

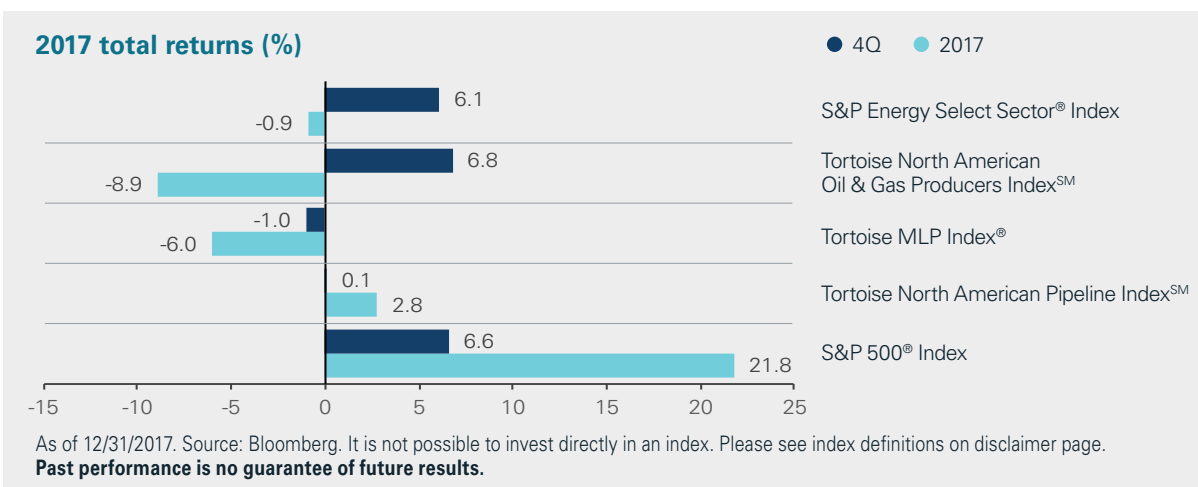
Tortoise Talk

Energy update

Tortoise Talk Fourth Quarter 2017

The energy sector ended 2017 on a high note with several tailwinds heading into 2018. Key drivers included a decline in global crude oil inventories, OPEC's and Russia's extension of the agreement to curtail crude oil production through the end of 2018, U.S. producers' greater capital discipline and continued production growth in 2018, as well as the signing of tax reform legislation at the end of the year. The broad energy sector returned 6.1% for the quarter.

The broader equity market had another solid quarter returning 6.6%. Fixed income performance was essentially flat returning 0.4%. MLPs slightly underperformed other income-oriented asset classes, with a return of -1.0% for the quarter compared to REITs, which returned 1.9% and utilities, with a return of 0.2%. The TMLP yield at the end of the quarter was 7.6%.

