

Oil and Gas News Briefs

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[China warns of gas supply shortages this winter](#)

(Reuters; Oct. 19) - China has ordered state oil and gas companies to speed up the construction of pipelines to move natural gas to homes and factories, underscoring worries that the country's insufficient infrastructure could cause power outages during the peak winter-demand period. This winter, millions of homes across the colder northern regions of the world's second-largest economy will be heated for the first time by gas rather than coal, as part of Beijing's effort to boost clean-fuel use.

But with just a month before newly installed radiators get switched on, the National Development and Reform Commission warned on Oct. 19 that supply-and-demand conditions could be "serious" this winter. The alert shows Beijing is trying to head off supply disruptions during the peak demand period. Residential users will have priority over industrial users, increasing the possibility of power losses during gas shortages.

"We are all quite concerned with supply shortages this winter ... as we may not have the infrastructure capacity to catch up with the demand growth," said Li Wei, of Kunlun Energy, which operates liquefied natural gas import terminals in China. Wood Mackenzie estimates that heating needs alone will add 350 billion cubic feet to China's gas demand this year. The country is expected to use about 8 trillion cubic feet.

China will need to ramp up imports or industrial consumers may get interrupted, warned Kerry Anne Shanks, head of Asia gas and LNG at consultants Wood Mackenzie. "We (also) worry that China doesn't have enough storage." China has only 280 bcf of gas storage capacity, about 4 percent of its demand — much less than other regions like the U.S. and Europe that typically store 15 percent to 25 percent of annual needs, she said.

[Algeria plans move away from long-term gas sales contracts](#)

(Platts; Oct. 17) - Algeria's Sonatrach is looking to create joint ventures with trading companies for the marketing of its gas as the state-owned firm moves toward a new sales strategy, CEO Abdelmoumen Ould Kaddour said Oct. 17. Speaking at the Oil & Money conference in London, Ould Kaddour said new deals with traders would not be priced on an oil-indexed basis and would not be long term — a shift away from the company's long-standing marketing strategy.

"We're trying to find new ways of exporting our gas and looking at having joint ventures with traders and taking risk together," he said. "It's no longer oil indexation or long-term

contracts." Algeria is a key gas supplier to southern Europe, particularly Italy and Spain, and also delivers liquefied natural gas to global markets. Algeria last year exported about 1.3 trillion cubic feet of gas by pipeline, and 560 billion cubic feet as LNG. The country has been an LNG exporter since 1977.

The new marketing approach reflects the risk of changing gas supply/demand dynamics, especially in Europe, Ould Kaddour said. "Supply-demand is a risky business, so we are looking at a new strategy to deal with this. ... Traders will be part of demand [in the future], so we definitely need to look at new ways of doing business."

Yemen LNG shutdown continues after 2½ years

(National Yemen; Oct. 17) - This weekend marked two and a half years since Yemen LNG declared force majeure in mid-April 2015, shutting down the plant in the Middle East nation torn apart by civil war. Yemen LNG stopped all production and exports, evacuated most of its staff, and said arrangements were in place to protect the Balhaf liquefaction site. The plant opened in 2009 and, at full capacity, its two trains could produce 6.9 million tonnes of liquefied natural gas per year. The project cost \$4.5 billion.

French oil and gas major, Total, Yemen LNG's technical leader and principal 39.62 percent shareholder, declined to provide an update of the shutdown. Other partners are U.S.-based Hunt Oil, state-owned Yemen Gas and a Yemenese pension fund, and South Korea corporations Hyundai, Korea Gas and SK Corp. Yemen LNG's output was sold under long-term contracts to KOGAS, Total, and French energy company Engie.

The loss of revenue is tangible for Yemeni state and private entities as rival Saudi and Iranian-backed forces continue to fight for control of the country. "In Yemen there are no winners on the battlefield. The losers are the Yemeni people who suffer by this war," Ismail Ould Cheikh Ahmed, U.N. Secretary-General special envoy for Yemen, told the U.N. Security Council on Oct. 10.

Indonesia, Japan to cooperate on LNG-fueled, at-sea power plants

(Japan News; Oct. 15) - The Japanese and Indonesian governments will research a plan to provide power to Indonesian islands with ships that generate electricity using liquefied natural gas. The advantage of LNG-fueled power-generating ships is that they can set up and go to work quickly. The Japanese government anticipates growing demand from island nations in the Asia-Pacific region and hopes to export the new infrastructure to such countries, sources said.

