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Report says U.S. LNG must be price competitive to succeed

(RBN Energy; Aug. 17) - The U.S. over the next three to five years will become a top exporter of LNG, and may emerge as the world's leading exporter by the mid-2020s. The 12 liquefaction trains now under construction at five sites in the Lower 48 states together will have the capacity to export up to 54 million metric tons per annum, about 7 billion cubic feet of gas a day. How much more the U.S. LNG export potential can grow is covered in a report released this week by energy analytics firm RBN Energy.

The report, "LNG is a Battlefield — The Prospects for U.S. Success in Overseas Markets," said that despite gas becoming the "hydrocarbon of choice for power generation, heating and many other uses across much of the global energy market … LNG must not be cost-prohibitive." And until LNG demand grows as expected over the long term, the short-term view looks week. "A lull in demand growth — coupled with new liquefaction capacity — has bloated LNG supplies and slashed prices in the past year."

Even with low oil prices, which have dropped the oil-linked price charged for LNG under traditional long-term supply contracts, "the U.S. should remain a cost-competitive supplier to international markets," the report said. A lot will come down to price, it said. "Returns on investment in U.S. LNG export infrastructure as well as the extent of future expansion depend on price competitiveness in international markets."

Buyers' market pushes Australia LNG developer to focus on costs

(Reuters; Aug. 19) – Australia's largest independent oil and gas producer Woodside Petroleum said it has stepped up marketing for its proposed Browse floating liquefied natural gas project, but conceded it is facing a buyers' market against a backdrop of weak oil prices. "The project will need to deliver an acceptable return at the current expectations of oil pricing, meaning it needs to break even at the sorts of oil prices we're seeing in the marketplace today," CEO Peter Coleman said.

Despite some analysts expecting a delay, the company is still targeting a final investment decision on Browse in the second half of 2016, having moved into the frontend engineering and design phase this year. Woodside has been able to cut cost estimates by 20 to 30 percent for the subsea and pipeline pieces of the long-delayed project off Western Australia, which analysts previously estimated at \$45 billion when it was planned with a land-based liquefaction plant.

The partners are now focused on driving down costs so Browse can be profitable even if oil fails to rebound, and will be marketing the gas aggressively this year. One of those

partners, Shell, whose floating LNG technology is the template for Browse, recently said it was far from certain the partners would approve the project.

Gazprom faces serious challenges, including all-time low production

(Agence France Presse; Aug. 16) - Facing a cold shoulder from Europe and increased competition at home, Gazprom has struggled to assert dominance on the global energy market, prompting speculation the natural gas giant could have no choice but to splinter. With the Russian economy slipping into recession on the back of lower oil prices and Western sanctions over Ukraine, the economy ministry has predicted Gazprom would produce 14.6 trillion cubic feet of gas this year, an all-time low for the company.

Gazprom's market capitalization has crashed in recent years. Before the 2008 global financial crisis, the company was worth over \$300 billion. Its value now hangs around \$50 billion, trailing far behind other major energy companies. "Gazprom is confronted with the greatest challenge in its history," said Chris Weafer, a partner at the Macro Advisory consultancy firm. "What remains to be seen is whether Gazprom becomes an appendage of the foreign ministry or evolves into a global energy company."

Gazprom is grappling with a series of issues, including its recent loss of the Ukrainian market, Europe's energy diversification and increased competition at home. And without U.S. technology blocked by sanctions, experts fear that Russia will not be able to exploit its Far East resources that had been destined for LNG exports. "This is bad news for Russia because the production of LNG is a strategic objective in the region," said Valery Nesterov, an analyst at Sberbank Investment. Some analysts have said Gazprom could benefit from dividing into smaller entities that would be more efficient and transparent.

Gas supply a question for Canada's East Coast LNG export projects

(Globe and Mail; Canada; Aug. 17) - Two proposed liquefied natural gas projects on the Nova Scotia coast have received approval from Canada's National Energy Board to export LNG, but they are counting on U.S. producers to supply much of the gas. In that case, they likely need new pipeline capacity to move that gas into New England to provide the supply to underpin their ambitious plans. Pieridae Energy and Bear Head LNG each received Canadian approval of their gas export license late last week.

