

## Weekly Fundamental Market Report November 6-10, 2017

### Market Update

PRODUCTS	11/6/17	11/7/17	11/8/17	11/9/17	11/10/17
WTI Crude Oil	57.35	57.20	56.81	57.17	56.74
Brent Crude Oil	64.27	63.39	63.49	63.93	63.52
Natural Gas	3.13	3.15	3.18	3.20	3.21

- [CME Group](#)

## Headlines

### Local North Dakota

- **Helms: Federal rules cost North Dakota jobs, taxes.** [Williston Herald](#)
  - The Bureau of Land Management’s lengthy permitting process has cost North Dakota an estimated 1,000 jobs in lost oil and gas opportunities. So, said Department of Mineral Resources Director Lynn Helms as he testified before a U.S. House of Representatives subcommittee, He further stated that the permitting process has diminished royalties and state taxes by as much as \$250 million. Helms testified Wednesday in favor of the Opportunities for the Nation and States to Harness Onshore Resources for Energy Act, or ONSHORE Act, which the state’s top oil and gas regulator said is an opportunity to make a better government instead of a bigger one. The bill would let states manage oil and gas permitting on behalf of the federal government in situations where the federal government doesn’t own surface rights. North Dakota’s delegation has generally supported state primacy on such issues. Republican Sen. John Hoeven said Helms’ testimony dovetails with the senator’s proposed BLM Mineral Spacing Act. That bill sought to establish a pilot program waiving the requirement for a federal permit in cases where less than 50 percent of subsurface minerals are owned or held in trust by the federal government and there is no federal surface land. “Duplicative and costly regulations on federal lands limits our energy production, hurts economic growth and drives up costs for consumers and businesses,” Hoeven said. “This is especially problematic in western states, where federal lands are mixed in with private lands and can infringe on the rights of private mineral owners. North Dakota has shown time and again that states can lead on empowering robust energy development while ensuring good environmental stewardship. In appreciate that Lynn traveled to Washington, D.C., to represent our state’s interests in this important matter.” Sen. Heidi Heitkamp, D-N.D., meanwhile said the House bill is a good starting point. “I’m working on a bipartisan bill in the U.S. Senate with Republican Senator Mike Enzi from Wyoming that would address many similar issues, while eliminating duplicative permitting on federal, as well as Indian, lands.” Tessa Sandstrom, communications director for the North Dakota Petroleum Council, said they see the measure as a “step in the right direction.” “It will help ensure both the state and federal government are both using their resources wisely and efficiently by getting rid of the unnecessary duplication in permitting, especially where the BLM does not have ownership of the surface,” she said. In his testimony, Helms told the House subcommittee that 60 percent of North Dakota wells with federal mineral rights don’t include any federal surface rights. Meanwhile, 32 percent of all North Dakota’s spacing units have at least one well affected by Bureau of Land Management permitting processes. North Dakota has gridded out its mineral rights with defined spacing units that ensure royalties for wells can be given out to the correct parties. The presence of even one well with federal mineral rights delays drilling the entire spacing unit, Helms testified, and that fact has prompted as many as 20 companies to shift capital from those areas. The result has been lost jobs and missed royalty opportunities, Helms said. “I have included an example of a spacing unit where one small portion of the spacing unit contains federal minerals,” he said. “Half the wells in that spacing unit will take more than nine months to be permitted. The other half will take 20 days. I know the Nelsons, the Ekblads, and the Jangulas, those families, and they

are frustrated by the delays and problems with their correlative rights. They want no part of NEPA or HPA on their private surfaces.” NEPA stands for National Environmental Protection Act and HPA stands for the Historic Preservation Act. In addition to the lost jobs, the delays have substantially diminished royalties, Helms added, which decreases funding for many public services ranging from health districts and emergency management to human services, roads, schools and law enforcement. The BLM’s process duplicates many similar efforts that North Dakota is already engaged in. “We were one of the first states to implement hydraulic fracturing and chemical disclosure regulations,” Helms said. “We are ranked second in the U.S. for production of oil and gas.” North Dakotas rules and regulations already cover all 51 of the federal requirements related to well bore construction, Helms added. “We cover 47 through our permitting process and four through a sundry notice process,” he said. “And the other elements that deal with the surface, we also cover 37 of those.” North Dakota participates with several other oil and gas states in the Interstate Oil and Gas Compact Commission, which offers peer review of regulations, Helms added. That allows North Dakota to continually improve its regulatory oversight. Allowing states to handle permitting processes would eliminate costly duplicative efforts, Helms said, and allow BLM to focus limited state office resources on the areas where federal surface and mineral rights coincide.

