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LNG

PROCESSING

AUSTRALIA : LNG project may be delayed by ConocoPhillips and Origin Energy – CNR/48/18/1

Bank of America Corp.'s Merrill Lynch & Co. unit said recently that ConocoPhillips and Origin Energy Ltd. may have to delay their liquefied natural gas project because the venture hasn't

signed up fuel buyers. "With global forecast demand continuing to soften, Origin will struggle to get a contract for its January 2014 target," the Merrill Lynch analysts wrote in a note. (Bloomberg, July 15, 2009)

AUSTRALIA : Chevron delays decision for Gorgon LNG development – CNR/48/18/2

Chevron Corp. and its partners recently delayed a development decision for Gorgon liquefied natural gas venture until September, the Age newspaper reported. Development approval was expected on August 31 and Chevron and its partners, which include Exxon Mobil Corp. and Royal Dutch Shell Plc, have delayed the go-ahead until September 14. (Bloomberg, July 24, 2009)

CHINA : Technip awarded contract for of a mid-scale LNG plant in Yinchuan – CNR/48/18/3

Technip has been recently awarded by Ningxia Hanas Natural Gas Company Ltd, a lump sum contract for of a mid-scale liquefied natural gas plant to be built in Yinchuan, China. The contract covers the engineering, supply of main equipment, procurement and construction management services for facilities for natural gas pre-treatment, liquefaction, LNG storage and loading, utilities, offsites, buildings and other infrastructure. This LNG plant will be the largest facility of its kind in China. It will have two trains with a capacity of 400,000 tons per year each, based on an Air Products liquefaction process. The contract is scheduled to be completed in the second half of 2011. (Technip press release, June 22, 2009)

CHINA : Production starts at the China Leason's LNG Plant Phase 1 – CNR/48/18/4

China Leason Investment Group Co., Limited announced recently that its liquefied natural gas plant Phase 1, which is located at Qinshui County of Shanxi Province, the PRC and with a daily production capacity of 500,000 m3, commenced production on 18 June 2009. At present, it is the largest unconventional liquefied natural gas plant in China. Shanxi Qinshui Shuntai Energy Development Co., Ltd. is the wholly-owned subsidiary of China Leason. The construction of LNG plant Phase 2 with the same daily production capacity of 500,000 m3 will start immediately. It is anticipated that LNG plant Phase 2 will start

production in the 2nd quarter of 2010. The total daily production capacity will then reach a total of 1 million m3. At present, its LNG products are mainly sold to provinces include Guangxi, Guangdong and Fujian, as well as regions such as Huadong, Huabei and Northeastern. At the moment, the daily demand of its target markets reaches 2 million m3 and above. To secure stable gas supply, the Group has closed cooperation with China United Coalbed Methane Corp. Ltd. and Shanxi Jincheng Anthracite Mining Group Lanyan Coalbed Methane Co. Ltd., which have the largest proven coalbed gas reserves in the Qinnan area. (ACN Newswire, June 22, 2009)

EAST TIMOR : President wants Greater Sunrise gas to be processed in the country – CNR/48/18/5

East Timor President Jose Ramos-Horta said recently it would be more profitable to pipe the gas of the Greater Sunrise project to his country, rather than process it on the spot or send it to Darwin. The venture partners developing the field are considering three options: piping the gas 450km to a new LNG plant in Darwin; building a floating processing plant at the field; piping the gas 150km to an LNG plant in East Timor. The venture partners argue that East Timor lacks a skilled workforce, is still politically unstable and a deep underwater trench between Sunrise and the mainland would present major engineering problems.

A decision on the project is expected at the end of 2009. President Ramos-Horta said modern technology could overcome the difficulty of laying a pipeline through the Timor Trough. But he admitted it was not known if it would be cheaper than running a pipeline to Darwin. The president said East Timor was closer to the key

markets of China and Japan and the country's tax regime was "far simpler and more generous" than that in Australia. Greater Sunrise is estimated to contain 300 million barrels of light oil and 8.3 trillion cubic feet of natural gas. (Mineral Processing, July 1, 2009)

IRAQ : Shell may sign agreement on LNG floating plant by September 2009 – CNR/48/18/6

Abdul Hadi Al-Hassani, vice chairman of the nation's parliamentary oil and gas committee said recently that Iraq may sign a final agreement with Royal Dutch Shell Plc by September to process and export gas from the Basra area. Shell and

partners including Mitsubishi Corp. may set up a 2 million-metric-ton a year floating liquefied natural gas facility to capture and process flared gas from the area. The venture may capture as much as 700 million cubic feet a day of flared gas, process it on a vessel and sell the fuel overseas, he said. "We plan to start production by 2013" he added. (Bloomberg, July 1, 2009)

WORLD : Shell decreases its LNG production in Malaysia and Oman – CNR/48/18/7

Chief executive officer Peter Voser said recently that Royal Dutch Shell Plc curbed liquefied natural gas production in Malaysia and Oman mostly because of lower demand. Shell is a partner with Total SA in Oman LNG and is also a partner in two Petroliam Nasional Bhd-operated LNG plants in Bintulu, Sarawak. «Predominantly, these aren't structural reductions, this is really a reaction to lower demand in most areas," Voser said. "Quite clearly in Oman, there is some structural element in it from the supply point of view, but the predominant effect is actually the market demand." Shell recently forecasted that the European Union's natural gas demand will decline in 2009 after 30 years of continuous growth. (Bloomberg, July 31, 2009)

