

# Oil and Gas News Briefs

## Compiled by Larry Persily

### December 3, 2018

#### **First Nation approves benefits agreements for LNG project in B.C.**

(Vancouver Sun; Nov. 29) - It wasn't an easy decision for the Squamish First Nation to approve the C\$1.6 billion Woodfibre LNG project 35 miles north of Vancouver, B.C., according to a spokesman, but it came with potential benefits of cash and land. The First Nation council approved three economic benefits agreements last week — one each with Woodfibre LNG, pipeline company FortisBC and the province, “contingent on the environmental conditions being met,” according to a news release Nov. 29.

The 40-year agreements include cash totaling C\$225.65 million, 1,600 short-term and 330 long-term jobs, business opportunities, and land transfers of almost 1,100 acres. “Communities are sometimes faced with difficult decisions and it is recognized that this was a difficult decision for many,” said Squamish Councillor Khelsilem, whose English name is Dustin Rivers. “As agreed by the proponents, we will be co-developing management plans for the project and will have our own monitors on the ground to report on any non-compliance with cultural, employment, and training conditions.”

Work is expected to start next fall at the former pulp mill site. At full operation, the plant will be capable of making 2.1 million tonnes of LNG per year. The money will be paid to the First Nation at project milestones, including the start of construction and start of operations. Other payments will go toward a cultural fund for the Indigenous community and training and education programs. The land will go to housing and economic development. The agreements also call for businesses owned by the First Nation or its members to compete for project contracts.

#### **Global LNG trader signs up for offtake from LNG Canada**

(Reuters; Nov. 29) - LNG Canada, the C\$40 billion liquefied natural gas export terminal that will be built in Kitimat, B.C., has bagged another customer after project shareholder Petronas signed an initial sales deal with global trading house Vitol. Petronas, the Malaysian oil and gas company that bought a 25 percent stake in the Shell-led project in May, will supply Vitol with 800,000 tonnes per year of LNG starting in 2024 for 15 years, Vitol said in a statement.

Vitol joins Tokyo Gas, Toho Gas, and Korea Gas as buyers of LNG Canada supplies, committing to take a combined total of about 2.4 million tonnes from the 14 million tonnes of capacity.

Such long-term agreements normally underpin project financing and are critical before a final investment decision is taken. But because Shell and partners Petronas, PetroChina, Mitsubishi, and Korea Gas are such large players in the LNG market, they can absorb the output into their global portfolios without needing to find significant third-party buyers in advance. They decided this fall to proceed with the project before signing up specific offtake customers.

### **Petronas outlines plans to supply gas for LNG Canada project**

(Alaska Highway News; Fort St. John, BC; Nov. 28) - Petronas Canada plans to accelerate its drilling program in northeastern British Columbia, boosting its spending to \$1 billion a year by 2022. The company, formerly Progress Energy, has been in a holding pattern since 2016 after spending three years appraising what proved to be more than 200 trillion cubic feet of gas reserves in its North Montney shale holdings. The company, owned by Malaysia's Petronas, had worked toward building a liquefied natural gas export terminal near Prince Rupert, B.C., but scrapped those plans in 2017.

However, Petronas in May bought a 25 percent stake in the Shell-led LNG Canada project in Kitimat, B.C., which the partners this fall approved for construction. About 63 tcf of Petronas' reserves are recoverable with today's technology, and 7 tcf will be committed to supply the LNG Canada project in Kitimat, Nicole Deyell, vice president of development at Petronas Canada, told the Fort St. John, B.C., chamber of commerce. That works out to about 700 million cubic feet of gas per day for almost 30 years.

The company spent \$5 billion proving wells in the Montney between 2013 and 2016, and was the most active driller in B.C., accounting for roughly one-third of all wells. Petronas now plans to build more slowly, with two rigs to drill 30 wells and boosting spending to just under \$500 million in 2019. By 2022 it plans to have up to six rigs in the region drilling up to 80 wells, with spending reaching \$1 billion.

### **Russia and China find common interest in energy issues**

(CNBC; Nov. 29) - As Russia's relationships with the West become increasingly fragile amid ongoing economic sanctions, Moscow continues to look toward China for economic opportunities — and energy is one area where that relationship is flourishing. "The relations between the Russian Federation and People's Republic of China are on the rise," President Vladimir Putin said in a welcome message at a Russian-Chinese Energy Forum in Beijing on Nov. 29.

