be-as-cheap-as-gas-powered-models.
\({ }^{16}\) Exhibit SO-7-R, Consumer Reports (2020, October). "EVs Offer Big Savings OverTraditional Gas -Powered Cars," Retrieved from: https://www.consumerreports.org/hybrids-evs/evs-offer-big-savings-over-traditional-g as-powered-cars/.
\({ }^{17}\) Exhibit SO-8-R, World Resources Institute (2019, August). "The \$6,000 Electric Vehicle: The Power of the Used Car Market to Bring Electric Vehicles to Everyone," Retrieved from: https://www.wri.org/insights/6000-electric-vehicle-power-used-car-market-bring-electric-vehicles-everyone.
}
for low-income households, non-White households, and households in areas with higher levels of pollution. For car owners with an annual household income of less than \(\$ 25,000\), savings from switching to EVs amount to \(\$ 1,000\) per household annually, or \(7 \%\) of income, by \(2030 .{ }^{18}\)
Q. How will the Company's proposals be nefit low income customers that don't own or can't afford a vehicle today?
A. While there are low income customers that do not own or cannot afford a vehicle today, the Company's proposed TE Programs present a portfolio approach wherein these individuals will still benefit significantly. As I discuss in my direct testimony, the Fleet and Transit Charging Pilot will give customers clean public transportation options and reduce ground-level air pollution, which disproportionately affects the health and wellness of low income communities. Additionally, the Make Ready Pilot's proposed investments in charging infrastructure for low income communities supports an equitable transition to vehicle electrification as it reduces a major barrier to EV adoption and provides access to more stable fuel prices when customers are able to purchase an EV. As I note in my direct testimony, customers cite the lack of public charging stations nearby as their number one barrier to purchasing an EV (Duquesne Light Company Statement No. 8, p. 22). If this investment isn't made, low income customers will have fewer fueling options, which may make them more likely to purchase a gas-powered vehicle with a higher total cost of ownership and less stable fuel prices. Additionally, many low income consumers without

\footnotetext{
\({ }^{18}\) Exhibit SO-9-R, International Council on Clean Transportation (2021,February). "When might lower-income drivers benefit fromelectric vehicles? Quantifying the economic equity implications of electric vehicle adoption," Retrieved from: https://theicct.org/sites/default/files/publications/EV-equity-feb2021.pdf.
}
access to a personal vehicle or public transportation rely on ridesharing services for travel. Last year, Lyft reported that more than \(40 \%\) of its rides started or stopped in low income communities. \({ }^{19}\) With ridesharing companies like Uber and Lyft committing to \(100 \%\) electric rides by 2030 in the U.S., it is essential that ridesharing drivers have access to charging infrastructure in low income communities so low income consumers don't lose access to electrified ridesharing as a mobility option. \({ }^{20}\)

Finally, as Ms. Everett explained in her direct testimony - and which Mr. Geller does not dispute - the Company's Home Charging Pilot and Fleet Charging Pilot are costeffective according to a battery of benefit-cost analyses. As Ms. Everett explained in DLC St. 17, many of these programs' net benefits flow to all customers, including low-income customers.
Q. Do you agree with Mr. Geller's position that the proposed programs will lead to green gentrification?
A. No. There is limited evidence suggesting that the development of charging infrastructure leads to green gentrification. Mr. Geller's assertion is not premised on any specific study or report, and the articles on the topic of gentrification shared by Mr. Geller do not mention charging infrastructure. \({ }^{21}\) By not investing in charging infrastructure in low income communities, low income customers will be left with even higher barriers to electric vehicle adoption, which can create "charging deserts." Organizations such as the

\footnotetext{
\({ }^{19}\) Exhibit SO-10-R, Lyft (2020, March). "A Note forthe Lyft Driver Community," Retrieved from: https://www.lyft.com/hub/posts/a-note-for-the-lyft-driver-community.
\({ }^{20}\) Exhibit SO-11-R, Gridwise (2020, September)."Uber and Lyft pledge to reach \(100 \%\) electric vehicles by 2030. What does this mean for drivers?" Retrieved from: https://grid wise.io/uber-and-lyft-pledge-to-reach-100-electric-vehicles-by-2030-what-does-this-mean-for-drivers.
\({ }^{21}\) Exhibit SO-1-R (DLC-CAUSE-PA I-2).
}

Greenlining Institute recognize that electric utilities are well poised to fill charging deserts and ensure the distribution of charging infrastructure is equitable and inclusive of low income communities. \({ }^{22}\)

\section*{V. REPORTING AND EVALUATION}
Q. Describe NRDC witness Harris's feedback concerning the Company's EV Charge Up Pilot evaluation and reporting.
A. NRDC witness Harris states that, "...transparent data collection has proven to be successful: the data collected from the Company's ChargeUp Pilot Program, was used to consider lessons learned and design the TE Programs" (see NRDC Statement No. 2, p. 34).
Q. Do you agree with NRDC witness Harris's assessment of the Company's EV Charge Up Pilot?
A. Yes. NRDC witness Harris accurately describes the value of data collection and evaluation of the EV ChargeUp Pilot.
Q. Describe OCA witness NeIson's testimony regarding the Company's EV Charge Up Pilot evaluation and reporting.
A. OCA witness Nelson asserts that the EV ChargeUp Pilot, "...lacked specificity and did not answer unique or specific questions with measurable data," (see OCA Statement No. 6, p.

\footnotetext{
\({ }^{22}\) Greenlining Institute (2021). "Electric Vehicles for All: An Equity Too lkit," Retrieved from: https://greenlining.org/resources/electric-vehicles-for-all/.
}
13) and that the pilot "...did not appear to have a strong pilot framework," (see OCA Statement No. 6, p. 15).

\section*{Q. Do you agree with these assertions regarding the Company's EV Charge Up Pilot?}
A. No, I disagree with OCA witness Nelson's assertions. The EV ChargeUp Pilot included clear objectives, hypotheses, metrics, data collection and reporting, all which formed an appropriate evaluation approach for a preliminary pilot activity concerning a nascent technology. \({ }^{23}\) Further, Mr. Nelson does not recognize the merit of the Company's EV ChargeUp Pilot reporting and analysis agreed to in the settlement of its 2018 base rate case, which can be found as exhibits to my testimony (Duquesne Light Statement 8, Exhibit SO1, Exhibit SO-2, Exhibit SO-3). I note that OCA was a party to that settlement, so it is unreasonable for Mr. Nelson to criticize the Company's actions taken in compliance with the settlement, or for not taking an action that was not provided for under the settlement.

In any event, Mr. Nelson indicates (see OCA Statement No. 6, p. 22) that the "...Company's annual reports [on the EV ChargeUp Pilot] indicate many positive results. Some examples include (1) incremental revenue, (2) participation from customers in environmental justice areas, (3) increase utility engagement with customers, (4) increase EV awareness and, finally, (4) the Company's conclusion that they are 'encouraged by the positive overall response to the pilot to date, particularly with respect to the high degree of 'buy-in' demonstrated by participants."

\section*{Q. Please summarize witness Cline's recommendation regarding additional reporting on} the Company's EV Charge Up Pilot.

\footnotetext{
\({ }^{23}\) Exhibit SO-1-R (OCA-IV-2).
}
A. I\&E witness Cline recommends (see I\&E Statement No. 5, p. 5) that the Company continue to provide annual updates on the "EV Charge-Up Pilot as the Company agreed to in the settlement of its 2018 base rate case."

\section*{Q. Do you agree with witness Cline's recommendation?}
A. No. The Settlement provides for EV ChargeUp annual reporting to include: charging stations deployed over time, by location \& activation date; charging station installation costs by site type (capital \& rebate); charging station usage rate by site and charger type; and estimated avoided emissions. Because the EV ChargeUp pilot has concluded, the only one of these reporting metrics likely to change in the future change is avoided emissions. All other reporting metrics are fixed, and will generally not change year to year. Continuing to produce annual reports would therefore not create value for interested stakeholders and would be burdensome for the Company.

\section*{Q. Describe OCA witness Nelson's as sertions concerning evaluation and assessment plan for the proposed TE Programs.}
A. OCA witness Nelson raises concern with the Company's proposed metrics in that they "primarily concern infrastructure construction, not load management," and are "not specific enough to allow for an effective evaluation of whether the objectives will be met." Witness Nelson further asserts that, "the Company does not seem to have a detailed evaluation and assessment plan for the proposed pilots" (see OCA Statement No. 6, p. 18).

\section*{Q. Do you agree with witness Nelson's assertions?}
A. I disagree with OCA witness Nelson's assertions. The Company's proposed TE Programs were designed with clear objectives, outcomes, metrics, data inputs, and targets. \({ }^{24} \mathrm{Mr}\). Nelson criticizes the Company's evaluative criteria, but when asked to identify examples of criteria that he believes the Company should use to evaluate the proposed TE Programs, Mr. Nelson was unwilling or unable to do so. \({ }^{25}\)
Q. Describe OCA witness Nelson's recommendation concerning evaluation and assessment plan for the proposed TE Programs.
A. OCA witness Nelson recommends (see OCA Statement No. 6, p. 16), "...that the Commission require Duquesne to file a comprehensive evaluation and assessment plan within in 90 days of approval if the Commission approves any of the Company's proposed pilots."
Q. Do you agree with witness Nelson's recommendation for reporting on the proposed TE Programs?
A. No. The Company's evaluation plan, as described above, is appropriate for the evaluation and assessment of the proposed TE Programs.
Q. Please summarize witness Cline's statements regarding e valuation and reporting on the proposed TE Programs.
A. I\&E witness Cline recommends (see I\&E Statement No. 5, p. 5) that the Company, "provide, in its next base rate case, a summary showing the cost of the corresponding plant,

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\({ }^{24}\) See Exhibit SO-1-R (OCA-IV-4 and OCA-XI-8).
\({ }^{25}\) See Exhibit SO-1-R (DLC-OCA-I-49).
} operating expenses, revenues, and the progress that has made toward meeting the stated goals. The update should include any other related information relevant to the TE Programs including customer reaction and participation that is available."

\section*{Q. Do you accept witness Cline's recommendation?}
A. Yes.
Q. Please summarize witness Harris' recommendations concerning reporting on the Company's proposed TE Programs.
A. NRDC witness Harris recommends that the Company, "post non-sensitive data on a semiannually (or sooner) to a public facing and easily accessible website" (see NRDC Statement No. 2, pp. 34-35). Harris goes on to provide minimal data that should be included in this report: "...kWh utilized; Site host type (such as MUD, workplace, parking garage, etc.); Load profiles by site; Number of charging sessions; Costs to drivers to utilize each station; Charging station location; Cost for installation and equipment; and How EJ communities are being served by the pilot."
Q. Do you agree with witness Harris' recomme ndationfor reporting on the proposed TE Programs?
A. In part. Reporting ensures transparency and can benefit other stakeholders working to advance the electric mobility market in the Company's service territory. However, it is essential to maintain customer privacy, and to balance reporting burden against the usefulness of the data to be provided. I agree that it is reasonable to report on TE Program data in its next base rate case, including kWh utilized, site host type, number of charging
sessions, cost for installation and equipment, and how Environmental Justice Areas are being served. Due to customer privacy concerns, I disagree with providing customer load profiles by site, costs that site hosts are charging drivers to use their charging stations, and charging station location. Customers may refrain from participating in TE Programs if such information is required to be shared publically.
Q. Please summarize witness Keller's statements regarding reporting for the proposed Make-Ready Pilot in the Company's next base rate proceeding.
A. I\&E witness Keller recommends (see I\&E Statement No. 2, pp. 28-29) that the Company report upon, "the total number of L2 and DCFC stations installed as well as the number of L2 charging stations in Environmental Justice (EJ) areas broken down by year under the Make-Ready Pilot" as well as, "the number and dollar amount of charging station rebates for charging stations in EJ areas and a breakdown of governmental grants received under the Make-Ready Pilot by year," and "an evaluation of customer participation and feedback, public access to charging stations, charging station usage, and identification of charging station revenues received by the Company from charging station owners."

\section*{Q. Do you agree with witness Keller's recommendation concerning the Make-Ready Pilot?}
A. The Company agrees with witness Keller's recommendations with one exception. The Company lacks the ability to provide accurate information about a customers' receipt of government grants. While a customer may voluntarily share this information with the Company, it would not be practical to require such information.
Q. Please summarize witness Keller's statements regarding reporting for the proposed Fleet and Transit Charging Pilot in the Company's next base rate proceeding.
A. Witness Keller recommends (see I\&E Statement No. 2, p. 32) that the Company provide, "documentation that the six DCFC stations have been installed at the Port Authority's East Liberty Garage, the total number of L2 and DCFC stations installed for all other customers participating in the Fleet and Transit Charging Pilot, and the number of projects in EJ areas by year" as well as, "an evaluation of customer participation and feedback, charging station usage, and identification of charging station revenues received by the Company from charging station owners."
Q. Do you agree with witness Keller's recomme ndationconcerning the Fleet and Transit Charging Pilot?
A. Yes, the Company agrees with witness Keller's recommendation, with one clarification. In the proposed Fleet and Transit Charging Pilot, the Company may own the charging stations. Therefore, the Company will report upon charging station revenues received by the Company from charging station hosts (which may or may not be the owner of the charging station itself).
Q. Please summarize witness Keller's statements regarding reporting for the proposed Home Charging Pilot in the Company's next base rate proceeding.
A. Witness Keller recommends (see I\&E Statement No. 2, p. 35) that the Company report upon, "the total number of L2 stations installed as well as the number of L2 charging stations installed for low-income customers broken down by year," as well as, "the amount the Company paid for standard installation costs broken down by residential customers and
low-income customers," and "an evaluation of customer participation, feedback, and charging station usage, and identify the charging station revenues received by the Company from charging station owners."
Q. Do you agree with witness Keller's recommendation concerning the Home Charging Pilot?
A. Yes, the Company agrees with witness Keller's recommendation, with one clarification. In the proposed Home Charging Pilot, the Company will own the charging stations for the 5year customer participation term. Therefore, the Company will report upon charging station revenues received by the Company from residential charging station hosts.
Q. Please summarize witness Keller's statements regarding reporting for the Awareness, Education, and Engagement (AEE) proposal in the Company's next base rate proce eding.
A. Witness Keller recommends (see I\&E Statement No. 2, p. 37) that the Company, "provide a breakdown of the programs undertaken by the Company, the specific channels used to educate customers about EVs, charging stations, and the Company's transportation electrification program, as well as the programs geared specifically towards low-income customers by year," and, "include an evaluation of customer participation and feedback."
Q. Do you agree with witness Keller's recommendation concerning the AEE proposal?
A. Yes, the Company agrees with witness Keller's recommendation.
Q. Please summarize witness Keller's statements regarding reporting for the Fleet Electrification Advisory Service proposal in the Company's next base rate proceeding.
A. Witness Keller recommends (see I\&E Statement No. 2, p. 39) that the Company, "provide the total number of customers that participated in the Fleet Electrification Advisory Service program and the number of non-profit organizations that serve EJ Areas that participate in the Fleet and Advisory Service program by year," and "include an evaluation of customer participation and feedback."
Q. Do you agree with witness Keller's recommendation concerning the Fleet Electrification Advisory Service proposal?
A. Yes, the Company agrees with witness Keller's recommendation.
Q. Please summarize witness Keller's statements regarding reporting for the proposed EV Registration Incentive in the Company's next base rate proceeding.
A. Witness Keller recommends (see I\&E Statement No. 2, p. 41) that the Company report upon, "the number of customers that participated in the registration incentive by year as well as an evaluation of customer participation and feedback."
Q. Do you agree with witness Keller's recommendation concerning the proposed EV Registration Incentive?
A. Yes, the Company agrees with witness Keller's recommendation.

\section*{VI. TRANSPORTATION ELECTRIFICATION PROGRAMS}
Q. ChargePoint Witness Deal proposes the charging stations installed for the Public, Workplace, and Multi-Unit Dwelling Make-Ready, Fleet and Transit Charging and Home Charging Pilots meet ce rtain crite ria. (ChargePoint St. 1, p.4, lines 13-20; p. 5, lines 6-14 and p. 5, line 18 - p. 6, line 2.) Does the Company agree with this proposal?
A. Yes, as mentioned in my testimony, the Company plans to identify qualified vendors through a competitive solicitation. Charging stations will be required to have certain capabilities including interoperability and managed charging. Witness Deal has proposed more specific criteria to qualify charging stations. The Company accepts the following charging station eligibility requirements proposed by Witness Deal:
- Smart and capable of connecting to a charging network
- Managed charging capabilities
- ENERGY STAR certified for Level 2 stations
- Safety certified by a third-party Nationally Recognized Testing Laboratory

The Company reserves the right to include additional technical requirements of charging stations used in its TE programs.
A. Public, Workplace, and Multi-Unit Dwelling Make-Ready Pilot
Q. In addition to parties' comments that apply to multiple TE Pilots, which you discuss above, did parties have other comments pertaining specifically to the Company's Public, Workplace, and Multi-Unit Dwelling (MUD) Make-Ready Pilot (Make-Ready Pilot)?
A. Yes. I address these comments below.
Q. Please summarize intervenors' comments regarding the Company's Make-Ready Pilot, to the extent you have not already addressed those comments.
A. I\&E witnesses Cline and Keller both support the Company's Make-Ready Pilot and recommend specific reporting requirements for the pilot (I\&E Statement No. 5, p. 4 and Statement No. 2 pp. 28-29), which I discussed above.

NRDC witness Harris supports the Make-Ready Pilot noting such programs have been authorized by regulatory commissions nationwide. Ms. Harris argues behind-themeter make-ready is a core utility function and therefore should be part of the Company's standard utility distribution system planning and not a pilot activity (NRDC Statement No. 2, p. 19). Ms. Harris also recommends the MUD portion of the make-ready pilot be expanded to include an option for utility ownership of the charging station in an effort to reduce barriers faced by landlords and increase MUD deployments (NRDC Statement No. 2, p. 20). Additionally, Ms. Harris argues the Company should not reject proposals in locations that may be underutilized and instead focus on filling charging station gaps in its service territory (NRDC Statement No. 2, p. 22).

ChargePoint witness Deal recommends that the Make-Ready Pilot be approved with modifications, including: specifying charging station eligibility requirements and ensuring vendor neutral program materials (ChargePoint Statement No. 1, pp. 5-6), which I address above. Additionally, Mr. Deal proposes to require that customers that wish to install both DC Fast Charging stations (DCFCs) and Level 2 charging stations at a single site to install two Level 2 ports and two DCFC ports and he proposes establishing 50 kW as the minimum DCFC per-port power level, instead of 150 kW .

OCA witness Nelson finds some aspects of the Make-Ready Pilot acceptable; however, he argues the Company should not own behind-the-meter assets and instead should provide rebates (OCA Statement No. 6, p. 21).

OSBA witness Knecht argues behind-the-meter investments are generally the responsibility of the customer and that the conditions of the Make-Ready Pilot may not apply to or be attractive to all interested parties, notably the requirement to subscribe to charging networking services and to provide the Company with charging data from the network vendor (OSBA Statement No. 1, pp. 35-36).

CAUSE-PA witness Geller argues the Make-Ready Pilot does not adequately target low income consumers and may result in the displacement of low income communities and communities of color, otherwise referred to as "green gentrification." Mr. Geller recommends that if the make-ready pilot is approved that confirmed low income and CAP customers be exempt from paying for the costs (CAUSE-PA Statement No. 1, p. 47).
Q. OSBA witness Knecht argues that demand for charging can be met by unregulated entities and therefore the Make-Ready Pilot should be rejected. Do you agree with his assertion?
A. No. I do not agree with his assertion for the reasons discussed earlier in my testimony.
Q. CAUSE-PA witness Geller recommends rejecting the Make-Ready Pilot. Does the Company agree with this recommendation?
A. No, for the reasons discussed earlier in my testimony.
Q. CAUSE-PA witness Geller recommends that if the Make-Ready Pilot is approved as proposed that the Company's low income and Customer Assistance Program (CAP) customers be exempt from paying the costs of the pilot. Does the Company agree with this recommendation?
A. No. First, as a practical matter, the costs of the Make-Ready Pilot are estimated to contribute approximately \(\$ 0.06\) to a typical residential customer's monthly bill. Second, most CAP customers will not ultimately pay this amount anyway, as CAP bills are based primarily on participating customers' income. Third, low-income customers not enrolled in CAP are subject to the Company's applicable residential rates. Mr. Geller appears to contemplate establishing another set of rates for these customers that exclude the costs of certain EV programs, which is not practical (and which Mr. Geller does not attempt to calculate in any event). Finally, as I described earlier in my testimony, even without driving an EV, low income customers can benefit from transportation electrification. Therefore they should contribute to the program costs.
Q. NRDC witness Harris recommends expanding the Company's proposed utility ownership of charging stations and make-ready infras tructure to multi-unit dwellings (MUD). Do you agree with this proposal?
A. Not at this time. Although I understand Ms. Harris' position, the Company has purposefully proposed a portfolio approach with different ownership structures for different market segments. The Company believes Company ownership of make-ready and site host ownership of charging stations is the appropriate approach for MUD sites. At this early stage, many building owners and managers are experimenting with the best ways to install and operate these stations and charging station ownership flexibility is important.
Q. NRDC witness Harris recommends that the Company support stations that may be "underutilized" (NRDC Harris Statement, p. 22, lines 5-11). Do you agree with this recommendation?
A. Partially. As stated in my testimony, the Company will evaluate a range of factors when reviewing applications for the Make-Ready Pilot. The Company will evaluate each site on a case-by-case basis. The existing availability of nearby charging infrastructure will be taken into consideration when selecting pilot sites while also weighing the effective use of customer funds. Additionally, the Company will consider how installing charging infrastructure in a particular location may influence and encourage adoption of EVs in that area over time.
Q. OCA Witness Nelson recommends rejecting Company ownership of the behind-themeter infrastructure and proposes funds be provided as a rebate instead. Does the Company agree with this recommendation?
A. No. The Company does not expect that a rebate structure will lead to nearly the level of success as make-ready ownership. \({ }^{26}\) As I discussed in my direct testimony, the upfront cost of charging infrastructure, together with the time and resources necessary to manage an installation, can deter customers from deploying charging stations. When asked to provide evidence that the recommended rebate structure would reduce a customer's up-front costs of installing charging infrastructure or alleviate a customer's project management and/or technical implementation barriers associated with installing charging infrastructure, Mr .

\footnotetext{
\({ }^{26}\) Exhibit SO-1-R (OSBA-I-9b).
}

Nelson was unable to do so. \({ }^{27}\) The Company's proposed Make-Ready Pilot will overcome these obstacles by managing the construction and owning behind the meter equipment instead of offering a rebate for project costs.
Q. If the Commission rejects Company ownership of behind-the-meter infrastructure, would the Company be willing to implement a rebate structure for the Make-Ready Pilot instead?
A. The Company would be willing to consider such a program. Under such a rebate structure, the Company would cover up to one-hundred percent of make-ready project costs for selected projects, up to a total program cost commensurate with that of the Company's original proposal. The Company strongly believes that Company's original proposal is superior to such a rebate program, and Mr. Nelson has offered no empirical evidence to the contrary; however, having a rebate offering for our customers is likely to be better than having no program at all. Implementing the Make-Ready Pilot under a rebate structure would cost an annual program expense, including customer rebates, of \(\$ 1,046,875\). The Company's proposed revenue requirement does not reflect this structure.
Q. OCA Witness Nelson recommends that "If the Company proposes a reasonable rebate structure, for its Make-ready Pilot and Fleet and Transit Charging Pilot, I recommend that the Commission deny the Company's request to extend the pilot through 2024 but approve years 2022-2023 with my recommended modifications and filing requirements." (OCA St. 6, p. 37, lines 1-4). Do you accept this recommendation?

\footnotetext{
\({ }^{27}\) Exhibit SO-1-R (DLC-OCA-I-53, DLC OCA-I-54, and DLC-OCA-I-58).
}
A. No. The premise of this recommendation appears to be predicated on the submission of a load management plan by the Company in 2023 and acceptance of a rebate program structure. As I address above, the Company rejects those recommendations and so by extension rejects the recommendation to allow funding for the Make-ready Pilot and the Fleet and Transit Charging Pilot only for 2022 and 2023. Funding for all three years is necessary to support the charging infrastructure needed in our region and to have a robust data set to help inform future efforts.
Q. ChargePoint witness Deal has proposed that at sites where customers plan to host both DCFC and Level 2 stations, the Company require a minimum of two Level 2 ports and two DCFC ports. (ChargePoint St. 1, p. 4, lines 21-22.) Does the Company accept this recommendation?
A. Yes. The Company agrees that at locations where customers are interested in hosting both DCFC and Level 2 stations that requiring a minimum of two DCFC ports and two Level 2 ports makes sense to encourage greater customer participation. At sites where DCFC is not being installed, customers will be required to install a minimum of four Level 2 charging ports or two Level 2 charging ports for customers in Environmental Justice Areas.
Q. ChargePoint witness Deal proposes to establish 50 kW as the minimum DCFC perport charging capacity instead of 150 kW . He also proposes to allow site-hosts to "future-proof" sites (ChargePoint St. 1, p.11, line 16-p. 12, line 5). \({ }^{28}\) Does the Company accept these recommendations?

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\({ }^{28}\) ChargePoint describes future-proofing as "the practice of sizing the power feed for charging stations to allow for 1) the addition of more ports at a site as demand forEV charging increases, or 2 ) higher voltage charging as the market evolves to permit the use of faster charging methods." Id. FN8.
}
A. Yes. The Company agrees with the recommendation to lower the DCFC requirement for per port charging capacity from 150 kW to 50 kW . As Witness Deal elucidates, this will provide greater flexibility for customers in these still-early market stages and will create more flexibility to meet the needs of a specific location and use case. The Company will work with site hosts on a case-by-case basis to evaluate and determine if future-proofing is warranted.
B. Fleet and Transit Charging Pilot
Q. In addition to parties' comments that apply to multiple TE Pilots, which you discuss above, did parties have other comments pertaining specifically to the Company's Fleet and Transit Charging Pilot?
A. Yes. I address these comments below.
Q. Please summarize intervenors' comments regarding the Fleet and Transit Charging Pilot, to the extent not alre ady addressed else where in your testimony.
A. NRDC witness Harris supports the Fleet and Transit Charging Pilot and argues the Company should increase program funds to support additional medium- and heavy-duty fleets. Additionally, Ms. Harris recommends that the transit charging stations support buses that mainly service EJ Areas and that at least \(35 \%\) of the fleet charging investment be made with fleets located in and/or serving EJ Areas (NRDC Statement No. 2, p. 5, lines 6-8).

CAUSE-PA witness Geller supports the Fleet and Transit Charging Pilot, subject to the modification that \(100 \%\) of the funds be devoted to EJ Areas, and the request that the Company further explain "how it will prioritize mass transit and fleet electrification
initiatives serving the poorest communities in DLC's service territory and/or which serve other uniquely vulnerable populations" (CAUSE-PA Statement No. 1, p. 49, line 19 - p. 50 , line 2 ).

I\&E witnesses Keller and Cline also support the Fleet and Transit Charging Pilot with specific reporting requirements in the next base rate proceeding (I\&E Statement No. 2, p. 32 and Statement No. 5, p. 5), which I addressed earlier in my testimony.

ChargePoint witness Deal recommends that the Fleet and Transit Charging Pilot be approved with modifications, including: issuing eligibility requirements for the charging stations used in the pilot and ensuring all communications are vendor neutral, which I addressed earlier in my testimony (ChargePoint Statement No. 1, p. 5).

OCA witness Nelson recommends the Fleet and Transit Charging Pilot be denied as proposed for the reasons I discuss earlier in testimony, and that the Company instead provide customers with a rebate (OCA Statement No. 6, pp. 20-21).

OSBA witness Knecht opposes the Fleet and Transit Charging Pilot. In addition to the reasons I discuss earlier in my testimony, Mr. Knecht argues the transit portion of the pilot is seemingly designed to get favor from local government (OSBA Statement No. 1, pp. 36-37).
Q. NRDC witness Harris and CAUSE-PA witness Geller propose to increase the number of sites that are located and/or serve EJ Areas. Witness Harris proposes an increase from \(\mathbf{2 5 \%}\) to \(\mathbf{3 5 \%}\). Witness Geller proposes that all Pilot funds go towards projects in EJ Areas. Does the Company accept these recommendations?
A. Partially. The Company agrees with Witness Harris' recommendation to dedicate at least \(35 \%\) of investments toward projects in or that serve EJ Areas. The Company believes that

Witness Geller's proposal is too geographically restrictive for a pilot. Mr. Geller's proposal would necessarily disqualify any customer located outside an EJ Area. In addition to being unfair, this would also bias the sample of participating customers, and thereby impair the quality of the information gathered through the pilot.
Q. CAUSE-PA Witness Geller requests that the Company further explain how it will prioritize mass transit and fleet electrification initiatives in or that serve EJ Areas. How does the Company respond?
A. I believe I have responded to Mr. Geller's request already through discovery. See Exhibit SO-1-R (CAUSE-PA-II-5). The Company plans to work with community groups, nonprofits, government agencies, school districts, and local foundations, among others to identify fleets that would be good candidates for electrification or that are in areas where the local community would benefit from electrification. Customers will submit an application which will be evaluated based on a number of factors, including if the fleet is in an EJ Area or serves a low income or disadvantaged population.
Q. NRDC Witness Harris recommends doubling the funds for the Fleet and Transit Charging Pilot to serve up to 24 customers annually. \({ }^{29}\) Does the Company agree with this recommendation?
A. Not at this time. The Company agrees with Witness Harris that electrifying medium and heavy-duty fleets can bring important environmental and health benefits, particularly for lower income communities. However, the Company asserts that since this is a pilot, it

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\({ }^{29}\) Exhibit SO-1-R (DLC-NRDC-I-11).
}
should be a relatively modest size so the Company can learn more about its customers' needs then make decisions about how to best support them at scale moving forward.
Q. NRDC witness Harris recommends that the Company should ensure that charging stations installe das part of the Transit Charging Pilot support buses that mainly serve EJ and low-income communities. Please respond.
A. Ms. Harris's recommendation is effectively already built into the Company's proposal. The Port Authority of Allegheny County ("Port Authority) will operate the six electric buses that will be powered by the DCFC stations installed as part of the Transit Charging Pilot on transit routes out of the organization's East Liberty Garage. The Port Authority indicates that nearly all of the routes based out of this garage serve EJ Areas in Allegheny County's eastern sector.
Q. OCA Witness Nelson recommends rejecting Company ownership of the behind-themeter infrastructure for the Fleet and Transit Charging Pilot and proposes funds be provided as a rebate instead. Does the Company agree with this recommendation?
A. No, for the reasons discussed earlier in my testimony.
Q. If the Commission rejects Company ownership of behind-the-meter infrastructure, would the Company be willing to implement a rebate structure for the Fleet and Transit Charging Pilot instead?
A. Partially. The Company would be willing to consider such a structure for the Fleet portion of the Pilot. Under such a program, the Company would cover up to one-hundred percent of make-ready project costs for selected projects, up to a total program cost commensurate
with that of the Company's original proposal. The Company strongly believes, however, that Company's original proposal is superior to such a rebate program, and Mr. Nelson has offered no empirical evidence to the contrary. Implementing the Fleet Charging Pilot under a rebate structure would cost an annual program expense, including customer rebates, of \(\$ 1,098,520\). The Company's proposed revenue requirement does not reflect this structure.

Under this scenario, the Company would recommend against implementing a rebate structure for the Transit portion of this pilot. The Company believes there is strong evidence from the Company's DCFC Evaluation Pilot for the benefits of Company ownership of this infrastructure.
Q. OCA Witness Nelson recommends that "If the Company proposes a reasonable rebate structure, for its Make-ready Pilot and Fleet and Transit Charging Pilot, I recommend that the Commission deny the Company's request to extend the pilot through 2024 but approve years 2022-2023 with my recommended modifications and filing requirements." (OCA St. 6, p. 37, lines 1-4). Do you accept this recommendation?
A. No, for the reasons I addressed earlier in my testimony.
Q. OSBA witness Knecht recommends rejecting the Fleet and Transit Charging Pilot, arguing in part that this infrastructure can be met by unregulated entities. Do you agree with his assertion?
A. No, for the reasons I addressed earlier in my testimony.
Q. OSBA witness Knecht states, "this program has the appearances of an attempt to curry favor with local government authorities at rate payer expense, particularly since the terms are more attractive to the Port Authority than they are to the other fleet ope rators." (OSBA St. 1, p. 37, lines 15-18.) Please respond.
A. I acknowledge that the Company's proposal would not require the Port Authority to pay an additional fee to participate in the Fleet and Transit Charging Pilot, whereas other participating customers would be required to pay a monthly fee to cover the costs of the associated charging stations. However, I categorically deny that this is inappropriate in any way, or represents "an attempt to curry favor with local government authorities at ratepayer expense." To the contrary: as I explained in my direct testimony, the Company's proposal to not require a separate payment from the Port Authority is consistent with the public service that the Port Authority provides - including, as I explained above, with respect to low-income customers. Duquesne Light's service territory is small. The fact that the Fleet and Transit Charging Pilot singles out the Port Authority reflects that the Company knows of no other public transit agency in the Company's service territory that is currently electrifying its fleet.
Q. OSBA witness Knecht states "the Company calculates that the revenues generated from charges to the customer will cover the full cost. Howe ver, that may not be the case for the FPFTY, as revenues appear to fall short of the claimed revenue requirement for that year" (OSBA Statement 1, p. 36, lines 24-26). How do you respond?
A. I believe I have responded to Mr. Knecht's concern in discovery. The cost of the charging stations, if fleet customers select the Bundled or Pre-Pay Options, are borne by the
participants over the contract term (DLC Statement No. 8, p. 43, line 12- p. 44, line 10). The remaining program costs are socialized among the C\&I customer class. See Exhibit SO-1-R (OSBA-I-9a) for further details on the cost allocation for this program.
Q. Do you have any further response to witnesses for OCA, OSBA, and CAUSE-PA who indicate opposition to the Fleet Charging Pilot?
A. Yes. I observe that none of them questioned the Company's analysis, presented in Ms. Everett's direct testimony (DLC St. 17), demonstrating that the Fleet Charging Pilot is costeffective and is projected to yield net benefits.
C. Home Charging Pilot
Q. In addition to parties' comments that apply to multiple TE Pilots, which you discuss above, did parties have other comments pertaining specifically to the Company's Home Charging Pilot?
A. Yes. I address these comments below.
Q. Please summarize intervenors' comments regarding the Company's Home Charging Pilot, to the extent not alre ady addressed else where in your testimony.
A. ChargePoint witness Deal recommends that the Home Charging Pilot be approved with modifications, including: issuing eligibility requirements for the charging stations used in the pilot, which I address earlier; and allowing customers to purchase their own charger that meets the eligibility requirements and receive up to \(\$ 500\) to cover standard installation
costs, or up to \(\$ 2,000\) for qualifying low-income customers (ChargePoint Statement No. 1, pp. 5-6).

I\&E witness Cline recommends that the Home Charging Pilot be approved with a modification that all charging stations are transferred to owners at the end of the pilot period with no further cost recovery from ratepayers (I\&E Statement No. 5, pp. 4-5). I\&E witness Keller recommends that the Home Charging Pilot be approved with specific reporting requirements in the next base rate proceeding, which I address above (I\&E Statement No. 2, pp. 35-36).

OSBA witness Knecht argues that, should the Home Charging Pilot be approved, any associated risks absorbed by the Company should rest solely with the Company's investors and not be passed on to ratepayers (OSBA Statement No. 1, p. 38).

In addition to comments I have addressed earlier, while OCA witness Nelson notes the Company's efforts to invest in public EV infrastructure may be appropriate, Mr. Nelson believes the Home Charging Pilot does not expand access to EV charging as much as publicly accessible or shared sites. Mr. Nelson argues the Company's investment (if any) should focus primarily on publicly accessible sites (OCA Statement No. 6, p. 19).

CAUSE-PA witness Geller argues the Home Charging Pilot will not benefit low income customers and may lead to gentrification. If it is approved, Mr. Keller recommends confirmed low income and CAP customers be exempt from the costs (CAUSE-PA Statement No. 1, p. 51). I address these concerns earlier in my testimony.

\section*{Q. Witness Deal has proposed a Bring-Your-Own-Charger (BYOC) \$500 installation rebate as part of the Home Charging Pilot (ChargePoint St. 1, p. 6, lines 3-6). Does the Company accept this recommendation?}
A. No, I disagree with this recommendation because it is inconsistent with the structure of the Home Charging Pilot. Under Mr. Deal's recommendation, the BYOC customer would outlay the full amount of charger and installation costs, then the Company would provide them a rebate of up to \(\$ 500\) (or up to \(\$ 2,000\) for low income customers). This recommendation would thus not mitigate the up-front costs of installing charging equipment, or the customer's effort to arrange the installation. Moreover, whereas the Home Charging Pilot as proposed would recover installation costs from participating customers through a monthly fee, under Mr. Deal's proposal, BYOC customers "would avoid the \(\$ 21.17\) monthly fee that Duquesne Light has proposed for the program." ChargePoint St. 1, p. 19, lines 20-21. Where a customer wishes to choose and install their own charger, they will remain able to do so without participating in the Home Charging Pilot.

Finally, the Company does not anticipate that the addition of a BYOC option would meaningfully expand the charging station hardware options available through the Home Charging Pilot. Under the Pilot as proposed, the Company already anticipates allowing participating customers to choose their charging station hardware from a pre-qualified list, as I discussed above and in my direct testimony.
Q. Witness Cline recommends that for the Home Charging Pilot all installed charging stations are transferred to the owners at the end of the pilot period with no further cost recovery from ratepaye rs. Does the Company agree with this recommendation?
A. Yes. Mr. Cline confirmed in discovery that his recommendation that charging stations be transferred "at the end of the pilot period" refers to the conclusion of each customer's 5-
year contract term. \({ }^{30}\) This recommendation is consistent with the Company's proposal that at the end of the 5-year contract term, ownership of the charging station and all associated responsibilities will pass to the customer (DLC St. 8, p. 49, lines 10-14).

\section*{Q. Witness Nelson critiques the Home Charging Pilot on the grounds that those charging locations may not be publicly accessible. (OCA St. 6, p. 19, lines 8-14). Does the Company agree with this critique?}
A. No. Witness Nelson asserts that "residential charging stations are not publicly accessible or shared, and thus do not expand access to EV charging as much as publicly accessible or shared sites such as multi-unit dwellings, workplaces, or other public locations." Although access to public and workplace charging is critically important, Witness Nelson ignores that fact that on average \(80 \%\) of charging happens at home. Giving customers access to affordable and convenient charging at home is an important component to encouraging EV adoption.

Witness Nelson also states that "[I]n order to ensure that ratepayer dollars facilitate EV charging access for those who are the least likely to afford it, investments should focus on publicly accessible charging sites, not private homes." (OCA St. 6, p 19, lines 12-14.) In the Pittsburgh metro region, for households at or below \(150 \%\) of the Federal Poverty Line, close to half own a detached home. \({ }^{31}\) The Home Charging Pilot is designed to provide low-income customers, who otherwise may not be able to afford the upfront cost of a charging station or the necessary electrical upgrades, with additional financial support up

\footnotetext{
\({ }^{30}\) Exhibit SO-1-R (DLC-I\&E-I-14).
\({ }^{31}\) U.S. Census Bureau, 2019 American Housing Survey. Accessed from: https://www.census.gov/programs surveys/ahs.html.
}
to \(\$ 2,000\). The Company's portfolio approach is thus designed to meet the needs of lowincome customers whether they live in MUDs or single-family homes.
Q. Witness Knecht recommends that rate payers be indemnified from any insurance, damages, and legal costs associated with Home Charging Pilot charging stations. (OSB A St. 1, p. 34, lines 25-28.) Do you agree with this recommendation?
A. No. Witness Knecht's request is not reasonable. Mr. Knecht appears to seek certain program costs to be deemed imprudent before they are incurred. The Company has appropriately limited liability under this program to "repair or replacement of the Charging Station atDLC's sole discretion and as may be required by this Agreement." The Company has outlined the Customer responsibilities, including maintaining home insurance, and proper use of the equipment under the Home Charging Pilot Customer Agreement (see Exhibit SO-5).
Q. CAUSE-PA witness Geller opposes the Home Charging Pilot, arguing, "the cost of EV ownership and maintenance is simply out of reach of the average low income customer. I am concerned that providing enhanced incentives for \(\mathbf{E V}\) home chargers in low income neighborhoods could lead to increased gentrification within EJ areas" (CAUSE-PA Statement 1, p. 51, lines 2-4). Do you agree?
A. No, for the reasons I described earlier in my testimony.
Q. CAUSE-PA witness Geller recommends that if the Home Charging Pilot is approved as proposed that confirmed low income and CAP customers be exempt from paying for that rider. Does the Company agree with this recommendation?
A. No, for the reasons I described earlier in my testimony.
Q. Do you have any further response to witnesses for OCA, OSBA, and CAUSE-PA who indicate opposition to the Home Charging Pilot?
A. Yes. I observe that none of them questioned the Company's analysis, presented in Ms. Everett's direct testimony, demonstrating that the Home Charging Pilot is cost-effective and is projected to yield net benefits. In fact, Mr. Nelson confirmed in discovery that he does not take the position that the Pilot will yield net costs to customers. \({ }^{32}\)
D. Awareness, Education, and Engagement
Q. In addition to parties' comments that apply to multiple TE Pilots, which you discuss above, did parties have other comments pertaining specifically to the Company's Awareness, Education and Engagement (AEE) proposal?
A. Yes. I address these comments below.
Q. Please summarize parties' comments on the Company's AEE proposal.
A. NRDC witness Harris recommends the Company's AEE proposal be approved, noting how utilities have a critical role to play in increasing education and awareness surrounding electric vehicles and are better positioned to do so then automakers seeking to promote specific vehicles or charging providers seeking to promote specific business models (NRDC Statement No. 2, p. 33).

\footnotetext{
\({ }^{32}\) Exhibit SO-1-R (DLC-OCA-I-47).
}

Similarly, I\&E witnesses Keller and Cline accept the Company's AEE proposal with specific reporting requirements in the Company's next base rate proceeding, which I address earlier in my testimony (I\&E Statement No. 2, p. 37 and Statement No. 5, p. 5).

ChargePoint witness Deal supports the Company's education and outreach efforts so long as they remain vendor neutral. Further, Mr. Deal recommends for the Commission to direct the Company to file all marketing materials with the Commission annually as an informational filing, which I address earlier in my testimony (ChargePoint Statement No. 1, p. 12).

OCA witness Nelson argues any customer education efforts surrounding electric vehicles should also address load management and, therefore, Mr. Nelson recommends reducing the funding for the Company's AEE proposal by \(75 \%\) until the Company more comprehensively develops load management programs (OCA Statement No. 6, pp. 35-36).

OSBA witness Knecht and CAUSE-PA witness Geller did not directly address the Company's AEE proposal in their respective testimonies.

\section*{Q. Do you agree with OCA witness Nelson's recommendation to reduce the Company's proposed AEE expenses by \(\mathbf{7 5 \%}\) (OCA Statement No. 6, p. 36)?}
A. No. AEE forms a critical component of the TE Programs for a variety of reasons. Lack of consumer awareness is one of the most significant barriers to greater adoption of EVs. Many aspects of EV education bear directly on Duquesne Light's systems and functions. For example, current and prospective EV owners will require fundamental information regarding different EV charging levels, electricity bill impacts, and how to connect EV charging equipment to the Company's grid. This information can best be provided (and in
some instances, can only be provided) by the Company. The proposed AEE budget reflects the resources necessary to provide this service.

Moreover, Mr. Nelson's recommendation has no factual basis. When asked to provide justification and assumptions he used to determine that a \(75 \%\) reduction was an appropriate amount to reduce the proposed AEE expenses, OCA witness Nelson indicated that the recommendation was subjective. \({ }^{33}\)
Q. I\&E witness Keller recommends reporting requirements for the Company's AEE proposal (I\&E Statement No. 2, p. 37). Do you agree with these recommendations?
A. Yes, as I addressed above.
E. Fleet Electrification Advisory Service
Q. In addition to parties' comments that apply to multiple TE Pilots, which you discuss above, did parties have other comments pertaining specifically to the Company's Fleet Electrification Advisory Service proposal?
A. Yes. I address these comments below.
Q. Please summarize parties' comments on the Company's Fleet Electrification Advisory Service proposal.
A. NRDC witness Harris recommends that the Company's proposed Fleet Electrification Advisory Service be approved and the Company should commit that at least 10 fleets that service EJ Areas participate in the fleet advisory service by 2024. Additionally, Ms. Harris

\footnotetext{
\({ }^{33}\) See Exhibit SO-1-R (DLC-OCA-I-66).
}
argues that the Company should analyze potential fueling costs for fleets charging EVs on current electric rates versus the time-of-use rate and provide information on the benefits and challenges of installing a second meter for EV charging (NRDC Statement No. 2, pp. 33-34).

I\&E witnesses Keller and Cline accept the Company’s Fleet Electrification Advisory Service proposal with specific reporting requirements in the Company's next base rate proceeding, which I address earlier in my testimony (I\&E Statement No. 2, p. 37 and Statement No. 5, p. 5).

ChargePoint witness Deal recommends that the Commission approve the Company's Fleet Electrification Advisory Service proposal and direct the Company to ensure all communications with fleet customers are vendor neutral (ChargePoint Statement No. 1, p. 5).

CAUSE-PA witness Geller recommends the Company's Fleet Electrification Advisory Service, if approved, be open to stakeholders and inclusive of local EJ groups (CAUSE-PA Statement No. 1, p. 50).

OCA witness Nelson argues the Company's Fleet Electrification Advisory Service as proposed would be inadequate until the Company has sufficiently developed its load management offerings and, therefore, recommends the service is rejected (OCA Statement No. 6, pp. 35-36).

OSBA witness Knecht did not directly address the Fleet Electrification Advisory Service in his testimony.
Q. Do you agree with OCA witness Nelson's recommendation to reject the Company's proposed Fleet Electrification Advisory Service (OCA Statement No. 6, p. 36)?
A. No. The Fleet Electrification Advisory Service is a core utility function which uses the utility's expertise to help customers with vehicle fleets develop fleet electrification plans. Not only will this help fill a resource gap for customers as they seek to transition to electric fleets, but also it may help lead to a reduction in ground-level emissions, particularly in EJ Areas, and inform the Company's distribution system planning, construction, and operation decisions with insight gained from these emerging electric service needs. The proposed Fleet Electrification Advisory Service budget reflects the resources necessary to provide support to customers who seek to transition their fleet to electricity service.
Q. ChargePoint witness Deal recommends that communications for the Fleet Advisory Service remain vendor neutral (ChargePoint Statement No. 1, pp. 16-17.) Do you agree?
A. Yes, the proposal by witness Deal for vendor neutral communications is consistent with the Company's approach in the EV ChargeUp Pilot and the Company's proposed approach for TE Portfolio. Any marketing or other program materials will be vendor neutral, as will any guidance provided to customers.
Q. I\&E witness Keller recommends reporting requirements for the Company's proposed Fleet Electrification Advis ory Service (I\&E Statement No. 2, p. 39). Do you agree with these recommendations?
A. Yes, as I addressed above.
Q. Mr. Geller requests the Fleet Electrification Advis ory Se rvice be open to stakeholders and inclusive of local environmental justice groups. (CAUSE-PA Statement No. 1, p. 50.) Do you agree with these recommendations?
A. Yes. Mr. Geller provided clarification that, "The information provided by the Fleet Electrification Advisory Service should be developed inclusive of expertise of community partners and local environmental justice groups, especially those that advocate on behalf of low income customers to ensure that information and advice provided is rooted in the needs of the communities that DLC serves. \({ }^{3} 34\) The Company agrees to engage such organizations to provide input to fleet electrification support offered through the proposed program in EJ Areas.
Q. NRDC witness Harris recommends modifications to the Company's proposed Fleet Electrification Advisory Service (NRDC Statement No. 2, pp. 33-34). Please summarize her recommendations and your responses to them.
A. Ms. Harris recommends the Company target medium and heavy duty fleets through the proposed service. The Company agrees, and plans to support customers with such fleets. Witness Harris also recommends that the Fleet Electrification Advisory Service provide customers with information about the benefits and challenges of installing a second meter to serve charging infrastructure and fueling costs on their current rate, on the company's EV-TOU rate (whole-premise or separately metered), or on other applicable rates. The Company agrees with these recommendations and plans to include them in the proposed service. Witness Harris recommends modifying the Company's target of providing Fleet Electrification Advisory Service to two non-profit entities serving EJ Areas on an annual

\footnotetext{
\({ }^{34}\) Exhibit SO-1-R (DLC-CAUSE-PA-I-5).
}
basis to instead committing to serve at least 10 fleets that service EJ communities through the program from 2022-2024. The Company partially agrees with Ms. Harris's recommendation and will target sites located in EJ Areas for at least \(35 \%\) of program participants annually.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes, it does.

\title{
BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

Docket No. R-2021-3024750

\author{
Duquesne Light Company
}

Statement No. 9-R

\section*{DIRECT TESTIMONY OF \\ JENNIFER NEISWONGER}

Subjects: Customer Service Performance and Enhancement, Customer Education for Residential Subscription Rate Pilot

Dated: July 26, 2021

\section*{I. INTRODUCTION \& BACKGROUND}
Q. Please state your name, title, and business address.
A. My name is Jennifer Neiswonger. I am the Director of Customer Experience for Duquesne Light Company ("Duquesne Light" or the "Company"). My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh, PA 15219.
Q. Have you pre viously submitted testimony in this proceeding on behalf of Duquesne Light?
A. Yes. On April 16, 2021, I submitted direct testimony ("Duquesne Light Statement No. 9") regarding: (a) the Company's customer service performance and enhancement, and (b) customer education for Residential Subscription Rate Pilot.
Q. What is the purpose of your rebuttal testimony?
A. The purpose of my rebuttal testimony is to respond to certain aspects of the direct testimony provided telephonically during the public input hearing for this matter and also to address the issues raised in the written direct testimony of the parties in this proceeding. Specifically, I will respond to the testimony provided by: (1) Duquesne Light customer Jeaneen Zappa at the public input hearing that took place on Tuesday, June 22, 2021, (2) the direct testimony submitted on behalf of the Office of Consumer Advocate ("OCA") and authored by Roger D. Colton (labeled "OCA Statement No. 4"), (3) the direct testimony submitted on behalf of OCA and authored by Ron Nelson (labeled "OCA Statement No. 6"), and (4) the direct testimony submitted on behalf of the Pennsylvania

Public Utility Commission's ("PUC or the "Commission") Bureau of Investigation and Enforcement ("I\&E") and authored by Ethan H. Cline (labeled "I\&E Statement No. 5").

\section*{Q. How is your rebuttal testimony organized?}
A. Section II responds to concerns related to customer education for the Residential Subscription Rate Pilot, which is more fully described in Ms. Margot Everett's direct testimony ("Duquesne Light Statement No. 17") and Ms. Everett's rebuttal testimony ("Duquesne Light Statement No. 17-R"). I will note that that my rebuttal addresses only the customer education piece of the Residential Subscription Rate Pilot and the \(\operatorname{cost}(\mathrm{s})\) associated therewith. Other Duquesne Light witnesses, including Ms. Everett, will respond to all other aspects of the Residential Subscription Rate Pilot in their corresponding rebuttal testimonies, as necessary and appropriate. Section III of my testimony responds to Mr. Colton's characterizations of the Company's customer satisfaction performance as indicated in the report published by the Pennsylvania Public Utility Commission's ("PUC" or the "Commission") Bureau of Consumer Services related to Universal Service Programs and Collections Performance (referred to in Mr. Colton's testimony and my rebuttal testimony as the "BCS Report"), and the Consumer Activities Report \& Evaluation (referred to in Mr. Colton's testimony and my rebuttal testimony as the "UCARE Report").

\section*{Q. Are you sponsoring any exhibits with your rebuttal testimony?}
A. Yes, I am sponsoring Exhibit JAN-1-R and Exhibit JAN-2-R, and will refer to Exhibit JAN-4, which was attached to my direct testimony and includes the itemized marketing
and education costs associated with the Company's proposed Residential Subscription Rate Pilot Program.