TRANSPORTATION-DISTRIBUTION

CHINA : CNOOC and MISC in partnership to create a LNG carrier fleet – CNR/48/18/8

China National Offshore Oil Corporation (CNOOC) and an energy subsidiary of China Merchants Group plan to create a fleet of six LNG carriers together with Malaysia International Shipping Corporation Berhad (MISC). They will entrust the construction of the LNG carriers to

Hudong-Zhonghua Shipbuilding (Group) Co., Ltd.. Related parties are having final talks and the construction contract is predicted to be signed soon. Each LNG carrier, with a capacity of 145,000 cubic meters. The first LNG carrier is scheduled to be delivered in 2011. (Asiaport Daily News, August 4, 2009)

RUSSIA : Gazprom wants to expands capacities of Russian shipbuilders – CNR/48/18/9

A recent meeting at the Baltiysky Zavod premises has been dedicated to the prospects for expanding production and engineering capacities of Russian shipbuilders, which fulfill Gazprom's orders. Taking part in the meeting were top managers from Russian leading shipbuilding companies – United Shipbuilding Corporation, Admiralty Shipyards, Amur Shipbuilding Plant, Baltiysky Zavod, Vyborg Shipbuilding Plant, Zvezdochka Shiprepairing Center, Severnoye Machine-Building Enterprise (Sevmash), Severnaya Verf, and Krylov Shipbuilding Research Institute. Addressing the meeting participants, Alexander Ananenkov, Deputy Chairman of Gazprom Management Committee; noted that Gazprom attached great significance to developing the Russian continental shelf with the total area of more than 5 million square km (25 per cent of the world ocean's shelf) as well as to the prospects for LNG production and sea-borne transportation.

At the same time, the Company is striving to maximally engage the production capacities of domestic producers. Meanwhile, there is an obvious lack of both production and engineering capacities to construct modern marine equipment for offshore operations. It is, first of all, referred to drilling rigs and new-generation production platforms. "Gazprom supports Russian shipbuilders' initiative on creating new production capacities to manufacture drilling and production platforms, LNG carriers and individual blocks and modules of marine equipment. Offshore field development up to 2020 will demand over ten drilling and production platforms, over 50 vessels and marine equipment of various types as well as at least 23 LNG carriers.

We are pursuing the objective of placing the bulk of orders with domestic producers. In order to deliver this objective, the producers should comprehensively upgrade shipbuilding companies to satisfy the demands of Gazprom as a large customer in terms of quality and quantity," underlined Alexander Ananenkov. "It is necessary to adopt a state import substitution program that would embrace not only the shipbuilding, but the engine, machine, oil and gas equipment sectors as well.

This program should encourage Russian producers to be active in equipment upgrade, certification, adoption and development of advanced technologies,” stated Alexander Ananenkov while summarizing the meeting results. (Gazprom press release, June 23, 2009)

SUPPLIES – IMPORTS – EXPORTS

CANADA : Maritimes & Northeast Pipeline starts to receive gas supply from Canaport – CNR/48/18/10

Maritimes & Northeast Pipeline announced recently that it has commenced receipt and redelivery of natural gas from another major new source of natural gas supply, the Canaport™ liquefied natural gas terminal in Saint John, New Brunswick. The project, built under a long-term firm service contract with Repsol Energy North America (Repsol), doubles Maritimes’ U.S. year-round firm mainline capacity from approximately 400 million cubic feet per day to approximately 800 million cubic feet per day. While Maritimes’ 25-year firm service contract with Repsol is under a negotiated rate, completion of the Phase IV Expansion has also allowed Maritimes to reduce its mainline recourse rates. Maritimes has filed a rate application with the Federal Energy Regulatory Commission requesting an effective date of August 1, 2009 for the reduction to its recourse rate. (Spectra Energy press release, July 14, 2009)

CHILE : Petrobras wants to buy Chilean LNG – CNR/48/18/11

Vilson Reichembach, head of Petrobras operations in Chile, said recently that the company wants to buy LNG from Chilean regasification plants Quintero and Mejillones. Petrobras is in talks to buy liquefied natural gas in Chile to use in cars. Petrobras recently bought 230 fuel and service stations across Chile from Exxon Mobil Corp as part of its drive to expand downstream operations in the region (Reuters, August 4, 2009)

EUROPE : Advantages and drawbacks of LNG studied in an EU’s Joint Research report – CNR/48/18/12

A new report from the European Commission's Joint Research Centre (JRC) revealed recently the likely impact of increased reliance on liquefied natural gas and more shipments of LNG to the European Union. The report concludes that LNG may remain an expensive energy option for the foreseeable future, with both affordability and geo-political issues expected to remain key factors in this area of the energy sector. The JRC Reference Report, entitled Liquefied Natural Gas for Europe examines the benefits and drawbacks of the EU's greater use of LNG shipments by 2020 in five areas.

Regarding the security and diversity, LNG represents 15% of the EU's gas imports and contributes to its energy security and diversity of supply. But increased use of LNG might negate this positive effect, because supply is heavily concentrated in the hands of a small number of countries. The report expresses concern regarding the recently formed Gas Exporting Countries Forum (GECF), which plays a major role in the sector, controlling +/-85% of LNG supply today with respective implications on world LNG supply patterns. Regarding the energy efficiency and greenhouse gas emissions, The LNG supply chain tends to be more energy and greenhouse gas intensive than the supply chain for pipeline gas, because of the extra processing steps. The difference is narrower when LNG is compared to remote pipeline deliveries.

