WHOLESALE NATURAL GAS MARKET ASSESSMENT
Wholesale Natural Gas Futures Prices as of May 10, 2016

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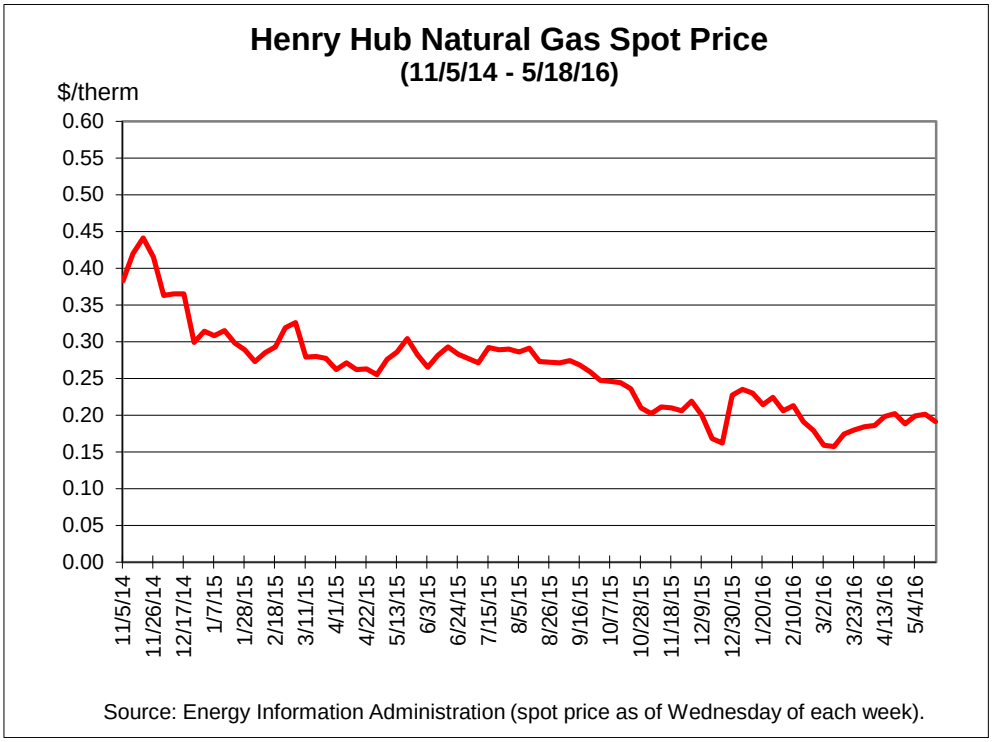
Outlook for Wholesale Natural Gas Prices

This report presents the Office of Technical and Regulatory Analysis' ("OTRA") assessment of wholesale natural gas supply and prices for May 2016.[1] OTRA's current assessment of the natural gas market suggests that wholesale natural gas prices may remain around $0.20 per therm, or less, during May 2016 (see Henry Hub Spot Price figure). Recent natural gas spot prices are at least 25 percent lower than prices from the same period a year ago.



Source: Energy Information Administration (spot price as of Wednesday of each week).

The Energy Information Administration ("EIA") indicates that the average Henry Hub natural gas spot price for April 2016 was about $0.19 per therm, up from about $0.17 per therm for the previous month.[2] In its Short-Term Energy Outlook ("STEO") for May 2016, EIA indicates that **"[t]hrough the 2015–16 winter, prices remained relatively low because of lower demand as a result of warmer-than-normal temperatures, record inventory levels, and production growth. EIA expects prices will gradually rise through the summer, as demand from the electric power sector increases, but forecast prices remain lower than they were last summer. Monthly average Henry Hub spot prices are forecast to remain**

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1 This assessment is based on information collected from various sources. Projecting future conditions is a difficult task at best, so these comments are subject to change as new information becomes available.

2 EIA, *Short-Term Energy Outlook* (May 2016) at 9.

lower than [$0.30 per therm] through December 2016. Forecast Henry Hub natural gas prices average [$0.225 per therm] in 2016 and [$0.302 per therm] in 2017."[3] Natural gas prices averaged $0.263 per therm in 2015.

As of May 13, 2016, natural gas in storage stood at 2,754 billion cubic feet ("Bcf"). The working gas in storage is up 40 percent from the same period a year ago, and is up by about 41 percent compared to the 5-year average.

Commodity prices, together with the costs Washington Gas Light ("WGL") incurs for storage, peaking, and balancing, have resulted in a lower retail price than what was experienced last year. Specifically, the costs WGL incurs to acquire and deliver natural gas to customers are reflected in WGL's retail commodity price, called the Purchased Gas Charge ("PGC").[4] The PGC for May 2016 is 40.83 cents ($0.41) per therm, compared with 63.91 cents ($0.64) per therm for the same period a year ago—down 36 percent. The PGC for May 2016 is up 11 percent from the previous month.

