



## OPEC's Strategic Options in a Shale World

By Jamie Webster

*May 22, 2017*

When evaluating OPEC or its potential actions, it is helpful to remember that it is much like the US Congress, a low consensus organization that often needs a near unequivocal impetus to stir action. The organization has no real compelling power other than a common desire of the members to maximize revenues. But this commonality does not extend to a commonweal for the populations of these member countries. Instead, each representing oil minister answers back to leadership of the State. This dynamic can make it difficult to quickly and effectively deal with meaningful changes within the membership, with threats from outside even more difficult to address.

In November 2014, overwhelming US shale and global oil growth and declining prices were addressed with a decision to allow production to be unchecked. The strategic intent was to put pressure on high-cost producers to reduce or slow production, allowing the market to reach a balance, sooner hopefully, later if need be. More than two years later, a production cut of 1.8 mm b/d, which spanned both OPEC and non-OPEC members, was undertaken after several elements fell into place. Outside of the members, perhaps most critical was a significant drop in shale production and a belief that it was unlikely to again grow at a rate greater than aggregate global demand growth.

As of this writing, the cut appears to be working, albeit slowly, as the International Energy Agency (IEA) reports a second month of OECD stock draws, a common metric when evaluating the effectiveness of the cuts. Consensus is that the May 25, 2017 meeting will return a rollover, though with a growing tail risk that a decision may be made to not only extend the cuts but make them larger.

But behind what looks like steadily emerging success lurks a strategic threat for OPEC. Shale has not been idle during the downturn, and while the industry saw nearly eight percent of companies shutter their doors, incredible cost savings and efficiency gains also occurred, with drilling costs falling nearly 30 percent and rig productivity more than doubling – tripling in the Permian. Month on month growth rates are nearing the level of 2014. Volume-wise, US shale may still be too small to take on OPEC's traditional role as the market balancer, but this still-accelerating growth rate is sufficient enough that it could again play the role of disruptor.

Shale is not the only concern or risk for OPEC and others desiring higher oil prices. The recent Libyan production surge and weak 1H demand also can work to upset the market. But shale is worthy of special attention as it is likely to be a force for the next several years and production growth is more closely correlated with oil price changes in ways that Libya is not, and—relative to the impact of changing demand in different price environments—it is volumetrically much more significant. In the end, OPEC's best option may be to better incorporate the realities of shale and set volumes proactively in line with expected shale production—a huge shift for a group that historically only responds reactively.



If this is the case and resurgent, resilient, and lower-cost shale is again going to disrupt the market, how could OPEC respond? The organization's members are economically weaker than when the price drop first occurred in 2014, with Venezuela on the precipice of a collapse. But the Organization has also had some diplomatic successes, bringing in ten countries to accompany them in production cuts, although, just as within OPEC, the cuts are not evenly distributed.

A harsh reality may emerge, likely well after the May 2017 meeting, that the price at which shale can grow quickly could be much lower than the price OPEC members want and need.

Below are some strategic options for OPEC to consider if and when shale growth reaches a level that is unsustainable for a balanced market. They are listed in approximate order of executional complexity and difficulty. The latter options are stark departures from normal OPEC market balancing modes, but such a radical approach may be necessary to secure sufficient revenues for states seeking to maximize revenues in the future, while simultaneously keeping volatility tamped down. Regardless of how it occurs, a steady oil price path is useful for both producers and consumers.

### **Strategic Options**

**Steady course:** OPEC and non-OPEC countries maintain the agreed 1.8 mm b/d cut, arguing that they will contribute that much towards balancing, but no more.

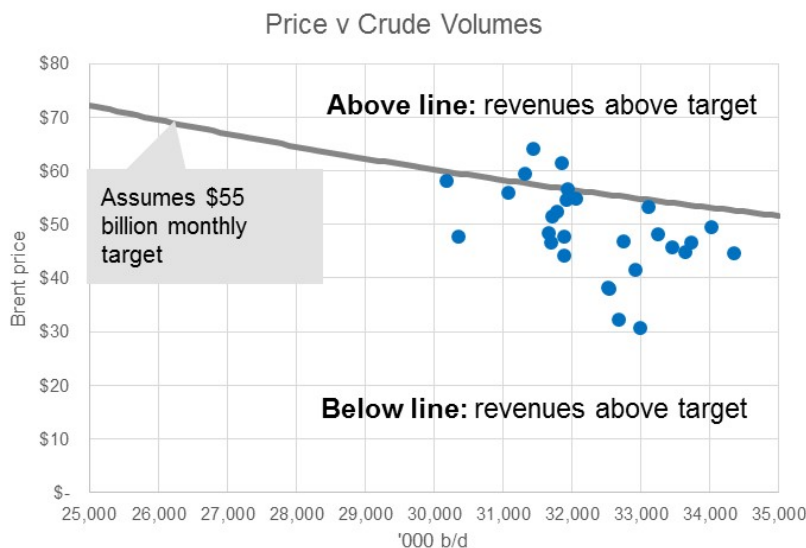
*Upside:* OPEC ring fences its contribution, limiting the need for additional negotiations within the organization; strategy largely avoids the shale issue.