\section*{II. CUSTOMER EDUCATION FOR THE RESIDENTIAL SUBSCRIPTION RA TE PILOT PROPOSED BY DUQUESNE LIGHT COMPANY}
Q. Has the Company performed research related to how customers would react to the Residential Subscription Rate Pilot?
A. Yes. The Company recently received results of a study performed by a Duquesne Light consultant to ascertain customers' potential interest in the Residential Subscription Rate Pilot and gather customer feedback.
Q. What were the results of the study?
A. Broadly, the study revealed that one-third of respondents surveyed are likely to consider enrolling and reacted in favor of paying a predictable, fixed amount for their monthly electric distribution charges. Full survey results are provided in the Company's supplemented response to OCA-I-14(a), and enclosed with my testimony as Exhibit JAN-1-R.
Q. Are you familiar with the concerns raised by Ms. Jeaneen Zappa related to the Residential Subscription Rate Pilot?
A. Yes. At the public input hearing for this proceeding, which commenced at 1 PM on June 22, 2021, Ms. Zappa expressed concerns about the Residential Subscription Rate Pilot, suggesting that customers have not had an appropriate amount of education on how demand pricing works.

\section*{Q. Please respond to Ms. Zappa's concerns.}
A. Ms. Zappa expressed concern regarding customer understanding of the residential subscription pilot. As with any new customer program, the Company anticipated this concern and has several mitigating plans in place to overcome potential barriers. In the research results included in the enclosed as Exhibit JAN-1-R, one-third of DLC respondents found the program appealing and are likely to consider enrolling. They most like the idea of paying a fixed monthly charge to help with budgeting monthly expenses.

Based on this research, the Company agrees with Ms. Zappa that there is some need for customer education and further clarification of the program prior to the start of the pilot. In addition, the Company agrees that customers will need additional assistance in understanding the demand portion of their bill. The Company already includes some educational content related to demand for its business customers on its website \({ }^{1}\) and plans to make similar information available for residential customers interested in the pilot, along with creating an educational video to explain the details of the pilot as highlighted in the budget in Exhibit JAN-4. Furthermore, as I indicated in my direct testimony (DLC St. 9, p. 11, lines 10-12), "the Company will implement usage alerts via email, SMS and

\footnotetext{
\({ }^{1} \mathrm{https}: / / \mathrm{www} . d u q u e s n e l i g h t . c o m / a c c o u n t-b i l l i n g / u n d e r s t a n d i n g-y o u r-b i l l / b u s i n e s s-b i l l / d e m a n d-e n e r g y-u s a g e ~\)
} outbound voice to notify customers when they are approaching or exceeding their subscription level Exhibit JAN-4, the Company plans to provide usage alerts." Ms. Everett's direct and rebuttal testimony include the customer protections that Duquesne Light plans on implementing in connection with the Residential Subscription Rate Pilot.
Q. In light of the foregoing, as well as Mr. Nels on's and Mr. Cline's opinions regarding customer comprehension below, do you propose any changes to the Residential Subscription Rate Pilot?
A. Yes. The Company proposes to delay implementation of the pilot to June 1, 2022. This delay will allow for further refinement of customer education and outreach based on the initial findings in Exhibit JAN-1-R along with additional follow-up research, if needed. This delay would still provide enough time for the Company to conclude the pilot and analyze its results prior to its next anticipated base rates case.
Q. Do you agree with Mr. Nelson's and Mr. Cline's opinions that customers will be unable to understand the Residential Subscription Rate Pilot (OCA St. 6, p. 38; I\&E St. 5, p. 20)?
A. No.
Q. Why do you disagree with Mr. NeIson's and Mr. Cline's opinions that customers will be unable to understand the Residential Subscription Rate Pilot?
A. As stated above in response to Ms. Zappa's concerns, I do agree that education is needed, but given it's an optional pilot, customers that have interest in the residential subscription rate pilot will be provided informational materials to help them fully understand the program details before signing up. The Company will support that with the education and outreach outlined in my direct testimony and Exhibit JAN-4 and as stated above in response to Ms. Zappa's concerns. One of those items in Exhibit JAN-4 is an enrollment video and targeted email which the Company recently used to introduce its new bill redesign. The use of these channels allows for more explanation to help customers understand the difference between usage and demand.

I disagree with Mr. Nelson's assertion on page 38 of OCA Statement No. 6 that "the rate is incredibly hard for customers to understand, especially because the Company is not providing any enabling technology." The Company does provide enabling technology. For example, the Company already makes hourly kWh usage data available to the customer on its website via an interactive graph and can be downloaded in CSV or XML format for determining demand. See Exhibit JAN-2-R. And as noted in Exhibit JAN4, the Company plans to offer usage alerts to customers via email, text and voice to serve as notification if they are approaching or exceeding their subscription level.
Q. Please respond to Mr. Nelson's assertion that the \(\$ 67,000\) cost estimate for the Residential Subscription Rate Program is unclear.
A. Exhibit JAN-4, which was attached to my direct testimony, provides an itemization of the \(\$ 67,000\) estimate for the Residential Subscription Rate Pilot. A narrative response regarding items that are included in the estimate is available in my direct testimony on page

11 of Duquesne Statement No. 9. By way of further explanation, the \(\$ 67,000\) is expected to be incurred over the course of three years, and it includes creating customer education and outreach materials, and incremental costs to evaluate the program. As stated in my direct testimony, only costs that are incremental to normal levels of staffing and operations are included in this estimate.

In response to Mr. Nelson's request on OCA Statement No. 6, pages 39-40, for an evaluation and assessment plan for the pilot, the Company does not have one at this time, but in consideration of Mr. Nelson's comments, we will use the period of the implementation delay to develop this plan.

\section*{III. DUQUESNE LIGHT COMPANY'S CUSTOMER EXPERIENCE} PERFORMANCE AND ENHANCEMENT MEASURES
Q. Please respond to Mr. Colton's conclusion that Duquesne Light's customer experience presentation is "incomplete."(OCA St. 5, p. 107, lines 12-14.)
A. In the Customer Service Report mentioned in Mr. Colton's testimony (e.g., at page 103 line 20), the survey company defines the statistical significance associated with their sampling:

Each year, the survey firm completes approximately 700 surveys for each EDC or NGDC. With a sample of this size, there is a 95 percent probability that the results have a statistical precision of plus or minus five percentage points of what the results would be if all customers who had contacted their EDC or NGDC had been surveyed, meeting the PUC requirements.

This is important to note because the satisfaction results across all PA EDCs are extremely close, and often times within that margin of error (+/- 5\%). In addition, while
benchmarking is very important, I believe it is equally, if not more, important to be showing continuous improvement against yourself. In looking at the 2018 and 2019 results of the Customer Service Report, and only looking at the top box score as Mr. Colton did (I.e., "very satisfied", "very knowledgeable", "very courteous"), the Company has shown improvement for nearly all questions.
- Satisfaction with ease of reaching the company increased from 61\% in 2018 to 65\% in 2019; the top score in 2019 was \(70 \%\) meaning DLC was within the margin of error of the top performer;
- Satisfaction with the representative's handling of the contact increased from 77\% in 2018 to \(78 \%\) in 2019; the top score in 2019 was \(80 \%\) and within the margin of error of the top performer;
- Satisfaction with the representative's courtesy increased from \(83 \%\) in 2018 to \(84 \%\) in 2019; the top score in 2019 was \(87 \%\) and within the margin of error of the top performer;
- Satisfaction with the representative's knowledge was \(77 \%\) in 2018 and \(79 \%\) in 2019; DLC and 3 other EDCs had the same top score with only a \(2 \%\) point difference between the best performing EDCs (79\%) and the worst performing EDCs (77\%); and
- Overall satisfaction increased from \(67 \%\) in 2018 to \(72 \%\) in 2019. The top score in 2019 was \(77 \%\). The Company realizes how important the customer experience is and is focused on continuous improvement in this area. A few of these initiatives were outlined on pages 89 in my direct testimony, but in addition to and specific to these customer satisfaction
results, the Company redesigned the menu options on its automated phone system in Q4 2017 to make the options more intuitive, we implemented a customer insight community in 2018 and continue to survey this community several times per month to keep a pulse on customer feedback, and lastly, we regularly conduct customer service / empathy training with our customer service representatives to ensure we are providing excellent service.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 10-R

Rebuttal Testimony of Robert L. O'Brien

Dated: July 26, 2021

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\section*{I. INTRODUCTION}

\section*{Q. Please state your name.}
A. My name is Robert O'Brien.

\section*{Q. Have you pre viously testified in this proceeding?}
A. Yes, I submitted Direct Testimony on behalf of Duquesne Light Company ("DLC" or "Company") in this proceeding, dated April 16, 2021, before the Pennsylvania Public Utility Commission ("Commission"). My Direct Testimony included support for the overall revenue requirement, pro forma adjustments for the fully projected future test year ended December 31, 2022 ("FPFTY"), the future test year ended December 31, 2021 ("FTY") and the historic year ended December 31, 2020 ("HTY"), portions of the measures of value (also referred to as rate base) and the cash working capital ("CWC") calculation.

\section*{Q. What is the purpose of your Rebuttal Testimony?}
A. My Rebuttal Testimony will present updates in the Company's total utility cost of service and will respond to the Direct Testimony of the following witnesses in the following areas:
- Office of Consumer Advocate ("OCA") witness Lafayette K. Morgan, Jr. regarding certain of the proposed pro forma adjustments to rate base, operating revenues and expenses;
- Bureau of Investigation and Enforcement ("I\&E") witnesses Christopher Keller, Christine Wilson, Esyan Sakaya and Joseph Kubas regarding certain proposed pro forma adjustments to rate base, operating revenues and expenses.
- National Resource Defense Council ("NRDC") witness Amanda Levin regarding the amortization period for COVID-19 Expense recovery.

\section*{Q. Are you sponsoring any Exhibits along with your Rebuttal Testimony?}
A. Yes. I am sponsoring Exhibits RLO-1-R through RLO-8-R.

\section*{Q. How is your Rebuttal Testimony organized?}
A. First, I will provide testimony regarding the changes the Company is proposing to its initial filing that have been included in responses to data requests and describe each adjustment. Next, I will present changes to the Company's positions resulting from reviewing the presentations of the other parties to this proceeding. The changes in each of those categories are shown on DLC Exhibit RLO-1-R, are described on DLC Exhibit RLO-2-R and will be identified and explained in connection with those exhibits. Finally, I will present rebuttal testimony to certain adjustments and positions of the OCA, I\&E and NRDC witnesses organized by topic and by witness within each topic. The first part of my rebuttal will be corrections to the OCA and I\&E adjustments, mostly to correct adjustments that use total Company amounts for their adjustments but then apply the adjustments to the lower claimed distribution amounts that resulted from the Company's Jurisdictional Separation Study ("JSS"). These errors overstate the effect of their adjustments and understate the OCA or I\&E proposed balances.

The second part will be rebuttal to positions taken by OCA, I\&E and NRDC in their pre-filed direct testimony,

\section*{II. UPDATES TO THE COMPANY'S ORIGINAL FILING}

\section*{Q. Please describe DLC Exhibit RLO-1-R.}
A. DLC Exhibit RLO-1-R presents a summary of the Company's adjustments to its filed positions in this case. Column 1 shows the total Company as filed amounts for major elements in rate base (line 1 to line 9), rate of return (lines 10 to 14), net operating income ("NOI") requirement (line 15), results of operation (lines 16 to 37). Column 3 shows the as filed amounts for the Company's PA Jurisdictional operations for the same categories through line 37 . As I will discuss later, it is important to note that both the OCA and I\&E used this PA Jurisdictional data, from line 1 to line 9 and lines 16 through line 37 as the starting point for the OCA and I\&E adjustments as shown on OCA Schedule LKM-1, page 1 of 2 in the first column and on I\&E Statement No. 1, page 4, table 1, the first column. Finally, the NOI increase required and the related PA Jurisdictional revenue increase required is shown on lines 38 and 41 respectively with additional details shown as item "A" on DLC Exhibit RLO-2-R, page 1, lines 1 to 9 .

\section*{Q. Please continue.}
A. Columns 4 and 5 on DLC Exhibit RLO-1-R show the adjustments the Company is proposing that have been described in responses to data requests with the adjusted balances shown in column 6. Finally, adjustments in columns 7 and 8 reflect changes to the Company's filing that result from the Company reviewing updated
information and providing an updated JSS and also an updated DLC Exhibit 2 converting the total Company update adjustments to PA Jurisdictional amounts.

\section*{Q. Please describe the changes the Company is proposing based on its responses to data requests.}
A. First, the Company is increasing the accumulated depreciation on its Cloud investment from \(\$ 7.012\) million to \(\$ 7.705\) million for an increase of \(\$ 693,000\) on a total Company basis of which \(\$ 646,000\) is applicable to the PA Jurisdictional operations. This calculation, which is a decrease in rate base, is shown on DLC Exhibit RLO-2-R, page 1 of 2 in item " \(B\) ", lines 9 to 13 . Next, the Company is increasing its FPFTY operating expenses in the amount of \(\$ 22,333\) for its proposed Residential Subscription Pilot program that was not included in its original filing. As described by DLC Witness Neiswonger in DLC St. No. 9, the \(\$ 22,333\) is annual expense based on a total cost of \(\$ 67,000\) over three years. The calculation is shown as item "C" on DLC Exhibit RLO-2-R, page 1, lines 14 to 18.
Q. What is adjustment " \(D\) " of \(\$ 113,000\) as shown on DLC Exhibit RLO-1-R, column 5, line 29?
A. As described in response to I\&E-RE-43-D, the \(\$ 113,000\) represents one third of the triennial costs of the Commission required Eligible Customer Listing Solicitations ("ECLS") for the 2018 and 2021 ECLS costs incurred by the Company which were not included in the Company's initial filing and therefore
not in the requested revenue requirement increase. As such, the Company is increasing its FPFTY expense by the normalization of this \(\$ 339,000\) over the three-year period rates from this case are expected to be in effect. The calculation is shown as item " \(D\) " on DLC Exhibit RLO-2-R, page 1, lines 19 to 23,

\section*{Q. What is adjustment "E" of \((\$ 167,000)\) as shown on DLC Exhibit RLO-1-R, column 4, line 24?}
A. This adjustment reduces the \(\$ 1.415\) million expense included on DLC Exhibit 2, Schedule 12, column 3, line 8 for outside services by \(\$ 500,000\) for a charge that did not relate to COVID operational functions. Since these costs are amortized over a three-year period, the reduction to the COVID cost recovery is reduced by one-third or \(\$ 167,000\). This was explained in response to OCA-X-4. The calculation is shown on DLC Exhibit RLO-2-R, page 1 on lines 24 to 30 .

\section*{Q. Are you proposing any adjustments that were not included in responses to data requests?}
A. Yes. Adjustment " \(F\) " on DLC Exhibit RLO-2-R, page 2 shows an adjustment in mailing costs resulting from an increase in postage costs of \(\$ 0.04\) per mailing. As shown in column 7 on lines 31 to 35 the Company projects annual mailings of 5,928,000 in the FPFTY, which results in an increase in postage costs of \(\$ 237,000\). The \(\$ 237,000\) is shown as item " \(F\) " on DLC Exhibit RLO-1-R, column 7 , line 29.

\section*{Q. What is the \(\mathbf{\$ 0 . 0 4}\) per mailing unit based upon?}
A. The United States Postal Service ("USPS"), on May 28, 2021 filed a request for rate increases with the Postal Rate Commission to be effective on August 29, 2021. Part of the requested increase was an increase in the Commercial category which includes mail classified as 5-digit, automated area distribution center ("AADC") and mixed automated area distribution center ("MAADC"). The Company's mailings are mostly in the 5-digit category, but also in the AADC and MAADC classifications.
Q. What are the postage rate increases that impact the Company?
A. As shown on the USPS May 28, 2021 request, there are three rate classes where the price increases will impact the Company:

Mail Sort Current Rate Proposed Rate Increase

5-digit
\(\$ 0.389\)
\$0.426
\$0.037

AADC
\(\$ 0.419\)
\$0.461
\(\$ 0.042\)

MAADC
\(\$ 0.439\)
\$0.485
\$0.046

Based on these rate increases and an estimate of the number of mailings in each rate category, the Company estimates that the average postal rate increase will be \(\$ 0.040\) per mail item.

\section*{Q. What is containe din adjustment " \(G\) "?}
A. Adjustment "G" reflects a reduction in the annual expense for the Net COVID-19 Expenses of \(\$ 270,000\) as the result of additional updates in the Company's amounts for savings and for the net costs through June 2021 to date. The detail for this calculation is shown on DLC Exhibit RLO-2-R, page 2, lines 36 to 49.

\section*{Q. Please describe adjustment " \(G\) ".}
A. Lines 36 to 38 show the adjustment made by DLC based on its response to a data request as described in connection with adjustment " \(E\) " and is included here for informational purposes to have the total change in the Net COVID-19 Expenses in one place. Lines 39 through 41 show an update in the savings from the \(\$ 750,000\) as filed on DLC Exhibit 2, Schedule D-12, line 15 to the updated amount of \(\$ 1,755,000\) for an increase of \(\$ 1,005,000\). This update is described by DLC Witness Bachota. DLC St. No. 2-R. pp. 19-20. Finally, lines 42 to 44 show the Company's as filed estimate for net expenses of \(\$ 600,000\) for the first 6 months of 2021 is increased to \(\$ 794,000\) for an increase of \(\$ 194,000\) based on updated information which will be provided by Witness Bachota. Finally, as shown on lines 47 to 49, the total COVID-19 Net Expenses have decreased by \(\$ 811,000\), which is \(\$ 270,000\) per year amortized over three years.

\section*{Q. What is the revised total FPFTY annual amount for the recovery of COVID19 Net Expenses.}
A. As shown on DLC Exhibit RLO-1-R, column 9, line 24, the total FPFTY amount is \(\$ 3.588\) million, which is comprised of \(\$ 2.094\) million for uncollectible expense and \(\$ 1.494\) million for other Net Expenses.
Q. Please describe adjustment " \(\mathbf{H}\) ".
A. This adjustment, as shown on DLC Exhibit RLO-2-R, page 2, lines 50 to 54, presents an update of the OPEB credit used in establishing the FPFTY expense from \(\$ 299,000\) to \(\$ 367,000\) which is described by Witness Bachota. The difference, as decrease in expense is shown on DLC Exhibit RLO-1-R, column 7, line 20.

\section*{Q. What is contained in adjustment "I"?}
A. Adjustment "I" as shown on lines 55 to 57 of DLC Exhibit RLO-2-R reflects the removal of \(\$ 158,000\) in advertising expense related to the Home and Garden activity as described by Ms. Bachota, on DLC St. No. 2-R, p. 16.

\section*{Q. Please describe adjustment " \(J\) ".}

A, Adjustment "J" reflects the change in the Cash Working Capital that results from the changes in expenses presented in this rebuttal document.
Q. What is your final rebuttal adjustment of \(\$ 75,000\) shown as item " \(K\) " on DLC Exhibit RLO-1-R, column 8, line 32?
> A. This adjustment is to correct my estimates of the distribution impact of the changes made to conform with Mr. Gorman's JSS and the resulting revenue requirement for the PA Jurisdictional operations.
> Q. What is the result of these adjustments to the Company's original filing which requested an increase in PA Jurisdictional re venues of \(\$ 85.760\) million?
A. As shown on DLC Exhibit RLO-1-R, column 9, line 41, these adjustments result in a decrease in the PA Jurisdictional revenue increase of \$232,000 (\$85.760 million - \(\$ 85.528\) million \(=\$ 232,000\) ).

\section*{Q. Has the Company prepared a revised DLC Exhibit 2 for the FPFTY?}
A. Yes. DLC Exhibit RLO-5-R is an updated DLC Exhibit 2, reflecting all of the adjustments shown on DLC Exhibit RLO-1-R and also the results of the JSS prepared by Witness Gorman and included with his rebuttal presentation. The PA Jurisdictional increase of \(\$ 85.528\) million is shown on DLC Exhibit RLO-5-R, Schedule D-1, column 2, line 2.

\section*{Q. Please describe DLC Exhibit RLO-5-R.}
A. DLC Exhibit RLO-5-R is an update to the original FPFTY DLC Exhibit 2 showing the changes to rate base and expenses detailed on DLC Exhibit RLO-1-R and DLC Exhibit RLO-2-R.

\section*{III. CORRECTIONS TO OTHER PARTIES’ ADJUSTMENTS}
Q. Please describe why you be lieve there are necessary corrections to the adjustments proposed by some of the other parties to this proceeding.
A. Most of the corrections are the result of the parties, mainly the OCA through the testimony of Witness Morgan, making adjustments using total Company amounts instead of using the PA Jurisdictional amounts. There are a couple of corrections related to other actions which I will describe.
Q. Have you prepared an exhibit which shows these corrections?
A. Yes, I have. DLC Exhibit RLO-3-R contains the corrections for the OCA adjustments and DLC Exhibit RLO-4-R contains the corrections for the I\&E adjustments.
Q. Please describe DLC Exhibit RLO-3-R.
A. Page 1 of this exhibit and has seven columns. Column 1 shows DLC's PA Jurisdictional amounts which are summarized on DLC Exhibit 2, Schedule D-1 showing an increase in Jurisdictional revenue of \(\$ 87.759\) million. These same data shown on DLC Exhibit RLO-1-R in column 3 are also shown on OCA Statement No. 1, Schedule LKM-1, page 1 of 2, in the first column headed Company Amounts at Present Rates. Each of these three sources show the same PA Jurisdictional NOI of \(\$ 121.925\) million allowing for a \(\$ 1,000\) rounding
difference. This is clearly the starting point for the OCA and the I\&E adjustments is the Company's data at PA Jurisdictional operational levels.

Columns 2 and 3 show OCA adjustments that are summarized on Statement No. 1, Schedule LKM-1, page 1 of 2 in column headed OCA Adjustments and reflected in the column headed Amounts After OCA Adjustments. Column 4 shows the OCA as-filed positions which result in a NOI of \(\$ 142.195\) million and a rate base of \(\$ 2.193\) billion as shown on lines 18 and 20 respectively. Those are the same amounts shown on DLC Exhibit RLO-3-R, column 4 line 37 for the NOI of \(\$ 142.195\) million and on line 10 for the \(\$ 2.193\) billion for the rate base. This shows that DLC Exhibit accurately presents the OCA starting point and the related adjustments that result in the OCA "Amounts After OCA Adjustments".

Finally, columns 5 and 6 present my corrections to certain adjustments which are described on DLC Exhibit RLO-3-R, pages 3 to 5. Page 2 of DLC Exhibit RLO-R-3 provides a brief description of each of the OCA proposed adjustments.

\section*{Q. Please provide an example of the mismatch you describe where the OCA has} reduced a PA Jurisdictional amount by a total Company amount.
A. I think the most obvious one is the OCA adjustment to Payroll. Among other adjustments, witness Morgan proposes to remove all annualization adjustments proposed by the Company, which is the \(\$ 2.189\) million shown on DLC Exhibit

RLO-3-R, page 1, column 2, line 19 and also shown on OCA Schedule LKM-9, lines 1 to 4. Referring to DLC Exhibit 2, Schedule D-7, column 5, line 16 the \(\$ 2.189\) million is the total Company amount for payroll annualization, which results in a total Company FPFTY payroll expense of \(\$ 93.662\) million. This total Company amount therefore includes PA Jurisdictional amounts as well as nonjurisdictional amounts.

Referring now to DLC Exhibit RLO-1-R, column 1, line 19 shows the same \(\$ 93.662\) million for total Company payroll while column 3 shows the PA Jurisdictional amount of \(\$ 77.397\) million using Mr. Gorman's salary and wage allocation factor of 0.82635 . Finally, referring to DLC Exhibit RLO-3-R, page 1, line 19 shows the PA Jurisdictional payroll amount of \(\$ 77.397\) million while column 3 shows the OCA reduction using the total Company amount of \(\$ 2.189\) million. Witness Morgan has clearly used the total Company amount for the payroll annualization of \(\$ 2.189\) million as a reduction to the PA Jurisdictional amount of \(\$ 77.397\) million. Mr. Morgan is, therefore, removing annualization amounts that include expenses related to the FERC jurisdictional activities that are not in the PA Jurisdictional claim.

\section*{Q. Does your proposed adjustment correct for this mismatch between the OCA} reducing PA Jurisdictional amounts by adjustments using total Company amounts that have not been separated by jurisdiction?
A. Yes, it does. With respect to the OCA removal of the Company's payroll annualization adjustment, my adjustment "J-1" in DLC Exhibit RLO-3-R, page 1,
column 5 on line 19 corrects for that mismatch. The actual calculation of the accurate adjustment amount is shown on DLC Exhibit RLO-3-page 3, lines 13 to 17, which results in a correction to the OCA adjustment of \(\$ 380,000\) as shown on line 17. In other words, the OCA proposed adjustment should be \(\$ 1.809\) million ( \(\$ 2.189\) million \(-\$ 380,000=\$ 1.809\) million.
Q. Did the I\&E make an adjustment to the Company's proposed annualization?
A. Yes. I\&E witness Keller on page 11 of I\&E Exhibit No. 2, lines 15 to 19 made an adjustment to remove part of the Company's proposed payroll annualization.
Q. Did Witness Keller make the same mistake that OCA witness Morgan made in using total Company amounts to reduce PA Jurisdictional balances?
A. No, he did not. Witness Keller, as shown on lines 15 to 19 , calculated the total Company amount of \(\$ 1.211\) million and reduced it by the S\&W PA Jurisdictional factor of 0.8263 and recommended an adjustment of \(\$ 1.001\) million.
Q. Do you agree with the process used by Witness Keller to remove a portion of the payroll annualization proposed by the Company?
A. Though I disagree that any portion of the payroll annualization should be removed, I agree with the process used by Witness Keller. I will, later in my rebuttal, rebut the removal of any portion of the Company's proposed payroll annualizations.

\title{
Q. Please describe the corrections to the OCA adjustments you present on DLC Exhibit RLO-3-R page 1.
}
A. Referring to adjustment A on page 1 in column 2 and also the \(\mathrm{A}-1\) calculation on page 3, lines 1 to 5 , the OCA adjustment reducing plant for DLC's Cloud adjustment by the amount of \(\$ 12.553\) million, which is the total Company amount for the adjustment. Again, OCA used the total Company amount to reduce the lower PA Jurisdictional balance and, by applying the total Company Cloud adjustment to reduce the PA Jurisdictional plant balance, the OCA is overstating the amount claimed by the Company and its adjustment to the claimed rate base. As shown by the calculation on page 3, the OCA adjustment, if accepted, would need to be reduced by \(\$ 2.913\) million to an adjustment of \(\$ 9.640\) million ( \(\$ 12.553\) million - \(\$ 2.913\) million \(=\$ 9.640\) million \()\).
Q. Are you agreeing that the corrected amount should be removed from rate base?
A. No, I am not. Witness Bachota, in her rebuttal testimony at DLC St. No. 2-R, pp. 13-14 shows that the proposed removal of the Cloud adjustment must be rejected.
Q. Please describe your correction shown as adjustment B-1.
A. This is to correct the OCA adjustment for the accumulated depreciation on the Cloud plant adjustment. In addition to correcting the overstatement of this OCA adjustment, it is necessary to include the correction made by DLC to the as-filed
accumulated depreciation amount as shown on DLC Exhibit RLO-2-R, page 1, lines 9 to 15. The calculation of this correction is shown on DLC Exhibit RLO-3R, page 3 lines 6 to 12 with the correction of \(\$ 1.627\) million shown on page 1 , column 5, line 2. This reduces the OCA adjustment from \(\$ 7.012\) million to \(\$ 5.385\) million.

\section*{Q. What is containe d in your correction to payroll shown as \(\mathrm{J}-1\) ?}
A. Adjustment \(\mathrm{J}-1\) is for the correction of OCA's adjustment to remove the Company's payroll annualization for the FPFTY. The adjustment corrects for Witness Morgan's use of the total Company annualization amount of \(\$ 2.189\) million to adjust the PA Jurisdictional payroll expense. The detail for this correction is shown on DLC Exhibit RLO-3-R, page 3, lines 13 to 17.
Q. Please describe your correction to payroll shown as \(K-1\) in the amount of \$467,000.
A. This correction is to reduce the OCA adjustment for additional vacancy positions as shown by Witness Morgan on Schedule LKM 9, lines 6 to 15 . Witness Morgan again uses the total Company base payroll of \(\$ 91.473\) million (DLC Exhibit 2, Schedule D-7, column 4, line 16) as the starting point for his adjustment and then reduces the PA Jurisdictional payroll by the total Company amount. As shown on DLC Exhibit RLO-3-R, page 3, lines 18 to 24, the correction in the OCA adjustment for vacant positions is to reduce the OCA adjustment of \(\$ 2.689\) million by the \(\$ 467,000\) shown on line 24 to a corrected amount of \$2.222 million.
Q. What is contained in your correction \(L-1\) in the amount of \(\$ 1.163\) million?
A. This adjustment has two components. First, as shown on lines 25 to 29 of DLC Exhibit RLO-3-R, page 3, the OCA adjustment, which is based on total expenditures, must be reduced by the amount of the incentive compensation that is capitalized. The second part of this adjustment is the correction to reduce the OCA removal of the Company's incentive compensation FPFTY expense using calculations based on total Company amounts when the OCA adjustment should have been based on the PA Jurisdictional expense.

\section*{Q. Please describe the correction to remove the capitalized portion of the incentive compensation expenditure from Witness Morgan's adjustment for incentive compensation expense.}
A. Since the source of Witness Morgan's adjustment to reduce DLC's incentive compensation expense is the Company's response to I\&E RE-8-D, part E (See DLC Exhibit RLO-6-R (I\&E-RE-8-D)), which shows total incentive compensation, the adjustment must first be reduced by the amount projected to be capitalized and not included in expense. This can be seen by referring to the same response, I\&E RE-8-D, part E. The two amounts on Witness Morgan’s Schedule LKM - 10, the \(\$ 2.505\) million shown on line 1 is the amount on the first line of
the chart in part E of the I\&E response and the \(\$ 4.190\) million shown on line 3 of Schedule LKM-10, is on the next to last line of the chart in part E of the I\&E response. These two amounts are included in the total incentive compensation for 2022 of \(\$ 13.677\) million shown on the last line of the chart in part E of the response to I\&ERE-8-D.

When you look at the response to part D of that same response, the chart shows that the total Company incentive compensation for 2022 is \(\$ 13,677\) as shown on the last line. That total has three components, STIP Expense of \(\$ 6.462\) million; STIP Capital of \(\$ 3.025\) million for a total STIP cost of \(\$ 9.487\) million ( \(\$ 6.462\) million \(+\$ 3.025\) million \(=\$ 9.487\) million \() ;\) and LTIP Expense of \(\$ 4.190\) million. Witness Morgan's use of the \(\$ 2.505\) million (which is part of the STIP total of \(\$ 9.487\) million) without an adjustment for the capitalized portion overstates that amount of his proposed adjustment.

\section*{Q. Have you made a calculation to correct for this OCA oversight?}

A, Yes, I have. DLC Exhibit RLO-3-R, page 4, lines 25 to 29 show that only \(\$ 1.706\) million of the \(\$ 2.505\) million STIP portion of the total Company incentive compensation should be included as an expense in Witness Morgan's proposed adjustment.

\section*{Q. What is the second correction that is needed to show Witness Morgan's incentive compensation on a PA Juris dictional basis as opposed to the total Company basis?}
A. The calculation of the correction is shown on DLC Exhibit RLO-3-R, page 4, lines 29 to 35. The corrected portion of the STIP incentive compensation charged to expense of \(\$ 1.706\) million (line 29) is added to the \(\$ 4.190\) million (line 30 ) equals the total Company expense of \(\$ 5.890\) million to be reduced by the salaries \& wages PA Jurisdictional factor of 0.8263 for a corrected OCA adjustment amount of \(\$ 4.872\) million as shown on line 33 . The difference between the original OCA adjustment of \(\$ 6.695\) million (line 34) and the corrected PA Jurisdictional amount of \(\$ 4.872\) million (Line 33) is \(\$ 1.823\) million as shown on line 35 and also on line 20 of column 5 of DLC Exhibit RLO-R-3, page 1.
Q. Please describe the correction for \(\$ 55,000\) shown as \(\mathbf{M}-1\) on column 6, line 20 of DLC Exhibit RLO-3-R, page 1.
A. As shown DLC Exhibit RLO-R-3, page 4, lines 36 to 40, this correction of \(\$ 55,000\) reduces the OCA adjustment to Post-Retirement adjustment to remove the mismatch between using total Company amounts for the OCA adjustment and applying that total Company amount to the PA Jurisdictional expense level claimed by the Company.
Q. What is containe in correction \(\mathrm{Q}-1\) (regarding 401k expense) in the amount of \$132,000 on DLC Exhibit RLO-3-R, page 1, column 6, line 29?
A. As shown on DLC Exhibit RLO-3-R, page 4, lines 41 to 50 , this correction has two components. First, as shown on lines 41 to 45 , the adjustment of \(\$ 244,000\) (line 41 ) needs to be reduced by \(\$ 109,000\) to reflect the fact that Witness Morgan's ratio calculation cited on OCA Statement No. 1, page 21 lines 20 to 23 is incorrect in that it assumes that the payroll annualization adjustment proposed by DLC had an impact on the amount of 401k expense. The fact is that the Company's proposed FPFTY 401k expense was determined based on base payroll and was not adjusted for the Company's proposed annualization adjustment. Second, once the above correction is made, the remaining adjustment still needs to be corrected for the mismatch of total Company and PA Jurisdictional amounts.
Q. How did Witness Morgan calculate his proposed adjustment for 401 k expense?
A. As stated on OCA Statement No. 1, page 21, lines 20 to 23 , the \(\$ 244,000\) is a percent of the OCA proposed adjustment to payroll of \(\$ 4.878\) million which calculates to approximately \(5.0 \%(\$ 244,000 / \$ 4,878,000=5.002 \%)\).
Q. Did you use the \(5.0 \%\) to correct for the inclusion of the payroll annualization in the OCA adjustment?
A. Yes, I did. As shown on DLC Exhibit RLO-3-R, page 4, lines 41 to 46, I reduced the OCA adjustment or \(\$ 244,000\) by \(\$ 109,000\) leaving a balance of \(\$ 135,000\) as shown on line 46 . Following that correction, as shown on lines 46 to 49 , I reduced the \(\$ 135,000\) by an additional \(\$ 23,000\) to remove the mismatch between total Company amounts used in the OCA adjustment and the PA Jurisdictional amount. The total correction, shown on line 50 of \(\$ 132,000\), is reflected in DLC Exhibit RLO-3-R, page 1 in column 5, line 46 as correction Q-1.
Q. How was your correction of \(\$ 65,000\) shown as \(S\)-1 (related to Taxes Other Than Income) calculated?
A. As shown on DLC Exhibit RLO-3-R, Page 5, the OCA adjustment which was based on total Company payroll of \(\$ 373,000\) was reduced by the PA Jurisdictional factor of 0.8263 and the result of \(\$ 308,000\) was subtracted to produce the correction of \(\$ 65,000\) as shown on lines 51 to 55.
Q. Please describe your correction for an additional expense of \(\mathbf{\$ 4 9 9 , 0 0 0}\) shown on DLC Exhibit RLO-3-R, page 1, column 6, line 47.
A. This reflects an increase in the gross receipts tax ("GRT") related to the revenue adjustment for the lost revenue that was made by the Company in its filing and is being removed by the OCA in their presentation. Removing the lost revenue adjustment made by DLC for \(\$ 8.451\) million has an impact on the GRT which
was not included in the OCA's adjustments. The calculation of the \(\$ 499,000\) GRT increase is shown on DLC Exhibit RLO-3-R, page 5, lines 56 to 58.
Q. What is the final correction you are proposing to the OCA presentation?
A. As shown on DLC Exhibit RLO-3-R, page 1, column 5, line 31, I am increasing depreciation expense by \(\$ 583,000\). This is to remove the mismatch between Witness Morgan's use of the total Company Cloud depreciation expense for the FPFTY of \(\$ 2.511\) million as shown on DLC Exhibit 2, Schedule D-11, line 12 as noted on OCA Schedule LKM - 4 and the PA Jurisdictional depreciation expense.
Q. What is the result of your corrections to the overall OCA presentation?
A. As shown in DLC Exhibit RLO-3-R, page 1, column 7, line 40, I calculate that the correction of these errors takes the OCA original revenue decrease of (\$2.754) million shown in column 4 and on OCA Statement No. 1, Schedule LKM-1, page 1 of 2 to an increase in revenue requirement of \(\$ 1.749\) million.
Q. If all of your proposed corrections are adopted, does that mean that you accept the corrected OCA adjustments?
A. No. It means that the amounts of the OCA adjustments have been corrected and that the Company will address the corrected amounts in its rebuttal to each of the OCA proposed adjustments.

\title{
Q. Do you have any corrections to the I\&E adjustments presented by Witnesses Kubas and Keller?
}
A. Yes, I have a correction to the adjustment presented by Witness Kubas, a correction to one adjustment presented by Witness Keller, and a clarification to another adjustment proposed by Witness Keller.
Q. Please describe your correction to the adjustment presented by Witness
Kubas.
A. On I\&E Exhibit No. 4, page 6, lines 13 to 18 and also on I\&E Exhibit No. 4, Schedule 1, Witness Kubas presents an adjustment to accumulated depreciation for the correction of accumulated depreciation on the Company's adjustment for Cloud expenditures in the amount of \(\$ 693,000\) which is based on the Company's response to OCA-VI-9. As I explained earlier in my rebuttal, I have made an adjustment to reflect the increase in the accumulated depreciation for the Cloud investment from \(\$ 7.012\) million to \(\$ 7.705\) million on a total Company basis. The correction is to apply the PA Jurisdictional factor to that \(\$ 693,000\) adjustment and that reduces the proposed I\&E adjustment.

\section*{Q. Have you pre pared a schedule reflecting this correction and also a calculation to provide the amount of the correction?}
A. Yes, I have. DLC Exhibit RLO-4-R, page 1 contains the corrections and page 3 contains the calculations.
Q. Please describe page 1 of DLC Exhibit RLO-4-R.
A. DLC Exhibit RLO-4-R, page 1 is in basically the same format as DLC Exhibit RLO-3-R, page 1 presented for corrections to the OCA adjustments. Column 1 shows the Company's PA Jurisdictional presentation at present rates. This is also shown on I\&E Statement No. 1, page 4 in the first column of Table 1, which shows the income available ("NOI") at present rates of \(\$ 121.926\) million and the measure of value ("Rate Base") of \(\$ 2.276\) billion, which are the same amounts shown on DLC Exhibit 2, Schedule D-1 column 1, line 15 for NOI of \(\$ 121.926\) million and for rate base of \(\$ 2.276\) billion. These are the same amounts used by OCA. Columns 2 to 4 present the I\&E adjustments that are totaled on I\&E Statement No. 4, Table 1 in the Adjustments column. Next, column 5 shows the I\&E results at present rates which is in the center column of Table 1 and the income available of \(\$ 134.640\) million agrees with the total in column 5 on line 37. Finally, column 6 reflects the two corrections proposed for the I\&E presentation and column 7 shows the results after those corrections are included.

\section*{Q. Please discuss your first correction as shown in column 6 on line 2 in the amount of \$161,000.}

\section*{A. This reflects the reduction of the I\&E adjustment to reflect only the PA Jurisdictional portion of the Cloud accumulated depreciation adjustment proposed by the Company. This is calculated on DLC Exhibit RLO-4-R, page 2, lines 1 to 5. \\ Q. Please describe the correction you have to the adjustment for 401 k expense proposed by Witness Keller.}
A. While the first part of Mr. Keller's calculation shown on I\&E Exhibit No. 2, page 21 , lines 21 and 22 and page 22 , line 1 reflects accurate data, the use of the total proposed adjustment of \(\$ 2.490\) million shown on page 22 line 2 is not correct. The fact is that the Company's payroll annualization adjustment made by that Mr . Keller proposes to reduce has no impact on the 401k expense that is included in the Company's FPFTY expenses. The payroll annualization is a pro forma adjustment and there was no pro forma adjustment made to the 401k expense based on the payroll annualization. The correction of this calculation is shown on DLC Exhibit RLO-4-R, page 2, lines 6 to 12 in adjustment H-1. The corrected amount of 401 k expense related to the vacancy issue is \(\$ 101,000\) as shown on DLC Exhibit RLO-4-R, page 3, line 10. Basically, the correction consists of replacing the I\&E total payroll adjustment on page 22, line 2 of \(\$ 2.490\) million with the I\&E payroll adjustment for the vacancy component shown on page 14, line 19 in the amount of \(\$ 1.489\) million as shown on DLC Exhibit RLO-4-R, page 2 line 9.

\section*{Q. What is your clarification to an adjustment proposed by Witness Keller?}
A. This relates to the adjustment proposed by Witness Keller regarding the Eligible Customer Listing Solicitations ("ECLS") shown pages 23 to 26 of I\&E Exhibit No. 2 and also on page 3 in the table on the line entitled Eligible Customer Solicitation. Basically, Witness Keller accepted the Company's expenditure amounts and recommends that the recovery be classified as a normalization of the expense over a 43 -month period as opposed to the 36 -month amortization period proposed by the Company.

\section*{Q. What is your clarification?}
A. As stated in the Company's response to I\&E RE-43-D part E, "Due to an oversight, the amortization of the expenditures for the ECL was not included in the Company's as filed revenue requirement...". The Company has not included any amount in the as-filed revenue requirement to offset the \(\$ 18,000 \mathrm{I} \& \mathrm{E}\) recommended reduction in the Company's expenses. This I\&E adjustment accepts the Company's rebuttal adjustment adding the \(\$ 113,000\) to its expenses and, in effect, is reducing that rebuttal amount to the \(\$ 95,000\) recommended by Witness Keller. If the Company's post filing addition to expense of \(\$ 113,000\) is not accepted, Witness Keller's adjustment should be removed also because the initial filing contains no amount for this expense.
Q. If your proposed corrections are adopted, does that mean that you accept the corrected I\&E adjustments?
A. No. It means that the amounts of the I\&E adjustments have been corrected and that the Company will address the corrected amounts in its rebuttal to each of the I\&E proposed adjustments.
Q. Please describe how the remainder of your rebuttal testimony will be organized.
A. I will first address the OCA testimony presented by Witness Morgan. This will include several areas where I disagree with the process, positions or adjustment amounts sponsored by the witness on behalf of OCA. I will then address the I\&E testimony presented by Witnesses Keller, Wilson and Kubas. Finally, I will provide rebuttal testimony to NRDC Witness Levin. Where more than one witness addresses the same topic, such as the revenue loss adjustment, I will address all witnesses within that topic area.
IV. RESPONSE TO OTHER PARTIES' ADJUSTMENTS
Q. Please describe the specific elements of the OCA's testimony that your rebuttal testimony will address.
A. I will address Witness Morgan's positions and recommended FPFTY adjustments for:
- Revenue Losses;
- Salary \& Wage Annualization;
- Payroll Taxes;
- 401k Expense;
- COVID - 19 Uncollectible Expense Recovery Period;
- COVID - 19 Net Expense Recovery;
- Gross Receipts Tax on Revenue Loss; and
- Cash Working Capital
Q. Please describe the specific elements of the I\&E testimonies that your rebuttal testimony will address.
A. I will address Witness Keller's positions and proposed FPFTY adjustments for:
- Rate Case Expense Normalization;
- Salary \& Wage Annualization;
- Payroll Taxes Related to the S\&W Annualization;
- 401k Expense Related to the S\&W Annualization; and
- Changes to Cash Working Capital

I will address Witness Sakaya's position and adjustment for:
- Revenue Losses.

Finally, I will address Witness Wilson's positions and adjustments for:
- COVID - 19 Uncollectible Expense Recovery Period; and
- COVID - 19 Net Expense Recovery.
Q. Please describe what portions of NRDC Witness Levin's testimony you will address.
A. I will address the testimony recommending the COVID-19 cost recovery period.

\section*{A. REVENUE LOSS ADJUSTMENTS}
Q. What is your understanding of the OCA's position regarding the Company's proposal to recover lost re venue from the years 2023 to 2025 in this rate case?
A. I understand that the OCA knows that the Company is proposing to recover lost revenues from the years 2023-2025 through rates adopted in this proceeding, which is consistent with the Company's proposal in its last case in Docket No. 2018 R-3000124. I also understand that, in that case, the OCA accepted the Company's proposal to recover the lost revenue for 2020 to 2022 through the rates established in that proceeding, but proposed a change in the calculation of the annual impact. The Company accepted OCA's proposed calculation change in rebuttal in that case and followed the same procedure in this filing.

However, in this case, the OCA has proposed to disallow the entire amount associated with lost revenues in this case based on the years 2023-2025.
Q. Why does Witness Morgan argue that the adjustment for the same issue should not be included in this setting rates in this proceeding?
A. As stated on page 17, lines 14 to 17 of OCA Statement No. 1, "[T]his adjustment is neither reasonable nor appropriate as it will violate the FPFTY concept. As I understand it, the use of a fully projected future test year or rate year is intended to allow rates to be set to reflect the costs and revenues that will be incurred during the first year the rates will be in effect."

\section*{Q. Do you agree with Witness Morgan's belief?}
A. I agree that his understanding is partially correct. A FPFTY will include costs and revenues that will be incurred during the first year the rates will be in effect, and will also include known and measurable changes that will impact on the Company's operations, particularly when those known and measurable changes are result of governmental directives or orders that will impact the utility's costs and expenses.
Q. Are the revenue loss calculations based on complying with governmental orders that require the Company to take actions that result in the loss of revenues in each ye ar beginning in the FPFTY 2022?
A. Yes, they are. As DLC Witness Mobley testified (DLC Statement No. 3), these revenue losses, like those incurred in prior years and expected through 2025, are the result of requirements of Act 129. The revenue lost during the entire period
until the Company files its next base rate case, if not included for recovery as an adjustment in setting rates in this proceeding, will penalize the Company with a known and measurable revenue loss.
Q. Has the Company experienced revenue losses from the requirements of Act 129 over the last thirteen years since Act 129 was enacted?
A. Yes, the Company has experienced declines in customer usage in the past which has resulted in revenue losses that the Company has been given the opportunity to recover in prior rate cases.
Q. Please describe those customer usage declines.
A. As shown on DLC Exhibit RLO-R-8 there have been substantial actual declines in GWH usage for the years from 2012.
Q. Should Witness Morgan's proposal to re move the DLC adjustment that seeks recovery of revenue losses created by Act 129 during the period rates from this proceeding are in effect be accepted?
A. No, the OCA adjustment must be rejected, and the DLC revenue loss adjustment should be included in the revenue requirement in this proceeding.
Q. What is your understanding of the I\&E's position regarding the Company's proposal to recovery of lost re venue in the years 2023 to 2025 in this rate case?
A. I understand that the I\&E, through Witness Sakaya's testimony in I\&E Statement No. 3, page 6, lines 3 and 4 , recommends that the entire amount of the revenue loss adjustment be rejected.
Q. What is the basis for I\&E Witness Sakaya's recommendation to reject the revenue loss adjustment?
A. Witness Sakaya appears to be concerned for a couple of reasons. First, on page 6, lines 7 to 14 there appears to be a concern that if the Company's adjustment is adopted, the overall revenue calculation by customer and usage would not be accurate. Second, Witness Sakaya also presents the thought that, if the Company's adjustment is allowed, the Company will be able to, "...include four years of sales declines in the first month rates become effective and the Company will over-collect revenue until the end of 2025 or for approximately four years." I\&E Statement No. 1, page 6, lines 19 to 22.

\section*{Q. Is it your understanding that DLC Witness Mobley's calculations provided the components of the data that \(I \& E\) Witness Sakaya outlined on page 6 , lines 7 to 14 ? \\ A. Yes, it is. Mr. Mobley's testimony and exhibits provide the detail of his calculations, which have not been challenged by anyone in this proceeding. In addition, Mr. Sakaya does not present any evidence that Mr. Mobley's calculated lost revenue amounts have not been supported. As such, I think Mr. Sakaya's first concern must be dismissed.}

\section*{Q. Is Witness Sakaya's allegation regarding potential overcollection correct?}
A. No, it is not. Under the Company's proposal, the revenue loss for 2022 is included monthly beginning with the first month rates in this proceeding are effective. Next, the Company uses an average of the revenue loss for the years 2023 to 2025 with that average being effective on that same first day over a threeyear period. I\&E does not dispute the Company's projection that its base rates will not be reset until 2025. The Company will not over-collect on the revenue loss during the period rates from this proceeding are effective.
Q. Has the Company experienced lost re venue from policies it is required to adhere to in the past?
A. Yes, it has.
Q. Has the Company provided testimony and calculations supporting the lost revenue it projects for 2023 through 2025 ?
A. Yes, Mr. Mobley presented the lost revenue calculations through testimony and supporting exhibits and discovery responses.
Q. Have any of those calculations or supporting testimony been challe nged or questioned by the I\&E or OCA?
A. No.
Q. Should the I\&E's lost re venue adjustment be accepted?
A. No, it should not be accepted, it should be rejected.
Q. Did the I\&E make an adjustment to gross receipts tax GRT expense to recognize the revenue increase resulting from the removal of the Revenue Loss Reduction?
A. Yes. As shown on I\&E Exhibit No. 1, Table 1 on page 4, the second table on the Taxes Other line, the amount of \(\$ 492,000\) provides for the GRT.
Q. Did OCA Witness Morgan provide for the GRT increase related to his proposal to remove the lost revenue adjustment?
A. No, he did not. If his rejection of the revenue loss adjustment is accepted (which, it should not be as I testified above), then the increased gross receipts tax on higher revenue must be added. The adjustment has been added as a correction to OCA's adjustment on my rebuttal Exhibit RLO-3-R, page 1, column 6, line 30.

\section*{B. RATE CASE EXPENSE}
Q. What was the Company position regarding rate case expense le vel and normalization period in its as filed exhibits?
A. As shown on DLC Exhibit 2, Schedule D-8, the Company included an estimate of \(\$ 2,440,000\) for total rate case expenses and used a normalization period of three years to recover that amount at \(\$ 813,000\) per year.
Q. Is the Company changing its estimate for total rate case expenses or normalization period?
A. No. The Company is not changing its estimate for total rate case expenses or its normalization period from three years.
Q. Why does the Company believe it will file its next rate case application within three years?
A. The Company, based on its forecasted capital expenditures and other operating elements with the use of the year-end rate base and annualization adjustments it proposes, believes the three-year filing timetable for filing a future rate case is required.
Q. What was the Company's estimate for its next rate case filing in its last rate case filed in Docket No. 2018-R-3000124?
A. The Company, in Docket No. 2018-R-3000124 which used a FPFTY of 2019 stated that it planned to file its next rate case in three years with a FPFTY of 2022. As shown in I\&E Witness Keller's I\&E Statement No. 2, page 7, line 3, the Company filed its current case in 36 months, right on schedule.

\section*{Q. What is I\&E's proposed normalization period?}
A. Witness Keller proposes a 43-month normalization period using the filing intervals between the Company's last four rate cases as shown on Statement No. 1, page 7 lines 3 to 7 . Witness Keller bases this method on a 2012 electric utility
case, a 2015 water utility case and a City of Dubois case where the companies each requested 60 months and the I\&E recommended 64 months.

\section*{Q. Do any of those cases have the same or even similar filing history as shown for DLC?}
A. That is not known, since Witness Keller did not present the historic filing data or any evidence that that historic data was relevant to the current DLC case.

