# Oil and Gas News Briefs Compiled by Larry Persily May 22, 2017

# China could use U.S. LNG to squeeze better prices from Qatar

(CNBC; May 19) – A deal to encourage China's purchase of more U.S. liquefied natural gas could break Qatar's grip on LNG pricing — even if no additional U.S. supplies ever reach the Asian powerhouse. Last week, the U.S. Commerce Department said it had reached an agreement with Chinese authorities that would see Beijing give state-owned and private companies a green light to negotiate long-term deals with U.S. exporters. The mere prospect of China buying more U.S. LNG could upend the global market.

It would give the world's biggest buyers — Japan, South Korea and China — more leverage in negotiations with top supplier Qatar and other big players. That could in turn shift prices paid for LNG across the world. In Asian markets, most LNG is sold under long-term contracts, with prices indexed to oil. Those contracts can be renegotiated, and the deal between Beijing and Washington could loom large in future negotiations, said Benjamin Salisbury, senior energy policy analyst at FBR Capital Markets.

Chinese companies "don't have to import any U.S. LNG," he said, "they just have to have that sledgehammer in their pocket when they go to negotiate their other contracts." Salisbury believes Beijing's real goal is to break Qatar's monopoly over setting Asian LNG prices. To be sure, Qatar has already seen that monopoly erode, said Massimo Di-Odoardo, head of global gas and LNG research at energy research firm Wood Mackenzie. The Qataris have been forced to renegotiate some contracts in light of the global oversupply, falling Asian LNG prices and new competition.

### BP continues investment shift toward gas, CEO tells shareholders

(LNG Journal; May 18) - BP Chief Executive Bob Dudley said the first pillar of the company's strategy recognizes that oil and gas will be important for decades, assuring shareholders at the company's annual meeting in London that BP has a portfolio with development options for higher-margin and lower-cost production of oil and gas. He listed several projects, including a floating liquefied natural gas production venture to be anchored offshore West Africa and LNG and gas ventures in Indonesia and Egypt.

"The cleaner-burning properties of gas mean it is going to be increasingly important as an energy source and we are already shifting our portfolio further toward gas," he said. BP has formed a partnership with Dallas-based Kosmos Energy "to develop prolific gas discoveries off the coasts of Mauritania and Senegal in West Africa," Dudley said. "Just last week, we announced a huge new discovery in this province." The new discovery adds to an earlier find and further underpins prospects for an LNG project in the basin.

Dudley told BP investors the company was pressing ahead with the expansion of major LNG and gas projects in Tangguh in Indonesia and Khazzan in Oman, as well as Egypt. "We set out in 2017 with plans to deliver on seven major projects, six of which are gas projects, supporting that shift to gas in the portfolio," he said. BP's strategy also includes increased competitiveness with advanced fuels for cars, trucks and planes; promoting low-carbon activities; and continuing to simplify and modernize BP from top to bottom.

# South Korea's move away from coal could be good news for LNG

(Nikkei Asian Review; May 18) - Liquefied natural gas exporters will be excited by the prospects of state-backed Korea Gas returning to the buyers' table following moves by newly elected South Korean President Moon Jae-in to shift the country's power mix from coal to gas to reduce air pollution. South Korea's LNG imports peaked at 39 million tons in 2013 and have been declining since. But Moon's proposed energy policy would boost the share of LNG in the power mix from about 20 percent to 37 percent by 2030.

"Given plans for the early retirement of coal, we could really see LNG imports accelerate post-2020," said Chong Zhi Xin, principal Asian LNG analyst at energy consultants Wood Mackenzie. The return of KOGAS as a strong buyer could enable developers to invest in new export projects around the world, he said. Since taking office May 10, Moon has ordered 10 older coal-fired power plants out of 59 in operation to shut down in June. Coal supplies 45 percent of the country's power needs.

Higher South Korean demand will hearten LNG producers in Brunei and Malaysia, where supply contracts expire in 2018, said Tony Regan, managing director of Asian oil and gas consultancy DataFusion Associates in Singapore. Gordon Kwan, head of Asian oil and gas research at Nomura, a Japanese financial company, said it would make strategic sense for South Korea to source more LNG from the U.S., especially given the cost efficiencies achieved in the production and export of shale gas in recent years.

Historically, demand from Japan and South Korea, the world's biggest LNG buyers, underpinned many of the world's major export projects. But in recent years, as demand has wavered, buyers have been reluctant to make new long-term commitments.

