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Will new PM reform Kuwait's energy programme?

Years of political infighting have stalled plans to increase non-associated gas production in Kuwait. (Wikicommons)

Leigh Elston

KUWAIT'S emir appointed a new prime minister on Wednesday in the latest attempt to diffuse a mounting political crisis. Tens of thousands of Kuwaitis took to the streets on Monday demanding the resignation of former premier Sheikh Nasser al-Mohammad al-Sabah and calling for the dissolution of a government accused of corruption and incompetency.

Years of political infighting have stalled crucial plans to increase non-associated gas production in Kuwait and, faced with an imminent power shortage, the Kuwait Oil Company (KOC) has been forced to quadruple LNG imports over the last two years to meet demand.

Around 90% of the country's gas output is still associated gas and, as Kuwait is an OPEC member, further associated gas growth is hampered by the group's oil production quotas. While the state has "managed to boost associated gas production by upgrading the gathering and processing infrastructure," Chris Graham, an analyst in Middle East energy research at Wood Mackenzie told *Interfax*. "Kuwait is still facing a pretty substantial gas shortfall."

Five years ago KOC announced, amid much fanfare, a three-phase plan to develop the Jurassic gas field in the north of the country. The company hoped, despite the huge technical challenges of the ultra-deep and sour gas field, to bring gas production up to 1 billion cubic feet per day (28.3 million cubic metres per day) by 2015 or 2016.

The incentives to overcome the technical challenges of the field are huge. At the moment around 70% of electricity in Kuwait is generated by burning crude oil. The electricity, which costs around 50 fils per kWh ($0.18/kWh) to produce, is then provided to consumers for 2 fils per kilowatt hour ($0.007/kWh), Jim Krane, energy researcher at Cambridge University's Judge Business School, told *Interfax*. Driven by cheap prices, demand for power is rising exponentially and Kuwait is squandering prized oil reserves on residential air-conditioning. Domestic gas prices are similarly suppressed, with gas sales into the domestic market averaging around $1 per million Btu.

"Subsidy and consumption issues aside, this is an extremely uneconomic use of oil. The opportunity cost is enormous, as are the associated emissions of carbon dioxide. In the longer term, the rate of increase in oil consumption in Kuwait is unsustainable. By consuming so much of its primary export, Kuwait is cannibalising the basis of its economy," Krane added.

Raising gas and electricity prices to curb demand is naturally extremely unpopular. In fact, with the current wave of unrest sweeping through the Arab world, "we've seen the exact opposite," Kristian Coates Ulrichsen, deputy director of the Kuwait Programme at the London School of Economics, told *Interfax*. "Instead of moving towards more competitive price mechanisms, governments throughout the Gulf have reacted in the exact opposite way; they've increased hand-outs and increased the incentives for the governments to do what they've always done, which is to buy off potential discontent." As far back as January, prior to the protests in Egypt, the emir gave Kuwaiti citizens 1,000 dinars each and free food supplies, but this has failed to appease protestors in the long term.

"The whole trajectory of protests in the Middle East shows that governments throughout the area, especially in the Gulf, are reverting to more unproductive payoffs to sectors » 7

Inside Natural Gas Daily

EDITORIAL | ANDREAS WALSTAD

REMIT throws lifeline to gas markets

Stricter regulation to combat price manipulation in European gas and power markets would not have been tabled if wholesale markets were trustworthy and functioning as they should, writes Andreas Walstad

IN September this year, the European Parliament adopted a much-debated regulation on energy market integrity and transparency (REMIT) which aims to ban speculative trading on the back of insider information. REMIT is the first energy-specific EU legislation on market abuse, and is expected to come into force by the end of next year. Under the new legislation, gas producers will be obliged to tell the market when they switch off gas fields for maintenance, for instance, as such events can have a huge impact on price movements in wholesale markets.

"Market participants shall publicly disclose inside information in respect of business or facilities, which the participant concerned owns or controls or for which the participant is responsible for operational matters, either in whole or in part. Such information shall include information relevant to the capacity of facilities for production, storage, consumption or transmission of electricity or natural gas," says the REMIT document published on the European Commission's website.

Public disclosure of outages relating to gas fields and power plants is a welcome, albeit radical, measure. However, it also raises a string of practical questions: where will the information be published, and in what format: aggregate or ex-ante? In short, the implementation of REMIT is likely to be both time consuming and costly for the stakeholders involved, and the methodology needs careful consideration.

But REMIT would never have been tabled by the Commission unless market manipulation was a significant problem in wholesale power and gas. As any economist will tell us, a well-functioning market requires multiple buyers and sellers, free flow of information and low barriers to entry. Moreover, the participants involved must be price takers, not price setters.

It is therefore worrying that few, if any, of Europe's gas and power markets meet these requirements. In most cases, incumbent producers enjoy dominant market shares and exclusive access to price sensitive information which makes smaller players hesitant to enter the market. The result is illiquid, non-transparent markets sometimes marred by artificially high prices. And the wider knock-on effects for society are massive; end-users including industrial, commercial and residential consumers end up paying more for their energy than market fundamentals would suggest. According to the Commission: "Deep and liquid wholesale gas and electricity markets give confidence to businesses that they can respond flexibly to changes in market conditions – supporting investment in new generation and infrastructure, which are needed as part of the transformation of Europe's energy supply."

Under REMIT, energy traders are obliged to disclose deals which will be monitored by the Agency for the Co-operation of Energy Regulators (ACER). ACER's role will not be easy though. Suspecting or even identifying price manipulation is one thing, proving it is another matter. ■

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Best of Blogs

Best friends forever

The Financial Times welcomes political rapprochement between Colombia and Venezuela, which led to the proposed extension of the Trans-Caribbean pipeline.
http://blogs.ft.com/beyond-brics/2011/11/29/venezuela-colombia-friends-again/#axzz1fO5jmTLi

Passing fad?

The *Energy Outlook* blog studies Gazprom's opposition to shale gas, and draws some frank conclusions.
http://energyoutlook.blogspot.com/

Natural flare

The Oil Drum blog responds to reader comments on gas flaring in North America.
http://www.theoildrum.com/node/8643

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EXPLORATION & PRODUCTION | FRANCE

Total to challenge government on shale gas decision

Sophie Davies

FRENCH major Total is planning to challenge the French government on its decision to cancel its shale gas permit and will decide what method it will use within the next few days, *Interfax* has learned.

"The permit was cancelled in October and we are studying the possibility of challenging the government…but the way we will do this has not been decided," company spokeswoman Sandra Dante told *Interfax* on Friday. "We respected the law and do not understand that it was used by the government to revoke our licence," she added.

