

Energy/Oil & Gas  
Global  
Special Report

# Oil & Gas 2010 Outlook

## Exposure to Deflation Remains High

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### Table of Contents

Overview.....	1
Global Rating Outlooks .....	2
Sector Summaries .....	3
Key Drivers to the 2010 Outlook ...	5
Fitch Price Deck .....	8
Sector Outlooks	
North America Integrateds .....	8
European Integrateds .....	9
Russian Integrateds .....	10
Latin America Integrateds .....	10
North America Independent E&P ...	11
Drilling and Services.....	12
Downstream .....	13

### Outlook Summary

This report summarizes Fitch Ratings' 2010 outlook for the Oil & Gas sector, which includes the underlying assumptions that global economies experience weak, but positive growth during 2010 without experiencing a second downward leg to the recession (a "double-dip"). As a result, inflationary expectations, combined with the significant amounts of liquidity being injected to global financial markets, are expected to keep crude prices above the price levels justified by the underlying supply/demand fundamentals. This should result in improvements to underlying cash flows and credit profiles for upstream, oil-focused companies. These assumptions are discussed further in Fitch's revised price deck for 2010 and beyond on page 8 of the report.

In addition to the revised price deck assumptions, Fitch outlines key expectations for credit quality in each of the sectors falling under the broad energy title (integrated companies, independent upstream, drilling and services, and the downstream). Key drivers to the outlook are discussed as well as a review of the current liquidity profiles for Fitch-rated energy companies.

Following the multi-year run-up in energy prices, the decline in commodity prices and industry activity levels in 2009 has resulted in credit profiles being substantially weaker as we head into 2010 than in years past. Despite this pullback, Fitch continues to maintain a stable outlook for the energy sector as a whole heading into 2010. As noted previously, the rally in crude oil prices from the lows experienced during the first quarter of 2009 continues to provide considerable support to industry activity levels and financial profiles. While the current run in crude prices does not appear to be based solely on fundamental factors, Fitch expects the monetary easing and speculation of increased inflationary forces to continue to keep oil prices higher in 2010. Both integrated and upstream companies with exposure to oil prices should benefit as a result, consistent with the stable outlook for the industry. Fitch's outlook for the European/Middle East/Africa (EMEA) and Latin American oil & gas industry remains stable for 2010, as firms located in these areas tend to benefit from higher oil prices and improved access to capital markets.

Fitch's stable outlook is not uniform across all sectors and credits within the oil & gas industry. While offshore drillers with sizable contract backlogs continue to benefit from the long-term contracts signed when industry activity levels boomed, the drilling and services sector is witnessing a significant pullback in credit profiles as pricing and utilization rates fall substantially. During 2010, continued moderation in credit profiles for firms in this sector is expected, with smaller, less-diversified companies experiencing the most stress. In addition, refiners remain the most exposed to the downturn as fuel sales and refinery utilization rates continue to slump in response to sinking global demand. Upstream companies with significant U.S. natural gas price exposure also remain susceptible to a second year of weak natural gas prices. An important caveat relates to those firms who have taken advantage of the steep contango pricing in the natural gas futures market by putting on significant hedge positions; as they will help these firms weather the storm in 2010. Fundamentals for the U.S. natural gas market remain exceedingly weak heading into the year and are not

## Related Research

- *Pipeline/Midstream/MLP 2010 Outlook*, Dec. 3, 2009
- *Turning up the Heat: Implications of GHG Legislation on Energy and Related Sectors*, Nov. 3, 2009
- *Global Economic Outlook*, Oct. 1, 2009
- *Con(Tango) & Cash*, Sept. 30, 2009
- *Oil & Gas Insights*, July 30, 2009
- *Depressed Mid-Term Outlook for Global Refining*, July 16, 2009
- *Covenant Considerations and Upstream M&A*, June 23, 2009
- *Collapse in Crude Oil Spreads: Implications for Refiners*, March 20, 2009
- *Lower Oil Prices to Pressure Debt/Reserve Metrics in 2009*, Jan. 12, 2009
- *Oil & Gas Sector Exploration and Production Rating Methodology*, Oct. 16, 2008

expected to materially improve in 2010 or 2011 without the benefit of extreme weather conditions.

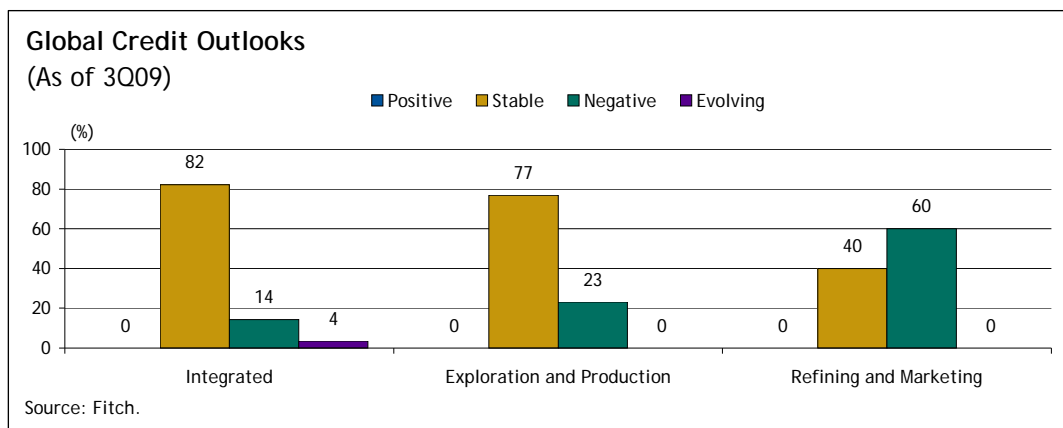
Liquidity remains adequate for most issuers that Fitch rates, although we would note the increased announcements of asset sales across the upstream sector to help fill capital spending shortfalls. Fitch believes M&A event risk for bondholders is elevated across the sector, as deals are often completed during weak market conditions. However, high futures prices and the ability of producers to lock in related cash flows may limit deals for now by creating a lifeline for producers and keeping prices above the distress levels many buyers had anticipated would be available in the market.

Consistent with past practices, Fitch's stable outlook continues to rate entities in the sector "through the cycle." Rating upgrades were limited in the past up-cycle to companies making sustained and substantial commitments toward more conservative financial and operating profiles. Likewise, rating downgrades will predominantly be on a company-specific basis, although market conditions could ultimately be so weak, as is currently seen in the refining sector, that most if not all of the issuers in the sector are susceptible to the same downward rating pressures. It is important to note that many issuers are entering the current downturn from a position of strength, as they had taken advantage of the robust industry market conditions and unfettered access to banking and capital markets through mid-year 2008 to protect their liquidity by extending maturities and increasing revolver availability. Significant amounts of operational and financial flexibility still remain for most issuers, although Fitch would note that most companies have already exercised flexibility to manage through the weak market conditions during 2009. As a result, a second wave of weaker market dynamics in 2010 would be expected to result in more significant credit implications for the sector.

