

Energy News Monitor

THERMAL COAL IMPORTS CONTINUE TO INCREASE Monthly Coal News Commentary: July 2019

India

The Budget allocation for the coal ministry has registered a jump of 48.2 percent to ₹11.59 bn in 2019-20 from ₹7.81 bn in 2018-19. The increase has been over the revised estimates of the 2018-19 budget, according to Budget documents. While the expenditure was at ₹7.70 bn for 2018-19, in case of 2017-18 (actual) it was ₹7.22 bn, it added. The bulk of increase in the Budget allocation for 2019-20 is towards central sector schemes. The expenditure budget of ₹11.59 bn in the 2019-20, includes ₹10.97 bn on central sector schemes/projects and ₹231.5 mn on Coal Mines Pension Scheme. The investment in public enterprises, including CIL has increased from ₹201.21 bn in budget 2019-20, over the revised estimate of ₹175.22 bn in 2018-19.

India may spin off units of CIL the world's largest coal miner, into separate listed companies to boost competition and raise government funds. The company and the coal ministry are studying a proposal by the finance ministry's Department of Investment & Public Asset Management to list four of CIL's biggest production units, as well as its exploration arm. Spinning off CIL subsidiaries would also lead to greater competition in the domestic coal market and improve corporate governance. The four units -- Mahanadi Coalfields, South Eastern Coalfields, Northern Coalfields and Central Coalfields -- account for more than three-fourths of the company's output, while constituting less than half of its workforce. The fifth unit would be Central

Mine Planning & Design Institute. India's state run coal giant has been unable to meet growing demand despite abundant resources. CIL produced a record 607 mt the last fiscal year to March, falling short by 22 percent of a target proposed in 2017. India, the world's second-largest coal consumer after China, depends on CIL for about 83 percent of the domestic production. The government's top planning body, NITI Aayog, proposed in 2017 that CIL be broken up so its units can compete against each other. At that time it was dismissed as a plan that doesn't reflect government policy.

CIL has produced 137 mt of the fuel in first quarter (Q1) FY20, inching up only 0.1 percent year-on-year (y-o-y). The miner supplied 119.6 mt of the fuel to power plants in the quarter, which is 3.2 percent lower than corresponding quarter the previous fiscal. At the end of Q1, power plants across the country had stocked up 30.6 mt of coal, 53 percent more than the levels in end-June during 2018. On top of that, CIL has a stock of about 33 mt. CIL said that since there was a significant rise in power generation from nuclear, hydro and other renewable energy sources, coal-based power plants now have significant stock with them and electricity production will not be affected due to fuel shortage. Breaching the 600 mt production level for the first time, the world's largest coal miner produced 607 mt of the fuel in FY19, recording an annual growth of 7 percent. According to experts, coal cannot be stockpiled beyond a certain quantity without the risk of catching fire.

Coal imports by Indian coal utilities during the first half of 2019 rose 53.4 percent from a year earlier to 35.47 mt CEA data showed. Demand for seaborne coal imports in India has risen because of a fast rising population and the unavailability of alternative fuels such as natural gas. Imports for power plants at the port of Mundra, in western India's state of Gujarat, made up 42% of all imports by Indian utilities during the first half of 2019. Imports by Adani Power Ltd's Mundra plant more than quadrupled from a year earlier to 9.01 mt, while coal shipments by Tata Power Ltd's utility rose over 6 percent to 6.07 mt. The utilities have been ramping up imports of thermal coal after India's top court in October eased their earlier stance and paved the way for passing on increased generation costs to consumers. The power plants were forced to cut imports and slash electricity generation after the court barred them from increasing prices for customers in 2016, after their coal supplier Indonesia raised the price of coal. NTPC Ltd, India's largest electricity generator, shipped in 1.4 mt of coal to various ports during six months ended June 2019, about 11 times of what it imported a year ago. Coal is among the top five commodities imported by India, and about three-fifths of its thermal coal imports come from Indonesia, while less than one-sixth is imported from South Africa. Thermal coal imports rose at the fastest pace in four years in 2018, after two straight years of decline. Higher Indian coal imports are a boon for international miners such as Indonesia's Adaro Energy, US coal miner Peabody Energy Corp and global commodity merchants such as Glencore PLC.

The country has imported 51.84 mt of coking coal in FY19, Parliament was informed. During 2018-19, coking coal import stood at 51.84 mt (provisional). The government has taken steps in order to increase availability of coking coal. CIL has planned to increase coking coal output from 34.12 mt to 52.95 mt by 2019-20. CIL also plans to set up nine new coking coal washeries by 2020-21.

After supplying enough coal to the state-owned power plants in the country, CIL in the last three and a half months, accelerated rake loading to the non-power sector consumers, thereby reducing its backlog to this sector by

more than 44 percent. Out of a total dispatch of 33.7 mt of coal to the non-power sector during April to late July, around 8.75 mt backlog volume was cleared. The total backlog volume to non-power sector is estimated at around 19.38 mt. Out of a backlog of 5,100 rakes, which were committed to the non-power sector, the miner was able to clear 2,300 rakes during the first quarter of the current fiscal year. During mid 2016-17, when CIL was ramping up production to meet its target, the demand for coal from the state-owned power sector declined due to enough supplies. Faced with this situation, CIL booked rakes for the non-power sector for speedy delivery and for boosting sales in this sector. As a result of impacted movement of rakes to non-power sector, the backlog kept piling up for the bookings already made for this sector. To cater to the demands of non-power sector, CIL at the time offered increased dispatches by road. In the current financial year, CIL has set a production and sales target of 660 mt which will scale up to 710 mt in the next financial year. During 2024-25, the company aspires to achieve a production of 940 mt of coal.

Singareni Collieries Company Ltd is chalking out plans to produce 10 mt of coal per annum from Naini coal block in Odisha even as production is expected to commence from February 2021. Drilling, which is part of the preparatory work, has been taken up at two places in the coal block area. It has been decided that permission of the Odisha government and the forest department are to be obtained by March 2020 and coal production is to start by February 2021. The Naini Block is estimated to have 340 mt of coal reserves.

West Bengal has got clearance from the Centre for the Deocha Pachami coal block in Birbhum district, which has the potential to generate nearly 100,000 employment opportunities. The coal block, the world's second largest, would bring in investments to the tune of ₹120 bn over a period of time. Besides Birbhum, Bankura, Asansol and Durgapur would also be benefited. The block is located in the south-western part of Birbhum coalfield in Deocha and Panchamati area, adjoining the Dewanganj block. The block, which has an estimated coal reserve of 2.1 bn tonnes, was allotted to West Bengal by the Centre in June last year.

The MP government is planning to set up 2640 MW of greenfield coal-fired power plants. The state government will invite private power producers to bid for the right to build these assets and the power will be sold exclusively to the state. The proposal, by the MP Power Coordination Committee, is awaiting approval from the state cabinet. The committee has proposed procuring 2640 MW through competitive bidding (2 plants of 1320 MW each) while another 1320 MW of capacity will be added to the state by MP Power Generating Company Ltd plants at two locations, 660 MW at Satpura and Amarkantak each. The target for the additional capacity to come on stream is FY2024-25, according to the committee.

The Arunachal Pradesh government decided to resume coal mining in the state, which has been suspended since May 2012 after a direction by the Centre following involvement of insurgent groups in the extraction process. The Supreme Court in a recent judgement lifted the suspension from Namchik-Namphuk, the lone coalfield in the state, in Changlang district. The state government directed the officials to settle the matter by paying an additional levy of ₹320 mn imposed by the coal ministry. The decision would revive the APMDTCL, a state government undertaking. The Namchik-Namphuk coalfield was allocated to the APMDTCL on 28 October 2003 by the coal ministry. Extraction was started there in March 2007 by the National Mining Company Ltd of Tinsukia in Assam on the basis of a memorandum of agreement through an open tender for extraction of 200,000 tonnes coal annually.

MAHAGENCO's plans to get coal from its own mine in Chhattisgarh are just not taking off. The public hearing for environmental clearance of Gare Pelma-II block was scheduled to be held on 27 June, but it has been postponed following an order by Bilaspur high court. The generation company was allotted the coal block in 2015 and it appointed Adani Enterprises as the mine development operator. For one year, the company had been waiting to get the green nod for developing the block located in Mand Raigarh Coalfields in Chhattisgarh's Raigarh district. The first public hearing was scheduled for 17 April 2018, but was postponed due

to various reasons. The next date was fixed on 27 June 2019. The affected persons are strongly opposing the mine and don't want to give up their land. Locals were opposing the proposed mine as 6 to 7 coal mines are already operating in the area.

