8th Annual Private Company Energy Conference Recap



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Oil Service -

Revelations from the 8th Annual Private Company Energy Conference

December 3, 2017

Conclusion

Our 8th Annual Private Company Energy Conference concluded on Thursday, November 30th and a very special thanks to the many private energy franchises that once again ventured north to New York City. The event reminded us of Charles Dickens' famous opening salvo in A Tale of Two Cities - "It was the best of times, it was the worst of times". On the one hand, company optimism and attitudes were notably upbeat as virtually all attendees see a healthy uptick in utilization and pricing next year. Yet, institutional investor enthusiasm reflects the (i) the current 20 year low energy weightings (~5.8% of S&P 500) and a year thus far witnessing a ~25% YTD decline in the OSX vs. an ~18% YTD improvement in the S&P 500. Thankfully, the positive vibes expressed by many of the 50+ private company attendees should give hope for our patient institutional clients next year.

- In addition, the feedback loop from our conference corroborated what we have been hearing from resource holders: upstream capital allocation is shifting assertively to development mode and completions activity should outpace drilling activity, provided the completions value chain is sufficiently responsive to the rising call on frac capacity. To this point, labor remains the most acute constraint and the tension between E&P aspirations for efficient, calibrated growth, on the one hand, and the wherewithal and responsiveness of the completions value chain, on the other, will only grow from this point forward, especially with 2018 oil prices hovering between \$55-60/bbl. Accordingly, it stands to reason that the current and growing tightness of the frac value chain should yield continued frac pricing improvement provided the industry has the willpower to exploit this window of opportunity.
- It is worth reminding readers that observations bestowed at our private company conference tend to be a bit more granular than what is typically conveyed at traditional public company conferences. In addition, we believe the real-time views of these private company management teams tend to be more right than wrong. Assuming history repeats itself, the views and optimism conveyed last week lead us to once again reiterate our positive views for U.S. land focused enterprises, most specifically pressure pumping (and those tied to the completions process). While we have not reviewed any models following this conference, the positive pricing views expressed by many of the private company attendees would seemingly suggest a positive bias for 1H'18 upwards earnings revisions, particularly for completion-oriented names.
- Pricing Improvement Expected: panelists across the pressure pumping, land drilling, well servicing and flowback services all anticipate further pricing improvement. Land rig dayrates, which are in the \$19,000 to \$20,000/day range, are expected to reach the low-to-mid \$20's should rig activity improve. Meanwhile, pressure pumping companies believe 10-20% pricing opportunities could reasonably be forthcoming in Q1'18. One company noted it has already secured a 10% price improvement over Q4'17 levels. The frac pricing commentary is particularly notable given the deceleration of frac pricing in 2H'17. Our sense from numerous discussions with company attendees is the sole reason for the deceleration of pricing, which started in Q3'17, was tied to the decline in oil prices during the quarter. With oil prices now handsomely improved from Q3'17 levels, the attitude and desire for additional pricing is palpable. Workover rates should see some uplift, but the magnitude of the increases is likely to be a function of cost creep; thus market fragmentation likely keeps unfettered pricing power to a minimum. Importantly, all see an acceleration in activity early next year.

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Related Companies BAS	Share Price 23.61
CFW CN 6	.28
CJ	32.62
EMES	7.97
FMSA	4.90
FRAC	15.64
HAL	43.06
HCLP	10.50
KEG	10.40
PTEN	21.98
PUMP	19.15
RES	24.87
SLCA	33.92
TUSK	19.54

INDUSTRY RISKS

Cannibalized equipment, costs of rebuilds, and the oversupply of frac fleets. The oversupply of frac sand and the potential for declining service intensity.

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Oil Service Capex Will Accelerate

Virtually all of our panelists see higher capital spending next year, but the most significant takeaway came from the Completions Panel where ProFrac Services announced its current build rate is one fleet every six weeks. The company presently has six fleets deployed and confirmed its plans to definitively build an additional six fleets. If one assumes 50,000 horsepower per fleet, this would put ProFrac at nearly 600,000 horsepower by Q3'18. Our working assumption is the company will target a 1.0M horsepower fleet. We generally do not call out specific companies in our conference recap notes, but we think the industry needs to pay close attention to the aspirations of ProFrac given the current owner's successful prior ownership and subsequent sale in the space. The company owns its own frac assembly operation which allows it to control the speed of new fleet construction while allowing it to assemble fleets cheaper than those that have to buy fleets from third-parties. ProFrac's growth ambitions were similarly shared by another frac company attendee who plans to expand from one fleet today to approximately six fleets by the end of 2018. Ambitious capital expansion plans were similarly echoed by a flowback service provider who will double capex as well as two providers of coiled tubing services, both of whom are building new units. Land drilling newbuilds are not likely given insufficiently accommodating dayrates while only select workover rigs may get built (i.e. those with 116" masts). Our land driller panelist may pursue some additional rig upgrades while our well service panelists believe industry consolidation is necessary, not newbuilds.