Typically the greenhouse gas performance gap is smaller than the energy efficiency gap, because of the unavoidable methane leaks from pipelines. LNG may be more favourable with respect to greenhouse gases compared to pipeline supplies under certain conditions, e.g. when the alternative is very remote pipeline deliveries of gas or when LNG is brought to the end-users in liquid form and then regasified on-site. Regarding the quality, LNG is of superior quality to pipeline gas, because it is purer, has higher methane and energy content, and has a more stable composition.

However, the superior quality of LNG, obtained at a higher cost in terms of energy and greenhouse gas emissions, actually represents a problem in Europe today. This is because most of Europe's end-use facilities are designed for the lower quality of pipeline gas that prevails in the gas consumption mix today. With LNG's share of the EU's gas imports expected to increase, the EU may be led to consider changes to its gas quality specifications or investigate dedicated LNG applications, for example as a fuel for transport, though this is by no means certain. Regarding the shipping, LNG shipping costs tend to be the most volatile cost component in the overall LNG supply chain and have a major impact on the competitiveness of LNG supplies. LNG is unlikely to cause significantly more shipping congestion, even if more ships are needed to meet greater demand, unless more stringent safety and security rules for handling LNG carriers are introduced. The research behind the report was carried out in the framework of the JRC's ongoing research in the assessment of energy technologies and systems, in liaison with the European Commission's Directorate General for Energy and Transport. The report does not engage the European Commission in any way as regards future policy decisions. (European Commission press release, July 7, 2009)

The report can be downloaded at:

http://ec.europa.eu/dgs/jrc/downloads/jrc_reference_report_200907_liquefied_natural_gas.pdf

INDONESIA : Tangguh will ship 56 cargoes of LNG in 2009 – CNR/48/18/13

The Upstream Oil and Gas Regulating Agency (BP Migas) said recently that the Tangguh gas field in Papua, Indonesia, will ship 56 cargoes of liquefied natural gas to buyers in 2009. BP Migas head R Priyono said that 17 cargoes would be shipped to Fujian (China), eight cargoes to POSCO (South Korea), 12 cargoes to K=Power (South Korea), and 19 cargoes to Sempra Energy

Marketing Co (the United States). The production capacity of Tangguh LNG reached 7.6 million tons per annum with a gas reserve of 14 trillion cubic feet. Priyono also said that the sale-purchase contract of Tangguh reached 7.4 million tons per year which included Sempra Energy Marketing Co amounting to 3.7 million tons per annum, Fujian 2.6 million tons per year and Posco and K=Power with a volume of 1.1 million tons annually. (Trading Markets, July 23, 2009)

QATAR : Future Polish terminal will receive Qatari LNG – CNR/48/18/14

PGNiG SA has recently accepted the liquefied natural gas delivery conditions from Qatar. The agreement between PGNiG SA and Qatargas Operating Company Ltd pertains to the delivery of 1 million tons of LNG annually for a period of 20 years from 2014. The contracted amount of liquefied natural gas is a sufficient amount to secure the commencement of the construction of the LNG terminal in Świnoujście. The remaining amounts of liquefied natural gas will be obtained by PGNiG SA from deliveries obtained by medium and short term contracts. The period for commencement of deliveries is strictly correlated with the schedule of the LNG terminal investment by OGP Gaz-System SA and its subsidiary Polskie LNG. The delivery of the terminal is planned for 2014. The commencement of deliveries is also planned in this period. The deliveries will be carried out Ex-Ship. The delivery location is the terminal in Świnoujście. (PGNiG press release, June 22, 2009)

SOUTH AFRICA : PetroSA in talks to buy LNG – CNR/48/18/15

South Africa's national oil company PetroSA said recently it was in talks with an unnamed party to import 500,000 tonnes of liquefied natural gas a year to help extend the life of its Mossel Bay gas-to-liquid (GTL) refinery. Mossel Bay is expected to run out of gas supplies by 2011. In September, PetroSA's vice president said "We project that this gas will run out in 2011". He added "However, we hope that the importation of LNG and the exploitation of indigenous gas fields will extend the life of the GTL facility to beyond 2015". PetroSA said it would drill and explore new offshore gas reserves to sustain the refinery. In September PetroSA's is in discussions with U.S gas explorer Forest Exploration International to develop the promising Ihubesi project was also making progress. Depending on a government permit, production in the Ihubesi gas field off South Africa's west coast could start in 2012. Initially drawing 100 million cubic feet of gas a day, the well would eventually produce enough gas to produce up to 700 megawatts of power. (Reuters, July 6, 2009)

TRINIDAD AND TOBAGO : Atlantic LNG searches new LNG markets – CNR/48/18/16

Robert Riley, chairman and chief executive officer of BP Trinidad and Tobago, said recently that he is worried about the cheaper gas producers entering the natural gas market. "We have entered an era of increased competition and it can be argued that we no longer have or enjoy the first mover to market advantage that we have had," Robert Riley, chairman and chief executive officer of BP Trinidad and Tobago (BPTT) said. "At BPTT, we refer to the new LNG entrants collectively as a wave because of the sheer volumes that will be added to the market," he added. BPTT is a major shareholder of Trinidad

and Tobago-based Atlantic LNG whose four processing trains have a total production capacity of 15 million metric tonnes per annum (mtpa). Other shareholders are BG, Repsol, Suez and the National Gas Company of Trinidad and Tobago. The new entrants, according to Riley, will add 12 billion cubic feet of gas per day between 2008 and 2011, and there will be, he said, a 50 per cent increase in global LNG over the next three years. Atlantic LNG exports to the United States (US), Europe. The Dominican Republic and quite recently began sending supplies to Chile and Brazil. It also sells on the spot market in Asia. (Jamaica Gleaner, July 3, 2009)