One of the largest energy projects linking Russia and China is an ambitious 2,000-mile pipeline being built by gas giant Gazprom that will run from gas fields in Eastern Siberian to the Chinese border. Gazprom is not the only Russian company building in

the country's Far East. Sibur, Russia's largest gas processing and petrochemical company, is also looking to benefit from the push, having partnered with Gazprom to build a gas chemical complex near the Chinese border along the new gas pipeline.

The relationship between China and Russia is "very unlikely to deteriorate in the foreseeable future," according to Alexander Gabuev, senior fellow and chair of the Russia in the Asia-Pacific Program at the Carnegie Moscow Center. The "two authoritarian regimes understand each other well," he said. "The Kremlin doesn't fully trust China, but it knows that the national interests of both countries coincide in many areas and that China will be a predictable and pragmatic partner for years to come. By contrast, Moscow sees U.S. leaders as unpredictable and untrustworthy."

### **Trade war, U.S. sanctions bring Russia, China closer on energy**

(S&P Global Platts; Nov. 29) - Russian and Chinese officials said Nov. 29 they want to promote growing energy cooperation in response to political risks. Russia-China energy cooperation has grown in recent years. Initially based on Russia's extensive energy resources and proximity to the growing Chinese market, U.S. sanctions against Russia and the trade war between China and the U.S. are stimulating this cooperation further.

"Amid the politics of unilateral action and trade protectionism, strengthening Russia-China energy cooperation is extremely important for jointly securing energy security," China's first deputy prime minister Han Zheng said on the sidelines of the first Russia-China energy business forum. Rosneft CEO Igor Sechin echoed this sentiment. "The nature of the developing political situation, the strengthening of protectionism, and the threat of trade wars in the global economy are additional incentives to work more closely together and take decisions more quickly," he said.

Russia and China have significantly increased their energy cooperation in recent years, signing new oil and gas supply contracts and agreeing to cooperate on upstream projects in Russia. Sechin listed the East Siberia-Pacific Ocean oil pipeline, Power of Siberia gas pipeline and Yamal LNG as key areas of development. He sees oil and gas projects offshore in the Arctic and the Russian Far East, as well as further development of shipping via the Northern Sea Route as potential growth areas for cooperation.

### **Future of Russian pipeline gas deliveries to China a big unknown**

(Montel; Nov. 29) - A new Russian natural gas pipeline to China will curb the country's appetite for liquefied natural gas imports, having a ripple effect on global markets since China's surging demand had led to LNG price spikes, experts said Nov. 28. "The cost of this pipeline gas will be very competitive compared to LNG imports," Yanyan Zhu,

general manager of trading at China National Offshore Oil Corp., said on the sidelines of the CWC World LNG Summit conference in Lisbon.

Russia is expected to start deliveries to China via the Power of Siberia pipeline in December 2019, with two more pipelines proposed but far from certain. If all three are built, they could move up to 3.5 trillion cubic feet of Russian gas per year into China, far exceeding the volume of LNG imports into the country which have grown substantially in recent years to meet rising demand. But how quickly will Russian pipeline deliveries ramp up, how high will the volume go?

“Will they increase 10 billion cubic meters (350 billion cubic feet) per year? Or will they reach 38 billion cubic meters (1.3 trillion cubic feet) in two years? We don’t know, but the trend we’ve seen recently [in terms of LNG] ... will not continue,” said Thierry Bros, senior researcher in Oxford Institute for Energy Studies. Russia will clearly have a “crucial role” to play in meeting China’s gas import demand, the institute said.

## [LNG deliveries by truck booming in China](#)

(Bloomberg; Nov. 28) - So you want in on China, the world’s fastest-growing natural gas market? It would have been virtually impossible last decade. The only gas seen in China was pumped from its own wells and sold at prices strictly regulated by the government. Today things are vastly different as China has become the world’s biggest importer. Its battle against smog by replacing coal furnaces has caused demand for cleaner-burning gas to explode, pushing up prices above state-controlled rates.