## Domestic U.S.

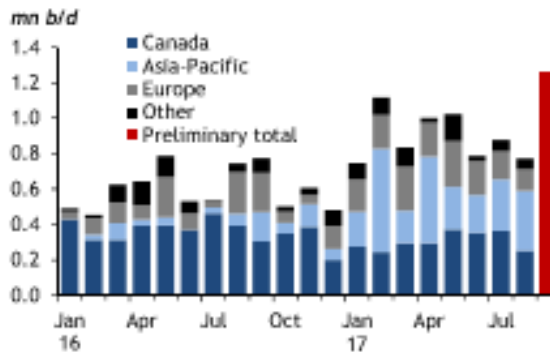
- **Permian basin to drive fourth-quarter U.S crude production increases. [EIA/World Oil](#)**
  - EIA forecasts that U.S crude oil production will average 9.4 MMbpd in the second half of 2017, 340,000 bpd more than in the first half of 2017. EIA’s close monitoring of current rig activity in several producing regions shows continued production growth from tight-oil formations, such as shale in the Permian region, driving overall production increases. The STEO projects that the most significant production growth in the second half of 2017 will be in the Permian region. Permian production is forecast to grow to 2.6 MMbpd in the second half of 2017, a 260,000-bpd increase from the first half of 2017. Production in the Permian continues to increase, in part as a result of West Texas Intermediate (WTI) crude oil average monthly prices that have remained higher than \$45/bbl. since the second half of 2016. EIA’s close monitoring of current rig activity in several producing regions shows continued production growth from tight-oil formations, such as shale in the Permian region, driving overall production increases. Extending across western Texas and southeastern New Mexico, the Permian region has developed into one of the more active drilling regions in the United States because its large geographic size and favorable geology contain many prolific tight formations such as the Wolfcamp, Spraberry, and Bonespring. Increases in proppant intensity, lateral lengths, and changes to slick-water completions are also among the factors that have allowed the Permian to remain one of the most economic regions for oil production despite the low-oil-price environment. The STEO projects that the Permian region rig count will continue to grow from an average of 341 rigs in 2017 to 371 rigs in 2018, and the WTI price is forecast to average \$49/bbl for the second half of 2017 and \$51/bbl in 2018. In the STEO forecast, the Bakken region is expected to maintain production at slightly less than 1.1 MMbpd through 2017, increasing by 31,000 bpd between the first and second half of the year. The Bakken region predominately spans the Williston Basin, which contains the Bakken and the Three Forks formations. Although the Bakken region is large in geographic size (23 million acres), it contains fewer identified prolific formations than the Permian. In addition, operators in this region are affected by winter weather and have greater transportation constraints in moving oil to refineries and markets. Rigs in the Bakken region grew from 35 in January to 44 in May of this year, increasing further to 51 in September. The STEO forecasts production in the Eagle Ford region to remain relatively flat in the second half of 2017 at 1.2 MMbpd, a 5,000-bpd increase from the first half of 2017. Compared with the Permian, the Eagle Ford region has a significantly smaller geographic area with fewer prolific stacked formations and fewer opportunities to drill. Rigs in the Eagle Ford region grew from 57 to 98 from January through May of this year, but declined to 83 in September, in part as a result of a lagged response to lower WTI prices in the second quarter of 2017. More recently, the Eagle Ford region experienced temporary outages in production and rig activity in August and September because of Hurricane Harvey.