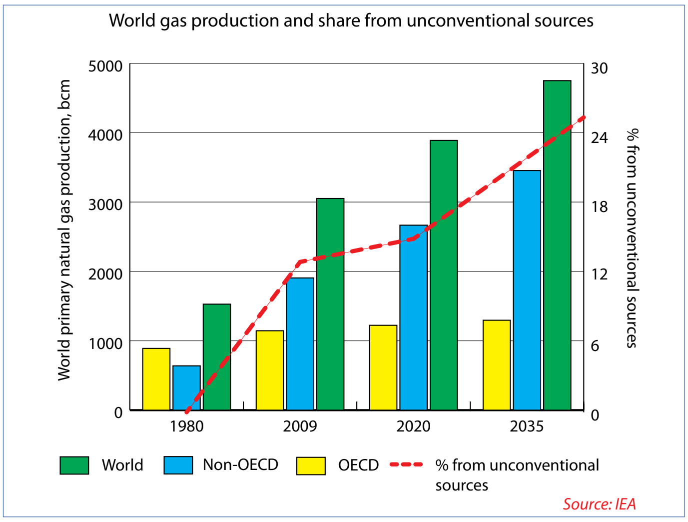
The French government's unexpected decision to cancel three shale gas exploration permits in early October threw the future of shale gas in France into question. Total and US energy firm Schuepbach were both affected, with Total losing one permit and the US firm losing two.

The reason given by the energy and environment ministries for the cancellation was the controversial method known as fracking, or hydraulic fracturing, whereby underground explosions are used to fracture rock gas reservoirs, following which chemicals are injected at high pressure to force out the gas. Total, however, maintains that it has taken the fracking ban into account in its plans for prospecting for shale gas in the Montelimar region of France.

The company submitted a report to the authorities on 12 September pledging that it would not use fracking in its work programme in the Montelimar licence, Dante told *Interfax* on Friday. Total, which had been awarded exploration rights for five years at Montelimar, said it still wanted to prospect for gas in the region but that it would not employ fracking, without saying what other means it would use.

Shale gas concerns in France centre on pollution related to a particular kind of detergent used in fracking. The anti-shale gas lobby has also raised concerns about the use of millions of litres of scarce water supplies.

There are two different ways of challenging the government's decision, Dante told *Interfax*. The first of these is by filing a request for cancellation in an administrative court and the second is by engaging an administrative process with the two ministries concerned and overriding the previous decision, she added.



The company needs to make its challenge before the legal deadline on 12 December. "I think this will happen next week," Dante said.

In the UK, the exploitation of shale gas is more advanced than in France. Fracking has been used in the last six months by UK energy firm Cuadrilla Resources to search for gas in Lancashire; however its use there has not been without polemic.

The explorer, which began testing for gas on the Fylde Coast in March, said it had found 200 trillion cubic feet (5.7 trillion cubic metres) of shale gas but was forced to suspend drilling operations in June when a government scientist linked a small earthquake to the drilling.

At the time, Cuadrilla said it did not think there was a link but since an independent report called the *Geomechanical Study of Bowland Shale Seismicity*, published on 2 November, concluded it was highly probable that fracking carried out by the company at the Preese Hall-1 well in Lancashire did trigger seismic tremors. ■

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Europe in brief

The **Hammerfest** LNG plant in the Barents Sea off Norway is exceeding expectations, now producing up to 109% of its design capacity, Statoil and Linde said on Friday.

Investment in **Norway's oil and gas** sector is expected to reach record levels of $31.7 billion in 2012, driven by continued high oil prices and the need to update old infrastructure, official data agency Statistics Norway said on Thursday.

LNG | ITALY

Livorno LNG plant gets EIB loan boost

Sophie Davies

THE Livorno LNG regasification terminal on the central Italian coast has been granted a €240 million ($324 million) loan by the European Investment Bank, giving the project the final investment it needs to start up.

The terminal, which is due to start operating next year, will be Italy's third regasification facility.

The plant, which is being built by operator OLT Offshore Toscana, is owned by leading shareholders German utility E.On and Italian utility IREN, both with 46.8%. OLT Offshore Toscana is a subsidiary of IREN.

The project, which is expected to have an initial capacity of 3.75 billion cubic meters of gas a year, is moored 22 km off the Tuscan coast. The 30 km pipeline will send gas into the national grid.

Another terminal awaiting development is Italian utility Enel's Porto Empedocle LNG terminal. The 8 bcm/y project on the island of Sicily was interrupted in December 2010, when a constitutional tribunal sided with local authorities, who argued that the project posed environmental threats to the area.

Enel appealed the decision to the Council of State, the country's highest legal and administrative government body, and is now awaiting a final verdict.

Other projects in development include Api Nova Energia's 4 bcm/y Falconara Marittima and Frenc firm GDF Suez' 5 bcm/y Triton terminal, both in the eastern region of Marche. ■

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EC's internal market vision stirs debate

The European Commission has set a deadline of 2014 for the creation of a well-functioning internal energy market. However implementation of regulations may prove to be a complex and long-winded process. Andreas Walstad reports

THE European Commission's goal of creating an internal, integrated market for gas and electricity by 2014 was the hot topic at a conference in Rome this week, with several stakeholders questioning to what extent new and upcoming legislation can be implemented rapidly.

With the 2009 gas dispute between Russia and the Ukraine fresh in their minds, delegates at the *European Gas Infrastructure for Interconnectivity and Interoperability Forum* broadly agreed that efficient use of existing, cross-border infrastructure was necessary to establish a well-functioning pan-European gas market and enhance security of supply.

"Europe is at a turning point for creating an internal market which will secure energy sources in the future," Peter Taff, independent consultant and former head of European gas operations at Centrica said in his key-note speech.

"There is a risk of over-dependency on limited sources," Taff added.

The EC's Third Energy Package – which became law in March – aims to create more transparent and co-ordinated European power and gas markets. New rules include third-party access to pipelines, clear structural separation of vertically integrated production and transmission companies – often referred to as "unbundling" – as well as reverse flows on pipelines to enable gas flows both in and out of a country. The latter was brought over from the second legislative package.

Moreover, under the third package, the European Network of Transmission System Operators for Gas (ENTSOG) has been handed the task of drawing up guidelines for harmonised, pan-European network codes which will include tariffs, gas balancing mechanisms and a methodology for capacity auctions. The proposed guidelines will be passed through the Agency for the Co-operation of Energy Regulators (ACER) and eventually the Commission, which will make them legally binding by the end of 2012.