The panelists on the Capital Equipment panel echoed the growing slate of pressure pumping newbuild opportunities as one panelist is quoting fleets for potentially two new start-up companies while an audience attendee reported the receipt of a 20 pump order. One panelist whose primary product is frac radiators reports 2017 deliveries are likely to approach 3.0M horsepower (reminder: one radiator per frac unit) while 2018 is shaping up to be similar to 2017. During 2014, this company sold enough radiators to outfit nearly 600k hp, so nice market share gains which largely reflect the company's new innovative design. Also, those capital equipment providers tied to the frac market clearly stated that much of the blossoming work is a function of growing after-market activity. This is a key point and one reason why we believe the U.S. frac market should remain tight through 1H'18, provided the completions value chain is sufficiently responsive to the rising call on frac capacity. To this point, labor remains the most acute constraint and the tension between E&P aspirations for efficient, calibrated growth, on the one hand, and the wherewithal and responsiveness of the completions value chain, on the other, will only grow from this point forward, especially with 2018 oil prices hovering between \$55-60/bbl. Accordingly, it stands to reason that the current and growing tightness of the frac value chain should yield continued frac pricing improvement provided the industry has the willpower to exploit this window of opportunity.



Scott McKee, Vice President of Marketing - Cactus Drilling Company, LLC



Randy Vanberg, President - Houston Global Heat Transfer LLC



Trey Ingram, CEO - Legend Energy Services, LLC, Matt Wilks, Managing Director - Wilks Brothers, John Cavitt, Founder & CEO - Covenant Testing Technologies, LLC

Frac Sand Panel

Broadly speaking, commentary gleaned from our panel - as well as offline from other conference participants - support our belief that the frac sand market should remain tight in 2018, perhaps even tighter than we believed coming into the conference. With respect to pricing, one panelist expects average FOB mine spot pricing in Wisconsin to increase by YE'18 to ~\$50/ton from ~\$45/ton currently despite the expected rise of nameplate capacity (we currently model spot pricing falling next year). Further, the panelist believes full-cycle pricing below \$35/ton would not be sustainable; nonetheless, a dip below that level is certainly possible after 2018 depending on how much sand enters the market. We would agree a dip is possible (if not probable) given prior history during industry downturns as well as the continued prospects for more sand supply. Remember, this remains a cyclical business.

With respect to new supply, we learned this week of two southeast mines which are now moving forward with plans to add capacity via additional drying equipment. This decision is the result of continued market strength and will increase consolidated nameplate capacity by ~2-4M tons. In contrast, one of our Wisconsin-exposed panelists does not expect any new Northern White facilities, even noting the struggles of one La Salle County competitor that cannot give its sand away because of where they are located.

Two panelists are presently building Permian mines. One expects ~30M tons of nameplate capacity in the region by YE'18 while the other anticipates between 30M and 40M tons. One reports 50-60 people per mine are needed, but it has not seen many competitors at job fairs, raising doubts about adequate hiring necessary to bring a mine online. Both panelists expect delays for competitor facilities and contend that certain PE-backed mines might never come to market. Time will tell. Regarding truck traffic, two panelists expect major bottlenecks while another panelist does not foresee trucks creating the often-cited doomsday scenario. Lead-times for drying equipment are extending with those ordering today likely not receiving equipment until 2019, possibly exacerbating the potential for delays.

With respect to new Permian mines, one panelist expects to produce 50% 40/70 and 50% 100 mesh from its site while the other believes ~30% of production will be 40/70. The more established player will sell primarily to pressure pumpers while the new market entrant expects to sell primarily to E&P's. As part of our E&P townhall, our panelist cited a willingness by his company to begin pumping 30/50; however, the company is not using ceramic or RCS in the L48 and is still testing local 100 mesh. Interestingly, according to multiple sources at the conference one prominent operator who tested 20/40 is now increasing orders for that grade. Perhaps more importantly, the company also tested regional 100 mesh and does not plan to use any moving forward. This data point is by no means an assault by us on Permian 100 mesh quality, but the datapoint evidences that operator preferences are not created equal.



