



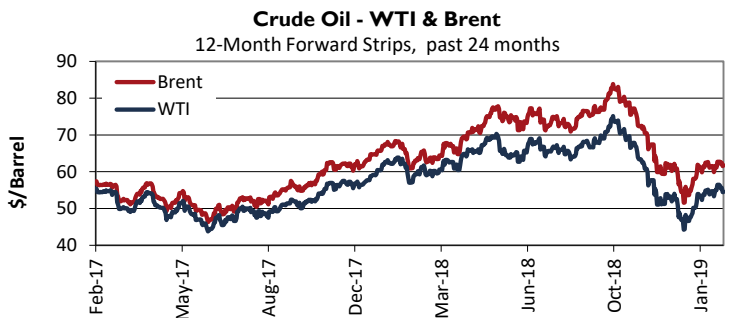
# Competitive Energy Services Weekly Market Summary

February 4 - 8, 2019

## Synopsis of Last Week's Energy Markets

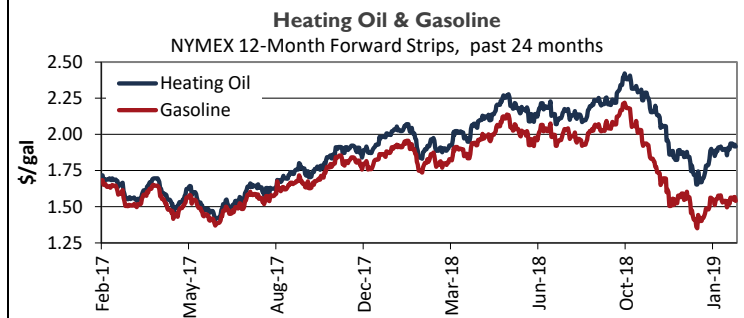
Crude oil fell last week. Prices had gained 18% in January as Saudi Arabia began cutting production again and the US imposed sanctions on a Venezuela's oil. However, a weakening growth forecast for the EU and the US's ongoing trade war with China are projected to impact crude oil demand. Natural gas futures slid 6% last week. Tepid demand weighed on markets even as the EIA reported the largest storage withdrawal of the season to date. Inventories are now 18% below the 5-year average.

## Oil Market



<b>NYMEX WTI</b>	last close	previous week	24-month high	24-month low
12 month strip, \$/bbl	\$54.53	\$56.45	\$75.39	\$43.82
date	2/8/19	2/1/19	10/3/18	6/21/17
change from last close		-3.4%	-27.7%	24%

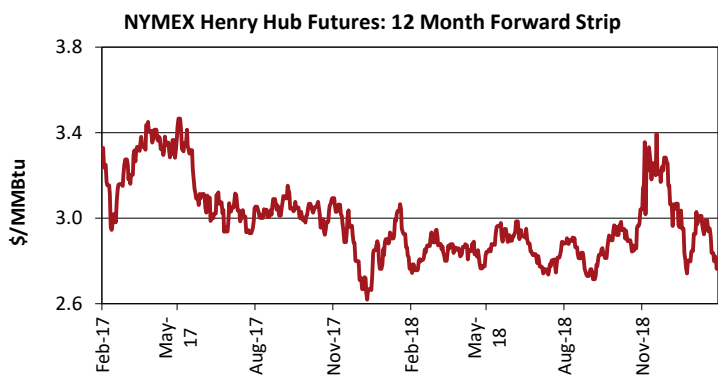
<b>US STORAGE (in million bbls)</b>	crude oil
domestic stocks as of	2/1/19
	447
gain / loss from previous week	1.3
comparison to historic range	within



<b>NYMEX Heating Oil</b>	last close	previous week	24-month high	24-month low
12 month strip, \$/gal	\$1.92	\$1.94	\$2.43	\$1.41
date	2/8/19	2/1/19	10/3/18	6/21/17
change from last close		-0.8%	-21%	36%

<b>US STORAGE (in million bbls)</b>	distillate	propane	gasoline
domestic stocks as of	2/1/19		
	139	58	258
gain / loss from previous week	-2.3	-2.6	0.5
comparison to historic range	within	within	above