*Downside:* Likely loss of status as the market balancer. Likely reduction in compliance over time or when prices fall. Potential for significant revenue declines, should the pace of shale growth continue.

**2014 redux:** Abandon production cuts and allow members to produce as they are able in a bid to maximize revenues through volumes and put renewed pressure on other elements of supply and demand to nudge them towards a balance.

*Upside:* Arguably allows members to control when prices drop. Puts additional pressure on high-cost producers to reduce production over time.

*Downside:* Substantial loss of near-term revenue. OPEC crude revenue averaged over \$100 billion per month during the relatively stable period from 2012 until mid-2014, just prior to the price decline. Revenues have averaged less than \$50 billion per month during this downturn, going as low as \$30 billion in early 2016. Lower prices would push shale drillers to squeeze out remaining costs savings, increase efficiencies, and likely push resources—for nearly all resource types—lower on the cost curve. This would allow those producers to accelerate growth strongly when the price rises again.



**Double down:** Continue to cut to keep prices elevated, perhaps selecting a target revenue level to increase financial stability in home country accounts. At present volumes and prices, a 1 mm b/d cut only requires a \$2/b difference to offset, with Saudi Arabia needing a ~\$5/b difference for a 1 mm b/d cut. When prices rise, this is easy to see and felt in OPEC member's financial accounts. More difficult is when the \$2/b (or more) difference comes from an unseen lack of a price fall, or one much smaller than what would have otherwise occurred. The chart above looks at two aspects: OPEC crude production against the Brent price (each OPEC country prices its crude against different quality and locational benchmarks, but the Brent price provides an easier analytical metric). On this grid, I have placed a set of points which create a line that shows the different combinations needed to bring in monthly revenue at \$55/billion per month for OPEC as a whole. This target was arbitrarily set for analytical purposes and represents approximately 10 percent higher revenues than recent months. Combinations of price and volume that elicit less than \$55/billion per month will fall below this line, and combinations that provide more revenue than that will be above the line. The blue dots are calculated historical revenue data from Jan 2015-April 2017, showing that just five months met this target.

*Upside:* Could provide members with more stable income, would limit downside price declines so long as OPEC's willingness and adherence to cuts remained.

*Downside:* If the market is aware of the Organization targeting a certain revenue level (and with it a price level), this awareness could impact trading and the price. This option requires strong adherence, with no guarantee that prices will rise sufficiently to meet the target.

**Oil bank:** OPEC quotas and targets only impact crude production, not exports (or NGLs or condensates). The problem of this mode of control was clear with the increased exports in tandem with the agreement to cut production. Given this, along with the need to maintain sufficient revenues, an oil bank could be created by



country, combining the revenue target approach of the double down strategy above, with a managed allowable export level (averaged over time to compensate for seasonal, marketing and customer relationship factors). An OPEC-wide bank might be more practical, but given the sometimes quite poor political relationships between some member states it is unlikely a governance structure could be created that would satisfy all participants. Instead, each country would create their own oil bank, allowing revenues to remain more stable. If it also included physical oil, the Organization could create a small amount of additional synthetic spare capacity. Oil revenue banks (sometimes as stabilization funds, sometimes a sovereign wealth fund) have been attempted in different countries, with varying degrees of success. Agreeing to do it across the organization, and with specific targets, would potentially increase its effectiveness.

*Upside:* Over time this method can increase compliance with cuts and expand the stake of every member as it socializes the cost of market management rather than depending on only one or two states to increase or decrease production as needed. The focus on exports also allows for greater fine-tuning.

*Downside:* Difficult to agree on, difficult to implement, costly to maintain oil stocks, and political temptation to raid the coffers or physical oil stocks. Holds potential to backfire.

**Interaction:** For a host of political, economic and legal reasons, US shale will not be joining OPEC or restricting supplies artificially. However, the understanding of shale is growing, with substantial data and analysis of near term shale expectations. OPEC could take these forward views, and try to reassert that the metric that matters is the Call on OPEC. By bringing in a clear-eyed view of near-term shale growth, the Organization can then set production levels to balance the market. This requires the Organization to fully use and trust the technocratic resources already at its disposal and move from its traditionally reactionary mode to a more proactive mode. This may be OPEC's best option should it desire to maintain a long-term hand in market management.

*Upside:* Could place OPEC in a changed, but more controllable market.

*Downside:* Depending on the price level, OPEC could cede significant volumes to shale. While knowledge of shale continues to expand, production expectations have been wildly off several times in the last years and there remains a significant risk this could continue.

The belief that US shale has permanently upset OPEC's market management mechanisms remains an open argument for some. Many of the strategy ideas above would be difficult to implement in an organization like OPEC, but they may be worth considering, given the market pressures that the full potential for US shale could bring to OPEC.

##

*Jamie Webster (@websterdrake) is a Fellow at the Center on Global Energy Policy.*