### Permian production growth



- **US crude oil exports hit all-time high as production also closes in on record. CNBC**
  - Oil prices pulled back on Wednesday after data showed U.S. crude exports surged to an all-time high and American driller pumped near record levels. The United States exported 2.13 million barrels a day of oil in the week through Oct. 27, the first time the nation has crossed the 2 million-barrels-per-day mark. Meanwhile, weekly figures showed total U.S. crude production at 9.55 million barrels a day, just short of the Sept. 29 high going back to July 10, 2015. The week's total output was not far off the all-time high of 9.61 million barrels per day, struck the week ended June 5, 2015. The preliminary weekly figures are later revised. U.S. West Texas Intermediate crude was trading at \$54.52 a barrel, 14 cents higher, after topping out at \$55.22 earlier in the session. WTI's discount to international benchmark Brent crude has made U.S. oil more attractive to overseas buyers. Brent was trading at \$61.06, up 12 cents, on Wednesday. "Brent above \$60 will keep WTI higher as they export it and replace that expensive Brent," Bob Iaccino, chief market strategist at Path Trading Partners, told CNBC's "Futures Now" on Tuesday. American drillers have filled some of the supply gap left this year by OPEC and other oil exporters, who have cut production since January in order to drain a global glut of crude. Oil prices have been rallying on expectations that the producers will extend the deal, which is set to expire in March, through the end of 2018. U.S. oil shipments have surged from roughly 400,000 barrels a day at the end of 2015, when the United States lifted a 40-year ban on crude exports. The trade has been fueled by a boom in U.S. oil output from shale fields, where producers use advanced drilling methods to coax fossil fuels from rock formations.

### US crude exports



- Argus

## Global

- **Oil prices rise on supply cuts and political tensions in Saudi Arabia. Reuters**
  - Oil prices rose nearly 1 percent on Thursday, supported by supply cuts by major exporters as well as continuing concern about political developments in Saudi Arabia. Brent crude oil LCOc1 settled up 44 cents or 0.7 percent at \$63.93 a barrel, still close to Tuesday's intra-day high of \$64.65, which was the highest since June 2015. U.S. light crude CLc1 was up 46 cents or 0.8 percent at \$57.27, just shy of this week's more than two-year high of \$57.69 a barrel. "The move is driven by developments in Saudi Arabia in recent days and anticipation that the consolidation of power by King Salman and the Crown Prince will continue," said Abhishek Kumar, Senior Energy Analyst at Interfax Energy's Global Gas Analytics in London, "Meanwhile, Saudi comments on Lebanon have also highlighted rising tensions between the kingdom and Iran." "Growing confidence in the market that the upcoming OPEC meeting will result in an extension to the output-cut agreement is also supporting prices," he said. Saudi Arabia plans to cut crude exports by 120,000 barrels per day in December from November, slashing allocations to all regions, a spokesman for the energy ministry told Reuters. Several traders said prices got a boost from unconfirmed rumors that Saudi King Salman would relinquish the throne to his son Crown Prince Mohammed Bin Salman. Similar rumors were spread in September and October. Prices got a boost this week from a crackdown on corruption by the Saudi crown prince. Still, traders expressed caution that the oil price rally may have run its course after pushing up Brent more than 40 percent since July. "It doesn't matter how bullish the fundamentals are ... when an asset goes vertical there is always room for a pullback and consolidation of recent price moves," said Greg McKenna, chief market strategist at brokerage AxiTrader. The rally has largely been driven by crude output cuts from producing nations led by the Organization of the Petroleum Exporting Countries and Russia. OPEC will discuss output at a meeting on Nov. 30, and is expected to extend the limits beyond their expiry in March 2018. If that happens, some said prices could rally more. "With the OPEC/non-OPEC deal extension beyond March 2018 a certainty, prices may become stronger and temporarily reach the \$65-\$70 per barrel range in 2018," said energy consultancy FGE. U.S. crude production C-OUT-T-EIA rose 67,000 barrels per day to 9.62 million bpd, the highest for decades, and looked set to rise further. Texas issued 997 oil and gas drilling permits last month, up nearly 17 percent from a year earlier. Global oil inventories accelerated draws in October on OPEC-led output cut efforts, and total crude inventories dropped around 93 million barrels between July and November, according to analysis firm Kayrros.

## Oil and Gas Analysis

### o Rotary Rig Count Summary

Location	Date	Week	+/-	Week Ago	+/-	Year Ago
United States	3-Nov-17	898	-11	909	329	569
	10-Nov-17	907	9	898	339	568
North Dakota	3-Nov-17	47	-2	49	10	37
	10-Nov-17	47	0	47	12	35
Canada	3-Nov-17	192	1	191	38	154
	10-Nov-17	203	11	192	27	176
International	Oct-17	951	20	931	31	920

- [Baker Hughes](#)