Amid the surge in consumption and imports, new trading methods have emerged that reflect supply and demand in ways inconceivable under tight pricing controls that dominated the market. The future of cost-efficient gas trading in China may evolve from a decidedly primitive mode of transportation: trucks. Since the 1990s China has super-chilled domestic gas into liquid, put it in tanker trucks, and sent it to filling stations to fuel everything from taxis to 18-wheelers. Now the truck-delivered volume is booming.

Those trucks have found a massive new market in recent years as China forced homes and factories to switch from burning coal, boosting gas demand quicker than pipelines can be built to support it. Trucks delivered about 12 percent of China’s total gas supply last year, Wood Mackenzie estimates. All that trucked supply is sold outside the government’s regulated pricing scheme. Buyers and sellers negotiate deals on WeChat and other platforms. Trucked LNG sells for about 4,500 yuan (\$650) a tonne, about two-thirds higher than the government-set benchmark Shanghai city-gate rates.

## [Yamal LNG starts production at third train](#)

(Montel News; Nov. 29) - The third liquefaction train at Yamal LNG is loading its first cargo one year ahead of schedule, which will boost spot shipments to the global gas market, said Mark Gyetvay, deputy chairman of Russian gas producer and plant operator Novatek. The quick start-up means Novatek and its partners will be able to send out more spot-market cargoes for at least a year, he said.

The third train has capacity to make 5.5 million tonnes of LNG per year, the same as the first two units that went into service in 2017 and 2018. The third train will be able to sell its LNG into the spot market until April 2020, when its long-term commercial contracts take effect. The spot volumes will drop after that as 96 percent of supply is committed to long-term contracts, Gyetvay said.

In addition, Yamal's output has exceeded its nameplate capacity, making more supply available for the partners to sell on the spot market. Yamal LNG is owned by Novatek with a 50.1 percent share, by Total and China National Petroleum Corp. each with 20 percent, and by China's Silk Road Fund with 9.9 percent. Novatek is planning a second Arctic LNG project to start up in 2023.

## [U.S. criticizes ship-to-ship Russian LNG transfers in Norway](#)

(Reuters; Nov. 30) – Allowing ship-to-ship transfers in Norwegian waters from the Yamal LNG project in Russia's Arctic undercuts Europe's energy diversification efforts, the U.S. State Department said Nov. 30. By transferring LNG to more conventional carriers offshore Norway, the costly Yamal ice-breaking LNG carriers can return to the terminal to reload more frequently, increasing Russia's gas exports.

Last week the first such transfer took place off the Norwegian Arctic port of Honningsvåg. "At a time when Russian gas comprises a growing proportion of Europe's energy imports, additional volumes of Russian gas will undercut Europe's energy diversification efforts," the U.S. State Department told Reuters. Russia condemned the U.S. position. "Such statements are a definitive example of resorting to political instruments for the sake of unfair competition, (and) direct infringement of trade freedom principles," the Russian embassy in Oslo said in a statement.

The U.S. has been pressing Europe to cut its reliance on Russian gas and instead buy more expensive U.S. LNG, which many European countries, including industrial heavyweight Germany, have so far resisted. Norway, Europe's second-largest supplier of gas after Russia, said it was not concerned by the ship-to-ship transfers. "Europe has a well-functioning gas market. The ship-to-ship transfers of Russian LNG in northern Norway are a commercial project," the Norwegian Ministry for Oil and Energy said.

## **Russia ready to start LNG imports for isolated region**

(S&P Global Platts; Nov. 30) - Russia's Gazprom Neft is gearing up to start operations at the Kaliningrad floating import, storage and regasification terminal, the country's first such facility, with an LNG carrier on its way with a commissioning cargo. The facility underscores the dependence of specific regions on seaborne gas for energy security and diversification from pipelines. It also highlights how floating regas systems are becoming key in meeting gas demand due to their flexibility in deployment.

Russia holds the largest gas reserves in the world. But like most large countries, energy supply to niche regions can become a logistical nightmare. In the case of Kaliningrad, the region is a Russian exclave with a population of about one million bordering Poland and Lithuania but is not connected by land to greater Russia. Kaliningrad's gas demand is increasing from four new combined-cycle gas power turbines. Flows in the current gas pipeline from Russia are at times close to capacity, but instead of increasing the pipeline capacity Kaliningrad chose LNG to supply the additional gas demand.