Odisha announced an ex-gratia of ₹500,000 each for the next of the kin of the two persons who were killed in the Talcher coal mine accident. The accident at the coal mine, operated by Mahanadi Coalfield, occurred following to a landslide. Bodies of two workers have been retrieved and two other workers are feared dead.

As thousands sit on top of an active volcano, an underground coal fire burning for more than 100 years in Jharia in Jharkhand's Dhanbad district has finally drawn the attention of the Supreme Court. The court recently noted that nothing substantial had happened in the matter since 2009, while calling for the latest status report from the Director General of Mines Safety, Dhanbad, so as to understand how to proceed further. It directed the central government to submit its affidavit to demonstrate steps taken by them in terms of their action plan, to control the fire as well as rehabilitation of the residents there. This report by the amicus has to be in respect of the areas covered by both Bharat Coking Coal Ltd and Eastern Coalfields. The first fire in Jharia coalfield was reported in 1916. What caused it however remains unknown. Jharia continues to be a source of high quality coal in India, thereby supporting the iron and steel industry.

Mahanadi Coalfield said it is promoting the 'Khanan Prahari' mobile to curb illegal coal mining activity through remote sensing and detection technology. 'Khanan Prahari' is a tool for reporting any illegal coal mining incident through geotagged photographs as well as textual information by any individual, Mahanadi Coalfield said. The union coal ministry has developed the Coal Mining Surveillance and Management System software to use space technology for curbing illegal coal mining activity in the country. In the app maps of the coal blocks and coalfield boundaries have been geo-referenced and superimposed on the latest satellite remote sensing images, it said. This system can scan a region of 100 meters around the existing coalfield

boundary to identify any unusual activity which is likely to be illegal coal mining and a trigger will be generated with a reference number. These triggers will be studied by specialist groups identified by the coal ministry and then transmitted to the concerned nodal officials for field verification. A check for illegality in operation is conducted and reported back to the system and can be traced against the reference number initially assigned to it.

Adani group bought the Carmichael coal resource in Australia's Galilee Basin in 2010 as Indian companies rushed for overseas energy supplies amid forecasts of booming demand. But as coal prices fizzled through the first half of the decade, Carmichael's output -- closer to lower-quality Indonesian coal than the high-value varieties Australia is known for -- is seen unable to fetch a price strong enough to be profitable. Adani board has approved 10 mt of annual output from Carmichael's first phase, which will head to Adani power plants in India, including Mundra and Godda.

NTPC has terminated contracts it had awarded to BGR Mining & Infra Ltd for development of its coal mines in Jharkhand and Chhattisgarh over allegations of corruption against senior officials of the private mining company. NTPC has terminated contracts for development and operation of Chatti-Bariatu coal mine in Jharkhand and Talaipalli coal mine in Chhattisgarh, according to two separate letters dated 4 July 2019 sent by the state-owned company. The state-owned firm had awarded mine and development contract of the Chatti-Bariatu mine to BGR in November 2017. Chatti-Bariatu mine was supposed to produce 7 mt of coal a year for use at NTPC's 1,320 MW Barh power plant for generation of electricity. Talaipalli coal mine was to produce 18 mt of coal per annum for use at NTPC's 4,000 MW Lara Power Project.

Demands to raise royalty on coal was raised during the Zero Hour in Rajya Sabha. The rate of royalty paid to state governments on coal produced in states was last changed in April 2012 and as per rule was due to be revised in April 2015 but was not done. The issue was placed before the GST Council but is yet to be approved

and instead a cess was imposed which goes to indivisible pool that is not devolved to states. The demand is that royalty on coal should be raised to 20 percent from the current 12 percent.

Discoms from UP will not sign new long-term coal based power contracts for the next three years to avoid the burden of fixed costs and to optimise their current agreements. Industry experts said, though UP accounts for around 10 percent of the country's power demand, the decision of the state government will not adversely affect power generators since there have been no long-term agreements in the industry for almost a decade. Long-term power contracts are those signed for more than seven years. UP Electricity Regulatory Commission has ordered power distribution companies to procure long-term renewable power through competitive bidding and to contract hydro-power or battery storagebased power if it is economical.

The Supreme Court directed the Meghalaya government to deposit the ₹1 bn fine imposed on it by the NGT for failing to curb illegal coal mining with the Central Pollution Control Board. A bench of justices directed the state administration to hand over the illegally extracted coal to CIL which will auction it and deposit the funds with the state government. The NGT had fined the Meghalaya government on 4 January. During the hearing, the state government had admitted that a large number of mines were operating illegally in the northeastern state. A total of 15 miners were trapped on 13 December last year in an illegal coal mine at Ksan in East Jaintia Hills district of Meghalaya, about 3.7 km deep inside a forest, when water from the nearby Lytein river gushed into it. The apex court had earlier refused to allow miners to transport extracted coal lying at various sites in Meghalaya.

A demand to set up an inter-ministerial fact-finding team to probe "largescale illegal coal mining" in upper Assam was proposed in the Parliament. It is reported that 100 persons have been arrested this year for their alleged involvement in coal syndicate. 300 coal-laden trucks were reportedly seized during the government's crackdown on coal syndicate.

Rest of the World

China's coal output rose in June from the previous month to a record high, as miners ramped up production to ensure supply ahead of peak summer demand for electricity. The world's top coal producer churned out 333.35 mt of coal in June, up 6.7 percent from May and up 10.4 percent year-on-year, data from the National Bureau of Statistics showed. Output over the first half of 2019 reached 1.76 bt up 2.6 percent from the same period last year. China's state planner and energy administration have asked miners, especially big producers in Shanxi, Shaanxi and Inner Mongolia, to step up production of high-quality coal to meet increasing demand. Meanwhile, Beijing has been approving new coal mining capacity in recent months despite a push to promote clean energy and reduce its carbon footprint.

China's eastern province of Shandong aims to cut its coal consumption by 50 mt in five years, the provincial government said, to reduce greenhouse gas emissions and upgrade its energy structure. The province set a target for 2018 consumption of 377.58 mt per year, meaning the cut announced would reduce coal usage by 13.2 percent from that level. It is not clear if Shandong met the target. Reducing coal consumption in Shandong would further Beijing's goals of cleaning up the country's air and reduced its carbon dioxide emissions. Shandong produced 96 percent of its power from thermal sources, such as coal, in 2018. The province ordered tighter coal quality specifications for the fuel. Coal must now have an energy content of 5,000 kcal/kg from the current 3,700 to 4,300 kcal/kg in the coming three to five years.

Coking coal futures in China edged higher in early trade on expectations that spot prices of the steelmaking raw material will remain strong, supported by brisk demand as the world's largest steel producer ramps up output. The most-active September coking coal contract on the Dalian Commodity Exchange rose as much as 0.6 percent to \$205.23/tonne. Coke, the processed form of coking coal, climbed as much as 0.9 percent to 304/tonne. Prices of spot and imported coking coal in China have weakened over the past month by around 6-7 percent due to rising inventory and robust imports of the material. Coking coal inventory across ports in China stood at 5.73

mt as of 19 July, up 36 percent from a year ago and 107 percent this year. However, prices had stabilised, helped by a switch to lower-priced coking coal to improve steel margins.

Japanese utilities will rely on the return of coal-fired power plants from maintenance to meet peak electricity demand this summer, highlighting the country's dependence on the more polluting fuel instead of natural gas. Coal-power stations capable of producing 10,437 MW of electricity will be fired up in the next few weeks, a survey of the companies shows. The return of these units illustrates Japan's inability to shake off coal as a mainstay fuel for its power generation despite pledges to reduce carbon emissions under the 2015 Paris climate agreement and even as the country remains the world's largest LNG buyer. Coal remains the cheapest fuel source for Japanese utilities as long-term contracts for cleaner burning LNG have risen this year since they are tied to the price of crude oil, which is up 25 percent in 2019. As a percentage of Japan's generation units, Japan's gas-fired power capacity is nearly double that of coal. But utilities rely more on coal as a so-called baseload source, providing a continuous supply of electricity, while gas units are typically ramped up quickly to meet surges in demand. Coal power is expected to provide 285.7 bn kWh of electricity in the year through March 2020, an increase of 3.3 percent over the previous twelve months, according to supply plans submitted by utilities and generators to the government and published by Japan's power grid monitor. Japanese utilities typically put coal stations into maintenance in between the winter and peak demand seasons.

