

U.S. E&Ps: Life in the Echo Chamber

MacKenzie Davis, CFA and Ken Settles, CFA

"An object in motion continues in motion...unless acted upon by an unbalanced force." —Isaac Newton

"If something cannot go on forever, it will stop." —Herbert Stein

"Sometimes thinking too much can destroy your momentum." -Tom Watson

For the U.S. E&P industry, production growth is the hallmark of success, and that mandate is reinforced by almost every constituent. For many, "Drill, baby, drill" isn't a joke, it's a business plan. This is evident from management commentaries, with one leading CEO quoted as saying, "the shareholders back us to grow production, and that's what we focus on."¹ It is a directive from the boardroom, where directors create annual and long-term compensation structures dominated by growth metrics.

	Production /	Reserve	F&D	EBITDAX (or other CF	Operating Costs					
Summary	Prod. Grow th	Grow th	Costs	Profitability Measure)	(including LOE)	Leverage	Returns	TSR	Capex	Othe
% of Covered Firms with Metric:	96%	43%	48%	52%	87%	17%	13%	26%	17%	91%
Avg Weight of Metric*	19%	17%	18%	21%	22%	12%	20%	14%	17%	31%
Performance Relative to Targets										
% EXCEED Goal in 2016	95%	90%	82%	100%	90%	100%	100%	83%	75%	81%
% MEET Goal in 2016	0%	0%	9%	0%	10%	0%	0%	0%	25%	14%
% MISS Goal in 2016	5%	10%	9%	0%	0%	0%	0%	17%	0%	5%
*Only averaged weight of metric for firm	s with metric include	d in annual bo	onus plan							

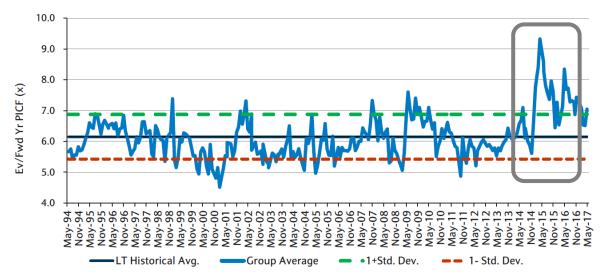
And, it's a message straight from the investment community, who year after year approve those compensation plans, and who obsess over multiple compression and cash flow growth rates.

Unsurprisingly, the industry has responded. Since reaching its trough one year ago, the rig count has more than doubled, and production has followed. In less than nine months, U.S. oil production has increased more than 0.8mm barrels per day ("bpd") to 9.3mm bpd, only 0.3mm bpd below the 2015 peak. Most of this growth has been funded with external capital, as the industry has outspent organic cash flows by almost 100% since the end of 2014, according to Bernstein estimates.² Based on corporate drilling plans, U.S. production is expected to grow by 0.8–1.0mm bpd in 2017, with commensurate supply additions in 2018. At current strip prices, this level of activity will require continued access to third-party capital.

¹ Bloomberg interview, 3/28/17

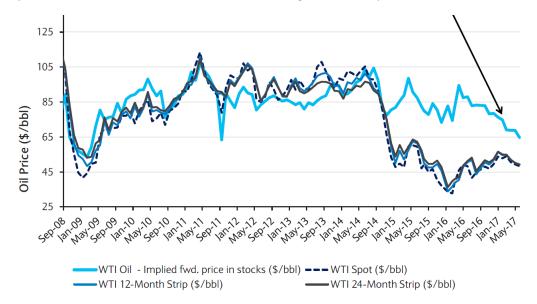
² Bernstein, Don't just blame the operators for oil price woes...capital markets equally to blame, 5/9/17

Until recently, the strategy of "growth at any cost" appears to have worked. Despite the fact that oil was one of the worst performing commodities from 2014–2016, well-capitalized shale oil producers generated some of the most attractive investment returns in the natural resource space over that time frame. This outcome is logical if the shale oil narrative is true. Specifically, if companies are able to generate attractive returns, then outspending cash flows should result in value creation, which is simply a function of excess returns and capital deployed. More value for the same annual cash flow results in multiple expansion, which is exactly what we witnessed from 2014–2016.



Source: Barclays, What Drives E&P Share Prices?, 6/8/17

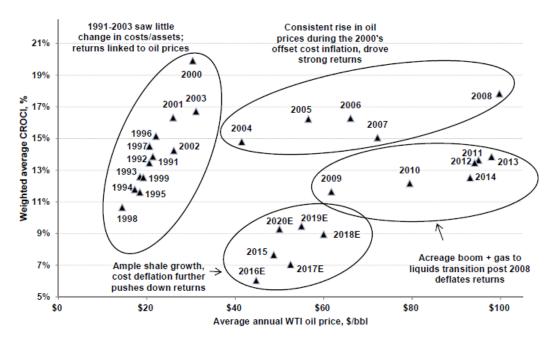
The prospects of higher returns made sense if investors were anticipating higher future commodity prices, which also appears to have been the case. The combination of a declining U.S. rig count followed by OPEC cuts seemed to foretell a market moving back into equilibrium.