STORAGE

CHINA : PetroChina receives approval for Rudong LNG terminal project – CNR/48/18/17

PetroChina received recently grant from Ministry of Commerce for Rudong liquefied natural gas project in Jiangsu area. The Rudong LNG terminal will be supplied with the LNG from Qatar, which has decided to provide PetroChina with 30 million tons of LNG yearly for 25 years. The building of the Rudong terminal is divided into two phases. The first phase will dawn a processing capacity of 3.50 million tons per year and is planned to be placed into operation in 2011. The second phase would enlarge the processing capacity to 6.5 million tons per year. (Energy Business Review, June 15, 2009)

DOMINICAN REPUBLIC : Regulatory framework of natural gas market expected in December 2009 – CNR/48/18/18

Despite contracts with four companies signed to develop the natural gas market in Dominican Republic, the Industry and Commerce Ministry's regulation for its development and marketing still isn't ready. Moreover the LNG terminal which would supply the fuel and slated to be ready to year end, is still under construction. The terminal being built in Punta Caucedo will allow its transport in that state to all factories, hotels and vehicles. AES Dominicana president Marco De la Rosa said that company signed several contracts

with local companies and one from the United States, to provide natural gas' economic benefits to other sectors of the country. He said those companies will distribute natural gas across the country supplied by the liquefied natural gas terminal, once the works conclude around mid December 2009. "The idea is that service stations will start to open making it possible for natural gas to reach vehicles, and while that natural gas terminal is expected by December 2009, the regulations and regulatory framework which will accompany that market's development are being prepared". (Dominican Today, July 6, 2009)

FRANCE : 4Gas files permit applications for development of LNG terminal near Bordeaux – CNR/48/18/19

4Gas recently filed an application for the sitting and operation of the Pegaz LNG Terminal in Le Verdon-sur-Mer, near Bordeaux, France. The permit application was filed in the name of Pegaz S.A., a fully-owned subsidiary of 4Gas B.V. and includes comprehensive environmental impact and safety assessments. 4Gas expects to start construction of the Pegaz LNG Terminal in the first half of 2010 and anticipates the terminal to become operational in 2013. The sitting and operations permit application will be followed by the application for a permit to construct within 10 days after the current filing. (Liongas press release, June 23, 2009)

INDONESIA : PT Pertamina and PT Perusahaan Gas Negara decide to build separately two floating LNG terminals – CNR/48/18/20

PT Pertamina and PT Perusahaan Gas Negara (PGN) decided recently to build separately two floating LNG terminals. Pertamina's president director Karen Agustiawan said that her company and PGN would finish the projects in West Java and in North Sumatra faster if the two worked separately. "Initially we were asked to finish the projects within three years, but later on we were told that the projects must be completed within two years," Karen said. "As the consortium *Pertamina and PGN* was asked to build another LNG terminal in Medan, we then decided in our last meeting that Pertamina and PGN will share

the jobs", she added. Pertamina would focus on terminal construction in West Java, while PGN will develop the North Sumatra terminal, said Karen Agustiawan. "In the mid term, we estimate gas shortages will occur in West Java and in North Sumatra," Energi and Mineral Resources Ministry Purnomo Yusgiantoro said in March 2009. The terminal in West Java will be able to process between 200 and 400 million metric standard cubic feet per day while the terminal in Belawan will handle between 100 and 150 million metric standard cubic feet per day. The West Java terminal will supply gas for the Tanjung Priok and the Muara Karang power plants, while that in North Sumatra will supply gas to the Belawan power plant. (The Jakarta Post, July 3, 2009)

ITALY : Gas Natural obtains environmental approval for its LNG terminal project in Trieste – CNR/48/18/21

The Italian Ministry of the Environment recently approved the Environmental Impact Assessment for the liquefied natural gas regasification plant planned by the company in the port of Trieste-Zaule, in the Friuli Venezia Giulia region, in the north east of the country. The Italian government officially notified the company of the authorisation, given by the Italian Ministry of the Environment (MATT) and the Ministry of Cultural Heritage and Activities (MiBac).

The Trieste regasification terminal is an on-shore project located in the town's port and will contain two 140,000 cubic metre tanks with a planned regasification capacity of 8 bcm/year. The company reached an agreement in August 2007 with the Italian gas transport operator, Snam Rete Gas, to connect the terminal to the national pipeline network. Once final authorisation has been obtained, the facility is expected to take 40 months to construct and put into operation. (Stream press release, July 22, 2009)

NEW ZEALAND : Contact Energy and Genesis Energy postpone LNG import plan – CNR/48/18/22

The partners of the Gasbridge joint venture, Contact Energy and Genesis Energy, are putting on hold plans to build a liquefied natural gas import terminal at New Plymouth and instead are focusing on an alternative offshore LNG regasification facility. "We decided there is no pressure to push forward and lodge an application, instead we're going to sit on it and keep a watching brief on domestic gas supplies as well as keeping an eye on offshore regasification developments overseas," Genesis public affairs

manager Richard Gordon said. He said the gas supply situation had improved since Gasbridge first started investigating the economics for an LNG import terminal at Port Taranaki. When Gasbridge began in 2003, the possible date for requiring imported gas was 2012, but over recent years developments in oil and gas exploration has seen several domestic gas sources bought to market, namely Pohokura, Turangi, further Maui gas and in the second half of 2009, the Kupe gas project. Gordon said that Gasbridge currently sees a gas shortage opening up around 2018. (Upstream, July 2, 2009)