Fitch's outlook includes the assumption that commodity prices remain near current levels (see the revised price deck on page 8), which represent a dramatic pull-back from the levels witnessed during 2008. Fitch will continue to maintain its cash flow focus on companies in the sector. Many companies have already announced significant revisions in discretionary capex to reflect a lower commodity price environment going forward. Fitch anticipates additional adjustments by companies if lower prices develop in 2010. Lower commodity prices have also lead to lower drilling and service costs for upstream producers, although the lag between lower commodity prices and decreased service costs would point to reduced future benefits as many cost resets have already been realized. Given the sharp current premium associated with liquidity, companies are expected to continue to shift their focus away from growth-oriented objectives toward maintaining strong balance sheets during 2010. Fitch anticipates that FCF will improve moderately due to the impact of lower capex budgets, cost resets, and stable to higher commodities pricing.

## Global Rating Outlooks

In response to the global economic recession and subsequent material impacts to the credit profiles of some issuers, Fitch has taken a number of rating actions over the course of 2009, some of them negative. Fitch also communicates its credit views and current expectations for the progression of credit ratings through rating outlooks. The chart on page 3 highlights Fitch's global credit rating outlooks, which are an indication of likely credit rating evolution over the next 12–18 months, for the oil & gas sector as of the end of third quarter 2009. As demonstrated in the chart, a full 82% of the integrated oil & gas names rated by Fitch have a Stable Outlook, while 77% of pure exploration and production (E&P) companies have a Stable Outlook. By contrast, 60% of companies operating in the refining and marketing segment are either on Rating Watch Negative or have a Negative Outlook. This is largely, but not entirely, due to the negative factors affecting the sector which are considered to represent a "super-cyclical" downturn.



## Sector Summaries

### Integrated Oil

Credit quality for the large, integrated oil companies remains robust as these firms benefit from oil-heavy upstream portfolios, sizable cash balances, and still low net debt levels. Across all the sectors in the energy space, integrated oil has generally been the least impacted by volatile commodity prices, due to its high credit quality, significant headroom to absorb incremental leverage, and willingness to take a longer, “through the cycle” view on reinvesting in the space. Looking forward, Fitch anticipates relatively little change in credit quality for the group as a whole, although metrics may dip further under a stress price scenario as realizations fall but capital expenditures remain “sticky.” The decoupling of oil and natural gas spot pricing has strongly benefited the integrated firms in the current downturn but has also left cash flows reliant on the continued strength of oil prices. It is important to note that while this group continues to have exposure to natural gas prices, their gas portfolios are global in nature and in many cases benefit from oil-linked pricing mechanisms. Should asset sales heat up, this group is expected to be the acquirers, although past practices would indicate that equity financing is the preferred choice for sizable acquisitions/mergers, as was recently demonstrated by the share-based acquisition of XTO by ExxonMobil. Additional details on the European, Russian, and Latin American integrated companies are provided below.

### Independent E&P

Credit quality for independent E&P companies during 2010 is expected to remain below the highs of the recent past and should stabilize at 2009 levels. U.S. firms as a group tend to have higher exposure to U.S. natural gas prices, which Fitch anticipates will remain under considerable pressure during the year as supply/demand fundamentals remain unfavorable. That said, U.S. E&P companies should benefit from contango market conditions for natural gas futures prices (and the resulting hedging benefits presented to them in 2009), higher oil prices, lower drilling and service costs, and a more responsive capital budget program as many of the long lead-time contracts entered into during the robust market conditions of the past expire. In addition, better capital market conditions during 2009 have enabled many of these firms to increase liquidity and extend debt maturities. Asset sales should continue to benefit the sector as many small and large independent E&P companies have announced planned asset sales, which when combined with improved capital markets conditions should enable them to execute on these announcements. Most firms are expected to continue to live within internally generated cash flows, and as a result, reserve and production growth levels should remain well below levels seen since 2004.

### Drilling and Service Companies

The outlook for the drilling and service sectors remains weak for 2010. Credit quality is supported by sizable revenue backlogs and higher oil prices, resulting in increased oil-related drilling. While drilling activity related to onshore shale plays is expected to show continued modest improvements in 2010, drilling on conventional natural gas plays is expected to remain very weak. International drilling activity could see a modest increase in activity relative to 2009 levels as higher oil prices drive increased drilling activity levels. Despite these positives, pricing is expected to remain weak as capacity utilization levels continue to reflect significant excess capacity in nearly all markets. As older contracts expire, pricing on new contracts (excluding those signed prior to 2009) is expected to be down significantly.

As a result, Fitch continues to expect credit quality to deteriorate in 2010 due primarily to amortization of contract backlogs, weak natural gas prices, and the potential for weaker oil prices, weak pricing power (including expectations of falling prices for certain asset classes/geographic locales), and reduced utilization levels for fleets. Fitch would expect modest offsets due to lower costs stemming from reduced wage expectations, cold-stacking of equipment, and benefits from any restructuring activities to reduce overhead expenses. It is important to note that cold-stacking activity will not result in immediate cost reductions, and therefore will likely result in higher costs on a per-rig day basis. Additionally, drillers with active newbuild programs are likely to see increased costs associated with training crews prior to newbuilds beginning work.

Deepwater drilling rigs are expected to weather the current pull-back in commodity prices better than the other classes of rigs during the next 12–18 months; however, the longer-term outlook for these rigs could weaken due to the large number of uncontracted newbuild semis and drillships that will come to market beginning in 2011. The long-term outlook for oil prices will be a key determining factor of both utilization and dayrates for the deepwater market as we approach the delivery of these uncontracted deepwater rigs.

The market for jackup and mid-water floating vessels has already weakened substantially and is not expected to materially improve during 2010. In fact, further weakness in the form of lower utilization rates and weaker dayrates could materialize as additional uncontracted newbuilds come to market. While falling dayrates and improved economic and capital market conditions could ultimately support improved market conditions, Fitch expects the downward trend to continue throughout 2010 with potential upside beginning in 2011.

### Downstream

The outlook for refiners remains weak in 2010. While key credit metrics are expected to improve, falling end-user demand, global overcapacity, and low utilization rates are expected to keep credit quality weak and under pressure. Fitch anticipates that sector credit metrics may bottom out at levels worse than those seen during the last industry downturn (2002) and could remain depressed for an extended period, given rising unemployment in many of the developed economies and the potential for a slow economic recovery. Event risk is elevated for the sector given the attraction of once-in-a-cycle or “super cyclical” lows in refinery valuations for buyers and Fitch’s expectation that higher quality refineries will also come on to the market over the next few years. Event risk is also heightened by the incentives for the downstream sector to transition to a more emissions-friendly fuels portfolio given increasing environmental and fuels regulation, including rising biofuel requirements (36 billion gpy by 2022), and the likelihood of pending greenhouse gas (GHG) regulation, either by Act of Congress or EPA regulation. While refiners as a group have responded vigorously and early to the

downturn by paring back operating cost and shareholder distributions and eliminating non-critical capex, there may be relatively little left to cut in the system at this point in the event of another leg down in demand or further erosion in industry fundamentals.