The two projects are in addition to two others proposed for Nova Scotia and New Brunswick, all of which count on Canadian and U.S. gas making it north to the proposed liquefaction plants. "The big questions are: Where is the gas going to come from, and how are you going to get it to an LNG facility," Fred Bergman, senior policy analyst with the Atlantic Provinces Economic Council, said in an interview.

Nova Scotia's offshore fields have supplied gas to Canada's Maritimes provinces and the U.S. Northeast for years, but will begin a steep decline later this decade unless

companies develop new gas reserves. Another option for the LNG plants is Spectra Energy's plan to build a new gas pipeline from the prolific Marcellus Shale field in Pennsylvania to New England, where it can be moved into Nova Scotia. But that project has run into stiff opposition in Massachusetts.

Oman struggles with growing domestic demand vs. LNG exports

(Platts; Aug. 18) - Over the past two years, Oman has quietly expanded the number of countries to which it exports LNG to well beyond those with which it has long-term supply contracts. In a state that needs increasing volumes of gas to fuel its oil and heavy industrial sectors, this raises far-reaching questions about energy strategy and allocation of gas resources to exports vs. domestic needs.

Oman's government two decades ago saw LNG exports as an important means of diversifying the economy and moving state revenues away from a heavy dependence on oil exports. A total of 10.4 million metric tons per year of LNG production and export capacity was developed, with plants commissioned in 2000 and 2005. Oman signed long-term supply contracts with Japanese, South Korean and Spanish buyers, which in some cases were also the project shareholders.

Oman planned to negotiate additional contracts with new customers, predominantly in Asia. However, industrial expansion and rampant population growth in Oman, as elsewhere in the Arabian Peninsula, meant that securing domestic gas supply quickly trumped exports as a government priority, leaving the LNG plants significantly underutilized. In 2011, senior government officials suggested that at least one of the plants might be decommissioned once the long-term supply contracts expire.

Top LNG carrier owners join up to market short-term charters

(Reuters; Aug. 18) - Three of the world's top liquefied natural gas carrier owners have decided to market 14 vessels jointly on a spot-charter basis, part of a new pooling arrangement aimed at cutting operating costs in a depressed market. The pool, consisting of eight modern vessels from Norwegian shipper Golar LNG and three each from Gaslog, headquartered in Monaco, and Dynagas, based in Greece, will commence chartering operations in September, a statement from Gaslog said Aug. 18.

A glut of newly built LNG vessels emerging from shipyards in Asia has been one factor driving down daily charter rates to around \$30,000 per day, compared with \$130,000 two years ago. "The LNG Carrier Pool allows the participating owners to optimize the operation of the pool vessels through improved scheduling ability, cost efficiencies and common marketing," the statement said. The vessels will seek employment exclusively for charters of 12 months or less.

The move reflects a growing LNG market shift toward short-term trading of cargoes as prices come under pressure and new production from Australia and the United States is expected to add to oversupply. "The real driver primarily is the fact that we are seeing the short-term shipping market growing substantially. In the year to date there have been 97 short-term vessel fixtures versus around 78 in 2014," said Gaslog CEO Paul Wogan. "It's becoming a much more important piece of the (LNG) shipping market."

LNG spot market in Asia back up to \$8

(Platts; Aug. 18) - The Platts LNG Japan-Korea Marker for September deliveries averaged \$8.007 per million Btu July 16 – Aug. 14, up 8.3 percent from August, the highest month-on-month gain so far this year, on renewed buying interest and waning availability of spot cargoes in Asia. It was the highest monthly average price since February, when it was \$9.911. However, it's the seventh consecutive month that prices have hung around \$7 to \$8 since falling from the \$9-to-\$10 level in January-February.

With northeast Asian end-user demand still tepid and Indian importers reluctant to pay more than \$8, the market appeared to have hit a ceiling. Even with the slight boost to \$8, year-on-year the marker for September deliveries was down 25.2 percent compared with the average price a year ago at \$10.702.