\section*{Q. What is the Company's history on filing rate cases?}
A. As shown on the chart in Witness Keller's testimony on page 7, the Company has met its projected filing date in two of the last three cases. When the Company filed its 2010 rate case it projected its next filing in 36 months and as shown filed the new case in 38 months. The timing of filing the 2018 case was due to the result of waiting for the completion of the ongoing smart meter recovery program and the initiation of a revenue stream provided by the Distribution System Improvement Charge ("DSIC"). Finally, the 2021 case was filed within the 36month projection made by the Company in the 2018 case.
Q. Please describe how those two programs allowed the Company to delay the filing of its 2018 rate case for almost two years.
A. The Company was able to delay the filing of its 2018 rate case in large part because it had access to a nonrecurring additional revenue stream - the smart meter charge ("SMC") - that is no longer available. In the 2018 rate case, the

Company rolled \(\$ 26.278\) million of smart meter surcharge revenue into base rates. Thus, although the Company continues to incur smart meter costs, it now recovers those costs through base rates, which necessarily accelerates the need for base rate updates.
Q. Was there another significant reason the Company was able to delay the filing of its rate case after the 2013 rate case was completed?
A. Yes. Effective in 2016, the Company was authorized to implement the DSIC, which provides for the recovery of certain investments which otherwise would be recovered in a general rate case. The DSIC was not in effect during the Company's 2013 rate case; thus, the base rates established through that case did not reflect the receipt of revenues through the DSIC. Similar to the revenue provided by the SMC surcharge, the DSIC surcharge revenue of \(\$ 25.700\) million was rolled into base rates in the 2018 rate case. Without these surcharge revenues, the Company would have been required to file its rate case at least by the 36 -month planning period projected in the 2013 rate case, if not sooner.
Q. Do the Company's historical and projected spending le vels suggest any change to this 36-month filing cadence?
A. No. The Company's future expenses are projected to increase, not decrease. Moreover, as Mr. Morris observes in his direct testimony (and which no party disputes), the Company's levels of capital investment have actually exceeded its historical projections, which supports the Company's forecasted rate case filing cadence.
Q. Did you compare I\&E Witness Keller's use of a three case average as proposed in this proceeding and shown on I\&E Statement No. 2, page 7, line 3 with Mr. Keller's proposal in the Company's prior case in R-20183000124 ?
A. Yes, I did. In the last case, Witness Keller proposed to use the same methodology to calculate a proposed normalization period, the simple average of the timing between the prior three cases, as he is proposing in this case.
Q. What was the data and result used and proposed by Mr. Keller in the 2018 case?
A. Mr. Keller used the months between filings of 51 months, 38 months and 56 months from I\&E Exhibit 1 , Schedule 2 in that case, which averaged to 48 months and proposed using the 48 month average for the normalization period as shown on pages 9 and 10 of I\&E Statement No. 1 of that proceeding.
Q. Do you have any comment regarding the methodology used by Mr. Keller and the validity of the results?
A. Yes, I do. First, I think the blind use of an average of historic data cannot be the basis of a proposed future period. Second, I think the Company's plans must be
considered in establishing a proposed future period. Finally, comparing the results of prior forecasts must also be considered.

\section*{Q. Have you compared the results of Mr. Keller's and the Company's fore casts} in the 2018 case with the actual results?
A. Yes, I have. In the 2018 case, Mr. Keller recommended use of a 48-month period while the Company recommended use of a 36-month period for the normalization of rate case expense based on when the next case would be filed. When compared to the actual filing time, 36 -months, it can be seen that Mr. Keller's recommendation was significantly off while the Company's was right on. This further supports the rejection of I\&E's proposed 43-month normalization period in this proceeding.

\section*{Q. Based on this history, should Witness Keller's estimate be adopted?}
A. No, it should be rejected. As shown above, the main reasons for the almost 2-year delay in filing its 2018 rate case are non-recurring events. First, the SMC surcharge recovery program is now over and second, the initiation of the DSIC program is again a one-time event. Once the outlier of 56 -months has been explained and removed, and the Company's 36-month estimate for normalization of the rate case expense has been supported and should be adopted.

\section*{C. SALARIES AND WAGES}

\section*{Q. What portion of the I\&E's salaries and wages adjustments will you be addressing?}
A. I will address the I\&E's proposal to remove the annualization adjustment that I included in my presentation to match the use of the year-end rate base as shown on DLC Exhibit 2, Schedule D-7, page 2, column 3, line 21 of \(\$ 1,211,000\). Company Witness Bachota will address the I\&E's proposed reduction related to vacancy factor.
Q. What pro forma adjustments did the Company make to its FPFTY salaries and wages ("S\&W") expense?
A. The Company made a pro forma adjustment to annualize \(\mathrm{S} \& \mathrm{~W}\) expense for the FPFTY for its union and non-union wages. The union wages were annualized using the wage increase that scheduled to be effective on October 1, 2022 and the non-union wages were annualized using the wage increase scheduled to be effective on January 1, 2023.

\section*{Q. Why do you make these annualization adjustments?}
A. The S\&W annualization adjustments are made to match the use of a year-end rate base for the FPFTY and to set rates based on expenses that will be in effect for some of the period until the next rate case planned to be filed in 2024 with a 2025 FPFTY. This procedure provides the Company a better opportunity to earn the rate of return used to set rates in this proceeding.

\section*{Q. Did Witness Keller propose to remove both S\&W annualizations?}
A. No, Witness Keller only proposed to remove the wage increase that is planned for January 1, 2023 but not the wage increase that is planned for October 1, 2022.
Q. Do you know why Witness Keller proposes to remove only that annualization adjustment for the \(S \& W\) expense?
A. Yes, Witness Keller proposes to remove the non-union wage increase planned for January 1, 2023 and also to make an adjustment to the vacant position allowance used by the Company in its budgeting for base \(\mathrm{S} \& \mathrm{~W}\). As shown on I\&E Statement No. 2, page 11, lines 1 and 2, Witness Keller has removed the January 1, 2023 wage increase because it, "...is not effective until after the end of the FPFTY." On the same page on lines 10 to 12 , Witness Keller states that, "[M]y recommendation more accurately represents the salaries and wages level that will be in effect at the end of the FPFTY."
Q. Has Witness Keller suggested that the re would be or could be no S\&W incre ase for the non-union employees on January 1, 2023?
A. No, he has not.
Q. Does Witness Keller take the position that there should be no S\&W annualization in the FPFTY?
A. No, he does not.
Q. What do you infer from Witness Keller's position to use a hard cut-off date for the allowance of the Company's inclusion of the non-union S\&W increase planned for January 1, 2023?
A. Since Witness Keller utilizes a full annualization of the union S\&W increase effective October 1, 2022 and rejects the annualization for the non-union S\&W because it occurs on January 1, 2023, it appears that he would allow the annualization of the non-union \(S \& W\) increase if the planned increase were to be effective on December 31, 2022.
Q. In your opinion, does Witness Keller's proposed disallowance of the January 1,2023 S\& \(W\) increase follow the intent of the use of year-end rate base and other annualization adjustments?
A. No, it does not. I believe that the purpose of the use of a FPFTY, year-end rate base, reasonable pro forma adjustments and annualization adjustments which reflect known and measurable changes are designed to give the utility an opportunity to earn the rate of return used to set the rates proceeding during the period those rates are in effect.

\section*{Q. Should Mr. Keller's adjustment to remove the \(S \& W\) wage increase planned} for January 1, 2023 be adopted?
A. No, it should not.
Q. Did the OCA propose any adjustments to the Company's FPFTY S\&W (also referred to as payroll) expense?
A. Yes. Witness Morgan, on OCA Statement No. 1, Schedule LKM-9 proposes to remove a total of \(\$ 4.878\) million from the Company's PA Jurisdictional S\&W expenses. The proposed adjustment is to remove both \(\mathrm{S} \& \mathrm{~W}\) annualization adjustments totaling \(\$ 2.189\) million (Schedule LKM-9, lines 1 to 4 ) and also remove \(\$ 2.689\) million based on an increase in the number of vacant positions he proposes for the FPFTY (Schedule LKM-9, lines 6 to 15). Company Witness Bachota also addresses Witness Morgan's proposal related to vacancy factor in her rebuttal testimony.
Q. Did you have a correction in Witness Morgan's proposed \(\mathbf{\$ 4 . 8 7 8}\) million adjustment?
A. Yes, I do. As presented earlier in my rebuttal, because Witness Morgan's adjustments are based on total Company amounts and he is applying the total Company amounts to Company PA Jurisdictional amounts, most of his adjustments, including the proposed adjustments to \(\mathrm{S} \& \mathrm{~W}\) expense, need to be reduced to reflect only the PA Jurisdictional level. As shown on DLC Exhibit RLO-3-R, page 1, columns 5 Witness Morgan's adjustment for the annualization
needs to be reduced by \(\$ 380,000\) and his adjustment for the vacancy issue needs to be reduced by \(\$ 467,000\). As shown on DLC Exhibit RLO-3-R, page 3, line 15, Witness Morgan's proposed annualization adjustment of \(\$ 2.189\) million should be reduced to \(\$ 1.809\) million and his proposed vacancy adjustment of \(\$ 2.389\) million should be reduced to \(\$ 2.222\) million as shown on line 22 of page 3 that exhibit.
Q. After these corrections do you still believe that Witness Morgan's annualization adjustment should be rejected?
A. Yes, I do.
Q. What is your understanding of the reasons presented by Witness Morgan for proposing the removal of both of the Company's \(S \& W\) annualization adjustments?
A. As I understand Witness Morgan's testimony, he is, with regard to the non-union proposed payroll increase on January 1, 2023, recommending removal for basically the same reason presented by I\&E Witness Keller that it occurred on the day after the end of the FPFTY. However, Witness Morgan is also proposing to remove the annualization of the payroll for the union increase that is planned to be effective on October 1, 2022. Apparently, Witness Morgan believes that only
costs incurred during the FPFTY should be included in setting rates for that test year and that there should be no pro forma or other annualization adjustments.

\section*{Q. Is Witness Morgan's position your understanding of the purpose of establishing a FPFTY to set rates in this procee ding?}
A. No, it is not. I believe that the purpose of a test-year, such as the FPFTY, is to establish a uniform measurement period to set rates that provide a utility with an opportunity to earn the rate of return that is established during the test-year. The establishment of reasonable levels for rate base, revenues, expenses and rates of returns includes using a utility's test year budgeting data adjusted for reasonable known and measurable events, as well as allowing certain normalization and annualizations to provide a reasonable level of each component for when the rates established in that test-year will be in effect.
Q. What are some of the normalization and annualization adjustments that are considered in establishing reasonable le vels of rate base, re venue and
expenses during a test year, but are used to provide a utility with an opportunity to earn the rate of return resulting from the rate case?
A. There are a number of actions and procedures that are considered, such as
- The use of a projected test year,
- The use of a year-end rate base,
- Annualization of test year customer and usage levels for revenue,
- Annualization of test year expenses,
- Normalization of expenses that occurred outside of the test year, and
- Amortization of expenses that occurred outside of the test year.

In fact, Witness Morgan uses some of these actions himself, albeit only where doing so would accrue to the Company's detriment. For example, Witness Morgan recommends a five-year normalization of the Company's uncollectible claim related to the COVID-related regulatory asset. This normalization period would extend well beyond the FPFTY, despite the fact that the corresponding
costs have already been incurred, prior to the FPFTY. I address this proposal of Witness Morgan's later in my rebuttal testimony.

Q, Is Witness Morgan eliminating all of the planned October 1, 2022 S\&W increase?
A. No, he is only removing the annualization portion.
Q. Did Witness Morgan remove the revenue annualization adjustment that is proposed by the Company for the increases in revenues as of the FPFTY?
A. No, he did not.

\section*{Q. Should the removal of the Company's annualization adjustments as} proposed by OCA Witness Morgan be adopted?
A. No, they should not be adopted because they are inconsistent and do not reflect the projection and historic experience that rates set in this proceeding will be in effect for 3 years.

\section*{D. PAYROLL TAXES}
Q. What is I\&E's payroll tax adjustment?
A. Witness Keller proposes to remove payroll taxes in a ratio equal to the recommended removal of S\&W based on a calculation on I\&E Exhibit No. 2, page 16, lines 1 to 5 . With regard to Witness Keller's removal of the Company's annualization adjustment of the January 1, 2023 non-union S\&W raise, the calculation correctly reflects the removal of the related payroll taxes. This is not to
say that the Company accepts Witness Keller's adjustment. Company Witness Bachota will respond to the portion of the payroll tax adjustment as it relates to Witness Keller's vacancy adjustment.

\section*{Q. Should Mr. Keller's adjustment be adopte d?}
A. No, it should not. Since I believe the S\&W annualization associated with the payroll tax reduction should be rejected, the I\&E proposed reduction to payroll taxes should also be rejected.
Q. Did OCA Witness Morgan make a similar reduction to payroll taxes to match the reduction he proposed to DLC's S\& W expense?
A. Yes, he did. However, as with other adjustments, his adjustment to payroll taxes needs to be corrected as discussed earlier in my testimony related to DLC Exhibit RLO-3-R, page 1 , column 5 , line 30 with the correction shown on page 5 lines 50 to 51 in the amount of \(\$ 65,000\). This corrects OCA's total payroll tax adjustment down from \(\$ 373,000\) to \(\$ 308,000\). Using the same ratioing procedure used by Mr . Morgan, \(\$ 138,000\) of the \(\$ 308,000\) is associated with the payroll annualization adjustment and \(\$ 170,000\) with the vacancy adjustment.
Q. With regard to the annualization portion of the OCA payroll tax adjustment, should it be rejected or adopted?
A. It should be rejected as should his corrected adjustment to remove the annualization. Company Witness Bachota will address the portion of Witness Morgan's payroll tax adjustment that is associated with his proposed vacancy adjustment.

\section*{E. 401k EXPENSE}
Q. Did I\&E Witness Keller propose an adjustment to the Company's FPFTY 401 k expense to match the adjustment made to \(\mathrm{S} \& \mathrm{~W}\) ?
A. Yes. The adjustment, as shown on I\&E Exhibit No. 2, pages 21 and 22 line 19 to line 3, uses the total PA Jurisdictional payroll amount and 401k expense amount to determine the proposed reduction of 401 k expense in the amount of \(\$ 169,000\).
Q. Does the calculation correctly reflect the 401 k expense that should be reduced if Witness Keller's S\&W adjustment were adopted?
A. No, it does not. This is not correct, as I discussed earlier, the Company's payroll annualization adjustment does not impact the Company's 401k expense. The corrected amount of 401 k expense related to the vacancy issue is \(\$ 101,000\).
Q. Who will address the Company's position regarding the corrected I\&E proposal to remove \(\mathbf{\$ 1 0 1 , 0 0 0}\) from the FPFTY 401k expense?
A. Company Witness Bachota will address the I\&E proposal to remove the \(\$ 101,000\) 401k expense associated with the vacancy issue.
Q. Did OCA witness Morgan make a similar adjustment to the Company's 401 k expense to match the adjustment made to the \(S \& W\) expense?
A. Yes, he did.

\section*{Q. Does Witness Morgan's adjustment contain errors?}
A. Yes. Similar to other adjustments, this OCA adjustment was based on using total Company amounts, which must first be corrected. The calculation of the corrections to the OCA proposed 401k adjustment of \(\$ 132,000\) shown on DLC Exhibit RLO-3-R, page 1, column 5, line 29 is calculated on page 4, lines 41 to 50. Lines 41 to 45 show the correction to remove the OCA payroll annualization adjustment, as also presented for the I\&E adjustment. Lines 46 to 50 show the correction to convert the use of total Company balances to PA Jurisdictional balances.
Q. Will Company Witness Bachota also address the remaining OCA adjustment that is related to the OCA vacancy adjustment?
A. Yes, she will.

\section*{F. COVID-19 UNCOLLECTIBLE EXPENSE}
Q. What was the Company's proposed treatment of the COVID-19 Uncollectible Expense?
A. As shown on DLC Exhibit 2, Schedule D-12, line 3 and line 20 the Company proposed to recover the \(\$ 4.187\) million over a three-year period.

\section*{Q. What is the I\&E's position regarding the recovery of the COVID-19} uncollectible expense?
A. Witness Wilson proposes to allow recovery of the COVID-19 uncollectible expense as amortization over the 43-month period proposed by I\&E Witness Keller for recovery of the normalized rate case expenses.
Q. Should the 43-month period be used for the amortization of the COVID-19 uncollectible expense?
A. No, it should not be used. First, the Company has shown that the 43-month period proposed by Witness Keller should be rejected. Next, extending recovery of these expenses, which were incurred mainly in 2020, for almost 20 percent longer than proposed would be unfair to the Company. As it is, the Company will not recover these amounts until the end of 2024 using its proposed 36 -month amortization period.
Q. Do you agree that this expense should be amortized as recommended by Ms. Wilson?
A. Yes, I do.
Q. What is the position regarding the recovery period proposed by OCA Witness Morgan?
A. Witness Morgan proposes to use a 5 -year or 60 -month recovery period because as he states on OCA Statement 1, page 25 lines 18 to 20, "...the 3-year period, proposed by the Company, defeats the spirit of fairness and compromise which he believes was present in the Commission's directives." He also states on page 25
line 24 to page 26 line 3 , "...the Company's attempt to seek a rapid recovery of those costs by increasing rates, ignores the spirit of the fairness and the fact that many of its customers have not recovered from the disruption caused by the pandemic."
Q. Do you agree with OCA Witness Morgan that the Company's actions defeat the fairness or ignore the spirit of the Commission's directives?
A. No, on the contrary. I believe that the Company's proposed 36 -month recovery period recognizes the current state of the recovery from the pandemic and the fact that the Company's requested recovery period does not start until the beginning of 2022. Mr. Morgan does not present any "facts" that show how "many" of the Company's customers will not have recovered from the disruption caused by the pandemic by the beginning of 2022. In addition, for those customers who are still recovering and need some additional assistance beginning in 2022, the Company has programs in place and proposed others in this proceeding to provide continued assistance to them.
Q. Should OCA Witness Morgan's proposed 5-year period for the amortization recovery of the COVID-19 uncollectible expense be considered by the Commission?
A. No, it should be rejected.

\section*{Q. Please describe the position proposed by the National Resource Defense Council ("NRDC") Witness Levin.}
A. NRDC Witness Levin proposes to use a longer period to amortize the COVID-19 uncollectible expense, and suggests that a six-year period "could be warranted." See the Direct Testimony of Amanda Levin at page 21, lines 12-13; page 21, lines 10 to 14 .

\section*{Q. Does Witness Levin provide any detail to support an extended recovery period?}
A. No, she merely states that, "...it may be best to amortize these amounts over a longer period of time to further mitigate the rate impact to customers." The fact is that, under the Company's 36-month amortization period, customers will not begin to be charged until the beginning of 2022. Moreover, the Company has other programs that are available for any customers who still need assistance at that time. To delay full recovery of the COVID-19 uncollectible expense until the end of 2027 is not fair or reasonable.

\section*{V. COVID-19 - NET EXPENSE RECOVERY}
Q. Do you have an update to the Company's claim for recovery of its other Net COVID-19 Expenses?
A. Yes, I do. As shown in my rebuttal testimony and on Exhibit RLO-1-R, column 4, line 24 and also on Exhibit RLO-2-R, page 1, lines 24 to 30, the Company has reduced its total costs by \(\$ 500,000\) (lines 24 to 26 ) and its amortized costs by \(\$ 167,000\) (lines 28 to 30 ). In addition, as described by Company Witness

Bachota, the Company has also increased the savings of \(\$ 750,000\) from the original filing to a savings of \(\$ 1,755,000\); and also increased its estimate of costs through June 30,2021 net expenses from \(\$ 600,000\) up to \(\$ 794,000\). These updates are shown on Exhibit RLO-2-R, page 2, lines 36 to 49. These reduce the total net expenses from \(\$ 5.795\) million (DLC Exhibit 2, Schedule 12, lines 17 and 18) to \(\$ 4.484\) million ( \(\$ 5.795\) million - \(\$ 500,000-\$ 1,005,000+\$ 194,000=\$ 4.484\) million) and reduces the annual amortization from \(\$ 1.932\) million ( \(\$ 5.795\) million \(/ 3=\$ 1.932\) million) to \(\$ 1.495\) million ( \(\$ 4.484\) million \(/ 3=\$ 1.495\) million).
Q. Does this update change the Company's request to recover its net COVID-19 expenses in rates in this proceeding?
A. No, it does not.
Q. What is your understanding of the I\&E's position regarding recovery of the COVID-19 Net Expenses?
A. I\&E Witness Wilson proposes to disallow recovery of the Company's claim as stated on page 14 lines 13 and 14 of I\&E Exhibit No. 1 because as stated on lines 1 and 2 of page 15 , the Commission "... has not issued guidance on whether or how companies may recovery these other incremental costs."
Q. So, is it your understanding that Ms. Wilson is not objecting to the recovery of the se extraordinary expenses, but only that they should not be included in a recovery until recovery is approved by the Commission?
A. That is how I understand the position outlined above.
Q. Does Ms. Wilson also claim that the Company has not provide detailed records or specification of which claimed expenses relate to directly carrying out the requirements of the Commission's Orders?
A. Yes, she does make that claim. However, she does not provide any specifics and I am not aware of the Company withholding any information requested. To my knowledge, the Company has provided support for all of its claims for expenses in this proceeding and has responded to all data requests without being told that its responses lacked sufficient detail on the specific subject.

\section*{Q. Do you have any other comments or concerns regarding the testimony of I\&E Witness Wilson regarding the COVID-19 Net Expense recovery?}
A. Yes, I have two areas. First, on page 19, lines 15 to 19 , she states that utilities should not be fully insulated from all costs associated with the pandemic particularly since the total amount of \(\$ 5.795\) million is less than \(0.9 \%\) of DLC's revenue. This is very concerning to me in that she appears to be suggesting that, where an expense incurred by a utility reflects a relatively small percent of its revenue, it does not have to be recovered. The expenses included in the COVID19 Net Expenses are real (and significant) costs, and should not be dismissed simply because they are less than one percent of total revenue. In addition, they are unusual and unpredictable costs that could not have been anticipated in a prior rate allowance.

Second, on the bottom of page 19 and the top of page 20, Witness Wilson states that the Company did not seek or receive special permission to defer for accounting purposes any other incremental COVID-19 related costs. I believe that no such request was necessary since the Commission, as shown in Ms. Wilsons testimony on page 16 , line 22 to page 17 , line 7 authorized such actions. Following submission of Ms. Wilson's testimony, the Commission reaffirmed the Company's authority to defer COVID-19 related costs in its July 15, 2021 Order at Docket No. M-2020-3019262. In addition, since the test years in this proceeding included the HTY and the FTY, 2020 and 2021 respectively those costs are currently being requested for deferral and recovery in the FPFTY.

\section*{Q. Should Ms. Wilson's proposal to reject the Company's COVID-19 recovery request be adopted by the Commission? \\ A. No, it should not.}
Q. What is your understanding of OCA Witness Morgan's proposal for the COVID-19 Net Expense recovery requested by the Company?
A. Mr. Morgan proposes that the entire amount be rejected for two basic reasons. First, he believes the savings identified by the Company are understated, and second, he states that the Commission did not guarantee recovery of any costs that may have been deferred.
Q. Do you agree that there are some additional savings above the \(\mathbf{\$ 7 5 0 , 0 0 0}\) identified on DLC Exhibit 2, Schedule D-12, line 15; and that the Commission did not guarantee recovery of the costs deferred in connection with the COVID-19 activities?
A. Yes, I agree that there were additional savings beyond the \(\$ 750,000\) shown on Schedule D-12, but nothing like the \(\$ 2.460\) million suggested by OCA Witness Morgan. I also agree that the Commission has not guaranteed recovery of the deferred COVID-19 Net Expenses, but that is what is being requested by DLC in this proceeding and it is not a reason for denying recovery.
Q. What are the additional savings related to the COVID-19 activities?
A. The detail is provided in the rebuttal testimony of Company Witness Bachota. The amounts of those savings and an update of 2021 actual COVID-19 Net Expense amounts are provided on DLC Exhibit RLO-2-R, column 3, lines 41 and 44.
Q. Have you revie wed the additional savings claimed by OCA Witness Morgan in his \(\$ \mathbf{2} .460\) amount?
A. Yes, I have, and Witness Morgan makes some serious overstatements in his claimed additional savings. First, in the chart on page 27 of OCA Statement No. 1, Mr. Morgan uses the amount of \(\$ 979,000\) for reduced medical expenses. As support, he references the Company's response to I\&E-RE-70, which states in relevant part that the \(\$ 979,000\) decrease was due primarily due to three factors: [ 1 ] reduced claim activity related to COVID-19; [ 2 ] receipt of a pharmacy credit; and [3] a lower
percentage of benefits cost allocated to expense than in 2019. In spite of the COVID-19 expense reduction being only part of the three primary reasons for the decrease of \(\$ 979,000\), Mr. Morgan used the total amount. Second, in the chart on page 27 the additional employee related expense amount of \(\$ 1.102\) million is referenced to the Company's response to I\&E-RE-63(D), which discusses the decrease in relation to employee training. Again, Witness Morgan assumes that the entire amount of \(\$ 1.36\) million is above and in addition to the savings in employee training included in the Company's \(\$ 694,000\) and also was entirely due to COVID19 reductions. Finally, the last item, a reduction of \(\$ 399,000\) from the Company's response to I\&E-RE-61, identifies the reduction as "primarily" due to COVID-19 activities. The Company's responses to the three referenced I\&E data requests, RE70, RE-63(D) and RE-61 are included in Exhibit RLO-7-R.
Q. In your opinion, should Witness Morgan's additional savings be accepted as realistic?
A. No. In each instance, Mr. Morgan has used total amounts shown as differences between 2019 and 2020 levels of expenses when the Company's responses clearly identified the amounts used by him as partially due to COVID-19 activity. Mr. Morgan's overstatement of the COVID-19 related savings must be rejected.
Q. Has the Company updated its savings number from the \(\mathbf{\$ 7 5 0 , 0 0 0}\) included in its original filing as shown on DLC Exhibit 2, Schedule D-12, line 15?

\begin{abstract}
A. Yes, it has. As shown on Exhibit RLO-5-R, Schedule D-12, line 15, the Company shows the savings amount to be \(\$ 1.755\) million, which has been reflected in the Company's revised revenue requirement as shown on Exhibit RLO-5-R, Schedule D-1, column 2, line 2 of \(\$ 85.528\) million.
\end{abstract}
Q. Do you have another comment on Mr. Morgan's statements, "Based on these savings, the net incremental cost is \(\mathbf{\$ 1 , 9 6 5 , 0 0 0}\). In my opinion, the magnitude of the dollar value of these costs appears not to be large e nough to qualify as extraordinary to the point where they impact the financial viability of the Company"(OCA St. 1, p. 27, lines 2-5)?
A. Yes, I have several comments. First, Mr. Morgan does not present the details of his calculation of "these savings" of \(\$ 1,965,000\), which clearly double count the \(\$ 750,000\) savings originally included by the Company. The \(\$ 1,965,000\) is the result of the Company's net expense shown on Mr. Morgan's chart on page 24, line 15 of \(\$ 5,195,000\) which includes the \(\$ 750,000\) savings shown on the line above the total. Mr. Morgan reduces that \(\$ 5,195,000\) by his summary of the savings which is shown on page 27 , line 1 of \(\$ 3,230,000\) which also includes the \(\$ 750,000\) Company savings on the third line of Mr. Morgan's chart. Including the \(\$ 750,000\) savings in the total cost number of \(\$ 5,195,000(\$ 5,945,000-\$ 750,000\) \(=\$ 5,195,000)\) and in the savings of \(\$ 3,230,000(\$ 750,000+\$ 2,480,000=\) \(\$ 3,230,000)\) used to reduce that number is a clear error and should have been discovered by Mr. Morgan.
Q. What does removing this double count of the \(\mathbf{\$ 7 5 0 , 0 0 0}\) do to OCA Witness Morgan's magnitude level?
A. Correction of the double count error increases the amount of the difference from \(\$ 1,965,000\) to \(\$ 2,715,000\) which is almost 40 percent higher that Mr. Morgan's erroneous \(\$ 1.965\) million.
Q. Do you think that either of those amounts, if not recoverable in rates, is material to the Company?
A. Yes, I think either amount is material. For example, if the expenses are reasonable and incurred in providing service to customers in accord with Commission policy or orders then they should be recoverable whether they are normal or incurred in extraordinary circumstances and also whether they are small or large. If a commission routinely denies recovery of these expenses the utilities would not have an opportunity to earn a fair rate of return and that could cause negative activity in the finance markets and be detrimental to both the utilities and their customers.
Q. Should Mr. Morgan's first reas on for rejecting the recovery of the COVID19 Net Expenses, that the amount is allegedly too small and, its nonrecovery allegedly would not impact the viability of the Company, be considered by the Commission?
A. No, it should not.
Q. Do you agree with Witness Morgan's second reason for denying recovery of the COVID-19 Net Expenses, that the Commission did not guarantee recovery of the net other expenses related to the COVID-19 pandemic and recovery?
A. No, I do not. While I agree that the Commission did not guarantee recovery, as Mr. Morgan should know, recovery will come once the expenses of this extraordinary event, the COVID pandemic, are presented to the Commission and reviewed, which is where we are now. The Commission has directed utilities to record the COVID-19 Net Expenses and maintain records. This action allows the utilities, including the Company, to request recovery in a rate case, which is what the Company is doing.
Q. Has Mr. Morgan challenged any expense or presented any specific evidence that shows the expenses included in the Company's requested recovery are unreasonable?
A. No, I believe, once Company Witness Bachota's updated amounts as shown in Exhibit RLO-2-R, page 2 lines 36 to 49 are included and Mr. Morgan's double counting error removed, there are no viable reasons to exclude recovery as requested by the Company.

\section*{VI. CASH WORKING CAPITAL}
Q. Have you reviewed the adjustments to Cash Working Capital ("CWC")?
A. Yes, I have. Mr. Morgan made two basic adjustments, one for the change in the debt / equity ratio and debt level proposed by the OCA and the second for the changes in expenses proposed by the OCA.
Q. Do you have any issues with these adjustments to CWC proposed by the OCA?

A, Yes, I do. The calculations shown on Schedule LKM-6 are based on total Company balances, which result in a total adjustment reducing CWC by an amount of \(\$ 430,000\), as shown on Schedule LKM-2, page 1 on line 5 in the adjustment column. This reduces the Amount Per Company in the first column of \(\$ 46.132\) million by the \(\$ 430,000\). However, when the amounts on Schedule LKM-6, page 1, lines 7 and 8 that determine the \(\$ 430,000\) are reviewed, they are \(\$ 68.330\) million for the Company and \(\$ 67.900\) million for the OCA's revised balance. To use the total Company difference of \(\$ 430,000\) to reduce the PA Jurisdiction CWC amount of \(\$ 46.132\) million is another mismatch and should be rejected.
Q. Have you reviewed the CWC adjustment proposed by I\&E Witness Keller?
A. Yes, I have.
Q. Do you have any concerns with any of Mr. Keller's adjustments or procedures?

A, Yes, I do. I have two concerns regarding the adjustment he made to remove the \(\$ 18.260\) million in average prepaid expenses from the other expense calculation in the CWC determination. First, Mr. Keller did not perform any studies to determine if some or any of the prepaid expenses should be removed. Second, even if some of the prepaid expenses should be reduced from the other disbursements, he used a distribution allocator of 1.000 (I\&E Exhibit No. 2 Schedule 15 , page 2 of 2 , line 15 , column 2 ) even though some of the prepaid expenses are not totally distribution or are not operating expenses at all.

\section*{Q. Do you have some examples of those expenses?}
A. Yes. Referring to DLC Exhibit 2, Schedule C-4, page 10, lines 1 to 5, these expenses are for various insurance coverages which are not solely distribution. In addition, lines 16 and 17 are for IT hardware and software maintenance which are not solely distribution. Finally, lines 12 is for a Pennsylvania PUC Assessment which is a tax amount and is charged on total revenue not just distribution revenue, line 21 is for IT Transmission Software, and many of the other maintenance prepaid amounts are not solely distribution.

\section*{Q. Should the Commission adopt Mr. Keller's removal of 100 percent of the prepaid expenses as proposed by him?}
A. No. As shown above, Mr. Keller does not provide any support for his proposed removal of prepaid expenses and he has incorrectly assumed that 100 percent of the prepayments are related to the distribution operations.
Q. Should any amount of the prepaid expenses be removed from the other disbursements?
A. Not without some support other than that the Company's response that it did not remove them.
Q. Do you have any concern with the remainder of Mr. Keller's adjustments to the Company's CWC calculation?
A. No. The remaining calculations seem to reflect the impact of changes in the I\&E expenses.
Q. Does this complete your prepared rebuttal testimony at this time?
A. Yes, it does.

\section*{BEFORE THE}

PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 12-R

Direct Testimony of Matthew L. Simpson

Date: July 26, 2021

\section*{REBUTTAL TESTIMONY OF MATTHEW L. SIMPSON}
Q. Please state your full name, business affiliation and business address.
A. My name is Matthew L. Simpson. I am the Director, Tax at Duquesne Light Company ("Duquesne Light" or the "Company"). The Company's business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. Have you previously submitted testimony in this proceeding?
A. Yes. I submitted Duquesne Light Statement No. 12 with the tariff filing that initiated this proceeding on April 16, 2021. My qualifications and experience are set forth in Statement No. 12.
Q. What is the subject of your rebuttal testimony?
A. I will respond to the testimony of Bureau of Investigation and Enforcement (I\&E) witness Wilson's and Office of Consumer Advocate (OCA) witness Morgan's opposition to the Company's proposed Federal Tax Adjustment Clause (FTAC).
Q. Are you sponsoring any Exhibits along with your rebuttal testimony?
A. Yes. I am sponsoring the following rebuttal Exhibits:
- MLS-1-R, a copy of I\&E's comments filed March 9, 2018, at Docket No. M-20182641242; and
- MLS-2-R, a copy of OCA's comments filed March 9, 2018, at Docket No. M-20182641242

\section*{Q. Briefly explain the proposed FTAC.}
A. The FTAC is a proposed automatic adjustment clause that would adjust the Company's base rates for the effects on revenue requirement of an increase or decrease in federal income taxes that is not reflected in current base rates. As I illustrated in my direct testimony, the increases in the corporate income tax rate currently being proposed by the Biden administration would create a very substantial increase in the Company's revenue requirement (DLC St. No. 12, p. 18).

\section*{Q. Why does I\&E witness Wilson oppose the adoption of the FTAC in this proceeding?}
A. Ms. Wilson contends that an increase in the corporate federal income tax is speculative at this time. She also contends that the Commission has recently dealt with the substantial decrease in federal income taxes under the Tax Cuts and Jobs Act of 2018 on a statewide basis and that she believes that the Commission would provide adequate and timely guidance on a future federal corporate tax rate increase (I\&E St. No. 1, pp. 38-39).

\section*{Q. Do you agree with Ms. Wilson's conclusions?}
A. No, I do not. With regard to Ms. Wilson's first conclusion that a federal corporate rate tax is speculative, the President and his administration has repeatedly referenced an increase in the rate as a critical part of his Build Back America plan. While the timing of the tax rate increase is uncertain, it would appear that a tax rate increase is probable while there are currently majorities of his party in Congress. As explained by Mr. Ogden in his rebuttal, recoverable utility expenses that are significant, subject to change, and difficult to predict,
are often recovered through automatic adjustment clauses (DLC St. No. 12-R, pp. 16-17). In this regard, the Company's State Tax Adjustment Clause, which is contained in the Company's Tariff at page no. 94, provides for adjustments of base rates for changes in the PA Corporate Net Income Tax, even though there is far less certainty of a change in the state income tax rate. Finally, in the event that federal income tax rates do not change, the FTAC will have no impact on customers. Therefore, even if a change in federal income tax rates were highly unlikely (which is not the case here), this would not be a reason to reject the FTAC.
Q. Please respond to Ms. Wilson's contention that the Commission can be expected to respond in a timely manner on a state-wide basis if there is a significant increase in the federal corporate income tax rate.
A. Ms. Wilson cites the Commission's response to the 2018 decrease in the federal corporate income tax rate under the TCJA. Ms. Wilson provides no example where the Commission has so responded to an increase in the federal corporate tax rate. The situations may be construed differently by the Commission in the face of significant increases in tax rates and increases in customers' rates. The Commission could take the position that the effects of any federal tax rate increase must be recovered in a base rate case and only prospectively. As I have illustrated in my direct testimony, the proposed tax rate changes would have significant impact on the Company's revenue requirement (DLC St. No. 12, p. 16). Further, I note that Duquesne Light was not included in the process used to reflect the TCJA tax reductions because it already had filed a base rate increase by the time of adoption of the Commission's process.
Q. Ms. Wilson also contends that the effect of a change in the federal income tax rate on excess deferred income taxes should not be reflected in the FTAC if it is adopted. Do you agree?
A. No, I do not. Excess deferred taxes are taxes recorded at a tax rate higher than the current rate and are returned to customers in this proceeding over the periods explained in my direct testimony (DLC St. No. 12, p. 13). If the federal corporate tax rate increases, the excess deferred taxes automatically decreases, but the term for returning them does not change. The calculation of the change would be provided with the FTAC filing and subject to reconciliation and subsequent audit under the FTAC. Continuing to amortize excess deferred taxes based on a revised and substantially reduced balance would be inappropriate and potentially violate federal tax requirements that require the return of deferred taxes using average rate assumption. Any further change can be addressed in the next base rate proceeding. Additionally, the Company notes that I\&E supported including the necessary and appropriate excess deferred tax adjustments in a tax adjustment rider in the comments it filed as to how to the Commission should address the federal tax rate decrease under the TCJA. See Exhibit MLS-1-R, pp. 7-8.

\section*{Q. OCA witness Morgan also opposes the FTAC. Please respond.}
A. Mr. Morgan characterizes the Company's testimony as a criticism of the time period for the Commission's reaction to the TCJA (OCA St. No 1, pp. 30-31). The Company is not criticizing the Commission. Instead, the Company is demonstrating that the FTAC is a better and more timely way to address federal income tax rate changes because adjustments
can be made to reflect in customer rates the tax rate changes contemporaneously to when they are experienced. As I noted earlier in response to Ms. Wilson, it may be more diffic ult for customers to retroactively pay the effect of increases in federal corporate tax rates than it was to refund to customers the effects of the decrease in the tax rate under the TCJA. Although the Company did not participate in the process used by the Commission because it had already filed a base rate proceeding, as indicated in the settlement of that case, the Company refunded the current and excess deferred tax effects of the TCJA for 2018 on a retroactive basis to customers (Exhibit JAB-5-R, Paragraph No. 31, which is provided with Ms. Bachota's rebuttal testimony).
Q. Please respond to Mr. Morgan's concern that a new tax act could have other provisions that could affect the Company.
A. While Mr. Morgan lists a few such changes in the TCJA, he does not demonstrate that any of them affected utility rates or that the Commission considered any of them in its rate change process. Nevertheless, if such a change occurred and it was not reflected in the FTAC filing, the Commission would be able to adjust for that in the subsequent audit process provided in the FTAC, if deemed material.
Q. Do you have any further comments on OCA's opposition to the Company's proposed FTAC?
A. The Company notes that OCA supported the use of an automatic adjustment clause in the comments it filed as to how to the Commission should address the federal tax rate decrease under the TCJA. While I am not suggesting that this is any commitment on behalf of OCA,

6 Q. Does this conclude your rebuttal testimony?
7 A. Yes, it does.

\section*{BEFORE THE}

\title{
PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

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Duquesne Light Company )
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\author{
Docket No. R- R-2021-3024750
}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\section*{Dated: July 26, 2021}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
Q. Please state your name, occupation and business address.
A. My name is Paul Ronald Moul. My business address is 251 Hopkins Road, Haddonfield, New Jersey 08033-3062. I am Managing Consultant at the firm P. Moul \& Associates, an independent financial and regulatory consulting firm.
Q. Did you previously submit testimony in this proceeding on behalf of Duquesne Light Company ("Duquesne Light" or the "Company")?
A. Yes. I submitted my direct testimony, Duquesne Light Statement 9, on April 16, 2021.
Q. What is the purpose of your rebuttal testimony?
A. My rebuttal testimony responds to the direct testimony submitted by David J. Garrett, a witness appearing on behalf of the Office of Consumer Advocate ("OCA"), and Christopher Keller, a witness appearing on behalf of the Bureau of Investigation and Enforcement ("I\&E"). If I fail to address each and every issue in the testimonies of Mr. Garrett and Mr. Keller, it does not imply agreement with those issues.
Q. Are you sponsoring any Exhibits with your rebuttal testimony?
A. Yes. I am sponsoring Exhibit PRM-1-R, comprising Schedules 1 and 2.
Q. What are the key aspects of the rate of return issue that the Pennsylvania Public Utility Commission ("Commission") should consider when deciding this issue in this case?
A. The primary issue involves the Company's cost of equity. Mr. Keller has accepted the

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

Company's proposed capital structure ratios. Mr. Garrett has opposed the actual Duquesne Light capital structure, and instead proposed a hypothetical capital structure. The cost of debt is not an issue in this case. In each instance, the equity returns proposed by the opposing witnesses are entirely too low to reflect the risks of Duquesne Light and the prospective cost of equity. Aside from technical issues that I will discuss later in my rebuttal testimony, the Commission should take into consideration a rate of return that will reflect and be supportive of the Company's financial and risk profile. As I explain below, the opposing party recommendations fail to adequately consider this point and thereby significantly understate the required cost of common equity in this proceeding.

\section*{Q. Please summarize the key points of your rebuttal testimony.}
A. My key points are:
- Comparable Companies - Mr. Keller makes erroneous exclusions and proposes a barometer group that is inappropriate in this case.
- Discounted Cash Flow ("DCF") - A variety of DCF results are clearly too low to provide a reliable measure of the cost of equity. As such, alternative measures should be considered as has been Commission practice in other proceedings.
- The DCF growth rate proposed by Mr. Garrett is not specific to a barometer group or any of the companies included in his proxy group, thus not reflective of the type of growth expected by investors in these companies.
- Leverage Adjustment - The I\&E and OCA witnesses have not refuted the accuracy of the Company's leverage adjustments to the DCF and beta component of the Capital Asset Pricing Model ("CAPM").

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
- CAPM - A reasonable application of the CAPM mandates using 30-year Treasury bond yields, leverage adjusted betas, and size adjustment and indicates an equity cost rate that is above \(11 \%\) in this case. Even Mr. Keller's somewhat deficient CAPMresult of 10.37 \% demonstrates that the DCF results of Mr. Keller and Mr. Garrett are inadequate, particularly in light of the Commission's very recent determination of the equity cost rate of \(10.24 \%\) for PECO Gas at Docket No. R-2020-3018929.
- Additional methods should also be considered when establishing the cost of equity for Duquesne Light.

\section*{Q. How should the rate of return set by the Commission support the Company's financial profile? \\ A. The Commission should set the Company's return on equity at a level that will attract investment in the Company to support the Company's financial ability to render safe and reliable service. Applying this principle, the Commission should reject the proposals by Messrs. Garrett and Keller to cut the Company's return on common equity to \(8.50 \%\) and \(9.24 \%\), respectively, from the levels set by the Commission in recent rate cases. These proposed returns are unreasonable because they are much too low to allow Duquesne Light to achieve the level of returns that meet investor expectations. Equity return allowances of this magnitude would be viewed by investors as unsupportive of the Company's financial condition. Rather, based on the factors listed below, and for technical reasons set forth later in my rebuttal testimony, the Commission should adopt a substantially higher equity return for Duquesne Light.}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\section*{Q. Are there additional issues that the Commission should consider when setting the Company's return?}
A. Yes. The investment community would be very concerned if the Commission were to adopt either of the positions of the I\&E or OCA. If it were to do so, investors would see Pennsylvania regulation as less supportive of the Company at a time of high levels of capital investment. At present, Pennsylvania regulation is currently ranked Above Average/3 by Regulatory Research Associates ("RRA"), which reflects an upgrade that occurred on May 10, 2017. The rating system used by RRA includes three principal categories (i.e., Above Average, Average and Below Average with more refined positions within the categories designated by the numbers 1,2 and 3 ). If the Commission were to follow the proposals of I\&E or the OCA, the regulatory ranking of Pennsylvania would certainly be jeopardized. The return on equity used by the Commission to set rates embodies in a single numerical value a clear signal of regulatory support for the financial strength of the utilities that it regulates. Although cost allocations, rate design issues, and regulatory policies relative to the cost of service are important considerations, the opportunity to achieve a reasonable return on equity represents a direct signal to the investment community of regulatory support (or lack thereof) for the utility's financial strength. In a single figure, the return on equity utilized to set rates provides a common and widely understood benchmark that can be compared from one company to another and is the basis by which returns on all financial assets (stocks - both utility and nonregulated, bonds, money market instruments, and so forth) can be measured. So, while varying degrees of sophistication are required to interpret the meaning of specific Commission policies on technical matters, the return on equity figure is universally understood and communicates to investors the types of returns that they can reasonably

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL} expect from an investment in utilities operating in Pennsylvania.

\section*{Q. How do the cost of equity proposals by Mr. Garrett and Mr. Keller compare to the utility returns recently authorized by the Commission?}
A. Technical disputes about methodology and data aside, the proposed costs of equity proposed by Mr. Garrett and Mr. Keller are simply not representative of the return investors can earn on other investments of comparable risk, including investments in other electric utilities like Duquesne Light. Indeed, the Commission established a 9.85\% equity return for the UGI Utilities Electric Division rate case at Docket No. R-2017-2640058. With rising capital cost rates, a higher, not lower, equity return is required in this case. The Commission also granted equity returns of \(9.54 \%\) for Citizens' Electric Company at Docket No. R-2019-3008212, \(9.31 \%\) for Wellsboro Electric Company at Docket No. R-2019-3008208, 9.73\% for Valley Energy at Docket No. R-2019-3008209, 9.86\% for Columbia Gas of Pennsylvania at Docket No. R-2020-3018835, 10.8\% for PennsylvaniaAmerican Water Company at Docket Nos. R-2020-3019369, R-2020-3019371¹, and most recently \(10.24 \%\) for PECO Energy Company - Gas Division at Docket No. R-20203018929. With respect to the Columbia, PAWC, and PECO Energy cases, these equity returns were established when the conditions of the COVID-19 pandemic were heightened in comparison to where the Duquesne Light case stands now. Moreover, for purposes of setting the Distribution System Improvement Charge ("DSIC"), the Commission has set a

\footnotetext{
\({ }^{1}\) The Commission's Opinion and Order in this case held that "We agree with the ALJ's rationale and recommendation on this is sue, approving, as contained within the Joint Settlement, the Company's application of traditional ROE models and its analysis of current market conditions." Pa. PUC, et al. v. Pennsylvania-American Water Company, Docket Nos. R-2020-3019369 (W ater), R-2020-3019371 (W as tewater), at p. 62 (Opinion and Order entered Feb. 25, 2021).
}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
9.45\% equity return for electric utilities. In the DSIC proceedings, DSIC recoveries are reconciled and therefore the \(9.45 \%\) is guaranteed. In contrast, the equity return set in a base rate case is an opportunity to earn an allowed equity return and should be higher than the DSIC equity allowance.

The rates of return on common equity of \(8.50 \%\) proposed by Mr. Garrett and \(9.24 \%\) proposed by Mr. Keller are seriously deficient and will not provide Duquesne Light with the opportunity to earn its investor required cost of capital for the fully projected future test year ending December 31, 2022 ("FPFTY"). As explained below, this is not the time for the Commission to be reducing the Company's authorized return when there is a compelling need for capital investment to rehabilitate aging infrastructures and increasing capital costs.
Q. You just mentioned the equity returns that the Commission set in recent rate cases. How does this compare to the proposals submitted by Messrs. Garrett and Keller in that proceeding?
A. The recent returns are substantially higher than their recommendations. The Commission should reject the proposals of Messrs. Garrett and Keller and set the Company's return in this case at a much higher level. This would be the prudent course given the trend toward higher capital costs today that have developed since February 2021. The yield on 30-year Treasury bonds moved above the \(2 \%\) level beginning in February 2021. In comparison, those yields closed out 2020 at \(1.67 \%\) for December. By June 2021, the yield on 30-year Treasury bonds had moved to \(2.16 \%\), or an increase of \(0.49 \%\) (or \(29 \%\) ). Likewise, the yield on A-rated public utility bonds has increased to \(3.16 \%\) in June 2021 from 2.77\% in December 2020 -- a 39 basis point (or \(14 \%\) ) increase. One reason that explains the higher

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
long-term interest rates can be traced to investor expectations of higher inflation. Indeed, there has been an upward burst in inflation recently following very low inflation that existed during the pandemic. Higher interest rates clearly point to higher capital costs prospectively. I will describe the Blue Chip forecast of interest rates and the continuation of this trend later in my rebuttal. Indeed, the trend is now toward higher, not lower capital costs. In this regard, I note that Mr. Keller determines his equity return recommendation of \(9.24 \%\) using his DCF. Putting aside the deficiencies of his DCF analysis, he places absolutely no weight on the results of his CAPM analysis which produces a result of \(10.37 \%\). He characterizes his CAPM analysis as a check, but does not move his recommendation at all to account for his CAPM results. In contrast, the Commission has repeatedly in its Quarterly Earnings reports increased the electric DSIC return on equity above the estimated DCF return by significant amounts based on its CAPM analysis.. See Quarterly Earnings Report issued July 15 2021, at Docket No, M-2021-3026753. This indicates that the Commission recognizes that the electric DCF model cannot be relied on solely to determine the cost of equity. Mr. Keller's simplified CAPM result of \(10.37 \%\) and the very recent award of \(10.24 \%\) in PECO Gas, and the recent rises in inflation and debt capital costs indicate the cost of equity determination for Duquesne Light should be above \(10 \%\).
Q. Is there other evidence that shows the return on equity recommendations of the opposing parties are deficient?
A. Yes. One measure of market risk is provided by the OBOE Global Markets (formerly Chicago Board Options Exchange) Volatility Index ("VIX"). This index is a gauge of volatility in the equity market and, hence, provides a measure of risk. It is well-established

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
that greater volatility indicates higher risk, which, all else equal, translates into a higher cost of equity. It is widely accepted that high readings for the VIX are often accompanied by bearish sentiment and a low VIX is associated with bullish sentiment. The trading pattern of the VIX is typically inverse to the level of stock prices. That is to say, the VIX increases when stock prices are falling and the VIX declines when stock prices rise. This situation is sometimes associated with increases in the cost of equity when the VIX increases and vis-a-versa. The overall range of the index since 1990 has been 8.56 to 89.53. The peak in the index occurred on October 1, 2008 during the Financial Crisis. The lowest VIX occurred on November 1, 2017 during the previous bull market. The recent VIX history has been:
\begin{tabular}{crr} 
Year & & Average VIX \\
\cline { 1 - 1 } 2017 & 12.12 \\
2018 & 18.46 \\
2019 & 16.33 \\
2020 & 32.21 \\
2021 YTD & 24.37
\end{tabular}

We can see that the VIX has spiked upward with the COVID-19 pandemic and the onset of the recession. While volatility in the stock market has subsided since the very beginning of the pandemic and recession, it continues to significantly exceed levels prior thereto as measured by the VIX. The current level of risk associated with common stocks, as revealed by the higher VIX in 2021, warrants a higher equity return at this time because the higher stock market volatility signifies higher risk that requires higher returns in compensation for the higher risk. Hence, the risk for common equity, which translates into the cost of equity, does not support a low equity return suggested by Messrs. Keller and Garrett.

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\section*{Q. How should the Commission view the return that it sets for the Company in order to continue to promote and encourage further accelerated replacement of aging infrastructure?}
A. Supportive rate regulation encourages public utilities such as Duquesne Light to accelerate replacement of aging infrastructure. The markets look to supportive rate regulation in assessing investment decisions. Lowering the authorized rate of return on equity to the levels proposed by Mr. Keller and Mr. Garrett will signal to investors that Pennsylvania is pulling away from its prior support for accelerated infrastructure replacement.

\section*{Q. How is the remainder of your testimony organized?}
A. I will cover the issues of (i) the composition of the proxy (i.e., barometer) group, (ii) the appropriate capital structure to be used, (iii) the weight to be given to the DCF method, (iv) the DCF growth rate, (v) the leverage adjustment to the DCF and CAPM methods, (vi) the CAPM method, (vii) the Risk Premium analysis, and (viii) Comparable Earnings.