Unused capacity

"The lessons learned in the crisis of 2009 show that much more regional co-operation is needed," Michael Schmöltzer, head of the gas department at Austrian energy regulator E-Control told delegates. He also addressed the issue of shippers booking pipeline capacity on a first-come, first-served basis and then not using it, blocking other entrants and degrading efficiency.

"At most European interconnection points, capacity is fully booked long-term but the physical flows are much lower," he said. Schmöltzer added that capacity auctioning on a non-discriminatory basis was the best method to use in order to free up unused capacity on pipelines.

> "Europe is at a turning point for creating an internal market which will secure energy sources in the future"
>
> Peter Taff, independent consultant

However Darren Reeve, commercial manager at Interconnector UK – a 20 billion cubic metre per year gas pipeline between the UK and Belgium – highlighted the complexity of cross-border co-operation.

"Completion of the internal market is overdue," he told delegates. "But making changes will be time consuming and costly. To think that we are going to get these network codes right the first time, well that would be some achievement."

Storage auctioning

Third-party access to gas storage was also a key concern, conference participants said. According to the Gas Directive under the Third Package, member states can choose between two models to grant non-discriminatory access; either through regulated access set by the national regulator or by negotiated access set by the storage operator and national regulator together. In both cases, however, national regulators have a monitoring obligation to make sure that third-party access is granted.

"Access to storage capacity is a central feature for a well-functioning European gas market," said Cristina Barassi, EU liaison officer at Italian utility Edison's institutional and regulatory affairs department.

Barassi added that significant investment in storage facilities had been made in Europe over the last 10 years. In Austria, for instance, a key transit country for gas, storage capacity had grown from just 2.8 bcm in 2000 to 7 bcm currently. Moreover, an additional 3 bcm of storage capacity is planned in Austria by 2016, she said. Although there is no legal obligation under the Third Package, Barassi said capacity auctioning was becoming increasingly common to grant third-party access to storage.

"In more liquid storage markets, auctioning of capacity is increasingly the preferred method," she said. Barassi added that the Netherlands was one country where access to storage had improved significantly.

Sergei Komlev, head of Gazprom's directorate for contract structuring and price formation, pointed out that the Third Energy Package said nothing about the future pricing mechanisms for gas contracts. Komlev dedicated his entire presentation slot to defending oil-indexation of long-term take-or-pay gas contracts.

"Continental Europe has developed a unique hybrid pricing system based on co-existence of oil-indexed and hub prices," said Komlev. "It is a hedge against price manipulation by monopolist players – including Gazprom," he added. ■

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Russia's two-tier pricing headache

With cheap gas from independent producers putting pressure on Russia's regulated tariff, will the government be able to meet its long-awaited export netback parity targets by 2015? **Ahmed Mehdi** reports

FOR those with long memories, the attempt to raise Russian domestic gas prices to the level of European export prices has been a lesson in failure. Should the government's most recent target of 2015 be any different?

In 2006, when the first target of export netback parity was set, the netback model was based on a European export price linked to an oil price of $55 per barrel, and implied achievable growth in prices of 15-18% per year for between four and five years. As a result, the Russian government targeted export netback parity by 2011. This became the basis for subsequent price increases implemented by the Federal Tariff Service. As a result of this original target, gas prices have risen by an average of 19% per year over the past five years.

"We have to remember that the decision on netback was reached back in 2006, when the world gas market was different," Russian Economic Development Minister Elvira Nabiullina told *Interfax* in November. "There wasn't the shale gas phenomenon. There wasn't what we are seeing now, where spot prices in the United States are almost three times lower than in Europe. So we need a balanced approach to netback parity, given the tendencies in the world gas market." Nabiullina added.

Increasing oil prices have forced the netback parity target date back from 2011 to 2015. But even this later date now looks unrealistic. To meet even a netback parity target based on $100 /bbl oil price would imply domestic gas price growth of 23% per year for the next four years.

It was therefore no surprise when, in October, Sergei Novikov, head of Russia's Federal Tariff Service, said that the target would be pushed back again to 2015-2018. UBS Senior Oil and Gas analyst Maxim Moskhov said that, to reach a level of European export netback at $240 per million cubic metres (MMcm) based on a long term oil price of $95/bbl, the government will have to increase the domestic gas tariff for industrial consumers by 140% over the next four years, "something incredibly fanciful and in need of a dose of reality," Moshkov told *Interfax* on Friday.

Everything changes

While Russia's target date of 2015-2018 looks unrealistic, Gazprom has been seeking to increase the regulated tariff it can charge for gas to ensure that the economics of its supply portfolio can be sustained by the domestic market rather than being reliant solely on export sales.

In the 1990s and early 2000s, Russia's gas market witnessed low-levels of regulated prices justified by Gazprom's ownership of low-cost Soviet legacy fields, together with more lucrative gas exports to Europe. However, by the mid-2000s, declining production from its core West Siberian assets led the company to look elsewhere for new output. With first gas set to begin next year from Gazprom's giant Bovanenkovo field in Yamal, the era of low-cost gas is at an end.

More on Russia...

Russia's Lukoil plans a $48 billion investment programme to 2014
http://interfaxenergy.com/?p=17501

According to James Henderson, senior fellow at the Oxford Institute for Energy Studies, the breakeven price at which gas from Bovanenkovo is set to make a minimum rate of return is $125-$150/MMcm. This is the figure that would have been achieved by 2013 under the planned domestic price growth plan. According to Henderson, this explains why 2012/2013 was the planned start-up date for the giant Bovanenkovo field.

A further demonstration of the nexus between Gazprom's expensive field development and domestic prices, is that it was no doubt convenient that the netback parity price as calculated in late 2006 was also $125/MMcm.

While Gazprom has been disappointed by repeated delays in price liberalisation, it is also under pressure from another source set to disinflate the regulated tariff: Russia's independent producers.

A vicious cycle

These independents, led by Novatek, have prompted analysts to speak of a two-tier pricing system emerging in the country. Cheap gas from these producers will put further pressure on the regulated tariff, leading to a disinflation of industrial prices and further delaying Gazprom's much-needed domestic price rise.

"Given that non-Gazprom producers are not subject to regulated price restrictions and can essentially charge a tariff that equates to a free-market price, pressure is being placed on Gazprom to sell at a low regulated price", Mark Henderson, director of oil and gas research at Credit Suisse told *Interfax* on Friday.

Novatek has been steadily claiming more domestic market share from Gazprom. Earlier this year Novatek agreed on a new gas supply contract with power company OGK-3 worth 111 billion roubles ($3.6 billion) after OGK-3 decided not to renew its partnership with Gazprom.