Cody Wickersheim, President - Badger Mining Corporation

Regarding trucking, rail, and logistics, one of our panelists highlighted that his company's containerized solutions is 30% more cost effective relative to pneumatics. Its system can cut unload times to ~12 minutes from as high as 70 minutes for legacy systems, contributing to the cost savings. Most of the company's systems are under longer term contracts and no price increases, apart from labor, are expected next year. That panelist also is affiliated with a railroad and does not expect sand to be able to leave West Texas via rail for quite some time. On another panel, one of the capital equipment providers who manufactures last mile solutions reports that its installed base of systems is now ~70 while it has demand/plans to construct another 30-50 systems in 2018.

Lastly, we heard of a new railcar phenomenon which could potentially impact the sand industry significantly next year: currently there is a shortage of 286k pound railcars (the weight is the total size of the railcar, not just storage capacity) which are 48 feet long. As a result, usage of 268k pound cars that are 60 feet long is increasing. Why does that matter? Mines have to pay the same amount to send either type of car, but the 286k pound cars holds ~115 tons (even though its shorter) versus ~100 tons for the 268k pound cars, meaning lower tons shipped per unit train. Moreover, certain transloads will not accept the 268k pound car because it is longer and takes up more space, reducing throughput for the transload. Delivery for 286k pound cars is now up to ~12 months for certain suppliers; thus, a solution is unlikely in the near term. Mines will likely pass this cost to customers, increasing the price of sand delivered to the wellsite and allowing those with an abundance of 286k pound railcars the potential to enjoy higher industry pricing without the burden of increased costs.

Flowback Services

We received a comprehensive overview of the flowback market from one of our panelists. In summary flowback is a fragmented \$2-3B industry with the larger companies (HAL, SLB, WTTR, OIS) comprising elevated levels of market share relative to mom and pops. Flowback units are currently on wells for ~45 days on average for completions jobs. Our panelist's company works primarily in the DJ and in the Permian: in the DJ, service intensity seems to have plateaued while he believes service intensity in the Delaware is continuing to accelerate. Due to the strength of the flowback market, it will double CapEx y/y in 2018. Pricing was characterized as up ~15% from the trough while it will likely push pricing 10-20% in 2018 (vs. the Q4 exit rate).

Emerging Company Perspectives

Our Emerging Company Panel featured individuals from a diverse array of service lines including: snubbing, pumpdown and waste services. Snubbing activity for one company is up ~15% from 2014 levels; nevertheless, pricing has not yet returned to peak levels during that year (although EBITDA margins remain robust, well above those of most frac companies). Extending laterals have served as a tailwind for the snubbing industry since snubbing units can often reach longer than coiled tubing units and, according to our panelist, are effective in laterals up to 15k feet long. That panelist also noted improving activity in East Texas led by some of the mid-cap E&P's.

With regard to pumpdown, one of our panelists recently started his company due to the strong market fundamentals in pumpdown. In his view, the strength of the frac market has led some to repurporse pumpdown units for use in frac, leaving a void for companies like his own to fill. Currently this player is seeking long-term contracts in case the frac market pulls back and competition in pumpdown intensifies. The wear and tear on pumpdown units is much lower than on frac units which benefits margins.



Dirk Lee, President - Momentum Pressure Control



Dago Zalapa, Sr. Integration Lead Global Well Operations Supply Chain - ConocoPhillips

We were fortunate to be joined by a player in waste services this year with an innovative approach to waste management. The company's system uses slurries rather than the more typical landfills. Permitting for slurries takes ~3 months versus a couple of years for landfills; moreover, facility construction takes just 6 months versus 9 months for landfills. Waste management using slurries is often cheaper than the landfill method but still earns a nice margin; pricing also remained relatively flat during the downturn. Our panelist's company uses frac pumps to reinject waste into wells that are similar to saltwater injector wells; this method takes up ~20 acres of property versus ~200 acres for landfills. While we are admittedly new to the waste services side of the oilfield, what intrigued us the most was a reference to a fragmented market in which a number of PE-backed enterprises exist. Perhaps, this could be the next oilfield roll-up opportunity?

Coiled Tubing Thoughts

Similar to frac, the coil market seems to be very healthy. Our panelist has all of its units currently active and has even seen increased utilization for 2" units due to the dearth of 2 3/8" and 2 5/8" units available in the market. Current pricing levels justify additional investment in CT units and according to our contact, CT pricing did not flatten the way frac pricing purportedly did in recent quarters. Consequently, our panelist recently ordered two 2 3/8" units for delivery next year (another private CT attendee is also ordering a new large diameter CT unit). The speed of CT units relative to workover has led to increased interest from certain operators. One of our other panelists believes plug and perf is here to stay (due in part to a decline in the usage of dissolvable plugs) while another cited an uptick in CT activated sleeve jobs in the Bakken and Permian among other regions.

IMAGES FROM THE PRIVATE COMPANY ENERGY CONFERENCE























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Analyst Certification

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