\section*{Capital Structure}
Q. Is there a difference in the proposed capital structure ratios utilized by the rate of return witnesses in this case?
A. Yes. Mr. Garrett is alone in advocating an erroneous capital structure for Duquesne Light. Mr. Keller has accepted the Company's proposed capital structure, as it falls within the range of capital structures of the proxy group. Mr. Garrett's position is clearly contrary to long-standing Commission policy concerning capital structure ratios, most recently

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL} confirmed in the PECO Energy Company - Gas Division rate case at Docket No. R-20203018929 (Order entered July 15, 2021).

\section*{Q. What capital structure does Mr. Garrett propose?}
A. Mr. Garrett has proposed a hypothetical capital structure for Duquesne Light without ever demonstrating that the Company's proposed capital structure is unreasonable. Rather, his proposed capital structure is simply designed to lower the Company's revenue requirement. In reaching his conclusion on capital structure ratios, Mr. Garrett performed three analyses. These are: (i) a calculation of the cost of capital at various debt ratios, (ii) the debt ratios of the companies in his proxy group, and (iii) the debt ratios of thousands of other companies. He seems to favor option (ii), but does not propose a debt ratio as high as he reports for his proxy group. This approach essentially involves the use of a hypothetical capital structure that violates Commission precedent on the use of the actual capital structure. If he had referred to other rate cases decided by the Commission as guides for the selection of capital structure ratios, then he should have relied upon Duquesne Light's actual capital structure ratios.

\section*{Q. Is the re any basis to deviate from the Company's actual capital structure to set the rate of return in this case?}
A. No. First, as Mr. Keller explained (see page 60 of I\&E Statement No. 2), the Company’s actual capital structure ratio (including the \(53.35 \%\) common equity ratio) falls within the range of the proxy group. This is sufficient to meet the Commission standard that the use of actual Duquesne Light capital structure is appropriate in this case. Second, an issue not addressed by Mr. Garrett is the fact that the proxy group capital structure ratios are from

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
consolidated operations of the parent holding companies. Focusing solely on the public utility subsidiaries of these companies, the common equity ratios are quite different from the holding companies, as revealed below:
\begin{tabular}{|c|c|}
\hline Company & Average Public Utility subsidiary Common Equity Ratio \\
\hline AVANGRID, Inc. & 55.98\% \\
\hline Consolidated Edison, Inc. & 64.86\% \\
\hline Duke Energy Corporation & 53.56\% \\
\hline Eversource Energy & 53.61\% \\
\hline Exelon Corporation & 51.94\% \\
\hline FirstEnergy Corp. & 50.20\% \\
\hline MGE Energy & 62.28\% \\
\hline NextEra Energy, Inc. & 62.06\% \\
\hline Otter Tail Corp. & 54.26\% \\
\hline PPL Corporation & 55.03\% \\
\hline Public Service Enterprise Group & 54.54\% \\
\hline Average & 56.21\% \\
\hline
\end{tabular}

Supporting detail for these data are revealed on my Duquesne Light Rebuttal Schedule 1. The average common equity is \(56.21 \%\), with a range of \(51.94 \%\) to \(64.86 \%\). Hence, the common equity ratio for Duquesne Light is clearly within the range of reasonableness. That alone is sufficient to support the use of the Company's actual capital structure in this case.

Third, Mr. Garrett might also have been led to a different conclusion if he had considered the common equity ratios utilized by this Commission in recent rate case decisions. Indeed, in its Order Entered on October 25, 2018 in Docket No. R-20172640058, the Commission adopted a \(54.02 \%\) common equity ratio for the Electric Division of UGI Utilities. Furthermore, the Commission accepted a \(54.19 \%\) common

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL} equity ratio in the Columbia Gas of Pennsylvania rate case at Docket No. R-2020-3018835 (Order Entered February 19, 2021) and 53.38\% common equity ratio for PECO Energy Company - Gas Division at Docket No. R-2020-3018929 (Order Entered June 22, 2021). Indeed, the Company's proposed common equity ratio of \(53.35 \%\) is entirely reasonable based on prior Commission action. Hence, the Company's actual common equity ratio conforms to Commission policy that the actual, not hypothetical, common equity ratio should be employed.

\section*{Q. Does Mr. Garrett provide clear justification for rejecting the Company's actual capital structure and substituting a different capital structure?}
A. No. In addition to his proxy group comparisons, Mr. Garrett also performs a "quantitative analysis" that he says supports a \(55 \%\) debt ratio utilizing his \(8.50 \%\) cost of equity proposal (see Figure 18 on page 82 of OCA Statement No. 2). There are a variety of deficiencies with his analysis. First, he never establishes that his analysis is applicable for Duquesne Light in the FPFTY. Second, his assumptions regarding the "After-tax Debt Cost" are irrelevant to the ratesetting process here, because the nominal embedded cost of long-term debt is used to calculate the overall rate of return in this case. Third, the coverage ratios he employs are incompatible with the existing credit quality of Duquesne Light. Historically, Duquesne Light actually realized pre-tax interest coverage of 4.92 times on average over the period 2015-2019 (see Schedule 2 of Duquesne Light Exhibit PRM-1). His analysis shown on Figure 18 of OCA Statement No. 2 would provide only 3.88 times coverage with the \(55 \%\) debt ratio that he prefers. This would not maintain Duquesne Light's existing credit quality, which is a fundamental requirement of a fair return. In his example, a \(40 \%\) to \(45 \%\) debt ratio provides the level of coverage that equates to the

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historical experience of Duquesne Light. But this too is unreasonable, because his model suggests a \(6.66 \%\) to \(7.01 \%\) equity return, which by any standard is unreasonable. Moreover, as Company witness Milligan explains in his rebuttal testimony, DLC St. No. 14-R, Mr. Garrett failed to acknowledge the impacts of his recommendation the Company's cost of debt.
Q. Mr. Garrett also provides capital structure ratios for other industries. Is this information useful?
A. No. There is nothing useful that can be obtained from the tabulation of debt ratios shown on Figures 19 and 20 of OCA Statement No. 2. Mr. Garrett has never established a nexus between the debt ratios he provides and the cost of equity. It is not appropriate to compare the debt ratios for thousands of diverse companies to Duquesne Light, without first establishing some level of comparability of these companies to the Company or the utility barometer group.

\section*{PROXY GROUP}
Q. Are there differences in the proxy groups utilized by the rate of return witnesses in this case?
A. Yes. Mr. Keller makes additions and deletions to my proxy group, while Mr. Garrett accepts my proxy group. Mr. Keller describes his criteria on page 55 of his direct testimony (I\&E St. No. 2). He includes six of the same companies that I included and, excludes five of my original companies. He makes nine other additions based on his criteria.

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
Q. How do the revenue percentages compare for the members of your Electric Group
in this case?
A. I have provided the Percentage of Regulated Revenues, Income and Assets for my Electric Group in Duquesne Light Rebuttal Schedule 2. There, I have shown that regulated revenues for each of the members of my Electric Group were \(51 \%\) and above. The average for the Electric Group is \(84 \%\). The earnings and assets for my Electric Group were also all above \(50 \%\). Hence, there is no basis to alter my Electric Group in this case because all companies fit the \(50 \%\) revenue criteria recently adopted by the Commission in its PECO Energy - Gas Division order (see Docket No. R-2020-3018929, Order entered July 15, 2021, pp. 137-138).
Q. But Mr. Keller excludes five of your companies because the \(y\) fail a variety of his selection criteria. Please respond.
A. Mr. Keller excludes Exelon because he says it fails his \(50 \%\) criteria of utility revenues. My rebuttal Schedule 2 shows that Exelon does not fail that criteria. The reason for the discrepancy rests with differences in the source data used for analyzing the business segments of Exelon. Mr. Keller utilized S\&P Global Market Intelligence segment analysis, while I employed the SEC Form 10-K in my analysis. Unfortunately, the S\&P source shows a total revenue percentage that equals \(110.06 \%\) of consolidated revenues for Exelon. The total of the percentage cannot exceed \(100 \%\). The discrepancy can be traced to intersegment elimination, which have been ignored in the \(\mathrm{S} \& \mathrm{P}\) analysis. Making that correction leads to the conclusion that Exelon is a valid member of the proxy group, as shown by my data. As to Avangrid, there is no reason to exclude it because it is the

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acquiring company in the PNM Resources transaction. In the situation of most merger and acquisition ("M\&A") transactions, only the target company should be excluded from the barometer group. It is the target company in a takeover whose stock price usually does not reflect its underlying fundamentals. For example, this is revealed by the premium offered by Avangrid to acquire the stock of PNM in the M\&A transaction. That premium was \(10 \%\) over the share price of PNM on the day prior to the announced acquisition and \(19.3 \%\) premium over the 30 -day average price. In this situation, the acquiring company, i.e., Avangrid, is not so affected and it continues to be an appropriate member of the Electric Group. Moreover, Mr. Keller did not exclude PPL Corporation from his barometer group even though it is disposing of its United Kingdom utility investment. Finally, a significant number of Mr. Keller's companies operate predominately in fully regulated integrated utility markets (e.g. American Electric Power, Dominion Energy, Duke, Entergy, Portland General Electric, and Xcel), which would disqualify them for membership in the barometer group under his criterion \#6.

\section*{COST OF COMMON EQUITY - DISCOUNTED CASH FLOW (DCF)}

\section*{Q. The DCF model has been used by Mr. Keller, Mr. Garrett and you as one method to measure the cost of equity. What is your position concerning the usefulness of the DCF method?}
A. While the results of a DCF analysis should certainly be given weight, the use of more than one method provides a superior foundation for the cost of equity determination. Since all cost of equity methods contain certain unrealistic and overly restrictive assumptions, the use of more than one method will better capture the multiplicity of factors that motivate investors to commit capital to an enterprise (i.e., current income, capital appreciation,

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
preservation of capital, level of risk bearing). The simplified DCF model makes the assumption that there is a single constant growth rate, there is a constant dividend payout ratio, that price - earnings multiples do not change, and that the price of stock, earnings per share, dividends per share and book value per share all have the same growth rate. We know from experience that those assumptions are not realistic, because the stock market reveals performance that is very different from the assumptions of the DCF. \({ }^{2}\) Therefore, he use of multiple methods provides a more comprehensive and reliable basis to establish a reasonable equity return for Duquesne Light than does sole reliance on the DCF. The Commission has acknowledged the usefulness of other methods, such as CAPM and Risk Premium, as a check on the reasonableness of the DCF return. As I noted earlier in this testimony, the influence of other methods must have an impact on the Commission's attitude toward the DCF model as applied to electric utilities because the Commission's selection of the rate of return on equity for use in the DSIC is usually set well above the cost of equity indicated by the DCF model alone. For example, in the Quarterly Earnings Report at Docket No. M-2021-3025288, the Commission set the DSIC return at 9.45\% for the Electric Distribution Companies, while the DCF returns were just \(8.47 \%\) using current stock prices and \(8.72 \%\) using 52 -week average stock prices. It is clear that the Commission has been guided by the results of other models and other factors aside from DCF when setting the DSIC return. As an apparent check on the reasonableness of the DCF result, the CAPM result of \(10.67 \%\) for the Electric Company Barometer Group was calculated in the Commission's Quarterly Earnings Report dated May 6, 2021 (Docket Number M-2021-3025288).

\footnotetext{
\({ }^{2}\) The growth rate variables shown on Schedules 8 and 9 of Duques ne Light Exhibit PRM-1 shows that the as sumption associated with the simplified DCF model are not reas onable.
}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\section*{Q. What form of the DCF model has been employed in this case?}
A. The constant growth form of the DCF model has been used by Mr. Keller, Mr. Garrett, and me.
Q. Do the DCF results proposed by Mr. Keller provide a reasonable representation of the cost of equity?
A. Not in my opinion. The principal purpose of assembling a barometer group is to avoid relying on data for a single company that may not be representative and to thereby smooth out any abnormalities. That said, when some of the DCF results for companies in the barometer group are unreasonable on their face, the reliability of the method being used, or the witness' application of that method, must be questioned. Mr. Keller himself realizes that some of his results are unreasonable on their face. For example, he removes from his barometer group the negative growth rates for FirstEnergy Corp. and PPLCorporation. Yet, he leaves in the results for a variety of companies that clearly fail the reasonableness test. As indicated below, DCF results fall into that category using data contained in I\&E Exhibit No.2:
\begin{tabular}{|c|c|c|c|c|}
\hline \multirow[t]{2}{*}{Company} & \multicolumn{4}{|l|}{\begin{tabular}{l}
Average: \\
52 wk \&
\end{tabular}} \\
\hline & Spot Yie & + & Growth & Total \\
\hline Consolidated Edison, Inc. & 4.21\% & + & 2.96\% & 7.17\% \\
\hline IDACORP, Inc., & 3.25\% & + & 3.70\% & 6.95\% \\
\hline Public Service Enterprise & 3.65\% & + & 3.34\% & 6.99\% \\
\hline
\end{tabular}

It is a fundamental tenet of finance that the cost of equity must be higher than the cost of debt by a meaningful margin to compensate for the higher risk associated with a common

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL} equity investment. Yet, each of the companies listed above have DCF returns calculated by Mr. Keller that fail to provide a sufficient spread over the six-month average yield of \(3.21 \%\) on A-rated public utility bonds, or the June 2021 yield that was \(3.16 \%\). As I have demonstrated in my direct testimony (Duquesne Light St. No. 9 at pages 39-40), the spread between the cost of debt and cost of equity should be \(6.75 \%\) in this market environment. As such, none of the returns listed for the three companies above comes close to meeting this standard, which indicates a cost of equity of at least \(9.96 \%(3.21 \%+6.75 \%)\).

\section*{DCF GROWTH RATE}

\section*{Q. As to the DCF growth component, what financial variables should be given greatest weight when assessing investor expectations?}
A. The theory of the DCF holds that (1) the value of a firm's equity (i.e., share price) will grow at the same rate as earnings per share with a constant P -E ratio and (2) dividend growth will equal earnings growth with a constant payout ratio. Therefore, to properly reflect investor expectations within the limitations of the DCF model, earnings per share growth, which is the basis for the capital gains yield and the source of dividend payments, must be given greatest weight. The reason that earnings per share growth is the primary determinant of investor expectations rests with the fact that the capital gains yield (i.e., price appreciation) will track earnings growth with a constant price earnings multiple (a key assumption of the DCF model). It is also important to recognize that analysts' earnings growth rate forecasts significantly influence investor growth expectations. Moreover, it is instructive to note that Professor Myron Gordon, the foremost proponent of the DCF model in public utility rate cases, has established that the best measure of growth for use

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
in the DCF model are forecasts of earnings per share growth. \({ }^{3}\) These growth rates relate specifically to each company whose cost of equity is being analyzed.

\section*{Q. Please summarize the DCF growth rate analysis performed by Mr. Keller.}
A. As shown on pages 70-71 of I\&E Statement No. 2, Mr. Keller proposes a growth rate of \(5.46 \%\), based on his review of analysts' projected earnings growth rates. To reach this growth rate, Mr. Keller removed the anomalous (i.e., negative) growth rates, otherwise his growth rate would have been just \(4.83 \%\). But he should have gone farther by analyzing the resulting DCF returns for each company to see if the results ae reasonable. My tabulation shown above indicates that many results are not reasonable.
Q. In his direct testimony, Mr. Garrett ignores any growth rates that are specific to his proxy group of companies. Does this follow the traditional approach for applying the DCF model?
A. No. While Mr. Garrett acknowledges that various sources exist for company-specific growth rates, i.e., \(\underline{\text { Zacks, }} \underline{\text { Value Line, and Bloomberg, he does not look at them, nor does }}\) he incorporate them into his DCF analysis. His approach is certainly alien to all DCF analysis that is familiar to the Commission. On this basis alone, the Commission should dismiss the DCF analysis submitted by Mr. Garrett in this case. I say this because, as I

\footnotetext{
3 "Choice Among Methods of Estimating Share Yield," The Journal of Portfolio Management, Spring 1989 by Gordon, Gordon \& Gould. "We have compared the accuracy of four methods for estimating the growth component of the discounted cash flow yield on a share: past growth rate in earnings (KEGR), past growth rate in dividends (KDGR), past retention growth rate (KBRG), and forecasts of growth by security analysts (KFRG)...we have three observations to make. First, the superior performance by KFRG should come as no surprise. All four estimates of growth rely upon past data, but in the case of KFRG a larger body of past data is used, filtered through a group of security analysts who adjust for abnormalities that are not considered relevant for future growth."
}

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previously explained, Myron Gordon established that analysts' forecast of earnings growth are the correct input for the DCF for each member of the proxy group.

\section*{Q. Do the DCF growth rates proposed by Mr. Garrett provide a reasonable input in the cost of equity analysis using the DCF model?}
A. No. Mr. Garrett indicates that his method for selecting the growth rate component of the constant growth DCF rests on: (i) nominal GDP, (ii) real GDP, (iii) inflation, and (iv) the risk-free rate. There are many problems with his approach. First, the combination of the real GDP growth and inflation equals nominal GDP, i.e. \((1.018) *(1.020)=(1.0380-1=\) \(3.8 \%\). Hence, two of his input variables are double counted when he separately considers economical GDP growth. Second, the risk-free rate provides no guide of the growth that a company can realize in its earnings. Earnings growth occurs through revenue growth, net of: O\&M, depreciation, taxes, interest, and dividend payments. None of these factors are addressed with the risk-free rate of return. Third, Mr. Garrett is essentially developing a generic growth rate that would apply to any, or all companies, whether they are regulated or non-regulated companies. We all know that each company has a unique companyspecific growth rate. His approach is simply incompatible with the basic concept of the DCF, where future cash flows for each company are systematically related to one another by a constant growth rate. It is also incompatible with the use of the growth rates of a comparable barometer group of companies to meet the requirement that a utility is to be permitted the opportunity to earn a return equal to comparable companies. Remember, the DCF equation is \(\mathrm{P}=\mathrm{D} /(\mathrm{k}-\mathrm{g})\). Mr. Garrett's growth rate does not fit within this equation because it is not establishing a growth rate for comparable companies.

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> Q. What DCF results would be useful from the evidence submitted by Messrs. Keller and Garrett?
> A. The only DCF results that are useful here are the results supplied by Mr. Keller consisting of: Ameren, AEP, CMS, Dominion, Duke, Entergy, Eversource, First Energy, Northwestern, Portland, PPL Corporation, and Xcel Energy. The average results for these companies are \(9.79 \%\), e.g., \(10.10 \%+9.82 \%+10.11 \%+10.57 \%+9.38 \%+8.35 \%+\) \(10.06 \%+12.13 \%+8.30 \%+11.02 \%+8.68 \%+8.96 \%=117.48 \% \div 12\).

\section*{LEVERAGE ADJUSTMENT}

\section*{Q. Please respond to Mr. Keller's criticism of your leve rage adjustment.}
A. In his discussion of my leverage adjustment, Mr. Keller mentions M/B ratio at page 84 of I\&E Statement No. 2. I need to be clear that my leverage adjustment is not designed to produce any particular M/B ratio. Mr. Keller offers three reasons for not making a leverage adjustment. First, Mr. Keller notes that the credit rating agencies assess financial risk in terms of a company's income statement in their analysis of the creditworthiness of a company. I agree. But this has nothing to do with my leverage adjustment. The credit rating agencies do not measure the market required cost of equity for a company. The credit rating agencies are only concerned with the interests of lenders. They are judging risk associated with a company's ability to make timely payments of principal and interest. Hence, they are not concerned with the cost of equity or how it is applied in the rate-setting context. While Mr. Keller's observation is correct, it has no relevance to my leverage adjustment.

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\section*{Q. Second, Mr. Keller also questions your leverage adjustment by reference to prior Commission orders. Please comment.}
A. Mr. Keller points to several decisions where the Commission declined to make a leverage adjustment - i.e., rate cases including Aqua Pennsylvania, the City of Lancaster Water Department, UGI Utilities - Electric Division, and Columbia Gas of Pennsylvania. The fact that the Commission declined to use the leverage adjustment in the Aqua Pennsylvania case cited by Mr. Keller does not invalidate its use. Notably, the Commission did not repudiate the leverage adjustment in the Aqua case, but instead arrived at an \(11.00 \%\) return on equity for Aqua by including a separate return increment for management performance. Just like an increment for management performance is not recognized in all rate cases, so too the Commission seems to be taking a similar approach to the leverage adjustment. As to the City of Lancaster decision, the situation there was quite different than the leverage adjustment that I propose in this case. Lancaster proposed a leverage adjustment to the cost of equity measured with the Hamada formula and applied it to the DCF result, the Risk Premium result, and the CAPM. While the Hamada formula plays a role in the CAPM, it is not applicable to the DCF or the Risk Premium measures of the cost of equity. Hence, this distinguishes the City of Lancaster approach to the leverage adjustment from mine in this case. As to the UGI - Electric Division case, there the Commission granted a management performance increment rather than a leverage adjustment when arriving at a \(9.85 \%\) equity return. Finally, in the Columbia case, the Company accepted the ALJs determination of the allowed return, which was \(9.86 \%\), without regard to the leverage adjustment. And in the PECO Energy - Gas Division rate case, the Commission observed that the level of return granted was sufficient, so that no additional increment was necessary for management effectiveness.

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\section*{Q. Third, Mr. Keller argues that investors base their decisions on the book value debt and equity ratios for regulated utilities. Please respond.}
A. Mr. Keller contends that information presented to investors, such as that included in the Value Line reports (see page 89 of I\&E Statement No. 2), argues against my leverage adjustment because investors base their investment decisions on book value. However, the Value Line reports clearly show the market capitalization of each company in his barometer group. This means that investors are well aware of the market capitalization of the electric utility stocks that Mr. Keller relies upon for his analysis of the cost of equity. More importantly, I fundamentally disagree that investors base their decisions on book values. To the contrary, it is the future cash flows that investors expect to realize that determines the price they are willing to pay for a share of common equity. Stated differently, investors are concerned with the return that will be earned on the dollars they invest (i.e., their market price) and not some accounting value of little relevance to them. The financial risk associated with the book value capital structure is different from the market value of the capitalization. I clearly demonstrate this point on Schedule 10 of Duquesne Light Exhibit PRM-1. Hence, the observation of Mr. Keller is misplaced because I have clearly shown the difference in financial risk and that risk difference must be taken into account when arriving at an equity return that is applicable to the weighted average cost of capital using book value weights.
Q. At page 89 of I\&E Statement No. 2, Mr. Keller claims that "true financial risk is a function of the amount of interest expense..." Is he correct on this point?

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A. No. Capital structure provides the correct measure of the financial risk of a firm. As Morin explained, "Financial risk stems from the method used by the company to finance its investments and is reflected in its capital structure." \({ }^{4}\) Hence, the method I used for the financial risk adjustment is entirely proper.
Q. Mr. Garrett criticized the leverage adjustment that you propose to account for the divergence of market capitalization and book value capitalization. Please comment.
A. At pages 47-49 of OCA Statement No. 2, Mr. Garrett never really refutes my leverage adjustment. Indeed, he employs my leverage adjustment approach through the use of the Hamada formula to unlever and relever betas as part of his capital structure analysis, thereby validating my approach.

\section*{COST OF COMMON EQUITY - CAPITAL ASSET PRICING MODEL}
Q. Do you have concerns regarding Mr. Keller's and Mr. Garrett's applications of the CAPM?
A. Yes. Mr. Keller's CAPM analysis understates the cost of equity for a number of reasons: (i) his use of the yield on 10-year Treasury notes, (ii) his failure to use leveraged adjusted betas, and (iii) his failure to make a size adjustment. The results of Mr. Garrett's CAPM approach are simply not credible.
Q. How does the use of the yield on 10-year Treasury notes compare with yields on longer-term Tre asury bonds?

\footnotetext{
\({ }^{4}\) Morin, Roger A., New Regulatory Finance, Public Utilities Reports, Inc., 2006, p. 45.
}

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A. The Blue Chip reports dated June 1. 2021, show this comparison. For the first quarter of 2021, the gap was \(0.75 \%(2.07 \%-1.32 \%)\) between the yields on 30 -year and 10 -year Treasury obligations. For the period 2023-2027, that gap is projected at \(0.60 \%\) ( \(3.5 \%\) \(2.9 \%\) ). This shows a systematic understatement of Mr. Keller's CAPM returns. This understatement can be traced to extraordinary monetary policy actions taken by the FOMC to deal with the recession that followed the onset of the COVID pandemic. Shorter-term rates, such as 10-year notes, respond more to the policy initiatives of monetary officials, while long-term rates, such as 30-year bonds, are more a reflection of investor sentiment of their required returns. For this reason, long-term rates, such as those revealed by 30 year Treasury bonds, should be used to measure the risk-free rate of return. Use of shorterterm rates, such as Mr. Keller's 10-year Treasury Notes yields, are more susceptible to Fed policy actions.

\section*{Q. How has Mr. Keller understated the risk-free rate of return?}
A. The support for his risk-free rate of return is shown on his Schedule 24 of I\&E Exhibit No. 2. There, he incorrectly gives the same weight to the yield on 10-year Treasury notes for the third and fourth quarters of 2021, and first, second, and third quarters of 2022, as he does for the entire five-year period 2023 through 2027. This approach leads to a seriously understated risk-free rate of return. Even if 10 -year rates are used, it is necessary to correct the weights assigned to the forecast data presented by Mr. Keller. I have revised his forecast below, based upon the Blue Chip publication dated June 1, 2021. Moreover, Blue Chip provides higher yields on Treasury obligations as the forecasts are extended into the future.

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
\begin{tabular}{|c|c|c|}
\hline Year & 10-Year Treasury Yield & \begin{tabular}{l}
10-Year \\
Treasury \\
Yield
\end{tabular} \\
\hline 2021 & 1.7\% & 2.4\% \\
\hline 2022 & 2.0\% & 2.6\% \\
\hline 2023 & 2.4\% & 2.9\% \\
\hline 2024 & 2.7\% & 3.3\% \\
\hline 2025 & 3.0\% & 3.6\% \\
\hline 2026 & 3.2\% & 3.8\% \\
\hline Average & 2.5\% & 3.1\% \\
\hline
\end{tabular}

The resulting risk-free rate of return is \(2.5 \%\) using the yield on 10 -year Treasury Notes and \(3.1 \%\) using the yield on 30 -year Treasury Bonds.

\section*{Q. How should these results be used in the CAPM?}
A. The risk-free rate of return should be calculated with the data that I present above. The size adjustment of \(1.02 \%\) must also be incorporated into the CAPM. I have corrected Mr. Keller's CAPM as indicated below using those inputs and the forecast yield on 10-year Treasury bonds:
\[
\begin{aligned}
& R f+\beta \quad(R m \quad-\quad R f)+\text { size }=K \\
& \text { Electric Group } 2.50 \%+0.86(11.68 \%-2.50 \%)+1.02 \%=11.41 \%
\end{aligned}
\]

\section*{Q. Mr. Kelle rquestions the need to adjust the CAPM results for size differences. Please comment.}
A. As a preliminary matter, it is noteworthy that CAPM provides compensation solely for systematic risk, and that the size of the Electric Group must be considered separately.

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Indeed, recent Federal Energy Regulatory Commission ("FERC") orders specifically prescribe an adjustment to the CAPM due to the size of an enterprise. \({ }^{5}\) Mr. Keller's arguments revolve around the purported distinction between regulated utilities and unregulated industrial companies (see page 92 of I\&E Statement No. 2). However, the Wong article that he relies upon was authored twenty (20) years ago, and employed data going back into the 1960s. Enormous changes have occurred in the industry since the 1960s that have fundamentally changed the utility business. The Wong article also noted that betas for the non-regulated companies were larger than the betas of the utilities. This, however, is not a revelation, because utilities continue to have lower betas than many other companies. This fact does not invalidate the additional risk associated with small size.

The Wong article further concludes that size cannot be explained in terms of beta. Again, this should not be a surprise. Beta is not the tool that should be employed to make that determination. Indeed, beta is a measure of systematic risk and it does not provide the means to identify the return necessary to compensate for the additional risk of small size. In contrast, the famous Fama/French study (see "The Cross-Section of Expected Stock Returns," The Journal of Finance, June 1992) identified size as a separate factor that helps explain returns.

\section*{Q. In recent rate case decisions, the Commission declined to make a size adjustment to the CAPM. Should the size adjustment be considered here?}
A. Yes. In several cases, the Commission concluded the adjustment for size was not necessary in utility rate regulation. In this case, it is worthy to note that the beta measure

\footnotetext{
\({ }^{5}\) See, e.g., Association of Businesses Advocating Tariff Equity, 171 FERC T[61,154 (May 21, 2020).
}

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of systematic risk does not account for the additional risk associated with small size, either for a non-regulated firm or a public utility. In addition, the studies that I have relied upon for the size adjustment utilized market-wide evidence that included public utilities. And since the last case, the FERC has incorporated the size adjustment into its CAPManalysis. For these reasons, the Commission should revisit the propriety of including a size adjustment here.
Q. How does size affect the financial performance of a small company?
A. Examples of the financial consequences of external factors that can influence the financial performance of a small company include loss of a large customer and the effect of unexpected changes in expense.
Q. Mr. Garrett has also performed a CAPM calculation in addition to his DCF analysis. Are the results of his CAPM useful in setting the Company's equity return in this case?
A. No. There are a variety of problems with Mr. Garrett's CAPM approach which makes it not useful in this case. He makes CAPM calculations that produce results of \(7.2 \%\), which on its face is simply not credible. This is shown by the Commission's Quarterly Earnings Report that produces a CAPM return of \(10.67 \%\) for the Electric Company Barometer Group that exceeded substantially the DCF return. First, Mr. Garrett uses a backward looking yield on 30-year Treasury bonds. A 30-day historical average period is not compatible with the Commission's use of forecast Treasury yields (see UGI Utilities Electric Division at Docket No. R-2017-2640058, Order Entered October 25, 2018). Second, the \(5.6 \%\) equity risk premium ("ERP") selected by Mr. Garrett is well off the

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}
mark. Mr. Keller leads data to an ERP of \(9.56 \%\) ( \(11.68 \%-2.12 \%\) ), and I determined an \(8.72 \%\) ERP. Furthermore, the implied total market return using Mr. Garrett's inputs is just \(7.88 \%(2.28 \%+5.6 \%)\), which is clearly incompatible with actual stock market returns of \(18.40 \%\) in \(2020,15.25 \%\) YTD in 2021 , and \(12.16 \%\) on average for the past 95 years (1926-2020).

\section*{COST OF COMMON EQUITY - RISK PREMIUM ANALYSIS}
Q. Do you believe the Risk Premium method provides significant evidence of the cost of equity?
A. Yes. In my opinion, the Risk Premium results should be given serious consideration. The Risk Premium method is straight-forward, understandable and has intuitive appeal because it is based on a company's own borrowing rate. The utility's borrowing rate provides the foundation for its cost of equity which must be higher than the cost of debt in recognition of the higher risk of equity (see Duquesne Light Statement 13 page 36). So, while Mr. Keller and Mr. Garrett decline to use the Risk Premium approach to measure the Company's cost of equity, it is an approach that provides a direct and complete reflection of a utility's risk and return because it considers additional factors not reflected in the beta measure of systematic risk. It is particularly useful when investors expect changes in the cost of debt prospectively, which is currently the expectation of investors, as I have explained in Duquesne Light Statement 13, pages 37-39. Indeed, the Risk Premium approach provides for direct reflection of prospective interest rates in the model and therefore should be given weight in determining the equity cost rate in this case.

\section*{Q. Please respond to Mr. Garrett's criticisms of your Risk Premium approach.}

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\begin{abstract}
A. While Mr. Garrett declines to use the Risk Premium approach to measure the Company's cost of equity, it is an approach that provides a direct and complete reflection of a utility's risk and return because it considers additional factors not reflected in the beta measure of systematic risk. In fact, it is precisely because investors consider the results of other methods that they too should be used in addition to the DCF in the development of the cost of equity in this proceeding. As I explained in my direct testimony, we are facing the prospect of increasing interest rates for the future and the market has increased yields on debt instruments. I incorporated the trend toward higher interest rates when I developed my Risk Premium cost of equity of \(10.10 \%\) ( \(3.35 \%\) interest rate on A-rated public utility bonds \(+6.75 \%\) equity risk premium).
\end{abstract}

\section*{Q. What does Mr. Keller say about your Risk Premium analysis?}
A. Mr. Keller makes the unfounded assertion that the Risk Premium and CAPM methods should only be used as a comparison to the results of the DCF method because they do not carry over from the investment decision-making process to the utility rate setting process (see page 19 of I\&E Statement No. 2). In fact, it is precisely because investors consider the results of other methods that they too should be used in addition to the DCF in the development of the cost of equity in this proceeding. Mr. Keller's assertion that the Risk Premium method does not measure the current cost of equity as directly as the DCF is similarly without foundation. As I explained in my direct testimony and earlier in this rebuttal testimony, we are facing the prospect of increasing interest rates for the future. I incorporated the trend toward higher interest rates when I developed my Risk Premium cost of equity of \(10.10 \%\). Hence, my Risk Premium cost rate is fully responsive to changing market fundamentals and the credit quality of the Electric Group.

\section*{REBUTTAL TESTIMONY OF PAUL R. MOUL}

\section*{COST OF COMMON EQUITY - COMPARABLE EARNINGS APPROACH}

\section*{Q. Please respond to the criticism of the Comparable Earnings approach.}
A. The underlying premise of the Comparable Earnings method is that regulation should emulate results obtained by firms operating in competitive markets and that a utility must be given an opportunity cost of capital equal to that which could be earned if one invested in firms of comparable risk. For non-regulated firms, the cost of capital concept is used to determine whether the expected marginal returns on new projects will be greater than the cost of capital, i.e., the cost of capital provides the hurdle rate at which new projects can be justified, and therefore undertaken. Further, given the 10-year time frame (i.e., five years historical and five years projected) considered by my study, it is unlikely that the earned returns of non-regulated firms would diverge significantly from their cost of capital.

The Comparable Earnings approach satisfies the comparability standard established in the Hope case. In addition, the financial community has expressed the view that the regulatory process must consider the returns that are being achieved in the nonregulated sector to ensure that regulated companies can compete effectively in the capital markets. Moreover, in a 1994 study that addressed the ROE issue, John Olson (then with Merrill Lynch) established that ROEs from non-regulated companies provide better assessment of investor requirements than those available for regulated utilities. \({ }^{6}\)

\footnotetext{
6 "Natural Gas: The Case for ROE Reform," John E. Ols on First Vice President, Merrill Lynch \& Co., October 11, 1994.
}

\title{
REBUTTAL TESTIMONY OF PAUL R. MOUL \\ MANAGEMENT PERFORMANCE
}

\section*{Q. Both Mr. Keller and Mr. Garrett have not recognized the performance of Duquesne Light's management in their rate of return testimony. How do you respond? \\ A. As I stated in my direct testimony, I believe Duquesne Light has performed in an exemplary manner and that performance should be recognized in this case. Mr. Garrett's lack of knowledge regarding management performance in the cost of equity merely reveals his lack of experience in Pennsylvania regulation by the Commission.}

\section*{SUMMARY}

\section*{Q. Please summarize your rebuttal testimony.}
A. It is my opinion that the equity allowances proposed by Mr. Keller and Mr. Garrett significantly understate the cost of common equity for Duquesne Light. In an environment of prospectively higher interest rates and Company-specific risk factors, an opportunity to earn a cost of equity of \(10.95 \%\), including recognition of management performance, is reasonable for Duquesne Light. Furthermore, Mr. Garrett's capital structure proposal should be rejected for all the reasons previously stated. Indeed, Duquesne Light capital structure proposed by the Company is entirely reasonable for this case. Finally, recognition of the exemplary performance of the Company's management should be recognized by the Commission.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes, it does.

\section*{BEFORE THE}

\title{
PENNSYLVANIA PUBLIC UTILITY COMMISSION
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\author{
Docket No. R-2021-3024750
}

\section*{Duquesne Light Company}

Statement No. 14-R

\section*{Rebuttal Testimony of James Milligan}

Date: July 26, 2021

\section*{REBUTTAL TESTIMONY OF JAMES MILLIGAN}
Q. Please state your full name and business address.
A. James H. Milligan, 411 Seventh Avenue MD 7-3, Pittsburgh PA 15219.
Q. On whose behalf are you testifying?
A. Duquesne Light Company ("Duquesne Light" or "Company").
Q. What is your position at Duquesne Light Company?
A. I am the Treasurer.
Q. Did you previously submit direct testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, Exhibit 5, Statement No. 14, on April 16, 2021.
Q. What is the purpose of your rebuttal testimony regarding Duquesne Light's proposed general base rate increase?
A. My rebuttal testimony will respond to the following issues raised in the direct testimony of intervening parties in this proceeding:
1. The capital structure proposal presented by Office of Consumer Advocate ("OCA") witness David J. Garrett, Statement No. 2.
2. The revenue reduction proposal presented by Office of Consumer Advocate ("OCA") witness Lafayette K. Morgan, Statement No. 1.
Q. Are you sponsoring any Exhibits along with your rebuttal testimony?
A. Yes, I am sponsoring Exhibit JHM-1-R, a Moody's Credit Opinion dated June 23, 2021.

\section*{I. CAPITAL STRUCTURE PROPOSAL}
Q. Please summarize the OCA's position regarding the Company's proposed capital structure.
A. David J. Garrett on page 3 of Statement No. 2 argues that the Company should receive an imputed capital structure of \(50 \%\) equity and \(50 \%\) debt. Mr. Garrett argues that this is necessary because Duquesne Light's actual equity capitalization is- allegedly above the average of the proxy group, which is \(52 \%\) debt and would lower costs charged to customers (OCA St. No 2, p. 3, lines 21-25). However, as Mr. Moul explains in his rebuttal testimony on page 9 (DLC St. No. 13-R), Mr. Garrett's analysis of the proxy group is flawed, and he does not demonstrate that the Company's proposed capital structure is unreasonable.
Q. Do the rating agencies consider the amount of debt capitalization when assigning a credit rating?
A. Yes. Higher amounts of debt increase the amount of financial risk of a company. The amount of debt is one of the primary quantitative criteria when assessing financial strength and developing a credit rating for a company and its debt. In its June 23, 2021 Credit Opinion (Exhibit JHM-1-R), Moody's indicated it expects Duquesne Light's debt capitalization to remain within its historical range to maintain its A2 rating. However, this is one of many criteria considered. The rating agencies also consider qualitative criteria, such as market position and the supportiveness of the regulatory environment in which it is located.
Q. Does Mr. Garrett consider these other crite ria in assessing the Company's ability to increase its debt capitalization and maintain its current credit ratings?
A. No, there is no discussion regarding these other attributes and the impact of increasing the debt capitalization on the Company's credit ratings.
Q. Could an incre ase in the amount of de bt for the Company negatively impact its credit ratings?

Yes, as noted, higher debt increases financial risk and could result in a downgrade of the Company's ratings. In addition, the agencies may view the change from the Commission's practice of using the actual capital structure to an imputed capital structure, even though the Company has demonstrated a reasonable capital structure both in comparison to its peers and also to historical levels, to be less supportive. A perception of a less supportive regulatory environment by the rating agencies could further exacerbate the risk of a downgrade for the Company.
Q. Would increasing the amount of debt in Duquesne Light Company's capital structure incre ase the cost of debt?
A. Yes. As noted, higher amounts of debt increase the amount of financial risk of a company. As a result, a debt investor would require a higher interest rate to compensate for the risk. This is exactly the risk that is being reflected in a credit rating. Mr. Garrett agrees on page 79 of his testimony that "increasing the debt ratio will increase the cost of debt". In fact, Mr. Garrett illustrates that a downgrade of just one notch from the Company's current A3 and \(\mathrm{BBB}+\) ratings would increase the cost of debt by \(0.38 \%\).
Q. Does Mr. Garrett adjust the Company's actual cost of debt to reflect this higher cost related to the risk inherent in a capital structure with greater risk?
A. No. Mr. Garrett does not make an adjustment for the increased cost of debt in his rate of return calculation.

\section*{I. REVENUE REDUCTION PROPOSAL}
Q. Please summarize the OCA's position regarding the Company's proposed revenue requirement.
A. In contrast to the Company's \(\$ 85.8\) million net revenue increase request, OCA recommended a revenue decrease of \(\$ 2.8\) million, based on both the imputed capital structure recommended by Mr. Garrett as well as several other adjustments.

\section*{Q. How would the rating agencies view a re venue requirement reduction for Duquesne Light?}
A. As noted, the rating agencies consider qualitative criteria, such as the supportiveness of the regulatory environment, in its credit ratings evaluation. As an example, Moody's applies \(25 \%\) of its total scoring criteria to regulatory framework and \(25 \%\) of its total scoring criteria to a utility's ability to recover costs and earn returns. So, in total, \(50 \%\) of Moody's credit ratings criteria for a regulated utility is influenced by the regulatory environment.

I noted in my initial testimony that currently both Moody's and Standard \& Poor's view Pennsylvania as supportive and constructive. The Company's ability to earn a fair and reasonable return and reduce regulatory lag is supportive to the Company's existing investment grade credit ratings.

A reduction in revenue requirement for Duquesne Light following several years of investment would be viewed negatively. This is especially true given that financial metrics have already been negatively impacted by the COVID-19 pandemic, as described in my original testimony. In its June 23, 2021 Credit Opinion, Moody's noted that a factor that could lead to a downgrade of the Company is if the Company's "Regulatory jurisdiction becomes less credit supportive such that regulatory lag increases or cost recovery is negatively affected" (Exhibit JHM-1-R).

Considering the above, a reduction in revenue requirement would be viewed negatively by the rating agencies, which could negatively impact the ratings of Duquesne Light Company and ultimately increase the cost debt and equity for the Company.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes, it does.

\section*{BEFORE THE}

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PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 15-R

\section*{Rebuttal Testimony of Howard S. Gorman}

Dated: July 26,2021

\section*{SECTION I- INTRODUCTION AND PURPOSE OF TESTIMONY}

\section*{Q. Please state your name and occupation.}
A. My name is Howard Gorman.

\section*{Q. Have you previously submitted testimony in this proceeding?}
A. Yes, I submitted Direct Testimony on April 16, 2021, on behalf of Duquesne Light Company ("DLC" or "Company") in this proceeding before the Pennsylvania Public Utility Commission ("Commission"). My testimony described the jurisdictional separation studies (each a "JSS") and the unbundled, allocated cost of service study ("ACOS") that I prepared for DLC to comply with the Commission's Data Filing Requirements ("DFR"), specifically DFR IV-E-1. The purpose of the JSS was to separate DLC's total annual revenue requirement, after eliminating revenues and costs attributed to providing supply service, between the portion subject to the jurisdiction of the Federal Energy Regulatory Commission ("FERC"), i.e., the transmission revenue requirement, on the one hand, and the portion subject to the jurisdiction of the Commission, i.e., the distribution revenue requirement, on the other hand. The purpose of the ACOS was to assign, on a cost-causation basis, DLC's distribution revenue requirement among the rate classes in its Tariff. Abbreviations used in this Rebuttal Testimony have the same meaning as in my Direct Testimony.
Q. What is the purpose of your Rebuttal Testimony?
A. My Rebuttal Testimony will respond to the Direct Testimony of the following witnesses in the following areas:
- Pennsylvania Office of Small Business Advocate ("OSBA") Witness Knecht regarding the Company's ACOS study, including classification of Primary Distribution plant and alleged double-counting of non-residential loads. I will also address the cost allocation study submitted by OSBA.
- Pennsylvania Office of Consumer Advocate ("OCA") Witness Watkins regarding allocation of Secondary Distribution plant. I will also address the two alternative cost allocation studies that Mr. Watkins presented.
Q. Was the methodology used to prepare the ACOS the same as in the past?
A. Yes. The methodology used in the Company's ACOS in the present rate case is the same as in last four rate cases (R-2006-00061346; R-2010-2179522; R-20132372129; R-2018-30000124), and the development of the allocators in those rate cases was also the same.
Q. Other than the OSBA and the OCA objections stated above, did any other party object to the Company's ACOS?
A. No. The Company's ACOS was accepted explicitly or implicitly by all other parties. In fact, no party objected to the Company's ACOS in the cases referred to above, except for OCA, which has consistently opposed any customer compone nt of the distribution system (another party in 2018 shared OCA's concerns but did not object to the ACOS); and Wal-Mart in 2010, which asked the Commission to order the Company to classify a portion of primary as demand, however the Commission did not do so.

In this case, I\&E did not raise any objections to the Company's ACOS, and I\&E and other parties relied on it for their rate design testimony.
Q. Are you presenting any exhibits with your testimony?
A. Yes, I am presenting the following exhibits:

Exhibit 6-1 (R) JSS for the FPFTY
Exhibit 6-2 (R) Summary of revenue requirement for each rate class
Exhibit 6-4 (R) Customer charge costs- Summary
Exhibit 6-10 (R) Proposed Revenue Allocation
Q. What changes are reflected in the exhibits listed above?
A. Each exhibit presents the same information as the corresponding exhibit in the original filing. The following changes are reflected in these exhibits:
- The total revenue requirement was updated to \(\$ 1,035.9\) million, as presented by Mr. O'Brien in Duquesne Light Statement No. 4-R. The line item components of the revenue requirement were also updated. As a result of these changes, the Distribution revenue requirement is \(\$ 653.9\) million.
- Exhibit 6-10 (R) presents the revenue allocation sponsored by Company witness Mr. Ogden, Statement No. 16-R, as well as the measures of revenue allocation that Mr. Ogden discusses in his rebuttal testimony.
Q. What comments did OSBA witness Mr. Knecht have on the Company's ACOS (DLC Exhibit 6)?
A. Mr. Knecht provided a lengthy and scholarly review of the purpose of cost allocation studies. He raised two objections to the Company's ACOS:
- The claim that Primary Distribution Plant should not be classified \(100 \%\) Demand, but should have a Customer component (OSBA St. 1, p. 11).
- The claim that in the Company's ACOS "non-residential loads are assigned a full share of all overhead and underground plant, while residential customers are assigned a disproportionately small share of underground plant", and the further claim that this "appears to inequitably double-count non-residential loads" (OSBA St. 1, p. 14).

\section*{Classification of Primary Distribution}
Q. What is the basis for OSBA's claim that Primary Distribution has a customer component?
A. OSBA states that "...traditional industry practice and relatively recent Commission decisions imply that primary system costs should also include a customer component and a demand component" (OSBA St. 1, p. 11).
Q. In the DLC cases cited above, since 2006, did the Company consistently classify Primary Distribution as \(\mathbf{1 0 0 \%}\) Demand, as it has in this proceeding?
A. Yes.
Q. In those cases, did OSBA object to the Company's classification of Primary Distribution?
A. No.
Q. What were the is sues in the "relatively recent Commission decisions" to which Mr. Knecht referred?
A. Mr. Knecht's testimony cites Docket No. R-2012-2290597 (PPL Electric) and Docket No. R-2017-2640058 (UGI Electric). In both those cases, the only challenge to the ACOS submitted by the respective utilities was brought by OCA, and the Commission rejected OCA's requests to deny any customer component to the distribution system.
Q. Has the Commission issued any relevant orders since the two cases cited by OSBA?
A. Yes. In the Company's filing at Docket R-2018-30000124, the Company's ACOS used the same classifications as in this case. The Commission's order approving the Company's settlement was issued after the PPL and UGI cases cited by OSBA.
Q. Is the Company's ACOS consistent with the NARUC Manual?
A. Yes. I agree that the NARUC Manual ("Manual") provides guidance in this area, and the Company's ACOS is consistent with that guidance.
Q. What guidance does the Manual provide in this area?
A. The Manual explains that demand costs "are incurred to serve area load, rather than a specific number of customers" and "The customer component of distribution facilities is that portion of costs which varies with the number of customers" (Manual, p. 90).

The Manual also states that, regarding classification of distribution plant between demand and customer, "supporting data may be more important than theoretical considerations" (Manual, p. 89).

\section*{Q. How is the Company's ACOS consistent with the Manual?}
A. The Company's secondary distribution system connects customers to the system and its cost is therefore related to the number of customers; accordingly the Company's ACOS recognizes a customer component for secondary.

As for the primary distribution system, it carries electricity from the transmission system to a general area; after that the secondary system branches to connect to individual customers. The primary distribution system is designed and built to serve area loads, and the number of customers served is a minor consideration.
Q. Is it possible to compute a 'minimum size' primary conductor and to call that the customer component?
A. Yes, one could make that computation with the relevant data. For example, one could compute a 'minimum size' for transmission assets, using the smallest capacity conductor on that system. However, just because a customer component can be computed, does not make it sound to do. For example, the transmission system serves very large area loads and the cost is not affected by the number of customers. Similarly, with few exceptions, the primary distribution system does not connect to customers, and its cost is not related to the number of customers, therefore computing a 'minimum size' is mathematically possible, but meaningless.

\section*{Q. Do you have further information on this topic?}
A. Yes. The Company has converted most of its primary system from 4 kV to 23 kV . The 23 kV capacity is more than is needed to meet the loads of residential customers, but is cost-effective and allows for growth. To classify this cost as customer-related would place an improper burden on residential and other low-load customers.

\section*{Q. Is the same true for the secondary system?}
A. No. The primary system serves "area load, rather than a specific number of customers", as the Manual states. However the secondary system serves local loads and secondary conductors can be sized to meet the local loads. In addition, the end points of the secondary system branches are customers. Therefore the number of customers is a significant factor affecting the cost of the secondary system.
Q. Please summarize your support for the Company's classification of primary distribution as \(\mathbf{1 0 0 \%}\) demand-related.
A. That the Company's primary system is \(100 \%\) demand related is supported by:
- Its recent rate cases, in which no party objected to this classification, and which post-date the cases cited by OSBA.
- The NARUC Manual, because the primary system serves area load and not a specific number of customers.
- The Company's practice is to install primary conductors to meet area load, and the costs are not driven by number of customers. This practical consideration outweighs any theoretical considerations.

The Commission should accept the Company's classification of primary as \(100 \%\) demand-related, as it has done in the past.

\section*{Allocator development-Residential vs. Non-residential Loads}
Q. What is the basis for OSBA's claim that the Company's ACOS "appe ars to inequitably double-count non-residential loads"?
A. Mr. Knecht claims that "underground assets reduce the need for poles and overhead conductors", and therefore "allocation factors for poles and overhead conductors should be adjusted to reflect the fact that some load is served through underground assets". (OSBA St. 1, p. 15).

\section*{Q. Is OSBA correct in this claim?}
A. No. For the most part, the overhead system supplies all customer classes except the customers served by the Downtown network. The allocators for the overhead system do, in fact, remove the Downtown network loads and customer counts (Exhibit 6-9E, line 72 for the allocator 'NCP-Prim-NonNet' and line 91 for 'NCP-Sec-NonNet; and Exhibit 6-9A, line 20 for 'Avg-Cust-NonNet'). And while some underground circuits other than the Downtown network do not use the overhead system, this is insignificant in terms of load or customers, and would be very difficult to quantify.

In fact, the allocators reflect the design of the Company's overhead and underground systems to the extent information is reasonably available and significant. First, the underground radial system is fed from the overhead system, but only a small portion of residential load, and none of the Downtown network load, is served directly by the underground radial system; therefore allocators were developed which remove this load and customers ('NCP-Prim-Radial', 'SecRadial' and 'Avg-Cust-Radial'). Second, the Underground Residential Development ("URD") conductors are allocated only among the residential classes.
Q. Please summarize your support for the Company's allocation of overhead and underground distribution being reasonably representative of the design of those systems.
A. The Company's overhead and underground system can and do feed each other, however this is not always the case. Where this is not the case (i.e., Downtown network does not use overhead assets; underground radial supplies very little of residential and none of the downtown network; and URD supplies only residential), separate allocators were developed and applied to the appropriate accounts.

