# Drilling Rig Demand & Activity.

The Oil and Gas industry has long been at the whim of the ebb and flow of the global economy. We have seen, on several occasions, periods of sustained market growth, followed by short periods of acute market contraction. In the latest cycle, generous commodity prices and bountiful access to credit set a platform for this pattern to play out once more. Whilst all industries associated with Oil and Gas suffered when the foundations of this platform proved to be far from secure, those surrounding drilling, one of the more oil price and general economic welfare sensitive corners of the industry, noticed a particularly sharp downturn. Amidst a backdrop of stabilising commodity prices and the beginnings of a return of credit in to the market place, Luke Davis, an Analyst at Infield Systems discusses the prevailing dynamics in the drilling market.

# Oil Price & Rig Construction: The Relationship

For newbuild rig construction, commodity price and energy demand cyclicality can have a profound impact on the number of newbuild contracts awarded, clearly illustrated by the figure below. Just a cursory glance at this figure reveals the remarkably close relationship between annual rig deliveries and prevailing oil price. Nowhere is this better exemplified than in the years immediately following the 1970s oil shocks, and again, in the four year period from 2005 onwards when record oil prices drove a spate of newbuild contract awards.

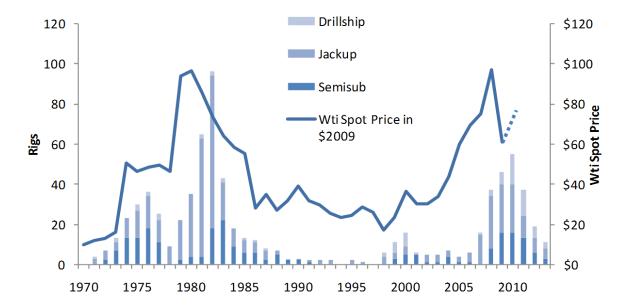


Figure 1: Rig Construction by Year of Delivery Vs Oil Price (2009 Adjusted) (ISL RigGateway)

The causal relationship between the level of rig construction and oil price is relatively straightforward. In a prosperous and growing global economy demand for energy increases, and this in turn erodes spare production capacity and subsequently imparts upward pressure on prices. During these peak commodity price cycles oil companies are encouraged to expand their production portfolios and capitalise on the positive investment climate by increasing their E&A Capex. The upshot of this is a surge in drilling rig construction activity as operators vie for contracts whilst rig managers seek to capitalise on increasing revenues.

# The Latest Construction Boom & the Subsequent Fall of Demand

From 2005 onwards, as energy companies turned to deeper waters in search of more lucrative plays, the offshore drilling industry began to be affected by years of under-investment in deep and ultra-deepwater rigs. The supply bottlenecks that subsequently developed frustrated oil companies as their ability to explore and appraise their deepwater interests was severely constrained by a lack of available drilling assets. Driven by fierce competition, dayrates for the most capable rigs began an almost vertical trajectory, lifting them from around US\$150k per day to over US\$600k per day in just a few years. The major driver behind much of this increased demand was oil price, which rose from an average of US\$26 per barrel in 2002 to over US\$100 in 2008.

In all respects the climate post 2004 was perfect for rig investment – asset competition was fierce, oil prices rose unremittingly and credit was readily available. Indeed, until the latter half of 2008 the only growth constraint curtailing fleet expansion was that of shipyard availability. As such, energy companies were ordering new rigs in droves and rig

managers were constructing on speculation with the assured knowledge that they wouldn't remain un-contracted for long. But such rapid growth, though required, especially for ultra-deepwater assets, could not have conflicted more closely with the rapid downturn that shocked the market in the latter half of 2008.

Indeed, in the midst of this construction frenzy the global economy went through a meltdown. The subsequent knock-on effect this had on the offshore industry was double edged. First, access to credit dried up, and, as it did, operators struggled to raise the finances to fund their projects. Secondly, the retracting global economy meant energy demand fell rapidly and oil prices crashed from a high of US\$147 in the summer of 2008 down to US\$35 in January 2009. These adverse conditions encouraged many oil companies to revisit their capital commitments, and, as a result, in the last year we have seen a widespread focus on supply chain management and more aggressive cost negotiations. Through 2009 this meant that dayrates and utilisation rates for all rig types fell from their 2008 peak and the positive outlook deteriorated rapidly.

#### The Current Picture

Today, as we tentatively tiptoe from the shadows of this latest down cycle, the extreme conservatism that has epitomised the industry for the last twelve months is being replaced by an increasing sense of optimism. Oil prices now appear set to remain above US\$75 per barrel increasing operator confidence and leading to a greater than previously expected E&P Capex for 2010. Evidence of this upward trend is gathering apace. Shell is committed to a \$28bn capital investment programme whilst BHP Billiton has announced a 33% surge in its E&A budget to bring total spending for the year ending June 2010 to \$800m – its highest since 2001. At the same time the return of credit will allow smaller independents to increase their Capex commitments, helping to shore-up sectors such as the beleaguered US GoM jack-up market. But what tangible effect will this have on utilisation rates and dayrates given the influx of newbuilds on to the market?

