



**Energy Value Chain Update Call  
Prepared Remarks  
July 25, 2018**

**Ed Russell:** Good afternoon and welcome to the Tortoise Energy Value Chain update call. I'm Ed Russell, Senior Managing Director at Tortoise. Today we're going to review the state of the energy sector. As a reminder, some of the statements made during the course of this presentation are not purely historical and may be forward-looking statements regarding our intentions, projections and strategies for the future. These statements are subject to various risks and uncertainties and actual outcomes and results may differ materially from our forward-looking statements. We do not update our forward-looking statements. This presentation is for information only and shall not constitute an offer to sell or a solicitation of an offer to buy any securities. Now with that done, today I'm joined by energy Portfolio Managers Brian Kessens and Rob Thummel.

Rob, let's just kick things off, and maybe you can provide us with a review of the energy sector highlights

**Rob Thummel:** Sure Ed. So, the energy sector had a strong recovery in the second quarter. The broader energy sector, represented by the S&P Energy Select Sector<sup>®</sup> Index, closed the quarter up around 13.5%. In fact, the energy sector was the best performing sector in the S&P 500 during the second quarter and is the third best performing sector in the S&P 500 year-to-date. The midstream sector rebounded strongly as well, with the Tortoise North American Pipeline Index<sup>SM</sup> up 17.6% and the Tortoise MLP Index<sup>®</sup> up 11.3% for the quarter. Both sectors benefited from the 14% increase in crude oil prices during the quarter. Sentiment for the midstream space improved with very strong fundamentals and the continued buildout of midstream pipeline projects. And last week, a change in direction by the FERC from its March income tax allowance decision sets a positive tone for MLPs going forward. More on that later in this call. But in summary, the fundamental backdrop remains strong and as a result, we believe good things are in store for the 2<sup>nd</sup> half of 2018.

**Ed Russell: Okay, we'll let's just go right to more detail on the FERC announcement. Maybe Brian you could add a little to that?**

**Brian Kessens:** Sure. There's a lot to digest here. I think the key points are:

- (1) Negotiated rates, as expected, remain unaffected. This is important because the vast majority of all the contracts signed since the start of the shale revolution in 2004 are under negotiated rates.
- (2) MLPs will not need to reduce tax rates for the full impact to 0%, but rather reduce to the new corporate rates to 21%, assuming they file a 501(g) statement now or are under-earning the assumed ROE of 12%.
- (3) Natural gas pipeline companies that are consolidated within a C-Corp parent entity will only have to reduce to 21% as well, not the full 35% reduction.
- (4) Then finally, elimination of accumulated deferred income tax from the balance sheet, removing risk of having to refund that to customers over time.

Overall, the FERC announcement was a significant positive compared to where we were after March 15<sup>th</sup>. Yet there are still some details that need clarifying around exceptions and special circumstances. Those will take place through the filing process with FERC.

**Ed Russell: Thanks. So seems like every quarter we have to talk about OPEC, so Rob what were the key outcomes of the June OPEC meeting and how will the upstream energy sector benefit?**

**Rob Thummel:** Now that global oil inventories have been reduced to historical levels, the focus of the meeting shifted to maintaining an adequate oil supply to keep the market balanced going forward. As a result of rapidly declining Venezuelan production, OPEC's production cuts have exceeded levels set forth

in the original production cut agreement. One of the clear goals coming out of the June meeting was for OPEC to achieve 100% compliance which requires certain OPEC producers to increase production to offset the declines of others. Saudi Arabia has already responded, increasing oil production by almost 430,000 barrels per day in June according to the EIA. However, higher Saudi production reduces global spare capacity. So when you have lower spare capacity combined with rising geopolitical risk likely increases the odds of an oil price spike in the future.

For the upstream sector, stable oil prices over the long-term remain the key variable in bringing back investors to the energy sector. In the short-term, we expect higher volatility in oil prices especially for the remainder of the year. We expect U.S. production growth to continue at a strong pace for the next five years, as the U.S. transitions to a global exporter to offset declines elsewhere and meet growing demand. The EIA forecasts the U.S. to overtake Russia as the top oil producer in the world by 2019.