According to Japan's Economy, Trade and Industry Ministry, this would be the first-ever instance of full-scale LNG power generation at sea. Japan and Indonesia could sign an agreement and create a public-private working group to study the idea in detail as early as this week, sources said. The goal is to put the plan into practical use within a few years. Indonesia has more than 13,000 islands, and many smaller islands rely on diesel to generate electricity, which is a problem due to cost and greenhouse-gas emissions.

The governments are considering deploying the ships to about a dozen islands in eastern Indonesia that have poorly developed electricity networks, sources said. The ships would be equipped with LNG storage tanks and generating turbines. Each would be able to provide a stable electricity supply of up to several tens of thousands of kilowatts. LNG would be delivered by tankers from storage depots in Indonesia. The total cost of the project is estimated to be around \$2 billion. On the Japanese side, funding could come from government-managed financial institutions and other sources.

China places its largest LNG carrier into service

(Chinanews.com; Oct. 16) – The Pan Asia, China's largest liquefied natural gas carrier, was put into service in Shanghai on Oct. 15. With a length of 951 feet and a width of 154 feet, it is similar to an aircraft carrier in size and is now China's largest LNG carrier. "This tanker showcases the peak of China's shipbuilding technology," said Huang Guoliang, manager of the Pan Asia project.

The tanker can carry almost 3.8 billion cubic feet of natural gas as LNG. "We're building three more of this type," Huang said. South Korea is the long-time world leader in LNG carrier construction, though China wants to grab a bigger share of the market. Of 134 LNG tankers built since 2009, 100 were built in South Korean shipyards, 20 by Chinese companies and 13 by Japanese yards, according to a 2015 report by shipping-data provider IHS Maritime.

Patience — and LNG exports — paid off for Cheniere investors

(New York Times; Oct. 16) – Every few days, a 900-foot-long tanker leaves Cheniere Energy's \$18 billion Sabine Pass terminal on Louisiana's Gulf Coast, loaded with liquefied natural gas for destinations around the world. Hydraulic fracturing helped drillers extract vast quantities of oil and gas from once-inaccessible shale formations in the past decade, and soaring LNG exports of that gas is changing how the fuel is priced around the globe and opening new markets overseas for U.S. drillers.

While Cheniere is the only LNG exporter from the continental U.S., more are coming. For Cheniere, and for the broader global LNG market, it's a remarkable turnaround.

Sabine Pass had originally been built as an LNG import terminal, but with domestic prices falling and overseas demand rising a decade ago, executives realized the gas needed to go out, not come in. At the time, Cheniere's stock was trading at less than \$3 a share, and the company had \$2 billion in debt and only \$50 million in cash on hand.

The company convinced foreign companies like Britain's BG Group (acquired by Shell last year) to sign long-term contracts for LNG cargoes, reassuring lenders and bond investors that exports would pay off. "People thought they were crazy, but ... Cheniere reinvented themselves," said Faisal Khan, an analyst at Citigroup. Tens of billions of dollars in investment later, it's working. In addition to Sabine Pass, Cheniere will open a facility in Corpus Christi, Texas, in 2019. The two plants will cost a combined \$30 billion. Cheniere's bet has paid off for patient investors. Its stock now trades at \$47 a share.

Rival gas producer does not expect an end to Gazprom monopoly

(Platts; Oct. 18) - The CEO of Russia's Novatek does not expect Moscow to lift Gazprom's monopoly on Russian pipeline gas exports any time soon. Leonid Mikhelson said Oct. 17 that Novatek "won't waste time" on lobbying the Kremlin for a change in policy. Speaking at a press briefing in London, Mikhelson said Novatek would welcome a move to end the monopoly, which currently allows only Gazprom the right to export gas via pipelines. But he said this was not a likely scenario at present.

"I can't say we're not interested, but at the current stage the issue is irrelevant," he said. "We won't get a positive result, so we won't waste our time on this." Instead, Novatek is focused squarely on starting and growing its LNG exports with the first train of its Yamal LNG plant in the Russian Arctic set to ship its initial cargo before the end of 2017.

Speculation has mounted in the past two years that the Kremlin was considering lifting the Gazprom monopoly for pipeline exports — especially via the planned Power of Siberia route to China. But analysts believe Moscow is concerned about a fall in the European gas price should it liberalize exports and create a potential flood of Russian gas onto the market. In the search for new customers, there is always the possibility that rival Russian exporters could undercut Gazprom and sell gas at a discount.

Gazprom will try LNG-fueled trains in Arctic gas production region

(The Independent Barents Observer; Oct. 13) - Russia's far northern Yamal Peninsula could soon get one of the first LNG-fueled railways in the world. Gazprom, the owner and operator of the Yamal railway line, has decided to introduce the new locomotives. Company subsidiaries GazpromTrans and Gazprom Gazomotornoye Toplivo this month

signed an agreement that paves the way for the innovative technology in the heavily developed gas production region.

