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Morgan Stanley, Goldman Sachs, Bank of America all see \$100 oil

(The Wall Street Journal; Jan. 27) - Wall Street's summer forecast calls for \$100 oil. A barrel hasn't cost that much since the summer of 2014, before OPEC launched a price war with U.S. shale producers and sent oil prices into a yearlong slump. Then early in the pandemic, prices fell to uncharted depths in 2020. But the bust ended last year, when crude prices gained more than 50%. The benchmark U.S. barrel has added another 15% to start this year, ending Jan. 27 at \$88.61. Brent crude, a key price in international trade, closed at \$89.34 a barrel on Jan. 27, also up about 15% in 2022.

Analysts expect oil demand to return to pre-pandemic levels this year and say that prices need to rise higher yet to entice U.S. producers to drill more wells and also to discourage consumption that has been unbowed by the highest gasoline prices in years. Meanwhile, break-even drilling costs are rising because of labor and materials inflation and a shakeout that has reduced capacity and competition for hydraulic fracturing and other oil-field services.

"The oil market is heading for simultaneously low inventories, low spare capacity and still low investment," Morgan Stanley analysts wrote in a research note, lifting their price forecast for the summer quarter by \$10 a barrel, to \$100 for Brent and \$97.50 for West Texas Intermediate. Goldman Sachs raised its estimate for the period by \$20 a barrel, also to \$100 for Brent and slightly less for U.S. crude. Bank of America predicts that West Texas Intermediate will hit \$117 by July and that Brent will reach \$120.

Analyst says \$90 - \$100 oil could lead to demand destruction

(Barron's; Jan. 27) - Talk of \$100 oil has intensified in recent days, but triple-digit prices may pose a disadvantage for major oil-producing nations that are set to meet next week to decide the best course of action on production levels. "It isn't in OPEC+'s best interest to see prices go through \$90 this year and move higher," said Bob Ryan, chief commodity and energy strategist at BCA Research. "The potential for demand destruction is high at these levels, especially if the [U.S. dollar] remains strong," as costs in local currencies will become "prohibitive," especially in emerging economies.

BCA Research expects Brent oil to average \$80 this year and \$81 in 2023, but "demand destruction," either from high prices or widespread Omicron-induced lockdowns, is the biggest risk to that forecast, Ryan said. At a higher range, \$100 oil is a "distinct

possibility this year, driven by both strong demand and minimal gains on the supply side," said Bill Fitzpatrick, managing director and portfolio manager at Logan Capital.

While OPEC would love to see oil hover at \$80 to \$100, prices above the top end of that range will probably see demand destruction, with consumers forced to reduce consumption, and that is the last thing OPEC wants, Fitzpatrick said. He said OPEC+ is expected to stick to its current agreement to raise production by 400,000 barrels per day at the Feb. 2 meeting in order to "increase revenues, while putting only minimal pressure on oil prices." However, OPEC+ should "consider holding off on the production hikes ... to be better positioned in the event oil prices spike higher." Fitzpatrick said.

Depleted spare production capacity could drive oil prices higher

(Reuters; Jan. 27) - An increase in oil output by producer nations cashing in on expensive crude has depleted the cushion of spare capacity that protects the market from sudden shocks and raised the risk of price spikes or even fuel shortages. Some analysts have said that by the middle of the year, unused capacity could be as depleted as in 2008 when international oil futures hit their all-time record above \$147 a barrel.

Typically, the biggest producers, including Saudi Arabia and the United Arab Emirates, have capacity that they can draw on relatively quickly to produce additional crude and calm price volatility should war or a natural disaster cause a sudden drop in supply. Without that flexibility, consumers could be exposed to price shocks and fuel shortages. Last week, the International Energy Agency said spare capacity could fall by half to 2.6 million barrels per day in the second half of the year.

"If demand continues to grow strongly or supply disappoints, the low level of stocks and shrinking spare capacity mean that oil markets could be in for another volatile year in 2022," the IEA said. The agency defines spare capacity as production that can be tapped within 90 days and sustained for an extended period. Several analysts, however, warn that spare capacity held by the Organization of the Petroleum Exporting Countries and allies is much lower than the IEA and U.S. figures show.