**Ed Russell: Okay thanks Rob. Brian, let's just stick with oil. Can you talk about your views on oil prices?**

**Brian Kessens:** We believe crude oil prices are skewed to the upside due to increased tensions between the U.S. and Iran, and falling Venezuelan production. Despite Saudi Arabia increasing production to offset some of this uncertainty, there is some concern about the limited amount of spare capacity that's available globally.

We see tight supply and growing worldwide demand. And given that dynamic, global markets are becoming increasingly dependent on U.S. supply growth. With our expectation that WTI oil prices remain between \$60-\$70 per barrel through the end of 2018 due to that tight supply-demand balance, we expect producer drilling activity to remain robust given shale break evens of around \$40 per barrel.

**Ed Russell: Okay thanks Brian. So one of the other things we've been talking about the last few quarters is MLP simplification transactions. Rob can you touch on what effect that's having on this quarter and maybe next?**

**Rob Thummel:** Yep. In our opinion, simplification transactions are one of the keys to improving the performance of the MLP market. We continue to see companies simplifying their structure and eliminating IDRs or incentive distribution rights. We think this evolution is good for the sector and will result in a more sustainable MLP model as the cost of capital is lowered and corporate governance is improved.

We expect that 84% of the current Tortoise MLP Index<sup>®</sup> constituents will not have IDRs by the end of 2019 including the 10 largest MLPs. And we believe as more companies eliminate IDRs, a potential re-rate could occur in the sector. We continue to have a high conviction for the MLP model due to its value of not having entity level tax exposure.

**Ed Russell: Okay thanks Rob. So Brian, 2<sup>nd</sup> quarter MLP performance saw a nice rebound from the 1<sup>st</sup> quarter. With that, where do we stand on valuations and what do you think it will take to change market sentiment?**

**Brian Kessens:** Enterprise value to EBITDA and Price to Distributable Cash Flow metrics remain well outside of historical norms, currently 23% and 49% cheap respectively on 2018 estimates. Relative value versus REITs and Utilities and comparisons to fixed income are also favorable. Our base case for returns over the next twelve months starts with the current yield of 8% and adds our expectation for growth of 5-7%. Needless to say, attractive. We think more structural simplifications around IDR eliminations and GP/LP combinations will work to improve sentiment along with last week's clarity from FERC for midstream companies regarding income tax allowance. When investors solely focus on the fundamentals, they should like what they see.

**Ed Russell: Okay great. Rob, can you touch a little bit on the climate for the capital markets for MLPs?**

**Rob Thummel:** Absolutely. So capital markets activity slowed in the second quarter with MLPs and other pipeline companies raising approximately \$18 billion in total capital; and nearly all of that was issuance via debt. There were no initial public offerings during the period.

And we believe this slowdown underscores the need for alternative forms of capital, like private investment in public equity (PIPEs) and preferred equity to fund growth projects. This needed capital will drive cash flow growth and eventually should lead to stock price appreciation, in our view.

Looking ahead, an INGAA study, and industry study indicates increased investment will be needed to support demand needs. For instance, capital investment for pipeline projects is expected to average \$44 billion per year from 2018 through 2035.

**Ed Russell: Okay, great. So on that view on pipeline projects needed, the Permian basin has become the center of attention for U.S. production with the blow out in price differentials. Brian, can you talk about what caused that?**

**Brian Kessens:** The Permian basin is growing at a rapid rate and producers have failed to commit to long-haul pipeline buildout in a timely fashion to satisfy this supply over the next several quarters. As a result, crude oil in Midland, Texas currently sells for about \$15 less per barrel than in Houston. This spread represents the marginal cost to transport that crude, usually in the form of either rail or worse, truck.

Based on the timing of new pipelines coming on in the Permian to alleviate this pressure, we anticipate the spread will be around until late 2019 or early 2020 when a series of new pipelines come online. This could temporarily slow Permian production growth until then and with it, U.S. production growth.