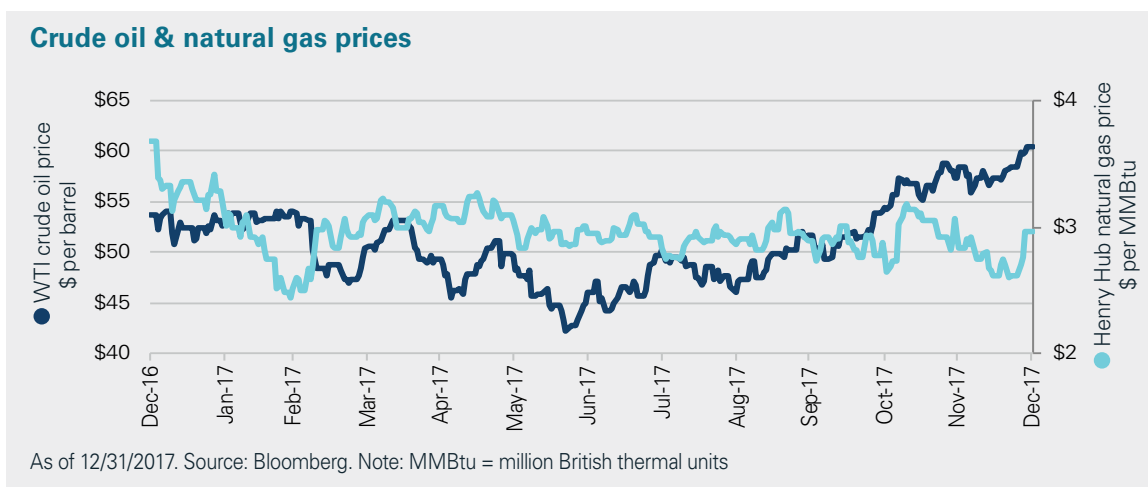


Upstream

Upstream oil and gas producers turned in a second consecutive positive quarter returning 6.8%, bringing 2017 performance to -8.9%. Commodity price volatility and an uncertain 2018 OPEC policy weighed on performance earlier in the year. Crude oil prices opened the year with West Texas Intermediate (WTI) at \$53.72 per barrel before hitting a low of \$42.31 in June and ended the year higher at \$60.42 per barrel. OPEC confirmed its 2018 policy at its November meeting, which provided some stability after shifting statements throughout the year. Natural gas prices opened the year at their peak of \$3.68 per million British thermal units (MMBtu), sunk to a low of \$2.44 in February and closed the year at \$2.96.

Equity market = S&P 500[®] Index
 Fixed income = Bloomberg Barclays U.S. Aggregate Bond Index
 Broad energy = S&P Energy Select Sector[®] Index
 MLPs = Tortoise MLP Index[®] (TMLP)
 REITs = FTSE NAREIT Equity REIT Index
 Utilities = S&P Utilities Select Sector Index
 Oil and gas producers = Tortoise North American Oil and Gas Producers IndexSM

In 2018, we expect crude oil and natural gas production to grow, even as producers focus more on capital spending within cash flow. U.S. crude oil production is expected to average 9.3 million barrels per day (MMbbl/d) in 2017¹. The 2018 forecast is for 10.3 MMbbl/d¹. If reached, it would surpass the record high of 9.6 MMbbl/d set in 1970¹. These production numbers put the U.S. on the path of surpassing Saudi Arabia to become the largest oil producer in the world³. Natural gas production is expected to average 72.6 billion cubic feet per day (bcf/d) in 2017, and 79.3 in 2018², supported by a rise in both natural gas exports and domestic consumption in 2018. The U.S. is currently the world's largest natural gas producer and is expected to grow production more than any other country over the next five years⁴.



Midstream

Midstream fundamentals remained steady throughout the year, supported by consistently strong quarterly earnings reports. However, these solid fundamental results did not always translate to positive stock performance. Pipeline companies were flat in the final quarter returning 0.1%, resulting in a 2017 return of 2.8%. MLPs didn't fare as well for the full year, returning -6.0%, with a fourth quarter return of -1.0%.

While midstream fundamentals were healthy throughout the year, there was uncertainty about some MLPs due to simplification and incentive distribution rights (IDR) restructuring transactions and the trend towards self-funding. Performance across pipeline segments varied during the year. Local gas distribution companies were by far the strongest performers throughout the year as they perform like utilities and tend to thrive in a low interest rate environment. Gathering and processing companies finished with a strong fourth quarter and natural gas pipelines also turned in positive performance. Our long-term outlook for the midstream sector remains positive as the need for greater pipeline capacity remains. We project capital investments in MLPs, pipelines and related organic projects at approximately \$145 billion for 2017 to 2019.

The Marcellus/Utica region: from zero to the world's largest shale gas play

One of the driving forces of America's energy revolution since the mid-2000s has been the continued development of the Marcellus and Utica shale basins. This spotlight focuses on this key region, which in a very short time has grown to play a key role in making America's economy stronger and the country safer.

The Marcellus shale runs through northern Appalachia, in the Northeastern region of the United States, primarily in the states of Pennsylvania, West Virginia, New York, and Ohio. It is part of the Devonian black shale and the thickness of the gas-producing rock is as much as 900 feet (270 meters). The formation runs an estimated 600 miles (nearly 1,000 kilometers) north to south, and is estimated to hold as much as 500 trillion cubic feet of natural gas. At Tortoise, we consider the Marcellus and overlapping Utica shale formation together to be the biggest "shale play" in the world, containing more gas than any other place outside of Russia. This region has seen astounding growth, from negligible volumes of gas produced in 2008, to becoming the main driver of growth in total U.S. shale gas production, and the main source of total U.S. dry natural gas production in 2017¹.

The proximity to customers in Eastern urban centers, and across the Midwest and Great Lakes regions of the United States makes the Marcellus/Utica region a highly attractive investment opportunity. However,

the lack of takeaway infrastructure, mainly natural gas pipelines plus gathering and processing facilities, has prevented the Marcellus/Utica from realizing its full potential.