## Key Drivers to the 2010 Outlook

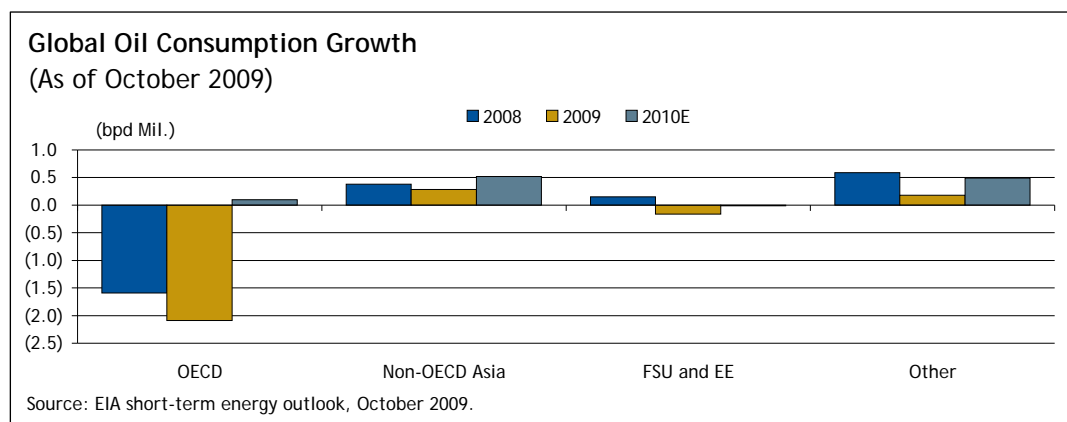
### Global Macroeconomic Environment — Risks of Double-Dip Recession

On Oct. 1, 2009, Fitch released its most recent Global Economic Outlook, detailing expectations for the full-year 2009 and 2010. Fitch now expects most major economies to record positive growth during the second half of 2009 and into 2010. Fitch's forecasts for GDP in the major advanced economies (MAEs, including the U.S., Euro area, U.K., and Japan) now are expected to show a smaller decline in 2009 as a whole at 3.7% with growth in the MAEs in 2010 now projected at 1.2%. Growth in the BRIC economies (Brazil, Russia, China, and India) is projected to grow 3.7% in 2009 and 6.5% in 2010, driving global growth to 2.0% in 2010 from a decline of 2.8% in 2009. Near-term increases in business activity are being driven by the inventory cycle, policy stimulus, and improved financial conditions.

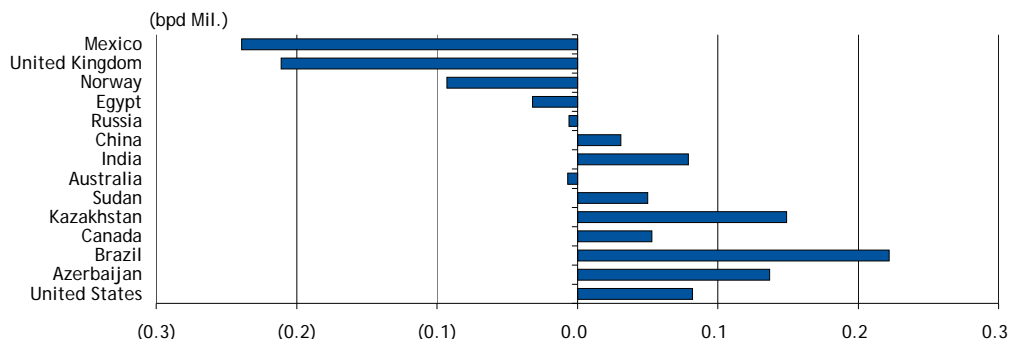
It is important to note that Fitch expects the pace of expansion to remain weak by the standards of previous recoveries and fragile to shocks. This fragility stems from the continued private-sector deleveraging process and the tight lending conditions as banks continue to repair their balance sheets. While the pace of job losses has eased from the steep declines experienced in the early part of 2009, hiring activity remains muted.

While the pace of growth in 2010 is expected to lag previous recoveries, Fitch does not consider the recent increases in activity to lead to faltering growth during the year as the full impact of fiscal policies stretches well into 2010. Greater uncertainty pertains to 2011 when monetary and fiscal stimulus policies are expected to be tightened. As a result, interest rate policies are expected to remain accommodative in 2010 with actions to reign in liquidity beginning in 2011 when global interest rates are projected to rise to 1.01%. Inflation expectations are expected to remain muted as well (0.8% in 2010 and 0.6% in 2011) as policymakers are expected to successfully balance the trade-offs between currency stability and full employment.

A return to positive global growth rates, when combined with the reduced upstream capital expenditures during 2009, could ultimately lead to tighter supply/demand fundamentals. As evidenced by the Fitch price deck, we do not anticipate this tightening to result in a return of \$100-plus oil. Increased political stability in Iraq, combined with increased activity in the Iraqi upstream sector, is expected to result in the return of one of OPEC's largest members. In addition, other long-term supply

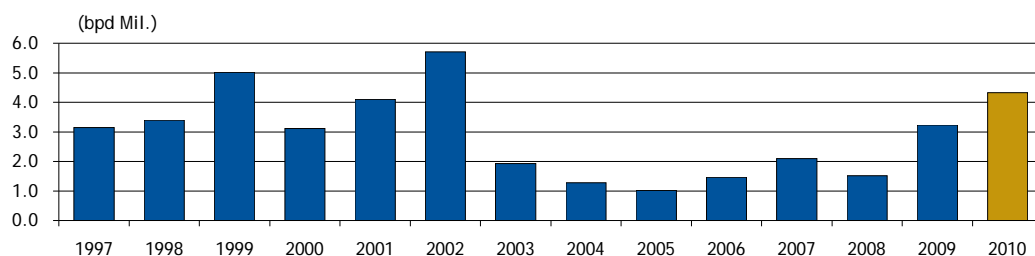


### 2010 Non-OPEC Production Growth (As of October 2009)



Source: EIA short-term energy outlook, October 2009.

### OPEC Spare Production Capacity (As of October 2009)



Source: EIA short-term energy outlook, October 2009.

increases stemming from Brazil and the Canadian Oil Sands are currently expected to keep supply on pace with demand increases.

### Commodity Prices Diverge

The divergence in oil/natural gas prices is expected to persist in 2010, as implied by our price deck. Commodity prices fell dramatically during the second half of 2008 and into early 2009 as global economic conditions deteriorated. As most major governments around the world responded with large monetary and fiscal stimulus measures, the focus has shifted to concerns around continued deterioration of the U.S. dollar and the potential for rapid global inflation. As a result, most asset classes have responded with significant increases from their early 2009 lows. Gold and oil prices have led the increases, with oil rallying from \$33.98/bbl to the \$70–\$80/bbl range. U.S. natural gas prices have not benefited from the same inflationary concerns as natural gas remains a regional commodity subject to supply/demand fundamentals in the North American market. U.S. natural gas prices have seen dramatic multi-year increases in supply as engineers finally unlocked the key to accessing the vast onshore shale resources at economic prices. Additionally, demand has fallen dramatically due to the economic downturn, combined with a lack of weather-induced demand and a relatively quiet hurricane season in the U.S. Gulf of Mexico.