### China wants to triple gas consumption by 2030 to reduce emissions

(Nikkei Asian Review; May 19) - China looks to triple its natural gas consumption by 2030 and equip more power plants to burn the relatively cleaner fossil fuel, helping the country meet its ambitious emissions-reduction targets. The government aims for a

supply of more than 22 trillion cubic feet of gas by that year, which means more than doubling annual domestic gas production over the same period to almost 11 tcf a year and quadrupling pipeline and LNG imports to reach the same 11 tcf supply target.

Much of the increased demand will come from replacing coal with natural gas in power plants and industrial boilers in China's polluted cities. China will outstrip the European Union and Russia to become the world's second-largest gas consumer behind the U.S., according to projections from BP. This shift in energy usage is part of China's plan to meet its commitments under the Paris climate agreement.

Companies such as state-owned Sinopec will bolster exploration in China's Interior and increase shale gas output. A pipeline network for moving gas from Turkmenistan and elsewhere in Central Asia will be expanded in 2020, and a new pipeline between Russia and China could begin operating in 2019. The country will also boost imports of liquefied natural gas. China had 15 LNG terminals at the end of 2016, with capacity to import 50 million tonnes a year. The plan is to double capacity to 100 million tonnes in five years.

### LNG export terminal on Chesapeake Bay almost 90% complete

(LNG Journal; May 19) - Dominion Energy has completed almost 90 percent of the work on the Cove Point LNG export plant on Chesapeake Bay in Maryland, scheduled to be the second Lower 48 liquefaction and loading terminal to come online after Cheniere Energy's plant in Sabine Pass, La. Dominion said its export terminal is on track for a start-up date in late 2017, with capacity of 5.25 million tonnes per year. Liquefaction equipment is being added to the 39-year-old, underutilized LNG import terminal.

"There are currently more than 3,200 construction workers on site," the company said in its update to federal regulators on the \$3.8 billion project. "All of the major equipment has been set in place and now the focus is on completing the installation of piping, cable trays, cables and cable terminations." Dominion has fully subscribed the plant's output capacity. It has 20-year agreements with a Japanese joint-venture comprising Sumitomo, one of the world's leading trading companies, and Tokyo Gas. GAIL India also has a 20-year contract with Dominion to pay for liquefaction capacity at Cove Point, though GAIL is looking to trade those cargoes for LNG produced closer to home.

### U.K. will need more LNG imports as largest gas storage shuts down

(Bloomberg; May 18) - For the first time in more than three decades, natural gas traders, utilities and producers are preparing for a winter without the U.K.'s biggest storage facility. With Centrica's North Sea Rough storage site almost empty after its wells deteriorated, the U.K. is set to lose a quarter of its daily supply capacity during the

winter as well as its ability to quickly respond to short-term swings in demand. At full capacity, the operation provided about 70 percent of the U.K.'s gas storage.

Britain will import more fuel, which may be costly and create opportunities for traders and producers, as well as boost business for smaller storage sites. The shutdown of Rough, a depleted North Sea field run as a storage site since 1985, will impact the U.K. economy through more volatile energy prices during the peak winter season and increase the reliance on liquefied natural gas tankers that can take weeks to arrive.

The halt also offers Russia an opportunity to strengthen its grip on deliveries to Europe, which faces declining local output and production caps at the region's biggest field at Groningen in the Netherlands. "It definitely generates more risk in the winter and increases a bit Europe's dependence on LNG," said Didier Magne, head of European gas at commodity trader TrailStone U.K. "We know that Rough is highly unlikely to return, we know that Groningen is going to reduce production by a further 10 percent."

### Strong growth in Canada's Montney shale production

(Bloomberg; May 18) - Drilling rigs and roughnecks are hot commodities once again across the Montney shale formation in northern British Columbia and Alberta, and companies like Grimes Well Servicing are having a hard time keeping up with demand. That's because the Montney, unlike many parts of Canada's oil and gas region, is seeing a surge of investment three years after the worst energy slump in decades.

During the first four months of 2017, the number of wells drilled jumped 80 percent from a year earlier to 277, according to Calgary-based Grobes Media. It's the most for the period since 2014. Grimes started noticing a pickup in November and December as more customers put in urgent orders for equipment. The Montney contains about 449 trillion cubic feet of marketable gas, Canada's National Energy Board estimated in 2013. The formation also contains 14.5 billion barrels of gas liquids.

Exploration is roaring back because energy prices have stabilized at levels that look profitable. But the slump left idle equipment, making it cheaper to drill. A new well now costs about \$5(Canadian) million, down from \$8 million in 2014, according to energy consultants Wood Mackenzie. The Montney was dubbed the "Permian of the North" because it has the same layered, stratified geology as the Texas shale formation that led a resurgence in U.S. oil production. But unlike the Permian, which yields mostly crude, the Montney is rich in gas and associated liquids such as condensate.