According to Troika Dialog estimates, gas production from independent producers' largest projects could rise by 72% from 2010 to 2015, releasing about 52 bcm of new gas.

For Troika Dialog's Alex Fak, Russia's two-tier pricing headache is based on a vicious cycle. With the state increasing tariffs in an environment of visibly increasing competition, Fak argues that this is not because of pedalling the domestic price towards netback parity but rather because Gazprom's high capital expenditure requirements means it consistently asks the state to pass on higher domestic gas prices to the consumer.

"This game seemed never ending, but is unlikely to sustain itself for long. If Gazprom has only expensive gas left for growth, then perhaps it should give priority »

SUPPLY & DEMAND | RUSSIA

Novatek to boost gas production 40% in 2011

Ahmed Mehdi, Svetlana Savateeva and Lubov Afanasjeva

NOVATEK'S gas output will increase by 40% this year to 52.8 billion cubic metres, company chief executive Leonid Mikhelson told reporters on Friday. He also said that there would be some "small" growth in output in 2012, but without giving details.

This is higher than a forecast only last month from CFO Mark Gyetvay that the company would produce 51-52 bcm, a 37.5% increase on last year's output of 37.8 bcm.

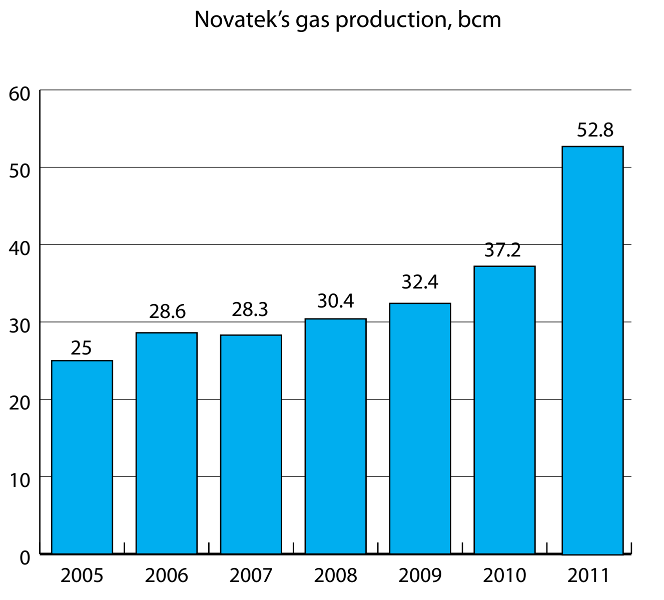
Novatek has already produced 48.4 bcm from January to November this year, according to statistics released today from Russia's Fuel and Energy Dispatch Centre.

The company, along with other independent gas producers, has been steadily claiming a greater domestic market share from Gazprom. In 2010, Russia's independent gas companies produced 142 bcm of gas, equivalent to 22% of the country's total gas production. The latest Russian Energy strategy, published in 2009, sees this share increasing to 27% by 2030.

One of the consequences of this increased production has been that Gazprom's market share in deliveries of its own gas through its pipeline system has been falling in recent years with new independent gas producers gaining a larger market share of Russia's domestic gas market. In 2007, the gas giant's market share in deliveries of its own gas through the Unified Gas Supply System (UGSS) was 85%. In 2010, the independents displaced it to 79%.

According to James Henderson, senior fellow at the Oxford Institute for Energy Studies, if the full potential of independent gas producers' resources were exploited then it is possible that they could produce up to 330 bcm/y by 2020 and 370 bcm/y by 2025. This would imply a share of overall production of around 35% if Gazprom meets its target of 600 bcm/y by 2020.

Non-Gazprom gas producers such as Novatek are also seeking access to Russia's power generation market. Earlier this year, Novatek agreed on a new gas supply contract with power company OGK-3 worth 111 billion roubles ($3.6 billion) after OGK-3 decided not to renew partnership with Gazprom. Meanwhile, TNK-BP has signed a memorandum of understanding with Electricity Company Inter RAO UES on the future development of a joint gas and power business.



Source: Novatek

Novatek has also benefited from rising domestic prices on the Russian gas market. Given that independent gas companies have been free of the regulated price regime, Novatek has been able to generate significant profit margins. In 2010, for example, the company's earnings before interest, taxes, depreciation and amortisation (EBITDA) margin was 44% and its net profit margin was 30% despite the fact that it was focused on the domestic market

In contrast, Gazprom's EBITDA during the same year was 36% and a net profit margin of 26% with exposure to both Russia's domestic market and export market. ■

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Russia & the Caspian in brief

Uzbek oil and gas holding **Uzbekneftegas** will complete construction of a $244 million facility for producing propane butane mix at the Mubarek Gas Treatment Works in the second half of 2012, a source in government circles told *Interfax* on Friday. A boosting compressor station is currently being assembled at the site, and equipment for the propane butane mix facility itself is expected to be supplied by the end of 2011. The facility's design capacity is 258,000 tons of liquefied gas and 125,000 tons of condensate per year.

Kazmunaigas, Kazakhstan's national oil and gas company, plans to spend over 557 billion tenge ($3.7 billion) on geological exploration over the course of 2012-2016, including $3.3 billion on the drilling of 435 wildcat wells and 3D seismic surveys of an area covering 12,024 sq. km, the company said in a statement. Exploration wells are to be drilled at the Caspian prospects of N, Zhambyl, Satpayev, Makhambet and Bobek. Work is also slated to start at the new projects Abai, Isatai, Shagala, and Ustyurt. According to the statement, between 2008 and 2011 Kazmunaigas invested over $819 million in geological exploration. Gas production in Kazakhstan rose 6.9% year-on-year in January-November to 36.095 bcm. This included 17.605 bcm of natural gas, up 11.5%.

» Russia continued...

access to independents' cheap gas, which is ready to flood the market." Fak added.

Fak said the independent producers will amplify the two-tier system leading to further pressure on Gazprom. With continuous lobbying for higher gas prices, which benefit mostly the cash flows of independents, naturally encouraging them to produce more and sell at less than the regulated tariff, the gas giant is just delaying the inevitable, Fak added. ■

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» Kuwait continued...

of society rather than less. Any plans that they were to increase energy prices have been put on the back-burner," Ulrichsen said.

Reshuffling the cabinet

The resignation of Kuwait's Cabinet on Monday, and Defence Minister Sheikh Jaber Mubarak Al Sabah appointment as the new prime minister, could revive the flagging gas programme. However, during the past five years, Kuwait has had seven governments and parliament has been dissolved on three occasions. This latest changing of the guard may prove as inefficient at kick-starting reforms in the energy sector as previous reshuffles have been.