### o WTI & Bakken Spot Price

November Daily Spot Prices					
	Mon	Tue	Wed	Thu	Fri
<b>Bakken (FH)</b>					
2017 October-30 to November-3	46.25	46.04	49.24	49.24	49.34
2017 November-6 to November-10	51.53	51.63	51.63	51.25	51.62
<b>WTI</b>					
2017 October-30 to November-3	54.11	54.36	54.32	54.55	55.63
2017 November-6 to November-10	57.34				
<b>Differentials</b>					
2017 October-30 to November-3	7.86	8.32	5.08	5.31	6.29
2017 November-6 to November-10	5.81				

- [Flint Hills Resource](#)
- [EIA](#)

**o Weekly Petroleum Status Report**

<b>Stocks (Million Barrels)</b>			
	<b>Four Weeks Ending</b>		
	<b>11/3/2017</b>	<b>10/27/2017</b>	<b>11/4/2016</b>
Crude Oil (Excluding SPR)	457.1	454.9	485.0
Motor Gasoline	209.5	212.8	21.0
Distillate Fuel Oil	125.6	128.9	148.6
All Other Oils	464.8	469.4	479.2
Crude Oil in SPR	669.9	670.6	695.1
<b>Total</b>	<b>1,926.9</b>	<b>1,936.6</b>	<b>2,028.9</b>

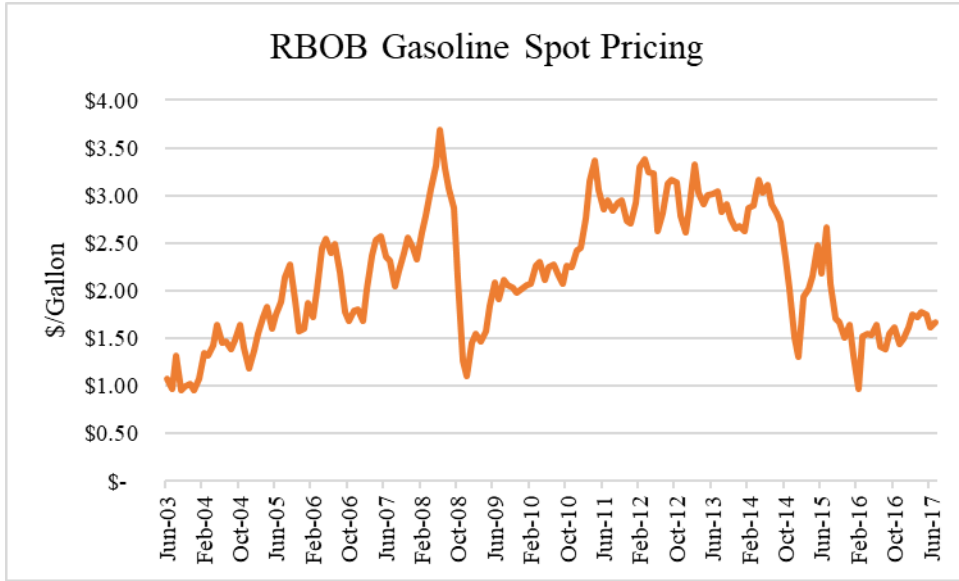
<b>Products Supplied (Thousand Barrels per Day)</b>			
	<b>Four Weeks Ending</b>		
	<b>11/3/2017</b>	<b>10/27/2017</b>	<b>11/4/2016</b>
Motor Gasoline	9,352	9,348	9,078
Distillate Fuel Oil	3,900	3,690	4,015
All Other Products	6,658	6,475	6,971
<b>Total</b>	<b>19,909</b>	<b>19,513</b>	<b>20,064</b>

<b>Refinery Activity (Thousand Barrels per Day)</b>			
	<b>Four Weeks Ending</b>		
	<b>11/3/2017</b>	<b>10/27/2017</b>	<b>11/4/2016</b>
Crude Oil Input to Refineries	15,946	15,934	15,547
Refinery Capacity Utilization	87.5	87.4	85.7
Motor Gasoline Production	10,080	9,974	9,904
Distillate Fuel Oil Production	4,954	4,895	4,645