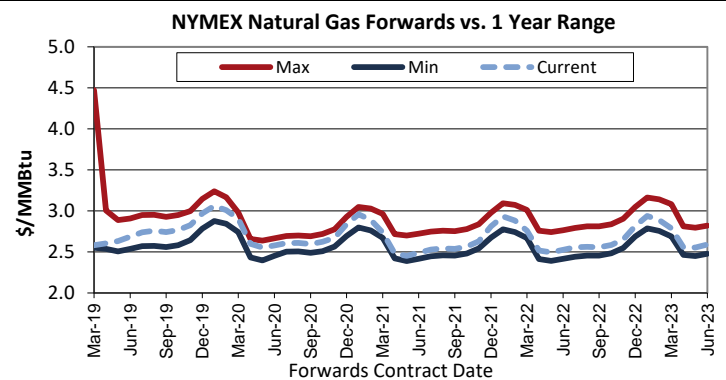
## Natural Gas Market



<b>NYMEX PRICING</b>	last close	previous week	24-month high	24-month low
12 mo. strip, \$/MMBtu	\$2.78	\$2.84	\$3.48	\$2.61
date	2/8/19	2/1/19	4/6/17	12/21/17
change from last close		-1.9%	-20%	6%

<b>CES SCORE</b>	
12 month	59
18 month	52
24 month	50
36 month	57

The Score provides a measure of how current prices compare to their 52-week range. A score close to 0 indicates that current prices are close to their 52-week highs; a score close to 100 indicates that current prices are close to their 52-week lows.



<b>FORWARDS</b>	12 month	18 month	24 month	36 month
strip (\$/MMBtu)	\$2.78	\$2.74	\$2.74	\$2.71

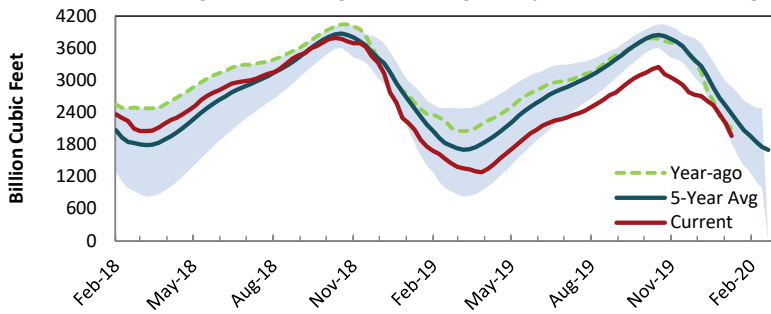
Natural gas futures are useful for both natural gas and electricity consumers because they drive electricity pricing in many U.S. markets. This chart compares the current natural gas price for each forward month on the NYMEX exchange to the highest and lowest prices for the same month over the past 12 months.



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**Natural Gas Storage**

Working Gas in Underground Storage Compared With 5-Year Range



This chart shows the amount of natural gas in storage at each point in time (red line) compared to the highest, lowest, and average amounts in the past 5 calendar years.

EIA Storage Data	date	Bcf	+/-
Previous Stock Level	1/25/19	2,197	
Most Recent Stock Level	2/1/19	1,960	
Year-ago Stock Level		2,095	-6.4%
5-Year Average Stock Level		2,375	-17.5%
Most Recent Net Change	2/1/19	-237	
Year-Ago Net Change		-116	
5-Year Average Net Change		-150	

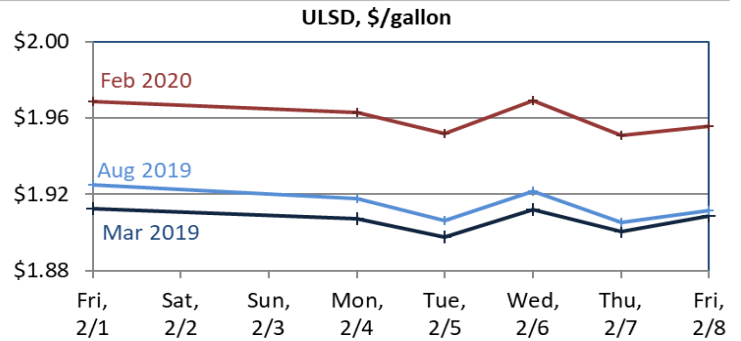
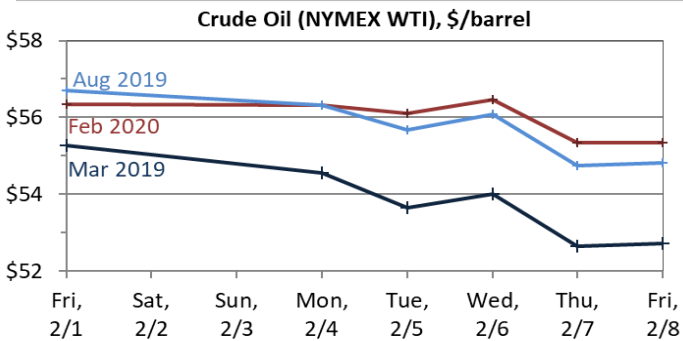
Data Source: EIA <http://tonto.eia.doe.gov/oog/info/ngs/ngs.html>