\section*{Cost Allocation Studies Submitted by OSBA}
Q. Should the Commission accept the cost allocation studies submitted by OSBA (RDK WP2) and the results shown in Table IEc-2 of Mr. Knecht's testimony?
A. No. Mr. Knecht states that his cost allocation study has the following changes to the Company's ACOS. For each item, I will discuss the error this creates in Mr. Knecht's cost allocation study.
- The OSBA study classifies a portion of Primary as customer-related and allocates based on customer counts. As noted above, there is no customer component of the Company's primary system.
- In addition, the customer component of primary assumed in the OSBA study is likely too high, if one were to make that computation. (As noted above, a minimum system study can be performed mechanically even if the results are meaningless.) The OSBA study reflects a customer portion of primary equal to \(50 \%\) of the customer portion of secondary. However, because most of the Company's primary system has been converted to 23 kV , a minimum system study for primary would likely produce a much smaller customer component.
- OSBA's study uses the same demand allocators for all parts of the system, except for the Downtown network. That is, rather than fixing what he has identified as an issue, OSBA makes it worse by simply ignoring the fact that portions of the overhead and underground networks have different usage characteristics (as noted above, Downtown network does not use overhead assets; underground radial supplies very little of residential and none of the Downtown network; and URD supplies only residential). OSBA supports this treatment by claiming that other utilities in the Commonwealth use the same allocators for all parts of their systems, however this is not a reason to ignore the care that the Company has taken in its ACOS by developing specific allocators for different portions of its system. Most notably, OSBA does not adjust the underground radial to reflect that it serves only a very small portion of residential and none of the downtown network. This allocates a very large portion of underground radial to residential, which is not correct.
- The OSBA study uses different minimum components for overhead, underground radial, Downtown network and URD. This is not consistent with its use of the same demand allocators for most parts of the system.
- The OSBA study classifies certain costs as energy or demand related that the Company classified as customer-related. This did not affect the class cost allocation results.

To summarize, the OSBA class cost allocation study has numerous errors and is fatally flawed. Most important, the study fails to adjust the allocation of underground radial to reflect that it serves only a very small portion of residential and none of the downtown network. This allocates a very large portion of underground radial to residential, which is not correct.

For this reason and the others I discuss above, the OSBA cost allocation study should not be accepted by or relied on by the Commission.

OCA

\section*{Allocation of Secondary Distribution Plant}

\section*{Q. What comments did Mr. Watkins make regarding the allocation of Secondary Distribution plant?}
A. Mr. Watkins objected to the classification as customer-related, and the allocation based on the number of customers, of any portion of Secondary Distribution plant, based on his assertion that "the only reason why it may be appropriate to allocate a portion of distribution plant expenses based on number of customers, rather than utilization, is due to the possibility that the mix of customer classes varies significantly across the urban and suburban portions of a service territory" (OCA St. 3, p. 18). Mr. Watkins believes that if customer classes are represented proportionately throughout the service area, then no portion of costs are customerrelated and the secondary system is \(100 \%\) demand -related.

\section*{Q. Is Mr. Watkins correct?}
A. No. The Company classifies a portion of Secondary Distribution plant as customerrelated because that reflects cost causation - the cost to design and install the system is affected by the number of customers.

First, the Commission has long-recognized this cost-causation relationship, for the Company and other utilities, and has denied prior attempts by OCA to classify secondary as \(100 \%\) demand related; to my knowledge, OCA's claim has never been affirmed by this Commission.

Second, Mr. Watkins did not provide any empirical data to support his claim that the only justification for a customer-related portion of the distribution system is to recognize differences in customer density. In addition, he did not present any evidence that the minimum system approach used by the Company in this proceeding and widely accepted, is flawed.

Third, contrary to Mr. Watkins' assertion, the Company's cost allocation studies (summarized on Exhibits 6-9B and 6-9C) do reflect differences in customer densities among rate classes. The portion of the system that supplies Underground Residential Developments ("URD") was allocated only to residential rate classes. The portion of the system that supplies the Downtown Network, which serves almost exclusively non-residential load, was allocated only to non-residential rate classes.

Fourth, Mr. Watkins' assertion that the classification of a portion of the Secondary Distribution system as customer-related is an 'a priori assumption' is wrong. The number of customers that are connected to the Secondary Distribution system is an important consideration in the design and installation, and has a significant effect on cost. The fact that the end points of the secondary system are in fact customer installations illustrates this point.

Finally, Mr. Watkins claims to rely on Professor Bonbright's authoritative book, Principles of Public Utility Rates. However, Professor Bonbright clearly rejected Mr . Watkins' proposal to classify the minimum system component on a demand basis, when he wrote, "While...inclusion of the costs of the minimumsized distribution system among the customer-related costs seems to us clearly indefensible, its exclusion from the demand-related costs stands on much firmer ground'(italics added) (Principles of Public Utility Rates, Bonbright et al., pp. 491492). In other words, Professor Bonbright is saying that the cost of the minimum system should not be allocated on a demand basis. In his testimony, Mr. Watkins advocates for inclusion of the minimum system in demand-related costs, exactly what Professor Bonbright argued against. Mr. Watkins cannot simultaneously both rely upon and contradict the same authoritative source.
Q. Does Mr. Watkins offer any evidence contrary to the long-standing regulatory support for use of a minimum system study to classify distribution plant?
A. No. DLC's approach is consistent with recent cases decided by the Commission. In the following cases, the utility used a minimum system or zero intercept study to determine the customer-related component of secondary distribution, and the Commission accepted the utility's classification on this basis: PPLElectric Utilities Corporation at Docket R-2012-2290597; UGI Utilities at Docket R-2017-2640058; Citizens' Electric Company of Lewisburg, PA at Docket R-2019-3008212 and Wellsboro Electric Company at Docket R-2019-3008208. In each case, the utility classified a portion of secondary distribution as customer-related, the OCA objected, and the Commission sustained the position of the utility.

\section*{Q. Does Mr. Watkins offer any evidence contrary to the long-standing the ore tical support for use of a minimum system study to classify distribution plant?}
A. No. DLC's approach is consistent with the NARUC Manual, which states:

Distribution Plant Accounts 364 through 370 involve demand and customer costs. The customer component of distribution facilities is that portion of costs which varies with the number of customers. Thus, the number of poles, conductors, transformers, services and meters are directly related to the number of customers on the utility's system (NARUC Manual, p. 90).

Mr. Watkins identifies several factors which he claims are weaknesses of the minimum system approach (OCA St. 3, pp. 27-28); namely, that distribution equipment is sized to provide redundancy, safety and reliability, and that purchasing alternatives are present and purchases by the utility reflect economies of scale. These are not weaknesses, they are practical considerations that exist precisely because the minimum system study must be carefully designed to reflect the design and installation practices of the utility. As noted in the NARUCManual, pp. 91-92, the minimum size for each component is that "currently being installed". This permits the analyst to customize the study for the design of each utility's distribution system.
Q. What comment did Mr. Watkins's have regarding the Peak Load Carrying Capacity of the minimum system?
A. Mr. Watkins states that the Company's minimum system study did not recognize the load carrying capability of the minimum system except for Line Transformers (Ibid, p. 27-28).
Q. What is the purpose of the Peak Load Carrying Capacity adjustment?
A. As discussed in my direct testimony, the minimum size components developed for the Secondary Distribution system have the ability to carry a portion of peak load (the Peak Load Carrying Capacity, or "PLCC"). Therefore, the PLCC of OH Transformers and Radial Transformers was removed in computing the allocator for the Secondary-Demand classified portion of those assets.

\section*{Q. Please respond to Mr. Watkins' comments on the PLCC adjustment?}
A. First, I note that Mr. Watkins did not find any fault with the calculation or application of the PLCC to Line Transformers.

The PLCC adjustment was made for OH Transformers and Radial Transformers, comprising more than \(60 \%\) of Secondary Demand plant; the effect on the results of the ACOS was small.

The PLCC adjustment was not made for other Secondary Demand plant (accounts 364-367) because the detailed information needed was not readily available, and because the net book value of the demand-classified portion of secondary is less \(20 \%\) of the net book value of total secondary for those accounts, therefor the effect on ACOS results would be small.

Mr. Watkins' criticism is unfounded.
Q. Does Mr. Watkins' view reflect how Duquesne Light designs and installs secondary distribution plant?
A. No. Duquesne Light installs secondary distribution plant primarily to serve residential customers. The secondary system is supplied by the primary system and in turn, connects to customers or to very localized areas (e.g., a street). The endpoints of the secondary system attach to customers or to very localized areas, and the cost of the system is largely driven by the number of customers connected. Once connected, the capacity of the conductor is sufficient to meet the peak load in most cases. This makes intuitive sense - even if the Company were to install a string with no load capacity, most of the costs (design and labor) would remain, and the number of endpoints would be a significant factor in determining the total the cost. Upgrading to a conductor that has the capacity to meet peak loads would add only a small amount to costs.

Duquesne Light installation standards allow loads up to 50 kVa to be served by an overhead conductor and up to 150 kVa by an underground conductor, with a higher limit in the Downtown Network. Duquesne Light views the cost as fixed up to \(50 \mathrm{kVa} / 150 \mathrm{kVa}\) of capacity. Most customers can be served by \(50 \mathrm{kVa} / 150\) kVa minimum size. It is only beyond those limits that costs are variable with demand. Mr. Watkins' view does not reflect how Duquesne Light designs and installs secondary distribution plant.
Q. Please summarize the types of information provided to you by DLC.
A. DLC made available field engineers, and provided detailed records of purchases of conductors, cost information on every line transformer on its system and detailed information on meter costs and service drops. DLC also provided hourly load data for 2005-2019.
Q. Did Mr. Watkins identify any errors in the computation of the customer component of secondary distribution plant reflected in DLC Exhibit 6-9?
A. No. In discovery, Mr. Watkins requested, and DLC provided, all the workpapers that support the customer component computed for DLC. Mr. Watkins did not identify any errors in the computations.
Q. Please comment on Mr. Watkins' citation of the December 2000 NARUC report, Charging for Distribution Services: Issues in Rate Design.
A. Mr. Watkins's conclusion from this report is that the facts specific to each utility should drive the determination of whether there is a customer component of distribution plant. He then claims there should be no customer component because that is what most states do. These statements are contradictory - in the same paragraph he advises us to follow the needs of the specific utility, and also to follow the crowd.

As discussed above, the classification of a portion of the Company's Secondary Distribution system as customer-related does reflect the facts as to how the system is designed and installed, and the costs of doing so.
Q. Please summarize your rebuttal to Mr. Watkins' criticism of the Company's ACOS.
A. Mr. Watkin's criticism is based on his belief that there is no customer component to secondary distribution. The Company's ACOS has a customer component of secondary distribution. This treatment reflects cost causation because the cost is affected in large part by the number of customers connected. The Company's position reflects design considerations and is consistent with Commission precedent for the Company and for other utilities. The Commission should reject Mr. Watkins' position and should accept the Company's ACOS.

\section*{Cost Allocation Study Submitted by OCA}

\section*{Q. Please describe the allocated cost of service study submitted by Mr. Watkins.}
A. Mr. Watkins presented the results of an alternative allocated cost of service study, where he classified both primary and secondary distribution plant as \(100 \%\) demandrelated. The class rates of return produced by his study are presented in his Table 7 (OCA St. 3, p. 32). He also presents Table 8, which shows the average of class returns using the Company's ACOS and his ACOS.
Q. Should the Commission accept the allocated cost of service study submitted by Mr. Watkins, classifying all distribution plant as \(\mathbf{1 0 0 \%}\) demand-related?
A. No. As I explain above, the methodology used in that study, which classified both primary and secondary distribution plant as \(100 \%\) demand-related, is not supported by cost causation, Commission precedent or regulatory history. The Commission should reject the study presented by Mr. Watkins in Table 7.
Q. For purposes of revenue allocation, should the Commission consider the results of Mr. Watkins' study presented in his Table 7, or the average of his results and the Company's presented in his Table 8?
A. No. Both sets of returns are materially affected by Mr. Watkins' cost allocation study, which is incorrect and should be rejected by the Commission. Therefore, the Commission should also reject Mr. Watkins' proposed revenue allocation (OCA St. 3, Table 10, p. 35) because it relies on his class cost of service results. Commission should use the Company's ACOS as the basis for revenue allocation.

\section*{Customer Charges for Residential Classes}
Q. What comments did Mr. Watkins have on the proposed customer charge for residential customers?
A. Mr. Watkins computes a residential customer charge of \(\$ 8.56\) to \(\$ 8.82\) per month and recommends no change to the current \(\$ 12.50\) charge. (OCA St. 3, p. 41).

\section*{Q. Is Mr. Watkins's residential customer charge analysis correct?}
A. No. Mr. Watkins's analysis, presented at GAW-5, excludes several items that are appropriately included in the customer charge. The Commission stated in the Aqua Pennsylvania base rate case at Docket No. R-0038805 ("Aqua") that certain indirect costs may be included in the customer charge. The customer charge analysis presented in Exhibits 6-4A through 6-4F and summarized on Exhibit 6-4 follows the Commission's Order in the PPL 2012 case which was based on the Aqua Order.
Q. What costs did Mr. Watkins propose to remove from the customer charge?
A. The items Mr. Watkins removed were:
- Amortization of deferred costs for FOCUS, metering and billing, \$28.1 million or \(\$ 4.73\) per residential customer-month (Company included on Exhibit 6-9A, line 24), and
- Costs related to direct labor - A\&G account 921 costs, \(\$ 15.2\) million, Depreciation of general plant, \(\$ 5.5\) million, and Maintenance of general plant, \(\$ 2.5\) million, totaling \(\$ 23.2\) million or \(\$ 3.89\) per residential customermonth (included on Company Exhibit 6-9A, line 25).
- Other items aggregating \(\$ 2.0\) million, or \(\$ 0.33\) per residential customermonth
- Gross receipt tax on the above, \(\$ 3.3\) million or \(\$ 0.55\) per residential customer-month.
Q. Is it appropriate and consistent with Commission policy to include FOCUS, metering billing, and costs related to direct labor, in the customer charge?
A. Yes, these costs are necessary to perform the clearly customer-related activities of metering and billing. FOCUS program (related to billing) and other metering and billing costs are attributable to customers on a per-customer basis, whether recovered currently or on a deferred basis. The Company incurred these costs to automate and to improve meter reading and billing, activities that are and clearly customer-related, and allocated and recovered on a per-customer basis. Other costs ( \(\mathrm{A} \& \mathrm{G}\), and depreciation / maintenance of general plant) are necessary to support the direct labor costs associated with connecting customers and with metering and billing; for example, it would not be reasonable or equitable to include meter repair direct labor without also including the necessary support costs.

\section*{Q. Did other witnesses discuss the residential customer charge?}
A. Yes. OCA witness Colton, CAUSE-PA witness Geller and PWPTF witness Brady each objected to some aspect of the proposed residential customer charges. I\&E witness Sakaya found that customer cost components claimed by the Company are materially correct, and proposed a scale back if needed. Mr. Ogden addresses these witnesses' claims in his rebuttal testimony.

\section*{Q. Does this conclude your rebuttal testimony at this time?}
A. Yes.

\section*{BEFORE THE}

\title{
PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

\section*{Docket No. R-2021-3024750}

\section*{Duquesne Light Company}

Statement No. 16-R

Rebuttal Testimony of David B. Ogden

Date: July 26, 2021
Q. Please state your full name and business address.
A. My name is David B. Ogden. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Manager, Rates and Tariff Services.
Q. Did you previously submit direct testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, Exhibit 5, Statement No. 16, on April 16, 2021.
Q. What is the purpose of your rebuttal testimony regarding Duquesne's proposed general base rate increase?
A. My rebuttal testimony will respond to the following issues raised in the direct testimony of intervening parties in this proceeding:
1. The rate class revenue allocation proposals presented by the Office of Consumer Advocate ("OCA") witness Glenn A. Watkins, Statement No. 3, the Office of Small Business Advocate ("OSBA") witness Robert Knecht, Statement No. 1, and by the

Bureau of Investigation and Enforcement ("I\&E") witness Esyan Sakaya, Statement No. 3.
2. Rate design issues regarding the residential fixed customer charge raised by OCA witness Watkins.
3. Rate design issues regarding the residential fixed customer charge as it relates to bill impacts for low income customers raised by OCA witness Roger Colton, Statement No. 4, Pennsylvania Weatherization Providers Task Force ("PWPTF") witness Eugene Brady, Statement No. 1, and the Coalition for Affordable Utility Services and Energy Efficiency in Pennsylvania ("CAUSE-PA") witnesses Harry Geller, Statement No. 1.
4. Rate design issues regarding non-residential fixed customer charges raised by I\&E witness Sakaya.
5. Rate design questions raised by OSBA witness Knecht.
6. Certain issues related to the Company's proposed Federal Tax Adjustment Charge ("FTAC") raised by I\&E witness Wilson and OCA witness Morgan.
7. Updated Default Service cost recovery Schedule.
Q. Are you sponsoring any exhibits, parts of exhibits or responses to the Commission's filing requirements as part of your rebuttal testimony?
A. Yes. I am sponsoring the following exhibit: Exhibit DBO-1-R, which contains an updated unbundling schedule.

\section*{I. REVENUE ALLOCATION}
Q. Is the Company presenting an updated revenue allocation in this proceeding?
A. Yes. Company witness Gorman presented an updated Distribution revenue requirement of \$653,910,000, indicating a Distribution increase of \$85,528,000 (Exhibit 6-1(R)). Table DBO-1(R) below presents the Company's updated revenue allocation, as well as the measures used by the Company and proposed by the parties.
\begin{tabular}{|c|c|c|c|c|c|c|c|c|c|c|c|}
\hline \multicolumn{12}{|c|}{Table DBO-1(R)} \\
\hline Class & Revenue increaseProposed & Relative increaseProposed & Relative returnPresent & \begin{tabular}{l}
Relative return- \\
Proposed
\end{tabular} & Closer to unity? & Subsidy (receive) payPresent & Subsidy (receive) payProposed & Improved? & Susbidy \% revenuePresent & Susbidy \% revenueProposed & Improved? \\
\hline RS & 40,889 & 0.901 x & 1.005 x & 1.017 x & FALSE & 323 & 1,672 & FALSE & 0.11\% & 0.49\% & FALSE \\
\hline RH & 6,176 & 1.418 x & 0.471 x & 0.824 x & TRUE & \((3,899)\) & \((1,898)\) & TRUE & 13.28\% & 5.34\% & TRUE \\
\hline RA & 711 & 1.418 x & 0.621 x & 0.882 x & TRUE & (355) & (162) & TRUE & 10.62\% & 3.99\% & TRUE \\
\hline GS & 1,521 & 0.837 x & 1.074 x & 1.040 x & TRUE & 203 & 160 & TRUE & 1.69\% & 1.18\% & TRUE \\
\hline GM<25 & 4,983 & 0.966 x & 1.292 x & 1.192 x & TRUE & 2,572 & 2,464 & TRUE & 7.57\% & 6.32\% & TRUE \\
\hline GM>25 & 13,065 & 1.209 x & 0.879 x & 0.918 x & TRUE & \((2,851)\) & \((2,824)\) & TRUE & 3.98\% & 3.33\% & TRUE \\
\hline GMH<25 & 555 & 0.991 x & 1.034 x & 1.011 x & TRUE & 34 & 17 & TRUE & 0.93\% & 0.40\% & TRUE \\
\hline GMH>25 & 1,300 & 1.418 x & 0.601 x & 0.759 x & TRUE & (886) & (781) & TRUE & 14.55\% & 10.57\% & TRUE \\
\hline GL & 9,928 & 0.991 x & 1.152 x & 1.020 x & TRUE & 3,435 & 654 & TRUE & 5.18\% & 0.86\% & TRUE \\
\hline GLH & 1,676 & 1.499 x & 0.498 x & 0.632 x & TRUE & \((1,726)\) & \((1,851)\) & FALSE & 23.31\% & 20.38\% & TRUE \\
\hline L & 3,889 & 1.340 x & 0.979 x & 0.986 x & TRUE & (144) & (137) & TRUE & 0.74\% & 0.59\% & TRUE \\
\hline HVPS & - & 0.000 x & 137.863 x & 88.496 x & TRUE & 310 & 290 & TRUE & 95.26\% & 89.04\% & TRUE \\
\hline SE & 76 & 0.330 x & 2.149 x & 1.504 x & TRUE & 445 & 285 & TRUE & 29.07\% & 17.75\% & TRUE \\
\hline SL & 511 & 0.330 x & 2.817 x & 2.027 x & TRUE & 2,746 & 2,271 & TRUE & 27.31\% & 21.49\% & TRUE \\
\hline UMS & 246 & 1.418 x & 0.442 x & 0.706 x & TRUE & (207) & (160) & TRUE & 17.98\% & 11.42\% & TRUE \\
\hline Total & 85,528 & 1.000 x & 1.000 x & 1.000 x & & 0 & 0 & & & & \\
\hline
\end{tabular}

\section*{Q. Does the updated proposed revenue allocation meet the objectives that the Company} presented in your direct testimony, Statement 16, and discussed by other parties?
A. Yes. The revenue allocation objectives are:
- The proposed revenue allocation produces the required Distribution increase.
- Each class is moved closer to cost of service on a relative return basis, except for Rate RS, which is currently very close to cost of service and remains close to cost of service at the proposed revenue allocation.
- Increases are limited to 1.5 X times the average increase of \(15.54 \%\).
- Overall, with the exception of RS and GLH, the Company was also able to meet the OSBA's "dollar value of subsidies" and OSBA's "R-C ratio" measure. Rate

GLH is receiving a slightly larger subsidy due to limiting increases to 1.5 X average. Rate RS is discussed below.

\section*{Q. Please summarize the parties' positions regarding the Company's proposed revenue allocation.}
A. OCA and OSBA oppose the Company's proposed revenue allocation in favor of allocation methods that preference the respective customer classes they each represent. I\&E did not oppose the Company's revenue allocation methodology. In addition, OCA and I\&E propose scale-back revenue allocations if the Commission authorizes an overall increase less than the amount originally requested by the Company. Regarding scale back, OSBA recommended only that if the Company's overall increase is reduced, the reduction for Rate Class GS should be applied primarily to the energy charge, thereby retaining the Company's customer charge proposal.

\section*{Q. What is your general response to the revenue allocations proposed by OCA and OSBA?}
A. The Company's proposed revenue allocation is impartial and does not favor any rate class or customer group, whereas the revenue allocations proposed by OCA and OSBA each favor their respective customer groups, at the expense of other customer groups. The Company's proposed revenue allocation carefully balances the primary objectives of moving each rate class closer to the full cost of service on a relative return basis, and mitigating rate shock (i.e., the concept of gradualism) by limiting the distribution revenue increase to each rate class at 1.5 times the overall system average increase.

\section*{OCA Proposed Revenue Allocation}

\section*{Q. Do you agree with OCA witness Watkins's proposed revenue allocation?}
A. No. Critically, for revenue allocation (OCA St. 3, Table 10, p. 35), OCA relies on the average results of its own class cost of service study (OCA St. 3, Table 7, p. 32) along with Mr. Gorman's study in evaluating class revenue responsibility. Company witness Mr. Gorman testified that the OCA study is fatally flawed, in large part because there is no customer component for secondary distribution (DLC St. 15-R, pp. 11-13), which for residential customers under-allocates costs and overstates returns at present rates. Therefore it would be highly inappropriate and incorrect to use OCA's class cost of service study for revenue allocation. The Commission should reject the OCA's proposed revenue allocation.

\section*{OSBA Proposed Revenue Allocation}

\section*{Q. Do you agree with the OSBA's proposed revenue allocation?}
A. No. Critically, for revenue allocation (OSBA St. 1, p. 18, lines 22-24), OSBA relies on the results of its own class cost of service study (RDK WP-2, Table IEc-2). Company witness Mr. Gorman testified that this study is fatally flawed, in large part because it significantly over-allocates costs and understates returns at present rates to residential customers due to its incorrect treatment of the underground radial system (DLC St. 15-R, p. 8, lines 1-17). Therefore, it would be highly inappropriate and incorrect to use OSBA's class cost of service study for revenue allocation. The Commission should reject the OSBA's proposed revenue allocation.

\section*{Q. What measures does OSBA recommend to evaluate a proposed revenue allocation?}
A. OSBA would eliminate the Commission's use of relative returns as a measure of how well a particular revenue allocation moves classes toward cost of service. Instead, OSBA supports measuring revenue allocation using the "dollar value of subsidies" measure. However, OSBA opines that the "dollar value of subsidies" measure can also produce misleading results, and adds its "R-C ratio" as another measure. (OSBA St. 1, p. 19, lines 23-25 and p. 20, lines 7-10).
Q. Is there a single measure of the results of revenue allocation that should be used?
A. The Company and the Commission have historically used the 'relative return' method, which is a reasonable approach to revenue allocation. However, I agree that other measures may also be useful in informing revenue allocation. Mr. Knecht believes the "relative return' measure is flawed, and he proposed the "dollar value of subsidies" measure. However, he noted that this measure can produce misleading results, so he added a new measure, the "R-C" measure. (OSBA St. 1, p. 19, lines 23-25 and p. 20, lines 7-10). The Company used all three measurements in Table DBO-1(R) above.

\section*{Q. Please summarize your discussion of the OSBA revenue allocation proposal.}
A. OSBA relies on a fatally flawed cost allocation study; therefore its revenue allocation must be rejected \(a b\) initio.

Mr. Knecht acknowledges that "the Company's revenue allocation proposal is reasonably consistent with its ACOS results" and the changes he believes are needed to
address the Company's revenue allocation are "relatively modest" (OSBA St. 1, p. 20, lines 18-20). Therefore the Company's revenue allocation proposal should be accepted by the Commission if the full increase requested is authorized by the Commission, and the Company's proposal should be the basis for any scale back if the Commission authorizes a lower increase.

\section*{Scale Back Proposals}

\section*{I\&E Scale Back}

\section*{Q. How did I\&E approach revenue allocation?}
A. I\&E witness Mr. Sakaya implicitly accepts the Company's ACOS for revenue allocation purposes. He did not propose an alternative revenue allocation for the Company's full requested increase.

Mr. Sakaya did propose a revenue allocation scale back approach for two scenarios. His first proposal (I\&E Exhibit No. 3, Schedule 2) would apply if the Commission reduces the Company's request by \(\$ 16\) million. Mr. Sakaya also proposed a scale back (I\&E Exhibit No. 3, Schedule 3) if the Commission reduces the Company's request by \(\$ 45\) million.

Mr. Sakaya further suggests that the proposed Residential customer charge should be included in any scale back allocated to the Residential class. His justification is to reduce the impact of the overall increase on low usage customers by scaling back the Residential customer charge proportionally to the percentage increase granted to the Residential class. (I\&E Statement No. 3, p. 17, lines 8-9).
Q. Please discuss I\&E's revenue allocation scale back proposals.
A. Because cost of service is the "lodestar" of revenue allocation, revenue allocation proposals can be evaluated only when an underlying class cost of service analysis has been completed, reflective of the final revenue requirement. The Company believes that I\&E's scale back proposals should be evaluated using the measures shown in Table DBO-1(R) (relative return, dollar subsidy, and R-C), when the final revenue requirement is known and cost of service analysis is completed.

\section*{OCA Scale Back}

\section*{Q. Please summarize OCA witness Watkins' recommended scale-back.}
A. OCA witness Watkins recommends that his proposed class revenue allocation be scaledback proportionately across all classes such that those classes with no change in revenues (HVPS) will sustain no change in rates and each class with a recommended increase will be scaled-back proportionately (OCA St. No. 3, p. 37, lines 20-26).

\section*{OSBA Scale Back}

\section*{Q. Please summarize OSBA witness Knecht's recommended scale-back.}
A. OSBA witness Knecht only provides a recommendation for Rate GS, and states that if the Company's overall increase is scaled back, the scale back should be applied primarily to the energy-based volumetric charge, thereby retaining the Company's customer charge proposal. This recommendation is addressed below in section IV. Rate Design.

\section*{Company Position on Scale Back}

\section*{Q. What is the Company's proposed position on Scale Back?}
A. If the Commission authorizes an overall increase less than the amount requested, the Company would first prepare a fully allocated cost of service study. Then the Company would scale back the revenue allocation for each rate class using a combination of proportional reductions and judgmental adjustments. The Company would limit the distribution revenue increase for each rate class to 1.5 times the overall system average increase, and would use the measures shown in Table DBO-1(R) to evaluate the revenue allocation-relative returns, dollar values of subsidies and R-C.

Regarding the scale back specific to the customer charge, the Company would continue to request the proposed customer charge, so long as it continues to be supported within the Company's ACOS (e.g. Exhibit 6-3 and Exhibit 6-4).

\section*{II. RESIDENTIAL CUSTOMER CHARGE}
Q. Please summarize the party's issues regarding the proposed residential customer charge.
A. I\&E witness Sakaya has testified that the Company's proposed customer charge is supported by a customer cost analysis that includes direct customer costs as well as some indirect customer costs. Witness Sakaya did not submit a proposed customer cost analysis in this case, and acknowledged that any changes he would have proposed would not have resulted in customer costs that differed materially to those proposed by the Company (I\&E St. No. 3, pp 7-8).

OCA witness Watkins proposes an alternative residential customer cost analysis to develop the monthly customer charge. Mr. Watkins recommends the Company maintain the current customer charge of \(\$ 12.50\) (OCA St. No. 3, p. 41, lines 35-38 and p. 42, lines 1-7).

OCA witness Colton objects to the Company proposing to increase the residential customer charge from \(\$ 12.50\) per month to \(\$ 16.25\) per month. His concerns center mostly on his beliefs regarding the effects of a higher customer charge on low income customers, including CAP and non-CAP customers. (OCA St. 4, p. 24, lines 28-35 and p. 25, lines 12). Witness Colton recommends Mr. Watkins's customer charge proposal be adopted (OCA St. No. 4, p. 41, lines 13-16).

PWPTF witness Brady opposes any increase to the monthly customer charge. Witness Brady believes that the Company's proposal to increase the fixed cost could discourage conservation and impact a customer's ability to save money through conservation (PWPTF St. No. 1, p. 4, lines 4-13).

CAUSE-PA witness Geller recommends that the Company's proposal to increase the residential customer charge from \(\$ 12.50\) per month to \(\$ 16.25\) per month be rejected. Mr. Geller avers that the increase in a fixed charge will undermine the ability of consumers to control costs through energy efficiency, conservation, and consumption reduction (CAUSE-PA St. No. 1, p. 25, lines 14-16).
Q. Are the monthly custome rcharge computations developed by Mr. Watkins consistent with Commission policy and precedent?
A. No. Mr. Gorman shows that the alternative computations of customer charge put forth by Mr. Watkins is not consistent with Commission policy and precedent because they fail to include cost items that are directly related to and necessary for metering and billing. Mr. Watkins's computations should therefore be rejected by the Commission. (DLC Statement 15R, p. 19, lines 9-15).
Q. Do you agree with the positions of OCA, PWPTF, and CAUSE, that the increase in the residential monthly custome \(r\) charge is inappropriate for low income customers?
A. No. First, as discussed above, Mr. Gorman shows that the alternative computations of customer charges put forth by Mr. Watkins are not consistent with Commission policy and precedent and should be rejected by the Commission.

Second, the Company incurs the costs that are included in the monthly customer charge regardless of whether the customer uses electricity or not, and regardless of the level of usage. It is important that all customers pay their share of the costs they cause. While it is true that customers cannot reduce the monthly customer charge by reducing consumption, residential customers can still continue to reduce their variable ( kWh ) portion of their total bill by reducing consumption. The variable portion of an average residential non-heating customer at both current and proposed rates are within the range of \(85-87 \%\) of the total bill. The variable portion of an average residential heating customer at both current and proposed rates are within the range of \(89-90 \%\) of the total bill.
Q. What are the consumption levels for residential customers in the Company's service area?
A. Average monthly residential non-heating customer and residential electric heating customer consumption is summarized below that evidences the average monthly consumption for the past two years, for the 12-month period ending April 2021 and April 2020.

Table No. 1 Average Residential Monthly Consumption (kWh)
12 Months Ended April 2021
\begin{tabular}{|l|c|c|c|}
\hline & CAP & \begin{tabular}{c} 
Confirmed Low- \\
Income, Non- \\
CAP
\end{tabular} & \begin{tabular}{c} 
Non-Low \\
Income
\end{tabular} \\
\hline Non-Heating & 718 & 709 & 628 \\
\hline Heating & 1,021 & 983 & 856 \\
\hline
\end{tabular}

Table No. 2 Average Residential Monthly Consumption (kWh)
12 Months Ended April 2020
\begin{tabular}{|l|c|c|c|}
\hline & CAP & \begin{tabular}{c} 
Confirmed Low- \\
Income, Non- \\
CAP
\end{tabular} & \begin{tabular}{c} 
Non-Low \\
Income
\end{tabular} \\
\hline Non-Heating & 667 & 626 & 584 \\
\hline Heating & 960 & 884 & 802 \\
\hline
\end{tabular}

\section*{Q. What do you conclude from the data in Table No. 1 and Table No. 2?}
A. The data in Table No. 1 and Table No. 2 are consistent with Company experience that its CAP customers, and its low-income customers in general, tend to have above-average consumption compared to its non-low income residential customers. Accordingly, Mr. Colton is incorrect in his statement that low-income customers, on average, are likely to live in homes that consume lower levels of electricity and to be low-use customers (OCA St. 4, p. 41, lines 7-11).

\section*{Q. Would low income customers be better off at the current customer charge versus the customer charge and rate design proposed by the Company?}
A. No. On average, the Company's low-income customers would pay more if the current customer charge remained at \(\$ 12.50\) and the increase was applied solely to the volumetric charge. This is particularly true for low-income customers not enrolled in CAP, but applies also to CAP customers inasmuch as it may cause CAP customers to exhaust their maximum annual discount sooner, and would increase those customers' total bills for the remainder of the year.
Q. Please explain why CAP and confirmed low-income customers are better off under the Company's proposed residential rate design.
A. The Company has proposed a residential rate design of \(\$ 16.25\) per month customer charge and a usage charge of 7.0564 cents per kWh at the proposed revenue increase. If the current monthly customer charge of \(\$ 12.50\) per month were to remain unchanged, the variable charge would need to be 7.7060 cents per kWh to achieve the target revenue at the Company's proposed revenue allocation. Table No. 3 sets forth the distribution bill impacts for non-heating residential customers at the average usage levels shown in Table No. 1. And Table No. 2. \({ }^{1}\)

\footnotetext{
\({ }^{1}\) The monthly CAP bill impacts are exclusive of the CAP discount, and are meant to reflect the full tariff rates once a CAP customer were to exceed their annual maximum discount.
}

Table No. 3 Customer Charge Comparison and Monthly Bill Impacts for the period 12 Months Ended April 2021


Table No. 4 Customer Charge Comparison and Monthly Bill Impacts for the period 12 Months Ended April 2020


Table No. 3 and Table No. 4 both demonstrate that over the course of the past two years, the Company's rate design will result, on average, in lower costs for CAP and confirmed
low-income customers relative to non-low income customers as compared to the OCA's proposal. The Company's proposed rate design will benefit CAP customers because it will lower their budget bill amount and lower their deficiency. A lower deficiency will benefit all non-CAP ratepayers because it will reduce the amount for the Company to recover through its Universal Service Charge. Further, the Company's proposed customer charge does not eliminate the benefits of conserving. As shown by the Non-Low Income average charges, both CAP and Confirmed Low-Income customers can achieve savings by reducing usage. For these reasons, the rate design proposed by the Company should be accepted.

\section*{II. NON-RESIDENTIAL CUSTOMER CHARGE}
Q. Please summarize the party's issues regarding the proposed non-residential customer charge.
A. I\&E witness Sakaya has testified that the Company's current and proposed non-residential customer charge for rate class \(\mathrm{GM}>25 \mathrm{~kW}\) and rate class GMH exceeds the monthly customer cost determined by the company. (I\&E St. No. 3, page 11, lines 3-4). It should be pointed out that witness Sakaya has appeared to have mistakenly misconstrued GM<25 and GM>25 when making his recommendations. Witness Sakaya states "GM<25kW customer charge is not supported by the Company's customer costs analysis." (I\&E St. 3, page 9 , lines \(14-15\) ). He continues to state "GM \(>25 \mathrm{~kW}\) customer charge is supported by the Company's customer cost analysis." (I\&E St. 3, page 10, lines 1-2). He then recommends that the \(G M>25 \mathrm{~kW}\) monthly customer charge (the same charge whose
increase he stated is supported by the Company's customer cost analysis) not be increased. (I\&E St. 3, page 10, lines 21-22). Therefore, the Company believes that witness Sakaya meant to reference rate class \(\mathrm{GM}<25 \mathrm{~kW}\) and not \(\mathrm{GM}>25 \mathrm{~kW}\) when making his recommendation.
Q. Do you agree with I\&E witness Sakaya's recommendation that rate class \(\mathbf{G M}<\mathbf{2 5}\) monthly customer charge not be increased?
A. No. The Company's proposals reflect cost as supported within Duquesne Light's ACOS. As described in my direct testimony, the Company first used the customer-charge costs identified in Exhibits 6-4C and 6-4D and the demand-related costs identified in Exhibit 63, to establish the fixed monthly charges. The charges include the first 5 kW of demand. (DLC St. No. 16, page 14, lines 15-17). The Company's proposed fixed charge of \(\$ 63.00\) per month is less than the demand cost per kW for Rate \(\mathrm{GM}<25\) of \(\$ 11.68\) (Exhibit 6-3), times 5 kW (\$58.40), plus the customer-related costs of \(\$ 37.46\) (Exhibit 6-4C), for a total fixed charge of \(\$ 95.86\). As such, witness Sakaya's recommendation, as the Company understands it, should not be accepted.
Q. Do you agree with I\&E witness Sakaya's recommendation that rate class GMH monthly customer charge not be increased?
A. No. Similar to the answer given above, the Company's proposals reflect cost as supported within Duquesne Light's ACOS. As described in my direct testimony, the Company first used the customer-charge costs identified in Exhibit 6-4E and the demand-related costs identified in Exhibit 6-3, to establish the fixed monthly charges. The charges include the
first 5 kW of demand. (DLC St. No. 16, page 15, lines 9-11). The Company's proposed fixed charge of \(\$ 63.00\) per month is less than the weighted average demand cost per kW for Rate GMH of \(\$ 11.84\) (Exhibit 6-3), times 5 kW (\$59.20), plus the customer-related costs of \(\$ 51.36\) (Exhibit \(6-4 \mathrm{E}\) ), for a total fixed charge of \(\$ 110.56\). As such, witness Sakaya's recommendation should not be accepted.

\section*{IV. RATE DESIGN}

\section*{GMH and GLH}

\section*{Q. Did Mr. Knecht's testimony pose questions on rate design for GMH and GLH?}
A. Yes. The Company's GMH and GLH rate classes are heating classes. Customers on these rates are customers that would otherwise be in the \(\mathrm{GM}<25, \mathrm{GM} \geq 25\) or GL classes respectively, but whose sole method of heating is electricity. Mr. Knecht posed several questions, which I address immediately below.
Q. Please respond to Mr. Knecht's question as to why the Company should retain separate heating classes. (OSBA St. 3, p. 4)
A. The Company has had electric space heating rates for over 40 years, to serve customers whose load profiles differ from the non-heating classes. Rates GMH has had class NCP's in the winter each year 2005-2019, and rate GLH has had a class NCP in the winter in 13 of the past 15 years, and each year since 2013. The Company believes that having separate heating classes allows rate design to be tailored to these customers' load profiles. The Company would recommend that any future change to tariff structure or rate design be
revenue neutral to the Company, and be carefully evaluated as to bill impacts on individual customers.

\section*{Q. Please respond to Mr. Knecht's question as to why the he ating classes have no winter demand charges, although they are gene rally winter-peaking. (OSB A St. 3, pp. 4, 26)}
A. For the heating classes, the winter charges are based on energy \((\mathrm{kWh})\) and not on demand kW ). This stabilizes revenue for the Company and costs for customers, because winter demand for heating customers can fluctuate significantly based on weather. As noted above, the non-coincident peak used to allocate demand-related distribution costs occurs predominantly in the winter months. The winter kWh rates reflect the higher load factor for the heating classes as compared to the general service classes. The Company would be amenable to undertaking an internal review process to evaluate all or some of the following for potential consideration in a future rate case: 1) winter demand charge for heating classes, 2) phase out and merge the heating classes into non-heating classes, 3) closing the heating classes to new customers. The Company would take into consideration customer bill impacts along with customer satisfaction.

\section*{GS Class}

\section*{Q. What is Mr. Knecht's position on rate design for GS (OSBA St. 3, p. 24)?}
A. Mr. Knecht testified that the Company's proposed GS customer charges, although they would be increases over the present rates, would still be well below direct customer-related costs. He also testified that the Company's proposed customer charges are lower than those of nearby utilities, and its kWh charges are higher. He recommends that any scale back of
the revenue allocated to GS be enacted by reducing the proposed kWh charge and keeping the Company's proposed customer charge.

\section*{Q. Do you agree with Mr. Knecht?}
A. For the reasons that Mr. Knecht stated, the Company agrees that any scale back of the revenue allocated to GS be enacted by reducing the proposed kWh charge and keeping the Company's proposed customer charge.

\section*{\(\underline{G M<25 \text { and } G M \geq 25 \text { Classes }}\)}
Q. What were Knecht's comments on the rate design for GM<25 and GM \(\geq 25\) (OSBA St. 3, pp. 24-25)?
A. Mr. Knecht observed and testified that the Company's proposed GM customer charges would be below allocated cost, which would include the cost of the first 5 kW of demand, and he did not raise any objections to the proposed customer charges. Although he did not object either to the demand charge or the kWh charge, he recommended that the Company explain its rate design approach for GM, and to explain whether less should be recovered in the kWh charge and more in the customer charge, demand charge or both.

\section*{Q. Please respond to Mr. Knecht's comments on rate design for GM.}
A. Including an energy component in GM rate design has several benefits to customers and to the Company. First, it stabilizes revenue (for the Company) and costs (for customers); for such a diverse customer class, a higher demand charge could make revenue and costs more volatile, which could lead to the Company asking to place more in the customer charge, as
justified by Mr. Gorman's customer-charge costs identified in Exhibit 6-4. Secondly, as Mr. Knecht surmised, collecting revenue in the kWh rate helps low-load customers. Rate design involves careful balancing, and care must be taken to avoid large bill impacts and adverse / undesirable effects on customer groups.

\section*{IV. Federal Tax Adjustment Charge}

\section*{Q. Please summarize I\&E witness Wilson and OCA witness Morgan's concerns regarding the Company's proposed Rider No. 4, Federal Tax Adjustment Charge ("FTAC").}
A. Ms. Wilson contends that an increase in the corporate federal income tax is speculative at this time. She also contends that the Commission has recently dealt with the substantial decrease in federal income taxes under the Tax Cuts and Jobs Act of 2018 on a statewide basis and that she believes that the Commission would provide adequate and timely guidance on a future federal corporate tax rate increase (I\&E St No. 1, pp. 38-39). Mr. Morgan characterizes the Company's testimony as a criticism of the time period for the Commission's reaction to the TCJA (OCA St. No 1, pp. 30-31). Mr. Morgan is also concerned that a new tax act could have other provisions that could affect the Company. Company witness Matthew Simpson responds to these concerns in greater detail in his rebuttal testimony, DLC St. No. 12-R. I address the FTAC briefly as well to explain why a surcharge is an appropriate mechanism for the recovery or refund of costs/credits related to federal tax rate changes.

\section*{Q. Is the Company's proposed FTAC a good candidate for surcharge recovery through an automatic adjustment clause?}
A. Yes. According to "A guide to Utility Ratemaking," \({ }^{2}\) page 89, various forms of automatic adjustment clauses have been included in fixed utility tariffs in Pennsylvania for over 50 years. A prime example noted is the State Tax Adjustment Surcharge ("STAS"). The STAS permits jurisdictional utilities to recover increases (and refund) decreases in the following tax rate each year for changes in Corporate Net Income Tax; Gross Receipt Tax; and Public Utility Realty Tax. This surcharge is rolled into base rates during a rate case. As described in direct testimony (DLC St. 16, page 29, lines 17-18), the FTAC will function similar to the Company's existing STAS that already provides for adjustments to base rates for changes in state taxes.

The Company considers the FTAC a good candidate for surcharge recovery based on the following factors:
1. The estimated annual impact as reflected within Exhibit DBO-6 is significant and outside the control of the utility.
2. Fairly shares the risk of tax rate changes between the utility and its customers since the FTAC is proposed to allow for the recovery of an increased and also refund a decrease associated with a change in the federal tax rate.
3. Reduces, to the extent possible, the Company's need to apply for frequent general rate increases to account for the change in a tax rate.
4. The FTAC is proposed to be reconcilable, and subject to PUC audit.

\footnotetext{
\({ }^{2}\) Source:https://www.puc.pa.gov/General/publications_reports/pdf/Ratemaking_Guide2018.pdf.
}

\section*{V. Default Service Cost Recovery}
Q. Please explain Exhibit DBO-1-R, the update to Exhibit DBO-5 that was originally sponsored in your direct testimony.
A. Exhibit DBO-5 as presented in direct testimony reflected the then current unbundling costs for the Default Service Plan for the Period June 1, 2021 to May 31, 2025 at Docket No. P-2020-3019522. Exhibit DBO-1-R reflects an updated lower total cost for the company's filing preparation and approval process, and is reflective of accounting activity through June 30, 2021. Exhibit DBO-1-R should be considered final, and will be fixed and reconciled only for differences between projected and actual consumption. Consistent with my direct testimony, the Company will reflect the updated unbundling costs in rates effective June 1, 2022, the first effective default service supply rate change for all classes after new distribution rates become effective January 15, 2022.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes, it does.

\section*{BEFORE THE}

\title{
PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

\section*{Docket No. R-2021-3024750}

\section*{Duquesne Light Company}

Statement No. 17-R

Rebuttal Testimony of Margot C. Evere tt

Date: July 26, 2021

\section*{REB UTTAL TESTIMONY OF MARGOT EVERETT}

\section*{Q. Please state your full name and business address.}
A. My name is Margot Everett. My business address is 101 California Street, Suite 4100, San Francisco, California 94111. I am a Director for Guidehouse and will provide testimony on behalf of Duquesne Light Company ("DLC" or the "Company").
Q. Did you previously submit direct testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Exhibit 5, Statement No. 17, on April 16, 2021.
Q. What is the purpose of your rebuttal testimony regarding Duquesne's proposed general base rate increase?
A. My rebuttal testimony will respond to the following issues raised in the direct testimony of intervening parties in this proceeding:
1. Concerns regarding the Company's proposed Community Development Rider rate presented by the Bureau of Investigation and Enforcement ("I\&E") witness Ethan H. Cline, Statement No. 5; Office of Consumer Advocate ("OCA") witness Ron Nelson, Statement No. 6; and the Office of Small Business Advocate ("OSBA") witness Robert Knecht, Statement No. 1.
2. Issues related to the Company's proposed Residential Subscription Rate Pilot as presented by I\&E witnesses Christine Wilson, Statement No. 1 and Cline, Statement

No. 5; OCA witness Ron Nelson, Statement No. 6; and the OSBA witness Knecht, Statement No. 1.
Q. Are you sponsoring any exhibits, parts of exhibits or responses to the Commission's filing requirements as part of your rebuttal testimony?
A. No.

\section*{I. COMMUNITY DEVELOPMENT RIDER}
Q. Do you agree with Witness Cline's assertion that the CD Rider is discriminatory because "two similar customers under the same rate class will be charged different rates"?
A. No, for several reasons. First, a rate is discriminatory if it is unreasonable. The creation of a discount that leads to the addition of customer load that benefits all customers, because the rate covers incremental costs and creates more sales to recover the balance of revenues, is not unreasonable.

Second, other gas and electric utilities in Pennsylvania offer discounts to customers through similarly designed Economic Development rates. For example, PECO has a similar offering, termed Economic Development Rider, which provides customers a \(15 \%\) discount for five years for qualifying customers. The qualifications for the Company's Community Development Rider were designed after the PECO qualifications, including the requirements for qualification. PECO's discounted program has no sunset, meaning
any customer that meets the criteria in the future can still sign up for the full discount for the full year.

The Company's offer goes a step farther, however, by limiting the discount to nonsummer months, ensuring customers continue to receive the same price signals as existing customers during those higher load months. Further, the Company's offering limits the discount by calendar year and therefore sunsets at the end of 2026.

By way of illustration: Assume a customer has a winter bill of \(\$ 1,000\) a year and signs up for the program in January 2021. Table 1 below shows the savings profile for that customer.

Table 1: Community Development Discount Schedule
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline Col & A & B & C & D & E & F \\
\hline Row & Calendar Year & Discount & \begin{tabular}{c} 
Winter \\
Bill
\end{tabular} & \begin{tabular}{c} 
Bill \\
Savings
\end{tabular} & \begin{tabular}{c} 
Cumulati \\
ve Bill \\
Savings
\end{tabular} & \begin{tabular}{c} 
Percent \\
of \\
Savings
\end{tabular} \\
\hline 1 & Jan 2022 - Dec 2022 & \(25 \%\) & \(\$ 1,000\) & \(\$ 250\) & \(\$ 250\) & \(33 \%\) \\
\hline 2 & Jan 2023 - Dec 2023 & \(20 \%\) & \(\$ 1,000\) & \(\$ 200\) & \(\$ 450\) & \(60 \%\) \\
\hline 3 & Jan 2024 - Dec 2024 & \(15 \%\) & \(\$ 1,000\) & \(\$ 150\) & \(\$ 600\) & \(80 \%\) \\
\hline 4 & Jan 2025 - Dec 2025 & \(10 \%\) & \(\$ 1,000\) & \(\$ 100\) & \(\$ 700\) & \(93 \%\) \\
\hline 5 & Jan 2026 - Dec 2026 & \(5 \%\) & \(\$ 1,000\) & \(\$ 50\) & \(\$ 750\) & \(100 \%\) \\
\hline
\end{tabular}

This structure rewards customers who to sign up earlier. Specifically, if the hypothetical customer with \(\$ 1,000\) winter bill noted above a customer signs up in January 2022, the customer saves \(\$ 750\) over the course of the program (or \(15 \%\) of their winter bill costs over five years).