B.C. communities want share of energy project revenues

(Globe and Mail; Canada; Aug. 17) - The indirect cost of workers commuting to energy-sector jobs has prompted 21 local governments in Northwest B.C. to band together and press the province for a greater share of project revenues. Representatives met in Terrace, B.C., on Aug. 15 to formalize the Resource Benefits Alliance. Stacey Tyers, the group's chairwoman, said workers used to move their families into northwestern B.C. towns for new projects but now most people fly in and out for a job.

"[Workers] use our services, they impact our social systems while they're here. They use our hospitals ... but there's no contribution to the community in that regard," said Tyers, who is also chairwoman of the Regional District of Kitimat-Stikine. She said the "unprecedented" agreement between communities empowers them to work on their shared goal of funneling provincial cash from energy projects back to the communities.

The alliance wants a commitment based on a percentage of project profits, and they've given themselves three months to get the province to start negotiations. The alliance calculated a 3 percent revenue share would produce \$1 billion to cover infrastructure, mitigate social impacts and develop a legacy fund. The communities have amassed an infrastructure deficit of \$500 million, Tyers said, as workers stretch capacity to the limit for roads, sewers and water but take their wages back to their home communities.

B.C. LNG hopeful starts site evaluation work

(North Coast Review; BC; Aug. 18) – Chinese-owned Nexen Energy has taken another step in the early days of its proposed liquefied natural gas export terminal on Digby Island, in front of Prince Rupert, B.C., with its provincial application to begin evaluating the site for potential development. The Aurora LNG project applied Aug. 5 to the B.C. Ministry of Forests, Lands and Natural Resources for an investigative-use license for geotechnical and geophysical studies.

If approved, the first phase of work would occur before the end of September, with the second phase to continue through the end of the year. Nexen would set up a temporary staging area for the work, transporting crews and equipment to the site by water taxi, boat, barge or helicopter.

The project has been estimated at about \$20 billion to build a plant with capacity of 10 million to 12 million metric tons per year. Nexen has talked of making an investment decision on the project in 2017. The company has started its application process with the B.C. environmental assessment office. In addition to Nexen holding a 60 percent stake, two Japanese companies hold 40 percent of Aurora LNG. The proposal is one of almost 20 LNG hopefuls looking at supplying B.C. gas to overseas markets.

Oregon community debates LNG project workforce housing camp

(The World; Coos Bay, OR; Aug. 17) – The North Bend (Ore.) planning commission has extended the public comment period on Jordan Cove LNG's workforce housing camp application an additional 10 days. Following the commission's contentious hearing July 20 on the conditional-use permit for the housing camp, city staff received an abnormally large amount of written testimony. They weren't able to get it all online until late Aug. 14, and the commission unanimously agreed Aug. 17 to keep the record open until Aug. 27.

After that deadline, Jordan Cove will have until Sept. 3 for its rebuttal. The commission will meet Sept. 21 to issue a decision, which could be appealed to the North Bend City Council. Meanwhile, the community debate continues. Boost Southwest Oregon members turned out Aug. 17 to support the project. "This area was built on industry, not on tourism. And I love tourism, it's really great if we can survive on that, but it's industry that builds this city, so I'd just like to see more of it," said Bruce Payne, of Coos Bay.

The anti-LNG crowd also showed up, ready to make their case against the housing camp for the proposed liquefied natural gas plant and export terminal. Simpson Heights resident Ron Wiggins questioned the city sewer system's ability to take on the camp with almost 1,900 workers.

Santos on target for September start-up of Australia LNG plant

(Sydney Morning Herald; Aug. 18) - Santos has marked a major milestone at its \$18.5 billion liquefied natural gas project in Queensland, Australia, that firms up its start-up target for around the end of September, but its shares softened further as the market remained preoccupied by funding concerns and the weak oil price. Santos reported that it had introduced coal-seam gas into the first LNG production unit at its GLNG project on Curtis Island in Gladstone, signaling the huge project is within weeks of start-up.

It will now move to start up the pre-treatment units for the gas, then chill down the liquefaction units to start making LNG. Santos CEO David Knox said the upstream coalseam gas fields are now "fully operational," while the plant is the final stages of commissioning. Construction at the flagship project has been underway for the past 4½ years. At full production, the plant will be capable of making 7.8 million metric tons of LNG per year. Partners include Malaysia's Petronas, Korea Gas and France's Total.