The major factors that contribute to this outlook are described below. These factors include the weather, the economy, the storage situation, the supply situation, and national security.

Weather

Weather variations always have an effect on natural gas price formation. As of May 19, 2016, the National Oceanic and Atmospheric Administration ("NOAA") indicated that its outlook for June generally calls for above normal temperatures across most of the western and eastern portions of the nation.[5] Below normal temperatures are likely for parts of the Great Plains—particularly northeast Colorado, much of Nebraska, the western half of Kansas, and southeast Wyoming. The expected weather for June may still be somewhat positive for natural gas prices.

Economic Conditions

National economic factors also contribute to the formation of wholesale natural gas prices. The Federal Open Market Committee ("FOMC") maintained a low target range for short-term interest rates.[6] The FOMC indicated that information received since the Committee met in March indicates that labor market conditions have improved further even as growth in economic activity appears to have slowed. While the growth in household spending has moderated, the household sector's inflation-adjusted income has risen at a solid rate and consumer sentiment remains high. Since the beginning of the year, the real estate sector has improved further but business fixed investment and net exports have been soft. A range of recent indicators, including strong job gains, points to additional strengthening of the labor market and inflation has

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3 Ibid at 9 and 10.

4 The current Purchased Gas Charge reflects current market conditions and current collections. The current cost of gas (including commodity, demand, and other cost adjustments) reflects the seasonal market. Alternative suppliers' newer fixed price offers should generally reflect the PGC benchmark, with anticipated price changes as well, over the next twelve months.

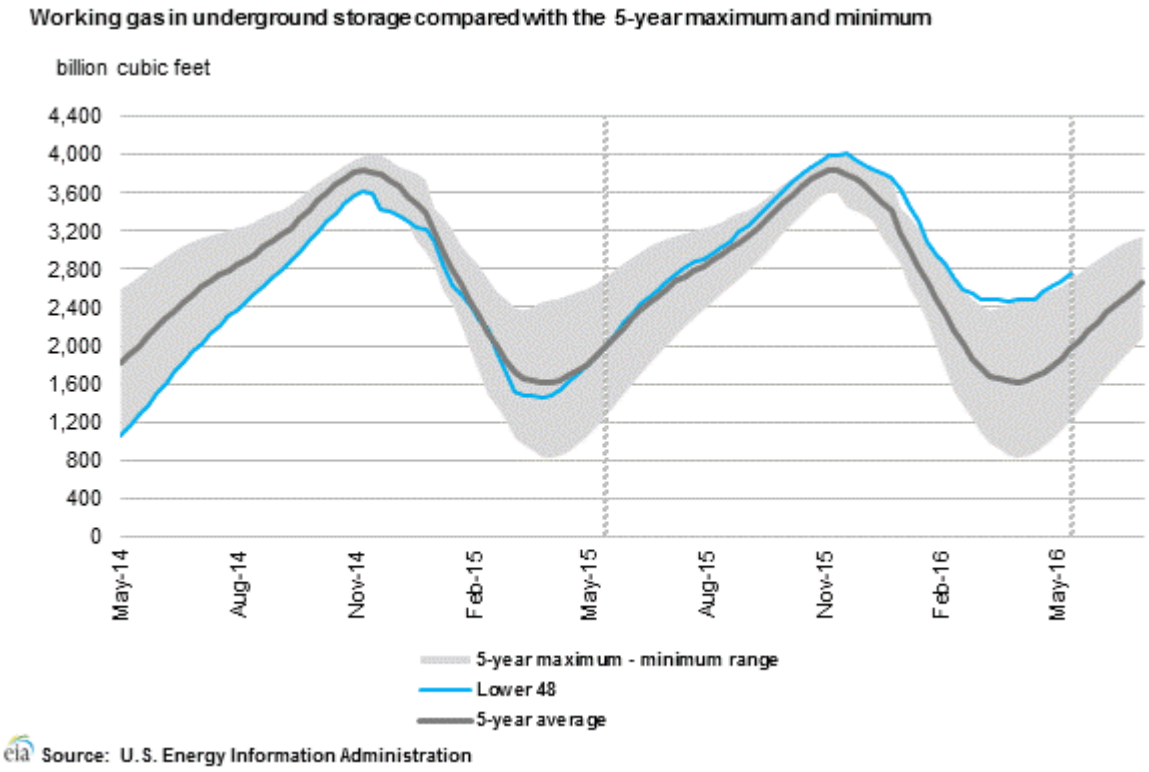
5 NOAA at http://www.cpc.ncep.noaa.gov/.

