Oil and Gas News Briefs Compiled by Larry Persily April 20, 2017

Papua New Guinea LNG out-produces capacity, expansion possible

(Platts; April 19) - Papua New Guinea LNG continued to operate well above nameplate capacity the first three months of this year and has ample feed gas to sustain the strong production levels while discussions to increase plant capacity will take place later in the year, project partner Oil Search said April 19. The plant operated at an annualized rate of 8.3 million metric tons per year during the quarter, 20 percent above the nameplate capacity of 6.9 million tons, said Australian-listed Oil Search, a 29 percent equity holder.

National and local Papua New Guinea elections are due to take place early this summer. Oil Search said it will discuss its expansion plans with the new government. "We look forward to working with the new government when it is formed in August, with discussions regarding LNG expansion expected to be high on the government's agenda." RBC Capital Markets analyst Ben Wilson said that once the election is over, there is expected to be "rapid progress" toward a formal structure for expansion.

PNG LNG is a two-train integrated project operated by ExxonMobil, which has a 33.2 percent interest. Other partners are Australia's Santos (13.5 percent), National Petroleum Co. of PNG (16.8 percent), JX Nippon Oil & Gas Exploration (4.7 percent), Mineral Resources Development Co. (2.8 percent), as well as Oil Search (29 percent).

Conoco will look at expansion of 11-year-old Australia LNG plant

(Reuters; April 19) – ConocoPhillips and its partners are considering expanding the capacity of their Darwin liquefied natural gas plant in northern Australia, with backing from other companies with undeveloped gas resources that could feed the 11-year-old facility. ConocoPhillips had previously talked only about developing a new gas field for around \$10 billion to fill the plant's single production unit, or train, when supply from its current gas source, the Bayu-Undan offshore field, runs out in about 2022.

Conoco had previously said a plant expansion in the current market would be challenging due to low oil and LNG prices, and costs that have risen steeply since Darwin LNG was built more than a decade ago. However, a \$650,000 feasibility study of building a second train is due to be completed this year, Australia's Northern Territory government said April 19, announcing it would contribute \$250,000 toward the study.

"The Territory Labor Government is supporting the feasibility study because this is a significant investment toward the business case for potential expansion at Darwin LNG,

potentially creating thousands of jobs during construction and operation," Northern Territory Chief Minister Michael Gunner said. Five joint ventures with undeveloped offshore gas resources are backing the study, with stakeholders that include Shell, Malaysia's Petronas, Italy's ENI and Australia's Santos and Origin Energy. Darwin LNG is owned by ConocoPhillips, Santos, Japan's Inpex, ENI, Tokyo Electric and Tokyo Gas.

Iran boosts gas output; likely to consume most of it domestically

(Bloomberg; April 16) - Iran, holder of the world's biggest natural gas reserves, has boosted its output by inaugurating six projects at the giant South Pars offshore field. The country raised the total production capacity at South Pars to 20 billion cubic feet of gas per day, putting it almost on par with neighboring Qatar, which produces from an adjacent portion of the same deposit, Iranian Oil Minister Bijan Namdar Zanganeh said April 16. Iran invested \$20 billion to complete the six projects, or phases.

Iran is on track to out-produce Qatar, the world's biggest exporter of liquefied natural gas. Iranian officials want to gain market share for gas shipments and attract foreign investment. Even so, Iranians won't have much gas to export because they are likely to use most of the new production themselves. Half of Iran's gas goes to warming homes, with the rest used mostly to generate power and for industrial demand. New production can barely keep up with domestic needs, and consumption almost doubled to 6.75 trillion cubic feet of gas in 2015 from 3.6 tcf in 2005, according to BP statistics.

Qatar announced earlier this month that it was ending a 12-year ban on new projects at its section of the shared field. Qataris call their part of the deposit the North Field, which together with South Pars forms the world's largest reservoir of non-associated gas. Iran has no plans to interfere with Qatar over its activities at North Field, Zanganeh said. "They can carry out their development projects as we do ours," he said. "We do our job and let them do theirs."