Uganda due to sign deal for large oil field, pipeline project

(Bloomberg; Jan. 28) – The Uganda National Oil Co. plans to sign a final investment decision on Feb. 1 for a large oil field and pipeline project, taking a definitive step toward becoming a crude exporter. TotalEnergies and China National Offshore Oil Corp., along with the East African country's state oil company, are developing projects expected to reach an output of 230,000 barrels a day — bigger than some OPEC members on the continent. Ugandan President Yoweri Museveni said last year that an agreement was reached with the companies to start production by 2025.

Signing the final investment decision will allow the start of appointing contractors for the development, Peter Muliisa, a spokesman for UNOC, said Jan. 28. Commercially viable oil resources were first discovered in Uganda in 2006, but the landlocked country's path to becoming a crude exporter has faced a number of delays, from changing the route of the planned pipeline to the makeup of the oil companies that are involved.

While now poised to break ground, the development still faces opposition from environmental groups that seek to bring an end to the use of fossil fuels, putting some pressure on potential financing sources. A range of agreements related to the projects were already completed last year. The international companies will develop the fields and a \$4.2 billion heated pipeline to transport the waxy crude 897 miles to the port of Tanga in Tanzania. Total owns a 62% stake in that project, UNOC and Tanzania Petroleum Development Corp. each have 15%, with CNOOC holding the remainder.

Federal judge orders halt to Gulf of Mexico lease sale

(The Associated Press; Jan. 28) - A federal court has rejected a plan to lease millions of acres in the Gulf of Mexico for offshore oil drilling, saying the Biden administration did not adequately take into account the lease sale's effect on planet-warming greenhouse gas emissions, violating a bedrock environmental law. The decision Jan. 27 by U.S. District Judge Rudolph Contreras in Washington, D.C., sends the proposed lease sale back to the Interior Department. The judge said it was up to Interior to decide whether to go forward with the sale after a revised review, scrap it or take other steps.

Environmental groups hailed the decision. Companies including Shell, BP, Chevron and ExxonMobil offered a combined \$192 million for rights on federal oil and gas leases in the Gulf of Mexico in November. The Interior Department auction came after attorney generals from Republican states led by Louisiana successfully challenged a suspension on sales that Biden imposed when he took office. Companies bid on 308 tracts totaling nearly 2,700 square miles.

Contreras said Interior failed to consider the greenhouse gas emissions that would result from the lease sale, violating the National Environmental Policy Act. "Barreling full-steam ahead with blinders on was simply not a reasonable action for BOEM to have taken here," he said, referring to Interior's Bureau of Ocean Energy Management. Environmental reviews — conducted under then-President Donald Trump and affirmed under Biden — reached the unlikely conclusion that extracting and burning more oil and gas from the Gulf would result in fewer climate-changing emissions than leaving it.

High prices, long-term contracts may break logjam of stalled U.S. LNG

(Reuters; Jan. 28) - High global natural gas prices are breaking a two-year logjam of new U.S. liquefied natural gas projects, with at least three of the multibillion-dollar proposals likely achieving enough sales contracts to start construction this year, said developers and industry experts. A Louisiana project that received a green light in 2019 was the last new U.S. plant to receive a go-ahead, benefiting from then-strong demand from China and utilities swapping to LNG from coal. A dozen others were stalled, first by the China-U.S. trade war and then by the pandemic and environmental concerns.

But hot demand for the fuel in Europe and China has pushed global gas prices to near record highs, reviving financing prospects for the projects. China stopped taking most U.S. LNG by imposing a 25% tariff on imports in mid-2019 at the height of a trade war. But in November, Chinese energy companies agreed to buy more U.S. gas than ever before through long-term contracts. Such contracts are key to winning financing and breaking the development logjam, said Carlos Sole, an attorney at law firm Baker Botts who has been involved in the development of multiple U.S. LNG export projects.

"Last year capital was not willing to deploy itself on a speculative basis without long-term contracts," Sole said. "Assuming those are achieved, which is the general expectation given current market conditions, then capital should be available." Atop the list of proposals likely to get financial approval are Venture Global and Tellurian plants, both in Louisiana, and a Cheniere Energy project in Corpus Christi, Texas, said Craig Pirrong, a finance professor at the University of Houston and commodity trading expert.