South African miner Exxaro Resources expects its coal production to fall by 5 percent by volume in the first half of 2019, mainly due to reduced demand from struggling state-owned power utility Eskom, it said. It expects domestic coal demand and pricing to remain stable for the remainder of the year, but does not see a recovery from the international price/ demand situation. Slowing economic growth in China is weighing on demand expectations for thermal coal in the world's biggest market for the fuel, while global moves towards cleaner

energy are compounding problems arising from a glut in supply. The supply-demand tandem is likely to keep prices for coal used in power plants under pressure in coming months.

A US federal judge approved a bidding process for mines owned by bankrupt coal operator Blackjewel LLC. US Bankruptcy Judge Frank Volk in Charleston agreed with a motion by Blackjewel on a proposal made by Bristol, Tennessee-based Contura Energy. Contura has offered \$20.6 mn as the stalking horse bidder for three mines owned by Milton-based Blackjewel. In Wyoming, Blackjewel holds the license to mine coal in Wyoming while Contura, a company created out of the 2015 bankruptcy of Alpha Natural Resources, holds the state mine permits. Blackjewel recently missed a \$1 mn tax payment owed to Campbell County, Wyoming. A group of coal miners afflicted with black lung disease met with the Senate Majority Leader in the US as part of an effort to convince lawmakers to restore a higher excise tax on coal companies to help fund their medical care, but several said the meeting left them discouraged. Coal companies had been required to pay a \$1.10 per ton tax on underground coal to finance the federal Black Lung Disability Trust Fund, which supports disabled miners whose employers go bankrupt and can no longer pay out medical benefits. The coal industry had lobbied hard to allow the tax to drop as scheduled, despite a government report saying the fund was in dire financial straits, arguing the companies were already facing economic pain and that benefits for afflicted miners would not be affected. The Government Accountability Office has said without an extension of previous tax levels the fund's debt will rise from \$5 bn to \$15 bn by 2050 – a burden that would likely have to be met by US taxpayers instead of coal companies. Coal company bankruptcies and a resurgence of the disease are accelerating the risk of insolvency for the fund, according to the accountability office.

Australian insurer Suncorp Group Ltd said it was no longer underwriting insurance for new thermal coal mines or power plants and it will phase out all exposure by 2025 as part of its responsible investment policy. Insurers globally have been reducing their business

around coal. Insurer Chubb and Zurich Insurance Group have both in the past month revised their policies to limit their thermal coal exposure. Chubb Ltd will become the first US insurer to phase out its coal investments and insurance policies, saying it will no longer sell insurance to or invest in companies that make more than 30 percent of their revenue from coal mining. Chubb will also stop underwriting the construction of new coal-fired power plants. The company said for existing coal plants, insurance coverage for risks that exceed the 30 percent threshold will be phased out by 2022, and for utilities beginning in 2022. Additionally, it will also not invest in companies that generate more than 30 percent of revenue from thermal coal mining or energy production from coal. Chubb said the exceptions to the new policy will be considered until 2022, taking into account an insured company's commitment to reduce coal dependence and also regions that do not have practical near term alternative energy sources. The Insure Our Future campaign, a consortium of activist groups, has pressured Chubb to pull back from exposure to coal and oil sands companies for nine months.

Australia's South32 Ltd reported a 69 percent jump in full-year coking coal production, beating analyst estimates, as the diversified miner ramped up production at its Illawarra project. The company, spun off from mining giant BHP Group in 2015, also said it had received bids for its South Africa Energy Coal assets in the June quarter and was currently in talks with interested parties. Coking coal output from Illawarra rose to 5.4 mt from 3.2 mt for the year. South32's Illawarra operations at New South Wales in Australia accounts for nearly all of the company's coking coal output.

Greece's electricity utility PPC said it has received no binding bids for three coal-fired plants it is selling as part of reforms Athens has agreed with its lenders to help open up its electricity market. After an inconclusive tender in February, PPC, which is 51 percent owned by the state, has relaunched the sale and has received six expressions of interest. The latest deadline for the submission of binding bids expired earlier. PPC said that it plans to call the tender inconclusive.

German economy ministry said it expected a law on the country's coal exit to be decided by the end of the year, adding talks with utility RWE - which wants billions of euros in compensation - were progressing constructively. Under proposals hammered out by a government-appointed commission earlier this year, Germany is to fully phase out coal as an energy source by 2038, hitting operators of such plants including RWE, Germany's largest electricity producer.

CIL: Coal India Ltd, , FY: Financial Year, US: United States, mn: million, bn: billion, mt: million tonnes, Q1: first quarter, MP: Madhya Pradesh, APMDTCL: Arunachal Pradesh Mineral Development & Trading Corp Ltd, MAHAGENCO: Maharashtra State Power Generation Company, discoms: distribution companies, UP: Uttar Pradesh, NGT: National Green Tribunal, km: kilometre, kcal: kilo calorie, kg: kilogram, LNG: liquefied natural gas, kWh: kilowatt hour, PPC: Public Power Corp

NATIONAL: OIL

OMCs issue letters of intent for 9k new petrol pumps

6 August. State-owned OMCs (Oil Marketing Companies) have issued letters of intent for more than 9,000 new petrol pumps as part of their biggest-ever expansion of fuel retail network. The companies are moving quickly to select dealers for new pumps that would help double their retail network in just a few years, serve customers better in less-penetrated micro markets and meet the growing challenge from the private sector. In November 2018, Indian Oil Corp (IOC), Bharat Petroleum Corp Ltd (BPCL) and Hindustan Petroleum Corp Ltd (HPCL) had launched the process to select petrol pump dealers at about 78,500 locations across the country. Companies received applications for about 95 percent of locations – single applications for 39 percent and two or more applications for 56 percent. So far, winners for 33,200 locations have been picked up by companies, of which 9,000 have been issued letters of intent and about 110 new pumps are already commissioned.

Source: *The Economic Times*

RIL and BP to form JV for fuel retailing and aviation fuels in India

6 August. BP and Reliance Industries Ltd (RIL) announced that they have agreed to form a new joint venture (JV) that will include a retail service station network and aviation fuels business across India. Building on RIL's existing Indian fuel retailing network and an aviation fuel business, the partners expect the venture to expand rapidly to help meet the country's fast-growing demand for energy and mobility. The partners have agreed to set up a new joint venture company, held 51 percent by RIL and 49 percent by BP, that will assume ownership of RIL's existing Indian fuel retail network and access its aviation fuel business. It is anticipated that final agreements will be reached during 2019 and, subject to regulatory and other customary approvals, the transaction will be complete in the first half of 2020. The venture is also expected to benefit from access to

competitive fuels supplies from RIL's Jamnagar refining complex in Gujarat.

Source: *Business Standard*

India raises cost of refinery project with Aramco by 36 percent

6 August. India has increased the cost estimate of a giant refinery and petrochemical project to be jointly built with Saudi Aramco and Abu Dhabi National Oil Company by more than 36 percent, after protests by farmers forced the relocation of the plant. The 1.2 mn barrels per day (bpd) coastal refinery in the western state of Maharashtra is expected to be built at Roha in the Raigad district, about 100 km (62 miles) south of Mumbai. The new cost estimate of \$60 bn for the refinery was given to Saudi Arabia's Energy Minister Khalid al-Falih at a meeting with Indian Oil Minister Dharmendra Pradhan in New Delhi. Global oil producers are vying to gain entry into India to establish a stable outlet for their output and to earn profit from the South Asian nation's strong gasoline and petrochemical demand prospects due to the rising disposable income of its 1.3 bn population. Saudi Aramco is also in talks to buy a minority stake in Reliance Industries' refining, marketing and petrochemical business, and analysts say any further delay in land acquisition may force it to take a harder look at the private Indian refiner's assets.