Australia continues to struggle with LNG exports vs. local gas needs

(Reuters; April 19) - The Australian government said it is "encouraged" by steps taken to avert a gas crisis after meeting April 19 with producers and the country's energy market operator, but it held out the threat of regulatory steps to address any supply shortages. Australia's energy market operator and East Coast liquefied natural gas exporters updated Prime Minister Malcolm Turnbull on measures taken since a March meeting to discuss a domestic gas crunch expected to emerge from 2019.

The government "remains concerned that the East Coast export LNG operators have not yet clearly articulated how Australian households and businesses will get adequate supply at reasonable prices," Turnbull said. The Australian Energy Market Operator

warns of a gas shortage to hit eastern Australia just as the country becomes the world's top LNG exporter. At least one of the LNG plants, Gladstone LNG, is drawing gas out of the domestic market to help meet its export contracts.

Due to shortages from its own fields, the project will buy more than 20 percent of the gas available this year on the East Coast, said energy consultancy Wood Mackenzie. The project "was clearly short of gas and has had to buy it from the domestic market to meet its overseas contracts," said Rod Sims, of the Australian Competition & Consumer Commission. Those purchases, along with state bans on more gas development drilling, "have created a crisis for Australian manufacturing that needs to be addressed."

Debate continues in Australia over local needs vs. LNG exports

(Australian Broadcasting Corp.; April 18) - Soaring natural gas prices are threatening to break manufacturing companies in Australia and push up household gas bills at the same time as the nation's is shoring up supplies for other countries in the region. An analysis by the Australian Broadcasting Corp. shows that overseas state-owned corporations hold more than a 30 percent stake in the liquefied natural gas export projects developed in Queensland in recent years.

Though the huge LNG plants near Gladstone are struggling to make a profit during a period of global oversupply and low prices, they have been a benefit for China, South Korea, Malaysia and Japan. State-owned or backed firms from these countries invested heavily in facilities converting coal-seam gas to liquefied natural gas. China alone owns more than 17 percent of Queensland's gas output through the China National Offshore Oil Corp. and Sinopec, two of China's largest oil companies.

"They've shored up their domestic supplies by investing in these plants," said Bruce Robertson, a gas analyst with the Institute for Energy Economics. Regardless of the global oversupply of LNG, however, Australia's domestic gas market is anything but oversupplied, with looming shortages sending prices surging as the LNG projects fulfil their export commitments. Though some talk of government policy to require setting aside more gas to meet domestic needs, the industry steadfastly opposes gas reservation policies. The industry's answer is more gas development.

Natural gas activity picks up in Canada's Montney play

(The Canadian Press; April 16) - Increasingly empty industrial yards around the northeastern British Columbia city of Fort St. John are a welcome sign for Jennifer Moore. A regional economic development officer, Moore said the return to work of natural gas drilling rigs and related equipment that had been parked shows that a

recovery is underway for one of Canada's biggest new energy plays. Fort St. John sits atop the Montney, a gas-bearing formation that straddles the B.C.-Alberta border.

With natural gas prices weakened by rising U.S. supplies, Fort St. John and neighboring communities have witnessed a grinding two-year slowdown. "It's been a little scary here," said Moore, who works for the North Peace Economic Development Commission. "As you drove around the community industrial areas you saw a lot of iron parked in yards, and that's not a good thing. Pipe, equipment, trucks ... the majority was parked."

Though gas prices are still weak, industry officials said, rich finds in the Montney and the prospect of new pipelines are helping to revive exploration. Drilling is up, and the region's unemployment rate dropped to 6.5 percent in March from 10.5 percent in December. At the height of the boom in 2014, it registered as less than 3.5 percent. "People are feeling more optimistic," Moore said. Energy executives said the Montney's prolific production, unlocked with horizontal drilling and hydraulic fracturing, makes it the most profitable gas play in Canada. It provides about a quarter of Canada's gas output.