Not much the U.S. can do to direct additional LNG to Europe

(The Wall Street Journal; Jan. 30) - U.S. officials tried to persuade Europe for years to buy American natural gas as a bulwark against Russia, with the Trump administration dubbing it "molecules of freedom." But most countries stuck with cheaper Russian supplies, with some expressing environmental concern about U.S. fracking. Now, as Europe confronts the possibility of a serious supply squeeze amid Russian hostilities toward Ukraine, the U.S. is trying to help Europe secure emergency gas supplies.

But there is only so much the Biden administration can do: Most U.S. gas has been sold to other customers, and Europe has limited facilities to import more. Russia, which typically provides about 40% of Europe's gas, has sought to play down concerns that it could substantially decrease the flow, and analysts are skeptical that it would do so if it invaded Ukraine, noting that the sales are a significant source of Russian revenue. But if Russian supplies did get cut off during winter, Europe would pay a heavy price — it remains as dependent on Russian gas as ever to heat homes and generate electricity.

Poland and some other European countries signed long-term deals to buy U.S. liquefied natural gas and built the terminals needed to take in the shipments. In the past decade,

France, Greece, Lithuania and a few others erected new terminals. But many others didn't. Biden administration officials have held conversations with gas shippers in the U.S. and among its allies to line up additional supplies to Europe. But there is virtually no spare supply available. Some U.S. exporters are already sending as many cargoes as they can to Europe without breaking supply contracts with other customers.

Canada has gas but no way to get it to Europe

(Globe and Mail; Canada; Jan. 26) - Canada has ample reserves of natural gas but the country finds itself on the sidelines as a global coalition plans to boost shipments of the fuel in liquefied form to Europe in case Russia halts its gas exports there. With Russian troops positioned for a potential invasion of Ukraine, European gas prices have surged this week on concerns over declining gas storage levels in Europe.

The U.S. shipped a record amount of LNG to Europe in December, and the Biden administration has been holding talks with major producers such as Qatar and Australia about sending more LNG to Europe in a bid to alleviate fears of running out of the fuel. Only one Canadian export project, Shell-led LNG Canada, is under construction. That terminal in Kitimat, British Columbia, is not expected to start up until 2025 at the earliest.

"Canada can't help that global coalition," Dan Tsubouchi, chief market strategist at SAF Group in Calgary, said Jan. 26. "There's nothing in Canada that can be done that could help them in 2022 or 2023 or 2024." Ambitious long-term plans to ship LNG to Europe from Nova Scotia, Quebec and New Brunswick have been either outright cancelled or suspended indefinitely.

Of the 24 LNG proposals tracked by Canadian authorities five years ago, six were in the east and the rest were in British Columbia, with all of those focused on LNG to Asia. Pieridae Energy's Goldboro LNG venture in Nova Scotia is among the projects that appeared promising five years ago. "The last one on the East Coast to have any hope was Goldboro, and they basically haven't been able to make a go of it," Tsubouchi said.

Developer shrinks proposed Nova Scotia LNG plant to cut costs

(Bloomberg; Jan. 28) - Calgary-based natural gas producer Pieridae Energy is considering revamping its proposed Goldboro LNG export project in Nova Scotia into a much smaller, offshore facility because of the current high-cost operating environment. "One of the big issues we faced is the cost of production of our natural gas and ... it was very difficult to be an organization with a very large project on our back," Alfred Sorensen, chief executive officer of Pieridae, said in an interview Jan. 28.

He said the expected capital expenditure needed for the new offshore facility will be roughly \$2 billion — much less than the \$10 billion needed for the original project. The new cost structure, along with soaring natural gas prices in Europe, according to Sorensen, will provide "long-term economic viability" for the company. "There's no doubt the economics have significantly improved. So that's why we didn't give up completely."

The floating facility is expected to produce 2.5 million tonnes of natural gas per year; the goal for the original onshore plant was to process 10 million tonnes annually. Last July, the company shelved its plans to build an onshore liquefied natural gas plant in Goldboro, Nova Scotia, that would process gas from Alberta for export to Europe.