With investment and drilling on the rise, the Montney's daily gas production will jump to 7 billion cubic feet by 2019, compared with 4.9 bcf a day now, said Wood Mackenzie. Condensate, oil and gas liquids will grow to 470,000 barrels a day from 250,000 barrels.

# Oil and gas industry in strong bargaining position with governments

(EnergyWire; May 18) - The end of this decade looks promising for international oil and gas companies, said executives gathered in Houston for this week's annual meeting of the Association of International Petroleum Negotiators. The oil-price bust was painful, but the survivors are poised to thrive in the buyer's market for drilling prospects that's coming. This wasn't evident when companies were cutting payrolls and struggling to avoid bankruptcy. But those with a longer view said new technologies, horizontal drilling and hydraulic fracturing in the U.S. make the business profitable even at current prices.

The technology curve is expected to only bend more favorably for companies moving forward to 2020. Meanwhile, advances in seismic surveying, shale oil extraction and deepwater offshore drilling will open up a vast number of new areas for exploration, and companies will have their pick. They are likely to direct their investments to areas with stable, friendly governments and transparent rules and regulations, analysts predict.

When oil was \$100, governments could set the terms, but no longer. Efforts by Mexico, Brazil, Iraq and other oil provinces to sweeten the terms for investors is no accident, said Robert Johnston, president of the Eurasia Group, a global risk management firm. The change is a common one seen during oscillations in oil prices, he said. When the price is high, governments can be more demanding and extract more of the wealth from drilling. When prices are low, governments wishing to entice drillers must deliver.

Anadarko CEO Al Walker said the industry has stronger bargaining power than before. He sees this condition lingering, arguing that prices are unlikely to return to new heights anytime soon, and governments seeking investment will come to understand this.

### Australian gas producer looks to boost output for domestic market

(Bloomberg; May 14) - Missing out on Australia's LNG export boom may be the best thing that happened to Arrow Energy. The decision by the Shell and PetroChina joint-venture to scrap a \$20(Australian) billion project to liquefy and ship gas overseas looks like a blessing. The producer now plans to boost output, profiting from tighter supply and better prices at home. Meanwhile, rivals that opted to export are grappling with cost overruns, low LNG prices and mounting criticism of a domestic gas shortage.

"They're probably thanking their lucky stars they didn't go ahead with Arrow LNG," said Graeme Bethune, CEO of EnergyQuest, an Adelaide-based research company. Australia's race to become the world's biggest seller of LNG has put it on course for a supply crunch at home amid lower-than-expected domestic production and drilling bans in several states. Solving the budding crisis has become a top priority for Prime Minister Malcolm Turnbull, whose government last month said it would restrict gas exports. Arrow, owner of the largest uncontracted gas reserves in eastern Australia and supplier of about 20 percent of Queensland's gas, has begun engineering and design work on an expansion of its Tipton project that will more than double its output. The gas, which is extracted from coal beds, will be sold for domestic consumption and available for use in export projects, Arrow said.

### Protestors arrested at LNG plant construction site in Tacoma, WA

(The News Tribune; Tacoma, WA; May 17) - Five people who chained themselves to drilling equipment at the construction site of Puget Sound Energy's liquefied natural gas production, storage and fueling depot in the Port of Tacoma, Wash., were arrested May 17. The protesters were removed from the equipment and will be charged with malicious mischief, trespassing and obstruction, a Tacoma Police spokeswoman said.

One of those arrested was city council candidate Sarah Morken, a socialist who is running for the council's open at-large position. The protest was organized by Tacoma Direct Action, which organizes non-violent direct action and civil disobedience to make demands associated with social, economic, environmental and racial justice issues, said spokeswoman Claudia Riedener. "The whole thing was to draw public awareness ... [of] such a huge plant so close to the public and industry," said protester Steven Storms.

About 50 people gathered outside the construction site. The 33-acre property is owned by the port and leased to Puget Sound Energy, which is building a \$310 million facility to produce up to 250,000 gallons a day of LNG for storage for high-demand days by area utilities and for use as a marine fuel, in particular by TOTE Maritime that is converting its Alaska ships to run on LNG. Puget Sound Energy plans to start up the plant in 2019.

### Shift to electric cars could cut demand for gasoline in Asia

(Reuters; May 12) – Gasoline demand in Asia may peak much earlier than expected as millions of people in China and India buy electric vehicles during the 2020s, threatening wrenching change for the oil industry, oil and auto company executives warned. They said refiners should prepare for a future in which gasoline will be much less of a cash cow. Change is being prompted by policies in India and China, where governments are trying to rein in pollution and cut oil imports.