As a result, oil-to-natural gas price ratios have widened to historically wide levels in favor of oil. While oil prices could move significantly lower if sentiment shifts from inflationary/growth concerns toward deflationary/double-dip recessionary concerns, we



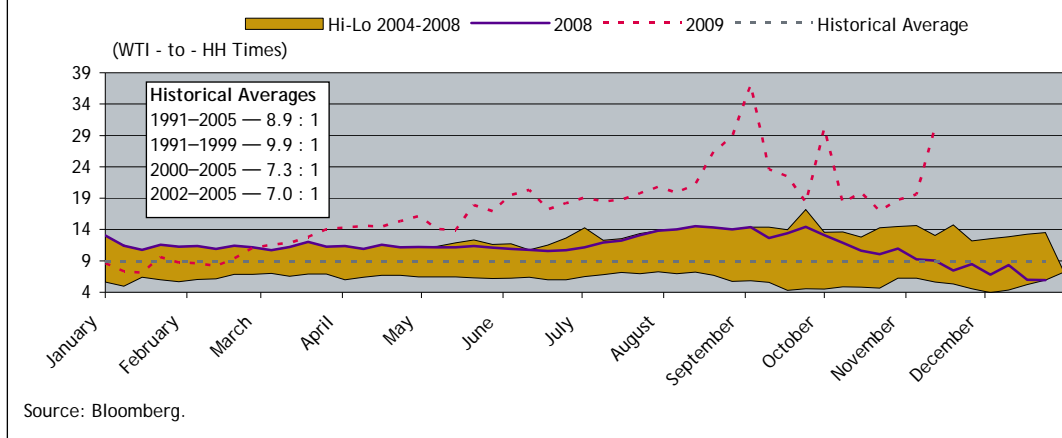
## Summary of Historical Commodity Prices

	Oil Prices — WTI (\$/Bbl)			Natural Gas Prices — Henry Hub (\$/Mcf)		
	Avg. Price	Max. Price	Min. Price	Avg. Price	Max. Price	Min. Price
1997	20.58	26.62	17.60	2.48	4.60	1.79
1998	14.38	17.82	10.76	2.08	2.64	1.03
1999	19.30	27.92	11.37	2.27	3.08	1.65
2000	30.37	37.21	23.90	4.30	10.50	2.14
2001	25.96	32.19	17.45	3.96	10.20	1.74
2002	26.17	32.72	17.97	3.37	5.29	1.98
2003	31.06	37.83	25.24	5.49	19.38	3.99
2004	41.51	56.17	32.48	5.90	8.14	4.40
2005	56.59	69.81	42.12	8.89	15.39	5.50
2006	66.09	77.03	55.81	6.73	9.87	3.63
2007	72.23	98.88	50.48	6.97	9.07	5.29
2008	99.92	145.29	31.41	8.89	13.31	5.38
2009 (YTD)	61.29	81.04	33.98	3.84	6.11	1.88

Source: Bloomberg.

think oil will continue to trade at a premium to U.S. natural gas during 2010 as the outlook for natural gas is much more pessimistic in our view. Fitch's 2010 base case price deck assumes this ratio will remain at elevated levels (17.5x) before moving to more historical levels (9x–10x), as represented in our long-term price deck. Our 2010 stress case price deck reflects oil prices falling more dramatically than natural gas prices due to the disappearance of the current inflation premium in oil prices. The oil-natural gas price ratio falls to 14.3x in our stress case deck for 2010 before moving to historical levels (9x–10x) in the long-term stress case price deck.

### Ratio of WTI to U.S. Natural Gas Prices (Henry Hub)



In both cases, upstream companies are expected to benefit from lower drilling and service costs. North American drilling and service costs were quick to respond to reduced upstream activity, and are not currently expected to see material decreases in 2010. Nonetheless, upstream companies operating in these markets should benefit from a full year of lower costs in addition to continued contract resets at the lower, current market prices. International drilling and service costs have been slower to reset due to the longer-term contract nature of most international markets. As a result, these costs are expected to continue moving lower during the first half of 2010 before stabilizing in the second half of the year.

## Revised Price Deck

Fitch has revised its price deck in response to expectations of modest economic growth in 2010. Fitch's 2010 base case price deck is \$70/barrel (bbl) for crude oil (NYMEX-West Texas Intermediate [WTI]) and \$4.00/thousand cubic feet (Mcf) for natural gas (U.S. Henry Hub), up from \$57.50/bbl for crude oil and down from \$5.00/mcf for natural gas. The increase in prices for crude oil represent expectations of stable demand, combined with continued non-fundamental expectations of a weak U.S. dollar and concerns of global inflation. The revision to our U.S. natural gas price deck represents continued supply/demand imbalances stemming from rising supply from U.S. shale plays and increased LNG liquefaction capacity. While improved economic conditions should support demand for the commodity, Fitch does not currently expect demand increases to materially tighten enough to support prices during 2010.

Fitch's stress case price deck for 2010 is \$50/bbl for crude oil and \$3.50/Mcf natural gas, representing reduced inflationary concerns and the potential for a "double-dip" global recession. As noted previously, oil is expected to continue trading at a premium to U.S. natural gas in 2010 and 2011 relative to historical levels as non-U.S. growth, led by the BRIC countries, supports tighter supply/demand fundamentals for oil.

While Fitch's price deck is used primarily for modeling and rating purposes (and is therefore intended to have a more conservative slant), it also represents our belief that prices will ultimately revert to levels driven by long-term fundamentals. These price levels are represented in the table above in the column identified as "long-term."

## Fitch Price Deck

	2010	2011	Long-Term
<b>Base Case</b>			
Oil (\$/Bbl)	70.00	65.00	60.00
Natural Gas (\$/Mcf)	4.00	4.75	6.00
<b>Stress Case</b>			
Oil (\$/Bbl)	50.00	47.50	45.00
Natural Gas (\$/Mcf)	3.50	3.75	4.50
Bbl – Barrel. Source: Fitch.			

## Sector Outlooks

### North America Integrateds

Fitch anticipates that the credit quality of larger integrated oil companies will remain relatively strong in 2010 given the subsector's heavy exposure to crude oil (or in the case of LNG export facilities, oil-linked pricing mechanisms) and the significant headroom within existing ratings to add incremental leverage. Major integrated oil companies are well positioned to weather further commodity price volatility given their large cash balances, strong FCF generation, and low net debt levels. In contrast to lower-rated E&P independents, highly rated supermajors generally do not rely on external bank facility credit to fund growth, but instead use internal funding and CP programs.

The integrated business model has traditionally benefited from asset diversification across the upstream, midstream, and downstream segments. However, this diversification has provided less of a benefit in the current downturn as margins and volumes for refining and chemicals have been sharply squeezed over the last several quarters. As a result, integrateds' organic cash flows are heavily reliant on the strength of oil pricing in the current period. As stated previously, Fitch believes that current \$70–\$80/barrel spot crude oil price is not driven solely by supply/demand fundamentals but rather is linked to demand for crude oil as a financial instrument to hedge against inflation and/or a collapse in the dollar. As a result, if oil pricing were to revert to fundamentals pricing, the organic cash generation of the integrateds as a group would be impacted more severely than other subsectors in the energy space.