Source: *Reuters*

Numaligarh Refinery receives imported crude oil consignment from Malaysia

5 August. Numaligarh Refinery Ltd (NRL) said it has received the imported crude oil consignment from Malaysia, the first such instance in its history. The refinery in Golaghat district received the first consignment of imported Miri crude oil from Petronas, Malaysia through a railway rake comprising 50 wagons carrying around 2,760 metric tonne of crude from Haldia port in West Bengal. The Miri crude is low in sulphur and is close in specifications to Assam crude oil, also known as sweet crude for its low sulphur content, which the refinery is

currently processing from the oil fields of Upper Assam. As a result, the Guwahati-Barauni pipeline, which was earlier used to transport crude from the region to other parts of the country, is now being utilised for reverse flow of crude oil into the region. The NRL is expanding its capacity from existing 3 million metric tonnes per annum (mmtpa) to 9 mmtpa at an investment of ₹225.94 bn, which also include a 1,398 km crude oil pipeline of 9 mmtpa from Paradip to Numaligarh and a 654 km product pipeline of 6 mmtpa from Numaligarh to Siliguri.

Source: *The Economic Times*

Jharkhand government to provide free second gas cylinder refill under Ujjwala Yojana

3 August. Jharkhand Chief Minister (CM) Raghubar Das announced a second gas cylinder refill under Pradhan Mantri Ujjwala Yojana (PMUY) for around 29 lakh women in the state. The step is taken to provide free refill to 99 percent of the PMUY beneficiaries. PMUY is an initiative launched on 1 May 2016, by the Ministry of Petroleum and Natural Gas. This initiative aims to safeguard the health of women and children from the smoke emitted from firewood during cooking and consequently is committed to providing 80 mn BPL (below poverty line) households with free LPG (liquefied petroleum gas) connections over the next few years.

Source: *The Economic Times*

ONGC, its partners likely to exit oil blocks in Sudan

2 August. ONGC (Oil and Natural Gas Corp) and its Chinese and Malaysian partners have decided to exit their oil blocks in Sudan, frustrated by the years of reluctance by the Sudanese government to pay for the oil it lifts from these blocks. ONGC has been engaged in an arbitration with Sudan for more than a year to recover its oil dues that have now climbed to \$500 mn. ONGC owns 25 percent stake in a joint venture that operates blocks 2A and 4 in Sudan whose output the local government had been lifting but not paying for since 2011. Sudan had denied ONGC and partners an extension of license to operate block 2B after the initial contract expired in November 2016.

Source: *The Economic Times*

Kerosene black marketeers in Ghaziabad to be booked under Gangster Act

2 August. Ghaziabad DM (district magistrate) Ajay Shankar Pandey warned fair price shop and wholesale dealers against black marketing of kerosene, saying those found indulged in the illegal act will be booked under the stringent Gangster Act. The DM emphasised the oil must be distributed fairly and with transparency so that it must be within the reach of the poor. He said black-marketing of kerosene would be considered an economic offence. He noted that the poor are not getting the fuel properly while it is being used for adulteration in petrol and diesel. The DM said wary of stringent action, nine wholesale oil traders have proposed to surrender a total of 336 kilolitres of kerosene from the quota allotted to them.

Source: *Business Standard*

Non-subsidised LPG price cut by ₹62.50 per cylinder: IOC

1 August. Non-subsidised cooking gas or liquefied petroleum gas (LPG) price was cut by ₹62.50 per cylinder on softening international rates. Non-subsidised or market priced LPG, which consumers buy after exhausting their quota of 12 cylinders of 14.2-kg each at subsidised rates, will now cost ₹574.50, Indian Oil Corp (IOC) said.

Source: *Business Standard*

NATIONAL: GAS

India to attract ₹6k bn investment in natural gas sector in 8 yrs: Pradhan

2 August. Oil Minister Dharmendra Pradhan said the country is expected to witness more than ₹6k bn worth of investment in the its natural gas sector over the next 8

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years. He said that it is the right time to think of options like blending electricity generated from gas power plants

with renewable energy as a means to further aid the process of emission reduction. He said the recently concluded city gas distribution (CGD) rounds would attract close to ₹1.2k bn of investments across the country. He said that the government is also promoting the use of Compressed Natural Gas (CNG), bio-CNG (compressed natural gas) and natural gas in the transportation sector in order to boost economic development through clean fuel options.

Source: *The Economic Times*

Petronet in talks with IGL, GSPC to set-up LNG pumps on Delhi-Mumbai Expressway

2 August. Petronet LNG is in talks with Indraprastha Gas Ltd (IGL) and Gujarat State Petroleum Corp (GSPC) to jointly set-up liquefied natural gas (LNG) pumps in six locations on the Delhi-Mumbai Expressway, Petronet Chief Executive Officer (CEO) Prabhat Singh said. In order to increase the use of natural gas in the mobility sector, the company has been trying to push for introducing LNG in the heavy vehicle category. The company had originally planned to set-up LNG pumps across the Delhi to Trivandrum highway, however, after further evaluation it decided to first focus on the Delhi-Mumbai Expressway. Singh said that the company had also requested the petroleum ministry to ask finance ministry for exempting custom duty on LNG trucks. Singh said that discussions for setting up a floating LNG terminal for Sri Lanka has shown progress. Petronet along with Japan's Mitsubishi, Sojitz Corp and Sri Lanka Port Authority plan to set-up a 2.6-2.7 million tonnes (mt) floating LNG terminal near Colombo, Sri Lanka.

Source: *The Economic Times*

NATIONAL: COAL

CIL to resume production at Talcher fields after protests

6 August. Production at Talcher coal fields in the eastern Indian state of Odisha will resume, fourteen days after protests over the death of four miners halted production. Coal India Ltd (CIL) suffered a revenue loss of ₹2.56 bn (\$36.15 mn) and an output loss of 2.52 million tonnes (mt)

of thermal coal, the company said. The electricity generator had been incurring a daily loss of ₹110 mn (\$1.55 mn) due to the output cut, adding four of its six units were shut because of a lack of supplies

Source: *Reuters*

Centre readies 27 coal blocks for commercial mining

5 August. The centre has decided to auction 27 coal blocks to private companies who can sell 25 percent of the produce in the open market at a premium of 15 percent over their bid price for winning these blocks. Rest of the coal is meant for captive consumption intended for iron & steel, cement, captive power plants. Financial bidding are to be held between 10 October and 8 November while final allotments are likely to happen by 11 November, according to the timeline prepared by the centre. Blocks would be auctioned in three tranches – 8th, 9th and 10th. Under the 8th tranche, 20 blocks are on offer and it is for iron & steel, cement and captive power plants, excluding steel makers using coking coal. Under the 8th Tranche, the centre is offering a total of 20 blocks, 10 blocks from Maharashtra, four each from Chhattisgarh and West Bengal. One each are from Jharkhand and Madhya Pradesh. The 9th Tranche of blocks on offer includes 6 blocks for iron and steel producers only. Under this tranche the centre has offered 5 blocks from Jharkhand and from Madhya Pradesh. The 10th Tranche is for a single block meant for iron & steel, cement and captive power plants, excluding steel makers using coking coal. The centre has offered only one block from Odisha under this tranche. Last year, the centre had floated tenders for auctions blocks for commercial mining under Tranche 6 and 7. However, these were cancelled as bidder wanted more time and elections were nearing.

Source: *The Economic Times*

Expert agencies to come with best options to restart coal

4 August. Meghalaya government has asked two expert agencies to come up with the 'best options' to restart safe and scientific coal mining in the state. The two expert agencies - Central Mine Planning and Design Institute

(CMPDI) and Mineral Exploration Corporation Ltd (MECL) - are on the job, Deputy Chief Minister (CM) Prestone Tynsong said. He said the expert agencies have been entrusted with the task to come up with a model which is feasible to the state. The Deputy CM said that in 2014-15, expert agencies have conducted a study and submitted a report to the Central ministries that mechanised or open cast mining in Meghalaya is not at all feasible and this matter has been closed. Meanwhile, a committee of the National Green Tribunal (NGT) committee had asked the state government to explore the possibility of introducing the 'high wall mining method' for extracting coal in the state.

Source: *Business Standard*

CIL's supplies dip 2.9 percent in July, output down 5 percent

2 August. Coal India Ltd (CIL)'s production and despatches dipped 5.1 percent and 2.9 percent respectively in July 2019 against last year's corresponding month. Production and despatches dipped at four of its subsidiaries. At Bharat Coking Coal production and despatches fell 28 percent each, while at South Eastern Coalfields it dipped 12 percent and percent respectively. Mahanadi Coalfields witnessed a 14 percent fall in production and a 7 percent fall in supplies. At North Eastern Coalfields production fell 82 percent while supplies declined 47 percent against the previous corresponding period.