URUGUAY : Ancap launches consulting services tender for a future LNG terminal – CNR/48/18/23

Uruguay's state oil company Ancap recently launched a tender for consulting services for a future liquefied natural gas regasification plant that would service both Uruguay and Argentina, according to bidding rules. The consultant would assist Ancap on the technical side of developing the plant. "The synergies between both countries [Uruguay and Argentina] and existing gas pipeline infrastructure make installing an LNG reception and regasification terminal in Uruguay that will serve both countries very attractive," according to the bidding rules. Separately, Uruguayan state power company UTE also launched a tender for consulting services regarding the legal and contractual aspects of the LNG industry. Initial plans discussed in 2007 and 2008 for Uruguay's first LNG terminal entailed 6M-12Mm³/d capacity. Officials later said capacity could be increased to 25Mm³/d. (BNAmericas, July 2, 2009)

WORLD : Hamworthy's second onboard LNG regasification plant starts operation – CNR/48/18/24

Two of Hamworthy's onboard LNG regasification plant installations are to undergo gas trials, one on a floating storage and regasification unit (FSRU) for Brazil, the other on a shuttle regasification vessel (SRV) destined for the US. In July 2007 Hamworthy signed a contract with Golar LNG for a system comprising three LNG regasification skids to be retrofitted on the 2004-built LNG carrier Golar Winter, being converted into an LNG floating storage and regasification unit (FSRU) by Keppel Shipyard in Singapore. Chartered by Petrobras, the 138,000m³ vessel will shortly be heading for Brazil to play its part in an LNG import project located in Guanabara Bay,

where gas will be sent from Golar Winter to an onshore gas grid. Capacity per skid is 7 million m³/day; outlet pressure is 103 bar and outlet temperature up to 6°C. Two skids will be used during nominal send-out while the third is on stand-by. Suez Neptune is the first of two SRVs ordered from Samsung in South Korea for Höegh LNG to serve the Neptune terminal in Boston, Massachusetts. Gas trials are scheduled for August 2009. Hamworthy is supplying three regasification skids per ship. Each ship set will have a regasification capacity of 210 tonnes/hr of LNG with a send-out pressure of 115 bar. Gas trials will be taking place on the second Neptune SRV, Suez Cape Ann, in June 2010. (Hamworthy press release, July 22, 2009)

NATURAL GAS

EXPLORATION – DISCOVERY

EGYPT : Dana Gas reports discoveries at the Sharabas-1 and Sama-1 wells – CNR/48/18/25

Dana Gas announced recently discoveries at the Sharabas-1 and Sama-1 wells in the Nile Delta region. "The Sharabas-1 discovery, which has estimated reserves of about 28 billion cubic feet gas plus the associated condensate, tested at 7 million standard cubic feet per day of gas with 198 barrels per day of condensate. The Sama-1 discovery tested at 13 million cubic feet per day of dry gas. The estimated reserves for this find are about 48 billion cubic feet of gas and it has the potential to produce about 20 million cubic feet per day. (Reuters, August 1, 2009)

INDIA : Gujarat State Petroleum Corporation finds gas in Deen Dayal block – CNR/48/18/26

The Gujarat government, India declared recently that Gujarat State Petroleum Corporation Ltd. (GSPC) has encountered gas reserves of 10.8 trillion cubic feet in 11 of the 15 wells drilled in Deen Dayal block in the Krishna Godavari (KG) basin offshore, Andhra Pradesh. Saurabh Patel, Minister of State for Energy and Petrochemicals said the commercial exploitation of the gas will have to wait for a few years. "Chief Minister Narendra Modi had projected six years ago on the basis of studies sponsored by the GSPC, which

included 2D and 3D data analysed by experts, that the block would have 20 Tcf gas. GSPC has been able to find 10.8 Tcf after digging 15 wells. Once the entire Deen Dayal block of 1,850 square kilometers is dug up, total gas found in the KG basin might exceed 20 Tcf," the minister said. It was not revealed by the energy minister whether 10.8 Tcf has been approved by the DGH. He also did not declare how much of the 10.8 TCF gas he announced in the House is recoverable, as per DGH analysis. (Energy Business Review, June 29, 2009)

NAMIBIA : Sintezneftgaz finds gas reserves in the Kunene prospect – CNR/48/18/27

Sintezneftgaz Namibia recently made a potential gas discovery of up to 14 trillion cubic feet in the Kunene prospect offshore Namibia. The Kunene-1 well is the first ever to be drilled in Block 1711 over the Kunene prospect of the Namibe basin. Immanuel Mulunga, Petroleum Commissioner in the Ministry of Mines and Energy, said that the block could contain gas resource of up to 14 trillion cubic feet. Sintezneftgaz partnered up with Energulf Resources, PetroSA and Namibia state-owned Namcor to drill the well. "It was not possible to fully evaluate the hydrocarbon potential of the penetrated sections due to operational problems during testing. The reservoir quality of the tested zones was not very good, perhaps due to nearby igneous activity," Mulunga said. (Upstream, July 22, 2009)

NORWAY : StatoilHydro tests productivity of the shallow Peon gas discovery – CNR/48/18/28

An appraisal well has been completed by StatoilHydro on the shallow Peon gas discovery in the North Sea Part of the Naust formation; this shallow deposit contains estimated recoverable resources of 15-30 billion standard cubic metres. The main goal of the appraisal well was to test the productivity of the discovery and to qualify the well concept for a possible development. The licensees in production licence 318 are StatoilHydro, the operator with 60 per cent, Petoro with 20 per cent and Idemitsu Petroleum Norge with 20 per cent. (EnergyME, July 23, 2009)