Event risk has not been a major credit issue for integrateds as a whole in 2009. Despite the sharp drops in oil and gas prices seen earlier this year, distressed buying opportunities appear to have been limited in 2009 by a combination of supportive bank groups, smaller-than-expected reductions in borrowing bases, and relatively high futures market prices, allowing for increased hedging by producers at relatively strong levels. While event risk may be somewhat higher for bondholders in the current period, we generally expect any significant transactions in the sector will be conservatively financed.

Asset sales have played a significant role in enhancing credit protections for lower-rated entities in the integrateds peer group in the current downturn. Marathon Oil ('BBB+' /Stable Outlook) has had cumulative announced sales to date of \$3.2 billion, including a 20% stake in Block 32 in offshore Angola for \$1.2 billion, with proceeds primarily intended to fill in gaps in capex funding. ConocoPhillips ('A' /Stable) recently announced a \$10 billion asset disposition program over the 2010–2011 time frame, with proceeds marked for debt repayment. Fitch believes that ConocoPhillips' shift to a returns-based focus is also likely to be credit-friendly over the long run by reducing the emphasis on acquisitions, which have historically been a source of event risk for bondholders.

### European Integrateds

The creditworthiness of European integrated oil majors is supported by their ability to generate positive FCF through the business cycle. As oil markets have been very robust over the past several years, these companies have enjoyed very favorable market conditions, which has been evident from record reported earnings in 2008. Median top-line revenue in 2008 was around USD293 billion for the four European Majors (Shell, BP, Total, ENI), with median cash flow from operations (CFO) of USD34.2 billion. This has meant that companies have been able to comfortably finance capex programs from internally generated cash flows, with a median CFO-to-capex ratio of 1.6x.

The year 2009 has not resulted in another set of record figures, as Brent crude prices average USD55–USD60 per barrel versus USD97 per barrel in 2008. Strong median credit measures in 2008 — such as CFO/net debt of 145%, adjusted net debt to EBITDAR of 0.7x, and FFO/net interest expense of 42.5x — imply credit stability, and have deteriorated only moderately in 2009. While industry conditions weakened somewhat in 2009, causing all the European majors to return to the bond markets to meet capex and dividend outflows, Fitch expects industry conditions to recover in 2010 or 2011. As this happens, Fitch anticipates the European majors will again be able to fund expenditures from internally generated cash flows.

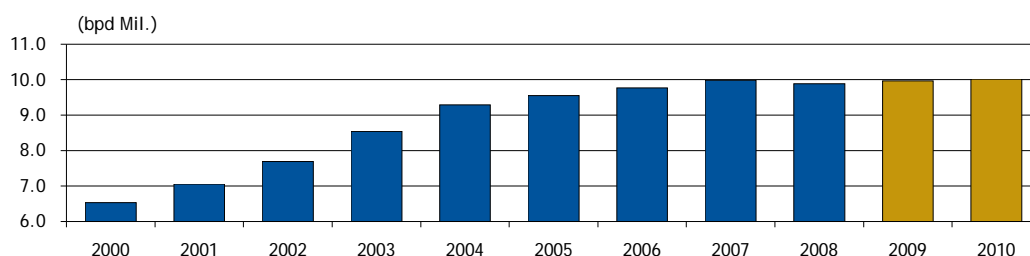
As oil price volatility has increased, companies have experienced more uncertainty with regards to their internally generated cash flow, which has implications for investment in new projects. All the European majors have publically stated their commitment to broadly maintain 2009 capex at 2008 levels in anticipation of a global economic recovery in 2010. This is especially important to BP's downstream segment, as management is working to restore refining availability and close the performance gap with its peers.

While all the European oil majors are expected to benefit from lower industry-wide operating costs in 2009 — as a result of supply chain deflationary pressure resulting from the global economic slowdown — Fitch anticipates this to benefit Shell the most, as it has historically experienced the highest per-barrel production cost. Additionally, Shell has stated in the middle of 2009 that it will reduce capex in 2010 as part of its cost-cutting strategy.

### Russian Integrateds

The Russian integrated oil sector remains relatively diversified through the presence of seven key producers, none of which currently accounts for more than 25% of total daily production. Despite the recent trend of increased state ownership over the past five years, Russia's oil sector still remains predominately private — with state-owned companies accounting for approximately 30% of total crude oil output. Russia's oil sector still faces significant challenges as the industry deals with a rapid slowdown in production growth. In 2008, average daily oil production declined by 0.7% compared with growth of around 10% five years earlier. Fitch expects this downward trend to abate in 2009, however, with average production increasing by 0.8%–1.0% (see the chart below) to reach 10 million bpd in 2010.

**Russian Crude Oil Production**  
(As of October 2009)



Source: BP statistical review of world energy 2009, Fitch estimates.

Other key challenges facing the industry in 2010 include reinstating the capex programs necessary to maintain existing reserve and production profiles. Russian oil companies scaled back capex programs in 2009 in the wake of declining oil prices. Although prices have rebounded from the low in first quarter 2009, companies have been slow to reinstate ambitious capital expenditures in areas such as exploration and development. Although some key projects were fulfilled in late 2008 and mid-2009, the ability to complete projects scheduled to begin production in 2013 and 2014 remains key to the industry's future prospects.

Supporting the sector is the high level of demonstrated commitment from the government in 2009, including revisions to the mineral extraction tax, shortened calculation period for export duties, and temporary direct lending via state-owned financial institutions. There is a risk that as the economic situation improves, the government could scale back concessions in 2010 to generate the funds needed to improve the country's federal budget deficit.

### Latin American Integrateds

The Latin American oil and gas sector is dominated by national oil companies (NOCs), so the higher hydrocarbon price environment expected in 2010 by Fitch not only increases FCF generation and improves credit metrics but also decreases the political intervention risk in the region. Companies are expected to resume their aggressive capex programs with oil price recovery, which could have a positive impact on future reserves and production prospects in Latin America. However, Fitch anticipates oil production in Mexico and Argentina will continue to decline, while it is expected to increase in Brazil and Colombia. Production in Venezuela will depend to a great extent on OPEC strategy and quota restrictions. Lower cost of capital and increased access to both the domestic and international debt markets bode well for the sector. Fitch

expects refining margins to largely remain positive in 2010 as governments try to offset negative margins in the past. Gasoline pricing policies set by governments in Latin America are aimed at following average international prices over the long term except in Venezuela and Argentina, where prices are highly subsidized.