"The ongoing political situation has worked as an obstacle for the Kuwaiti authorities to come to a unified agreement on how to proceed with the development of a national energy programme," Justin Dargin, a Gulf energy analyst at Harvard University's Dubai Initiative told *Interfax*.

The relationship between government and parliament is tense, particularly over issues impacting the oil and gas sector. Parliament, which "effectively acts as an opposition party," is "intensely suspicious of government motivations in contracting," said Ulrichsen. New contracts are scrutinised, and often reversed, hampering the sanctioning process.

With projects as technically complex as the Jurassic gas fields, the government has acknowledged the need to bring in supermajors to help develop the field. KOC signed an $800 million five-year enhanced technical services agreement with Shell in February 2010, to assist in the development of the project. However parliament is fearful that inviting international players like Shell into the sector will dilute the value of Kuwait's national resources.

MPs raised questions in June as to why the deal was handed to Shell without a formal tender, and the contract is now under investigation by both a committee appointed by Kuwait's Oil Minister Mohammad al-Baseeri and a separate parliamentary panel.

"Parliamentary oversight is actually hampering Kuwaiti attempts to modernise, particularly because it concerns the oil and gas sector, which is potentially very lucrative," said Ulrichsen.

With the former prime minister accused of diverting state funds to personal bank accounts abroad, this climate of suspicion has been reinforced. "The kind of enabling environment, is actually getting worse, rather than better," said Ulrichsen.

But until the dysfunctional relationship between parliament and government is resolved, and attitudes towards letting foreign oil companies into the country softened, Kuwait will struggle to find a sustainable, long-term solution to its gas crisis. Replacing the prime minister is, however, a "significant concession," to relieving the political strain, said Ulrichsen. "It's at least a starting point and may allow for the follow up policies, which would at least try to address the relationship between parliament and government, which will be necessary for all future projects to get started." ■

Part two of *Will new PM reform Kuwait's energy programme?* will be published on Tuesday, 6 December.

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EXPLORATION & PRODUCTION | NIGER

Protest at Niger Delta gas processing plant

James Batty

A small protest outside the construction site of a new gas processing facility in the Niger Delta this week demonstrates the sensitivities involved in working in the region.

A group of women gathered outside the construction site on the Uquo field in the Akwa Ibom state, south-east Nigeria, at 3 am (GMT: 2 am) on Wednesday morning. They were protesting against the joint owners of the field – local Nigeria companies Seven Energy and Frontier Oil Limited – alleging that they had not met obligations to the local community under a memorandum of understanding agreed in exchange for use of the land.

Seven Energy denied the allegation when contacted by *Interfax*. Frontier did not respond to requests for comment.

"We are well aware of our MOU commitments and have commenced implementing the infrastructure projects required under this agreement. These projects, which include providing water facilities, are at various stages of completion. In the cause of construction, we also provided employment for well over 500 people in the local communities as part of our commitment under the MOU," Seven Energy's Ayebatonye Basuo told *Interfax* on Friday.

The women left the protest at 7 am (GMT: 6 am) the same day after meeting with the company's community liaison officer. Construction work at the site was not disrupted.

Frontier was awarded the Uquo field in February 2003 by Nigeria's Department of Petroleum Resources. It already produces oil on the field, but is developing a non-associated gas field as well along with Seven's subsidiary Septa Energy.

Gas from Uquo will be pumped to Akwa Ibom state-owned Ibom Power Plant at Ikot Abasi via a 60 km pipeline. The pipe will have an initial plant capacity of 200 million cubic feet per day (5.6 million cubic metres), according to Seven Energy's website.

The protest took place at the under-construction processing facility for the Uquo-2 gas well which will supply the pipeline. ■

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Middle East & Africa in brief

Royal Dutch Shell has ceased all operations in Syria to comply with European Union sanctions on the country, *The Financial Times* reported on Friday. The European Union also put sanctions on three oil companies linked with work in Syria on Friday: Syria Trading Oil Company, General Petroleum Corporation and Al Furat Petroleum, the report added.

Sudan and newly independent **South Sudan** have failed to reach an agreement over oil revenues, *The Africa Report* website said on Friday. Representatives from both governments were negotiating for five days in neighbouring Ethiopia, the report said, but to no avail. South Sudan became independent in July this year. The country holds the lion's share of the former Sudan's oil reserves, causing tension with the northern half of the country.

POLICY & REGULATION | AUSTRALIA

Aussie Senate committee urges more CBM regulation

Sara Stefanini

THE Australian government should delay giving any additional approvals for coal-bed methane (CBM) production in part of the south-eastern Murray-Darling Basin until the Queensland state government completes a regional review of how CBM drilling affects water resources, a federal Senate committee has said.

The federal and state governments should also work together to develop a consistent, national framework for regulating the CBM, or coal seam gas, industry, replacing the existing state-by-state system, it said.

The recommendations were among a long list included in the Senate Rural Affairs and Transport References Committee's *Interim report: the impact of mining coal seam gas on the management of the Murray-Darling Basin*, published on Wednesday. The committee has passed the report on to the Senate, which has about three months to respond.

The onshore Murray-Darling Basin stretches across parts of South Australia, Victoria, New South Wales and Queensland and feeds the four planned CBM-to-LNG projects in development on Queensland's Curtis Island.

While three of the LNG projects have already been approved for production and are unlikely to be affected by the committee's inquiry, it could influence the authorisation of the fourth development – the Royal Dutch Shell-PetroChina Arrow LNG joint venture, a Senate source told *Interfax*, asking not to be named.

The committee's inquiry looks at the impact of CBM drilling on agriculture and food production and on sustainable productivity and viability, and examines whether there are more efficient ways of using water in mining and gas extraction, according to Senator Bill Heffernan, the committee's chair.

"I think the ambushing of rural Australia is a disgrace," Heffernan, a New South Wales member of the opposition Liberal Party, said in a statement on Monday, referring to CBM exploration and production.

The interim report also recommended that all future project approvals require independent, comprehensive monitoring of regional earth surface movements and making gas companies liable for any caving in or sinking they cause. In addition, fluids extracted from wells after hydraulic fracturing (fracking) should be kept in separate and secure storage facilities and treated before being disposed of, it said.

Both the government and industry are already working to address many of the issues raised in the report, the Australian Petroleum Production & Exploration Association (APPEA) said on Wednesday. It noted, for example, that the Standing Council on Energy and Resources, part of the federal Department of Resources, Energy and Tourism, is developing a nationally harmonised framework for best practice standards, land access and water management.