NORWAY : StatoilHydro discovers gas at Idun North – CNR/48/18/29

Gas has been recently discovered by StatoilHydro in exploration well 6507/3-7 Idun North in the Norwegian Sea. The well is located two kilometres northwest of the Idun find and 12 kilometres north of the Skarv find. "Based on preliminary calculations, the size of the find is estimated at between 0.6 and 3 billion standard cubic metres of recoverable gas," said Knut Harald Nygård, who is

heading StatoilHydro's exploration activities near existing fields in shallow waters in the northern part of the Norwegian Sea. "StatoilHydro and its partners in the production licence will consider tying the gas find back to the production vessel for Skarv and Idun when it is in place," said Nygård. The licensees are the operator StatoilHydro with a 60 per cent interest and E.ON Ruhrgas with 40 per cent. (EnergyME, July 17, 2009)

ROMANIA : Aurelian Oil reports commercial discovery at Lilieci-1 – CNR/48/18/30

Aurelian Oil announced recently that the further testing of its Lilieci-1 well, announced as a discovery on 13 February 2009, has been successfully completed. Gas flow has been at rates up to 122 thousand m³/d. The objective was to prove up a minimum quantity of gas to justify investment in a long term production test, during which the gas would be sold. The partners in the Lilieci-1 well are Aurelian (operator) 41%, Romgaz 40% and Europa Oil & Gas plc. (Aurelian Oil & Gas press release, July 6, 2009)

RUSSIA : Gazprom begins exploration programme at Kirinskoye field – CNR/48/18/31

Gazprom started recently exploration drilling in the Kirinskoye field offshore the Sakhalin Peninsula. The start of geological exploration in the Kirinskoye field will create a new gas production area offshore Sakhalin as part of the state Eastern gas program. Starting from 2014, the Kirinskoye field will turn into a gas source for the Sakhalin - Khabarovsk - Vladivostok gas transmission system being constructed. The field will supply

gas to consumers of the Khabarovsk and Primorsky Krai and the Sakhalin Oblast. Discovered in 1992, the Kirinskoye gas condensate field is located within the Kirinsky block of the Sakhalin III project offshore the Sakhalin Peninsula (Sea of Okhotsk). The Kirinskoye field ABC1+C2 reserves account for 75.4 billion cubic meters of gas and 8.6 million tons of gas condensate. The field is slated for commissioning in 2014. (Energy Business Review, July 2, 2009)

SAUDI ARABIA : Gas found in the Empty Quarter – CNR/48/18/32

A Royal Dutch Shell and Saudi Aramco joint venture said recently that gas from two zones under exploration in the kingdom's Empty Quarter flowed at a combined rate of 90 million cubic feet per day. South Rub al-Khali Co said the two zones were located in the Arab reservoir in its fourth exploration well called Kidan-6. "One zone was flowed at a rate of 50 million cubic feet per day of gas while the other zone was flowed at 40 million cubic feet of gas per day," SRAK indicated. The gas tested "is sour ... (with) 10-25 barrels of condensate liquids per one million cubic feet of gas". (Reuters, August 2, 2009)

UNITED STATES : Occidental Petroleum discovers huge oil and gas reserves in California – CNR/48/18/33

Occidental Petroleum Corp. made recently a discovery of oil and gas reserves in Kern County, California. Oxy believes there are between 150 million and 250 million gross barrels of oil equivalent reserves within the outlined area where the company has drilled six wells to date to delineate the discovery. Approximately two-thirds of the discovery is believed to be natural gas. The multi-pay zone discovery area has both conventional and unconventional pay zones. Oxy's interest in the discovery area is approximately 80%. (Oil and Gas Investor, July 22, 2009)

PRODUCTION

ABU DHABI : ConocoPhillips and Abu Dhabi National Oil Company sign Shah gas field joint venture – CNR/48/18/34

ConocoPhillips and Abu Dhabi National Oil Company (ADNOC) signed recently the Shah Gas Field Joint Venture and Field Entry agreements to develop the Shah Gas field in Abu Dhabi. ADNOC owns 60 percent interest and ConocoPhillips owns the remaining 40 percent interest in the project. Upon receipt of the Emiri Decree, a new operating company will be formed to manage and operate the project. This large-scale project involves the development of sour natural gas and

condensate reservoirs within the Shah Gas field located onshore approximately 180 kilometers southwest of the city of Abu Dhabi. The project requires the construction of facilities including gas gathering systems, gas processing trains and product pipelines designed to process and transport one billion cubic feet per day of gas, associated liquids and sulphur. The Shah Project will include one of the largest sulphur removal plants in the world and will also include a sulphur processing and exporting facility, which will be located in Ruwais Industrial City, U.A.E. (ConocoPhillips press release, July 9, 2009)

BOLIVIA : Total files declaration of commerciality for the Itau field – CNR/48/18/35

Total announced recently that it has filed a declaration of commerciality with the Bolivian authorities for the Itau gas field. Itau is operated by Total with 75% equity. The production from this field will be transported using existing infrastructure on the neighbouring San Alberto gas field, operated by Petrobras. Itau is scheduled to start up mid-2010 and its expected production will be 50 million standard cubic feet per day. (Total press release, August 4, 2009)

CANADA : Paramount Energy Trust to shut gas production by 35,000 Mcf/d – CNR/48/18/36