Many view this as a negative, but as a midstream investor, we believe it's very positive for the sector. It drives home the need for additional takeaway capacity and maybe just as importantly, our thesis that rigs will be shifted out of the Permian basin to other basins when available, leading to the Permian remaining at peak utilization and other basins increasing as well, essentially filling pipelines across the country

The same bottleneck is impacting the flow of natural gas out of the Permian too. In 2018, the basis between Waha, in west Texas and Henry Hub in Louisiana was at times almost \$1.50. Keep in mind, this is on a gas price of about \$3.00.

Needless to say, more takeaway is necessary. According to our estimates, \$12 billion is being spent in the Permian on planned pipeline projects to alleviate transportation bottlenecks of both crude oil and natural gas by 2020. And there are several potential expansion projects in discussion to add even more capacity beyond 2020. We think this is a positive catalyst for companies with midstream assets, particularly in the Permian basin.

**Ed Russell: Rob, moving to downstream, is there anything to highlight?**

**Rob Thummel:** Sure. One quick update on downstream. In our opinion, one of the biggest opportunities for the U.S. refining sector relates to a regulation on the horizon from the International Maritime Organization or the IMO. The regulation requires a reduction in marine fuel sulphur in 2020, otherwise known as IMO 2020. This regulation is expected to significantly reduce greenhouse gas emissions. Approximately 3 MMbbl/d of high sulphur fuel oil used to fuel ships will be displaced by low sulphur fuel oil.

Given the increased demand, we expect low sulphur fuel oil prices to rise. In addition, other light refined products like gasoline, may experience higher prices as well due to greater demand for cleaner refined products. U.S. refiners are well positioned to benefit from this development, along with benefitting from the price differential between WTI and Midland priced crude oil that Brian discussed earlier.

**Ed Russell: So Brian, despite the rising temperatures we've seen here in Kansas, natural gas sector prices are flat. What's the outlook for natural gas and how important is pricing for the U.S.?**

**Brian Kessens:** That's right Ed. The scorching start to summer after a prolonged winter has natural gas inventories 20% below historical levels. However, prices didn't move much in the second quarter. Natural gas prices opened the quarter at \$2.81 per million British thermal units (MMBtu) and saw little volatility throughout the quarter, ending it at \$2.97.

Despite the low storage levels, there is more than ample production. Natural gas production is expected to average about 80 billion cubic feet per day (bcf/d) in 2018 and nearly 86 bcf/d in 2019 per PRIMA. Growing U.S. production supports exports of liquefied natural gas (LNG) as the EIA expects U.S. exports to increase by nearly 60% from 2017-2018 and another 70% from 2018-2019, with existing facilities ramping and new facilities coming on-line.

Looking longer term at U.S. LNG, nearly 15 Bcf/d of 2<sup>nd</sup> wave LNG projects, those coming on-line beyond 2020, are under construction or have been proposed and approved by FERC. At current prices, we think the U.S. is exceptionally well positioned to be an exporter of choice.

**Ed Russell: Great. Rob, a question that's in the news today. How do you expect the U.S. and China tariff war to impact U.S. exports of oil and natural gas and do you expect potential steel tariffs to slow down the expansion of the pipeline projects that you mentioned earlier.**

**Rob Thummel:** Sure, as a refresher, earlier this month the U.S. government imposed \$34 billion in tariffs on Chinese imports effective July 6<sup>th</sup>, with China responding in a like amount. It's estimated that \$8 billion of new tariffs will come from iron and steel imports from China with pipeline construction costs expected to increase by less than 5%.

As it relates to exports, we believe the potential for impact on U.S. producers minimal due to the fungible nature of commodity that we're exporting. So U.S. crude and LPG exports to China averaged 330 mmb/d and 100 mmb/d, respectively, between January and April of this year.

To the extent China reduces its U.S. hydrocarbon imports, U.S. producers will likely find new buyers in the global marketplace potentially adding fractional costs.

LNG is expected to be excluded on China's list because of its fight against air pollution. So there should be no impact of growing exports to LNG.

Net/net: Our premise is as long as global demand stays the same, trade wars should have little impact on U.S. production and exports due to the concept of substitution.