Now assume that customer signs up in January 2024. The customer now saves only \(\$ 300\), or \(10 \%\) of their costs over the three year period. Table 2 demonstrates the savings profile for that customer.
\begin{tabular}{|c|c|c|c|c|c|c|}
\hline Col & A & B & D & E=B*D & F & G \\
\hline Row & Calendar Year & Discount & \begin{tabular}{c} 
Winter \\
Bill
\end{tabular} & \begin{tabular}{c} 
Bill \\
Savings
\end{tabular} & \begin{tabular}{c} 
Cumulati \\
ve Bill \\
Savings
\end{tabular} & \begin{tabular}{c} 
Percent \\
of \\
Savings
\end{tabular} \\
\hline 1 & Jan 2022 - Dec 2022 & \(25 \%\) & \(\$ 0\) & \(\$ 0\) & \(\$ 0\) & \(0 \%\) \\
\hline 2 & Jan 2023 - Dec 2023 & \(20 \%\) & \(\$ 0\) & \(\$ 0\) & \(\$ 0\) & \(0 \%\) \\
\hline 3 & Jan 2024 - Dec 2024 & \(15 \%\) & \(\$ 1,000\) & \(\$ 150\) & \(\$ 150\) & \(50 \%\) \\
\hline 4 & Jan 2025 - Dec 2025 & \(10 \%\) & \(\$ 1,000\) & \(\$ 100\) & \(\$ 250\) & \(83 \%\) \\
\hline 5 & Jan 2026 - Dec 2026 & \(5 \%\) & \(\$ 1,000\) & \(\$ 50\) & \(\$ 300\) & \(100 \%\) \\
\hline
\end{tabular}

Third, there are several instances where similar customers pay different rates for different reasons. For example, customers with electric space heating conforming to the Company's tariffed electric heat rates (e.g., RH and RA) are given a rate break over customers without electric space heating.
Q. Please respond to Witness Cline's statement, "expecting other businesses to provide aid to new or returning businesses simply because they were on time with their electric bills and managed to keep their businesses open through the pandemic is not fair, just, or re asonable." (I\&E St. No. 5, p. 8, lines 7-9).
A. The Community Development Rider is not resulting in customers paying for the discount because the rate recovers marginal costs related to the additional customer load and only provides a discount to costs that would exist without the customer's additional load. That is, but for the customer bringing additional load to the Company's service territory, the revenue needed to recover existing costs would be collected exclusively from existing
customers. Economic Development Rates are designed to create additional sales to reduce the average rate all customers pay toward those fixed existing costs.
Q. Do you agree with Witness Cline that the community development rate creates an unfair compe titive advantage against peak load businesses (I\&E St. No. 5, p. 9, lines 10-11)?
A. No. The discount applies to a customer's peak load in non-summer months, not all months. Therefore, the community development rate customer pays the same amount for summer peak as a non-participating customer. Only participating customers with peak winter loads benefit over similar customers with winter peaks for a short period of time. This is balanced by both the added benefits to customers for their contribution to revenue, but also the addition of jobs in the same region, that could create benefits for existing businesses.
Q. Do agree with Witness Cline that the addition of custome rload creates incre ased longterm costs as the Company will add plant as it adds customers (I\&E St. No. 5, p. 11, lines \(\mathbf{8 - 1 0}\) )?
A. Yes, however this is not a reason to reject the Community Development Rate. Further, let me clarify that the type of 'plant' to be added would only be additional distribution capacity to serve this customer's load, as generation is competitive and market based in Pennsylvania, and this rate is a delivery rate. That is, the discount proposed is limited, front end loaded and designed to recover marginal capacity costs that may result from the addition of the customer's load. Witness Cline states "While I agree that, in the short term, adding one customer at incremental cost does not generally add to the fixed costs of the
system." For this reason, the discount applies only in the short run. That is, all Community Development customers convert to the full retail rate in January 2027. Further, the additional costs to 'added plant' (assumed to be distribution plant) are still covered despite the discount.
Q. Do you agree with Witness Cline's claim that "charging a dis counted rate to certain customers leaves a portion of costs unrecovered that must then be recovered from the rest of the customer base and, thus, does not align revenues with cost causation principles as to both fixed and variable costs" (I\&E St. No. 5, p. 11, lines 19-21)?
A. No. Looking at Table 1 above, if a customer signs up for the program when initiated in \(2021,80 \%\) of the discount occurs in the first three years. Second, there are no 'lost revenues' because the revenues would not exist except for the fact that the customer brings additional revenues from their added load.
Q. Witness Cline states that "the revenue shortfall from granting certain customer discounts will be recovered from other customers in the next base rate case. Even if the program ends in that case, there will be up to five years of discounts remaining where the other customers will be asked to pay for the fixed costs not recovered by dis count customers." Is this accurate?
A. No. Witness Cline appears to slightly misconstrue the program structure. As noted above, the program discount applies by calendar year, starting in January 2022 and ending in December 2026. Therefore, the program ends in 2026 unless extended in the next rate case. If the next rate case occurs in 2024, going into effect in 2025, then the discount is
only \(10 \%\) in 2025 and \(5 \%\) in 2026. Specifically, the discount is applied by calendar year, and the customer only receives the percent discount in each calendar year if they are signed up for the program in that calendar year.
Q. Witness Cline claims "small and medium businesses already have access to various sources ofaid" (I\&E St. 5, p. 8, lines 10-11), thus the proposed CD Rider is not needed. Do you agree?
A. Potential aid from other sources is not a reason to reject this option. That is, these new customers are, as noted above, taking on responsibility for paying for costs that are fixed, reducing the overall average rate for existing and fixed costs in the long run. This program has the benefit of supporting relief efforts, but has the added benefit of creating long term benefits to the Company's customers.
Q. How do you respond to Witness Cline's claim that "providing a tariff rate discount would eventually require other customers to make up lost revenues to pay for fixed costs these customers are not paying" (I\&E St. 5, p. 8, lines 12-14)?
A. First, as noted above in Table 1, \(80 \%\) of the discount occurs in the first three years, and \(93 \%\) in the first four years, because the rate starts at \(25 \%\) in the first year and is reduced to \(5 \%\) in the fifth year (i.e., 2026). Second, there are no lost revenues because the revenues from these customers would not exist if the customer did not bring load to the Company's service territory.
Q. How do you respond to Witness Knecht's contention that "any incremental revenues associated with attracting new (non-free-riding) loads appear to accrue entirely to DLC shareholders" (OSB A St. No. 1, p.28, lines 20-22)?
A. While it is true that in the short run there is the potential for revenues to increase and, given current rate recovery mechanisms, these benefits would not directly flow back to customers. However, in the longer term, these benefits will flow exclusively to customer. That is, the program is designed to provide a discount in the front years, decreasing any revenue benefit that flows to the Company between rate cases, and then decreases the discount in the later years, mostly after the next rate case, creating the maximum benefit to customers. Specifically, this program is designed to maximize the benefits to customers by creating long lasting increased energy sales that contribute to the fixed costs noted above, reducing rates for all customers.

It should be noted that the benefit of sales in excess of forecast benefit the Company, and conversely, the recovery of fixed costs attributed to sales that don't materialize are also covered by the Company. Further, even if the Company were to benefit from these increases sales in the short run, customers are not harmed and all the benefits from increased sales contributing to fixed costs in the long run accrue to all customers, not the Company.
Q. Do you agree with Witness Knecht that this program creates opportunities for "freeriders"?
A. Yes, but it should not be the basis for rejecting the rate. There is always a risk of creating customer programs that create unintended benefits to customers who would have had the
same behavior if they were not given an incentive. However, as Witness Knecht notes, there are several mitigating factors. Specifically, Witness Knecht states: "The mitigating factors are (a) any (non-free-riding) new loads will eventually benefit ratepayers in general, (b) the discounts decline and disappear over time, and (c) it does not appear that DLC is requiring any explicit contribution from existing ratepayers to fund this effort." (OSBA St. No 1, p. 29, lines 1-4). The last is the most important for the following reasons. First, the discount only applies to non-summer months, minimizing risk of excessive marginal costs to serve.

Second, as shown in Table 1 above, the discount s front end loaded, resulting in the discount occurring mostly between rate cases.

Third, as Table 1 shows, the discount is specific by calendar year, creating an incentive for customers to enroll as early as possible. These provisions insulate existing customers from any significant harm while providing them with long-term benefits that I have described.

\section*{Q. Do you support Witness Knecht's recommendation that the Commission require the Company to absorb the discount that remains in effect for the next base rate case?}
A. No. This requirement is contrary to other customer programs designed to provide benefits to all customers. That is, if the discount is reasonable, which it is because it creates a long term benefit of additional load in the region, which reduces rates for all customers, then discount should be recovered from benefiting customers.

This request would require the Company to incur additional costs to create opportunities for their customers to reduce rates. Again, the Company wants to emphasize
that these types of programs are common in the industry and provide a unique opportunity to align the goals of, and create benefits for, new customers, existing customers and the utility.

\section*{II. RESIDENTIAL SUBSCRIPTION RATE PILOT RATE}
Q. Do you agree with Witness Cline's assertion that the lack of a reconciliation for customers whose demand is be low their subscription le vel removes any incentive for reducing demand (I\&E St. No. 5, p. 16, lines 8-18)?
A. No. The program is designed to accomplish three things. First, provide an incentive for a customer to reduce their peak use to meet a targeted subscription level. Second, create an option for customers to even out their bills over the year. Lastly, to create a more costreflective rate that links customer use to the distribution costs to serve a customer. Creating a reconciliation in months where they used less than peak would under-collect costs and create cost shifting to non-participants.

It is also important to note that a customer can chose a lower subscription level than their previous year's consumption would indicate. That is, they can choose a subscription level that creates an incentive for them to reduce their peak energy use, whenever that may be, and save on their energy bill by shifting energy from one period to another. A customer on volumetric rates like those currently offered to residential customers sees no incentive to shift energy use during peak times to off-peak times.
Q. Does the proposed subscription rate pilot exclude low-income customers as claimed by Witness Cline (I\&E St. No. 5, p. 17, lines 15-19)?
A. No. The program only excludes customers enrolled in CAP, not all low-income customers.
Q. Witness Cline claims that the subscription only favors the Company if the customer consumes less than their subscription level in any month. Do you agree?
A. No. The customer benefits from rate that creates bill stability, with only some variability if the customer exceeds their subscription level. The analysis of most customers on RS shows the average subscription would be approximately 3 kW . For a customer to experience a distribution bill increase, their non-coincident peak load would have to increase \(17 \%\) over the previous year's peak.
Q. Please respond to Witness Cline's arguments regarding the difference between budget billing and the subscription rate, claiming that the subscription rate is far inferior to the budget billing option (I\&E St. No. 5, pp. 17-18).
A. Witness Cline claims the subscription plan would increase bills for low-income customers because they may not be able to afford options to reduce load. This is not a reason to reject the subscription rate. First, the rate is optional, and if a customer deems they cannot reduce energy use to save money, then they do not have to enroll in the program. Second, these customers have this same issue today, but these customers could experience even higher bills on volumetric rates because the inefficiency of a customer's home could increase costs in all months, not just the month during which the NCP occurs.

Lastly, Witness Cline claims the budget billing option is a better overall choice for customers. This may be true for some customers, but not all of them. Company witness

Neiswonger discusses customers' interest in this program further in her rebuttal testimony, DLC St. 9-R. It is important to note that this rate option is being offered because the Company wants to understand the benefits of this rate option. Simply rejecting the pilot because there may be some customers who don't benefit is not a reason to reject exploration of potentially viable alternative rate options.
Q. Do you agree with Witness Cline's claim that the subscription rate would have a negative impact on customers during an extreme weather e vent (I\&E St. No. 5, p. 21, lines 5-6)?
A. Potentially, yes. Extreme weather events have a negative impact on customers regardless of their rate option. No rate option, other than an exclusively fixed monthly charge or a weather normalization program, can remove the risk that customers experience additional costs from extreme weather.

Further, the pilot includes bill protection and thus offers an option for a customer that experiences a higher bill on the subscription rate than what they would have faced on the standard rate to revert back to the general rate and be reimbursed for the cost difference.
Q. How do you respond to Witness Cline's claim that the subscription rate is not easy to understand, particularly since customers are familiar with energy charges but not demand charges (I\&E St. No. 5, p. 22, lines 10-12)?
A. While the Company believes the subscription rate will be easy for participating customers to understand and be well accepted by customers, the purpose of the pilot is to test the acceptance of this rate and understand the implications of changes in customer behavior on
the rate (as well as operational issues). Therefore, the Company supports the implementation of a pilot to answer these questions rather than rely on speculation.
Q. Witness Cline explains that the subscription rate provides the company a guaranteed a revenue stream with no risk of lost revenue from decreased usage. (I\&E St. No. 5, p. 23, lines 18-19). Why is creating revenue stability for the Company bad for customers?
A. It is not bad for customers. Creating revenue stability for the Company means bill stability for customers as well.
Q. Please respond to Witness Nelson's testimony that this is not a load manage ment program.
A. The residential subscription rate pilot is a rate design option that the Company wants to explore to gain an understanding of whether such a rate option is beneficial for both participating and non-participating customers. The program is designed to more closely link a customer's bill with cost of serving that customer and create price signals for the customer that results in them modifying their behavior to save money. That is, this pilot acts as a load management program because it encourages the customer to reduce their peak usage by modifying their behavior and smoothing their energy consumption, thus reducing their non-coincident peak and saving money. This peak shifting behavior change is not encouraged by the Company's current rate structure. Further, the Company does envision that demand side management measures could, eventually, be also included in the subscription to encourage customers to install such
measures and, in turn, receive a discount in rates as an alternative structure to traditional demand side management incentive programs.
Q. Do you agree with Witness Nelson's statement that "the rate is incre dibly hard for customers to understand" (OCA St. No. 6, p. 40, lines 10-11)?
A. Not at all. There are many services that use subscription pricing structures for their services, to include, but not limited to, Amazon, cell phone plans and cable or internet plans. Therefore, a rate option that mimics these types of pricing options would be easy for customers to understand and accept.
Q. Please respond to Witness Nelson's assertion that the program is challenging for customers because the program does not offer e nabling technology (OCA St. No. 6, p. 38, lines 10-11).
A. Mr. Nelson is mistaken. As Company witness Neiswonger explains in her rebuttal testimony, DLC St. No. 9-R, the Company already provides options for customers to monitor their usage during the month - including their hourly usage, which corresponds to the Company's proposal to use hourly usage intervals to calculate the demands of customers who participate in the Residential Subscription Rate Pilot - and predict their current bills.

Furthermore, to some degree, the subscription rate eliminates the risk of customers being surprised by a bill during a high use month by normalizing the customer's costs to serve over the course of the year. Customers only experience additional costs if the
customer exceeds their subscription level plus the overage bandwidth. The overage fee applies only to the month during which the overage occurs.

The Company recognizes that customers will need to be educated on the behavior changes that will allow them to manage their bills and also realizes that customers may have additional charges. It is for this reason that the Company is offering a form of bill protection to allow customers on the pilot to revert to the RS rate option without penalty. The pilot is designed to address many of these issues and identify what assistance, from education to other tools, a customer would benefit from to make this rate option more broadly offered to customers.

\section*{Q. Do you agree with Witness Nelson's assertion that "TOU rates can be designed to} better reflect most of the costs caused (i.e., transmission and generation) with a simpler pricing" (OCA St. No. 6, p. 38, lines 8-9)?
A. No. First, Witness Nelson does not provide any support for the assertion that TOU rates are easier to understand than subscription rates. In fact, subscription rates are less complicated than TOU rates, particularly for customers that don't have the tools to better manage their use during certain hours (e.g., smart thermostats) and requires the customer to personally manage their use every hour, while a subscription rate is actually designed to create bill stability without behavior changes (because it is intended to be set based on previous year's use) but an option for the customer to save energy by committing to a lower demand level and them meeting that level.

Second, this is a distribution-only rate, not a transmission or generation rate, therefore does not need to reflect costs caused by transmission and generation, only
distribution. Distribution planning is based on the loads on the local systems near the customer's load, not the total system load. That is, setting a TOU rate would reflect the generic system peaks while the costs are more localized and based on energy use on individual feeders. As a result, Non-coincident peak (NCP) based rates are more closely reflective of costs.

\section*{Q. Please respond to Witness Nelson's assertion that "the Company is essentially} requiring customers to know the NCP demand requirement of each piece of electrical equipment in their homes and guess at what their hourly demand requirement are over the upcoming year"(OCA St. No. 6, p. 38, lines 11-13).
A. While there is always uncertainty regarding what a customer's use will be in a given year, the pilot is designed to allow the Company to work with each customer to determine the level of subscription appropriate for that customer by reviewing the customer's NCP for the previous year. Thus, customers will not be required to make any blind "guesses," nor will they need to know "the NCP demand requirement of each piece of electrical equipment in their homes," in order to make an informed prediction of their likely future demands. Further, the pilot allows for a form of bill protection if the customer is unhappy and the customer may drop from the pilot without penalty at any time.

Ultimately the proposal for a pilot is to determine the best means for identifying customer subscription levels and thus address the concerns of Witness Nelson.
Q. Do you agree with Witness Nelson's assertion that "the subscription rate could act as a barrier to EV adoptions", as well as the claim that the customer will likely face a penalty because of increased demand (OCA St. No. 6, p. 38, lines 16-17)?
A. Not at all. First, subscription rates have been introduced (e.g., California) for EV charging specifically to create additional benefits to EV customers. Second, EV customers may find this rate very beneficial because the customer now has a fixed charge for more of the costs to operate their car. Third, the customer can change their subscription levels if they buy an EV after enrolling. Fourth, the subscription rate works well with TOU rate options put in place for electric supply for EV charging because the customer is incented to charge during times when the customer's load is already low. Finally, the rate is an option with a bill protection offering. Because it is an option, it is not relevant to claim this rate is a barrier to EV, as customers continue to have the standard rate option. Also, because there is bill protection, a customer can elect to leave the pilot with no penalty and retroactively revert to a bill as if they were on the standard residential rate.
Q. Is Witness Nelson's statement that "none of these require ments that the Company is committing to is in Rider No. 7, so the customer may not know about any of the commitments" (OCA St. No. 6, p. 39, line 5) true?
A. No. Rider 7 explicitly notes many of the Company's commitments to this pilot. First, Rider 7 addresses the determination of the subscription levels:

Upon enrollment in the Pilot, customers shall select the number of Subscription Units the customer will purchase every month to cover their electric distribution needs. The Company will provide the customer with information regarding their previous peak energy use in the past year to aid the customer in selecting the appropriate Subscription Service Level.

Further, Rider 7 states the following regarding the customer's ability to exit the program:

A customer may exit the Pilot and this Rider at any time for any reason. A customer who exits the Pilot will be removed from this Rider effective with the billing cycle that commences 3 business days after the date the customer notified the Company of their election to leave the Pilot.

Finally, Rider 7 outlies the bill protection:
A customer who exits the Pilot may request a refund for the positive difference between their billed distribution charges under this Rider and the amount of such charges if billed under Rate RS for up to three months prior to exiting, but no longer than the customer's actual enrollment in the program. The Company will provide such refund within 60 days of customer request.
Q. Please address Witness Nelson's question regarding the need for a subscription rate when there is already an approved EV TOU rate (I\&E St. No. 1, p. 39, lines 4-7).
A. The offering of a subscription rate for distribution services and an EV TOU rate for electric supply are quite different. While the subscription rate can be offered to EV customers, it is not the only option for these customers. In fact, as Witness Cline noted, a recent study by the Commission showed " \(39 \%\) of the customers were interested in a similar subscription rate plan." (OCA St. No. 6, p. 40, lines 8-9). Because over a third of customers interested in this option warrants exploration, particularly since a subscription option would be available to all customers, not just those with an EV.
Q. Please address Witness Nelson's question regarding the need for a subscription rate would "embed a perverse incentive for the utility to advise larger than needed
subscription levels to its customers, especially if the offering were everscaled to an optional tariff" (OCA St. No. 6, p. 40, lines 12-14).
A. A subscription rate does not create any incentive, perverse or otherwise, for the Company. Rather it demonstrates the Company's commitment to offering customers meaningful options to managing their energy bills. First, the pilot is limited in size and would provide minimal financial benefits even if the Company were to purposefully oversize the subscription, yet such behavior would result in the failure of the program as customers will be dissatisfied with the offering and, potentially, with the Company. Second, once scaled, customers will not elect to participate if the Company maliciously encourages customers to oversize their subscription level as the customers would experience higher than normal bills and be dissatisfied with the service and revert back to standard tariff. The Company envisions offering this as a pricing option in the near term and allows for customers to choose to not be on the subscription level. If the Company and the Commission elect to extend and expand the program after the pilot, reporting requirements and other controls can be contemplated to ensure such abuse does not occur. However, the threat of such an abuse is unfounded given the scope and intent of the program and thus should not be a reason to reject the pilot.
Q. Do you support Witness Wilson's recommendations to either disallow \(\mathbf{\$ 6 7 , 0 0 0}\) in marketing and education costs as sociated with the Company's proposed subscription rate pilot or, if costs were allowed, recover the costs over a 43-month period in line with I\&E witness Keller's recommended rate case expense normalization period (I\&E St. No. 1, p. 39, lines 4-7)?
A. No. First, the market costs should be subject to cost recovery because they are associated with testing a rate option that is a critical to the evolution of rate design to support customer needs. This rate design pilot is necessary to explore the feasibility of a subscription rate, to include identifying operation and delivery issues, exploring customer acceptance and understanding how the participating customers' behavior changes as a result of being on the tariff.

Second, the extension of the cost recovery is not aligned with the expected costs being incurred. Specifically, the pilot is for a specific duration and the marketing costs will be incurred during the three-year period for which the Company requests recovery of the costs. Company witness O'Brien addresses I\&E witness Keller's proposed normalization period in further detail in his rebuttal testimony, DLC St. 10-R.
Q. Do you support delaying the pilot to June 1, 2022 to allow for further refine the customer education and outreach as part of this rate pilot?
A. Yes, a delay of five months will allow for further refinement of the roll out of the program offering as well as ensuring a smooth implementation from an internal systems and processes perspective.
Q. Does this conclude your rebuttal testimony?
A. Yes, it does.

\section*{BEFORE THE}

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PENNSYLVANIA PUBLIC UTILITY COMMISSION
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\author{
Docket No. R-2021-3024750
}

\section*{Duquesne Light Company}

Statement No. 18-R

Rebuttal Testimony of Jason Harchick

Date: July 26, 2021
Q. Please state your full name and business address.
A. My name is Jason Harchick. My business address is 2839 New Beaver Avenue, Pittsburgh, PA 15233.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, Grid Optimization and Strategy.
Q. Did you previously submit direct testimony in this proceeding on behalf of the Company?
A. No.
Q. How long have you worked at Duquesne Light?
A. I have been employed by Duquesne Light Company since January 2008.
Q. What are your current responsibilities?
A. I am responsible for System Planning, which includes the performance of economic, investigative and operational assessments related to Duquesne Light's transmission and distribution system; Protection Engineering, which includes the design and deployment of protection systems to safely detect and clear faults from the system; and Standards, which
includes the development and maintenance of design standards, training, testing, operating manuals, and procedures related to energy delivery system construction and maintenance.

\section*{Q. What are your qualifications, work experience and educational background?}
A. I received a B.S. degree in Electrical Engineering, with a concentration in power, from the University of Pittsburgh in April 2008 and a M.S. degree in Electrical Engineering from the University of Pittsburgh in April 2013. I have been a registered professional engineer in the Commonwealth of Pennsylvania since January 2014.

I began working as a Transmission Planning Engineer at Duquesne Light in 2008 and was promoted to Manager, Transmission Planning in November 2013. I was promoted to the Senior Manager, System Planning and Protection in October 2015 and General Manager of System Planning, Protection and Compliance in August 2018. I assumed my current role as Director, Grid Optimization and Strategy in July 2021.

\section*{Q. Have you pre viously testified before the Pennsylvania Utility Commission?}
A. Yes. I have provided direct testimony on behalf of Duquesne Light in the Siting and Construction of the 138 kV Transmission Lines Associated with the Brunot IslandCrescent Project (Docket No. A-2019-3008589 and A-2019-3008652) and the Siting and Construction of the 138 kV Transmission Lines Associated with the Universal-Plum Project (Docket No. A-2018-3000708). I have also testified on behalf of Duquesne Light in the Peoples Natural Gas Company, LLC Rate Increase Filing (Docket No. R-20183006818).
Q. What is the purpose of your rebuttal testimony regarding Duquesne's proposed general base rate increase?
A. My rebuttal testimony will respond to the testimony of Ron Nelson, Office of Consumer Advocate ("OCA") St. No. 6, with respect to load management programs.
Q. Are you sponsoring any Exhibits along with your rebuttal testimony?
A. Yes. I am sponsoring Exhibit JMH-1-R, comprising discovery responses.
Q. Please summarize Mr. Nels on's comments and recommendations with respect to load management and proposed Transportation Electrification (TE) Programs.
A. Mr. Nelson indicates opposition to the Company's TE Programs primarily because they do not include more EV load management programs. As described in the Recommendations and Conclusions section of Mr. Nelson's testimony (OCA St. No. 6, pp. 41-44), Mr. Nelson recommends the Commission reject the Home Charging Pilot, deny the Company's request to rate base behind-the meter make-ready infrastructure and EV Charging stations, and require Duquesne to file a comprehensive EV load management proposal within 18 months of the final order. Mr. Nelson's other comments regarding the Company's TE Programs are addressed by Company witness Olexsak in her rebuttal testimony, DLC St. 8-R.

\section*{Q. Do you agree with Mr. Nelson's comments?}
A. No. First, as Ms. Olexsak discusses in her direct and rebuttal testimony, the Company already provides EV load management offerings, which it is proposing to expand in this proceeding. Second, as I discuss further in my testimony, the Company is actively
developing technologies that will enable additional load management offerings in the future. The Company's TE Programs directly support these efforts, as they will help the Company collect and analyze data to inform how the Company and its customers plan for, accommodate, and manage electric vehicle (EV) loads such as consideration of additional load management programs. To deny the Company's TE proposals would undermine its ability to develop the types of load management programs that Mr. Nelson purports to desire.
Q. Before discussing the Company's proposals in this case, please summarize and respond to Mr. Nelson's discussion of the Company's existing EV Charge Up Pilot, with respect to distribution system impacts and planning.
A. Mr. Nelson avers that the Company's EV ChargeUp Pilot lacked "a well-developed pilot framework," and that its objectives related to distribution system impacts and planning lacked specificity. (OCA St. No. 6, pp. 13-15). As a threshold matter, I note that the OCA was a party to the 2018 settlement that established the EV ChargeUp Pilot's framework. It would not be reasonable to seek to retroactively relitigate that settlement in this proceeding. Moreover, Mr. Nelson's concern is unfounded. The EV ChargeUp Pilot's objectives were intentionally broad because the EV market is so nascent in our service territory, and the Company needed to collect baseline information on the technologies and customers interests as well as behaviors. The EV ChargeUp Pilot accomplished these goals and provided data for EV charging stations installed in public locations. As a result of having this data, the Company was able to determine that no transformers or distribution equipment required upgrades or replacement to accommodate the Level 2 charging
stations. While the EV ChargeUp Pilot provided valuable data, the COVID-19 pandemic reduced the representativeness of the data collected. Mr. Nelson acknowledges COVID19 as a hindrance to the EV ChargeUp Pilot's results (OCA St. No. 6, p. 21, line \(19-\) p. 22 , line 2 ).
Q. Please explain, from a distribution planning and operations perspective, the benefits and limitations of the data produced by the Company's existing EV Charge Up Pilot.
A. As I discuss above, the Company's EV ChargeUp Pilot provided valuable data related to charging of EVs at public charging locations, but these data were necessarily limited by the Pilot's scope. The EV ChargeUp Pilot did not provide data related to the charging behaviors of the Company's residential customers at home (which, as Ms. Olexsak observes, is where the majority of charging occurs), fleets, or public DC fast charging (DCFC) stations. Data such as charging profiles and peak charging demands from individual as well as residential customers are valuable from a distribution system planning and operations perspective because they can be used to evaluate loading impacts on distribution equipment. EVs represent a significant demand increase to most residential customers, as Mr. Nelson acknowledges in his testimony stating that "charging a Chevy Volt would increase residential non-coincident peak demand by over \(50 \%\), which could create local distribution capacity constraints" (OCA St. No. 6, p. 24, lines 6-8). As part of the proposed TE Programs, the Company will evaluate the local distribution capacity constraints and implement reinforcements to prevent equipment failures which would result in customer outages and negatively impact customer reliability.
Q. Please summarize the Company's current efforts related to the development of advanced grid planning and capabilities.
A. As described in Company witness Morris's direct testimony, the Company is continuing to invest in distribution system equipment and technology to support customer reliability and resilience. One specific project is the Company's Outage Management System (OMS) which will help improve reaction time to service interruptions (DLC St. No. 4, p. 12). Technology, such as the OMS, is foundational to the Company's business to provide safe and reliable electric service to its customers. The Company continually monitors the proliferation of new technologies and systematically implements technology to improve operational capabilities and efficiencies. The deployment of these systems requires significant effort to plan and test to ensure a seamless integration.

\section*{Q. How do these efforts relate to load management programs?}
A. Investments in technologies such as the OMS are foundational to the deployment of advanced systems, including, but not limited to, active load management programs. The Company's OMS project will provide an electric connectivity model which will provide the foundational visibility to link a specific customer meter to an upstream distribution transformer and associated distribution circuit. Until this connectivity and additional operational tools to identify grid constraints are established, the Company is unable to efficiently implement active or automated load management systems. The OMS is projected to go into service in 2022; thus, any load management systems that use the OMS cannot be implemented until after the fully-projected future test year in this case, and therefore could not have been included in the Company's rate proposal.

\section*{Q. Please summarize how the Company's proposed TE Programs would support advanced grid planning and operations, and the development of load management programs.}
A. The Company's proposed TE Programs will provide insights into the charging behaviors of residential customers, fleet customers, workplace charging, and additional insights into public charging including DCFC. This data will allow the Company to better understand the impacts EVs will have on the grid capacity in order to tailor additional load management programs in the future. Specifically, this data can be combined with the loading information for all of the customers connected to the same transformer to determine if a transformer's rating will be exceeded. Understanding charging behaviors, such as, hours of the day in which most customers charge their EVs, and the amount of power consumed by the EVs during those hours, will support the Company's efforts to determine which load management programs can be used most effectively to shift the EV charging times to periods in the day which will not result in distribution system equipment, such as transformers, becoming overloaded. The Company's TE Programs will also provide more visibility into the differences in charging behaviors of the different market segments (residential, public, MUD, fleet) resulting in some load management programs being more effective in one market segment but not as effective in a different market segment. This will improve the design of such programs, and, once the Company has the technical capability to implement them, facilitate such implementation.
Q. Can the Company develop load management programs without implementing its proposed TE Programs, as Mr. Nelson recommends?
A. The Company has already implemented and proposed passive load management programs. The Company may be able to implement active load management programs as recommended by Mr. Nelson, but the programs would be less robust, and potentially less cost-effective, than a deployment after the Company has implemented its TE Programs and established an electrical connectivity model as part of its OMS project.

\section*{Q. Are the programs Mr. Nelson recommends premature at this time?}
A. Yes. As I discuss above, the Company does not have the foundational technology systems to enable efficient deployment of active or automated load management systems. The Company's proposed TE Programs will provide additional data to inform the development of such programs in the future. Moreover, I note that the Company's latest load management offering - the EV Time of Use (TOU) supply rate - only recently became available on June 1. Thus, the Company has not had the opportunity to glean any learnings from that program that might have informed other load-management proposals in this case. It is conceivable that EV-TOU learnings might support development of certain of Mr. Nelson's proposals, but it is premature to say at this point.
Q. Respond to Mr. Nelson's averment, "According to the Company's response to discovery OCA-IV-7, the Company does not have any load management programs under development." (OCA St. No. 6, p. 27, line 18 - p. 28, line 1.)
A. Mr. Nelson's comment mischaracterizes the Company's discovery response. OCA's discovery question asked the Company to describe, together with the associated anticipated filing date, each of "the Company's EV load management programs that are being considered or in the planning phase." The only EV-specific program the Company discussed in its response is its EV-TOU rate. However, contrary to Mr. Nelson's suggestion, this does not mean the Company is not considering other potential loadmanagement programs. As the Company explained in other discovery responses, the Company is currently monitoring technologies related to automated load management systems - which are not necessarily specific to EVs - and may seek to implement such a system in the future. See Exhibit JMH-1-R (OCA-XI-22). However, as discussed above, it would be premature at this time to commit to the ultimate content or filing timelines (to the extent filings are necessary) associated with such systems.

\section*{Q. Is the Company currently developing any load management programs?}
A. Yes. The Company is actively developing potential programs. For example, the Company is developing ideas for systems that would improve operational flexibility and management of customer-owned generation. Additionally, the Company is exploring options for implementation of an Advanced Distribution Management System (ADMS) to provide advanced management, control, and optimization of the existing distribution system and distribution automation equipment. However, as described above, the most effective way to deploy load management programs is to first establish foundational technologies such as the electrical connectivity model which is being developed as part of the Company's OMS Project. The OMS project is planned to be deployed in 2022 which is a driver for
why the Company has not elected to include an active or automated load management program as part of this proceeding. The Company will also have to balance development of these programs against other priorities.

\section*{Q. Does this conclude your rebuttal testimony?}
A. Yes, it does. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{BEFORE THE}

PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

Statement No. 2-SR

Surrebuttal Testimony of Jaime A. Bachota
Subjects: COVID-19 Expenses; Cloud-Based Software Costs

Date: August 10, 2021
Q. Please state your full name and business address.
A. My name is Jaime A. Bachota. My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Assistant Controller.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 2, on April 16, 2021; and rebuttal testimony, DLC Statement No. 2-R, on July 26, 2021.
Q. What is the purpose of your surrebuttal testimony?
A. My surrebuttal testimony responds to portions of the rebuttal testimony of Bureau of Investigation \& Enforcement ("I\&E") witness Christine Wilson as to COVID19 Related Uncollectible Expenses and Incremental COVID-19 related costs net of savings. This surrebuttal also will serve to further clarify the Company's position as it relates to Cloud-Based Software Implementation Costs.
Q. What is the purpose of I\&E Witness Wilson's rebuttal testimony?
A. Among other things, Ms. Wilson's rebuttal testimony addresses the direct testimony of Natural Resources Defense Council ("NRDC") witness Amanda Levin concerning the Company's proposed recovery of incremental COVID-19 related costs.
Q. How does I\&E Witness Wilson address NRDC Witness Levin's testimony on this issue of proposed recovery of incremental COVID-19 related costs?
A. Ms. Wilson disagrees "with Ms. Levin's conclusion that the Commission's May 13, 2020 Secretarial Letter at Docket M-2020-3019775 'provides the right and opportunity to track and recover incremental costs, net of savings, associated with COVID-19 as a regulatory asset in proceedings,' (outside of uncollectibles-related expenses)." I\&E St. 1-R, p. 4, lines 1-4.

\section*{Q. Does the Company agree with I\&E Witness Wilson's statement?}
A. No. The May 13, 2020 Secretarial Letter did not explicitly state that incremental costs, net of savings, could be recovered as a regulatory asset in proceedings. However, the Company's position is that the Commission's July 15, 2021 Order clarified that the Company may track and recover these costs, as I explained in my rebuttal testimony at pp. 20-21. Again, that Order provides in part "that utilities shall continue tracking extraordinary, nonrecurring incremental COVID-19 related expenses and shall maintain detailed accounting records of such expenses. Additionally, the Commission hereby confirms that electric, natural gas, water, wastewater, steam, and all rate base/rate of return telecommunications utilities are authorized to create a regulatory asset for any incremental expenses incurred above those embedded in rates resulting from the directives contained in this Order."

\section*{Q. What is I\&E Witness Wilson's recommendation related to the recovery of extraordinary, non-recurring incremental COVID-19 related costs net of savings (other than uncollectibles)?}
A. Ms. Wilson continues to recommend that recovery of these types of costs be disallowed in their entirety, and she also recommends disallowance of the Company's proposal to continue including any such costs in future rate proceedings. I\&E St. 1-R, p. 5, line \(16-\) p. 6, line 6.
Q. Do you agree with I\&E Witness Wilson's recommendation regarding the recovery of extraordinary, nonrecurring incremental COVID-19 related costs net of savings?
A. No, I do not. As stated in my rebuttal testimony, I believe that the Commission further clarified its position regarding the treatment of these costs within its Order dated July 15, 2021. With respect to the continuation of these costs in future rate proceedings, the Company agrees to discontinue recording a regulatory asset upon the effective date of new rates set in this proceeding. In addition, as noted in my rebuttal testimony regarding non-uncollectible COVID-19-related expenses, the Company reserves the right to seek regulatory asset treatment in the event of future extraordinary, nonrecurring events outside the Company's control, which could
conceivably include re-imposition of government mandates associated with new or resurgent public health emergencies.

\section*{Q. What additional argument does I\&E Witness Wilson continue to make in her rebuttal testimony?}
A. On page 6 of Ms. Wilson's testimony, she argues that the Company should not recover incremental COVID-19 related expenses net of savings because the amount that the Company is requesting in its claim is immaterial. Ms. Wilson further argues that "the Company should not be fully insulated from all costs associated with the pandemic." I\&E St. 1-R, p. 6, lines 2-6.

\section*{Q. Do you agree with this argument?}
A. No, I do not. The Commission did not place a materiality threshold on what should be considered when calculating extraordinary, nonrecurring incremental COVID19 related expenses net of savings.

\section*{Q. Did I\&E Witness Wilson comment on the Company's proposal to defer incremental uncollectible expenses associated with COVID-19?}
A. Yes. She reiterates her recommendation to use a 43-month amortization period for incremental uncollectible expenses up to the effective date of new rates in this proceeding. She also recommends that the Company stop deferring COVID-19 related incremental uncollectible costs after the effective date of new rates, "because the Company should have a new uncollectible percentage built into the
rate formula in this proceeding which accounts for changes due to COVID-19." I\&E St. 1-R, p. 6, lines 11-17.

\section*{Q. Do you agree with these recommendations?}
A. No, I do not. Please refer to the rebuttal and surrebuttal testimony of Robert L. O'Brien for further discussion regarding the Company's proposed amortization period of 36 months as well as discussion as to why the Company will not have a new uncollectible percentage built into the rate formula that will account for COVID-19 changes.

As noted within Robert L. O'Brien's surrebuttal testimony, the Company excluded 2020 data from the calculation of uncollectible expense in this proceeding due to the impacts of the pandemic and related Commission directives. Those impacts will continue to be felt beyond the effective date of new rates. For example, as Mr. O'Brien observes, the Company continues to see increased number and length of deferred payment arrangements, consistent with the Commission's COVID-19 Orders. Payment arrangements entered into after April 1, 2021, total approximately \(\$ 27.7\) million as of early August. This amount of payment arrangements is unprecedented for the Company, as the Company's 3-year average prior to 2020 was approximately \(\$ 10.0\) million. The Company is not able to ultimately predict the outcome of these arrangements. For instance, based on the most current data, approximately \(26 \%\) of customers entering into payment arrangements in April 2021 and approximately \(30 \%\) of customers entering into payment arrangements in May 2021are already past due on their new payment
arrangement. These delinquency rates were not available when the Company filed this case; the majority of customer delinquencies on Commission-mandated special payment arrangements have occurred recently. As the Company did not include these effects in its uncollectibles expense claim in this proceeding, there is no way for the Company to fully recover these costs other than that proposed in this proceeding.
Q. In the alternative, if the Commission agrees with Witness Wilson that the Company's uncollectible expense adopted in this proceeding should reflect COVID-19-related impacts, what would such uncollectible expense be?
A. Based on the amount of customer debt currently in, or potentially subject to, a Commission-mandated COVID-19 deferred payment arrangement, and assuming the same default rates as the Company's other deferred payment arrangements, I would estimate a 2020 uncollectible expense of approximately \(\$ 19.0\) million. Witness O'Brien explains the ratemaking impacts of such increased uncollectible expense in his surrebuttal testimony. However, I must stress that this \(\$ 19\) million is a rough estimate, and it depends on assumptions that may not apply to the unique and unpredictable impacts of the COVID-19 pandemic. Therefore, as witness O'Brien and I have explained, the Company's initial proposal represents the more appropriate (and precise) means of recovering COVID-19-related uncollectible expense.
Q. What do you wish to clarify as it related to Cloud-Based Software
Implementation Costs?
A. I would like to further clarify the Company's requested claim for Cloud-Based Software Implementation Costs, which was discussed in my rebuttal testimony.
Q. What was the Company's initial claim for Cloud-Based Software Implementation Costs?
A. In my direct testimony, I stated that the Company included approximately \(\$ 3.1\) million of cloud-based service arrangements from January 1, 2021 through December 31, 2022 as operating expenses for GAAP purposes.
Q. Is the above statement accurate?
A. No, I misspoke related to the recording of these arrangements.
Q. What should the direct testimony have read related to Cloud-Based Software Implementation Costs?
A. My direct testimony should have stated that amounts related to these arrangements are recorded as regulatory assets for GAAP purposes in accordance with the Company's last rate case settlement. Also, in accordance with the last rate case settlement, the Company has included these arrangements within rate base for this proceeding.

\section*{Q. What is the Company's revised claim for Cloud-Based Implementation Software Costs?}
A. The Company is requesting to discontinue previously issued settlement language which permitted the Company to record these arrangements as regulatory assets vs. operating expenses for purposes of U.S. GAAP. The Company would like to adopt the accounting guidance of ASU 2018-15 with approval in this proceeding, and capitalize the amount previously recorded as a regulatory asset and the future costs of these arrangements in accordance with U.S. GAAP. This guidance, which was not available at the time of the Company's last base rate filing, aligns GAAP treatment with regulatory treatment and therefore there is no need for additional settlement language as both GAAP and FERC allow these costs to be capitalized for ratemaking purposes.

\section*{Q. Does this conclude your surrebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

Statement No. 6-SR

Surrebuttal Testimony of Yvonne Phillips
Subject: Master Metering Proposals

Date: August 10, 2021

\section*{REBUTTAL TESTIMONY OF YVONNE PHILLIPS}
Q. Please state your full name and business address.
A. My name is Yvonne Phillips. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, Meter Operations.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 6, on April 16, 2021; and rebuttal testimony, DLC Statement No. 6-R, on July 26, 2021.
Q. Are you sponsoring any Exhibits along with your surrebuttal testimony?
A. Yes, I am sponsoring Exhibit YP-1-SR, comprising responses to discovery requests that Nationwide Energy Partners propounded after the submission of my rebuttal testimony.
Q. What is the purpose of your surrebuttal testimony?
A. I respond to the rebuttal testimonies of Roger Colton, Office of Consumer Advocate ("OCA") Statement No. 4-R; Robert Knecht, Office of Small Business Advocate
("OSBA") Statement No. 1-R; and Harry Geller, CAUSE-PA Statement No. 1-R; regarding metering of multitenant buildings.

\section*{Q. Please summarize these witnesses' comments in rebuttal testimony related to master metering.}
A. Each witness responded to NEP witness Ringenbach's proposal to implement a new tariff rule 41.2 to allow residential master metering and submetering. They indicated concerns with NEP's proposal, including but not limited to the proposal's implications regarding consumer protections, universal service availability, energy efficiency programs, rate establishment, cost and revenue allocation impacts, and customer supplier choice. Witnesses Colton, Geller, and Knecht all recommend that NEP's proposal be rejected. OCA St. 4-R, p. 8, lines 5-8; CAUSE-PA St. 1-R, p. 59, lines 1-2; OSBA St. 1-R, p. 25, line 1.

Witnesses Geller and Knecht also comment upon the Company’s master metering proposal, which I presented in my direct testimony, DLC St. 6. Witness Geller supports the Company's proposal, contrasting it with NEP's. CAUSE-PA St. 1-R, pp. 59-61. Witness Knecht alleges that the Company's proposal did not adequately address revenue allocation issues, and recommends that if it were approved, the Company should create a new rate sub-class within Rate RS for master metered multifamily buildings. OSBA St. 1-R, p. 19, lines 8-29.
Q. Is the Company making any changes to its master metering proposal, as described in your direct testimony (DLC St. 6)?
A. Yes. The Company is withdrawing its master metering proposal in its entirety, including the proposed revision to tariff rule 41 and addition of new tariff rule 41.1 included in the Company's initial filing. Such withdrawal will be reflected in the Company's compliance tariff filing upon the conclusion of this proceeding.

\section*{Q. Please explain.}
A. The Company's initial master metering proposal reflected a good-faith effort to address the concerns of commentators in the Company's 2018 rate case and participants in the subsequent master metering collaborative. As Company witness DeMatteo explained in his rebuttal testimony in the 2018 proceeding and as I reiterated in my direct testimony, DLC St. 6, the Company has historically taken a cautious position with respect to residential master metering because of its attendant potential for customer harm, which witnesses Colton, Knecht, Geller, and I elucidated further in rebuttal testimony. The Company therefore worked with collaborative participants to fashion a master metering rule that would address their interests while also maintaining adequate customer protections. The Company's resulting proposal sought to strike this balance and support low-income customers.

The comments of witnesses Colton, Knecht, and Geller, however, have reaffirmed my opinion that the potential customer benefits of allowing limited residential master metering, as contemplated in the Company's initial proposal, are substantially outweighed by the risk of customer harm that could result from expanding residential master metering more generally. Moreover, their comments helped to demonstrate that NEP's proposal appears to be motivated more by profit
than customer service. \({ }^{1}\) I do not believe it would be appropriate to jeopardize residential customer protections in service of certain developers' profit margins.

The Company is accordingly withdrawing its master metering proposal to streamline the issues under review in this proceeding. While the Company's initial proposal was entirely distinct from NEP's proposal, they both concern similar subject matter, and so may have the potential to be conflated or otherwise considered jointly. The Company's withdrawal of its initial proposal therefore allows the Commission to focus on NEP's master metering proposal - and in doing so, recognize the detriments of the proposal and reject it.

\section*{Q. OSBA witness Knecht alleges that the Company's initial master metering proposal failed to satisfy the Company's obligations under the 2018 rate case settlement. OSBA St. 1-R, p. 19, lines 15-18. Please respond.}
A. I disagree with Mr. Knecht's allegation. First, I observe that Mr. Knecht's concern is untimely. Mr. Knecht did not raise this issue in his direct testimony. This failure was through no fault of the Company; rather, it may have been due to an internal "communications snafu" at OSBA (see OSBA St. 1, p. 1, lines 25-26). Furthermore, OSBA participated in the master metering collaborative meeting held on February 24, 2021, where the parties discussed a near-final version of the Company's initial

\footnotetext{
\({ }^{1}\) E.g., CAUSE-PA St. 1-R, p. 47, lines 7-8 (explaining that NEP's submetering proposal would allow NEP to profit on the difference between residential and nonresidential rates for electric service); OSBA St. 1-R, p. 24, lines 6-11 (observing that "there does not appear to be anything to stop developers/landlords from implicitly including the cost of universal service charges in their bills to residents," despite not providing any universal service programs in return for such charges).
}
master metering proposal. OSBA raised no concerns regarding settlement compliance or revenue allocation at that meeting.

Second, I disagree with Mr. Knecht's suggestion that the Company did not "address[] revenue allocation implications" of its initial proposal. As I explained in my direct testimony, limiting master metering to new services prevents migration of existing customers between rate classes, thereby mitigating related revenue allocation impacts. DLC St. 6, p. 6, lines 2-9. Moreover, while the Company does not have a projection of how many new customers would have sought master metering under the Company's initial proposal, the number would likely have been small, due to the narrow range of buildings that would have been eligible under that proposal. Company witness Gorman responds to this issue in more detail in his surrebuttal testimony, DLC St. 15-R.

In any event, the Company is withdrawing its master metering proposal as discussed above, rendering Mr. Knecht's concern moot.

\section*{Q. Does this conclude your surrebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{Exhibit YP-1-SR}

\section*{Duquesne Light Company}

Docket No. R-2021-3024750

Interrogatories of Nationwide Energy Partners, LLC

\section*{Set III}

\section*{Witness: Yvonne Phillips and David Defide}

\section*{NEP-III-2}
2. Re Phillips Rebuttal St. No. 6-R p. 7 lines 13-16: For the direct-install program referenced, please provide a) the number of building owners that have participated, b) identify in each instance what equipment was used (lighting, appliances, etc.), c) how many tenant premises were impacted and d) to what extent common areas of the buildings were impacted.

\section*{Response:}

For the direct-install program, the following table shows the number of program participant multifamily facility owner-operators, discrete facilities, number of tenant premises treated, measures implemented and whether common areas received treatment during Act 129 program years 11 and 12 (June 1, 2019, to May 31, 2021):
\begin{tabular}{|l|l|c|c|l|c|}
\hline Participant & Facility & Metering & Units & Measures Installed In-Unit & \begin{tabular}{c} 
Common \\
Area
\end{tabular} \\
\hline Owner Operator-1 & Facility-A & TM & 31 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & yes \\
\hline & Facility-B & MM & 104 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & yes \\
\hline & Facility-C & TM & 17 & \begin{tabular}{l} 
refrigerators, lamps, smart \\
strips, night lights
\end{tabular} & no \\
\hline & Facility-D & TM & 44 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & no \\
\hline & Facility-E & TM & 91 & \begin{tabular}{l} 
refrigerators, water measures, \\
lamps, smart strips, night \\
lights
\end{tabular} & no \\
\hline
\end{tabular}
\begin{tabular}{|c|c|c|c|c|c|}
\hline & Facility-F & TM & 181 & refrigerators, water measures, lamps, smart strips, night lights & yes \\
\hline & Facility-G & TM & 76 & refrigerators, water measures, lamps, smart strips, night lights & yes \\
\hline & Facility-H & TM & 25 & lamps, smart strips, night lights & yes \\
\hline & Facility-I & \[
\begin{gathered}
\text { MM-155 } \\
\text { TM-41 }
\end{gathered}
\] & 196 & refrigerators, lamps, smart strips, night lights & yes \\
\hline & Facility-J & TM & 115 & lamps, smart strips, night lights & yes \\
\hline & Facility-K & TM & 80 & lamps, smart strips, night lights & yes \\
\hline Owner Operator-2 & Facility-A & MM & 201 & refrigerators, lighting fixtures & yes \\
\hline Owner Operator-3 & Facility-A & TM & 22 & lamps, smart strips, night lights & no \\
\hline & Facility-B & TM & 20 & refrigerators, lamps, smart strips, night lights & no \\
\hline & Facility-C & TM & 47 & lamps, smart strips, night lights & no \\
\hline Owner Operator-4 & Facility-A & MM & 226 & refrigerators, lighting fixtures & yes \\
\hline Owner Operator-5 & Facility-A & TM & 81 & water measures, lamps, smart strips, night lights & no \\
\hline & Facility-B & TM & 11 & lamps, smart strips, night lights & no \\
\hline & Facility-C & TM & & & yes \\
\hline & Facility-D & TM & & & yes \\
\hline Owner Operator-6 & Facility-A & TM & 48 & water measures, lamps, smart strips, night lights & no \\
\hline Owner Operator-7 & Facility-A & MM & 1 & lighting fixtures & yes \\
\hline & Facility-B & MM & 12 & refrigerators, lighting fixtures & yes \\
\hline & Facility-C & MM & 8 & refrigerators, lighting fixtures & yes \\
\hline
\end{tabular}
\begin{tabular}{|c|c|c|c|c|c|}
\hline & Facility-D & MM & 150 & refrigerators, lighting fixtures & yes \\
\hline & Facility-E & MM & 198 & refrigerators, lighting fixtures & yes \\
\hline & Facility-F & TM & 26 & refrigerators, lighting fixtures & no \\
\hline & Facility-G & MM & 50 & refrigerators, lighting fixtures & yes \\
\hline & Facility-H & MM & 57 & refrigerators, lighting fixtures & yes \\
\hline & Facility-I & MM & 73 & refrigerators, lighting fixtures & yes \\
\hline & Facility-J & MM & 200 & refrigerators, lighting fixtures & yes \\
\hline & Facility-K & MM & 85 & refrigerators, lighting fixtures & yes \\
\hline & Facility-L & TM & 55 & refrigerators, lighting fixtures & no \\
\hline Owner Operator-8 & Facility-A & TM & 51 & lamps, smart strips, night lights & no \\
\hline Owner Operator-9 & Facility-A & MM & 99 & water measures, lamps, smart strips, night lights & no \\
\hline & Facility-B & TM & 82 & water measures, lamps, smart strips, night lights & no \\
\hline Owner Operator-10 & Facility-A & TM & & lamps, smart strips, night lights & yes \\
\hline & Facility-B & TM & 42 & lamps, smart strips, night lights & yes \\
\hline & Facility-C & TM & 43 & refrigerators, lamps, smart strips, night lights & yes \\
\hline & Facility-D & TM & 48 & lamps, smart strips, night lights & no \\
\hline & Facility-E & MM & 93 & lamps, smart strips, night lights & no \\
\hline Owner Operator-11 & Facility-A & TM & 23 & lamps, smart strips, night lights & no \\
\hline Owner Operator-12 & Facility-A & TM & 98 & lamps, smart strips, night lights & yes \\
\hline Owner Operator-13 & Facility-A & TM & 50 & refrigerators, lamps, smart strips, night lights & no \\
\hline
\end{tabular}

NEP-III-2
\begin{tabular}{|c|c|c|c|c|c|}
\hline Owner Operator-14 & Facility-A & MM & 16 & lamps, smart strips, night lights & no \\
\hline Owner Operator-15 & Facility-A & TM & 74 & water measures, lamps, smart strips, night lights & no \\
\hline & Facility-B & TM & 45 & lamps, smart strips, night lights & no \\
\hline & Facility-C & TM & 59 & water measures, lamps, smart strips, night lights & no \\
\hline & Facility-D & TM & 22 & lamps, smart strips, night lights & no \\
\hline & Facility-E & TM & 31 & lamps, smart strips, night lights & no \\
\hline & Facility-F & TM & 42 & lamps, smart strips, night lights & yes \\
\hline & Facility-G & TM & 16 & lamps, smart strips, night lights & no \\
\hline & Facility-H & TM & 9 & lamps, smart strips, night lights & no \\
\hline & Facility-I & TM & 36 & lamps, smart strips, night lights & no \\
\hline & Facility-J & TM & 74 & refrigerators, lamps, smart strips, night lights & no \\
\hline & Facility-K & MM & 96 & lamps, smart strips, night lights & no \\
\hline & Facility-L & TM & 100 & lamps, smart strips, night lights & no \\
\hline & Facility-M & TM & 45 & lamps, smart strips, night lights & no \\
\hline & Facility-N & TM & 12 & lamps, smart strips, night lights & no \\
\hline & Facility-O & TM & 99 & refrigerators, lamps, smart strips, night lights & no \\
\hline Owner Operator-16 & Facility-A & TM & 55 & lamps, smart strips, night lights & no \\
\hline
\end{tabular}
\begin{tabular}{|l|l|c|r|l|c|}
\hline Owner Operator-17 & Facility-A & TM & 185 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & no \\
\hline & Facility-B & TM & 88 & \begin{tabular}{l} 
water measures, lamps, smart \\
strips, night lights
\end{tabular} & no \\
\hline & Facility-C & MM & 79 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & no \\
\hline Owner Operator-18 & Facility-A & MM & 89 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & yes \\
\hline Owner Operator-19 & Facility-A & TM & 5 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & \begin{tabular}{l} 
refrigerators, water measures, smart strips, night \\
lights
\end{tabular} \\
\hline & Facility-B & TM & 18 & \begin{tabular}{l} 
lamps, smart strips, night \\
lights
\end{tabular} & no \\
\hline Owner Operator-20 & Facility-A & TM & & new construction & no \\
\hline Owner Operator-21 & Facility-A & TM & & new construction & yes \\
\hline Owner Operator-22 & Facility-A & TM & 115 & refrigerators, lighting fixtures & yes \\
\hline
\end{tabular}

MM: Master-metered
TM: Tenant-metered

\section*{Duquesne Light Company}

Docket No. R-2021-3024750

Interrogatories of Nationwide Energy Partners, LLC

Set III

Witness: Yvonne Phillips and David Defide

\section*{NEP-III-4}
4. Re Phillips Rebuttal St. No. 6-R p. 8 lines 9-13: Please provide the sampling data cited which demonstrates the "return" from participating tenants that install Duquesne provided equipment.