Argentine governor says Exxon plans to boost shale gas production

(Platts; April 18) - ExxonMobil plans to ramp up gas production from the Vaca Muerta shale play in Neuquen, Argentina, said the governor of the province. Gov. Omar Gutierrez said he met with executives of Exxon and its XTO unit in Houston last week to promote a series of tenders for 56 blocks in the southwestern province, according to a statement April 17. Exxon "is evaluating the potential of gas development in the Los Toldos 1 Sur block," and is poised to request a 35-year production license, he said.

Exxon's focus is to be on developing gas from Vaca Muerta, among the world's most promising shale plays, where the company will have invested \$750 million by the end of this year, the governor said. Exxon was not available for comment on the governor's statement. The focus on gas has been driven by Argentina's extension of pricing incentives this year through 2021, under which the faster a company can get a block into production, the more it can profit from the higher prices, Gutierrez said.

The pricing incentives, which started in 2013, have led a rise in output from Vaca Muerta and several tight-gas plays. Last year, XTO launched a pilot project with an investment of about \$250 million. If the results prove promising, an additional \$13.8 billion will be invested by drilling more than 500 wells, each with 8,000-foot legs and multiple fracking stages, according to the company's investment plan approved by the provincial government in 2015.

Europe accelerates its move away from coal

(Bloomberg; April 19) - The long goodbye for coal in Europe is accelerating as the cost of shifting to green energy plunges. Companies are closing or converting coal-burning generators at a record pace from Austria to the U.K., made obsolete by competition from cheaper wind and solar power. After more than 500 years of using coal, the atmosphere — and the continent — simply can't afford it anymore and is moving on.

"It's an entirely different fuel-price world," said Johannes Truby, an analyst at the Parisbased International Energy Agency. Since 2012, the agency has cut its outlook for European Union coal use in 2030 by 12 percent and now expects just 114 gigawatts of capacity will remain by then, compared with 177 gigawatts in 2014. Countries including the U.K., France, Portugal, Austria and Finland are phasing out coal with policies in place to end its use in power generation.

At Europe's biggest coal-fired plant in the German city of Voerde, three chimneys soaring as high as 820 feet stand dormant after belching steam and smoke for more than half a century. It used to generate 2.2 gigawatts of power for 4.5 million homes before utility owner Steag flipped off the switch within the past few weeks. The government's policy of Energiewende is shifting the country to more solar and wind power, which has created a glut of renewable power and sent electricity prices plunging.

Hilcorp purchase of Conocogas fields fits its profitable formula

(Bloomberg; April 13) - With a \$3 billion purchase from ConocoPhillips, billionaire oilman Jeffrey Hildebrand is once again trying to succeed in a corner of the oil and gas world others are leaving behind. Hildebrand's Hilcorp Energy agreed to buy the assets in the San Juan Basin in New Mexico and southwestern Colorado, taking on holdings in the southwestern U.S. that Conoco sees as less appealing given the fields' focus on lower-profit natural gas. For Houston-based Hilcorp, it's the company's bread and butter.

Founded in 1989, Hilcorp calls itself one of America's largest closely held oil and gas producers. It's made billions from aging fields where it works to capture "energy resources that would otherwise be lost," according to its website. Its formula is to take over and develop conventional fields, the kind of old-school drilling areas that have been eclipsed in the U.S. by high-margin, quick turnaround shale-fracking projects.

Hildebrand, Hilcorp's founder, chairman and CEO, is a geologist and petroleum engineer by training. The focus on reviving other companies' castoffs has worked well for him: He's currently worth \$9.7 billion, making him the 47th richest American, according to data compiled by Bloomberg. His company may be better known for its generosity to workers. Hilcorp made headlines in 2015 for giving each of its employees a \$100,000 bonus after a successful push to double the business' value. That followed an earlier program in which employees could earn as much as a \$50,000 bonus.