Source: Barclays, What Drives E&P Share Prices?, 6/8/17

Even today, oily E&P companies appear to be discounting attractive incremental returns and higher future commodity prices, albeit to a lesser extent than at the beginning of the year. To the casual observer, the growth mandate appears to be intact.

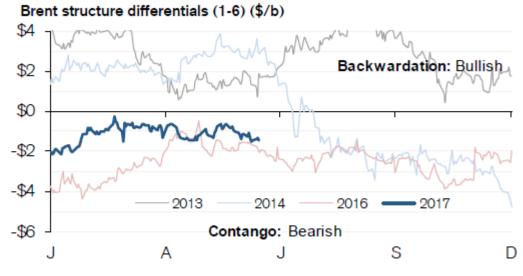
However, there are two issues with this conclusion. First, cash-on-cash returns have been falling consistently over the past 15 years, despite the attractive half-cycle well-head economics that are quoted in many company presentations. We can see this at the industry level.



Source: Goldman Sachs Global Investment Research

It is also evident when analyzing drilling rates of returns at the company level. In fact, using 2016 reserve reports and the SEC standard measure price deck of \$2.50 gas and \$45 oil, we could identify only a few U.S. E&P companies that generated an unhedged economic return on their 2016 drilling program, and we have no reason to believe that the returns in the private market were meaningfully better.

Second, the willingness of companies to drill irrespective of returns, combined with the willingness of the public and private capital markets to continue to fund these uneconomic activities, is putting pressure on commodity prices and commodity price expectations. Despite a nine-month extension of OPEC's production curtailments, and a high level of compliance to-date, spot oil prices have fallen more than 15% so far this year and are back down to levels seen just prior to the November 2016 OPEC meeting, when the first rounds of cuts were announced. In addition, term structures in the futures market point toward an expectation of continued loose supply/demand dynamics, as seen in the chart on the following page.



Source: Credit Suisse, The Flowing Oil Chartbook, 6/14/17

It is clear that the commodity market is expressing its concern about this unbridled growth in production when other, lower-cost sources of supply are being constrained. Unlike the 2014–2016 period, the equity market is beginning to show signs of caution as well. Share prices for U.S. E&Ps have been much more closely correlated with oil prices in 2017 and have underperformed the commodity thus far, with the index of oil and gas producers down almost 25% YTD. Multiples are compressing, but for the wrong reason. There is a message in this new dynamic, but what is it?

For the last few years, we have been confounded by the market's willingness to ignore the valuedestructive nature of the E&P industry (defined as spending money to earn sub-economic returns). More recently, we have become concerned that in the pursuit of growth, companies are eating through precious inventory at a time when the market is looking for supply restraint. Instead, most U.S. shale producers have promised to "stay the course" until oil prices are sustainably below \$40, even though they failed to generate a return when oil prices were higher and service costs lower. Now, with activity levels rising, oil prices falling, and share prices falling even more, it appears that the message in the feedback loop has changed. "Drill, baby, drill" is no longer echoing off the walls. Instead, it sounds like Mr. Market is saying "*Stop*". Stop drilling, stop allocating capital based on fictitious well-level economics, stop growing production.

The question is whether or not anyone is listening.

Disclosure: This material is solely for informational purposes and shall not constitute an offer to sell or the solicitation to buy securities. The opinions expressed herein represent the current, good faith views of the author(s) at the time of publication and are provided for limited purposes, are not definitive investment advice, and should not be relied on as such. The information presented in this article has been developed internally and/or obtained from sources believed to be reliable; however, SailingStone Capital Partners LLC ("SSCP") does not guarantee the accuracy, adequacy or completeness of such information. Predictions, opinions, and other information contained in this article are subject to change continually and without notice of any kind and may no longer be true after the date indicated. Any forward-looking statements speak only as of the date they are made, and SSCP assumes no duty to and does not undertake to update forward-looking statements. Forward-looking statements are subject to numerous assumptions, risks and uncertainties, which change over time. Actual results could differ materially from those anticipated in forward-looking statements.

Any individual companies identified herein should not be viewed as investment recommendations, and it should not be assumed that any investment in such companies' securities were or will be profitable.

©2017, SailingStone Capital Partners LLC. All rights reserved.