6 *Statement of the Federal Open Market Committee* (released April 27, 2016).

continued to run below the FOMC's 2 percent longer-run objective, partly reflecting earlier declines in energy prices and falling prices of non-energy imports. The unemployment rate for April 2016 stood at 5.0 percent, compared to 5.4 percent a year ago. At present, the current state of economic activity may still be relatively neutral for natural gas prices.

Storage

EIA reports that the working gas in storage was 2,754 Bcf as of May 13, 2016, a net increase of 73 Bcf from the previous week. Stocks were 791 Bcf higher than the same period a year ago—up 40.3 percent—and up 795 Bcf from the 5-year average of 1,959 Bcf—an increase of 40.6 percent.[7] EIA indicates that working gas stocks **"in March ended at 2,478 Bcf, the highest end-of-withdrawal-season level on record. The first significant inventory increase of the injection season occurred the week ending April 22, with a 73-Bcf build. Looking to the start of next winter, EIA forecasts inventories to be 4,158 Bcf at the end of October 2016, which would be the highest level on record to begin the heating season."**[8] However, EIA also notes that storage injections for the 2016 refill season, thus far, remains well behind the pace of recent seasons, but there appears to be sufficient financial incentive to buy and store natural gas this summer for sale in the winter.[9] The current storage picture suggests some downward pressure for natural gas prices.



Note: The shaded area indicates the range between the historical minimum and maximum values for the weekly series from 2011 through 2015. The dashed vertical lines indicate current and year-ago weekly periods.
Source: EIA, *Weekly Natural Gas Storage Report* (released May 19, 2016)

7 EIA, *Weekly Natural Gas Storage Report* (released May 19, 2016).
8 EIA, *STEO* (May 2016) at 9.
9 EIA, *Natural Gas Weekly Update* (released May 19, 2016).

Supply

Flexibility in the nation's domestic production has helped to soften upward price pressure, especially with the continued development of natural gas in shale formations. In the May 2016 STEO, EIA indicates that **"[d]espite recent data showing growing natural gas production in February, more recent preliminary data indicate production may be leveling in the next few months. EIA forecasts relatively unchanged production through the rest of 2016, as low natural gas prices and declining rig activity begin to affect production. In 2017, however, production is expected to rise in response to increases in price, demand, and liquefied natural gas (LNG) exports. Overall, EIA expects production will rise by 0.9% in 2016 and by 2.2% in 2017. EIA expects natural gas exports by pipeline to Mexico will increase because of growing demand from Mexico's electric power sector and flat natural gas production in Mexico. EIA projects LNG gross exports will increase to an average of 0.5 Bcf/d in 2016, with the startup of Cheniere's Sabine Pass LNG liquefaction plant in Louisiana, which sent out its first cargo in February 2016. EIA projects gross LNG exports will average 1.3 Bcf/d in 2017, as Sabine Pass ramps up its capacity."**[10]

National Security

As noted in previous reports, we see little danger to the natural gas supply.[11] Most of the U.S. supply is secure, in that it is generally domestically produced or imported from Canada.

Future Natural Gas Prices

The PGC rate of roughly $0.41 per therm for May 2016 is up 11.3 percent from the previous month, and is down 36.1 percent compared to the same period a year ago.[12] The June 2016 PGC (assuming that the commodity market adjustment factor is zero) should be around $0.40 per therm, based, in part, on the expectation that near-term NYMEX futures prices continue to trade between $0.20 and $0.24 per therm, among other things. OTRA's assessment of natural gas prices may be significantly different from actual market prices if: (i) there are significant variations in weather-related factors, (ii) crude oil prices change significantly, (iii) other substantial disruptions to the energy market occur, or (iv) certain cost-related assumptions are significantly different.

As always, investments in energy efficiency and conservation measures are important ways toward reducing energy consumption and lowering energy bills. Ratepayers are encouraged to invest in measures such as insulation, weather stripping, or replacing an old inefficient water heater and/or furnace. Finally, for those residential consumers whose budgets are severely challenged, arrangements for assistance should be made as soon as possible in anticipation of need. Contact either the District Department of the Environment's Energy Office

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10 EIA, *STEO* (May 2016) at 9.

11 As of May 18, 2016, the Department of Homeland Security ("DHS") has not issued any new bulletins since December 16, 2015. The National Terrorism Advisory System, or NTAS, replaces the color-coded Homeland Security Advisory System.

12 The commodity market adjustment factor for the May 2016 PGC was $0.05 per therm, resulting in the adjusted PGC (excluding the commodity market adjustment factor ("CMAF")) being equal to $0.3583 per therm.

or the D.C. Public Service Commission's Office of Consumer Services for advice and/or solutions as well as programs such as the Washington Area Fuel Fund (888-318-9233).