For the jack-up market, which has been characterised by extreme capacity building and low rates of attrition, we expect dayrates to remain suppressed. Our cautious outlook for this market is furthered by expectations of the gas market enduring a comparatively slower recovery given the recent growth of unconventional gas sources. Suppressed day rates and low utilisation are unlikely to drive much new build activity, though we may see some new Jack-up orders coming from NOCs, which still have cash and shallow water assets to bring to production.

What new build activity we do see, however, is likely to be focussed on the higher end of the jack-up market. Vantage Drilling's chief executive Paul Bragg recently told analysts that there has been a shift towards "larger and more powerful rigs with longer leg lengths and cantilever reach". A number of other rig managers, including Seadrill and Transocean, have also indicated that what demand improvement they have seen for jack-ups, has been focused on the high-end of the market. Indeed, dayrates for these units have remained comparatively robust, but the recent and future influx of comparable assets to the market is likely to postpone any significant upturn.

As we move into deeper waters the market has also performed well with buoyant charter and utilisation rates through 2009. However, this apparent strength may be perceived as superficial because floaters are associated with long term contracts and extended lead times between deployments. In addition, many of these units remain on legacy contracts signed during the peak cycle. Therefore, in theory, we could see a delayed reaction from the deepwater market with utilisation rates deteriorating as assets complete their current contracts without renewing. Indeed, during 2011 a number of currently chartered ultra-deepwater (7,500ft +) rigs will become available, as shown in figure 2 below. Combined with an expanding fleet size this could increase competition and negatively impact dayrates.



Figure 2: Ultra-deepwater floaters (7,500 ft +) coming off contract (ISL RigGateway)

Over the last twelve months there have been relatively few new charters in the ultra-deepwater market due to limited short-term supply and operator conservatism in the wake of the downturn. However, recent fixtures such as ExxonMobil's charter of Transocean's Deepwater Campion at a dayrate of US\$645k and Diamond's three new contracts with Petrobras offshore Brazil, worth a combined total of US\$1.4bn, suggest that a delayed full scale downturn is unlikely. Another sign of apparent strength in the deepwater sector is Rowan Companies' interest in gaining a foothold within the market. Rowan is currently assessing its entry options, but has no intention of building any rigs on speculation.

### **Construction Outlook**

Despite unbridled construction over the past five years tendering activity for newbuild assets persists, albeit at levels that pale in significance to peak cycle figures. At around US\$20bn 2010 is expected to herald the greatest Capex (by year of delivery) in the newbuild floaters market. Moving forward from 2010 Capex decreases progressively through to 2013, though new orders expected in the near term will go some way to flatten the downward curve.

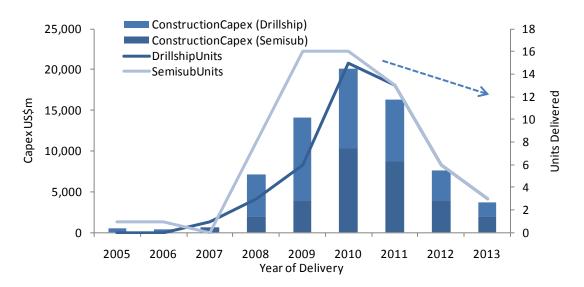


Figure 3: Current Floating Rig Capex by Year of Delivery (ISL RigGateway)

Much of the interest in current construction programmes revolves around Petrobras' long awaited tender for twenty-eight Brazilian built rigs. The first package on offer will consist of seven drillships plus two other deepwater floaters which are to be owned by Petrobras and built on an EPC basis in Brazil under the nation's increasingly stringent local content policy. The second package will consist of charter contracts for nineteen deepwater floaters with each rig operator limited to a maximum of four units. Petrobras expects to take delivery of these units between 2014 and 2017. However, the tender for the first package has been postponed and is not now due until May 18<sup>th</sup>.

## **Summary**

In a relatively short period of just five years the drilling market has been through a complete turnaround. The scarcity of available assets first visible in 2006 has now been replaced by over-supply in many sectors. The downturn has been most readily apparent in the shallow water market, where shorter charter periods and the prevalence of debt financing for drilling activity has negatively impacted 2009 performance. The deepwater sector has also been adversely affected, but has appeared more resilient. However, uncertain times remain within this market as newbuilds and currently contracted assets become available over the next two years. That said, the fundamental drivers for E&A activity remain firmly in place and greater activity on the back of strengthening oil prices, robust energy demand and increased liquidity in the capital markets should help the drilling markets rebound positively over the next twenty-four months.