Israel reaches deal for development of offshore gas field

(Reuters; Aug. 16) - Israel's Cabinet Aug. 16 approved a deal with a U.S.-Israeli consortium that would move forward development of the huge Leviathan offshore gas field. The controversial deal reached late last week, which Prime Minister Benjamin Netanyahu believes will bring Israel several billion dollars in the coming years from development of Leviathan and two smaller fields, still needs parliamentary approval.

The deal will allow Texas-based Noble Energy and Israel's Delek Group to keep ownership of the largest offshore field, Leviathan, with an estimated 22 trillion cubic feet of gas. In return for retaining their stakes in Leviathan, the two companies are required to sell off other assets, including stakes in another large deposit called Tamar. Critics of the plan said the government gave into most of the companies' demands and left Noble and Delek with too much power by controlling most of Israel's gas reserves.

Israel, which has gone from an energy-dependent country to a potential gas exporter, currently receives its gas for electricity generation from Tamar, which began production in 2013. Leviathan is slated to begin production in 2018 or 2019 and expected to supply billions of dollars of gas to Egypt and Jordan in addition to supplying Israel. As part of the deal, the companies agreed to invest \$1.5 billion in the next two years toward developing Leviathan, and also agreed to lower domestic gas prices for several years.

U.K. to open areas for fracking; opponents vow 'hundreds of battles'

(The Guardian; UK; Aug. 18) - Large areas of Yorkshire, the northwest and the east Midlands are to be opened up to fracking after the British government announced it will offer a fresh round of licenses for oil and gas exploration, covering 1,040 square miles. Areas near Leeds, Sheffield, Lincoln and Nottingham are to be offered to companies in

an expansion plan that green groups predicted would trigger "hundreds of battles" over the future of the countryside.

Ineos, the Anglo-Swiss chemicals group that wants to lead the U.K.'s shale gas industry, was awarded three licenses and said the latest ones could pave the way for gas to be pumped by 2020. The applications are subject to approval by local councils, which will have 16 weeks to decide. The government promised last week to step in if councils fail to keep to the deadline.

The government's promise to fast-track shale gas in the U.K. comes on the back of strong opposition by environmental groups and a decision by the Lancashire county council to reject an application by exploration firm Cuadrilla on the grounds of visual impact and noise. Both Scotland and Wales previously imposed moratoriums on fracking for shale gas.

EIA lowers its U.S. oil forecast to \$49 this year, \$54 in 2016

(U.S. Energy Information Administration; Aug. 19) - Amid high uncertainty in the global oil market, the U.S. Energy Information Administration has lowered crude oil price forecasts in its Short-Term Energy Outlook, expecting West Texas Intermediate crude to average \$49 per barrel in 2015 and \$54 in 2016 — \$6 and \$8 lower than forecast in last month's energy outlook.

Concerns over the pace of economic growth in emerging markets, continuing (albeit slowing) supply growth, increases in global oil inventories, and the possibility of increasing volumes of Iranian crude oil entering the market contributed to the changed forecast, the EIA said.

Pennsylvania looking at more revisions to oil and gas rules

(Pittsburgh Post-Gazette; Aug. 18) - Pennsylvania environmental regulators are making a list of items they want to see in another major revision to the state's oil and gas rules, just as they near the end of a contentious rule-drafting process that will have taken half a decade when it is finished next year. In an Aug. 12 conference call to announce the final rules package for aboveground oil and gas activities, Department of Environmental Protection Secretary John Quigley cast his comments repeatedly toward the future.

"This is not the end of the process," he said. "There is more study needed on additional measures, and there will be more rule-making in a separate process, to ensure responsible drilling and protection of communities, public health and the environment." Regulators gave few details about what the next round might hold, but they signaled some areas. Quigley said the agency will release more information about the potential scope of the next regulatory package, probably between October and December.

Rules to control noise from well sites — which the department drafted then dropped from the current package, calling them "premature" — might become part of a future regulation after the agency develops a best-practices guide, state officials said. Quigley said the agency is "looking in particular at public health protections" as it compiles a list for the next regulatory package "because that is certainly one of the areas of biggest concern." One source said air quality issues would be covered in the next round.