Source: *The Economic Times*

India expects coal-fired power capacity to grow 22 percent in 3 yrs

31 July. India's coal-fired power generation capacity is expected to rise by 22.4 percent in three years, the federal power ministry's chief engineer Ghanshyam Prasad said, potentially neutralising its efforts to cut emissions by boosting adoption of renewable energy. India, the third biggest emitter of greenhouse gases, saw its annual coal demand rise 9.1 percent to nearly 1 billion tonnes (bt) in the year ended March 2019. Coal demand from utilities accounted for over three-quarters of total consumption. The International Energy Agency expects India to

become the second largest coal consumer behind China early next decade.

Source: *Reuters*

NATIONAL: POWER

Average spot power price falls 2 percent to ₹3.38 a unit in July

6 August. Average spot power price dipped 2 percent to ₹3.38 per unit in July at the Indian Energy Exchange (IEX) as compared with ₹3.46 per unit a year ago. Low price coupled with greater certainty and predictability in procurement continue to make compelling proposition for the power distribution companies (discoms) as well as open access consumers to step up their procurement through the IEX, the company said. The company said that the day-ahead market alone saw an increase of 19 percent year-on-year (y-o-y) in volumes, while the term-ahead market, which is leveraged by the discoms to manage demand-supply variability close especially in the scenario of high renewable energy concentration in the grid, increased 290 percent on the yearly basis. On an all-India basis, peak demand met touched 175 GW registering a four percent increase on a y-o-y basis, while all-India energy supply stood at 117 bn units increased 6 percent y-o-y, according to data from the National Load Dispatch Centre. The overall electricity market at the IEX recorded a 27 percent increase on a y-o-y basis and a 15 percent increase on a month-on-month basis in July 2019. The increase in volume corroborated well with increase in demand for electricity in the select eastern, western and southern states.

Source: *The Economic Times*

Power ministry brings mechanism for stressed projects for servicing debt in first place

6 August. The power ministry introduced mechanism 'Trust Retention Account' for certain stressed power plants to utilise their surplus after meeting operating expense, for servicing debt in the first place. In case the developers using coal linkage of amended SHAKTI policy, a Trust Retention Account (TRA) must be put in place, if it is not there already, a power ministry order said.

According to the order, all the revenues generated shall be deposited to the TRA. The high-level committee on stressed power projects in its report had suggested in November last year that the net surplus after meeting operating expenses generated shall be used for servicing debt in the first place. The recommendations were implemented in earlier in March this year. Now, the power ministry has brought out the mechanism for that.

Source: *The Economic Times*

India's electricity regulator proposes new power trading rules

2 August. India's power sector regulator Central Electricity Regulatory Commission (CERC) has proposed new rules aimed at a complete overhaul of the power trading market in the country including changed net-worth criteria and trading margin that can be charged by companies. The existing regulations defining the criteria for grant of trading license were notified in February 2009 while the trading margin norms were notified in 2010. The commission said in the draft regulations that since then, many developments have taken place in the power sector. CERC has proposed raising the minimum net-worth requirement for category-I trading licensees, which account for 81 percent of the total trade, from the existing ₹500 mn to ₹750 mn for a volume of trade between 5,000 mn units and 10,000 mn units. For trade exceeding 10,000 mn units in a year, additional ₹200 mn net-worth would be required for every 3,000 mn units. India generates 1,300 bn units of electricity annually.

Source: *The Economic Times*

J&K, Telangana, Rajasthan stare at power outages

1 August. Jammu & Kashmir (J&K), Rajasthan and Telangana face blackouts as their distribution companies have either not opened the bank guarantees backing power purchases or put conditions on generators for invoking them. Experts said if implemented in letter and spirit, the Centre's directive to stop power supply without payment guarantee from 1 August will transform the ailing power sector. Interpreting the order differently, Uttar Pradesh has opened bank guarantees in favour of

power plants outside the state. Four major plants – Reliance Power's Rosa, Lalitpur Generation Company, Lanco's Anpara-C and Prayagraj Power that has been bought over by Resurgent Power – have been left out by the state. Rajasthan and Telangana have opened conditional letters of credit in favour of power plants.

Source: *The Economic Times*

No need to pay bills if consuming up to 200 units of electricity: Delhi CM

1 August. Delhi Chief Minister (CM) Arvind Kejriwal announced that consumers consuming up to 200 units of electricity won't need to pay their power bills. Making the

QUICK COMMENT
Free power may eventually lead to no power!
Bad!

announcement, Kejriwal said the Delhi government will give full subsidy to those consuming up to 200 units of electricity. Those consuming 201 to 401 units of electricity will continue to get 50 percent power subsidy from the government, Kejriwal said.

Source: *Business Standard*

'Assam depends on external agencies to meet power needs'

31 July. Assam is heavily dependent on power procured from external agencies to meet its demand as it has very limited power generation capacity of its own, parliamentary affairs minister Chandra Mohan Patowary said. The power demand during the peak hour (1700 hours to 2200 hours) is about 1,850 MW, against which the Assam Power Generation Corp Ltd produces 260 MW on its own, he said. Assam Power Distribution Company Ltd, in a bid to meet the electricity demand, procures about 1,200 MW power from the Central quota, 4MW from private sectors and nearly 650 MW from Energy Exchange, he said. In 2018-19, the government earned ₹1.69 bn as monthly bill from domestic electricity consumers, ₹810.6 mn from commercial consumers and ₹1.71 bn from other consumers.

Source: *The Economic Times*

NATIONAL: NON-FOSSIL FUELS/ CLIMATE CHANGE TRENDS

Post J&K becoming a UT, India hopes to expedite hydropower projects

6 August. The National Democratic Alliance (NDA) government is hopeful of expediting strategically important hydropower projects in Jammu and Kashmir (J&K) post the scrapping of Article 370 of the Constitution that grants special status to the terror prone state. NHPC Ltd that has been supplying electricity to the state despite unpaid dues of ₹ 15.12 bn is also confident of an early settlement of its bills. Out of a total ₹ 44.38 bn owed to publicly listed NHPC, J&K State Power Development Corp Ltd (JKSPDC) alone accounts for more than a third or ₹ 15.12 bn. Of these ₹ 10.91 bn has been due to India's largest hydropower generation utility way past 45 days. NHPC is implementing the Pakal Dul (1000 MW), Kiru (624 MW) and Kwar (540 MW) hydropower projects in the state in a joint venture--- Chenab Valley Power Projects Pvt Ltd--- with JKSPDC and the country's largest electricity trader, PTC India Ltd. As part of the union government's playbook in the state, Prime Minister Narendra Modi in May 2018 dedicated the NHPC's Kishanganga hydro power project to the nation. The 330 MW project on the river Kishanganga, a tributary of Jhelum has significant strategic importance. While Pakistan had challenged the project under the Indus Waters Treaty of 1960, the International Court of Arbitration at The Hague ruled in India's favour in 2013.

Source: Livemint

UP government clears state's first floating solar power plant on Rihand Dam

6 August. The Uttar Pradesh (UP) cabinet chaired by Chief Minister Yogi Adityanath has cleared a floating solar power plant on Rihand Dam with an investment of ₹7.5 bn. It will be the first water surface floating solar power plant of UP and biggest in the country. The water surface floating solar power project will generate 150 MW power and will be completed in 21 months. UP Power Corp Ltd (UPPCL) has made power purchase agreement

for next 25 years at ₹3.36 per unit which will benefit people of the state.

Source: The Economic Times

India will have 330 GW of renewable energy capacity by 2030: NITI Aayog CEO

3 August. NITI Aayog CEO (Chief Executive Officer) Amitabh Kant has said that India will have 175 GW of renewable energy generation capacity by 2022 and 330 GW by 2030 provided power discoms (distribution companies) become commercially-viable entities. He said that there is a need for transformational reforms in the power sector including privatisation, proper utilisation of renewables and strengthening of grid management and transmission system. He said that the government's strategy is to focus on two-wheelers and three-wheelers for electrification and it has taken a series of measures such as waiver of registration fees and tax concessions for electric vehicles.

