ENERGY MARKET

Monthly Update

January 2018

Market Commentary

Powered by Transparent Energy and Gary Graham, Director of Energy Management

We have finally entered 2018 after a 2017 Q4 that was largely characterized by a lack of volatility and downward price pressure - a result of depressed demand in the face of record-setting domestic natural gas production. Seemingly on cue, winter finally took hold of both the weather and the corresponding price trajectory in the final week of the year as freezing temperatures gripped much of the country for a two-week period and Real-Time commodity prices reached levels we have not witnessed since the polar vortex of 2014. During this time, we saw five consecutive trading sessions where the prompt trading month settled higher than its previous mark, generating a swirl of excitement within the bull camps, though it appears to have been short-lived. Weather forecasts for the remainder of the month point to a sustained thaw that should once again keep demand for natural gas flat (or seasonally depressed), both from a heating perspective and as a generation source for electricity. Even with expectations for the largest storage withdrawal ever this Thursday (~340 bcf), the needle refuses to move convincingly in the bull's direction considering the recently adjusted January forecast.

While demand and production continue to duke it out and shape the day-over-day price movement, we can continue to expect a highly weather-sensitized market that will be susceptible to short-term volatility. We should expect to see both power and natural gas prices remain relatively flat for the next few weeks, with a potential for somewhat limited downside movement if there are no major adjustments to the longer-term weather forecast.

From a regulatory perspective, this recent cold snap and the corresponding closure of the Pilgrim nuclear plant in MA (728 MW) due to unavailable transmission lines, highlights a very important issue for us all to consider in tandem with the DOE's presently proposed Grid Resiliency Pricing Rule. The Notice of Proposed Rulemaking (NOPR) argues namely that coal and nuclear-powered plants are our most "resilient" generating resources and should therefore be compensated in a differing fashion than all other market participants. Despite these considerations, this particular weather event highlighted that (1) "resiliency" is as much about the transmission of reliable power as it is the generation of it and (2) it is equally important to have reliable grid operators (ISOs) that can effectively meet demands of the system through the availability of additional generating resources that are flexible (dual fuel) and/or intermittent (wind). The argument can be reasonably made that this NOPR is more political than economical and has less to do with grid resiliency than it does with selectively propping up certain generating assets at the expense of the utility customer. Both sides of this conversation will undoubtedly continue to dominate the first half of 2018.

Quick Hits

- The U.S. burned the most natural gas ever (143 billion cubic feet) in a single day on Monday, January 1st – breaking a record set during the polar vortex in 2014.
- In its latest Short-Term Energy Outlook, the EIA projects that Henry Hub natural gas prices in 2018 will increase just over ten cents Y-O-Y to $3.12/MMBtu versus $3.01/MMBtu in 2017.
- With a permanent chairman (Kevin McIntyre) and full complement of commissioners now in place, FERC will likely modify "and keep moving" the Department of Energy's controversial proposal to offer price supports to coal and nuclear plants. FERC now has until Jan. 10th to act on the NOPR.

Bullish Factors

- Strong heating demand driven by sustained cold at end of December and early January results in further widening of storage deficit as weekly withdrawals are coming in larger than average. This week's withdrawal is expected to be around 340 bcf, compared to 5-year average of 162 bcf.
- Polar blast from "bomb cyclone" resulted in wellhead freeze-offs, slowing natural gas production compared to its current trajectory.
- The opening of Cove Point terminal in MD and Sabine Pass operating at full exporting capacity will increase incremental demand this winter. The first shipment out of Cove Point is expected in the coming days/weeks.

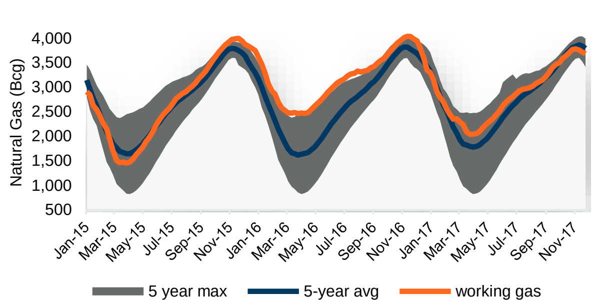
Bearish Factors

- Arctic air is expected to retreat by mid-January, resulting in depressed demand and increased production as freeze offs will no longer impact supply levels.
- ENSO outlook still favoring a weak-to-moderate La Niña winter, which suggests an average winter (on the whole) is expected in the stronger U.S. demand areas
- Alaskan height anomaly showing "trough" pattern in the Jan-18 outlook, a warm pattern that foreshadows persistent warmth in the Northeast