Europe has to deal with its long-term natural gas problem

(Bloomberg opinion; Jan. 27) - When the European energy crisis started in mid-2021, Brussels bet the upheaval would be largely gone by spring. As it became obvious that wasn't going to happen, it speculated the problems wouldn't last beyond 2022. That wager looks to be off, too. Away from the daily gyrations of European spot gas prices — swinging between worries about a Russian invasion Ukraine and the effects of a mild winter — the forward market has begun to price in trouble for 2023, 2024 and beyond.

Europe imports approximately 40% of its gas from Russia, and if a war led to the loss of all those supplies the region could be forced to shutting down large swatches of its energy-intensive industries. European gas prices would spike multiple times higher than the record high set in December. The gas crisis, however, goes deeper than that. Domestic gas production is falling, notably in the Netherlands and the U.K., and that means a growing share of the gas Europe consumes must come from abroad.

With Asian demand for liquefied natural gas rising fast, Europe will have to compete for LNG supplies — at a price. Russia is unlikely to refill depleted European gas inventories as it once did every summer, ahead of winter. Europe will have to go it alone, assuming that the high prices of the past few months aren't a one-off, but perhaps the start of a new trend. The response must take that into account. The subsidies that governments use today — envisioned as temporary — may have to become long-term commitments.

U.K. government invests in nuclear power plant

(Bloomberg; Jan. 27) - The U.K. government is investing 100 million pounds (\$135 million) to push Electricite de France's Sizewell C 3.2- gigawatt nuclear project in eastern England a step closer toward being built. The funds will be used to advance the project to the next stage of financing negotiations over how much the government and private investors will pump into the facility. The construction of Sizewell C, which would provide power for six million homes, could cost about 20 billion pounds (\$27 billion).

Britain says reaching net-zero emissions will be hard without nuclear energy, though plants are expensive and take years to build. In addition to the Hinkley Point C reactor being built, it has committed to finance at least one other large-scale nuclear project by 2024. The nation's recent energy crunch also highlighted the need to reduce dependence on expensive fossil fuels to generate electricity. "We need to ensure Britain's future energy supply is bolstered by reliable, affordable, low-carbon power" generated in the U.K., Business Secretary Kwasi Kwarteng said in a statement.

The new funding "will further support the development of Sizewell C during this important phase of negotiations as we seek to maximize investor confidence in this nationally significant project," Kwarteng said. The money will be invested in exchange for an option for the government to use the land for something else if the project falls through. It will be returned as cash or equity if EDF makes a final investment decision.

U.S. takes another look at impact of LNG exports on domestic prices

(Houston Chronicle; Jan. 28) - While the Biden administration says it is not considering a ban on natural gas exports, the Department of Energy continues to look into the connection between the increase in liquefied natural gas exports and a recent rise in domestic natural gas prices. The Energy Information Administration, which monitors the U.S. energy system, is conducting a multi-year study of natural gas prices, including the impact of the U.S. gas export industry, an EIA spokesman said.

The effect of LNG exports on domestic gas prices has long been a contentious issue, dividing domestic gas customers and exporters located primarily along the Texas and Louisiana Gulf Coast. In a briefing with reporters this week, Paul Cicio, president of the trade group Industrial Energy Consumers of America, which represents the manufacturing and industrial sectors, said the U.S. government has too long ignored the effects of sending increasing amounts of natural gas abroad.

"Administrations have put in place policies all about exporting without any consideration to the public interest," he said. Last week, U.S. natural gas averaged \$4.50 per million Btu — 60% higher than 12 months ago. With prices in Europe and Asia at all-time records, there is a fear that more U.S. gas will be shipped overseas, further driving up bills for homes and businesses. Oil and gas companies have long downplayed the impact of LNG exports on U.S. gas prices, arguing that factors such as weather and the amount of natural gas in storage are far more important in determining prices.