Source: The Economic Times

Will make Rajasthan hub of solar energy: CM

3 August. Rajasthan Chief Minister (CM) Ashok Gehlot said his government will bring in a policy to make the state a hub of solar energy. He said efforts are being made to generate 10,000 MW of additional power in the state in the next five years. He said a 1,000 MW solar park is being developed in Nokh, Jaisalmer, by the Rajasthan Solar Park Development Company Ltd. The people of the state will greatly benefit from the solar park, he said. Presently, Rajasthan is on the third position in the field of solar power and efforts are on to bring it to number one, he said.

Source: Business Standard

Three bio-CNG plants to treat 300 tonnes of bio-waste in Chennai

2 August. Greater Chennai Corp will bring down the quantum of organic and food waste entering its landfills

by 300 tonnes by next month by setting up three bio-CNG (compressed natural gas) plants that will bottle compressed natural gas produced from bio waste. The plants will be set up in private-public partnership where the private company will be in charge of manufacturing and maintenance of the facility. At Mahindra World City, the bio-CNG plant converts eight tonnes of food and kitchen waste into 1000 cubic metres of raw biogas. Bio-CNG can replace CNG as an automotive fuel (for CNG buses and tractors) and LPG for cooking purposes, as well as to power street lights.

Source: *The Economic Times*

Renewable energy contracts renegotiation will jeopardize investments: Pradhan

2 August. Oil Minister Dharmendra Pradhan expressed concern over Andhra Pradesh's decision to renegotiate existing renewable energy contracts with companies

QUICK COMMENT
Renewable energy contracts renegotiation will jeopardize investments!
Ugly!

saying the move may jeopardize future investments in the sector. Andhra Pradesh had announced its decision to renegotiate renewable energy contracts signed by green energy companies with the previous regime, drawing strong protests from developers. The Andhra Pradesh High Court issued a stay order on renegotiation of solar and wind pats, which is valid till 22 August. Since then, the discoms (distribution companies) of the state have been curtailing renewable power. Moreover, the central government has asked states to ensure that the "must-run" status of renewable energy plants is honoured and that if supply from these units is curtailed, the reason must be given in writing to generating companies. He said that the government is mindful of the difficulties being faced by renewable energy developers in states where contracts are being renegotiated. He said that one of the main goals for the country is to achieve 40 percent electricity generation capacity from non-fossil fuel based energy sources by 2030. He said that one of the pillars which will help the country to increase its electricity generation from

renewable energy sources will be the goal set by the government to achieve 175 GW of renewable energy capacity by 2022 and 500 GW by 2030. He said that the government has taken various initiatives to propel renewable energy capacity in the country by setting up 40 GW solar parks, waiver of interstate transmission charges for solar and wind till 2022, green transmission corridors, pilot projects on solar storage and policies for new technologies like offshore wind and wind-solar hybrid projects.

Source: *The Economic Times*

Plan for solar panels in 200 North Delhi Municipal Corp schools cleared

2 August. North Delhi Municipal Corp approved the proposal for installation of solar panels in over 200 schools run by it. The decision was passed by the standing committee of the civic body. Chairman Jai Prakash said that the project would help save energy as well as reduce expenditure. Prakash said the Centre would provide the funds for the panels. The project will take another one and half month to begin. The civic body also plans to introduce solar panels in its community centre and civic centres.

Source: *The Economic Times*

Delhi's IIC goes solar, to annually save ₹11 lakh in power bill

2 August. Delhi's India International Centre (IIC), one of the country's premier cultural institutions, went green with the unveiling of a 70 kW solar rooftop plant that will help it save 63 tonne carbon emissions and up to ₹11 lakh in power bill per annum. The solar plant was set up by the Tata Solar Power under its corporate social responsibility with a cost of around ₹30 lakh. The unique parabolic design of the building's rooftop posed a challenge before the engineering team of Tata Power Solar so the rooftop mounting was planned in an unconventional manner. The IIC is taking initial steps towards using green energy and this association with Tata Power Solar showcases its commitment to promote clean energy.

Source: *The Economic Times*

In 5 yrs, households with solar water heaters double in Pune

1 August. Households using solar water heating units have almost doubled in the city in the last five years, the civic body's Environment Survey Report (ESR) for 2018-19 has revealed. In 2019-20, over 40,115 households with solar water heaters opted for the tax rebate benefit. The number of such properties in 2015-16 was 21,731. The report, tabled by the Pune Municipal Corp (PMC), stated that over 15 mn units of electricity was saved because of the use of solar water heating units by 40,515 households. It added that there has been a steady increase in the number of properties opting for tax benefits following installation of solar water heater units. The highest increase was reported in the current financial year, which saw installation of the solar units by 7,600 additional properties as against 32,915 properties the previous fiscal. The civic administration has announced up to 10 percent rebate in the property tax for installing rainwater harvesting, solar and vermicompost units. Incidentally, the corporation now has the capacity of generating 1.2 MW of solar electricity with 34 municipal properties being equipped with rooftop solar power systems. The civic body had planned to save on ₹10 mn per year on its electricity bills, if the solar power generation initiative proved successful.

Source: *The Economic Times*

India's transmission infrastructure struggles to keep up with wind and solar additions

1 August. With the expected surge in electricity demand over the coming decade and the rapid installation of solar and wind, India's transmission and distribution system will require significant expansion sooner than later. India is working on all fronts to reduce its reliance on traditional fossil-based fuels, replacing them with renewable energy. According to the Central Electricity Authority (CEA), the total installed power capacity by the end of 2021-22 is projected to be around 480 GW. As of March 2019, cumulative solar installations reached the 30

GW mark, according to Mercom's India Solar Project Tracker. Cumulative wind installations totaled 36 GW in May 2019, according to the MNRE (Ministry of New and Renewable Energy). Lack of transmission infrastructure has been a growing concern for solar, and wind companies, and Mercom has been reporting on this issue. With a plethora of mega solar tenders announced in the solar sector, including interstate transmission system (ISTS) connected projects, the evacuation infrastructure availability has been the biggest challenge. About 33 GW of renewable capacity addition has been envisioned in the 12th Plan for the eight renewable energy-rich states of Rajasthan, Gujarat, Tamil Nadu, Maharashtra, Karnataka, Andhra Pradesh, Himachal Pradesh, and Jammu & Kashmir through the wind, solar, and small hydro generation.

Source: *Mercom India*

Government revises solar pumps costs before installing 17.5 lakh units

31 July. The MNRE (Ministry of New and Renewable Energy) has revised the benchmark costs of solar pumps for FY20. The latest bench-marking comes at a time when the government is preparing to install 17.5 lakh stand-alone solar pumps and connect 10 lakh existing agriculture pumps with solar power through the recently approved Pradhan Mantri Kisan Urja Suraksha evam Utthan Mahabhiyan (PM KUSUM) scheme. Since all component purchased through the scheme will have to be manufactured domestically, it opens up a potential market of over 8,000 MW for domestic solar panels makers who are currently struggling to sustain themselves against cheaper imported products flooding the market. The MNRE has sub-divided the costs of the solar pumps into seven categories according to load bearing capacities ranging from 0.5 horsepower (HP) to 10 HP. Each load category is further split into the different varieties of solar pumps, specifying separate costs for surface and submersible types. The solar pump price list for FY19 notified by MNRE had only four broad segments.

Source: *The Financial Express*

INTERNATIONAL: OIL

US Gulf oil output slowdown in July cuts 2019 output growth: EIA

6 August. US (United States) oil output is expected to rise 1.28 mn barrels per day (bpd) to 12.27 mn bpd this year, the US Energy Information Administration (EIA) said, slightly lowering its annual growth forecast from 1.40 mn bpd. The reduction in the EIA's growth forecast came after Hurricane Barry disrupted Gulf of Mexico output in July, EIA said. Growth in the Permian Basin of Texas and New Mexico and other shale basins has boosted the US to become the world's top crude producer, exceeding output from Russia and Saudi Arabia.

Source: Reuters

Saudi Arabia may cut crude oil prices to Asia in September

2 August. Top oil exporter Saudi Arabia may cut prices for most of the crude grades it sells to Asia for a second straight month in September after Middle East benchmark prices weakened. The official selling price (OSP) for flagship Arab Light crude could drop by at least 50 cents a barrel, falling below a premium of \$2 a barrel for the first time in four months, a survey of five buyers in Asia showed. Asia's incremental demand for September-loading Middle East crude weakened with several North Asian refineries scheduled to shut for maintenance during their autumn season. Strong fuel oil margins, however, are likely to support prices for heavier grades that produce more of the residual fuel, survey respondents said. Saudi Arabia's crude OSPs are usually released around the fifth of each month, and set the trend for Iranian, Kuwaiti and Iraqi prices, affecting more than 12 mn barrels per day (bpd) of crude bound for Asia.