The Murray-Darling Basin feeds Curtis Island's four CBM-to-LNG projects. (Interfax)

"APPEA supports science-based public policy and supports the government's call last week for a 'science-based' approach to matters regarding the gas industry's expansion," Rick Wilkinson, the group's chief operating officer in eastern Australia, said in the statement.

APPEA also pointed out that CBM supplies about one-third of eastern Australia's gas and that the industry provides about 9,000 jobs to the region.

Opposition to CBM exploration and production has spread rapidly in Australia over the past few months, although it mostly stems from New South Wales, where it is still a relatively new venture and the government currently has a moratorium on fracking.

Dart Energy, an Australian CBM extraction company, was forced to switch its exploration focus from metropolitan Sydney to a site 180 km north, near the city of Newcastle, as a result of intense protests in September (see *New South Wales CBM moratorium forces Dart to refocus exploration*, 29 September 2011).

Much of the opposition focuses on landowner rights, and whether their agricultural and food production and water availability is harmed by CBM drilling and exploration. Landowners receive compensation for the wells, processing plants and other infrastructure on their land, but not for the hydrocarbons extracted below the surface.

In response to the recent protests, CBM operators such as Santos and Origin Energy have touted their solid, long-running relationships with landowners in Queensland.

However, Santos was forced to delay its plans to drill a pilot test well and water monitoring well near Spring Ridge, New South Wales, because of heavy protesting at the site. The company reached a deal with the state government, NSW Farmers Association and Caroona Coal Action Group in mid-November that brought an end to the demonstrations. ■

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Asia & the Pacific in brief

Total Chief Executive Christophe de Margerie said on Friday that he wanted to increase Total's stake in the Ichthys LNG project in Australia from 24% to 30%, according to *Reuters*. He said negotiations with project partners Inpex were ongoing and will be completed "in the near future", according to the report. The project partners are due to make a final investment decision on the project in early 2012, but have faced cost pressures as the price of raw materials and personnel has increased in the booming Australian gas market.

EXPLORATION & PRODUCTION

China tweaks CBM targets ahead of five-year plan release

Li Xin and Rainy Lee

CHINA is mulling a revision of its already ambitious five-year targets for coal-bed methane (CBM) production, a source with the National Energy Administration (NEA) told *Interfax* on Friday at an industry conference in Beijing.

The targets may be revised upwards by more than 40%, according to the source at the 11th International Symposium on CBM in China.

While China will not release its five-year CBM development plan until later this month, production targets in the draft have been made public.

Liu Tao, director of the NEA's CBM Department, said at the 2011 Seminar on CBM Technology in September that the five-year plan would target production of 21 billion cubic metres by 2015, with surface-level and underground extraction accounting for 9 bcm and 12 bcm, respectively.

Proposed revisions to the draft CBM development plan would see China's annual output of the unconventional gas reach 30 bcm by 2015, comprising 16 bcm from surface-level extraction and 14 bcm from underground extraction, according to the source, who spoke to *Interfax* on the condition of anonymity due to the sensitivity of energy-related topics in China.

On the sidelines of the Beijing conference, the source said that while the five-year plan and output projections had not been finalised, the completed plan to be released later this month would contain targets "definitely higher than previous ones".

China has so far failed to meet the CBM goals set in its 11th Five-Year Plan (FYP), which road mapped the industry's development from 2005 to 2010.

The country produced 9 bcm of CBM in 2010, short of the envisaged 10 bcm, while CBM utilisation reached 3.5 bcm compared with the targeted 8 bcm.

The potential upward revision of projected CBM output for the 12th FYP period underscores Beijing's desire to exploit the country's abundant unconventional gas resources.

According to the NEA, China has the world's third-largest CBM reserves behind Russia and Canada at 36.7 trillion cubic metres, while the United States Energy Information Administration estimates that China holds 36 tcm of exploitable shale gas reserves.

That CBM development can help China improve mine safety has also piqued official interest.

Speaking at the National Coal Mine Gas Control Meeting on 12 November, Chinese Vice-Premier Zhang Dejiang urged the country's CBM sector to develop rapidly in order to reduce the death toll in the mining industry.

To achieve the new 2015 targets, 33 key exploration projects and 32 development projects will be carried out over the five-year period in order to boost China's proven reserves of CBM to 1 tcm, the source said.

In addition, 13 CBM pipelines with aggregate transmission capacity of 12 bcm and a total length greater than 2,000 km will be built.

The government will also introduce preferential policies during the five years to encourage CBM development, such as raising subsidies and reducing taxes for companies in the sector, according to the source.

Industry experts at the Beijing conference expressed scepticism over the revised production targets.

"It is possible [to achieve] but it needs a lot of work," said Raymond Pilcher, president of US-based Raven Ridge Resources.

According to Pilcher, one stumbling block is that the majority of Chinese CBM output is of low quality and concentration, which must be purified and processed at considerable cost.

Improvements in technology, management and training can address quality concerns and diversify CBM's role in the domestic energy sector, Pilcher said.

The lack of infrastructure, such as pipelines, is likely to prevent China's CBM industry from reaching the new 2015 targets, said Wu Jianwen, an analyst with Shanxi Fenwei Energy Consulting. ■

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LNG

China to triple LNG production capacity by 2015

Interfax staff

CHINA will boost its annual production of LNG to 7.5 million tons by 2015, Xu Zhengkang, co-author of the country's five-year natural gas development plan, confirmed to *Interfax* on Friday.

China is home to 30 operational LNG processing plants with aggregate annual production capacity of 2.5 million tons, Xu said, adding that the country plans to bring some 40 additional plants online over the next five years.

China's LNG sector initially developed using foreign technology and equipment when the country's first array of LNG plants was built in Henan Province and the Xinjiang Uyghur Auto-nomous Region early in the last decade, according to Xu.

Wider adoption of domestic technology and equipment has helped accelerate the rate of new LNG plants, he noted.

Over the 12th Five-Year Plan period (2011-2015), LNG will primarily serve as a transportation fuel as well as a source of gas for regions not linked to major gas pipeline networks, Xu said.

In addition to this, LNG will be used to bolster gas supplies during peak gas consumption seasons.

Xu forecast imports to account for half of China's LNG supply by 2020, noting that LNG is the preferred form of imported gas due to its ease of transport.

China will build 17 LNG terminals with total throughput capacity of 65 million tons over the next five years, the state-controlled *Shanghai Securities News* reported on Thursday.