\section*{Response:}

The "return" reflects evaluation, measurement, and verification activities during Act 129 Phase III (period ending 5/31/2021) performed by the Company's independent evaluator for the Multifamily Housing Retrofit Program, which verified 6,188 MWh annualized savings and paid \(\$ 1,315,000\) incentives. These results are reported annually, and are available on the Commission's website at https://www.puc.pa.gov/filing-resources/issues-laws-regulations/act-129/electric-distribution-company-act-129-reporting/.
These findings are also annually reviewed and validated by the Commission's Act 129 Statewide Evaluator. See https://www.puc.pa.gov/filing-resources/issues-laws-regulations/act-129/act-129-statewide-evaluator-swe/.

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

Statement No. 7-SR

Surrebuttal Testimony of Katherine M. Scholl Subject: Residential COVID-19 Debt Relief and Universal Services
Q. Please state your full name and business address.
A. My name is Katherine M. Scholl. My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am the Director of Billing and Revenue Management.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 7, on April 16, 2021; and rebuttal testimony, DLC Statement No. 7-R, on July 26, 2021.
Q. Are you sponsoring any Exhibits along with your surrebuttal testimony?
A. Yes, I am sponsoring Exhibit KMS-1-SR, an example CAP bill.
Q. What is the purpose of your surrebuttal testimony?
A. I am responding to the rebuttal testimonies of Christine Wilson, Bureau of Investigation and Enforcement Statement No. 1-R regarding the proposed COVID19 Residential Debt Relief Program; and Roger Colton, Office of Consumer

Advocate ("OCA") Statement No. 4-R, regarding proposed changes to the Company's Universal Services programs.

\section*{Q. What is Witness Wilson's position on the proposed COVID-19 Residential Debt Relief Program?}
A. Witness Wilson recommends that the COVID-19 Residential Debt Relief Program be disallowed, citing decreasing unemployment levels and the Commission's order (M-2020-3019244) earlier this year to offer flexible payment arrangements.
Q. Do you agree with Witness Wilson's position on disallowing the COVID-19 Residential Debt Relief program?

\begin{abstract}
A. I do not. Decreasing unemployment levels mean that customers may be better suited to pay their bills going forward, though they may still need help to pay-off large balances that accumulated during the 16-month moratorium. Payment arrangements - while flexible - continue to challenge affordability for this alreadychallenged group of customers.
\end{abstract}

\section*{Q. Does witness Wilson provide any recommendations, should the Commission decide to approve the COVID-19 Residential Debt Relief Program?}
A. Yes. I will summarize Witness Wilson's recommendation as follows:
1. Eliminate the minimum income eligibility so that all low-income households that meet the qualifications may participate;
2. Maintain the originally proposed end-date of March 31, 2022 at the very latest;
3. The administrative costs - proposed at \(\$ 500,000\) - should be tracked and recorded for future consideration and potential recovery in the next base rate proceeding;
4. The costs related to waiving of reconnection charges and service restoration should not be in addition to the proposed \(\$ 3\) million budget; and
5. That the budget be capped at \(\$ 3\) million, excluding the administrative costs.
Q. Do you agree with Witness Wilson's recommendations?
A. I accept each of Witness Wilson's recommendations as noted in the previous question.

\section*{Q. Describe the parts of Witness Colton's rebuttal testimony to which you are responding.}
A. Witness Colton agrees with certain recommendations made by Witness Geller, including the recommendation to "...notify all customers when they reach 50,75 , and \(90 \%\) of their CAP maximum levels and advise them of their potential eligibility for exemptions." (OCA 4-R at page 2.)

\section*{Q. Do you agree with this recommendation?}
A. I do not.

First, the Company recently launched new bill designs, including one that was specifically designed for CAP customers and was reviewed with CAP customers for feedback prior to its development and launch. An example of this new CAP bill is included as Exhibit KMS-1-SR. The new bill design clearly illustrates how much of the maximum annual discount has been used, and when the discount will be reset.

Second, the Company recently worked with one of its CBOs - Holy Family Institute - to appoint a Customer Success Associate. This person routinely reviews the accounts of customers who are at \(70 \%\) or more of their maximum annual discount. She reaches out to them and discusses both LIURP and any causes for exceptions due to usage out of the customer's direct control.

I believe these two measures are sufficient for notifying a customer that he or she is approaching the maximum annual discount.

\section*{Q. Has the Company found outreach such as that proposed by Witness Colton to be effective?}
A. For many customers, additional letters and outreach do not appear to affect behavior.

Consider the case of recertification. In his direct testimony, Mr. Colton took exception of the Company's number of customers who fail to recertify:

From January 2019 through May 2021, 9,074 low-income customers exited the Duquesne Light CAP. ... more than \(77 \%\) \((6,989\) of 9,074\()\) were removed due to a failure to reverify their income.

For a utility that has a current CAP participation of less than 35,000 customers, to lose nearly 7,000 participants in one 17 -month period due to a failure to recertify, when not everyone is required to recertify every year, and when recertifications were halted completely for four months (April - July), should present concerns to the Commission and to the utility.

Mr. Colton failed to recognize that the Company did not actually "lose" nearly 7,000 CAP customers. CAP participation remained in the 34,000-35,000 range throughout.

Customers receive multiple forms of outreach - by letter and often by phone - prior to being removed from CAP for failure to recertify. After they are defaulted - and presumably when they recognize that they have been defaulted through their first non-CAP bill - they reach out to our CBOs and are reinstated in CAP.

More letters and automated calls do not necessarily equate to better outcomes. I firmly believe that personalized outreach and coaching, which the Company is employing with the addition of the Customer Success Associate, is a much better approach.

\section*{Q. Are there any other areas of Mr. Colton's rebuttal testimony to which you would like to respond?}
A. Yes. I would like to address how Mr. Colton responded to Mr. Geller's recommendation that if more than \(5 \%\) of the Company's CAP customers reach the maximum prior to the \(11^{\text {th }}\) month of a program year, the Company should be required to further increase CAP maximums, presumably across the board. See OCA St. 4-R, pp. 2-5.
Q. Do you agree with Mr. Colton's position on not automatically increasing the maximum annual discounts if the percent of customers reaching the maximum exceeds \(5 \%\) ?
A. I do. Mr. Colton makes a compelling argument, noting that it is important to understand why customers are reaching the maximum discount; who is reaching the maximum discount; and for how long CAP participants are exceeding the maximum annual discount. Knowing the underlying cause of customers reaching the maximum discount is critical to crafting an appropriate response. Mr. Colton wisely notes, "Duquesne should not adopt, in advance, a single remedy to a "problem" that may well have any number of alternative causes and, therefore, any number of reasonable remedies." OCA St. 4-R, p. 5 lines 11-13. I wholeheartedly agree. Further, I believe that this matter is best addressed in a Universal Services proceeding.

\section*{Q. Does this conclude your surrebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{Exhibit KMS-1-SR}


\section*{Bill Summary}
\begin{tabular}{lr|}
\hline Bill ID: & Date Prepared: 07/28/2021 \\
Previous Bill & 43.00 \\
Payment(s) Received & 0.00 \\
Balance Forward & \(\$ 43.00\) \\
Current Amount Due (see Page 3 for Details) & 102.32 \\
CAP Discount & -5.32 \\
\hline AMOUNT DUE BY 08/18/2021 & \(\$ 86.00\) \\
\hline
\end{tabular}

\section*{Account Balances \\ \begin{tabular}{|c|c|c|}
\hline Customer Assistance Program (CAP) & & \(\Gamma\) \\
\hline Annual CAP Discount Reset Date & 08/06/2021 & \\
\hline Maximum Annual CAP Discount & 2350.00 & \\
\hline Annual CAP Discount Used to Date & - 851.10 & \\
\hline Remaining CAP Discount & 148.0 & \\
\hline Total Account Balance & & \\
\hline Last Account Balance & 631.21 & \\
\hline Account Adjustments & 0.00 & \\
\hline Payments received & 0.00 & \\
\hline Current service charges & 102.32 & \\
\hline Debt forgiven & 0.00 & \\
\hline CAP discount applied & - 5.32 & tal Used \\
\hline Total Account balance & 64.21 & 851.10 \\
\hline
\end{tabular}

Debt Forgiveness
Your remaining debt will be due if you default from the CAP program.

\section*{Usage Comparison Chart}
\begin{tabular}{lcccc} 
Period & \begin{tabular}{c} 
Total kWh \\
Usage
\end{tabular} & \begin{tabular}{c} 
Avg Daily \\
kWh Usage
\end{tabular} & \begin{tabular}{c} 
\# of \\
Days
\end{tabular} & Avg Daily \\
Temp (F)
\end{tabular}


Average Monthly Usage for the last 12 months 1200 kWh Total Annual Usage for the last 12 months 143 kWh

Billing and meter reading details on page 3


Please mail payment to:
DU U SN LIGHT COMPANY
PO BOX 31324
PITTSBURGH PA 15250-324


\section*{General Information}

Visit us online or call to learn about payment options or for a copy of our rate schedules. For uestions about your bill please contact us before the bill due date.


Online: www.Du uesneLight.com
C Phone: 412-3 3-100Mail: Dept 6-1
\(411{ }^{\text {th }}\) Ave Ste 3
Pittsburgh PA 1521-1 42

\section*{Understanding Your Bill}

Customer Charge - A monthly basic service charge that includes costs for meter reading customer billing service e uipment and other expenses. These expenses are incurred even in months when customers do not use electricity.
Distribution Charges - Basic service charges for delivering electricity over a distribution system to the home or business from the transmission system.
Distribution System Improvement Charge (DSIC) - A charge for company investment to improve service uality and increase safety by repairing improving or replacing eligible infrastructure used to deliver electricity.
DLC Charges - Services necessary for the physical delivery of electricity service such as supply including default service transmissions and distribution.
Kilowatt-Hour (kWh) - The basic unit of electric energy for which most customers are charged. It e uals the amount of electricity used by 10 100-watt light bulbs left on for one hour.
Meter Reading - An actual (Act) reading is a reading taken from the meter. An estimated ( st ) reading is used when no actual reading is available and is based on past electric usage.
Non-Basic Service Charges - Any category of service not related to basic service.
Smart Meter Charge - Charges for advanced metering technology and related infrastructure that will provide the ability for features such as two-way communication and interval usage data.
Supply Charges - Basic service charges for generation supply to retail customers.
Transmission Charges - Basic service charges for the cost of transporting electricity over high voltage wires from the generator to the distribution system.

\section*{Billing and Service Options}

Sign up online for any of the following services
E-Billing - Free service lets you view bills online
Budget Billing - Levels out payments across the year
Start/Stop Service - If you re moving and need to have your service turned on or off you must call Customer Service at 412-3 3-100 or visit our website
Double Notice Protection - Sends a payment reminder to you and a person you designate

\section*{Customer Assistance Program (CAP)}

CAP is Du uesne Light Company s discount program for residential customers whose total household income is at or below 150\% of the Federal Poverty Guidelines. Customers who enroll in CAP are eligible for a reduced monthly payment based on their verified household income. The CAP Program also includes an opportunity to have existing debt forgiven. Please call a CAP Specialist at 888-3 3- 600 with any uestions or for information on how to enroll in the program.

CAP Discount - The difference between your actual billed amount and your CAP Monthly Payment amount.
CAP Recertification - CAP customers are re uired to verify their income every two years on the anniversary of the CAP enrollment. Failure to recertify results in removal from CAP.
Debt Forgiveness - The portion of your pre-program amount that is forgiven based on receipt of regular monthly payments under the CAP program.
Grant Payment - nergy assistance grants such as LIH AP and Dollar nergy Fund which are applied directly to the bill.
Maximum Annual CAP Discount - The maximum amount of CAP discounts allowed annually.
CAP Payment Amount - Your monthly CAP payment amount is based on a percent of your income. At any time if your average or actual billed amount is less then that will become your CAP Payment Amount.


\section*{Message Center}

Need help paying your electric bill Learn more about our energy assistance programs at DuquesneLight.com/assistance.
Signing up for DLC s e-Bill program is fast and easy! nroll today at DuquesneLight.com/ebill and you ll receive an email each month when your bill is available.
\begin{tabular}{|c|c|c|c|c|c|}
\hline \multicolumn{6}{|c|}{Account Detail} \\
\hline T & & \multicolumn{4}{|c|}{Supplier Agreement ID:} \\
\hline Meter Reading Usage Information & \multicolumn{5}{|l|}{Current Bill Details} \\
\hline & DLC Rate & \multicolumn{4}{|l|}{RH-Residential Heating} \\
\hline Meter Number & Price to Compare & \multicolumn{2}{|l|}{0.064 / kWh} & \multicolumn{2}{|l|}{\multirow[b]{3}{*}{\(12.51{ }^{\text {\$57.72 }}\)}} \\
\hline Present 0/28/2021 Act 6028.2200 & DLC Charges & & & & \\
\hline Prior 06/28/2021 Act 550.3380 & Customer Charge & & & & \\
\hline Difference 68.8820 & Distribution & 68.8820 kWh & 0.06133 & \multicolumn{2}{|l|}{42.4} \\
\hline Your Meter Multiplier 1 & DSIC Surcharge & \multicolumn{2}{|c|}{4. \(8 \%\)} & \multicolumn{2}{|l|}{\multirow[t]{2}{*}{2. 4}} \\
\hline \multirow[t]{4}{*}{Total kWh Used 68.8820} & & & & & \\
\hline & Supply Charges & & & \multicolumn{2}{|l|}{\multirow[t]{2}{*}{\(3.55{ }^{\$ 44.60}\)}} \\
\hline & Supply & 68.8820 kWh & 0.05455 & & \\
\hline & Transmission & 68.8820 kWh & 0.010252 & 3.55
.05 & \\
\hline Total kWh Used 687.8820 & \multicolumn{3}{|l|}{Service Charges} & \multicolumn{2}{|r|}{\$102.32} \\
\hline \multicolumn{6}{|c|}{Current Amount Due Detail} \\
\hline
\end{tabular}

Service Charges
\begin{tabular}{lc} 
DLC Charges & 5.2 \\
Supply Charges & 44.60
\end{tabular}

Subtotal
\$102.32

\section*{Shopping and Supplier Information}

When shopping for electricity with an lectric Generation Supplier please provide the following information
```

Supplier Agreement ID: Rate Schedule: RH-Residential Heating

```

The current Price to Compare is listed above in Account Detail and will change every June and December. For more information supplier offers visit www.PAPowerSwitch.com and www.oca.state.pa.us.

\section*{Additional Notifications}

Give to Dollar nergy Fund to help people without heat or light. Make a monthly pledge at www.du uesnelight.com or send a check to Du uesne Light Hardship Fund Donations 411 Seventh Avenue MD 15-1 Pittsburgh PA 1521 . Your gift is tax deductible.
A change in the Distribution System Improvement Charge effective July 1 will increase your monthly bill by about 0.54 or less than 1\%.
A change in the Transmission and Default Service Supply rates that went into effect June 1 will increase the overall monthly bill of an average residential customer who purchases electric generation from Du uesne Light by about 2.08 or \(2 \%\).
Du uesne Light offers energy efficiency programs to help customers save money by conserving energy and reducing demand. To participate or to learn more about these programs visit www.wattchoices.com.
SIGN UP FOR AUTOPAY and learn about other convenient payment options by visiting our website www.du uesnelight.com.
stimated Gross Receipts Tax of 6.04 and stimated PA State Tax of 6.5 are included in your rates.

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company
Statement No. 10-SR

Surrebuttal Testimony of Robert L. O'Brien

Dated: August 10, 2021

\section*{I. INTRODUCTION}
Q. Please state your name.
A. My name is Robert O'Brien.
Q. Have you previously testified in this proceeding?
A. Yes, I submitted Direct Testimony on behalf of Duquesne Light Company ("DLC" or "Company") in this proceeding, dated April 16, 2021, before the Pennsylvania Public Utility Commission ("Commission"); and I also submitted rebuttal testimony on July 26, 2021.
Q. What is the purpose of your Surrebuttal Testimony?
A. My Surrebuttal Testimony will address a portion of the rebuttal testimony of Bureau Investigation and Enforcement ("I\&E") witness Christine Wilson.
Q. Are you sponsoring any Exhibits along with your surrebuttal testimony?
A. Yes, I am sponsoring Exhibit RLO-1-SR, which illustrates the adjustment to the Company's revenue requirement that would be required if the Commission were to adopt witness Wilson's recommendation to include COVID-19-related uncollectibles in the Company's uncollectible expense for the FPFTY.
Q. What portion of I\&E Witness Wilson's rebuttal testimony will you address?
A. I will address Ms. Wilson's statement on page 6, lines 13 to 17 of I\&E Statement No. 1-R where she states, "...that the Company be required to discontinue recording a regulatory asset for COVID-19 related to incremental uncollectible costs after the effective date of new rates in this proceeding. This is because the Company should have a new uncollectible percentage built into the rate formula in this proceeding which accounts for changes due to COVID-19."
Q. Did the Company, as Ms. Wilson suggests, include any amount for the COVID-19 related uncollectible expense recovery in setting its new uncollectible percentage that is built into the rate formula in this proceeding?
A. No, it did not. As shown on DLC Exhibit 2, Schedule D-10, the Company used the years 2015 to 2019 to establish the base percentage built into rates in this proceeding. This removes the impact of the COVID-19 uncollectible activity in 2020 from the uncollectible account percentage used to establish prospective rates. The Company has made a separate claim for the deferred amounts through June 30, 2021, for COVID-19 uncollectible expense to be recovered through amortization as part of this rate case.

Q, Did any party to this proceeding propose any change in the Company's use of the 2015 to 2019 period to establish the base percentage used to determine the normal uncollectible expense in this proceeding?
A. No, there were no proposed adjustments to the use of those years or to the percentage established as presented in DLC Exhibit No. 2, Schedule D-10.
Q. Should, as Ms. Wilson also suggests, the Company have included an amount which accounts for changes due to COVID-19?
A. No, it would be wrong to incorporate any impact from COVID-19 on uncollectible expense into the base rates in the proceeding. The normal procedure used to establish the uncollectible expense is to use a historic period to develop a base percent as shown on Schedule D-10 as done in this proceeding. As described in my direct testimony, the year 2020 was not included because of the distortion caused by COVID-19 and related Commission directives regarding uncollectible activities.
Q. Do you agree that the COVID-19 uncollectible expense to be recovered should be amortized as recommended by Ms. Wilson?
A. Yes, I agree with the use of an amortization procedure with respect to these expenses, though I continue to disagree with Ms. Wilson's recommendation to use a 43-month period.
Q. How does the use of an amortization procedure impact the total recovery of the COVID-19 uncollectible expense recovery?
A. As Ms. Wilson states on I\&E Statement No. 1, page 11, lines 21 and 22, "[A]mortization allows for full recovery of the regulatory asset no matter when a utility makes a subsequent base rate case filing."
Q. Is the Company able to establish what the final amounts for the COVID-19 uncollectible expense will be at this time?
A. No. As I understand it, because of the significant increase in the number of deferred payment agreements that exist as a direct result of COVID-19, some of which extend for up to 60 months, and the Commission's related Orders, the Company can only estimate what the total COVID-19 uncollectible costs might be. To allow the Company to continue to identify all COVID-19 uncollectible amounts and record them in the regulatory asset will allow the Company the opportunity for full recovery of the actual uncollectible amounts.
Q. Are the details regarding the COVID-19 uncollectible procedures described by DLC Witness Bachota?
A. Yes, they are.
Q. In the alternative, if the Company is not permitted to defer incremental COVID-19 uncollectible expense following the effective date of new rates, will changes to the Company's claimed uncollectible expense for the FPFTY be required?
A. Yes. In such instance, the Company's claimed uncollectible expense would need to be adjusted to conform to witness Wilson's recommendation that "the Company should have a new uncollectible percentage built into the rate formula in this proceeding which accounts for changes due to COVID-19." Otherwise, if this adjustment is not included, the Company would be denied the opportunity to recover these expenses.

This approach would necessitate an increase in the Company's claimed uncollectible expense for the FPFTY of \(\$ 3.007\) million, for a total uncollectible expense of \(\$ 15.332\) million, in addition to the \(\$ 2.094\) million for the COVID-19 uncollectible expense included in the Company's original filing on Schedule D-12 (line \(3+\) line \(6 / 3\) ).
Q. Have you prepared a schedule showing the calculation of the additional uncollectible expense resulting from including these COVID-19 uncollectibles?
A. Yes, I have. Exhibit RLO-1-SR is an update of my original uncollectible expense calculation of \(\$ 12.325\) million and a factor of \(1.30 \%\) as shown on Exhibit DLC 2, Schedule D-10 line 11 and line 8 respectively.
Q. Please describe your changes to Exhibit DLC 2, Schedule D-10 which are shown on Schedule RLO-1-SR.
A. The changes are shown in columns 6 and 7. Line 10a shows the \(\$ 19.0\) million that DLC Witness Bachota estimates will be the total 2020 related uncollectibles including all estimated COVID-19 related uncollectibles (see DLC St. 2-SR). Line 10b shows the recorded 2020 uncollectibles of \(\$ 3.697\) million shown on line 6 while line 10c shows the COVID-19 estimates that the Company included in its original filing on Exhibit DLC 2, Schedule D-12 of \(\$ 6.281\) million. The net of these three amounts is the additional COVID-19 uncollectible expense to be recovered. Using the three-year amortization period, the \(\$ 9.022\) million would be
recovered annually at \(\$ 3.007\) million per year as shown on lines \(10 \mathrm{~d}, 10 \mathrm{e}\) and 11 b . This additional uncollectible expense of \(\$ 3.007\) million would result in an increase of the uncollectible factor used in the gross revenue conversion factor from the \(1.300 \%\) shown on line 8 to the \(1.617 \%\) shown on line 15 .
Q. How do you recommend the additional COVID-19 uncollectible expenses, beyond the \(\mathbf{\$ 6 . 2 8 1}\) million, be identified and included in the Company's revenue requirement?
A. I think the Company's initial proposal - to continue to identify and defer the incremental COVID-19 related uncollectible expense, and recover such expense through amortization until fully recovered - remains the preferable approach. In this manner, the Company will be able to recover no more or less than the actual amounts. Unlike the proposal by Ms. Wilson, which would increase the FPFTY revenue requirement by \(\$ 3.007\) million, the Company's proposal to continue to identify and add these additional COVID-19 uncollectible expenses to the deferred account would simply continue the amortization recovery into the future and not increase the current FPFTY revenue requirement.

\section*{Q. Does this complete your prepared surrebuttal testimony at this time?}
A. Yes, it does.

\section*{Duquesne Light Company}

\section*{SCHEDULE RLO-1-SR \\ Witness: \\ O'Brien}
\begin{tabular}{cl} 
SCHEDULE & \(D-10\) \\
Witness: & O'Brien
\end{tabular}

Page 1 of 1


15 UPDATE OF UNCOLLECTIBLE FACTOR
L 11b / L 14
Exhibit RLO-1-SR

\section*{BEFORE THE}

\section*{PENNSYLVANIA PUBLIC UTILITY COMMISSION}

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

\author{
Statement No. 15-SR
}

Surrebuttal Testimony of Howard S. Gorman

Dated: August 10, 2021

\section*{Q. Please state your name.}
A. My name is Howard Gorman.

\section*{Q. Have you previously submitted testimony in this proceeding?}
A. Yes, I submitted Direct Testimony on April 16, 2021, on behalf of DLC in this proceeding before the Commission. I also submitted Rebuttal Testimony on July 26, 2021. My testimony described the jurisdictional separation studies and the unbundled, allocated cost of service study that I prepared for DLC. The purpose of the JSS is to determine the portion of DLC's total annual revenue requirement that is subject to the jurisdiction of the Commission, i.e., the distribution revenue requirement. The purpose of the ACOS is to assign, on a cost-causation basis, DLC's distribution revenue requirement among the rate classes in its Tariff. Abbreviations used in this Rebuttal Testimony have the same meaning as in my Direct Testimony.

\section*{Q. What is the purpose of your Surrebuttal Testimony?}
A. My Surrebuttal Testimony will respond to the Rebuttal Testimony of the following witnesses in the following areas:
- OSBA Witness Knecht regarding cost allocation and regarding his comments on aspects of the Company's proposal on Master Metering, and
- OCA Witness Watkins regarding cost allocation.

\section*{Allocated Cost of Service}

\section*{Q. Was the methodology that you used to prepare the JSS and the ACOS the same as in the past?}
A. Yes. The JSS and ACOS are presented in Exhibit 6, and an updated JSS and ACOS in Exhibit 6(R). The methodology used in the present rate case was the same as in the Company's last four rate cases and the development of the allocators in the present rate case was also the same as in prior cases.

\section*{Q. Other than OSBA and OCA, did any party object to the Company's ACOS?}
A. No. As stated in my Rebuttal testimony, the Company's ACOS was accepted explicitly or implicitly by all other parties in this case. In addition, no party objected to the Company's ACOS in the four prior cases, except for OCA, which has consistently opposed any customer component of the distribution system (another party in 2018 shared OCA's concerns but did not object to the ACOS); and Wal-Mart in 2006, which asked the Commission to order the Company to classify a portion of primary as customer-related.

In the present case, I\&E did not raise any objections to the Company's ACOS, and I\&E and other parties relied on it for their rate design testimony.

\section*{Q. Please summarize OSBA's and OCA's Rebuttal testimony in this area.}
A. OSBA and OCA each put forth, in their Direct Testimony, cost allocation approaches that favor their respective constituents. In their Rebuttal Testimony, OSBA and OCA each criticized the cost allocation approach of the other.

OSBA would "recommend that the Commission not adopt Witness Watkins' cost allocation approach" (OSBA St. 1-R, p. 6). The cost allocation approach put forth by OCA, and objected to by OSBA, would reduce costs to the parties OCA represents and increase costs to the parties OSBA represents.

OCA stated, "...the results of Mr. Knecht's CCOSS cannot be considered credible in any way and therefore should not be given any consideration in this proceeding" (OCA St. 3-R, p. 6). The cost allocation approach put forth by OSBA, and objected to by OCA, would reduce costs to the parties OSBA represents and increase costs to the parties OCA represents.
Q. Please summarize OSBA's objections to OCA's cost allocation approach, and OCA's objections to OSBA's cost allocation approach.
A. OSBA criticized the OCA cost allocation approach largely based on OSBA's claims that OCA fails to reflect economies of scale because OCA denies a customer component for any portion of the distribution system, and because it claims that OCA's approach is not consistent with Commission precedent.

OCA criticized the OSBA cost allocation approach largely based on OCA's claim that OSBA's approach is not based on the facts attributable to DLC's distribution system, and further that OSBA's approach uses "arbitrary and inconsistent adjustments" (OCA St. 3-R, p. 6).

\section*{Q. Please comment.}
A. Both OSBA and OCA ignored the actual design and construction of DLC's distribution system. OSBA is correct in that OCA, by rejecting a customer component for secondary distribution, ignores the economies of scale for larger customers reflected in DLC's system design and therefore in its ACOS.

OCA is correct in that OSBA, by assuming that there must be a customer component for primary distribution, incorrectly relies on the NARUC Manual and what it claims is precedent (this issue is addressed extensively in my Rebuttal). Further, OCA is correct in that OSBA's calculation of the primary distribution customer component is arbitrary.

\section*{Q. Please summarize.}
A. Each of OSBA and OCA has found a fundamental flaw in the cost allocation study presented by the other. Each of OSBA and OCA largely accepted the Company's JSS and ACOS, except for the specific objections each raised.

Each of OSBA and OCA is correct in finding that the cost allocation study presented by the other is flawed and must be rejected by the Commission.

The Company's JSS and ACOS is the only one presented in this case that fairly reflects the design and operation of the Company's distribution system. The Company's ACOS was accepted explicitly or implicitly by all parties in this case, other than OSBA and OCA, each of which objected only to limited portions, and in ways that would favor their own constituents. In particular, I\&E Witness Mr. Sakaya relied on the Company's ACOS study to present his proposed revenue allocation scale back.

\section*{Q. What do you recommend?}
A. I recommend the Commission accept the JSS and the ACOS submitted by the Company in this case, and the underlying methodology, because it reflects the design and operation of the Company's distribution system, and is consistent with precedent as well as authoritative guidance.

\section*{Master Metering}

\section*{Q. What did the Company propose regarding Master Metering?}
A. The Company proposed a new Rule 41.1, which would have allowed a single meter for certain multi-tenant premises; the specifics are presented by the Company at DLC St. 6.
Q. What aspects of OSBA's criticism of the Company's Rule 41.1 proposal will you address here?
A. OSBA criticized the Company for not reflecting the revenue allocation effects of the proposed change in its filing, and for not having the information to predict such effects of the change (OSBA St.1-R, p. 15 et seq.).

\section*{Q. Please address these criticisms.}
A. The Company has withdrawn its Rule 41.1 proposal, as discussed by Company Witness Phillips, DLC St. 6-SR. I am responding here to address the assertion by OSBA that the Company's proposal was deficient, which Witness Phillips also discusses in DLC St. 6-SR.

The proposed change would have been for new customers only. The Company's forecast did not include any new customers selecting this option, therefore the effect on FPFTY revenue allocation was nil. OSBA did not object to the Company's forecast in this regard.

OSBA's statement that the Company's rationale for excluding the impact "makes little sense" because it will affect "future base rates proceedings . . ." is not correct. It would have been speculative, and therefore inappropriate, to estimate the effects of the Company's proposal on class cost of service and on revenue allocation.
A. Yes.

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\author{
Duquesne Light Company
}

Statement No. 16-SR

Surrebuttal Testimony of David B. Ogden
Subject: Revenue Allocation, Customer Charge, Rate Design

Date: August 10, 2021

\section*{Q. Please state your full name and business address.}
A. My name is David B. Ogden. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Manager, Rates and Tariff Services.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted direct testimony, Exhibit 5, DLC Statement No. 16, on April 16, 2021; and rebuttal testimony, DLC Statement No. 16-R, on July 26, 2021.
Q. What is the purpose of your surrebuttal testimony?
A. My surrebuttal testimony will respond to the following issues raised in the rebuttal testimony of intervening parties in this proceeding:
1. The rate class revenue allocation assessment given by both Office of Consumer Advocate ("OCA") witness Glenn Watkins, Statement No. 3-R, and the Office of Small Business Advocate ("OSBA") witness Robert Knecht, Statement 1-R;
2. Residential Customer Charge assessment raised by OCA witness Glenn Watkins;
3. Rate design recommendation associated with Rider No. 3 - School and Governmental Service Discount Period raised by OSBA witness Robert Knecht; and
4. Rate design recommendation raised by the Natural Resources Defense Council ("NRDC") witness Ms. Harris.

I note that lack of a response to an argument made by any party should not be construed as acceptance of that argument by the Company.

\section*{I. REVENUE ALLOCATION}
Q. Have OCA and OSBA reviewed each other's revenue allocation proposals in rebuttal testimony?
A. In general, OCA and OSBA continue to support revenue allocation proposals that favor their respective particular customer group. The Company presented a balanced approach that was not challenged by the Bureau of Investigation and Enforcement ("I\&E"). I previously responded to other parties' revenue allocation proposals in my rebuttal testimony and will not repeat those arguments here.
Q. Were any new arguments introduced by the other parties relating to the revenue allocation proposals in their respective rebuttal testimony?
A. Yes. OSBA Witness Knecht addresses OCA's allocation proposal by combining both Witness Colton and Witness Watkins' recommendations (OSBA St. 1-R, Page. 10, Lines 1-3). Witness Watkins addresses revenue allocation from a base
rate case perspective, while Witness Colton proposes a shift in surcharge cost responsibility to make nonresidential customers subject to the Company's Rider No. 5 - Universal Service Charge ("USC"). From a distribution base rate perspective, Table IEc-S1 (OSBA St. 1-R, pg. 11) combines both the base rate revenue allocation proposal that was originally proposed by Witness Watkins (OCA St. 3, Table 10), along with the proposal to shift cost responsibility with the Company's USC (OCA St. 3, Schedule GAW-7). Combining surcharge and base rate revenue allocation proposals could be construed as misleading from a pure base rate revenue allocation perspective.

\section*{II. RESIDENTIAL CUSTOMER CHARGE}
Q. Mr. Watkins disagrees with I\&E Witness Mr. Sakaya's recommendation to scale-back the residential customer charge proportionally based on the overall increase to the residential class, and reiterates his recommendation that the residential customer charge not increase (OCA St. No. 3-R, p. 9, lines 6-15). Do you agree with Mr. Watkins's position?
A. No. I continue to disagree with Mr. Watkins's recommendation of no increase to the Residential customer charge. As discussed in my rebuttal testimony (DLC St. 16-R, Page 9, Lines 9-11), the Company continues to request the originally proposed Residential customer charge. In the alternative, if the Commission ultimately authorizes a smaller-than-proposed increase in the Residential customer charge, it should instead employ Mr. Sakaya's recommended scale-back. This scale-back should take into account the proposed revenues as reflected within

Exhibit RLO-5-R, Schedule D-1, Page 1 of 3, Column 2, Line 2, along with the proposed roll in of surcharge revenues (i.e. Rider No. 10 - State Tax Adjustment ("STAS") and Rider No. 22 - Distribution System Improvement Charge ("DSIC")) as reflected within Exhibit RLO-5-R, Schedule D-5, Column 9, Line 2.

\section*{III. RATE DESIGN}
Q. What is your position on Mr. Knecht's recommendation that the Company's Rider No. 3 - School and Governmental Service Discount Period be eliminated, and payment terms for government customers be the same as that for other customers in the general service rate classes (OSBA St. 1-R, p. 14, lines 4-14)?
A. This recommendation should be denied. First, this recommendation is not timely. Mr. Knecht blames its late submission on receipt of interrogatory responses after the due date for direct testimony. OSBA St. 1-R, p. 14, lines 2-3. This appears to have been a consequence of OSBA's internal "communications snafu" (see OSBA St. 1, p. 1, lines 25-26), and not through any fault of the Company. Regardless of OSBA's reason for the late submission of discovery requests, presenting new recommendations in rebuttal testimony does not allow for other interested parties to fully rebut; and deprives customers served under Rider No. 3 of their opportunity to intervene and participate. I have been advised by counsel that Mr. Knecht should have proposed this rate design recommendation in his direct testimony.

In theory, providing a 30-day bill payment grace period for Rider No. 3 customers should contribute to lower delinquencies for these particular customers,
which could translate to lower uncollectible expenses being allocated to the applicable rate classes within the Company's ACOS (i.e. Applicable to Rates GS/GM, GMH, GLH, GL and L). Lower uncollectible expenses should benefit all customers within the applicable rate class.

I also disagree with Mr. Knecht that Rider 3 is "unreasonably discriminatory." It is reasonable to provide schools and other governmental customers an additional 15-days grace period before late payment charges begin to accrue. This additional grace period recognizes the public service those entities provide, and accommodates the possibility that those entities may have more cumbersome accounts-payable processes than non-public entities. The Company notes that several other Pennsylvania EDC retail tariffs have similar payment terms for governmental entities. By way of further background, the Commission allowed the Company to place Rider No. 3 into its Tariff No. 13 effective January 19, 1973, pursuant to its Order issued on December 19, 1972, at Docket No. C.19276. The Company made an attempt to retrieve this Order directly from the Commission, and was advised that the files were destroyed due to a flood years ago at the state archives.

\section*{Q. What is your position on Ms. Harris's rate design recommendation?}
A. Ms. Harris recommends in rebuttal testimony that the Company include proposals in this proceeding for long-term, sustainable rate design, particularly for commercial and industrial electric fleet use cases. NRDC St. 1-R, p. 7, lines 4-5. Ms. Harris did not initially recommend a specific rate design proposal in direct
testimony, nor does she in rebuttal testimony. Ms. Harris's proposal lacks the specificity needed to analyze and put into effect any rate design plans in this proceeding. Further, there is no basis for providing rate design proposals that the Company may or may not recommend in a future distribution rate case. This recommendation should be denied.

\section*{Q. Does this conclude your surrebuttal testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

\section*{Statement No. 2-RJ}

Rejoinder Testimony of Jaime A. Bachota
Subjects: COVID-19 Expenses; Cloud-Based Software Costs; Pension
Q. Please state your full name and business address.
A. My name is Jaime A. Bachota. My business address is 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Assistant Controller.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 2, on April 16, 2021; rebuttal testimony, DLC Statement No. 2-R, on July 26, 2021; and surrebuttal testimony, DLC Statement No. 2-SR, on August 10, 2021.

\section*{Q. What is the purpose of your rejoinder testimony?}
A. My rejoinder testimony responds to portions of the surrebuttal testimony of Bureau of Investigation \& Enforcement ("I\&E") witness Christine Wilson as to COVID19 Related costs net of savings, and Office of Consumer Advocate ("OCA") witness Lafayette Morgan regarding Cloud-Based Software Implementation Costs and Pension Capitalization Adjustment.
Q. What is the purpose of I\&E Witness Wilson's surrebuttal testimony?
A. Among other things, Ms. Wilson's surrebuttal testimony addresses nonuncollectible COVID-19 related costs net of savings.
Q. Please summarize I\&E Witness Wilson's assertion regarding the Company's inclusion of lost late payment charges within its incremental COVID-19 related cost.
A. As noted in Ms. Wilson's surrebuttal testimony, she characterizes the Company's lost late payment charges as "simply lost fees and not lost revenue for goods or services provided." I\&E St. 1-SR, p. 17, line 1.

\section*{Q. Do you agree with Ms. Wilson's characterization?}
A. I do not. Late payment charges are not merely a revenue stream. They reflect the Company's costs of providing goods and services to customers - specifically, the Company's costs of extending credit to customers who do not make timely payments. As required under the Commission's relevant Orders prohibiting service termination, the Company provided this service to customers during the applicable period of the pandemic, but has not had the opportunity to recover the costs thereof. In addition, late payment charges are an item that is specifically included in the ratemaking formula and offset the Company's revenue requirement. It is reasonable to allow the Company to recover its costs of this service through a regulatory asset.

\section*{Q. What is the purpose of OCA Witness Morgan's surrebuttal testimony?}
A. Among other things, OCA Witness Morgan's surrebuttal testimony addresses cloud-based software implementation costs and the capitalized pension adjustment.

\section*{Q. What is OCA Witness Morgan's continued concern regarding the Company's claim for cloud-based software implementation costs?}
A. Mr. Morgan expresses a concern that the Company may be double counting costs in rate base associated with cloud-based software implementation costs. OCA St. 1-SR, p. 4, lines 1-11.

\section*{Q. Do you agree with Mr. Morgan's concern?}
A. No, I do not. Please see additional clarification regarding the Company's treatment of cloud-based software implementation costs within my surrebuttal testimony at pages 7-8, and as follows.

For GAAP books and GAAP reporting as well as for budgeting purposes, the Company records, reports and budgets cloud-based software implementation costs as regulatory assets which is in accordance with the procedures established in the Company's last rate case settlement agreement.

For FERC reporting purposes, the Company reclassifies the cloud-based software implementation cost regulatory asset recorded for GAAP purposes into plant.

As stated in my direct testimony, the Company utilizes its budget in order to arrive at amounts for the FPFTY in its rate proceedings. As cloud-based software implementation costs are recorded as a regulatory asset for budgeting purposes,
they are excluded from both O\&M expenses as well as capital (rate base) items. In order to abide by the Company's last rate case settlement agreement, the Company performs an adjustment to its budgeted amounts (regulatory asset) to properly include an adjustment to rate base for ratemaking purposes. The Company's books and records do not currently include any cloud based software implementation costs in its plant-in-service accounts. Those cloud-based software costs are recorded as regulatory assets in compliance with the Company's last rate case settlement agreement.

\section*{Q. Can you explain why, as Mr. Morgan cites in his surrebuttal testimony on page 4, there are three projects with the same name on the Company's response to I\&E-RB-7-D, which shows budgeted additions to plant for 2021, and also on the Company's response to OCA-VI-5, which shows budgeted additions to the cloud regulatory asset for 2021 ?}
A. Yes, I can. The Company's policy is to bifurcate the project costs into what are considered solely [1] cloud-based software implementation costs, [2] expense costs primarily associated with testing and training costs and [3] capital costs associated with primarily on-premise integrations. As shown in each of the three projects, the budgeted dollar amounts to be included in plant are different from the budgeted dollar amounts that are to be included in the cloud regulatory asset. For example, the addition to plant for the Work Planning Integration Software Replacements shown on line 114 of I\&E-RB-7-D is \(\$ 269,349\) while the addition to the cloud
regulatory asset shown on the last line before the total line in 2021 is \(\$ 320,000\). This reflects two separate activities as described above.
Q. Is there any double-counting as alleged by Mr. Morgan with regard to the amounts included in the cloud regulatory assets?
A. No, there is not.
Q. What is the Company's recommendation regarding the current and future treatment of cloud-based implementation costs?
A. As noted in my surrebuttal testimony, the Company is requesting

\begin{abstract}
to discontinue previously issued settlement language which permitted the Company to record these arrangements as regulatory assets vs. operating expenses for purposes of U.S. GAAP. The Company would like to adopt the accounting guidance of ASU 2018-15 with approval in this proceeding, and capitalize the amount previously recorded as a regulatory asset and the future costs of these arrangements in accordance with U.S. GAAP. This guidance, which was not available at the time of the Company's last base rate filing, aligns GAAP treatment with regulatory treatment and therefore there is no need for additional settlement language as both GAAP and FERC allow these costs to be capitalized for ratemaking purposes.
\end{abstract}
Q. Please summarize OCA Witness Morgan's surrebuttal testimony as it relates to the Company's ability to earn a return on its pension trust.
A. Mr. Morgan implies that the Company earns a return on its contributions through its pension trust (OCA St. 1-SR, p. 8, lines 4-8), and asserts that the capitalized pension adjustment does not represent costs recorded in plant accounts on which the Company is allowed to earn a return. OCA St. 1-SR, p. 7, line \(23-\) p. 8, line 3.

\section*{Q. Do you agree with OCA Witness Morgan's surrebuttal as it relates to the ability of the Company to earn a return?}
A. No, I do not. The Company does not benefit from the return that is earned through the pension trust which incorporates the Company's pension contributions. As Mr. Morgan stated in his surrebuttal testimony, "the return earned by the pension plan is earned within the pension trust, based on the pension plan's investments and is separate from the Company's earnings". OCA St. 1-SR, p. 8, lines 6-8. The return that is earned on the pension trust benefits the Company's employees through further funding the pension plan, as well as its customers through lower future contributions. As I have previously explained, the Company should be able to earn a return on the additional pension contributions that it has funded to the pension trust and that has neither been recovered from customers nor included in plant balances, as this amount has continued to benefit both the customer and the employees.

\section*{Q. Does this conclude your rejoinder testimony?}
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\section*{BEFORE THE}

PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\section*{Duquesne Light Company}

\section*{Statement No. 6-RJ}

Rejoinder Testimony of Yvonne Phillips
Subject: Master Metering Proposals

\section*{REJOINDER TESTIMONY OF YVONNE PHILLIPS}
Q. Please state your full name and business address.
A. My name is Yvonne Phillips. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as Director, Meter Operations.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted my direct testimony, DLC Statement No. 6, on April 16, 2021; rebuttal testimony, DLC Statement No. 6-R, on July 26, 2021; and surrebuttal testimony, DLC Statement No. 6-SR, on August 10, 2021.
Q. What is the purpose of your rejoinder testimony?
A. I respond to the surrebuttal testimony of Teresa Ringenbach, Nationwide Energy Partners ("NEP") Statement No. 2, regarding master metering and submetering of multitenant buildings.
Q. Please summarize Ms. Ringenbach's surrebuttal testimony related to master metering and submetering.
A. Ms. Ringenbach responds to many of the comments made by me, as well as witnesses Watkins, Geller, and Knecht, in opposition to NEP's proposal to expand residential master metering and submetering via a new tariff Rule 41.2. She indicates disagreement with many of these other witnesses' comments, but also modifies NEP's proposal in response to certain of these comments. NEP's updated proposal is memorialized in the form of a revised proposed Rule 41.2 marked as Exhibit TR-22 to Ms. Ringenbach's surrebuttal testimony.

\section*{Q. Does NEP's revised proposal resolve your concerns with expanded residential master metering and submetering, as you discussed in your rebuttal and surrebuttal testimonies?}
A. No. NEP's updated proposal retains many of the shortcomings in its initial proposal, including but not limited to shortcomings related to customer assistance programs, electric supply shopping programs, customer/tenant due process, and other customer protections. It also introduces new problems. For example, it would appear to significantly expand the scope of landlord requirements that Duquesne Light would need to police; though it apparently does not provide the Company with either the resources or the enforcement powers to do so.
Q. What do you recommend with respect to NEP's revised proposal, as articulated in Ms. Ringenbach's surrebuttal testimony?
A. I recommend it be denied.

1 Q. Does this conclude your rejoinder testimony?
2 A. Yes. I reserve the right to supplement my testimony through the course of this 3 proceeding.

BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

Duquesne Light Company

Statement No. 9-RJ

REJOINDER TESTIMONY OF JENNIFER NEISWONGER

\author{
Subjects: Residential Subscription Rate Pilot
}

\section*{I. INTRODUCTION \& BACKGROUND}
Q. Please state your name, title, and business address.
A. My name is Jennifer Neiswonger. I am the Director of Customer Experience for Duquesne Light Company ("Duquesne Light" or the "Company"). My business address is 411 Seventh Avenue, Mail Drop 15-1, Pittsburgh, PA 15219.
Q. Have you previously submitted testimony in this proceeding on behalf of Duquesne Light?
A. Yes. On April 16, 2021, I submitted direct testimony (Duquesne Light Statement No. 9); and on July 26, 2021, I submitted rebuttal testimony (Duquesne Light Statement No. 9-R).
Q. What is the purpose of your rejoinder testimony?
A. My rejoinder testimony briefly clarifies, and responds to critiques of I\&E witness Cline and OCA witness Nelson, regarding the Company's proposed Residential Subscription Rate Pilot.
Q. Do witness Cline and witness Nelson continue to aver that the Residential Subscription Rate would be difficult for participants to understand?
A. Yes, they do.
Q. Do you agree?
A. No, for the reasons I describe in my rebuttal testimony. Additionally, for the avoidance of any potential doubt, I wish to confirm that customers participating in the Residential

Subscription Rate will be able to view their hourly demands via the Company's website, and their billing demand will appear on their monthly bills. The Company's educational programming related to this Pilot will, among other things, instruct participants in viewing and understanding this content.

\section*{Q. Are you proposing any changes to the Residential Subscription Rate Pilot?}
A. Yes. In response to witness Cline's and Nelson's concerns that the Pilot may disincent energy efficiency and conservation by participating customers, the Company will provide energy conservation kits to all participants through its Phase IV Energy Efficiency and Conservation programs. These kits, which may include items such as power strips and/or smart thermostats, will help customer manage their electric demands and reduce their electric consumption.

\section*{Q. Does this conclude your rejoinder testimony?}
A. Yes. I reserve the right to supplement my testimony as may be necessary through the course of this proceeding.

\section*{BEFORE THE}

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PENNSYLVANIA PUBLIC UTILITY COMMISSION
}

\section*{REJOINDER TESTIMONY OF PAUL R. MOUL}

Dated: August 13, 2021

\section*{REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL}
Q. Please state your name, occupation and business address.
A. My name is Paul R. Moul and I am Managing Consultant at the firm P. Moul \& Associates. My business address is 251 Hopkins Road, Haddonfield, NJ 08033-3062.
Q. Mr. Moul, have you previously submitted direct and rebuttal testimony in this proceeding?
A. Yes. My direct testimony (Duquesne Light Statement 9) was submitted with the Company's case-in-chief on April 16, 2021 and my rebuttal testimony (Duquesne Light Statement No. 9-R) was submitted on July 26, 2021.
Q. What is the purpose of your rejoinder testimony?
A. Duquesne Light Company ("Duquesne Light" or the "Company") has requested that I respond to the surrebuttal testimony presented by Mr. Christopher Keller, a witness appearing on behalf of the Bureau of Investigation and Enforcement ("l\&E"), and Mr. David J. Garrett, a witness appearing on behalf of the Office of Consumer Advocate ("OCA"). If I fail to address each and every issue in the surrebuttal testimony of these witnesses, it does not imply agreement with those issues.
Q. On pages 34 through 36 of his surrebuttal testimony, Mr. Keller asserts that the percentage of electric utility revenues, as well as deregulated electric markets and certain acquisitions disqualify some of the companies in your Electric Group. Does Mr. Keller adequately support his position?

\section*{REJOINDER TESTIMONY OF \\ PAUL R. MOUL}
A. No. Mr. Keller says that his data source supports the elimination of Exelon Corp. from his barometer group. But as I explained in my rebuttal testimony, Mr. Keller should have delved deeper into his source to determine what true percentage of revenues from regulated operations for Exelon. His conclusion is based on a faulty analysis by S\&P Global Market Intelligence that rests on a set of numbers that indicates that Exelon's total segment revenues consist of \(110.1 \%\) of its total revenues. Rather, total revenues for Exelon cannot exceed \(100 \%\). Correcting for this misstatement places Exelon within the Barometer Group. On the issue of Avangrid, which Mr. Keller would eliminate due to a proposed acquisition, the monthly dividend yields of Avangrid subsequent to the announced acquisition were equal to or less than the Electric Group, thereby demonstrating that the acquisition of PNM Resources by it has not impacted the group average DCF result for the Electric Group. He also quarrels with my inclusion of MGE Energy, NextEra Energy, and Otter Tail in my barometer group. As to NextEra Energy, its Florida rates, while fully regulated, are based on a \(10.6 \%\) return on equity, and those rates are well below the national average that includes both traditional and restructured electric utilities. Both MGE Energy and Otter Tail operate in fully regulated jurisdictions, which make them no different than members of Mr. Keller's barometer group, including Ameren, American Electric Power, CMS Energy, Dominion Energy, Duke Energy, Entergy, IDACORP, Portland General Electric, and Xcel Energy, all of which have a meaningful portion of their business in fully regulated integrated electric utilities. But Mr. Keller made no exclusions for those companies.