Tortoise was an early believer in the Marcellus/Utica shale play. Our team has invested in companies with more than \$5 billion in pipeline and related projects, to carry natural gas from this region to demand centers. Demand for gas from this prolific field comes from several key sources, including consumer demand in the population centers of the Northeast, mainly for heating and power generation – where cleaner-burning natural gas is replacing coal, and thus helping to lower the United States carbon emissions. Additional pipeline projects are connecting natural gas production in Pennsylvania's southwest and northeast regions to the Southeastern U.S., and to industrial demand and Liquefied Natural Gas (LNG) export terminals along the Gulf Coast, in the states of Texas and Louisiana. These new pipeline projects are not only investment opportunities in their own right; but should also enable future growth for years to come in natural gas exports (both by pipelines and LNG), the petrochemical industry, and many other industrial sectors in which reliable access to low-cost energy is a key factor in deciding where to locate and expand production. In a future edition of Tortoise Talk, we will detail these opportunities that come from "Growing the Gulf."

Downstream

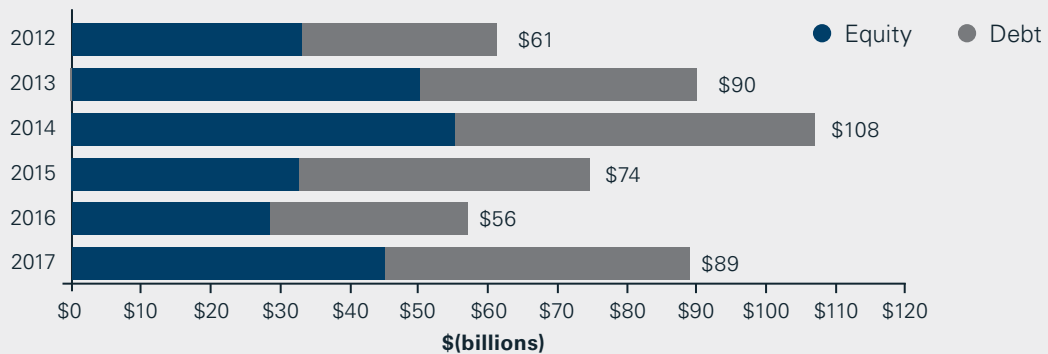
U.S. natural gas exports are competitive due to low natural gas prices. For many countries, specifically in Europe and Asia, it is cheaper to import U.S. natural gas than to produce it domestically if even available. In particular, 2017 was the strongest year for U.S. natural gas exports. According to the EIA, natural gas exports to Mexico were 10% higher on average in 2017 compared to 2016. With several additional liquefied natural gas (LNG) facilities expected to come online in 2018 and 2019, we believe growth will continue. This creates a significant opportunity for many U.S. companies along the energy value chain, including U.S. natural gas producers, natural gas pipeline operators, as well as LNG facilities operators.

We continue to see our thesis regarding renewables play out as they continue to grow share in electricity generation, although the percentage of total generation remains small. U.S. large-scale wind electricity generation totaled 81 gigawatts (GW) at the end of 2016. The 2017 total is estimated at 88 GW and is expected to grow to 96 GW by the end of 2018 and 104 GW in 2019¹, an increase of nearly 30% over three years. U.S. large-scale solar generation at the end of 2016 was 22 GW¹. With expected capacity additions, 2017 capacity is estimated at 27 GW and is expected to increase to 30 GW by the end of 2018 and 42 GW in 2019¹, nearly doubling in three years.

Capital markets

MLPs and other pipeline companies raised nearly \$15 billion during the final quarter of the year, weighing slightly more toward debt than equity.

MLP and pipeline company debt & equity offerings

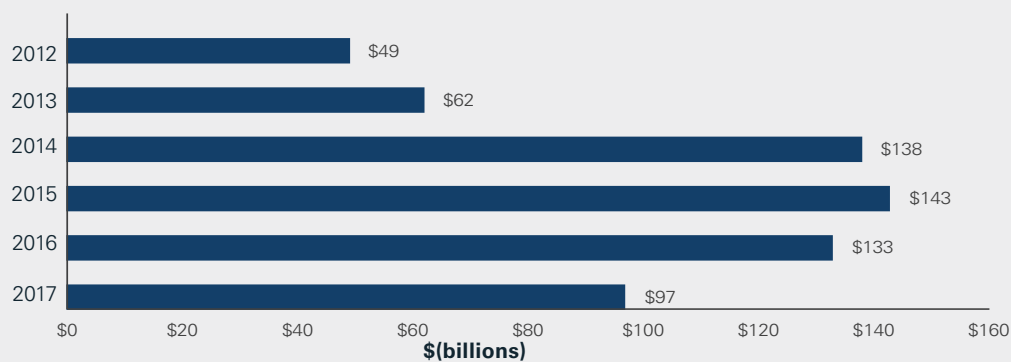


Source: Company filings. As of 12/31/2017. Includes equity issued to sponsors.