Gazprom will locate the floating import terminal on the coast of the Baltic Sea, connected to the existing pipeline near an underground gas storage facility, making it possible to supply more gas to local consumers and feed the storage facility. This will make the enclave self-sufficient in gas in case of any disruptions to the pipeline.

## **German power producer signs first U.S. LNG contracts**

(Bloomberg; Nov. 29) - Germany's biggest power producer RWE plans to buy more U.S. liquefied natural gas after signing two short-term contracts this year in a strategy to bulk up and diversify its sources of the fuel. RWE agreed on supplies of U.S. LNG for the next couple of years and is negotiating longer-term agreements, said Andree Stracke, the chief commercial officer at the company's trading unit.

The U.S. is eager to sell more gas to Germany with President Donald Trump repeatedly calling on Europe to buy American LNG. "We are building up a worldwide, significant portfolio of LNG," Stracke said. "This year we have signed two contracts for U.S. LNG. One contract is for one year, the other one is for two or three years." Stracke declined to provide details of the transactions. "Will this LNG arrive in Germany? No, because we don't have a terminal. Will it arrive in Europe? Maybe," Stracke said.

RWE, with offices in the U.S. to Mumbai and Shanghai, traded about 6 million tonnes of LNG in 2017, which was about 2 percent of the global market. An LNG import terminal has been proposed in Germany, but it won't open until 2022 at the earliest. RWE pledged earlier this year to buy LNG from the terminal on Germany's northern coast, but the utility will only invest in capacity at the facility if it can get long-term purchasing contracts, such as the ones it's seeking from U.S. suppliers, Stracke said.

## **Fast-growing LNG market not without its problems**

(Bloomberg; Nov. 29) - Liquefied natural gas is the fastest-growing fossil fuel but market participants saw clouds on the horizon when they met on the first day of the CWC World LNG Summit in Lisbon. Dropping oil prices and a perceived economic slowdown are a challenge for the natural gas and LNG industry, said Eric Bensaude, managing director at Cheniere Marketing, which has LNG export terminals in Louisiana and Texas.

Falling crude prices make oil-linked LNG supply contracts cheaper, which makes it more difficult for U.S. LNG suppliers to compete with their prices linked to the cost of gas supplies in the U.S., Bensaude said adding, "We have to remain competitive." More worrisome is that while China has led LNG demand growth, those increases are becoming less certain.

China this fall imposed a 10 percent tariff on U.S. LNG, and China's industrial demand for gas has started to decline to avoid the higher costs of last winter, said Yanyan Zhu, general manager of the trading department at China National Offshore Oil Corp. Gas & Power. Longer term, China's LNG imports face increasing pressure from cheaper pipeline gas from Russia and from government support for domestic gas production. "In the future when the government is encouraging domestic production and pipeline gas is coming, I think the role of LNG will be reduced to some extent," Zhu said.

## **India struggling to replace coal with natural gas**

(Bloomberg; Nov. 30) - India's drive to clean up some of the world's worst air by burning more natural gas appears to be faltering. Despite an overall rise in gas use over the past three years, infrastructure, government policies, weak domestic production, and competition from coal have conspired to keep the fuel's share of the total mix stagnant. Prime Minister Narendra Modi has struggled to curtail pollution that the non-profit Health Effects Institute estimates contributed to the deaths of over 1.1 million Indians in 2015.

After coming to power in 2014, Modi's government set a target to more than double the share of gas in the energy mix to 15 percent by 2030. But after peaking just above 10 percent six years ago, it has slid back toward 6 percent. Abundant coal supplies help the fuel dominate the nation's power industry, accounting for 56 percent of its primary energy. "The market is price sensitive and cheap coal still poses a challenge to gas consumption," said Kaushik Chatterjee, senior analyst at Wood Mackenzie, adding that the 2030 target seems achievable if some infrastructure and policy issues are resolved.

India's own natural gas production peaked about eight years ago, hampered by low prices set by the government. Meanwhile, imported liquefied natural gas, which now accounts for about half of India's gas consumption, has no price restrictions, making it costly to consumers. In addition, India lacks sufficient gas distribution pipelines. India must fast-track new gas infrastructure, Wood Mackenzie's Chatterjee said. The higher

cost of imported gas means India used barely a quarter of its nearly 25 gigawatts of gas-fired generation capacity, as the plants cannot compete with electricity from coal.

