

Pennsylvania Public Utility Commission 2010 Annual Winter Reliability Assessment Meeting November 4, 2010

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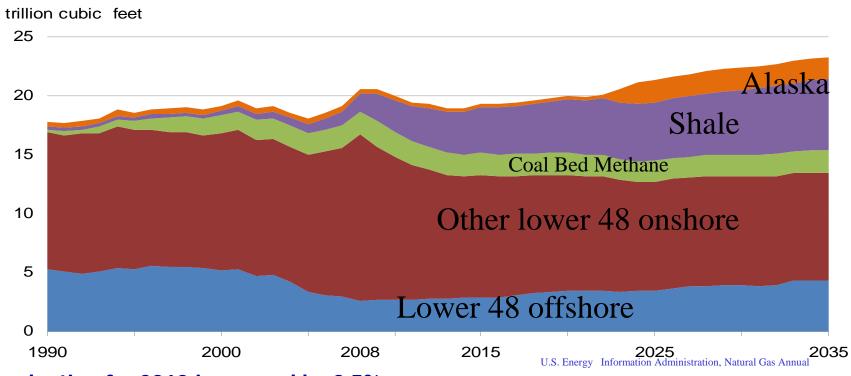
PECO Energy Company

2010-11 Reliability Overview

- Production: Increases driven by shale plays
- > Storage: Projected to reach 2nd highest level on record
- <u>Demand:</u> EIA projects 2% decrease in residential consumption, but 2010 saw an increase in electric production use
- Marcellus: and other shales have changed the game
- Infrastructure: Significant capacity expansions have been made in the North East
- Weather: Outlook is moderate to slightly warmer winter
- Price: Outlook is to remain moderate
- PECO Energy: Winter Reliability Planning



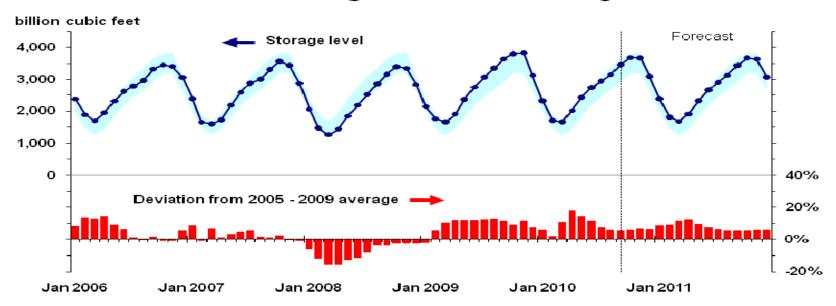
Production: Increases driven by shale plays



- **▶Production for 2010 increased by 3.5%**
- ➤ National production has grown 23% in five years to 59 bcfd
- >For lower 48, projected production increases are all from shale gas
- >971 gas rigs operating, up 35% from last year
- >55% of all rigs operating are horizontal (shale)
- >PA has 55,631 producing gas wells in 2008, up 31% in five years
- >Nationally there are 478,562, an increase of 20% in 5 years



U.S. Working Natural Gas in Storage



Note: Colored band around storage levels represents the range between the minimum and maximum from Jan. 2005 - Dec. 2009

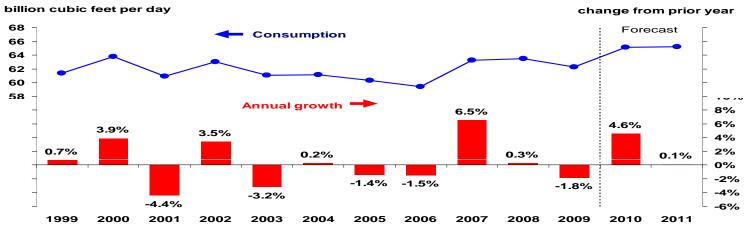


Source: Short-Term Energy Outlook, October 2010

- 2010 inventory will be 220 BCF higher than the 5 year Average
- Storage capacity increased by 160 Bcf in 2010
- > Inventories will approach 97% of last year's record levels
- Projected 3,726 BCF in storage by Oct 31







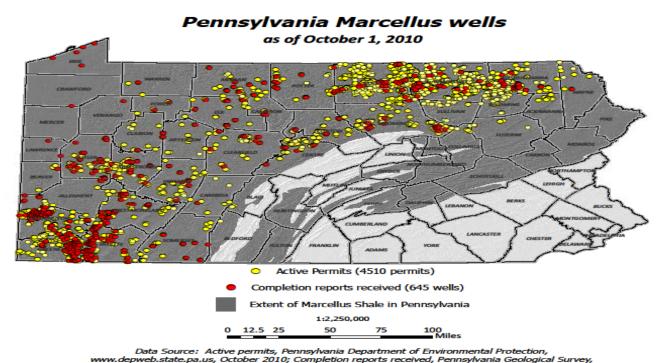


Source: Short-Term Energy Outlook, October 2010

- Annual demand increase for 2010 estimated as 4.6%
- Annual demand for 2011 projected as 0.1% increase, reflects 1% growth in nonelectric generation, residential, commercial and industrial usage, and slight decline in generation
- 2010 forecast gas use for electric production growth is 7.6% due to warm weather



Marcellus: and other shales have changed the game



October 2010; *For Display Purposes Only*

- Marcellus production increased from 0.06 bcfd in 2008 to 1.28 bcfd in 2010
- 2011 Projection is 2.48 bcfd
- Cost of developing wells has declined with improvements to frac tech
- Robust drilling fueled by economics of vicinity to market, "Hold by Production" contracts, and expensive land/sunk cost for Joint ventures
- > Break even is approximately \$3.00 NYMEX for core PA- lowest among the shales
- Short turn around time