Merger and acquisition activity

Merger and acquisition activity among MLPs and other pipeline companies was strong during the fourth quarter totaling approximately \$26 billion. Vistra Energy Corp.'s combination with Dynegy Inc. was the largest announced deal during the quarter, valued at more than \$10 billion.

Announced MLP and pipeline company acquisitions



Source: Company filings. As of 12/31/2017.
Includes MLP and pipeline corporations, including those transactions between MLPs.

Regulatory corner

Tax reform

After much anticipation, The Tax Cuts and Jobs Act (The Act) was signed into law on December 22, 2017. This new legislation provides sweeping changes across all industries. We believe the three changes that may impact our business are the reduction of the U.S. corporate tax rate, 100% annual expensing on capital investments and 30% interest expense deduction limitation.

The Act reduced the U.S. corporate tax rate from 35% to 21%. This has an immediate impact to funds structured as C-corporations as they must revalue all deferred tax assets and liabilities using the new reduced rate. A reduced tax rate equates to a reduction in the net deferred tax liability and conversely an increase to the NAV. Additionally, any current tax liability will be calculated using a reduced blended rate for the fund's upcoming fiscal year and will be subject to the 21% rate thereafter.

Furthermore, the new legislation allows companies to expense 100% of their annual capital investments for the next five years. This could potentially have a meaningful impact to MLPs. Lastly, The Act provides for an interest expense deduction limitation set at 30% of EBITDA for four years. We believe the wide-spread changes that result from the new legislation will transform the tax landscape.

Concluding thoughts

At Tortoise, we believe the energy sector was underappreciated by investors in 2017. Yet, there are few sectors other than energy where demand has grown in 32 out of the last 33 years³. Following a milestone year for U.S. energy, 2017 was a record setting year for U.S. natural gas production and crude oil and refined product export volumes. We expect more records to be broken in 2018 as supply and demand fundamentals in the U.S. remain favorable with commodity prices at levels supportive of further production growth. Exports will likely grow as the U.S. is a low cost energy provider to the rest of the world. Further, the recent favorable changes to corporate tax rates add to a growing list of competitive advantages for U.S. energy. We're optimistic returns will be compelling across the energy value chain in 2018.

¹ Energy Information Administration, January 2018

² PIRA Natural Gas, December 2017

³ BP Energy outlook 2017

⁴IEA

Disclaimer

This commentary contains certain statements that may include “forward-looking statements.” All statements, other than statements of historical fact, included herein are “forward-looking statements.” Although Tortoise believes that the expectations reflected in these forward-looking statements are reasonable, they do involve assumptions, risks and uncertainties, and these expectations may prove to be incorrect. Actual events could differ materially from those anticipated in these forward-looking statements as a result of a variety of factors. You should not place undue reliance on these forward-looking statements, which speak only as of the date of this publication. Tortoise does not assume a duty to update these forward-looking statements. The views and opinions in this commentary are as of the date of publication and are subject to change. This material should not be relied upon as investment or tax advice and is not intended to predict or depict performance of any investment. This publication is provided for information only and shall not constitute an offer to sell or a solicitation of an offer to buy any securities.

The Tortoise MLP Index[®] is a float-adjusted, capitalization-weighted index of energy MLPs. The Tortoise Midstream MLP Sub Index is comprised of all constituents included in the following sub sector indices: Crude Oil Pipelines, Gathering & Processing, Natural Gas Pipelines, and Refined Products Pipelines. The Tortoise North American Pipeline IndexSM is a float-adjusted, capitalization-weighted index of pipeline companies (MLPs, corporations, LLCs) domiciled in the U.S. or Canada. The Tortoise North American Oil and Gas Producers IndexSM is a float-adjusted, capitalization-weighted index of North American companies engaged primarily in the production of crude oil, condensate, natural gas or NGLs. The S&P 500[®] Index is a market-value weighted index of equity securities. The S&P Energy Select Sector[®] Index is a modified market capitalization-based index of S&P 500 companies in the energy sector involved in the development or production of energy products. The FTSE NAREIT All Equity REITs Index is an unmanaged, capitalization-weighted index of all U.S. equity real estate investment trusts. The S&P Utilities Select Sector Index[®] is a modified market-cap weighted index composed of constituents of the S&P 500[®] Index in the utilities sector. The Barclays U.S. Aggregate Bond Index is an unmanaged index comprised of government securities, mortgage-backed securities, asset-backed securities and corporate securities to simulate the universe of bonds in the market. The maturities of the bonds in the index are over one year.

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It is not possible to invest directly in an index.

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