Most oil and gas companies in Latin America are highly linked to the sovereign as the governments control the operations of most companies, dictate the energy policies that regulate them, and set pricing policies. As a result, the key risks for the stability of the ratings of oil and gas companies will continue to be the impact of the global recession on the Latin American sovereigns. Venezuela and Argentina might see macroeconomic imbalances and inflationary pressures that could result in rating actions in 2010, while the recent downgrade of Mexico to 'BBB' could have a negative impact on oil and gas companies in the country. Brazil, Chile, and Colombia are less vulnerable to the economic slowdown in 2009. Fitch expects GDP growth in Latin America to recover to 2.9% and 3.4% in 2010 and 2011, respectively, compared with an expected decline of 3.2% in 2009.

In 2009, a significant decline in hydrocarbon prices resulted in a deterioration of credit metrics over 2008 and a reduction in capital investments. Year to date (WTI) average oil prices were approximately USD60/barrel compared to USD100/barrel in 2008, while average (HH) natural gas prices were approximately USD4/Mcf and USD9/Mcf, respectively. As a result of oil prices declining approximately 40%, NOCs witnessed EBITDA declines of 30%–60%. Higher refining spreads and lower costs partially offset the drop in oil prices. Costs and liabilities denominated in domestic currencies decreased in USD terms due to currency devaluations across Latin America. Oil and gas companies in Argentina had more stable revenues due to a freeze in gas tariffs and as companies realized a maximum oil price of USD42/barrel due to the fiscal regime in the country. With record issuance in 2009, liquidity remains healthy for most companies. State-owned banks and China also supported the industry, in particular in Brazil, where Petrobras obtained a USD12.5 billion loan from BNDES and a USD10 billion loan from the China Development Bank.

### North American Independent E&P

In 2010, we expect credit quality to stabilize for independents as a group. Credit profiles have been supported by significant capital expenditure reductions in 2009 that have gradually resulted in a return to neutral/modestly positive FCF levels for the sector. As long-term contracts for drilling and services continue to reset at reduced pricing levels, independents should benefit from declining costs, resulting in better operating margins and lower capex for equivalent activity levels. In addition, stronger commodity prices in the futures market have resulted in increased hedging activity at attractive prices. This is expected to improve cash flow levels in 2010 and reduce earnings volatility for most companies should prices move dramatically lower during the year. Independents have also benefited from higher oil prices, although in contrast to the integrateds, their portfolios are typically more gas focused. Independents continue to have better organic investment opportunities, and as a result, Fitch expects them to continue to use cash flows for internal development and production-related projects as opposed to growth-oriented M&A or aggressive leasehold acquisition programs. Asset sales have also been announced by a number of independents, with most shifting focus to the onshore U.S. related properties. Improved capital markets, combined with strong balance sheets for the integrateds, support solid execution on announced asset sale plans. In most cases, proceeds are expected to be used for debt reduction and increased capital spending levels.

Liquidity remains adequate for most independents as they entered the current downturn with high levels of liquidity and improved capital markets conditions enabled

many firms to bolster liquidity during 2009. Most independents are expected to continue to live within internally generated cash flows during 2010, and as a result, reserve and production growth levels should remain well below levels seen since 2004.

### Drilling and Services

Fitch's outlook for the drilling and service sector remains weak in 2010; however, credit support from contract backlogs, strong oil prices, and contango futures market prices, reduced capital expenditures, and restructuring efforts should prevent a dramatic deterioration during the year. Drilling activity related to onshore shale plays is expected to show continued modest improvement in 2010; however, drilling on conventional natural gas plays is expected to remain very weak. International drilling activity could see a modest increase relative to 2009 levels as higher oil prices drive increased drilling activity levels. Despite these positives, pricing is expected to remain weak as capacity utilization levels continue to reflect significant excess capacity in nearly all markets. As older contracts expire, pricing on new contracts (excluding those signed prior to 2009) is expected to be down significantly. Company specifics related to the mix of contract backlog supported higher revenues during the year versus increased cold-stacking activity for rigs coming off contracts will dictate credit outlooks for specific companies in the sector. We would also note that the outlook varies significantly across the many subsectors which compose the sector.

Credit quality for deepwater drilling contractors is not expected to materially weaken during 2010 as cash flow support from their contract backlogs remains strong. In addition, deepwater drillers should continue delivering newbuilds at very robust dayrate contracts throughout 2010. In addition, higher oil prices support activity levels for deepwater vessels, combined with the continued growth efforts of integrated and national oil companies (NOCs). Offsetting factors for deepwater drillers relates to the potential for weaker oil prices and the potential for the large number of uncontracted deepwater vessels coming to market in 2011 and 2012 to drive dayrates down due to increased competition for deepwater drilling tenders.

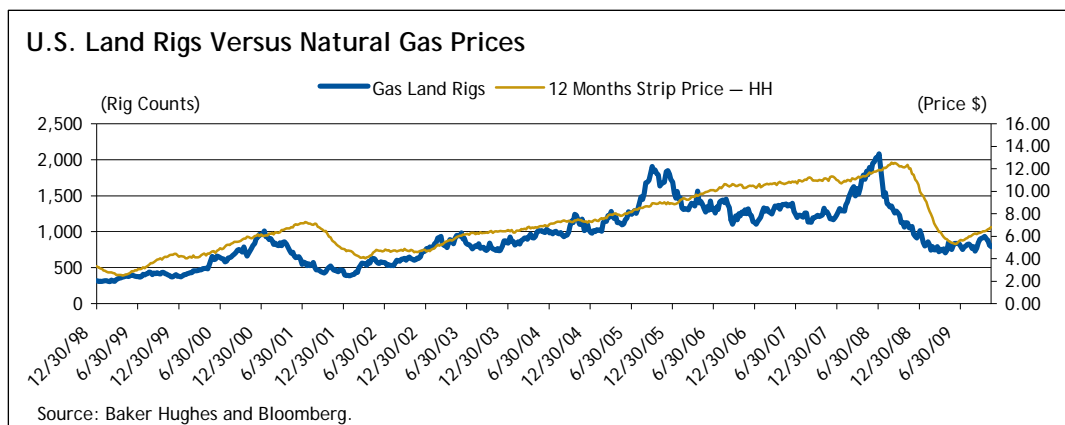
The shallow-water segment (jackups, platform rigs, and barge rigs) and mid-water segment (floaters in shallower waters) are both expected to see continued weakness in 2010. Weaker market conditions are expected to stem from continued deliveries of uncontracted jackup rigs, keeping supply in excess of demand. Mid-water markets should continue to weaken as capex budgets for independents remain constrained combined with the continued higher costs of operating in these plays. Additionally, shallow and mid-water rigs have less contract backlog protection than deepwater markets, forcing a repricing of dayrates to lower levels.

### Newbuilds by Year — Contract Status Statistics

Rig Type	Expected Delivery					Total	Est. Current Market Size	% of Market (%)	% of Newbuilds with Contracts (%)
	2009 <sup>a</sup>	2010	2011	2012	2013				
Jackup	6	28	16	7	—	57	452	13	12
Semisubmersible	1	17	12	6	—	36	185	19	64
Drillship	—	13	17	5	—	35	47	74	57
<b>Total Newbuilds</b>	<b>7</b>	<b>58</b>	<b>45</b>	<b>18</b>	<b>—</b>	<b>128</b>	<b>684</b>	<b>19</b>	<b>39</b>
% of Total Newbuilds Contracted (%)	14	47	33	39	N.A.	—	—	—	—
% of Jackups Contracted (%)	0	11	25	0	N.A.	—	—	—	—
% of Semisubmersibles Contracted (%)	100	82	42	50	N.A.	—	—	—	—
% of Drillships Contracted (%)	N.A.	77	35	80	N.A.	—	—	—	—

<sup>a</sup>Includes only December 2009. N.A. – Not applicable.