Wholesale Natural Gas Price/Supply Assessment Information

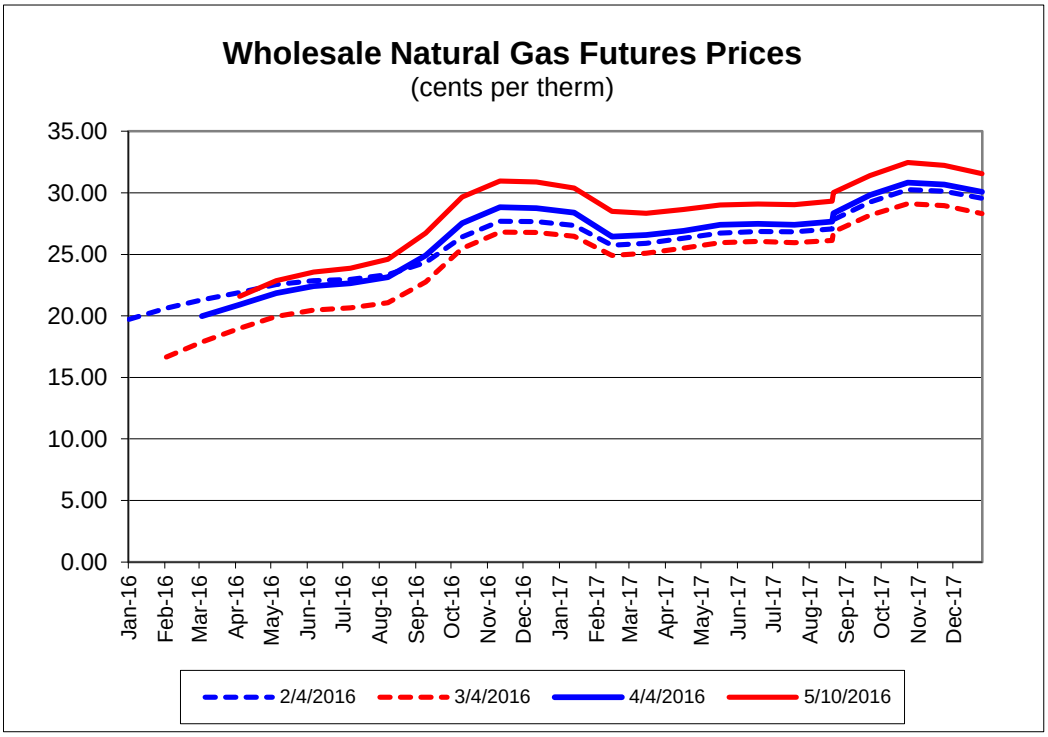
Current for May 10, 2016

Price Information

Twelve Month NYMEX Strip Components
5/10/16, cents per therm

Henry Hub Spot Market Price
5/10/16, cents per therm

Current Month		Previous Month		Current Only Available
Jun 16	21.58	Jun 16	20.90	20.4
Jul 16	22.85	Jul 16	21.85	
Aug 16	23.55	Aug 16	22.41	
Sep 16	23.88	Sep 16	22.65	
Oct 16	24.59	Oct 16	23.14	
Nov 16	26.72	Nov 16	24.90	
Dec 16	29.65	Dec 16	27.53	
Jan 17	30.96	Jan 17	28.83	
Feb 17	30.89	Feb 17	28.76	
Mar 17	30.39	Mar 17	28.38	
Apr 17	28.50	Apr 17	26.45	
May 17	28.35	May 17	26.58	



The current PGC for May 2016 is about $0.41 per therm. Assuming, among other things, that near-term futures prices remain around $0.20 to $0.24 per therm, the PGC rate (excluding the commodity market adjustment factor) for June 2016 may be around $0.40 per therm. However, given the uncertainty about the weather, as well as other factors, this assessment could easily change. The assessment for June 2016 is that wholesale prices may remain around $0.20 per therm, resulting in wholesale prices that are lower by at least 25 percent, compared to year ago levels (see Market Conditions Summary).

Weather Forecast

1. Current for next few days to one week:

   http://www.cnn.com/Weather/
   http://home.accuweather.com/

2. National Oceanic and Atmospheric Administration Forecast for the Winter

   http://www.noaa.gov/

3. U.S. Weather Service Atlantic Hurricane and Storm Reports

   http://www.nhc.noaa.gov/

Wholesale Natural Gas Market Conditions Summary
May 20, 2016

Factors	Next Month	Summer Season
Oil Prices		
Weather - Temperature		
Weather - Hurricanes		
Economic Conditions		
Storage		
Natural Gas Supply		
National Security		
Overall		

Code: Red - Upward Pressure

Blue - Downward pressure

Yellow - No Change

No color - Not Applicable N.A.