### **Panama Canal decision to allow more LNG traffic helps U.S. exporters**

(Houston Chronicle; Nov. 30) - New rules allowing more liquefied natural gas carriers to pass through the Panama Canal each day are expected to boost development of the multibillion-dollar LNG export industry on the U.S. Gulf Coast. The rules went into effect last month. The canal now allows two LNG carriers traveling in opposite directions to be in the waterway's central lake at the same time. The canal opened to LNG traffic in June 2016, but administrators had limited carriers to one per day during daylight hours.

Jorge Barakat, minister of maritime affairs for the Panama Maritime Authority, said as many as four to five LNG tankers now have passed through the canal in a single day. Barakat was in Houston for Panama Week Texas, an annual event to promote business ties between the state and Central American nation.

The new rules come ahead of the U.S. LNG industry's expansion. Cheniere Energy has emerged at the canal's top customer among LNG exporters, moving cargoes from its Sabine Pass terminal in Louisiana to customers in Asia. Cheniere moved 62 shipments through the canal last year. Cheniere's Corpus Christi LNG terminal is expected to load its first cargo within days or weeks, and Freeport LNG in Brazoria County, Texas, is set to begin shipments in 2019, as is Sempra Energy's Cameron LNG project in Louisiana.

### **Japan's nuclear power plant industry slowly coming back**

(U.S. Energy Information Administration; Nov. 28) – Of the more than 50 nuclear power plants that were operating in Japan before the 2011 Fukushima disaster shut down the entire industry, nine are back in operation, six have received initial approval to restart, 12 are under review, nine have not yet filed applications to resume operations, and 20 have been permanently retired from service. The most recent restart at Shikoku Electric is the fifth to go back to work in 2018, joining four others that already were in operation.

The restart of Japan's nuclear power plants requires the approval of Japan's Nuclear Regulation Authority and the central government, as well as consent from the governments of local prefectures. In July 2013, regulators issued more stringent safety regulations to address issues dealing with tsunamis and seismic events, complete loss of station power, and emergency preparedness.

The suspension of Japan's nuclear fleet resulted in significantly greater dependence on liquefied natural gas, oil, and coal imports to make up for lost nuclear generation. In 2017, natural gas accounted for nearly 37 percent of Japan's electricity generation,



followed by coal at 33 percent. Japan's utilities spent about \$30 billion each year for additional fossil fuel imports in the three years following the Fukushima accident.

### **Alberta orders oil production cutback in effort to boost prices**

(Reuters; Dec. 2) - Alberta Premier Rachel Notley said Dec. 2 that the province would order temporary oil production cuts to deal with a pipeline bottleneck that has led to a glut of crude in storage and driven down Canadian oil prices. The government will force producers to cut output by 8.7 percent (325,000 barrels per day) until the excess crude in storage is drawn down. The cuts will then drop to 95,000 barrels per day until Dec. 31, 2019. There are 35 million barrels in storage in Alberta, twice the normal level.

"When markets aren't working, when companies are forced to sell our resources for pennies on the dollar, we must act," Notley said in a live public address on Facebook. Alberta estimates that current production outstrips pipeline and rail capacity by 190,000 barrels per day. The production cuts, to be applied by producer rather than per project, will be implemented starting in January.

The discount on Western Canada Select heavy blend hit a record at \$52.50 below the West Texas Intermediate benchmark last month, which meant producers were getting about \$14 a barrel compared with about \$67 for WTI. It has since narrowed slightly as the WTI benchmark price has fallen and crude by rail volumes has ramped up. The province said the curtailment would narrow the differential by at least \$4 a barrel. There will be penalties for non-compliance, but no specifics were given. Notley said last week her government was moving ahead with plans to buy about 80 locomotives and 7,000 rail cars to boost crude-by-rail capacity by 120,000 barrels per day by mid-2020.

### **Province ready to buy rail tank cars to move more oil**

(The Canadian Press; Nov. 29) - Alberta needs to buy as many as 7,000 rail cars if it wants to meet its goal of shipping an additional 120,000 barrels of oil a day, said Premier Rachel Notley. In a speech to the Toronto Board of Trade on Nov. 29, Notley said her province is prepared to buy about 80 locomotives, with each train pulling 100 to 120 tank cars. The extra capacity will allow the province to transport 30 percent more crude by rail than current volumes.