Source: ODS-Petrodata Group and Fitch estimates and analysis.



Land-based drilling, particularly in North America, is also expected to remain relatively muted in 2010 due to expectations of continued weak U.S. natural gas prices. While U.S. land-based drilling has seen some modest increases during the second half of 2009, Fitch does not expect to see a return to the rig count levels in 2007/2008. In addition, Fitch expects the U.S. land market will remain bifurcated in 2010 with newer rigs capable of drilling shale resources seeing modest increases in demand while older, commodity style rigs continue to experience weak pricing/utilization levels.

Service companies with a diversified set of products and services in addition to geographical diversification should continue to best weather the current downturn. While pricing and utilization levels remain weak in onshore, North American markets, these markets appear to be stabilizing as a result of modest improvements in shale and oil-focused drilling. Materially weaker U.S. natural gas prices could result in further weakness for this market. International pricing and utilization levels should continue to weaken throughout the first half of 2010 due to long-term contracts resetting at lower margins. That said, higher oil prices are expected to prevent a more dramatic weakening for service companies exposed to these markets. Should oil prices move significantly lower during the year, international activity could experience further downside.

Additional credit concerns relate to expectations of higher levels of M&A activity for both drilling and service companies. Many of the offshore drillers continue to bid on newbuilds coming to market, with Diamond Offshore being the most aggressive acquirer during 2009. We would expect most asset acquisitions to be financed with debt, as liquidity would likely be protected in anticipation of continued weak market conditions.

### Downstream

Refining continues to be the worst-performing subsector in energy, with an eroding supply/demand balance, low plant utilization, and rising competition from renewables all pressuring key credit protections. Currently, eight out of the 13 Fitch-rated refiners globally have Negative Outlooks. Importantly, all of Fitch's North American rated refiners have Negative Outlooks. The high fixed costs of the industry associated with low industry utilization have eroded unit economics sharply across the sector and led to significant restructurings by individual companies. Leverage to heavy and sour crude oil economics has been a particular weakness in the current downturn due to the compression in oil spreads, which has hurt the processing economics for cokers. As previously stated, event risk is also a concern for the industry as players seek to reposition themselves in response to increased environmental regulation and mandates which both limit growth in transport fuels (increased CAFE fuel standards, pending GHG emissions regulations) and push that growth outside the conventional refining system (increased biofuels requirements).

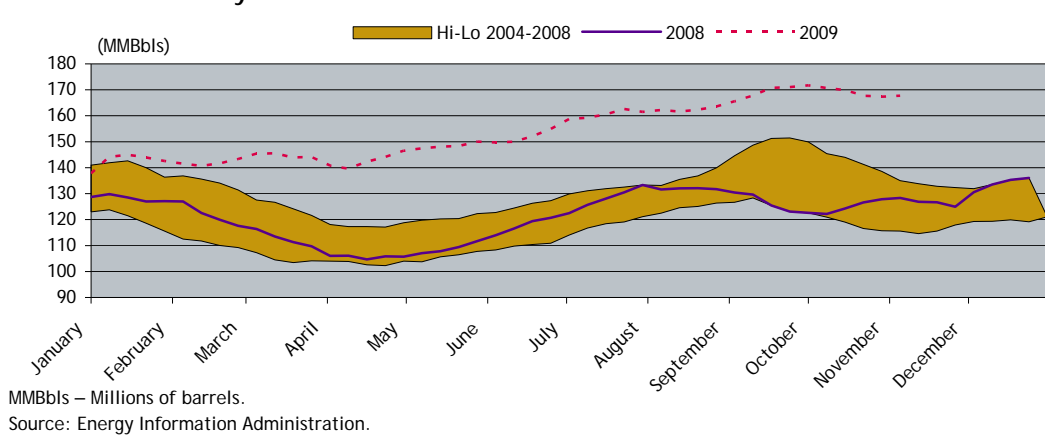
Credit metrics and FCF generation are generally expected to improve but remain weak in 2010. Given the high U.S. unemployment rate (10%) and possibility of an extended “jobless recovery,” Fitch anticipates that sector credit metrics may bottom out at levels worse than those seen during the last industry downturn (2002), and could remain depressed for an extended period. Risks to a scenario of gradual improvement include: a double-dip recession and continued rise in unemployment in North America; and additional increases in crude oil pricing, which are not linked to market fundamentals. Such a surge would further depress end-user demand for transport fuels and raise letters of credit demand requirements for crude oil cargoes.

Refining margins in Europe are expected to remain weak through 2010 on the back of a slow economic recovery that will continue to negatively impact the demand for transportation fuel. In the longer term, European markets continue to be long gasoline and short diesel, which has led some companies such as Repsol (‘BBB+’, Outlook Stable) and Total (‘AA’, Outlook Stable) to continue to invest in refining upgrades in order to increase middle distillate production. Once private sector demand for oil products begins to increase on the back of a sustained economic recovery, Fitch anticipates the demand for middle distillates in Europe to lead to an improvement in refining margins.

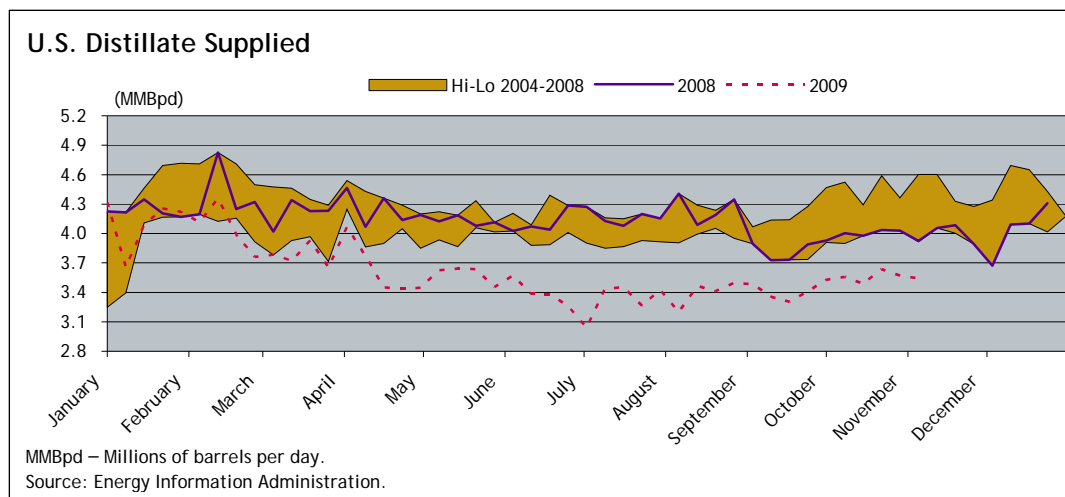
Meanwhile, Energy Information Administration (EIA) data show a YTD U.S. gasoline demand decline of -1.2% following a -2.2% decline last year, for a cumulative drop of 288,000 bpd. Refiners’ share of total gasoline demand may be declining at a faster rate than these numbers suggest, given the increasing percentage of ethanol produced outside the system. Demand declines were much steeper for distillates, with YTD drops of -9.4% in jet fuel and -12.7% overall distillates. At this point, total distillates still look extremely oversupplied relative to historical inventory trends, with total distillates of 167 million barrels versus a long run average of 125 million–135 million barrels. As a result of oversupply and ongoing demand weakness, Fitch anticipates that average refinery utilization may grind lower before gradually improving.