**Market Assessment**

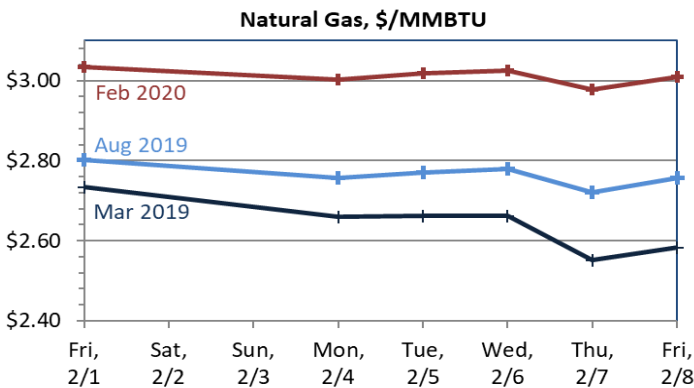
**NYMEX Futures Summary Statistics**

	Last Expired Contract	Exp. Date	Price	Prompt Month	Price	Most Expensive Next 12 Months	Price	Least Expensive Next 12 Months	Price	Next Winter Avg (Nov19-Mar20)
Crude oil	Feb-19	1/22/19	\$52.57	Mar-19	\$52.72	Dec-19	\$55.37	Mar-19	\$52.72	\$55.35
Heating oil	Feb-19	1/31/19	\$1.88	Mar-19	\$1.91	Feb-20	\$1.96	May-19	\$1.90	\$1.95
Natural gas	Feb-19	12/27/18	\$2.95	Mar-19	\$2.58	Jan-20	\$3.06	Mar-19	\$2.58	\$2.95

**NYMEX End-of-Day Settlements**



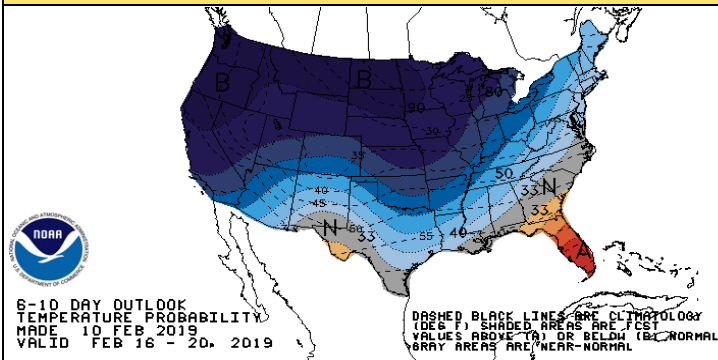
Crude oil declined last week, pulling back from the \$55 mark where near-term contracts had ended last week. The US dollar strengthened, decreasing the appeal of commodities, and crude markets were dampened by a negative outlook for potential truce in the trade war with China. The current 10% tariff rate is set to double on March 1 if a deal is not struck before then, and President Trump said it was "highly unlikely" he would meet with China's President Xi before the deadline. Also weighing on crude prices was the European Commission slashing its 2019 economic outlook for the euro zone. On Friday oil and gas firm Baker Hughes Inc. reported that the number of active oil rigs increased by 7 and is currently 8% more than this time last year.



Natural gas prices dropped 11% last week as early February forecasts turned mild. Above-average temperatures across the eastern U.S. are expected to limit heating demand and curb coming storage withdrawals. The EIA reported a lower-than-expected storage withdrawal that further weighed down prices on Thursday, but inventories remain 13% below typical levels. With the mild forecast, worry that demand could deplete inventories before the end of winter have faded. U.S. production remains near record highs and has recovered from cold-snap freeze-outs. March futures ended the week at \$2.73/MMbtu, a 33-cent drop from the previous week, and continued to slip in trading on Monday morning.

The National Weather Service near-term forecast calls for colder-than-normal temperatures across the United States. The CES Market Score on page 1 improved from the previous week. Clients with electricity or natural gas contracts expiring in 2019 should consult with a CES representative for customized guidance.