China imported 25 billion cubic metres of gas in the first 10 months this year, of which 12.3 bcm was piped from Central Asia and 12.7 bcm received as LNG shipments. ■

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COMPANIES & FINANCE | CANADA

Halfway there: BP sanguine over future asset sales

Chris Noon

BP's sale of its Canadian natural-gas-liquids (NGL) business for $1.67 billion to Plains All American Pipeline has pushed the UK giant past the halfway mark in its asset sale programme to cover costs stemming from last year's Gulf of Mexico oil spill. *Interfax* found on Friday that both BP and equity analysts were sanguine about future divestments, in view of the company's renewed financial strength.

A BP spokesman told *Interfax* on Friday that with the NGL business sale, the total value of the company's divestments stood at $21 billion. The value of the asset sales programme as of November was $38 billion, revised downwards from $45 billion after the collapse of the proposed sale of Argentine producer Pan American Energy (see *Bad blood after BP's $7 billion Argentine deal collapses*, 7 November 2011). The original value of the asset sales programme, announced in July 2010, was $30 billion.

"We're in a far stronger position than [we were] this time last year, and can afford to be more strategic about the asset sale programme. We're still aiming to dispose of businesses and assets that don't fit, and are in the process of identifying those," the spokesman said. "Our adjusted target is now $38 billion by the end of 2013. There's a good geographical spread to the programme, with sales made in Pakistan, Vietnam, the UK, the North Sea and the Americas," he added.

Analysts agreed that achieving the divestment target was less critical than a year ago. "They're in a fairly strong position, with gearing at 19%, and continuing to edge down. If they achieve their disposals, we could see gearing in the low teens. It's still difficult to predict what they're likely to sell, but the asset sales are not as important as they were previously," Tony Shepard, an analyst at London-based investment bank Charles Stanley told *Interfax* on Friday.

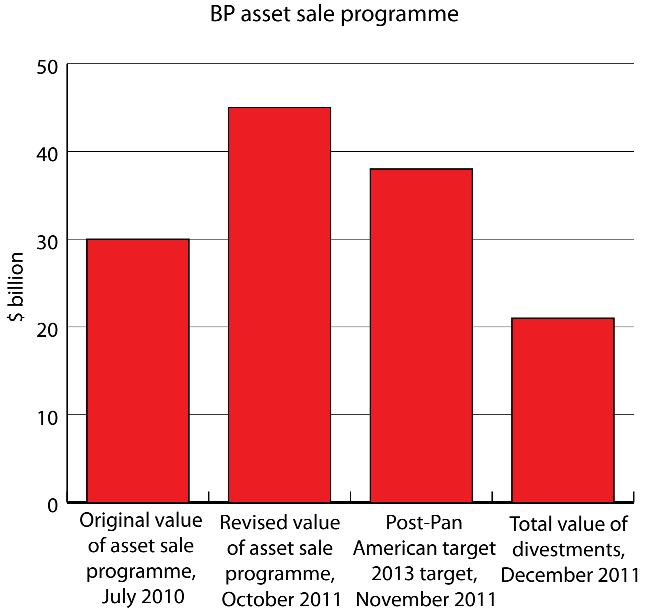
"Oil prices remain high, which should provide good support going forward. They would still like to reach their target, because there are several 'moving parts' to their balance sheet, such as litigation and fines," Shepard added.

A second analyst at a London-based investment bank, who did not wish to be named, said further divestments would now be "a luxury", given BP's privileged position. He added that the asset fire sale was now "inseparable" from the company's growth strategy.

BP's future divestment plans are still unclear but, given its need to retain cash flow, it seems unlikely the company will sell production assets. In its weekly *Operating Environment Rules of Thumb publication*, BP estimated that a change of $1 per barrel to current oil prices would have an impact of $380 million on operating profit. A change of $0.10 per million cubic feet to the Henry Hub gas price would have an impact of $80 million on the company balance sheet, BP added.

BP is more likely to dispose of small and mid-sized assets that require significant investment and maintenance costs. In November, the company sold its stake in a deep-water Gulf of Mexico field to Stone Energy for $204 million, and booked $296 million from its fuel-marketing businesses in five African countries.

Although the Pan American Energy sale was seen as the 'jewel in the crown' of the divestment programme, two huge refineries in the United States are still for sale, and may raise around $4 billion. BP originally said it hoped to sell the facilities in Carson, California, and Texas City, Texas by the end of 2012, but this has been revised to the end of 2013.



Source: BP

BP's chief executive Bob Dudley said on Thursday that BP's sale of the Canadian NGL business did not signal a retreat from the country, where the company has large oil sands projects and offshore ventures across Alberta, the Northwest Territories and the nearby Beaufort Sea.

"Canada remains an important part of our portfolio of growth opportunities to meet North America's energy needs," said Dudley.

The NGL business, which is being sold to Plains All American Pipeline unit Plains Midstream Canada, includes plants that extract NGLs such as propane, butanes and C5+, which are pentanes plus heavier hydrocarbons. The business has 235 million cubic metres per day of gas-processing capacity. Assets also include 4,000 km of pipelines, and storage facilities.

Pan American Energy is not a discarded jigsaw piece in the asset sale. "We're not in any rush to get rid of Pan American. BP will now return to a strategy of long-term ownership. Our position has changed since a year ago, and we no longer need the divestment like before," a BP spokesman said last month. However, *Interfax* understands that BP is still open to offers for the assets, and that independent Argentine company Bridas may return to the table despite its scrapping of the deal. ■

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Americas in brief

Deep-water drilling in the Gulf of Mexico has revealed a deposit estimated to yield 11.3 billion cubic metres of gas reserves, state-controlled Pemex said on Thursday.

Mexico's 3.8 mtpa **Manzanillo regasification terminal** could come online in early 2012, according to an article on *LNG World News* website.

Winners & Losers

Papua New Guinea according to InterOil stands to become Asia Pacific's second-largest LNG exporter after Australia by 2020, with more attractive economics than its larger regional rival.

BP's sale of its Canadian natural-gas-liquids (NGL) business for $1.67 billion to Plains All American Pipeline on Thursday, has pushed the UK giant past the halfway mark in its asset sale programme to cover costs stemming from last year's Gulf of Mexico oil spill.

GDF Suez will benefit from Tuesday's decision by France's highest court, the Conseil d'Etat, to suspend the gas price freeze imposed by the country's government at the end of September.

Venezuela agreed on Monday to extend the Trans-Caribbean pipeline beyond Colombia to Ecuador and Panama. It allows Caracas to exploit offshore reserves in the Cardon IV Block to become a key regional supplier.

Italian giant Eni purchased a 32.5% stake in the Evans Shoal gas field in Australia's Timor Sea for $350 million on Wednesday, further supplementing the Italian major's Australasian portfolio.