Event risk is another key concern for bondholders at this point in the cycle. Rising renewables requirements have led some refiners to begin to reposition their portfolios to be more renewables-friendly, including Valero’s acquisition of the VeraSun ethanol plants, and Sunoco’s acquisition of the 100 million gpy Northeast Biofuels plant. If a strict version of GHG regulation is implemented, renewable acquisitions may accelerate at a time of very weak organic cash generation, potentially pressuring balance sheets further. The same financing issues face those refiners interested in high-grading their conventional portfolios by buying up conventional refining capacity at once-in-a-cycle

**Distillate Inventory Levels**







lows. Given deeply depressed \$/barrel multiples, the prospect of significant proceeds from asset sales as a source of cash seems unlikely, as was highlighted by the fire sale price of Sunoco's 85,000 bpd Tulsa, OK refinery earlier this year and the recent closures of Sunoco's 150,000 bpd Eagle Point, NJ refinery and Valero's 210,000 bpd Delaware refinery.

Given their need to finance large working capital requirements, refiners have strong incentives to defend their credit ratings. To date, refiners as a group have responded vigorously to maintain their creditworthiness in the current downturn through capex cuts, workforce reductions, slashed distributions to shareholders, as well as the shutdown or idling of selective refineries. Following these moves, however, there may be relatively little left to cut as most refiners have already cut capex to minimum required levels and have squeezed operating costs out of their system. While the shutdown of additional less-efficient refineries further lower a company's operating structure, Fitch also anticipates it will result in higher debt/barrel of refining capacity metrics, as we would not anticipate a proportional amount of debt being retired following further shutdowns, all else equal.

The following is a list of Fitch-rated issuers and their current issuer default ratings (IDRs) in the U.S., EMEA and Latin American Oil & Gas sector.

*Upstream — Integrated*

- BG Energy Holdings Ltd ('A+', Outlook Stable).
- BP plc ('AA+', Outlook Stable).
- Chevron Corporation ('AA', Outlook Stable).
- China Petroleum & Chemical Corporation (Sinopec) ('A-', Outlook Stable).
- ConocoPhillips ('A', Outlook Stable).
- Ecopetrol S.A. ('BB+', Outlook Stable).
- Eni SpA ('AA-', Outlook Stable).
- ExxonMobil Corporation ('AAA', Outlook Stable).
- KazMunaiGaz National Company ('BBB-', Negative Outlook).
- Marathon Oil Corporation ('BBB+', Outlook Stable).

- NJSC Naftogaz of Ukraine ('CCC', Outlook Negative).
- OAO Gazprom ('BBB', Outlook Negative).
- OAO LUKoil ('BBB-', Outlook Stable).
- OAO Tatneft ('BB', Outlook Stable).
- OJSC OC Rosneft ('BBB-', Outlook Negative).
- OMV AG ('A-', Outlook Stable).
- PetroChina Company Limited ('A+', Outlook Stable).
- Petrobras Energia S.A. ('BB-', Outlook Stable).
- Petroleo Brasileiro S.A. ('BBB', Outlook Stable).
- Petroleos de Venezuela S.A. ('B+', Outlook Stable).
- Petroleos Mexicanos S.A. ('BBB', Outlook Stable).
- Petroliaam National Berhad (Petronas) ('A', Outlook Stable).
- PT Perusahaan Gas Negara Tbk. ('BB', Outlook Stable).
- Repsol YPF ('BBB+', Outlook Stable).
- Royal Dutch Shell plc ('AA+', Outlook Stable).
- TNK-BP International Ltd. ('BBB-', Outlook Stable).
- Total S.A. ('AA', Outlook Stable).
- YPF S.A. ('BB-', Outlook Stable).

#### *Upstream — Independents*

- Anadarko Petroleum Corp. ('BBB-', Outlook Stable).
- Apache Corporation ('A-', Outlook Stable).
- Chesapeake Energy Corp. ('BB', Outlook Negative).
- CNOOC Limited ('A', Outlook Stable).
- Devon Energy Corporation ('BBB+', Outlook Stable).
- Hess Corporation ('BBB', Outlook Stable).
- JSC KazMunaiGas Exploration Production ('BBB-', Outlook Negative).
- Newfield Exploration Company ('BB+', Outlook Stable).
- Occidental Petroleum Corp. ('A', Outlook Stable).
- Pacific Rubiales Energy Corp ('BB-', Outlook Stable).
- Pan America Energy LLC ('BB-', Outlook Stable).
- Pioneer Natural Resources Co. ('BB+', Outlook Stable).
- Tristan Oil Ltd. ('C', Watch Negative).
- Woodside Petroleum Ltd. ('BBB+', Outlook Stable).

#### *Oil Field Services*

- Aker Kvaerner ASA ('BBB-', Outlook Negative).
- Halliburton Company ('A-', Outlook Stable).

- Nabors Industries, Inc. ('BBB+', Outlook Stable).
- Noble Corporation ('A-', Outlook Stable).
- Oceanografia S.A. de C.V. ('CC', Watch Negative).
- Pride International Inc. ('BB+', Outlook Stable).
- Seacor Holdings, Inc. ('BBB-', Outlook Stable).
- Transocean Inc. ('BBB', Outlook Stable).

*Refining and Marketing*

- CITGO Petroleum Corp. ('BB-', Outlook Negative).
- Empresa Nacional de Petroleo (ENAP) ('A', Outlook Stable).
- Indian Oil Corporation Ltd. ('BBB-', Outlook Negative).
- Petrol AD ('CC', Outlook Negative).
- Petrol Ofisi A.S. ('BB-', Outlook Stable).
- Polski Koncern Naftowy ORLEN S.A. (PKN) ('BB+', Watch Negative).
- Reliance Industries Ltd. ('BBB-', Outlook Stable).
- Rompetrol Group N.V. (The) ('B+', Outlook Stable).
- SK Energy Co., Ltd. ('BBB', Outlook Negative).
- Sunoco, Inc. ('BBB', Outlook Negative).
- Tesoro Corporation ('BB+', Outlook Negative).
- Turkiye Petrol Rafinerileri A.S. (TUPRAS) ('BBB-', Outlook Stable).
- Valero Energy Corporation ('BBB', Outlook Negative).

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