Paramount Energy Trust recently said it has or soon will temporarily shut 35,000 Mcf/d of production, citing the "significant downturn in natural gas prices". The Canadian energy trust said the drop in gas prices has led it to conduct a "detailed analysis of the economic attributes of all of its properties in order to identify opportunities to preserve value through voluntary production curtailments". The trust said it will continue to monitor market conditions, but "assuming that the shut-in persists through October," its estimate of 2009 average production from July 1 would be reduced to about 160,000 Mcf/d, including the production volumes of Profound Energy. (Platts, July 22, 2009)

CHINA : Germanischer Lloyd awarded project management consultancy contract for Puguang gas field – CNR/48/18/37

Germanischer Lloyd received recently project management consultancy contract from China Petroleum & Chemical Corporation (Sinopec). Germanischer Lloyd (GL) will provide commissioning consultancy services for the gathering and processing plant for the Puguang gas field. Puguang is the biggest Chinese gas

field with high content of hydrogen sulphide and carbon dioxide. The contract is scheduled to be completed by the end of 2009. Sinopec Zhongyuan oil field is responsible for the construction and the operation of the plant. The plant consists of two units, the gathering plant and the processing plant. Total capacity of the field is 36 MNm³/day with 18% hydrogen sulphide. (EP Mag, July 24, 2009)

CHINA : CNPC aims to double gas output by 2015 – CNR/48/18/38

According to a newsletter recently published by the company, CNPC aims to double its natural gas production in seven years. CNPC said it planned to produce 120 billion cubic metres of natural gas by 2015 and 150 billion cubic metres by 2020. The company produced 61.7 billion cubic metres of natural gas in 2008. CNPC also aims to prove 400 billion cubic metres of natural gas reserves per year during the next 10 years, said Zhou Xinyuan, president of a CNPC subsidiary in Xinjiang. Another company official revealed that CNPC would bring its total natural gas pipeline to 50,000 kilometres from the current 23,000 kilometres by 2020. (Reuters, July 17, 2009)

CHINA : PetroChina plans to triple Sulige gas output by 2015 – CNR/48/18/39

PetroChina Co. said recently it plans to more than triple its annual natural gas output from the Sulige field in northern China in six years. PetroChina targets 35 billion cubic meters of annual gas production from Sulige in Inner Mongolia by 2015. The daily gas output at Sulige reached 25.58 million cubic meters in June 2009, compared with 15 million cubic meters in July 2008, China National said. (Bloomberg, July 3, 2009)

EGYPT : Sodos gas output exceeds expectations – CNR/48/18/40

Dana Gas reported recently that production from the Sodos gas field has delivered outstanding results. The Sodos field, found in the West El Manzala concession in Egypt's Nile Delta region, was discovered in February 2009, with estimated gas reserves of 20 billion cubic feet, and was tested at 11.1 million standard cubic feet per day of dry gas. It currently has two producing wells, 'Sodos-1' and 'Sodos-2', delivering at an

average daily rate of 12 mmscfd. Dana Gas Chief Executive Officer, Mr. Ahmed Al Arbeed said "The discovery of the Sodos gas field was particularly significant for Dana Gas, as it is set to push the company's production rate beyond 37,000 barrels of oil equivalent per day— its peak production rate for the first half of 2009 – compared to the 31,650 boepd on which the company's Egyptian operations ended in 2008". (EnergyME, July 11, 2009)

EQUATORIAL GUINEA : Aseng oil and gas field project gets green light – CNR/48/18/41

The Plan of Development for the Aseng oil field in Block I offshore Equatorial Guinea has been sanctioned by the operator, PA Resources and other partners as well as the Ministry of Mines, Industry and Energy of the Republic of Equatorial Guinea. Production is estimated to commence in mid 2012. Initial development of the field will include five subsea wells flowing to a floating production, storage, and offloading vessel (FPSO). The oil will be stored on the vessel until sold, while the natural gas and water will be re-injected back into the reservoir to maintain pressure and maximize oil recoveries.

The vessel will be capable of reinjecting 170 million cubic feet per day of natural gas. Over the life of the project, the operator expects to recover gross hydrocarbon liquids of approximately 100 to 120 million barrels. In addition, there is an estimated 450 to 550 billion cubic feet of gas resources at Aseng that will be produced as part of an integrated gas project in the region once the pressure maintenance phase is completed. PA Resources has six per cent working interest in Block I and the Aseng field. The Technical Operator Noble Energy has a 40 per cent participating interest, the Administrative Operator Atlas Petroleum International Limited 29 per cent and Glencore Exploration Ltd 25 per cent. GEPetrol (the national oil company of the Republic of Equatorial Guinea) has a five per cent carried interest. (EnergyME, July 22, 2009)

INDONESIA : Total invites contractors for South Mahakam Block development – CNR/48/18/42

Total invited recently contractors to bid for four tender packages to develop three discoveries in South Mahakam block, off Indonesia. Three tripods are to be installed into the East Stupa, West Stupa and East Manda oil fields. Through the 14 kilometers of 24-inch and 12-inch interconnector pipelines the tripods will be linked. A 24-inch, 80-kilometre pipeline will export the outputs from the three fields. The fabrication and installation job is likely to occur from 2010 resulting the production start-up in 2011 or 2012. The South Mahakam development is expected to yield 14,700 barrels per day of liquids and 114 million cubic feet per day of gas. (Energy Business Review, June 17, 2009)

IRAN : Indian consortium agrees to invest in Farzad B gas field development – CNR/48/18/43