Source: Reuters

BP's Azeri oil output falls in first half of 2019

1 August. Output at BP's oil projects in Azerbaijan fell to 542,400 barrels per day (bpd) in the first half of 2019 from 596,000 bpd a year earlier, it said. In the first six months of the year, the company produced 13 million

tonnes (mt) of oil in Azerbaijan, down from 15 mt in the same period of 2018, and 0.9 billion cubic meters (bcm) of associated gas, down from 1.1 bcm a year earlier. A BP-led consortium said that it spent more than \$272 mn in operating expenditure and more than \$657 mn in capital expenditure on operations at the Azeri-Chirag-Guneshli (ACG) oilfields in the first half. The Baku-Tbilisi-Ceyhan pipeline exported more than 120 mn barrels (16 mt) of crude oil loaded on 149 tankers at Ceyhan.

Source: Reuters

Iraq, Kuwait to appoint ERC Equipoise for joint oilfield development study

31 July. Iraq has agreed with Kuwait to appoint British energy advisory firm ERC Equipoise to prepare a study for the development of joint border oilfields, the Iraqi oil ministry said. A contract is expected to be signed with the company in coming days, the ministry said. Under the contract, ERC Equipoise will conduct technical studies, such as examining reservoirs, for the Ratqa and Safwan fields. The study will set out the technical and legal mechanisms to invest in oilfields shared by the two countries. Production from cross-border oilfields has long been a source of tension between Iraq and Kuwait, which are members of the Organization of the Petroleum Exporting Countries (OPEC). In the build-up to Iraq's 1990 invasion of Kuwait, Baghdad accused Kuwait of drilling wells that crossed the border and pumped oil from Iraqi territory. Kuwait denied the charge.

Source: Reuters

INTERNATIONAL: GAS

Australia to consider reserving some gas for home market

6 August. Australia, the world's top liquefied natural gas (LNG) exporter, said it would consider forcing gas producers to reserve some supply for the domestic market, as it looks to cut energy bills for households and manufacturers. Resources Minister Matthew Canavan and Energy Minister Angus Taylor said they would review a range of policies, including so-called gas

reservation, pipeline access and price transparency to come up with options by February 2021. Australian conservative and Labor governments have long resisted calls for domestic gas reservation on the view that interfering in the market could distort prices and deter new production in the long run. However, following a tripling in wholesale gas prices over the past five years after the start-up of LNG exports from eastern Australia, the government has come under pressure to boost supply and cut prices. Any gas reservation would not affect the state of Western Australia and would only apply to future developments, Canavan said. Two years ago the government introduced the controversial Australian Domestic Gas Security Mechanism, which requires the Resources Minister to decide each year whether to limit LNG exports from Queensland state to avert any forecast local shortage. Australia's petroleum industry said it would work closely with the government on its gas policy review, but warned that market intervention could come at a cost, including increasing the perceived risk of doing business in the country.

Source: Reuters

Mozambique kicks off construction of \$25 bn gas project

6 August. Mozambique started constructing a multi-billion-dollar liquefied natural gas (LNG) project offshore, operated by the US (United States) energy giant Anadarko on the country's remote northern coast. President Filipe Nyusi laid the foundation stone in Palma in the Cabo Delgado province, hailing the \$25 bn Rovuma basin LNG project. The country's gas deposits are estimated at 5,000 billion cubic meters (bcm) and would make Mozambique a major exporter of liquefied natural gas. Annual production is expected to start in 2024 with an estimated output of 12 million tonnes (mt). Mozambique is hoping the discovery of the gigantic gas reserves at the beginning of the decade will bring about economic rebirth in the southeast African nation. Anadarko has previously said Mozambique's natural gas reserves, "are among the best and the largest in the world".

Source: The Economic Times

Ukraine has 15.9 bcm of gas in storage so far for winter: Naftogaz

2 August. Ukraine has accumulated 15.9 billion cubic meters (bcm) of gas in storage as of 31 July, up from 12.8 bcm at the same time last year, Ukrainian state energy firm Naftogaz said. It said the country added 2.3 bcm in July and aimed to stockpile a total of 20 bcm by mid-October, when the 2019/20 heating season starts. Ukraine last year stored 16.9 bcm of gas for the 2018/19 heating season that ended in April. Naftogaz said the country would need to store more gas to avoid a shortage this winter. Its 10-year contracts with Russian giant Gazprom for gas supply and transit expire at the end of the year, but negotiations about further deals have not yet started. Ukraine consumed 32.3 bcm of gas in 2018, 10.6 bcm of which was imported from European markets outside Russia.

Source: Reuters

Asia LNG spot cargoes trade below \$4 on abundant global supply

1 August. Cargoes of liquefied natural gas (LNG) are trading in Asia below \$4 per million metric British thermal units (mmBtu) for the first time in several years, as new supply floods the global pool and as demand from North Asia remains weak. The last time a cargo traded below \$4 was likely about three to four years ago. Indian Oil Corp (IOC) bought a cargo for delivery in the second half of August from commodity trader Trafigura at \$3.69 per mmBtu through a tender. Separately, China National Offshore Oil Corp (CNOOC) bought a cargo for delivery in early September from Vitol at \$3.90 per mmBtu. Spot LNG prices in Asia were at \$10 per mmBtu at the same time last year, after reaching a four-year high in June 2018, Eikon data showed.

Source: Reuters

EU okays Croatia's state aid of Krk LNG terminal

31 July. European Union (EU) antitrust regulators approved Croatia's plans to support construction and operation of liquefied natural gas (LNG) terminal at Krk Island, saying it would help diversify from reliance on Russia for energy imports. Croatia decided in January to

co-finance the terminal at the town of Omisalj with €100 mn (\$112.95 mn). The EU is also providing €101.4 mn for the project that aims to reduce dependence on Russian gas imports.

Source: Reuters

Oman signs gas exploration agreement with Italy's Eni and BP Oman

31 July. Oman's ministry of oil and gas has signed a gas exploration agreement with Italy's Eni and BP Oman for concession block 77, the ministry said. The agreement involves seismic studies and the drilling of exploration wells and it is hoped this could also lead to the discovery of new oil fields, it said.

Source: Reuters

Indonesia is unlikely to begin natural gas imports in 2025: Energy Minister

31 July. Indonesian Energy Minister Ignasius Jonan said the country is unlikely to begin natural gas imports in 2025 as initially expected because some big gas projects will start production, reducing the need for overseas shipments. The government previously estimated Indonesia will have a gas deficit by 2025 and would need to start importing the fuel. Indonesia upstream oil and gas regulator SKK Migas said projects such as Sakakemang and the Tangguh Train 3, among others, are expected to start operating before 2025. SKK Migas Chairman Dwi Soetjipto said although he expects the volume of domestic gas consumption to increase by 2025, he estimated the portion of domestic use will stay at the current level of 60 percent of the country's natural gas production in 2025. Meanwhile, the government has said Repsol's Sakakemang gas project, which has an estimated 2 trillion cubic feet (tcf) gas resources, is estimated to come onstream within three years from 2019. Jonan said that future domestic demand for gas will continue to come from the power sector. Indonesia's power generators currently have 20 percent of their energy sourced from gas and it is expected to increase to around 23 percent by 2025.

Source: Reuters

INTERNATIONAL: COAL

Vietnam mulls importing US coal for power generation

6 August. Vietnam is considering importing coal from the United States (US) to meet rising demand for the fuel for power generation, as the Southeast Asian country plans to build more coal-fired power plants. Executives from state-run coal producer Vinacomin and Pennsylvania-based Xcoal Energy & Resources met in Hanoi to discuss the possibilities of shipping US coal to Vietnam. Vietnam has recently become a net coal importer, with most of its shipments coming from Australia and Indonesia. Coal is expected to account for 42.6 percent of Vietnam's power generating capacity by 2030, up from 38.1 percent currently, according to the Ministry of Industry and Trade. It said Vinacomin, formally known as Vietnam National Coal-Mineral Industries Corp, annually produces about 40 million tonnes (mt) of coal from domestic mines. The Ministry of Industry and Trade said that Vietnam will contend with severe power shortages from 2021 as electricity demand outpaces construction of new power plants, adding that it will have to import 680 mt of coal to feed its power plants during the 2016-2030 period..