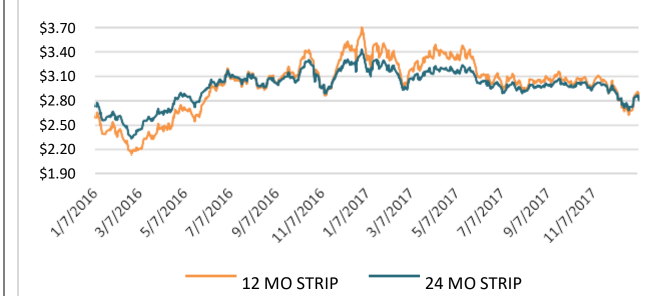
Natural Gas

CURRENT/HISTORICAL STORAGE (Bcf)						HENRY HUB PROMPT MONTH NAT GAS SETTLEMENTS						
Region	This Week	Last Week	% Chg.	Year Ago	5-Yr Avg.	Trade Date	Open	High	Low	Settle	% Chg.	Est. Vol
East	740	782	-5.37%	740	776	1/3/2018	3.04	3.056	2.959	3.008	-1.05 %	280,183
West	1326	1417	-6.42%	1409	1398	1/2/2018	3.03	3.097	2.923	3.056	0.86 %	329,996
Producing	1060	1133	-6.44%	1169	1143	12/29/2017	2.930	3.008	2.92	2.953	0.78%	284,703
TOTAL	3126	3322	-6.18%	3318	3317	12/28/2017	2.749	2.945	2.734	2.914	6.00%	323,294

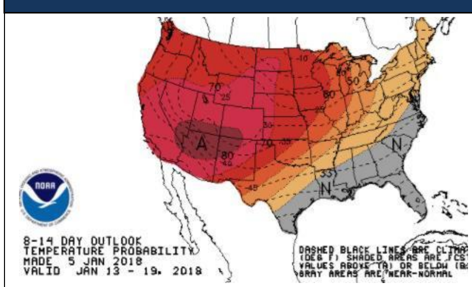
WORKING GAS IN UNDERGROUND STORAGE

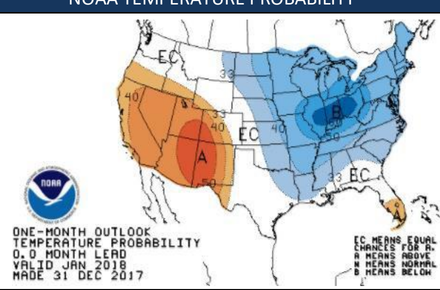


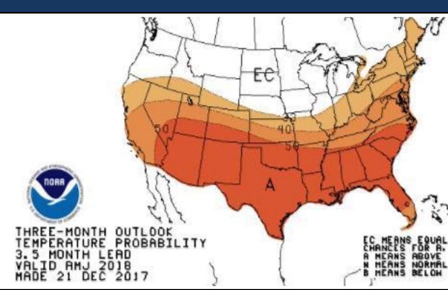
ROLLING 12/24 MOS. NYMEX FORWARD STRIPS ($/DTH)



NOAA TEMPERATURE PROBABILITY







Average Retail Electricity Price Trends (Feb Start)

Week Ending	New Jersey	New York	Massachusetts	Ohio	Illinois	Texas	DC	Pennsylvania	Connecticut
12/1/2017	$0.1017	$0.0648	$0.1158	$0.0624	$0.0596	$0.0468	$0.0763	$0.0708	$0.0965
12/22/2017	$0.0983	$0.0623	$0.1156	$0.0609	$0.0580	$0.0450	$0.0749	$0.0692	$0.0961
12/29/2017	$0.0989	$0.0621	$0.1175	$0.0607	$0.0577	$0.0458	$0.0750	$0.0699	$0.0980

*actual rates may vary by usage. Rates are aggregated from sources reflecting the general service (GS) rate class

Monthly Update

NYISO - Zone J

PJM - PSEG

ERCOT - TX

NE-ISO - MASS HUB

PJM - COMED

PJM - ATSI

Energy Market News

NG supply fundamentals are pointing towards a bullish near-term future
http://bit.ly/2jecKDz

Baker Hughes North American rig count
http://bit.ly/1elov2d

NOAA – US Seasonal Drought Outlook
http://bit.ly/1fx4jgF

EIA Short Term Energy Outlook
http://www.eia.gov/forecasts/steo/

Data Highlights

WTI crude oil futures price — 01/04/2018: **$62.01/bbl**
↑ $2.17 from week earlier — ↑ $8.75 from year earlier

Natural Gas Inventories — 12/29/2017: **3,126 Bcf**
↓ 206 Bcf from week earlier — ↓ 192 Bcf from year earlier

Natural gas futures price — 01/04/2018: **$2.880/MMBtu**
↓ $0.034 from week earlier — ↓ $0.387 from year earlier

Weekly coal production — 12/30/2017: **10.482 million tons**
↓ 5.034 million tons week earlier — ↓ 4.090 million tons year earlier

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