Mahmoud Zirakchianzadeh the Iranian Offshore Oil Company managing director said recently that the Indian consortium has agreed to invest \$4-5 billion in the first phase of the project to extract 1.1 billion cubic feet of natural gas from the Farzad B gas field. The Indian consortium comprises the Oil

and Natural Gas Corporation's (ONGC) overseas unit ONGC Videsh, the Indian Oil Corporation, and the state-owned Oil India. Under the deal, the National Iranian Oil Company (NIOC) will have the marketing rights of the oil and gas. The Indian consortium has suggested that the natural gas extracted from the Farzad B field be processed into liquefied natural gas to be exported to India. (Tehran Times, July 26, 2009)

JORDAN : Government and BP to sign deal to develop Al-Reisha gas field – CNR/48/18/44

Oil ministry spokesman Mahmoud Al-Ais said recently that the Jordanian government and BP have agreed to develop Al-Reisha gas field near the borders with Iraq. The agreement, he said, stipulates that exploration period extends to four years. Al-Ais said if explorations proved existence of large quantities of gas, then both sides sign an agreement to carry out a comprehensive development for Al-Reisha gas field. He said quantities produced from Al-Reisha gas field were used to generate 120 megawatts, or four percent of overall electricity produced in Jordan. Officials estimated gas reserve in the field between 2-3 trillion cubic feet. (KUNA, July 5, 2009)

NORWAY : Production started at Tyrihans field – CNR/48/18/45

Total announced recently that the Tyrihans oil and gas field in the Norwegian Sea started production. This field, in which Total owns a 23.18% interest, is the largest field to be brought on stream in Norway in 2009. The field comprises the Tyrihans South deposit, which is an oil field with a gas cap, and the Tyrihans North deposit, which is a gas and condensate field.

The production from Tyrihans will be routed through a 43-kilometre pipeline to the Kristin field infrastructure for processing. The gas will be exported to European markets from Kristin through the Åsgard Transport pipeline. On the Tyrihans field, the partners are StatoilHydro (operator, 58.84%), Total E&P Norge (23.18%), Mobil Development Norway (11.75%) and Eni Norge (6.23%). (Total press release, July 8, 2009)

UNITED STATES : Marubeni announces first production at the Thunder Hawk field in the deep water Gulf of Mexico – CNR/48/18/46

Marubeni Oil & Gas (USA) Inc. (a wholly-owned subsidiary of Marubeni Corporation) announced recently that its Thunder Hawk field located in Mississippi Canyon Block 734 in the Gulf of Mexico commenced production. The field is located approximately 145 miles southeast of New Orleans, Louisiana. A semi-submersible floating production unit with production capacity of 45,000 barrels of oil per day and 70 million cubic feet per day of natural gas is being utilized. Marubeni Oil & Gas (USA) Inc. owns a 12.5% working interest in Thunder Hawk field. Co-owners in Thunder Hawk are Murphy Oil Corporation (operator) with 37.5%, Eni with 25% and StatoilHydro USA E&P, Inc. with 25% working interest. (Marubeni Corporation press release, July 9, 2009)

UNITED STATES : EIA forecasts lower gas production and demand in 2009 – CNR/48/18/47

In its July 2009 Short-Term Energy Outlook, the U.S. Energy Information Administration forecasted U.S. marketed natural gas output in 2009 would decline 0.6 percent to 58.23 billion cubic feet per day from 2008 daily rate of 58.59 bcf. "As both consumption and prices have waned amid the recent economic downturn, natural gas producers

have responded with a dramatic reduction in drilling activities," the forecast said, noting that according to Baker Hughes, total working natural gas rigs are now down 57 percent since September 2008. Consumption is expected to decline 2.3 percent in 2009 to 62.10 bcfd, down from 63.53 bcfd in 2008. The largest decline in consumption will be in the industrial sector, which will experience an 8.2 percent decline from 18.15 bcfd to 16.66 bcfd in 2009. (Reuters, July 7, 2009)

UNITED STATES : Enbridge and Chevron to construct a deepwater gas system in Gulf of Mexico – CNR/48/18/48

Enbridge Inc. signed recently letters of intent with Chevron USA Inc. to construct, own, and operate the Walker Ridge Gathering System (WRGS), providing natural gas gathering services to Chevron's potential Jack, St. Malo, and Big Foot ultra deepwater Gulf of Mexico developments. WRGS would tie production from the Chevron fields into Enbridge's Manta Ray and Nautilus offshore pipeline systems and position the company for future growth in the ultra deep Gulf of Mexico, Enbridge said. The system would include about 190 miles of 8-in., 10-in., and 12-in. OD pipeline at depths of up to 7,000 ft, transporting 100 MMcfd. (Oil and Gas Journal, August 1, 2009)

VIETNAM : Chevron, Mitsui and PetroVietnam sign agreement on field development – CNR/48/18/49

Chevron Corp., Mitsui & Co., and Vietnam Oil & Gas Group signed an initial agreement for a project to develop offshore natural-gas fields in Vietnam. Under the non-binding accord, the three companies together with Thailand's PTT Exploration & Production Ltd., will start design work for the project to develop two blocks named

B&48/95 and 52/97. Chevron's Vietnamese unit, holding a 42.38 percent stake in the B&48/95 block and 43.40 percent in 52/97, is the operator of the project, which entails production of natural gas and construction of pipelines. Commercial production is slated to begin in 2014. Estimated reserves in the joint development area overlapping the two blocks total 4.2 trillion cubic feet, according to the statement. (Bloomberg, July 25, 2009)



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