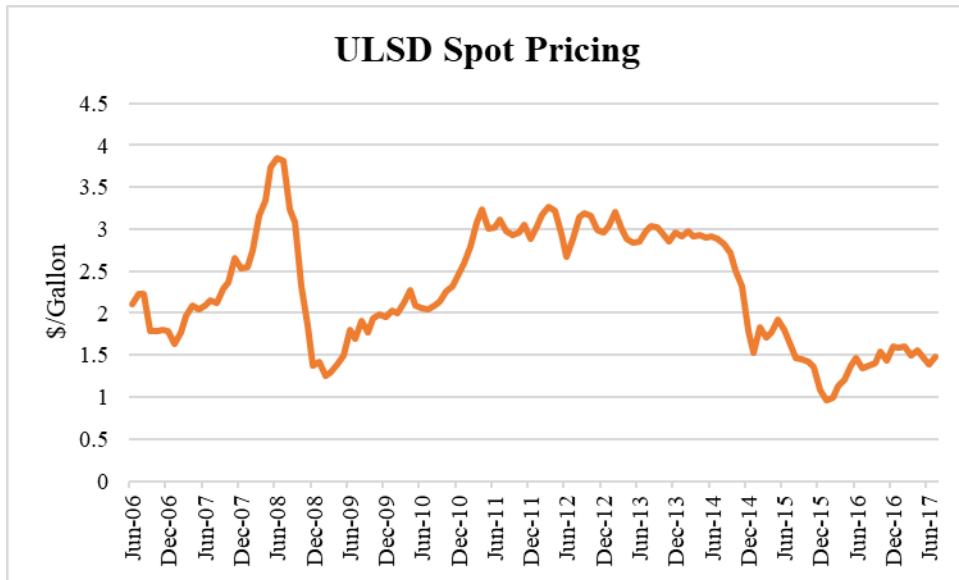
<b>Net Imports (Thousand Barrels per Day)</b>			
	<b>Four Weeks Ending</b>		
	<b>11/3/2017</b>	<b>10/27/2017</b>	<b>11/4/2016</b>
Crude Oil	5,958	5,917	7,173
Petroleum Products	-3,289	-3,209	-2,086
<b>Total</b>	<b>2,668</b>	<b>2,708</b>	<b>5,088</b>

- [EIA](#)

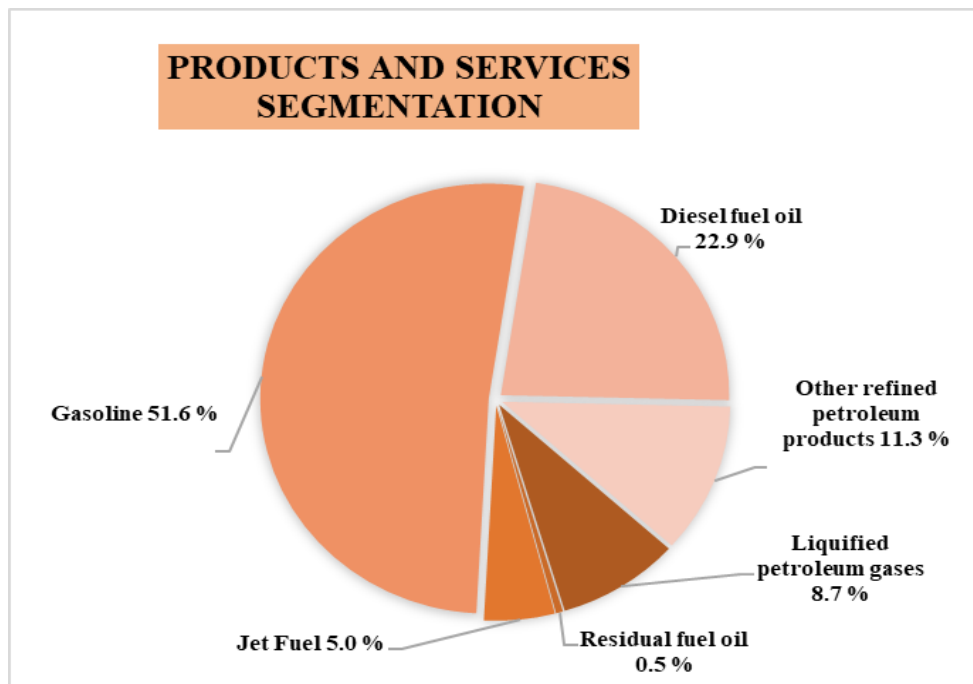
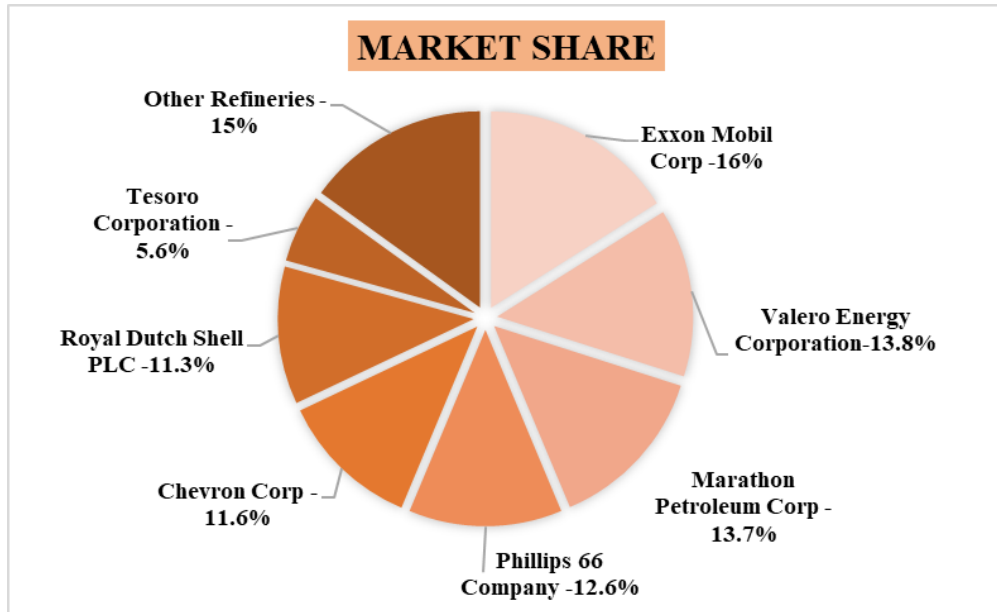
o **RBOB Gasoline**