Jamaica is facing a protracted legal wrangle with Belgian shipper Exmar, harming prospects for the country's planned LNG regasification terminal.

Attendees of the Shale Gas World Conference in Warsaw saw the event delayed for three hours on Tuesday morning by protests over unconventional gas development in Europe.

A series of droughts this year in Tanzania have hit output from four hydropower plants, prompting the government to unveil plans for more gas-fired power generation to meet demand. ■

Week in Quotes

"We're in a far stronger position than [we were] this time last year, and can afford to be more strategic about the asset sale programme. We're still aiming to dispose of businesses and assets that don't fit, and are in the process of identifying those,"
a BP spokesman told *Interfax* on Friday, in reference to the major's $38 billion asset sale programme, which has been revised downwards from $45 billion after the collapse of the proposed sale of Argentine producer Pan American Energy.

"Total has serious competitors with several companies seeking access to the project,"
said Rosneft chief executive Eduard Khudainatov on Thursday, referring to the offshore Val Shatsky deposit in the Black Sea.

"Efforts to prevent coal mine gas explosions coupled with the need to find new gas sources to feed China's energy demands are fuelling the country's coal-bed methane industry,"
Qi Ying Ying, manager at Huasheng Energy said on Tuesday, responding to the debate about the risks of coal-bed methane (CBM) in coal mines in China, where some believe CBM development can help improve the country's mining safety record.

"The majors are really starting to look at Papua New Guinea. There's so much more potential for exploration and production, it's massive,"
Dinny Kutty, Inter-Oil's chief accountant, commented on Monday amid debate about the future of LNG in Australasia at the LNG Outlook Australasia conference in Perth on Monday.

Week in Numbers

Parity check

A$0.50
Exchange rate of A$ to US$ on 1 December 2008.

A$0.97
Exchange rate of A$ to US$ on 1 December 2011.

$700 million
Cost increase for ExxonMobil's PNG LNG project in Papua New Guinea.

Source: Santos, Oil Search, XE.com

Power surge

$0.08/kwh
Current retail price of power charged by Tanzania's Tanesco.

$0.22/kwh
Amount Tanesco needs to balance the books in 2012.

155%
Tanesco's proposed increase in prices.

Source: Tanesco, Interfax

The coming storm

20%
Percentage of EOG Resource's 2011 capex that will be spent on dry gas.

10%
Percentage of EOG Resource's 2012 capex that will be spent on dry gas.

32%
Target share of gas in EOG's production mix in 2015, from 46% this year.

Source: EOG Resources

Finance

Supplied by Infrastructure Journal

A weekly round-up of the latest global finance headlines

EIB approves Livorno development loans

THE European Investment Bank (EIB) has approved €240 million ($322 million) in loans for the development of the Livorno regasification project in Tuscany, Italy. Milan-listed IREN is the sponsor, through subsidiary OLT Offshore, with Germany's E.On Ruhrgas which is also a partner in the scheme. The project consists of a floating terminal for the import, storage and regasification of LNG, moored 22 km from the Tuscan coast and connected to the mainland by a submarine and overland pipeline approximately 30 km long to send gas to the national grid. The initial authorised capacity for gas imports will be 3.75 billion cubic metres per year.

Reliance hopes to raise $1 bln to develop shale

INDIAN conglomerate Reliance Industries Limited (RIL) is planning to raise up to $1 billion for the development of shale gas projects. Citibank, UBS and Bank of America Merrill Lynch are understood to be running a bond sale for RIL, directed to the foreign market and reported to be priced at around 150 basis points plus London Interbank Offered Rate. The 10-year bond is expected to be launched in December. Funds are expected to be used to finance development at the company projects in Marcellus shale play in Pennsylvania in addition to be being used for the development of the Jamnagar Refinery project domestically. Chevron, Carrizo and Pioneer are already signed up for joint exploration projects with RIL across the Unites States.

FHN completes OML deal

LAGOS-BASED First Hydrocarbon Nigeria (FHN) has completed the debt-backed acquisition of a 45% interest in the OML 26 licence, from Shell, Total and Agip, for $147.5 million. The syndicated debt facility amounts to $230 million with First City Monument Bank Capital Markets and Stanbic IBTC acting as mandated lead arranger on the deal. A second facility provides $50 million of mezzanine finance over six years from the Pan-African Investment Partners II (PAIP II) Fund, managed by Kingdom Zephyr Africa Management. The debt was oversubscribed according to FHN, with $450 million coming in commitments. The portion of finance left over after acquisition costs will be used to fund a fast track a re-development programme at the company's OML 26 portfolio of assets.

Origin to finance share in APLNG project

ORIGIN Energy has allocated $800 million in a notes offering, with the proceeds used to finance the developer's share in the massive Australia Pacific LNG (APLNG) project. The total amount to be raised in the issue was initially $500 million but strong demand has given the Sydney-based firm the option to extend the deal. The notes will offer an annual interest rate of 8.6% and mature in December 2071. Pricing is set at 400 basis points. The APLNG scheme is a coal-bed methane to LNG project to be located on Curtis Island. ConocoPhillips is Origin's joint venture partner, with China's Sinpoec also taking a stake in the project in addition to being an offtaker.

Santos blames PNG LNG costs rise on strong Aussie dollar

PROJECT co-sponsor Santos has revealed that the strength of the Australian dollar has caused the cost of the PNG LNG project to rise by $700 million. A project finance facility of $18.2 billion was closed for the development of the massive integrated scheme in Papua New Guinea in March 2010. ExxonMobil is lead operator on the project with a 33.2% stake. Australia's Oil Search also holds a 29% stake with Santos a minority partner at 13.5%. *Interfax* understands that no extra debt will be taken to cover the increase in cost, and the sponsors will instead cover the increase through existing cash flow. First production at the site is expected to begin in 2014.

White Stream pipeline costs announced

A cost for the proposed White Stream gas pipeline has been announced by the scheme's chairman this week. The cross Black Sea pipeline will cost €4.5 billion ($6 billion) to develop and is designed to diversify Europe's gas supply by linking up with Caspian producers. Under current estimates White Stream would cost less than both the $20 billion South Stream project and minimum $11 billion Nabucco line – both of which plan to approach the commercial debt market for funds over the next two years. However, Robert Pirani told the OG Pipe conference that his project is not a competitor to the other Southern Gas Corridor scheme according to *Reuters*. A tentative on-stream date of 2018 has been set, with an initial pipeline transport capacity of 8 billion cubic metres per year. No major development partners have yet been recruited by the private shareholders.