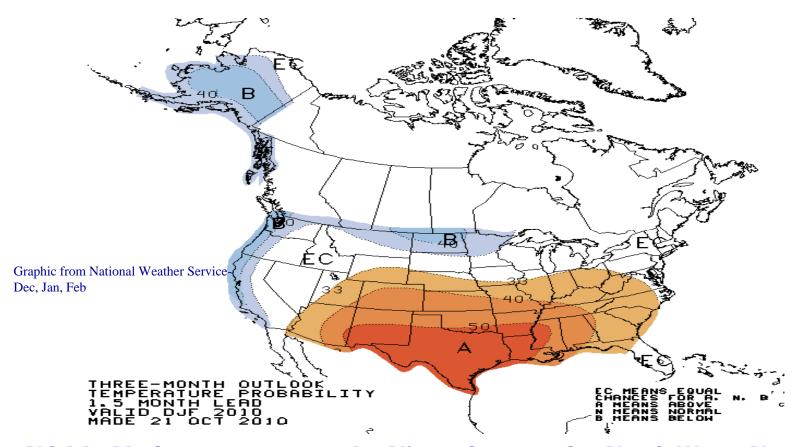


	<u>2010 NE</u> <u>Expansion</u> <u>Projects</u> Capacity MMcfd	Pipeline
Cob Expansion	70	Columbia
Delta Lateral	208	Transco
Majorsville	225	Columbia
East West Project	281	Algonquin
Hub II Expansion	20	DTI
Hub III Expansion	224	DTI
WB Line	200	Columbia
Total	1228	

	2009 NE Expansion Projects	
	Capacity MMcfd	Pipeline
Clarington	1800	Rex
DTI Hub	200	DTI
Northern Bridge	150	TETCO
Sentinel Phase II	281	Transco
Iroquois 09/09 Phase II	2.5	Iroquois
J-2 Loop	140	AGT
Total	2573.5	_

- >Other than Rex, the primary driver for the expansions is to transport shale gas
- **≻**Significant expansions made nationally
- >LDCs are less frequently the subscribers of new transport

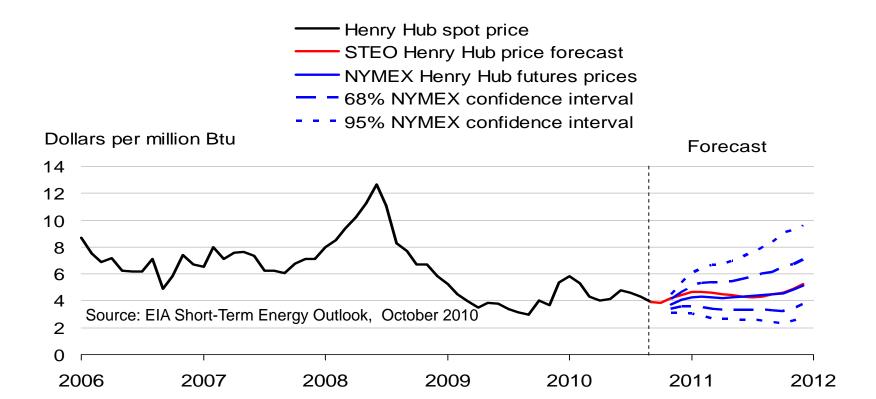




- > NOAA "Moderate to strong "La Nina" thus: cooler North West, Northern plains, milder West and South, typical Mid-Atlantic and North East"
- October through March, 3% warmer than last year, 1% lower than 30 year average
- PECO's forecast mostly concurs, mild winter in the South, cooler in the West, moderate in the East

An Exelon Company

Price: Outlook is to remain moderate



- EIA calls for 4.% increase in natural gas home heating bills 2010 vs. 2009. (6% price increase less 2% usage decline)
- > EIA projects \$4.16 Henry Hub for 4Q 2010, \$4.68 for Jan., and \$4.58 for 2011
- Record demand for gas for electric generation influenced 2010 prices compared to 2009
- North East basis has declined, Transco Z6 non was \$0.63 in Oct 2008, currently is \$0.37



- Complete Design day and winter demand plan
 - 0° F degree day
 - probability of occurrence 4.6%
 - 795,000 mcf sendout
- Procure proper interstate transportation and storage
 - 8 storage service on 6 pipelines-22 bcf of inventory, 358,000 dth WQ
 - FT Long haul to gate from production area to gate 345,118 dth
 - Primary firm, "in path" transportation
 - \$80 million is transportation and storage demand charges
- Procure Winter Supply
 - All suppliers are under NAESB contracts
 - All suppliers meet PECO credit standards
 - Prefer a history with all base load suppliers
- Supply Portfolio Diversity
 - 11 base load suppliers
 - 7 other spot suppliers
 - 16 planned purchase locations
 - 8 storage withdraw locations
 - 6 pricing mechanisms
- Storage management plan to maintain 100 % deliverability through Feb 15th
- > On system LNG and Propane, 157,000 and 25,000 mcf deliverability
- > PECO's distribution system improvements, invest to improve system capacity and reliability.
- PECO's Winter Readiness Plan
- Interruption Policy



The combination of robust supply and expanded transmission infrastructure puts PECO in an excellent position to meet our obligation to provide least cost, reliable natural gas for our customers