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REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL
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Q. On page 38 of I\&E Statement No. 2-SR, Mr. Keller claims that the DSIC return should not be considered as a benchmark to establish the equity return in this case. Do you agree?
A. No. Mr. Keller claims that the DSIC rate provides a "marker" to determine whether a utility is "overearning." The DSIC rate is calculated from the same two models of the cost of equity, namely DCF and CAPM, that Mr. Keller used in his direct testimony, and that all of the same risk attributes are contained in those two models in both proceedings. Mr. Keller has not adjusted his returns for any additional risk factors not contained in the DCF and CAPM used in the DSIC proceedings. Furthermore, mechanisms like the DSIC are widespread in the utility industry and the measures of the cost of equity already reflect investor expectations of the benefits of these mechanisms.
Q. Is there evidence that the Commission usually sets the rate of return on common equity in base rate cases that is at a higher rate than employed in the DSIC?
A. Yes. The two most recent electric rate case decisions prove this point. In the UGI Electric rate case at Docket No. R-2017-2640058, the Commission set the rate of return on common equity at \(9.85 \%\) when the DSIC return was \(9.65 \%\) for electric utilities. In the PPL Electric Utilities rate case at Docket No. R-2012-2290597, the Commission set the return on equity at \(10.40 \%\) when the DSIC return was \(10.20 \%\) for electric utilities. So, this evidence supports a higher return in a base rate case than the

\section*{REJOINDER TESTIMONY}

OF
PAUL R. MOUL
prevailing DSIC return, contrary to Mr. Keller's opinion expressed on pages 8 and 9 of his surrebuttal testimony. Moreover, in the PECO Energy - Gas Division rate case decision, the Commission set the Company's equity return at \(10.24 \%\) at a time when the DSIC return was 10.20\% (Docket No. R-2021-3024750).

\section*{Q. At pages 43 of his surrebuttal testimony, Mr. Keller claims that "financial risk} does not relate to the capital structure of a company." Is this correct?
A. This statement is unquestionably incorrect. The recognized measure of a company's financial risk is revealed by the balance sheet of a company. Indeed, it is the balance sheet that provides the foundation for calculating the weighted average cost of capital, which is the basis for a public utility's weighted average cost of capital established in rate cases. As stated in The Regulation of Public Utilities \({ }^{1}\) :
...it is widely held that the cost of capital is related to a utility's capital structure. As the proportion of debt increases, "the added financial risks for both the debt and equity holders result in higher and higher costs for both debt and equity capital.
Q. On page 50 of his surrebuttal testimony, Mr. Keller claims that less weight should be given to more distant forecasts because they are "less reliable and more speculative." Please respond.
A. This observation conflicts with his use of five-year projections of earnings growth in his DCF analysis. If reliance upon five-year projections, whatever their reliability, is okay for DCF purposes, then there is no reason to discount any of the projections of Treasury yields when looking for the appropriate risk-free rate of return in the CAPM.

\footnotetext{
\({ }^{1}\) Charles F. Phillips, Jr., The Regulation of Public Utilities (Public Utilities Reports, Inc. 1993) 233.
}

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REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL
}
Q. At pages \(51-52\), Mr. Keller seems to imply that the evidence you used to support the size adjustment in the CAPM is not specific to utility stocks. Is this correct?
A. No. The article by Annie Wong (see page 51 of I\&E Statement No. 2-SR) was deficient because it attempted to correlate betas with size. As Fama/French subsequently established as published in the Journal of Finance in 1992, beta is not the correct measure to identify returns associated with the relative size of a company, either utility or non-regulated. Betas measure systematic risk, and the size of a company is an unsystematic risk.

\section*{Q. What issues were contained in the surrebuttal testimony of OCA witness Garrett that require a response?}
A. Mr. Garrett has addressed the following issues: capital structure, the DCF growth rate, ROE comparisons, results of the CAPM, leverage adjustment, and management performance.
Q. Has Mr. Garret presented any new evidence that would justify departure from the Commission's well established practice of using Company's actual capital structure if it is reasonable?
A. No. The Company's proposed capital structure complies with the Commission's policy that supports the actual capital structure. Mr. Garrett does introduce the "double leverage" concept, but that is not applicable here. The Commission has never employed the double leverage concept in establishing the weighted average cost of

\section*{REJOINDER TESTIMONY}

OF
PAUL R. MOUL
capital in a rate case decision. This is in spite of the fact that all of the major utilities in the state are affiliated with holding companies that have the potential for different common equity ratios for the parent holding company and the subsidiary utility company.
Q. Regarding the issue DCF growth rates, Mr. Garrett lists three problems (see pages 4-7 of OCA Statement No. 2SR) with the growth rates you used in the DCF. Please respond.
A. Even if there were any merit to the list complied by Mr. Garrett, his observations do not justify ignoring company-specific growth rates and defaulting to GDP growth as the sole basis to measure growth rate in the DCF. His approach ignores entirely company-specific factors that affect the stock price of a utility associated with its growth prospects. Growth for a utility is determined principally from the fundamentals of the utility in question and cannot be captured exclusively by longterm GDP growth.
Q. On pages 4-6 of his surrebuttal testimony, Mr. Garrett attempts to diminish the usefulness of analysts' projected growth rates in the DCF. Please respond.
A. Mr. Garrett sets forth three arguments. He claims that analysts' projected growth rates are: (i) too short-term (i.e., covering a 3-10 period), (ii) that these growth rates cannot exceed GDP growth, and (iii) some intrinsic measures of growth limit the growth rate that can be used in the DCF.

\section*{REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL}

\section*{Q. Please respond to each of Mr. Garrett's points.}
A. The fact that analysts' forecasts extend from 3 to 10 years is no reason to ignore them. If longer term forecasts were necessary for investors to make buy, hold, or sell decisions, then the demand for longer term forecasts would be fulfilled by investment analysts on Wall Street. The reality is that extended forecasts are not required by investors in making their buy, hold, or sell decisions. As to GDP growth, such forecasts change so slowly that GDP growth rates are not responsive to a particular company's fundamentals that cause stock prices to change at the pace they do. The intrinsic growth argument also provides no basis for gauging the reasonableness of company-specific growth rates. Increases in productivity (i.e., substitution of capital for labor) is a key contributor to earnings growth that is not captured by any intrinsic growth indicators.
Q. At pages 6 and 7 of OCA Statement No. 2-SR, Mr. Garrett complains about your references to comparisons to other ROEs established by the Commission. Are his complaints valid?
A. No. It is important to the regulatory ranking of a Commission that continuity exist in its rate case decisions. So it matters not what the utility type or size that guides the Commission's rate case decisions. Moreover, the Commission has already decided that it will apply its standard ratemaking principles during the COVID pandemic. Finally, as I noted below, a utility should not be penalized with a lower return where assets are moved from the DSIC category to rate base treatment.

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REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL
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Q. Mr. Garrett suggests (see page 8 of OCA Statement No. 2-SR) that witnesses representing utility companies are inclined to use interest rate forecasts as a means to boost the risk-free rate of return in the CAPM. Please respond.
A. It is necessary to understand the fundamentals surrounding those forecasts before making the blank statement the witnesses representing utility companies are inclined to use them in an attempt to increase the CAPM result. I do not dispute that in a low interest rate environment, which exists today, that forecasts of future interest rates generally trend toward higher rates than current rates. With the Fed Funds rate near zero, there is little room for lower interest rates, unless negative interest rates were the prospect, which they are not. Likewise, during periods of high interest rates, which we have not seen for a long period, forecasts would trend toward lower rates. So the absolute level of interest rates must be considered when assessing the validity of the forecasts.
Q. Mr. Garrett further disputes your position regarding the Value Line betas and the market risk premium. Please respond.
A. On page 8 of his surrebuttal, Mr. Garrett disputes my adjustment to the Value Line betas. Notably, I have used the Value Line betas as a foundation just like all other witnesses. I merely reflected the difference in financial risk attributed to the market value of the capitalization and book value of the capitalization. As to his arguments involving the "ERP," on page 9 of his surrebuttal there is no support for the notion that

\section*{REJOINDER TESTIMONY \\ OF \\ PAUL R. MOUL}
the current ERP must be lower than the historical ERP, because the historical data is widely employed in the investment and academic publications to provide a foundation for comparative performance. Furthermore, the implied total market return with Mr. Garrett's ERP using his survey approach is just \(7.88 \%(2.28 \%+5.6 \%)\), which is clearly incompatible with actual stock market returns of \(18.40 \%\) in 2020, \(15.25 \%\) YTD in 2021, and \(12.16 \%\) on average for the past 95 years (1926-2020). Given the deficiency in his approach, it is necessary to consider historical returns to encompass reasonable investor-expected market returns.
Q. At pages 12-13 of his surrebuttal, Mr. Garrett further opposes the Company's proposal for recognition of management performance. Please respond.
A. The Commission has a long history of recognizing management performance (either positively or negatively) in rate case decisions. As I noted in my rebuttal testimony, the Commission has an Above Average/ 3 ranking by RRA. If the Commission were to abandon its constructive ratesetting approaches, such as recognition of management performance, then its ranking by RRA would surely suffer.
Q. Based on your review of the surrebuttal testimony of the opposing witnesses, do you propose any change in your recommended return on equity for Duquesne Light in this proceeding?
A. No. There was nothing contained in the surrebuttal testimony of any of these witnesses that change my position that Duquesne Light is entitled to a \(10.95 \%\) rate of

\section*{REJOINDER TESTIMONY}

\section*{OF}

PAUL R. MOUL

5 Q. Does this conclude your rejoinder testimony? recent rate cases and DSIC proceedings.
A. Yes.
return on common equity. The proposals of the opposing witness submitting cost of equity testimony are entirely too low by reference to returns set by the Commission in

\section*{BEFORE THE} PENNSYLVANIA PUBLIC UTILITY COMMISSION

Docket No. R-2021-3024750

\author{
Duquesne Light Company
}

\section*{Statement No. 16-RJ}

Rejoinder Testimony of David B. Ogden Subject: Customer Electric Usage

Date: August 13, 2021

\section*{REJOINDER TESTIMONY OF DAVID B. OGDEN}
Q. Please state your full name and business address.
A. My name is David B. Ogden. My business address is Duquesne Light Company, 411 Seventh Avenue, Pittsburgh, PA 15219.
Q. What is your position at Duquesne Light Company?
A. I am employed by Duquesne Light Company ("Duquesne Light" or "Company") as the Manager, Rates and Tariff Services.
Q. Did you previously submit testimony in this proceeding on behalf of the Company?
A. Yes. I submitted direct testimony, Exhibit 5, DLC Statement No. 16, on April 16, 2021; rebuttal testimony, DLC Statement No. 16-R, on July 26, 2021; and surrebuttal testimony, DLC Statement No. 16-SR, on August 10, 2021.
Q. Are you sponsoring any Exhibits along with your rejoinder testimony?
A. Yes. I am sponsoring Exhibit DBO-1-RJ, a PDF version of the Company's discovery response to CAUSE-PA I-24.
Q. What is the purpose of your rejoinder testimony?
A. My rejoinder testimony will respond to the comments of Office of Consumer Advocate ("OCA") Colton, OCA St. 4-SR, regarding bill impacts of the Company's proposed residential customer charge.

I note that lack of a response to an argument made by any party should not be construed as acceptance of that argument by the Company.

\section*{Q. Please summarize witness Colton's comments on this topic.}
A. Mr. Colton critiques my assessment, presented in my rebuttal testimony, that the Company's proposed residential rate design tends to be better for low-income customers than OCA's recommendation to recover any residential rate increase through volumetric charges. Specifically, I observed that the Company's lowincome customers (including both those enrolled in the Customer Assistance Program (CAP) as well as other confirmed low-income customers) consume more electricity, on average, than a typical residential customer of the Company. I therefore concluded: "On average, the Company's low-income customers would pay more if the current customer charge remained at \(\$ 12.50\) and the increase was applied solely to the volumetric charge." See DLC St. 16-R, p. 13, lines 3-5.

Mr. Colton does not disagree with the basic premise that a lower fixed charge tends to allocate more costs to high-usage customers, and fewer costs to lower-usage customers. See OCA St. 4-SR, p. 8, lines 6-8. Instead, he disputes the accuracy of my statement that residential low-income customers tend to be higherusage. Mr. Colton implicitly asserts that the Company's low-income customers actually consume less electricity, on average, than its non-low-income customers.

He concludes, "Mr. Ogden's testimony cannot support the conclusion that he reaches: that low-income usage is higher than non-low-income usage." OCA St. 4SR, p. 11, lines 17-19.
Q. Do you agree with Mr. Colton that the Company's low-income customers actually use less electricity, on average, than its non-low-income customers?
A. No, I do not, as I explain below.
Q. Please first address Mr. Colton's critique of the data you presented in your rebuttal testimony that indicated that low-income customers consume more electricity, on average, than non-low-income customers. What are those data points?
A. The customer usage data I presented in my rebuttal testimony at DLC St. 16-R, p. 12, lines 6-13, are reproduced below.

Table No. 1 Average Residential Monthly Consumption (kWh)
12 Months Ended April 2021
\begin{tabular}{|l|c|c|c|}
\hline & CAP & \begin{tabular}{c} 
Confirmed Low- \\
Income, Non- \\
CAP
\end{tabular} & \begin{tabular}{c} 
Non-Low \\
Income
\end{tabular} \\
\hline Non-Heating & 718 & 709 & 628 \\
\hline Heating & 1,021 & 983 & 856 \\
\hline
\end{tabular}

Table No. 2 Average Residential Monthly Consumption (kWh)
12 Months Ended April 2020
\begin{tabular}{|l|c|c|c|}
\hline & CAP & \begin{tabular}{c} 
Confirmed Low- \\
Income, Non- \\
CAP
\end{tabular} & \begin{tabular}{c} 
Non-Low \\
Income
\end{tabular} \\
\hline Non-Heating & 667 & 626 & 584 \\
\hline Heating & 960 & 884 & 802 \\
\hline
\end{tabular}

As the column headings suggest, the second column (labeled "CAP") shows the average monthly kWh usage of CAP customers in the respective years indicated in each table, broken down by non-electric heating and electric heating. The third column ("Confirmed Low-Income, Non-CAP") shows the average monthly kWh usage of non-CAP confirmed low-income customers. The fourth column ("NonLow Income") shows the average monthly kWh usage of all other residential customers.
Q. Mr. Colton avers, "Mr. Ogden did not explain how he selected his 'CAP participants' and provided no data underlying his calculation." (OCA Statement 4-SR, Page 8, Lines 14-15). Please respond.

\footnotetext{
A. First and foremost, I observe that Mr. Colton had the opportunity to seek clarification regarding these issues earlier in this proceeding, but apparently chose not to do so. OCA has propounded nearly 250 interrogatories (not including subparts) on the Company over the course of this proceeding, none of which raised any questions regarding these data points.

Given Mr. Colton's apparent confusion indicated in his surrebuttal testimony, I will attempt to explain now. To develop Tables 1 and 2 in my rebuttal testimony, the Company queried monthly billing detail from the Company's billing system that resulted in quantified customer level reports that flagged residential customers as either CAP, Confirmed Low Income ("CLI")/Non-CAP, or Non LowIncome on a month-by-month basis. The Company treated each of these flags as separate and distinct customer groups. The monthly queries captured CAP participants during the months in which they were enrolled in the program. So, for example, if a customer was confirmed low-income but not enrolled in CAP from May through August 2020, then their usage in those four months was included in the calculation of the average "Confirmed Low-Income, Non-CAP" customer usage shown in Table 1. If that same customer was then enrolled in CAP for September 2020 through April 2021, then the customer's usage during those eight months was included in the calculation of the average "CAP" customer usage Table 1. The data presented in my rebuttal testimony reflects individual customer level billing detail for the time periods noted (DLC St. 16-R, page 12), and as such, reflects the average usage for each customer segment.
}
Q. Did the Company provide additional data during discovery that Mr. Colton could have used to validate Tables 1 and 2?
A. Yes. In response to an interrogatory from the Coalition for Affordable Utility Services and Energy Efficiency in Pennsylvania ("CAUSE-PA), CAUSE-PA I-24, the Company provided a spreadsheet containing median and mean annual usage for the period 2019 to date in 2021, disaggregated by month, for (1) Residential customers who participated in CAP; (2) Residential customers who are confirmed low-income but not enrolled in CAP; and (3) Residential customers who are not confirmed low-income. These data points confirm that residential customers who participated in CAP, and residential customers who are confirmed low-income but not enrolled in CAP, had larger average usages than residential customers who are not confirmed low-income. These data points were provided to OCA, along with all other parties of record to the proceeding, on June 10, 2021 - two months before Mr. Colton submitted his surrebuttal testimony.
Q. Mr. Colton avers that the CAP usage identified in your testimony "is substantially too low" (OCA Statement No. 4-SR, p. 9, lines 4-6). Do you agree?
A. No. Mr. Colton appears to be mischaracterizing base distribution only charges (DLC Statement 16-R, page 14, Table No. 3 and Table No. 4) as if they reflected the total bill (i.e. base distribution, surcharges, and transmission and generation charges). Mr. Colton takes the data I provided regarding CAP non-heating customers' average monthly distribution bills, and extrapolates the CAP credits that he would expect a customer to receive over the course of the year, as if those
distribution charges constituted the customer's entire bill. He then compares this erroneously-derived CAP credit amount (\$213) to the average CAP credits actually provided to comparable customers in calendar year 2019 (\$624) to conclude that "the calculated CAP bill is too low based on Mr. Ogden's unreasonably low consumption." OCA St. 4-SR, p. 10, lines 5-7.

In fact, Mr. Colton's calculated CAP bill amount is too low based on Mr. Colton's own miscalculation, not any error in the Company's data. Mr. Colton's calculation excludes customers' non-distribution charges. As I described in my rebuttal testimony, "Table No. 3 sets forth the distribution bill impacts for nonheating residential customers at the average usage levels shown in Table No. 1 and Table No. 2 (DLC Statement 16-R, page 13, lines 16-18) (emphasis added). Mr. Colton ignores this distinction and disregards customers' surcharges, supply and transmission charges, which necessarily causes a dramatic reduction in his calculation of CAP customer bill amounts. Based on this clear misunderstanding, Mr. Colton's testimony on the CAP usage being substantially too low should be disregarded in its entirety (OCA Statement 4-SR, page 9, line 4 through page 11, line 22).

I would also observe that Mr. Colton's attempt to undermine the validity of the Company's data appears to serve little purpose other than to introduce opportunity for errors, such as the one Mr. Colton commits. My rebuttal testimony on this issue was based upon primary source data - i.e., the Company's billing system data.
Q. Mr. Colton avers that "the CAP participant population is a subset of the Confirmed Low-Income population." (OCA State No. 4-SR, p. 11, lines 6-7). With respect to how those terms are used in your rebuttal testimony, including Tables 1 and 2, is he correct?
A. Mr. Colton is incorrect. As I explained above, CAP customers were identified separately from Confirmed Low-Income, Non-CAP customers in the usage data I presented in my rebuttal testimony. This clear delineation is evidenced in my rebuttal testimony within the column headings of Table No. 1 through Table No. 4 (DLC Statement 16-R, Pages 12 and 14).
Q. Does this conclude your rejoinder testimony?
A. Yes. I reserve the right to supplement my testimony through the course of this proceeding.

\author{
Duquesne Light Company \\ Docket No. R-2021-3024750 \\ Interrogatories of \\ Coalition for Affordable Utility Services and Energy Efficiency in Pennsylvania (CAUSE-PA)
}

Set I

Witness: Katherine Scholl and Todd Mobley

\section*{CAUSE-PA-I-24}
24. Please provide weather normalized median and mean annual usage for 2019 to date in 2021, disaggregated by month for:
a. Residential customers who participated in CAP, disaggregated by the following FPIG tiers: 0-50\% FPL; 51-100\% FPL; and 101-150\% FPL;
b. Residential customers who are confirmed low-income but not enrolled in CAP;
c. Residential customers who are not confirmed low-income.

For the purposes of responding to this question, the phrase "confirmed low income customer" should be defined consistent with the definition used for the purposes of reporting "confirmed low income customer" data to the Commission pursuant to 52 Pa . Code § 54.71 et seq.

\section*{Response:}

See CAUSE-PA-I-24 - Attachment 1.xlsx
Please note that the weather normalization process is done at the rate class level, as such we cannot weather normalize for the requested subsets and the usage included in the attachment is actual usage.

\section*{CAUSE-PA I-24 - Attachment 1}
24. Please provide weather normalized median and mean annual usage for 2019 to date in 2021, disaggregated by month for:
a. Residential customers who participated in CAP, disaggregated by the following FPIG tiers: 0-50\% FPL; 51-100\% FPL; and 101-150\% F
b. Residential customers who are confirmed low-income but not enrolled in CAP;
c. Residential customers who are not confirmed low-income.

For the purposes of responding to this question, the phrase "confirmed low income customer" should be defined consistent with the

Use Per Customer (kWh) for 2019 to date in 2021, disaggregated by month Income tier stated as a percent of Federal Poverty Level
\begin{tabular}{|llllllllllll}
\hline Income Tier & & Jan-19 & Feb-19 & Mar-19 & Apr-19 & May-19 & Jun-19 & Jul-19 & Aug-19 & Sep-19 \\
\hline Up to 50\% & Median & 715 & 676 & 603 & 521 & 496 & 566 & 792 & 835 & 710 \\
Up to 50\% & Mean & 970 & 933 & 835 & 657 & 576 & 651 & 925 & 939 & 809 \\
\hline \(51-100 \%\) & Median & 658 & 624 & 557 & 467 & 424 & 475 & 675 & 705 & 594 \\
\(51-100 \%\) & Mean & 910 & 881 & 780 & 601 & 510 & 572 & 819 & 831 & 708 \\
\hline \(101-150 \%\) & Median & 659 & 622 & 553 & 469 & 429 & 493 & 723 & 759 & 629 \\
\(101-150 \%\) & Mean & 914 & 885 & 784 & 606 & 516 & 589 & 863 & 879 & 738 \\
\hline
\end{tabular}

Use Per Customer (kWh) for 2019 to date in 2021, disaggregated by month
\begin{tabular}{|lrrrrrrrrr}
\hline & Jan-19 & Feb-19 & Mar-19 & Apr-19 & May-19 & Jun-19 & Jul-19 & Aug-19 & Sep-19 \\
\hline Median & 652 & 610 & 548 & 465 & 429 & 488 & 696 & 743 & 619 \\
Mean & 886 & 846 & 764 & 589 & 503 & 575 & 834 & 855 & 723 \\
\hline
\end{tabular}

Use Per Customer (kWh) for 2019 to date in 2021, disaggregated by month
\begin{tabular}{|lrrrrrrrrrr}
\hline & Jan-19 & Feb-19 & Mar-19 & Apr-19 & May-19 & Jun-19 & Jul-19 & Aug-19 & Sep-19 \\
\hline Median & 541 & 505 & 449 & 385 & 374 & 462 & 720 & 763 & 612 \\
Mean & 710 & 671 & 592 & 477 & 449 & 560 & 845 & 864 & 717 \\
\hline
\end{tabular}
:PL;
definition used for the purposes of reporting "confirmed low income customer" data to the Commission pursuant to 52 Pa. Code § 54.71 et sec
\begin{tabular}{rrrrrrrrrrrr}
\hline Oct-19 & Nov-19 & Dec-19 & Jan-20 & Feb-20 & Mar-20 & Apr-20 & May-20 & Jun-20 & Jul-20 & Aug-20 & Sep-20 \\
\hline 615 & 528 & 627 & 665 & 589 & 588 & 571 & 538 & 672 & 937 & 963 & 796 \\
719 & 657 & 836 & 897 & 808 & 805 & 706 & 649 & 777 & 1,047 & 1,093 & 888 \\
\hline 524 & 474 & 579 & 624 & 549 & 544 & 512 & 475 & 569 & 777 & 802 & 653 \\
634 & 595 & 777 & 843 & 755 & 756 & 647 & 588 & 687 & 916 & 959 & 767 \\
\hline 541 & 480 & 579 & 628 & 555 & 548 & 521 & 484 & 596 & 842 & 870 & 687 \\
653 & 597 & 778 & 854 & 767 & 766 & 655 & 599 & 713 & 968 & 1,007 & 795 \\
\hline
\end{tabular}
\begin{tabular}{rrrrrrrrrrrr}
\hline Oct-19 & Nov-19 & Dec-19 & Jan-20 & Feb-20 & Mar-20 & Apr-20 & May-20 & Jun-20 & Jul-20 & Aug-20 & Sep-20 \\
\hline 527 & 454 & 558 & 607 & 533 & 529 & 501 & 475 & 585 & 823 & 865 & 710 \\
634 & 564 & 739 & 815 & 723 & 728 & 629 & 578 & 695 & 944 & 1,006 & 809 \\
\hline
\end{tabular}
\begin{tabular}{rrrrrrrrrrrr}
\hline Oct-19 & Nov-19 & Dec-19 & Jan-20 & Feb-20 & Mar-20 & Apr-20 & May-20 & Jun-20 & Jul-20 & Aug-20 & Sep-20 \\
\hline 496 & 389 & 474 & 514 & 446 & 438 & 431 & 407 & 553 & 831 & 856 & 658 \\
600 & 474 & 601 & 662 & 579 & 583 & 527 & 497 & 666 & 946 & 978 & 762 \\
\hline
\end{tabular}
\begin{tabular}{rrrrrrrr|r|r|r|}
\hline Oct-20 & Nov-20 & Dec-20 & Jan-21 & Feb-21 & Mar-21 & Apr-21 & 2019 & 2020 & Jan-Apr 2021 \\
\hline 544 & 566 & 642 & 746 & 710 & 659 & 544 & 7,684 & 8,071 & 2,659 \\
622 & 673 & 813 & 977 & 994 & 942 & 663 & 9,508 & 9,778 & 3,576 \\
\hline 456 & 489 & 568 & 661 & 639 & 583 & 473 & 6,756 & 7,018 & 2,356 \\
541 & 599 & 739 & 890 & 916 & 849 & 592 & 8,618 & 8,796 & 3,247 \\
\hline 464 & 495 & 569 & 669 & 647 & 588 & 482 & 6,936 & 7,259 & 2,386 \\
544 & 601 & 743 & 903 & 939 & 859 & 604 & 8,802 & 9,011 & 3,305 \\
\hline
\end{tabular}
\begin{tabular}{rrrrrrr|r|r|r|}
\hline Oct-20 & Nov-20 & Dec-20 & Jan-21 & Feb-21 & Mar-21 & Apr-21 & 2019 & 2020 & Jan-Apr 2021 \\
\hline 477 & 505 & 589 & 711 & 650 & 605 & 493 & 6,789 & 7,199 & 2,459 \\
552 & 608 & 746 & 951 & 908 & 854 & 615 & 8,511 & 8,832 & 3,327 \\
\hline
\end{tabular}
\begin{tabular}{rrrrrrr|r|r|r|}
\hline Oct-20 & Nov-20 & Dec-20 & Jan-21 & Feb-21 & Mar-21 & Apr-21 & 2019 & 2020 & Jan-Apr 2021 \\
\hline 405 & 414 & 480 & 560 & 512 & 468 & 399 & 6,170 & 6,433 & 1,939 \\
483 & 498 & 599 & 723 & 683 & 630 & 488 & 7,560 & 7,780 & 2,524 \\
\hline
\end{tabular}```


[^0]:    ＊Prior to April 21，2011，CAP related allowance was included within general distribution rates．Commencing April 21，2011，such costs were included within the Universal Service Charge and thus are not included base distribution rates as discussed within DFR II－D－5．

[^1]:    cc: Kerry Klinefelter, FUS
    Kathleen Aunkst, Secretary's Bureau

[^2]:    cc: Kerry Klinefelter, FUS
    Kathleen Aunkst, Secretary's Bureau
    David Huff, FUS

[^3]:    ${ }^{1}$ According to the Applicants, the Short Term Investment Policy of DLH is designed to provide a high degree of safety, liquidity and to a lesser extent yield. Permissible investments include but are not limited to: U.S. Treasury obligations, Commercial Paper, Certificates of Deposits, Bankers Acceptances and Money Market Funds.

[^4]:    ${ }^{2}$ For example, see the Secretarial Letter regarding the First Energy Pennsylvania Utilities intra-system money poll at docket no. G-00020956.

[^5]:    'Exhibit A has been revised since the conclusion of the Management Audit only to reflect the current name of the Cash Pool and to indicate that DLH or one of its subsidiaries will act as agent for the participants and will administer the Pool. DQE Capital Corporation is the current Agent.

[^6]:    1st Mortgage Bond 4．76\％due 2／3／42
     1st Mortgage Bond 5．02\％due 2／4／44 1st Mortgage Bond 5．12\％due 2／4／54
    1st Mortgage Bond $3.78 \%$ due $3 / 2 / 45$ 1st Mortgage Bond 3．93\％due 3／2／55 1st Mortgage Bond 3．93\％due 7／15／45
     1st Mortgage Bond $3.89 \%$ due 2／1／48 1st Mortgage Bond $4.04 \%$ due 2／1／58 1st Mortgage Bond $\mathbf{3 . 1 1 \%}$ due 5／5／50

[^7]:    These reports are mandatory under the Federal Power Act, Sections 3, 4(a), 304 and 309, and 18 CFR 141.1 and 141.400. Failure to report may result in criminal fines, civil penalties and other sanctions as provided by law. The Federal Energy Regulatory Commission does not consider these reports to be of confidential nature

[^8]:    Source: Moody's Investors Service

[^9]:    Source: Duquesne Light Holdings

[^10]:    Source: Moody's Financial Metrics

[^11]:    329 June 2020
    This document has been prepared for the use of Angela Feldbauer and is protected by law. It may not be copied, transferred or disseminated unless authorized under a contract with Moody's or otherwise authorized in writing by Moody's.

[^12]:    1/ Energy Efficiency surcharge is a weighted rate for calculation purposes based on commercial and industrial sales.

[^13]:    *Annual Accrual is charged on a vehicle by vehicle basis.

[^14]:    Exhibit 2 FPFTY 2022 4-8-21

[^15]:    Exhibit 2 FPFTY 2022 4-8-21
    C_4_p2 (A51..N110)

[^16]:    Exhibit 2 FPFTY 2022 4-8-21

[^17]:    Exhibit 2 FPFTV 2022 4-8.-21
    D_1_-p2 (A51..L100)

[^18]:    Exhibit 2 FPFTY 2022 4-8-21
    D_3. ${ }^{\text {P2 }}$ (A61 AB120)

[^19]:    Exnibit 2 FPFTY 2022 4-8-2
    D_9_p1 (A46..N900)

[^20]:    Exhibit 2 FPFTY 2022 4-8-21

[^21]:    DLC RRM 2022 FPFTY 4-8-21
    D 16 (A366. P405)

[^22]:    Exhibit 3 FTY 2021 4-8-21
    B_4_p2 (A326..J390)

[^23]:    Exhibit 3 FTY 2021 4-8-21

[^24]:    Exhibit 3 FTY 2021 4-8-21
    D_1_p2 (A51..L100)

[^25]:    Generation Revenue
    Generation Revenue
    Gross Receipts Tax
    Revenue To Generation Expense
    

[^26]:    Exhibit 3 FTY 2021 4-8-21
    D_7 - 1 ( (A1..R55)

[^27]:    Exhibit 4 HTY 2020 4-8-21
    B-7 (A41..Q80)

[^28]:    Exhibl 4 HTY 2020 4-8-21
    C_3_-_1 (A11. L50)

[^29]:    Exhibit 4 HTY 2020 4-8-21

[^30]:    Jurisdictional Rate Base, Net Operating Income and Revenue Increase

[^31]:    Exhibit 4 HTY 2020 4-8-21

[^32]:    Exhibit 4 HTY 2020 4-8-21
    D_1_p3 (A101.L150)

[^33]:    Exhibit 4 HTY 2020 4-8-21
    D_5B (A121..V180)

[^34]:    Exhibit 4 HTY 2020 4-8-21
    D_8 (A1..N50)

[^35]:    ${ }^{1}$ Duquesne Light files its Inspection and Maintenance plan with thePUC as required by 52 Pa . Code § 57.195. See Docket No. M-2009-2094773.

[^36]:    ${ }^{1}$ See Duquesne Light Company Universal Service and Energy Conservation Plan, Order on Reconsideration, at Appendix A (entered April 19, 2018, at Docket No. M-2016-2543423).

[^37]:    ${ }^{2}$ See Duquesne Light Company Universal Service and Energy Conservation Plan, Orderon Reconsideration (entered April 19, 2018, at Docket No. M-2016-2543423).

[^38]:    ${ }^{1}$ Edison Electric Institute (2021, March). "Electric Transportation Benefits Customers and Communities," Obtained https://www.eei.org/issuesandpolicy/electrictransportation/Documents/Electric Transportation Benefits_C ustomers and Communities.pdf
    ${ }^{2}$ Electric Power Research Institute (2021, February). U.S. EV Registration Data as of December 2020.
    ${ }^{3}$ M.J. Bradley \& Associates (2019, August). "Electric Vehicle Market Status," Obtained from: https://www.mjbradley.com/sites/default/files/ElectricVehicleMarketStatus Update08142019.pdf
    4 Deloitte (2020, July). "Electric vehicles: Setting a course for 2030," Obtained from: https://www2.deloitte.com/us/en/insights/focus/future-of-mobility/electric-vehicle-trends-2030.html

[^39]:    ${ }^{5}$ Federal Register (2021, January). "Tackling the Climate Cris is at Home and Abroad," Obtained from: https://www.federalregister.gov/documents/2021/02/01/2021-02177/tackling-the-climate-crisis-at-home-and-abroad.
    ${ }^{6}$ Electric Power Research Institute (2021, February). Duquesne Light Company Service Territory EV Registration Data as of December 2020.
    ${ }^{7}$ Electric Power Research Institute (2021, January). Duquesne Light Company Service Territory EV Sales Projections as of 2020.
    ${ }^{8}$ City of Pittsburgh Mayor WilliamPeduto (2017, June). "Executive Order 2017-08: Reinforcing Pitts burgh's Commitment to the Global Partnership on Climate Change," Obtained from: https://apps.pittsburghpa.gov/mayorpeduto/Climate exec order 06.02.17 (1).pdf.

[^40]:    ${ }^{9}$ PA DEP (2021, January). "Pennsylvania Electric Vehicle Roadmap: 2021 Update," Obtained from: http://files.dep.state.pa.us/Energy/OfficeofPollutionPrevention/StateEnergy Program/PAElectric VehRoadm apBookletDEP5334.pdf.

[^41]:    ${ }^{10}$ American Lung Association (2020). "State of the Air: Allegheny County," Obtained from: https://www.stateoftheair.org/city-rankings/states/pennsylvania/allegheny.html.

[^42]:    ${ }^{11}$ Advanced Energy Economy (2020, May). "Electric Transportation Supply Chain in Pennsylvania," Obtained from: https://info.aee.net/electric-transportation-supply-chain-in-pennsylvania.
    ${ }^{12}$ U.S. Department of Energy (2021, March). "Maintenance and Safety of Hybrid and Plug-In Electric
    
    ${ }^{13}$ U.S. Department of Energy (2021, March). "eGallon," Obtained from: https://www.energy.gov/maps/egallon.

[^43]:    ${ }^{14}$ U.S. Department of Energy (2021, March). "Electric Vehicle Benefits and Considerations," Obtained from: https://afdc.energy.gov/fuels/electricity benefits.html.
    ${ }^{15}$ Synapse Energy Economics (2019, November). "Making Electric Vehicles Work for Utility Customers," Obtained from: https://www.synapse-energy.com/sites/default/files/Making-Electric-Vehicles-Work-for-Utility-Customers.pdf.

[^44]:    ${ }^{17}$ City of Pittsburgh (2019, September). "EV Task Force Recommendations," Obtained from: https://apps.pittsburghpa.gov/redtail/images/8371 EV Task Force Recommendations.pdf.

[^45]:    ${ }^{18}$ Edis on Electric Institute (2021, February). "Electric Transportation Biannual State Regulatory Update," Obtained
    from: https://www.eei.org/issuesandpolicy/electrictransportation/Documents/FINAL ET\%20Biannual\%20State \%20Regulatory \% 20Update February 2021.pdf.
    ${ }^{19}$ The White House (2021, March) "Fact Sheet: The American Jobs Plan," Obtained from: https://www.whitehouse.gov/briefing-room/statements-releases/2021/03/31/fact-sheet-the-american-jobsplan.

[^46]:    ${ }^{20}$ Electric Power Research Institute (2020). Projections for Duquesne Light Company's Service Territory as of 2020 .

[^47]:    ${ }^{21}$ United States Census Bureau (2019). "American Community Survey - Table DP04," Obtained from: www.data.census.gov.
    ${ }^{22}$ U.S. Department of Energy (2021, January). "Alternative Fuels Data Center," Obtained from: https://afdc.energy.gov.
    ${ }^{23}$ U.S. Department of Energy (2021, January). "Alternative Fuels Data Center EVI Pro Lite tool estimate based on projection of EPRI median scenario of 18,900 EVs in Pittsburgh region," Obtained from: https://afdc.energy.gov/evi-pro-lite.
    ${ }^{24}$ U.S. Department of Energy (2021, January). "Alternative Fuels Data Center EVI Pro Lite tool estimate based on EPRI High scenario of 30,325 EVs in Pittsburgh region," Obtained from: https://afdc.energy.gov/evi-pro-lite.

[^48]:    ${ }^{25}$ E.g., Ross McClane and Qiyu Liu (2021, January). "The United States Needs More Fast Charger: China Can Show How," Obtained from: https://rmi.org/the-united-states-needs-more-fast-chargers-china-can-show-how/.

[^49]:    ${ }^{26}$ United States Census Bureau (2019). "American Community Survey - Table DP04," Obtained from: www.data.census.gov.
    ${ }^{27}$ Idaho National Laboratory (2015). "Plugged In:How Americans Charge Their Electric Vehicles," Obtained from: https://avt.inl.gov/sites/default/files/pdf/arra/PluggedInSummaryReport.pdf.
    ${ }^{28}$ U.S. Department of Energy (2017, January). "Workplace Charging Challenge Progress Update 2016: A New Sustainable Commute," Obtained from: https://www.energy.gov/sites/prod/files/2017/01/f34/WPCC 2016\%20Annual\%20Progress\%20Report.pdf.

[^50]:    ${ }^{29}$ See Settlement paragraph 45(b).

[^51]:    ${ }^{30}$ Duquesne Light Company (2019, January). "Duquesne Light Privacy Policy," Obtained from: https://www.duquesnelight.com/customer-support/policies-forms/privacy-policy.

[^52]:    ${ }^{31}$ Alana Miller, Hye-Jin Kim, Jeffrey Robinson, and Matthew Cas ale of Frontier Group, PIRGEducation Fund, and PennEnvironement. (2018, May). "Electric Buses Clean Transportation for Healthier Neighborhoods and Cleaner Air," Obtained from: $\mathrm{https}: / /$ pennenvironment.org/sites/environment/files/reports/Electric $\% 20 \mathrm{Buses} \% 20-\% 20 \mathrm{PA} \% 20-$ \%20May \% 202018.pdf.
    ${ }^{32}$ Lynn Daniels and Chris Nelder of the Rocky Mountain Institute (2021). "Steep Climb Ahead," Obtained from: https ://rmi.org/insight/steep-climb-ahead/.

[^53]:    ${ }^{33}$ NESCAUM (2020) "Multi-State Medium- and Heavy-Duty Zero Emis sion Vehicle Memorandum of Understanding,"Obtained from: https://www.nescaum.org/documents/multistate-truck-zev-governors-mou20200714.pdf/.
    ${ }^{34}$ American Lung Association (2020, September). "The Road to Clean Air: Benefits of a Nationwide Transition to Electric Vehicles," Obtained from: https://www.lung.org/clean-air/electric-vehicle-report.

[^54]:    ${ }^{35}$ Port Authority of Allegheny County (2021). "Annual Service Report 2020," Obtained from: https://www.portauthority.org/siteassets/inside-the-pa/surveys-andreports/annual service report fy 2020 web.pdf

[^55]:    ${ }^{36}$ Madis on Gas and Electric (2019, March). Application of Madison Gas and Electric Company for Authority to Change Electric and NaturalGas Rates. DocketNo. 3270-UR-120. Obtained from: https://apps.psc.wi.gov/APPS/dockets/content/detail.as px?id=3270\&case=UR\&num=120;
    Xcel Energy (2019, May). Compliance Filing Residential Electric Vehicles Charging Tariff Docket No. E002/M-15-111 AND E002/M-17-817. Obtained from: Document ID 20195-153306-01.

[^56]:    ${ }^{37}$ Greenlining Institute (2021). "Electric Vehicles for All: An Equity Toolkit," Obtained from: https://greenlining.org/resources/electric-vehicles-for-all/.

[^57]:    *Charging stations installed but site not yet electrified

[^58]:    ${ }^{1}$ Consistent with Settlement Tl 45(a), only \$500,000 of this investment has been included in rate base.

[^59]:    ${ }^{2}$ Most commercially available EVs have fuel economies between $0.25 \mathrm{kWh} / \mathrm{mi}$ and $0.35 \mathrm{kWh} / \mathrm{mi}$.
    https://www.fueleconomy.gov/feg/PowerSearch.do?action=noform\&path=3\&year1=2017\&year2=2018\&vtype=Electric
    \&srchtyp=newAfv\&pageno=1\&sortBy=Comb\&tabView=0\&tabView=0\&rowLimit=50
    ${ }^{3}$ https://www.epa.gov/automotive-trends/highlights-automotive-trends-report
    4 Includes $\mathrm{CO}_{2}$ emissions https://www.eia.gov/electricity/data/state/emission annual.xIs;
    https://www.eia.gov/electricity/data/state/annual generation state.xls
    ${ }^{5}$ https://afdc.energy.gov/vehicles/electric emissions sources.html

[^60]:    ${ }^{1}$ Settlement $\mathbb{I}$ 45(a) \$500,000 of this investment approved for recovery in rate base.

[^61]:    ${ }^{2}$ Most commercially available EVs have fuel economies betw een $0.25 \mathrm{kWh} / \mathrm{mi}$ and $0.35 \mathrm{kWh} / \mathrm{mi}$. https://w ww.fueleconomy.gov/feg/Pow erSearch.do?action=noform\&path=3\&year1=2017\&year2=2018\&vtype=Electric \&srchtyp=new Afv\&pageno=1\&sortBy=Comb\&tabView $=0$ \&tabView $=0$ \&row Limit $=50$
    ${ }^{3}$ https://w ww .epa.gov/automotive-trends/highlights-automotive-trends-report
    ${ }^{4}$ Includes $\mathrm{CO}_{2}$ emissions https://w w w.eia.gov/electricity/data/state/emission annual.xls;
    https://www.eia.gov/electricity/data/state/annual generation state.xls
    ${ }^{5}$ https://afdc.energy.gov/vehicles/electric emissions sources.html

[^62]:    ${ }_{7}^{6} \mathrm{https}: / / a f d c . e n e r g y . g o v / d a t a / 10310$
    7 "Net Generation by State by Type of Producer by Energy Source, 1990-2019"; found at https://w ww.eia.gov/electricity/data/state/
    8 "U.S. Eectric Pow er Industry Estimated Emissions by State, 1990-2019'; found at https://w ww.eia.gov/electricity/data/state/
    ${ }^{9}$ https://afdc.energy.gov/vehicles/electric emissions sources.html

[^63]:    ${ }^{1}$ https://www.dep.pa.gov/PublicParticipation/OfficeofEnvironmentalJustice/Pages/PA-Environmental-Justice-Areas.aspx

[^64]:    ${ }^{2}$ Revenue figures represent estimated incremental base distribution revenues, exclusive of surcharges or transmission/supply charges.

[^65]:    ${ }^{1}$ For qualified low-income Customers, DLC may pay up to $\$ 2,000$ in installation costs, which may include home electrical equipment upgrade costs in addition to charging station installation costs.

[^66]:    ${ }^{1}$ Section $13001(\mathrm{~d})(3)(A)$ of the TCJA defines an "excess taxreserve" to mean the excess of the reserve for deferred taxes (as described in § 168(i)(9)(A)(ii)) as of the day before the corporate rate reductions provided in the amendments made by section 13001(a) take effect, over the amount which would be the balance in such reserve if the amount of such reserve were determined by assuming that the corporate tax rate reductions provided in the TCJA were in effect for all prior periods.

[^67]:    ${ }^{1}$ Bluefield WaterWorks \& Improvement Co.v.P.S.C. of West Virginia, 262 U.S. 679 (1923) and F.P.C. v.Hope Natural Gas Co., 320 U.S. 591 (1944).

[^68]:    ${ }^{2}$ For example, two otherwise similarly situated firms each reporting $\$ 1.00$ in earnings per share would have different market prices at varying levels of risk (i.e., the firm with a higher level of risk will have a lower share value, while the firm with a lower risk profile will have a higher share value).

[^69]:    ${ }^{3}$ The complement of the operating ratio is the operating margin which provides a measure of profitability. The higher the operating ratio, the lower the operating margin.

[^70]:    ${ }^{4}$ Beta is a relative measure of the historical sensitivity of the stock's price to overall fluctuations in the New York Stock Exchange Composite Index. The "Beta coefficient" is derived from a regression analys is of the relationship between weekly percentage changes in the price of a stock and weekly percentage changes in the NYSE Index over a period of five years. The betas are adjusted for their long-termtendency to converge toward 1.00. A common stock that has a beta less than 1.0 is considered to have less systematic risk than the market as a whole and would be expected torise and fall more slowly than the rest of the market. A stock with a beta above 1.0 would have more systematic risk.

[^71]:    ${ }^{5}$ Although the popular application of the DCF model is often attributed to the work of Myron J. Gordon in the mid-1950's, J. B. Williams exposited the DCF model in its present formnearly two decades earlier.

[^72]:    ${ }^{6}$ Gordon, Gordon \& Gould, "Choice Among Methods of Estimating Share Yield," The Journal of Portfolio Management (Spring 1989).

[^73]:    ${ }^{7}$ Robert S. Hamada, "The Effects ofthe Firm's Capital Structure on the Systematic Risk of Common Stocks" The Journal of Finance Vol. 27, No. 2, Papers and Proceedings of the Thirtieth Annual Meeting of the American Finance Association, New Orleans, Louisiana, December 27-29, 1971. (May 1972), pp. 435-452.

[^74]:    See Page 2 for Notes.

[^75]:    Source of Information: Standard \& Poor's Utility COMPUSTAT Moody's Investors Service
    Standard \& Poor's Corporation

[^76]:    Source of Information: Company provided data

[^77]:    ${ }^{1}$ Includes, but not limited to cogeneration and small power production facilities that are qualified in accordance with Part 292 of Chapter 1, Title 18, Code of Federal Regulations (qualifying facilities).

[^78]:    ${ }^{2} 1,310$ hours is $15 \%$ of totalhours in a non-leap year or 8,760 .

[^79]:    ${ }^{3}$ Source of data are fromthe Proof of Revenues calculations, AttachmentDFRIV-C-Proof.

[^80]:    ${ }^{4}$ Figure 1 shows the range to be Hour Ending 12, which includes thehour from 11 am to 12 am, through Hour Ending 20, which includes the hour from 7 pm to 8 pm , thus ending the peak period at 8 pm .

[^81]:    ${ }^{5}$ Note that if a customer exceeds the Maintenance Demand by more than $5 \%$, the Maintenance Demand is increased to the actual monthly demand forremainder of Base Period, but the overage fee applies in the month of the exceedance, prior to adjustment of Maintenance Demand, thus is based on the Mainten ance Demand in effect during the billing month.

[^82]:    A.

    To address the current challenges of Rider No. 16 and move toward more costreflective rates, the Company proposed changes to Rider No. 16, with key changes described below:

    1. Adjust definitions to clarify that Rider No. 16 is only for distribution services:

    - Replacement of the term "Supplemental Power" with "Supplemental Service" and change definition to refer only to providing distribution services energy provided under Supplemental Service;
    - Replacement of the term "Back-Up Power" with "Back-Up Service" and change definition to refer only to distribution services;
    - Adjust definition of Supplementary Service Billing Determinants to be based on the contracted kW specified for Supplementary Service;
    - Adjust definition of Back-Up Service Billing Determinants to be based on the contracted kW specified for Back-Up Service.

    2. Elimination and introduction of terms to clarify the new rate design as follows:

    - Elimination of term "Contract Demand";
    - Introduction of the following terms:
    - "Contract" to refer to the agreement entered into by the customer and the Company and includes specification of the levels of service provided under Rider No. 16;
    - "Maintenance Contract Demand" to refer to the maximum electrical capacity in kilowatts ( $\mathrm{kW} \mathrm{)} \mathrm{that} \mathrm{the} \mathrm{Company} \mathrm{shall} \mathrm{be} \mathrm{required} \mathrm{to} \mathrm{deliver}$ to the customer for "Back-Up Delivery Service";

[^83]:    ${ }^{6}$ Riders will be applied as designed and cost recovered fromthose riders will be based on the customer's relevant rider billing determinant.

[^84]:    ${ }^{7}$ Pennsylvania Public Utility Commission. Total Resource CostTest. 2021 TRC Test Final Order. https://www.puc.pa.gov/pcdocs/1648126.docx.

[^85]:    ${ }^{1}$ California Public Utilities Commission. Cost-effectiveness. Standard Practice Manual https://www.cpuc.ca.gov/general.aspx?id=5267.

[^86]:    2 Pennsylvania Public Utility Commission. Total Resource Cost Test. https://www.puc.pa.gov/filing-resources/issues-laws-regulations/act-129/total-resource-cost-test/

[^87]:    ${ }^{3}$ Upfront ProgramCosts reflect an option where enrolled customers can pay for charging equipment at theoutset of participation and reduce their monthly participant charges. The analysis assumes no upfront participant costs are incurred; all costs are bundled in the monthly participant charge.

[^88]:    ${ }^{4}$ US Department of Energy. Energy Efficiency and Renewable Energy. Alternative Fuels Data Center. Landing page for loadshapes and related data (Electric Vehicle Infrastructure Projection Tool). https://afdc.energy.gov/evi-pro-lite/load-profile.
    ${ }^{5}$ AAA. Gas prices. https ://gas prices.aaa.com/state-gas-price-averages/.
    6 EPA. 2020. "The 2020 EPA Automotive Trends Report." https://nepis.epa.gov/Exe/ZyPDF.cgi/P1010U68.PDF?Dockey=P1010U68.PDF.

[^89]:    ${ }^{7}$ Upfront ProgramCosts reflect an option where enrolled customers can pay for charging equipment at the outset of participation and reduce their monthly participant charges. The analysis assumes no upfront particip ant costs are incurred; all costs are bundled in the monthly participant charge.

[^90]:    depreciable plant

[^91]:    COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 46.6 1.38

[^92]:    ${ }^{1}$ Winfrey, Robley. Statistical Analyses of Industrial Property Retirements. Iowa State College, Engineering Experiment Station, Bulletin 125. 1935.
    ${ }^{2}$ Marston, Anson, Robley Winfrey and Jean C. Hempstead. Engineering Valuation and Depreciation, 2nd Edition. New York, McGraw-Hill Book Company. 1953.

[^93]:    ${ }^{3}$ Winfrey, Robley, Supra Note 1.
    ${ }^{4}$ Marston, Anson, Robley Winfrey, and Jean C. Hempstead, Supra Note 2.
    ${ }^{5}$ Wolf, Frank K. and W. Chester Fitch. Depreciation Systems. Iowa State University Press. 1994.

[^94]:    ${ }^{\text {a }}$ Transfer Affecting Exposures at Beginning of Year
    ${ }^{\mathrm{b}}$ Transfer Affecting Exposures at End of Year
    ${ }^{\text {c }}$ Sale with Continued Use
    Parentheses Denote Credit Amount

[^95]:    TOTAL

[^96]:    Gannett Fleming

[^97]:    Gannett Fleming

[^98]:    Gannett Fleming

[^99]:    Gannett Fleming
    VII-33

[^100]:    Gannett Fleming