The deal, signed during the St. Petersburg Gas Forum, also includes a plan to build a small-volume LNG production complex near Obskaya, a rail junction south of the Yamal Peninsula, as well as a facility for LNG refueling. The 350-mile railway line opened in 2011 in connection with Gazprom's development of the Bovanenkovo gas field.

LNG-fueled locomotives will make the Yamal line unique in international railway traffic. The technology is under testing several places but has not yet been introduced in commercial traffic. Transmashholding, Russia's leading builder of rail cars and locomotives, has developed an LNG-fueled locomotive that currently is under testing.

Haynesville Shale gas output climbs past 7 bcf a day

(Dow Jones Newswires; Oct. 17) - One of the early centers of American shale drilling is roaring back to life, boosted by new petrochemical and fertilizer plants, and liquefied natural gas export terminals along the Gulf Coast. The Haynesville Shale, a giant field in northwest Louisiana, was one of fracking's hottest spots a decade ago. But it fizzled out about five years ago as gas prices plunged and drillers focused on finding oil in Texas.

Now, the Haynesville is being reborn as companies with longstanding positions and newcomers rush in and drill. Haynesville output has risen more than 20 percent so far this year, to more than 7 billion cubic feet a day, according to the Energy Department. The number of rigs active in northern Louisiana and the Texas portion of the field has more than tripled in the past year to 44, said oil field services company Baker Hughes.

"The Haynesville is where it began," said Frank Patterson, Chesapeake Energy's vice president of exploration and production. The company has been learning how to get more gas by drilling and fracking longer wells, Patterson told investors this month. Chesapeake, which now produces more than 1.2 bcf of gas a day in the Haynesville, plans to ramp up efforts to re-frack old wells where production is starting to peter out to squeeze more out of them, using newer technology. A new report by the U.S. Geological Survey estimates the Haynesville and Bossier shales contain more than 300 trillion cubic feet of gas, up from roughly 70 tcf in its last survey in 2010.

Study shows Alberta may be underestimating methane emissions

(The Canadian Press; Oct. 17) - New research suggests industry and government are badly underestimating Alberta's emissions of one of the most potent greenhouse gases. The difference between official estimates and the measured results suggests the

province's energy industry could have to double its planned methane emission cuts if Alberta is to meet its promised 45 percent reduction.

"A lot of eyes are going to be really wide when they see the comparison," said Carleton University's Matt Johnson, author of the study published in Environmental Science and Technology. "If we thought it was bad, it's worse." Currently, industry is only required to report how much methane it estimates is released during flaring and venting. Johnson's study is the first to use aerial flyovers of oil and gas fields to actually measure released methane, a greenhouse gas about 30 times more powerful than carbon dioxide.

In Lloydminster, Alberta, the airborne tests found the type of heavy-oil recovery used in that area released 3.6 times more methane than previously thought. That same heavy-oil technique is widely used elsewhere in Alberta. If methane emissions from those other regions are equally underreported, Johnson said, Alberta could be underestimating releases of the gas by as much as 50 percent. Ottawa and Alberta have pledged to reduce methane emissions by 45 percent of 2012 levels by 2025.

[Judge allows pipeline protestors to argue climate-change defense](#)

(The Associated Press; Oct. 17) - A Minnesota state judge has taken the unusual step of allowing four protesters to use a "necessity defense," enabling them to present evidence that the threat of climate change from Canadian oil sands crude is so imminent they were justified in trying to shut down two Enbridge pipelines last year. Emily Johnston and Annette Klapstein freely acknowledge they turned the emergency shut-off valves on two pipelines Oct. 11, 2016, in northwestern Minnesota.

It was part of a coordinated action by Climate Direct Action activists to shut down five pipelines that carry Canadian oil to the U.S. in Minnesota, North Dakota, Montana and Washington state. A total of 11 activists were charged. Johnston and Klapstein, who are from the Seattle area, said Oct. 17 that as far as their legal team knows, this is the first time a judge has allowed a full necessity defense on a climate-change issue.

"It looks like we're going to be able to bring in all our experts and present our evidence of how dire climate change is, so we're pretty excited about that," Klapstein said. Michael Foster, of Seattle, was convicted Oct. 6 of targeting the Keystone pipeline in North Dakota. His judge barred him from using a necessity defense. He now faces up to 21 years in prison when he's sentenced Jan. 18. Johnston and Klapstein are due to go on trial Dec. 11 on felony charges of criminal damage to critical public service facilities.