Tanzania selects U.S. law firm to advise on LNG project

(Bloomberg; Jan. 25) - Tanzania has selected U.S. law firm Baker Botts as an adviser to help conclude talks with international oil companies over a long-delayed \$30 billion

liquefied natural gas project. The nation wants to sign a host government agreement by April with oil majors, including Equinor and Shell, Energy Minister January Makamba said. The move will give impetus to the project that's been under consideration since 2014 and gained momentum after President Samia Suluhu Hassan took office in March.

The accord will outline commercial, legal and technical aspects of the project, Makamba said. The project involves building a two-train onshore LNG plant to tap huge offshore gas discoveries south of the East African nation. The deal between Baker Botts' London office and the Tanzania Petroleum Development Corp. was signed Jan. 25. Tanzania and neighboring Mozambique are racing to develop their offshore gas fields for export sales to markets in Asia and elsewhere. Mozambique's multibillion-dollar gas project hit a snag last year after TotalEnergies suspended work due to insurgent attacks.

Costly LNG helps drive Japan's coal imports to highest in 2 years

(Bloomberg; Jan. 27) - Japan's coal imports are poised to jump to the highest level in at least two years as the nation's utilities turn to the dirtiest fossil fuel as a replacement for expensive liquefied natural gas. More than 17.3 million tons of coal will be delivered to the country this month, said Edwin Toh, a dry bulk manager at energy intelligence firm Kpler. That would be the highest since December 2019, and about 5% above the five-year seasonal average, according to Japanese customs data.

Snowy winter weather has boosted Japan's power demand and curbed output from renewable sources, triggering a jump in coal-fired power generation. While spot prices are near a record high, coal is still cheaper than prompt shipments of cleaner-burning LNG. From Tokyo to Boston, the world is being forced to depend more on coal amid a global natural gas supply crunch — a worrying development just months after the COP26 climate summit in Glasgow. Efforts to curb emissions are challenging governments that also don't want high energy costs to disrupt economic growth.

North Dakota attracts \$1.9 billion data center project

(Inforum; Fargo, ND; Jan. 26) - North Dakota Gov. Doug Burgum and two cryptocurrency companies unveiled plans Jan. 26 for a massive data center outside Williston, a \$1.9 billion project that developers said will be among the largest standalone, high-performance computing facilities in the world. The center is being built by FX Solutions and will be owned and operated by Atlas Power, both of Montana.

Company executives laid out plans to construct the facility in three phases, with the first stage drawing on 240 megawatts of electricity — roughly, the amount of energy needed to power the city of Fargo, population 125,000 — and eventually ramping up to a

powerhouse 700-megawatt scale. The governor touted the high-performance computing industry's potential to diversify western North Dakota's boom-and-bust oil economy.

In its first phase, the data center is expected to perform a host of energy-intensive jobs, Burgum spokesman Mike Nowatzki said, with about 65% of its resources dedicated to mining cryptocurrency. The remaining energy would be used for data storage, machine learning and artificial intelligence tasks, among other things, he said. Sixteen buildings, each the length of a football field, will hold the computing systems in the project's initial phase, with site work for the facilities already underway on 77 acres west of Williston.

Developers have set their sights on North Dakota in part because the frigid winters help with the data center cooling processes needed to keep hardware from overheating. The centers require 24/7 power, making them reliant on resources like coal and natural gas.

World Bank index points to biggest gas-flaring nations

(S&P Global Platts; Jan. 26) - As the oil industry increasingly grapples with reducing the carbon intensity of its crude production to curb upstream emissions, pressure is growing on the world's biggest gas-flaring countries to rein in a major source of climate-damaging carbon dioxide. The world's biggest CO2 emitters from gas flaring continue to be some of its biggest oil producers, including Russia, the biggest member of non-OPEC countries in the OPEC+ alliance, and Iraq, OPEC's second-biggest producer.

Although gas flaring declined 5% to 5 trillion cubic feet in 2020, seven major oil producers — Russia, Iraq, Iran, the U.S., Algeria, Venezuela and Nigeria — continued to be the largest flaring countries for nine years running, according to the World Bank. Although those countries produce 40% of the world's oil, they accounted for nearly two-thirds of global gas flaring. Countries in the Mideast tend to represent a big percentage of gas flaring given the amount of oil produced and political turmoil engulfing the area.