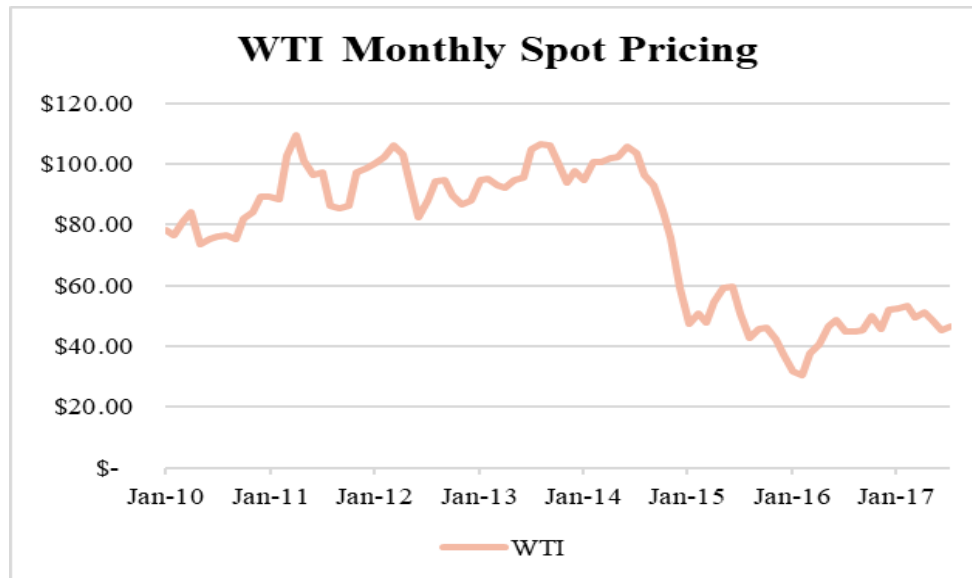
o **Ultra-Low Sulfur Diesel**



**o US Petroleum Refining at a Glance**







- [EIA](#)

## o Key External Drivers

- o **World price of crude oil**
  - <http://markets.businessinsider.com/commodities/oil-price?type=wti>
- o **Demand from gasoline and petroleum bulk stations**
  - <https://www.reuters.com/article/us-usa-natgas-kemp/u-s-natural-gas-prices-rise-as-winter-stocks-look-tight-kemp-idUSKCN1BU1RK>
- o **GDP of mainland China**
  - <https://tradingeconomics.com/china/gdp>
- o **Trade-weighted index**
  - <https://www.investing.com/news/economy-news/top-5-things-to-know-in-the-market-on-friday-541066>
- o **Total vehicle miles**
  - <https://www.advisorperspectives.com/dshort/updates/2017/08/31/vehicle-miles-traveled-another-look-at-our-evolving-behavior>