Source: Reuters

Polish court ruling undermines Poland's last coal power plant plan

1 August. A Polish district court has ruled as invalid last year's decision by state-run utility Enea to join a project to build a 1 GW coal-fueled power plant in cooperation with peer Energa, Enea said. The planned power plant at Ostroleka in north-east Poland was supposed to be the last coal-based project in the coal-dependent country, the

energy ministry said. The project, which is expected to be completed in 2023 at a cost of 6 bn zlotys (\$1.5 bn), has been opposed by environmentalists who say it only strengthens Poland's reliance on coal and is not economically justifiable. The plan to build the plant was initially revived by Energa, another state-run energy group, in 2016 in response to a government policy to keep using coal as the basic source of energy over the long term.

Source: Reuters

INTERNATIONAL: POWER

Brazil's Petrobras studies sale of power plants

6 August. Brazil's state-controlled oil company Petroleo Brasileiro SA (Petrobras), is studying the creation of a subsidiary comprised of around 15 power plants, which could then be sold through an initial public offering, analysts at XP Investimentos said. Petrobras operates 20 power plants with 6,000 MW in total capacity.

Source: Reuters

Texas power prices triple as heat wave expected to boost demand to record highs

6 August. Spot power prices in Texas almost tripled on forecasts demand for electricity would hit record levels as consumers crank up their air conditioners to escape a heat wave blanketing much of the state. The Electric Reliability Council of Texas (ERCOT), the grid operator for much of the state, forecast that heat would push peak demand to more than 73,600 MW on 8 August and over 75,300 MW on 12 August. That would top the current all-time high of 73,473 MW on 19 July 2018. ERCOT has said it expects to have about 78,154 MW of generating capacity to meet demand this summer, but warned there was an increased chance low reserves would force it to

issue more alerts calling on customers to conserve energy this summer than last year. When ERCOT declares an alert, it can take advantage of additional resources that are only available during scarcity conditions, including power imports from neighbouring regions and demand response programs that pay consumers to curtail power use when needed.

Source: Reuters

Indonesian President bashes state power company over blackouts

5 August. Indonesia's state power company PLN should have had plans in place to prevent a major electricity blackout that affected 21 mn customers in Jakarta and neighbouring provinces, President Joko Widodo said. In the wake of the biggest power outage in 14 years, Widodo demanded to know why the utility PT Perusahaan Listrik Negara (PLN) did not have a back-up plan given its history of blackouts. Jakarta, the center of government and business in Indonesia, suffers periodic blackouts that are usually short-lived and confined to certain areas. Power failed after faulty transmission circuits triggered "cascading voltage" that disconnected power plants supplying electricity to the west part of Java island, which includes the capital, PLN said. The outage, the biggest since a transmission failure cut power in Java and Bali in 2005, halted Jakarta's subway system and commuter train lines, stranding passengers. Rida Mulyana, director general of electricity at the energy ministry, said 21 mn customers were affected by the outage. PLN said a number of power plants had been restarted and 23 substations were operating. PLN said that overgrown trees had made contact with a high-voltage power line and started a fire that triggered the transmission failure.

Source: Reuters

INTERNATIONAL: NON-FOSSIL FUELS/ CLIMATE CHANGE TRENDS

Shell considers solar panels to power Singapore refinery site

6 August. Royal Dutch Shell is considering to install solar panels to power its Bukom refining site in Singapore. The oil and gas company has been exploring solar installations for its other sites in Singapore as part of its plans to improve energy efficiency and reduce carbon footprint. Globally, Shell is installing solar photovoltaic panels on the roofs of seven lubricant plants in China, India, Italy, Singapore and Switzerland. It has so far identified three manufacturing and logistics sites in Singapore's western regions of Tuas, Jurong Island and Pandan to install a solar photovoltaic (PV) power generation system, with a combined peak capacity of about 3 MW.

Source: *Reuters*

Chinese smartphone maker Xiaomi may launch a smartphone with solar-powered panel

6 August. Chinese smartphone maker Xiaomi may be working on launching a smartphone that can be charged using solar energy. According to the report by LetsGoDigital, this handset will have a solar panel integrated on the back — covering most of the rear side. Notably, if Xiaomi does decide to launch a smartphone that supports solar power charging, it won't be the first. Handset makers such as LG and Samsung have already launched devices featuring a solar chargeable batteries.

Source: *The Economic Times*

UK-based Quercus to sell 320 MW solar, wind portfolio

5 August. British-based renewable energy investor Quercus is looking to sell a 320 MW portfolio of wind and solar energy assets in Europe. The assets, part of which are held in a joint venture with Swiss Life, are located in the UK (United Kingdom), Italy, Spain and in Eastern Europe. The deal, which is likely to be a private sale rather than an auction, is expected to happen after

the summer. European Union (EU) ambitions to reduce greenhouse gas emissions by at least 40 percent by 2030 in line with the Paris Agreement are helping drive green energy deals.

Source: *Reuters*

Saudi Arabia invites bidders for second round of renewable energy programme

2 August. Saudi Arabia has invited bidders for the second round of its renewable energy programme. The programme is managed by the Renewable Energy Project Development Office (REPDO) of Saudi Arabia's Ministry of Energy. The second round of the programme, comprising six projects, tenders a total solar PV capacity of 1.47 GW to qualified companies.

Source: *The Economic Times*

Brazil's JBS invests in new biodiesel plant amid clean fuel push

31 July. A unit of Brazil's JBS SA plans to invest 180 mn reais (\$47.5 mn) to build a biodiesel plant entering service by 2021, as the company looks to cash in on Brazil's accelerating clean fuel drive. Seara Alimentos, JBS' processed foods unit, will use fat and scraps from pork and poultry as raw material for biodiesel. JBS, the world's largest meat producer, added the new plant in Santa Catarina state will double the company's biodiesel capacity to over 600 mn liters per year.

Source: *Reuters*

Record solar power generation in France in June: RTE

31 July. Electricity production from solar panels in France rose 15.4 percent to a record 1.4 terawatt hour (TWh) in June due to long sunny spells and increased generation capacity, the RTE power systems operator said. French solar power capacity rose 9.5 percent year-on-year in June compared with last year as more solar production units were connected to the grid, RTE said.

Source: *Reuters*

DATA INSIGHT

Electricity Requirement & Availability

| State/UT | Availability (MU) 2018-19 (P) | Requirement (MU) 2019-20 (E) |
|-------------------|-------------------------------|------------------------------|
| Delhi | 32282 | 35380 |
| Haryana | 53665 | 57083 |
| Himachal Pradesh | 9618 | 10949 |
| Jammu & Kashmir | 15868 | 17109 |
| Punjab | 55275 | 64730 |
| Rajasthan | 79637 | 83168 |
| Uttar Pradesh | 116118 | 132476 |
| Uttarakhand | 13753 | 17007 |
| Chandigarh | 1561 | 2145 |
| Goa | 4280 | 5068 |
| Gujarat | 116572 | 120693 |
| Chhattisgarh | 26076 | 33463 |
| Madhya Pradesh | 75665 | 88022 |
| Maharashtra | 158148 | 171313 |
| D. & N. Haveli | 6317 | 8210 |
| Daman & Diu | 2557 | 2449 |
| Andhra Pradesh | 63677 | 68034 |
| Telangana | 66635 | 75164 |
| Karnataka | 71690 | 77532 |
| Kerala | 24911 | 28535 |
| Tamil Nadu | 109273 | 123724 |
| Puducherry | 2751 | 3387 |
| Bihar | 29827 | 31017 |
| Jharkhand | 8461 | 27488 |
| Odisha | 31781 | 30302 |
| West Bengal | 52078 | 63979 |
| Sikkim | 512 | 577 |
| Assam | 9204 | 11894 |
| Manipur | 906 | 1769 |
| Meghalaya | 1953 | 2378 |
| Nagaland | 809 | 992 |
| Tripura | 1837 | 1456 |
| Arunachal Pradesh | 855 | 1210 |
| Mizoram | 661 | 737 |
| Andaman & Nicobar | 323 | 414 |
| Lakshadweep | 46 | 57 |
| All India | 1267208 [^] | 1399913 |

P: Provisional

E: Estimate

[^]includes 21995 MU from DVC

Source: Compiled from Central Electricity Authority & Lok Sabha Questions

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