As part of the World Bank's efforts to end the 160-year-old practice of gas flaring, it has singled out the world's oil importers most exposed to buying oil from producers with high gas-flaring rates. Switzerland was the country most impacted by so-called "imported" gas-flaring nations that supplied it with crude in 2020, according to the World Bank's Imported Flare Gas Index. The index shows how countries are exposed to the issue of gas flaring and how they can identify the role they can play in lowering emissions.

Los Angeles moves to phase out all oil and gas wells

(Los Angeles Daily News; Jan. 26) – The Los Angeles City Council voted unanimously Jan. 26 in support of recommendations that include steps that could lead to halting new oil and gas wells, starting the process that could lead to phasing out existing wells,

fighting climate change and gradually transitioning to jobs in the clean-energy sector. "This is a historic day for the city of Los Angeles," Councilman Paul Krekorian said.

Among recommendations approved by council members are steps to instruct the Department of City Planning and the city attorney's office to prepare an ordinance to ban new oil and gas wells and to declare oil extraction operations a "nonconforming use" within city limits. The ordinance also calls on the Los Angeles Office of Petroleum and Natural Gas Administration and Safety to hire an expert to launch an amortization process that would help to decommission existing wells, assessing whether companies had recouped the money they had invested into each facility.

The process will also include directing the same city office to prepare a path for plugging and remediating abandoned wells and requiring companies to take responsibility for leaking wells. There are 26 oil and gas fields across Los Angeles and about 5,274 oil and gas wells, according to the Department of City Planning, dispersed throughout the city.

Texas watchdog group warns of growing risk from abandoned wells

(Texas Signal; Jan. 27) - In the past six years, 132 Texas oil and gas companies have filed for bankruptcy. Many went under as the pandemic drove down demand for oil, causing the price of oil to temporarily plummet to historically low levels. In general, however, the industry is facing systemic decline with or without the pandemic, said Virginia Palacios, executive director of Commission Shift, a group that serves as a watchdog to the state agency in charge of regulating oil and gas production.

"We're seeing a lot less investment in new capital for oil and gas," Palacios said. As companies stumble, many either shut down their oil wells or abandon the equipment, he said. State data in 2020 listed more than 146,000 wells as inactive, and at least 6,200 were "orphaned" — wells with missing or bankrupt owners. Inactive and orphaned wells are supposed to be plugged by their owners, but since their owners are bankrupt or cannot be found, or are given exemptions, the responsibility often falls to taxpayers.

In 2022 and 2023, the commission aims to spend half of its budget, or \$112 million, on well plugging and remediation. Besides being an eyesore, these wells pose a serious threat to people and the environment. They could leak toxic materials into groundwater or emit methane into the air, an explosive gas that accelerates the climate crisis. So far, the commission has not been proactive about tackling the growing problem, an issue explained at length in a report recently released by Commission Shift.

Thai company likely to take over Myanmar's biggest gas field

(Reuters; Jan. 26) - Thailand's state oil and gas explorer looks set to take over Myanmar's biggest natural gas field, as TotalEnergies and Chevron exit in the wake of last year's coup in the Southeast Asia state, analysts say. A move by PTT Exploration and Production to become operator of Yadana field, in which it already has a 25.5% stake, would keep vital gas supplies flowing to Thailand and Myanmar, and could safeguard revenues for Myanmar's government amid tighter U.S. and other sanctions.

France's TotalEnergies and Chevron said Jan. 21 they were leaving Myanmar, citing the worsening humanitarian situation. The firms were part of a group operating the Yadana gas project off Myanmar's southwest coast and the Moattama Gas Transportation Co. that runs a pipeline carrying gas from the field to Myanmar's border with Thailand.

"PTTEP appears the more likely candidate to take over as operator of Yadana," said Kittithat Promthaveepong, a Bangkok-based consultant at the Lantau Group. PTTEP would have an 85% stake in Yadana if it took all the shares held by TotalEnergies and Chevron. PTTEP already operates Myanmar's smaller Zawtika field, in which it has an 80% stake. Myanmar's state energy firm Myanma Oil and Gas holds 20%.