She said the plunging price of oil has reached a "crisis" point for her province and her government is prepared to make the rail purchase on its own, with or without the federal government's help. "Alberta will buy the rail cars ourselves to move this oil," she told the group of business leaders. "And we're not wasting any time." Notley anticipates a deal will be announced in a few weeks, noting that the costs to government will be recouped through higher oil royalties and selling the new shipping capacity.

She did not estimate the cost but industry experts said a rail car can cost \$120,000 to \$150,000 to buy, or about \$1,200 per month to rent, putting the plan at upwards of \$1 billion. Notley said it is a stopgap solution to Alberta's depressed oil prices. "Don't mistake me, this is not the long-term answer. New pipelines are the long-term answer." A lack of pipeline capacity has knocked down prices paid to producers.

## **Germany's last hard-coal mine will close in December**

(Bloomberg; Nov. 30) - After following his father and grandfather into the pits of Germany's Ruhr valley, Andreas Schreiter's family tradition will end when the country's last hard-coal mine — the 150-year-old Prosper-Haniel site — shuts down in December. The 46-year-old still has the first lump of "black gold" he dug himself in 1991. The mine was the last holdout of two centuries of deep-mining history but can't survive after the government pulled the plug on 1 billion euros (\$1.1 billion) in annual subsidies.

Shuttering the site is especially bitter for the community because Germany will need to burn coal for decades to come. But instead of supporting families in the Ruhr Valley, the coal will be shipped in from places like Russia, the U.S., and Colombia. Though environmental policies call for an end to coal, hard coal and its softer cousin lignite still generate more than one-third of Germany's electricity needs. Closing all of the country's 120 coal-fired power plants may take more than 20 years, according to the government.

Chancellor Angela Merkel's government sealed Germany's exit from coal production in 2007. Propping up coal mining has cost Germany some 40 billion euros since 1998 and continuing those payments have become untenable as the country struggles to meet targets to reduce greenhouse gas emissions. Utilities, however, argue that the most polluting fossil fuel is critical to maintain the stability of the power grid and limit price increases in a country that already has the highest energy costs in Europe. Wind, solar, and other renewables are even more subsidized than coal mining.

## **South Koreans vote against coal power plants**

(Interfax Global Energy; Nov. 27) - Taiwan will not build any more coal-fired power plants after 76 percent of voters in a referendum Nov. 24 opposed expansion of the country's coal-fired generating capacity. The government had previously considered building about 1 gigawatt of new coal-fired power capacity by 2025 to help counteract the phase-out of 5 gigawatts of nuclear power. State-owned Taiwan Power Co. said it will respect the results of the advisory vote on the coal plant issue.

The referendum asked: "Do you agree that Taiwan should establish an energy policy that undertakes not to construct any new coal-fired power plants or generators or

expand existing facilities?" Voters also cast their ballots by almost a 3-to-2 margin against the government policy of phasing out nuclear power by 2025. However, a government spokesperson said the goal to make Taiwan nuclear-free by 2025 remains unchanged. The Ministry of Economic Affairs' 2025 renewable target shows 20 gigawatts coming from solar photovoltaic panels and 5.5 gigawatts from offshore wind.

## **Oil and gas companies will partner on carbon-capture project**

(Reuters; Nov. 28) - Six major oil and gas companies announced plans Nov. 28 to study the development of Britain's first commercial carbon capture, storage, and use facility around an industrial zone. The feasibility study comes under the investment arm of the Oil and Gas Climate Initiative (OGCI), which seeks to develop low-carbon solutions for the industry, one of the world's biggest polluters.

BP, Italy's Eni, Norway's Equinor, Houston-based Occidental Petroleum, Shell, and France's Total formed a strategic partnership, the OGCI Climate Investments said in a statement. The Clean Gas Project in Teeside, in northeast England, will capture carbon dioxide emitted from a power plant fired by natural gas. Industrial complexes in the area also will be able to capture and store CO<sub>2</sub> they emit.

The compressed CO<sub>2</sub> will be transported by pipeline for storage in a formation under the southern North Sea. It also could be used by companies requiring CO<sub>2</sub> for their oil production, according to the OGCI. The statement did not include a timeline or cost estimate for the project. Carbon capture, storage and use is seen as a key technology to reach the U.N.-backed goals to limit global warming to fight climate change.