**Ed Russell: Brian, any other regulatory matters that we should keep an eye on?**

**Brian Kessens:** Yes, worthy of mention is the recent announcement that FERC commission Robert Powelson will take a new role, leaving the commission with four members, split evenly 2-2 in terms of party affiliation. This could potentially cause some delays in project approval, but the last few commissioners have been affirmed in relatively short order, so we don't anticipate this to be a big issue

Also, of note, EPA head Scott Pruitt resigned, but will likely be replaced by either his second in command or someone similar. And the Supreme Court will have a new justice, which we would anticipate to be pro-business and therefore likely constructive for energy.

**Ed Russell: Okay, thank you Brian. As we wrap-up, here's a recap of what we covered in today's call:**

- Energy's positive second quarter momentum will continue and we believe that will lead to a compelling returns for midstream equities for the full year 2018 as stock prices catch-up to fundamentals.
- The long-term energy story centers on the increasing role the U.S. is playing globally and the impact on energy infrastructure domestically as a result.
- U.S. production is likely at risk of coming up a bit short of expectations due to Permian basin infrastructure constraints limiting growth until new pipelines come online.
- MLP simplifications are under way and in our view, will lead to continually improved performance across the sector.
- Now that FERC has now favorably clarified its position we hope it helps pave the way for a constructive back half of 2018 for MLPs.
- Incremental capital is needed for midstream infrastructure to alleviate bottlenecks and allow producers to get product to market.
- Needed capital should drive cash flow growth and eventually could lead to stock price appreciation.
- As these catalysts play out, the MLP sector should attract new investors which, in turn, should lead to better returns in the future.

Thank you all for joining us today. We look forward to talking with you again. In the meantime, we invite you to visit our website at [www.tortoiseadvisors.com](http://www.tortoiseadvisors.com) and please check out our Tortoise QuickTake energy podcast series where we share our views on timely events. Thank you everyone.

*Nothing contained in this communication constitutes tax, legal, or investment advice. Investors must consult their tax advisor or legal counsel for advice and information concerning their particular situation. Views expressed herein should not be relied on as investment advice or an indication of trading intent. **Past performance does not guarantee future results.***

**The S&P Energy Select Sector® Index** The S&P Energy Select Sector® Index is a capitalization-weighted index of S&P® 500 Index companies in the energy sector involved in the development or production of energy products.

#### **Tortoise North American Pipeline Index<sup>SM</sup>**

The Tortoise North American Pipeline Index<sup>SM</sup> is a float-adjusted, capitalization weighted index of pipeline companies headquartered in the United States and Canada. A pipeline company is defined as a company that either 1) has been assigned a standard industrial classification ("SIC") system code that indicates the company operates in the energy pipeline industry or 2) has at least 50% of its assets, cash flow or revenue associated with the operation or ownership of energy pipelines. Pipeline companies engage in the business of transporting natural gas, crude oil and refined products, storing, gathering and processing such as gas, crude oil and products and local gas distribution. The index includes pipeline companies structured as corporations, limited liability companies and master limited partnerships (MLPs).

#### **Tortoise MLP Index®**

The Tortoise MLP Index® is a float-adjusted, capitalization weighted index of energy master limited partnerships (MLPs). The index is comprised of publicly traded companies organized in the form of limited partnerships or limited liability companies engaged in transportation, production, processing and/or storage of energy commodities.

The Tortoise indices are the exclusive property of Tortoise Index Solutions, LLC, which has contracted with S&P Opco, LLC (a subsidiary of S&P Dow Jones Indices LLC) to calculate and maintain the Tortoise MLP Index®, Tortoise North American Pipeline Index<sup>SM</sup> and Tortoise North American Oil and Gas Producers Index<sup>SM</sup> (the "Indices"). The Indices are not sponsored by S&P Dow Jones Indices or its affiliates or its third party licensors (collectively, "S&P Dow Jones Indices"). S&P Dow Jones Indices will not be liable for any errors or omission in calculating the Indices. "Calculated by S&P Dow Jones Indices" and its related stylized mark(s) are service marks of S&P Dow Jones Indices and have been licensed for use by Tortoise Index Solutions, LLC and its affiliates. S&P® is a registered trademark Standard & Poor's

Financial Services LLC (“SPFS”), and Dow Jones® is a registered trademark of Dow Jones Trademark Holdings LLC (“Dow Jones”).