Private investors putting billions into U.S. shale oil

(Reuters; April 17) – Investors who took a hit last year when dozens of U.S. shale producers filed for bankruptcy are already making big new bets on the industry's resurgence. In the first quarter, private-equity funds raised \$19.8 billion for energy ventures — nearly three times the total in the same period last year, said financial data provider Preqin. The quickening pace from private equity, hedge funds and investment banks comes even as the recovery in oil prices has stalled at just over \$50 per barrel.

The shale sector has become increasingly attractive to investors not because of rising prices but rather because producers have achieved startling cost reductions — slashing up to half the cost of pumping a barrel in the past two years. Investors also believe the oil glut will dissipate as demand steadily rises. That gives financiers confidence they can squeeze increasing returns from shale fields — without price gains — as technology continues to cut costs. So they are backing shale-oil veterans and assembling companies that can quickly start pumping.

"Shale funders look at the economics today and see a lot of projects that work in the \$40 to \$55 range," said Howard Newman, head of private-equity fund Pine Brook Road Partners, which last month committed to invest \$300 million in a start-up to drill in West Texas. But this year's drilling rush could be tested if global supplies grow too fast or if demand cools. The U.S. drilling rig count is rising at its fastest pace in six years and U.S. crude oil stockpiles are close to 533 million barrels — near an all-time high.

Opponents battle FERC in court over gas pipeline approval

(GreenWire; April 18) - A panel of judges grilled the Federal Energy Regulatory Commission on April 18 over its approach to studying climate impacts from natural gas pipelines. U.S. Court of Appeals for the District of Columbia Judge Judith Rogers spent much of the oral arguments airing broader concerns about FERC's typical treatment of downstream greenhouse-gas emissions. "FERC just doesn't have to do its duty because it thinks someone else will," she said, responding to the agency's argument that many downstream impacts fall under the jurisdiction of other agencies.

The Sierra Club and other environmental groups sued last year, challenging FERC's decision to issue certificates for the 685-mile Southeast Market Pipelines Project in Florida, Georgia and Alabama. They said FERC violated the National Environmental Policy Act by failing to adequately consider downstream climate impacts of the gas consumption and the effects on environmental justice for communities along the route. The groups are asking the court to vacate the certificates and remand to FERC.

FERC attorney Ross Fulton pushed back, noting that the agency conducted a general analysis that concluded the project would not significantly contribute to cumulative

greenhouse-gas impacts because power plants taking the gas were switching from coal, which emits more carbon dioxide. Moreover, he said, the agency determined that the linkage between the pipelines and the power plants was not direct enough to merit closer FERC review, as the agency has no control over how the gas is used.

BP sues Pennsylvania refiner for canceling oil purchase contract

(Philadelphia Inquirer; April 17) - The plunge in oil prices has triggered a series of lawsuits over who will take the hit for millions of dollars lost on soured deals to bring light sweet crude to a Pennsylvania refinery. BP Products North America last week sued Monroe Energy, the Delta Air Lines subsidiary that operates the refinery in Trainer, PA. The suit in federal court claims Monroe owes BP \$59 million for abandoning a three-year contract last year to take delivery of U.S. crude that BP would ship to the refinery.

The legal action underscores the dramatic change of fortunes associated with crude oil prices. The lawsuit traces its roots to a time when oil prices were high and struggling East Coast refiners found salvation in new, lower-cost supplies from the Bakken shale in North Dakota and the Eagle Ford formation in Texas. Much of the oil moved to the East Coast by rail, a more expensive way to transport oil than pipeline or ships. But as the fall in world oil prices reduced the price advantage of U.S. crude, most East Coast refiners returned to buying their raw material from overseas, mostly West Africa.

The supply arrangements the refiners struck when oil prices were high were now burdens. BP, in its lawsuit filed April 13 against Monroe, said the refiner last year breached a three-year contract it had signed to buy 10,000 to 20,000 barrels a day from Texas or North Dakota. Monroe alleged that BP failed to ship oil that met the contract specifications. BP denied the allegation and said it suffered a loss of \$59 million over the term of the contract, which was scheduled to expire in October 2017.