The two countries also want to compete for a slice of the fast-growing green car market. China said last month it wants alternative-fuel vehicles to account for at least one-fifth of the 35 million annual vehicle sales projected by 2025. India is considering even more radical action, with an influential government think-tank drafting plans in support of electrifying all vehicles in the country by 2032, according to government and industry sources interviewed by Reuters late last week.

"We will see a clear shift to electric cars. It's driven by legislation. ... it's not a niche anymore," said Wilco Stark, vice president for strategy and planning at German car maker Daimler. Stark and other executives were interviewed at the Asia Oil & Gas Conference this week. Daimler sees electric vehicles contributing 15 to 20 percent of its overall sales by 2025. Electric cars currently are less than 2 percent of the global fleet, and any faster-than-expected growth will impact oil demand and the refining business.

### Oregon utility drops plan for new gas-fueled power plants

(The Oregonian; Portland; May 12) - Portland General Electric has suspended efforts to permit two new natural gas-fueled power plants at a site in Boardman, about 150 miles east of Portland, saying it is in negotiations to potentially acquire existing electricity-generating resources instead. The company had initiated the permitting process to be ready if the plants were selected as the least-cost, least-risk option in an upcoming competitive bidding process for new generation capacity.

The company had forecast it would need more than 800 average megawatts of new capacity by 2021 — power plants that were not weather dependent. The move prompted significant blowback from environmental groups that don't want the utility to replace the coal-fired plant it plans to shut in 2020 with another fossil fuel resource. Ratepayer advocates and independent power producers were also critical of the effort, saying the utility was looking to manipulate the competitive bidding process.

Opponents asked the company to look at other options rather than locking itself into a 30- to 40-year investment in new plants. The company has since reduced its forecast of future needs by 71 megawatts, secured a 10-year contract for 135 megawatts of hydropower, and executed contracts for 52 megawatts of power with independent producers. The utility is negotiating to acquire more capacity from existing resources.

### Alberta will loan industry \$235 million for cleanup of abandoned wells

(Calgary Herald; May 18) - The Alberta government will loan an industry group \$235 million to accelerate the cleanup of oil and gas wells left behind by bankrupt producers after a prolonged downturn crippled many operators. The industry-funded Orphan Well Association will use the loan to clean up a third of its inventory of inactive sites, which could translate into remediating about 700 wells.

The group will repay the loan through higher levies from industry, while a \$30 million injection from the federal government is expected to cover interest costs. Speaking on a farm north of Calgary where a company had walked away from a well three years ago, Alberta Premier Rachel Notley said the funding addresses a big industry problem. She

said the funding deal is in line with the government's polluter-pay philosophy, which means the industry that benefited from production must be responsible for the cleanup.

Alberta has seen rising numbers of abandoned wells dotting the landscape during the oil and gas industry downturn, driving up the inventory in need of cleanup to nearly 2,100. The Orphan Well Association charges industry an annual levy to cap and seal old wells and return the landscape to a natural state, but the \$30 million yearly budget has not been enough to keep up with demand. The group plans to increase spending to \$60 million in the 2019-2020 fiscal year, which means oil and gas companies will have to pay more as the industry grapples with the mess left by bankrupt operators.

### Report recommends Arctic shippers move away from heavy fuel oil

(Global Trade; May 18) - A report by the International Council on Clean Transportation finds that using heavy fuel oil in Arctic shipping creates such greater risks compared to the cost of moving to safer fuels that transitioning to the safer fuels is the only rational action for ship operators. The report, sponsored by the European Climate Foundation, finds the shipping fleet would achieve significant financial and environmental benefits if it moves from heavy fuel oil to alternatives such as liquefied natural gas or distillates.

Heavy fuel oil is referred to as a "residual fuel" because it is the leftover residue from the crude oil refining process. It's a tar-like sludge that breaks down extremely slowly in cold Arctic waters and is close to impossible to clean up in the event of a spill. It powers 44 percent of the ships currently operating in the Arctic, the report said. LNG evaporates if spilled, but ships must undergo costly conversion to use natural gas. Distillate fuel costs more than heavy fuel oil but is less expensive to clean up in the event of a spill.

"Heavy fuel oil may be cheap, but it's seven times more expensive to clean up than distillate fuel. It seems prudent, therefore, to seriously consider eliminating it in the Arctic," said report co-author Bryan Comer, a researcher for the International Council on Clean Transportation's Marine Program. "The takeaway is that any short-term financial benefits of burning heavy fuel oil in Arctic waters is completely outweighed by the economic and ecological risks of using it."