**National Weather Service Forecast**



**6 - 10 Day Forecast for Feb 16 - 20**

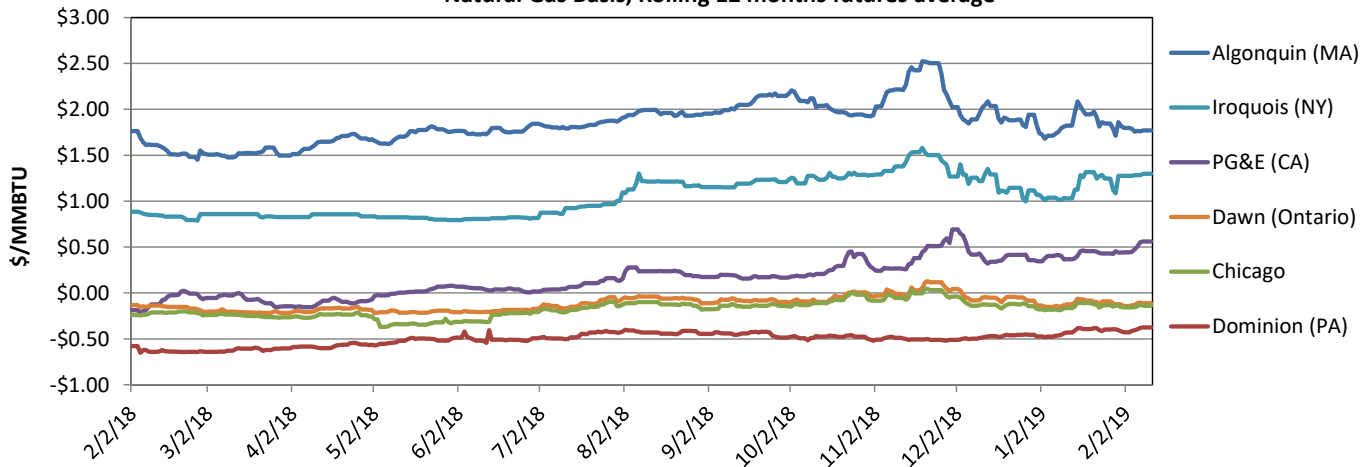
This map depicts forecasted temperatures for next week compared to the long term average. The blue/purple areas are forecast to be colder than normal, white areas are normal, and yellow/orange/red areas are warmer than normal. Abnormally hot weather in the summer and cold weather in the winter can increase the price for natural gas, oil, and electricity.

Source: Chart from the National Weather Service Climate Prediction

**Natural Gas Basis Futures**

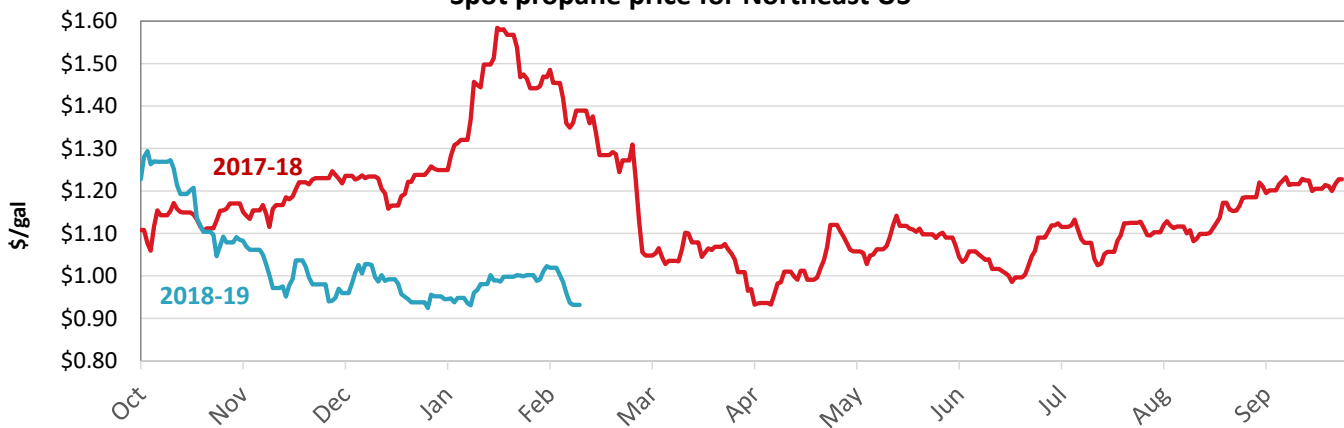
Basis is the price differential between Henry Hub, located in Erath, Louisiana, and the liquidity point closest to the end-user. Because Henry Hub is used as the delivery point for NYMEX natural gas futures contracts, the cost of using natural gas in any geographic region of the country can be approximated by adding the basis price for the appropriate liquidity point to the NYMEX futures contract. Basis prices can be negative (indicating that natural gas at a liquidity point is cheaper than at the Henry Hub) or positive (indicating that natural gas at a different liquidity point is more expensive than at the Henry Hub). Basis prices are a key component of regional electricity and natural gas costs.

**Natural Gas Basis, Rolling 12 months futures average**



**Propane**

**Spot propane price for Northeast US**



**Spot Prices**

		New England ISO Real Time Power Pricing By Zone (\$/MWh)								
		2/4/19	2/5/19	2/6/19	2/7/19	2/8/19	2/9/19	2/10/19	Avg	
Power (\$/MWh)	Maine RT On Pk	29	17	24	28	31			26	
	Maine RT Off Pk	25	9	11	20	32	29	37	23	
	NH RT On Pk	29	17	26	28	32			26	
	NH RT Off Pk	25	9	12	20	33	31	38	24	
	Vermont RT On Pk	29	17	25	27	31			26	
	Vermont RT Off Pk	25	9	12	20	32	30	37	24	
	Connecticut RT On Pk	28	17	25	27	31			25	
	Connecticut RT Off Pk	25	9	12	20	32	31	37	24	
	Rhode Island RT On Pk	29	17	25	27	32			26	
	Rhode Island RT Off Pk	25	9	12	20	33	31	38	24	
	NE Mass RT On Pk	29	17	26	27	32			26	
	NE Mass RT Off Pk	26	9	12	20	33	32	38	24	
	SE Mass RT On Pk	29	17	25	27	32			26	
	SE Mass RT Off Pk	25	9	12	20	32	31	38	24	
	WC Mass RT On Pk	29	17	25	27	31			26	
	WC Mass RT Off Pk	25	9	12	20	32	31	38	24	
			New York ISO Real Time Power Pricing By Zone (\$/MWh)							Avg
	Power (\$/MWh)	Capital RT On Pk	22	20	32	25	30			26
		Capital RT Off Pk	32	19	19	25	33	32	30	27
		Central RT On Pk	19	19	31	21	29			24
Central RT Off Pk		11	6	19	24	26	27	28	20	
Hudson RT On Pk		22	20	32	25	31			26	
Hudson RT Off Pk		26	16	20	25	32	31	30	26	
Mohawk RT On Pk		19	19	31	21	29			24	
Mohawk RT Off Pk		11	6	19	24	26	27	28	20	
Milwood RT On Pk		22	20	33	25	31			26	
Milwood RT Off Pk		26	16	20	25	32	31	30	26	
NYC RT On Pk		22	21	33	25	37			28	
NYC RT Off Pk		26	16	20	25	32	31	30	26	
		PJM Real Time Power Pricing By Zone (\$/MWh)							Avg	
Power (\$/MWh)		Eastern Hub On Pk	22	23	24	25	25			24
	Eastern Hub Off Pk	23	21	19	22	22	22	22	22	
	Western Hub On Pk	22	23	25	25	25			24	
	Western Hub Off Pk	22	21	19	22	22	22	22	21	
	PPL Zone On Pk	22	23	24	25	25			23	
	PPL Zone Off Pk	22	20	19	21	21	21	21	21	
	AEP RT On Pk	21	23	25	25	25			24	
	AEP RT Off Pk	21	21	19	22	22	22	22	21	
	Chicago RT On Pk	21	22	25	25	25			23	
	Chicago RT Off Pk	20	21	19	21	21	21	21	21	
	New Jersey Hub On Pk	22	23	24	25	25			24	
	New Jersey Hub Off Pk	23	20	19	22	22	22	22	21	
			California ISO Real Time Power Pricing (\$/MWh)							Avg
	Power (\$/MWh)	SoCal Edison RT On Pk	41	57	60	92	101			70
SoCal Edison RT Off Pk		35	62	84	124	125	92	80	86	
Natural Gas \$/MMBtu			2/4/19	2/5/19	2/6/19	2/7/19	2/8/19	2/9/19	2/10/19	Avg
	Henry Hub, LA		2.57	2.56	2.58	2.62				2.58
	TZ6, MA		2.86	3.95	2.70	2.88	4.79			3.44
	Algonquin, MA		2.92		2.70	2.90	5.45			3.49
	Chicago Hub, IL		2.52	2.52	2.57	2.66	2.53			2.56
	New York, NY		2.45	2.50	2.46	2.56	2.61			2.52
	Dominion South, PA		2.38	2.38	2.36	2.42	2.41			2.39
	Opal Hub, WY		4.83	6.15	13.34	17.54	14.70			11.31
	PG&E Citygate, CA		4.75	6.40	12.84	17.59	14.03			11.12