National Load Despatch Centre
राष्ट्रीय भार प्रेषण केंद्र
POWER SYSTEM OPERATION CORPORATION LIMITED
पॉवर सिस्टम ऑपरेशन कारपोरेशन लिमिटेड
(Government of India Enterprise/ भारत सरकार का उद्यम)
B-9, QUTUB INSTITUTIONAL AREA, KATWARIA SARAI, NEW DELHI -110016
बी-9, क़ुतुब इन्स्टीट्यूशनल एरिया, कटवारिया सराये, न्यू दिल्ली-110016

Ref: POSOCO/NLDC/SO/Daily PSP Report

दिनांक: 17th May 2020

To,

1. कार्यकारी निदेशक, पू .क्षे .भा .प्रे .के.,14 , गोल्फ क्लब रोड , कोलकाता - 700033
   Executive Director, ERLDC, 14 Golf Club Road, Tollygunge, Kolkata, 700033
2. कार्यकारी निदेशक, ऊ. क्षे. भा. प्रे. के., 18/ ए , शहीद जीत सिंह सनसनवाल मार्ग, नई दिल्ली - 110016
   Executive Director, NRLDC, 18-A, Shaheed Jeet Singh Marg, Katwaria Sarai, New Delhi – 110016
3. कार्यकारी निदेशक, प .क्षे .भा .प्रे .के., एफ3-, एम आई डी सी क्षेत्र , अंधेरी, मुंबई -400093
   Executive Director, WRLDC, F-3, M.I.D.C. Area, Marol, Andheri (East), Mumbai-400093
4. कार्यकारी निदेशक, ऊ. पू. क्षे. भा. प्रे. के., डोंगतिएह, लोअर नोंग्रह , लापलंग, शिलोंग - 793006
   Executive Director, NERLDC, Dongteih, Lower Nongrah, Lapalang, Shillong - 793006, Meghalaya
5. कार्यकारी निदेशक , द .क्षे .भा .प्रे .के.,29 , रेस कोर्स क्रॉस रोड, बंगलुरु -560009
   Executive Director, SRLDC, 29, Race Course Cross Road, Bangalore-560009

**Sub: Daily PSP Report for the date 16.05.2020.**

महोदय/Dear Sir,

आई०ई०जी०सी०-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 16-मई-2020 की अखिल भारतीय प्रणाली की दैनिक ग्रिड निष्पादन रिपोर्ट रा०भा०प्रे०के० की वेबसाइट पर उप्लब्ध है ।

As per article 5.5.1 of the Indian Electricity Grid Code, the daily report pertaining power supply position of All India Power System for the date 16th May 2020, is available at the NLDC website.

धन्यवाद,

# पॉवर सिस्टम ऑपरेशन कारपोरेशन लिमिटेड
# राष्ट्रीय भार प्रेषण केंद्र, नई दिल्ली

**Report for previous day** **Date of Reporting: 17-May-2020**

**A. Power Supply Position at All India and Regional level**

| | NR | WR | SR | ER | NER | TOTAL |
|---|---|---|---|---|---|---|
| Demand Met during Evening Peak hrs(MW) (at 2000 hrs; from RLDCs) | 43861 | 40948 | 36537 | 18516 | 2317 | 142179 |
| Peak Shortage (MW) | 1085 | 0 | 0 | 0 | 154 | 1239 |
| Energy Met (MU) | 1008 | 1031 | 917 | 415 | 39 | 3410 |
| Hydro Gen (MU) | 277 | 35 | 80 | 79 | 10 | 482 |
| Wind Gen (MU) | 6 | 63 | 49 | - | - | 118 |
| Solar Gen (MU)* | 41.00 | 26.40 | 73.61 | 4.82 | 0.04 | 146 |
| Energy Shortage (MU) | 12.0 | 0.0 | 0.0 | 0.0 | 1.7 | 13.6 |
| Maximum Demand Met During the Day (MW) (From NLDC SCADA) | 47336 | 46085 | 41792 | 19081 | 2389 | 149008 |
| Time Of Maximum Demand Met (From NLDC SCADA) | 22:15 | 15:31 | 12:19 | 00:04 | 19:05 | 22:31 |

**B. Frequency Profile (%)**

| Region | FVI | < 49.7 | 49.7 - 49.8 | 49.8 - 49.9 | < 49.9 | 49.9 - 50.05 | > 50.05 |
|---|---|---|---|---|---|---|---|
| All India | 0.021 | 0.00 | 0.00 | 1.50 | 1.50 | 82.49 | 16.01 |

**C. Power Supply Position in States**

| Region | States | Max.Demand Met during the day(MW) | Shortage during maximum Demand(MW) | Energy Met (MU) | Drawal Schedule (MU) | OD(+)/UD(-) (MU) | Max OD (MW) | Energy Shortage (MU) |
|---|---|---|---|---|---|---|---|---|
| NR | Punjab | 6114 | 0 | 129.8 | 100.3 | -0.1 | 156 | 0.0 |
| | Haryana | 6305 | 0 | 128.5 | 118.2 | 0.8 | 294 | 0.0 |
| | Rajasthan | 10525 | 0 | 225.2 | 84.4 | 1.1 | 320 | 0.0 |
| | Delhi | 3848 | 0 | 73.3 | 59.1 | -2.7 | 0 | 0.0 |
| | UP | 18278 | 310 | 350.6 | 178.7 | 1.0 | 1124 | 1.6 |
| | Uttarakhand | 1462 | 0 | 30.5 | 12.6 | 0.7 | 166 | 0.0 |
| | HP | 1160 | 0 | 22.4 | 0.2 | 0.7 | 156 | 0.0 |
| | J&K(UT) & Ladakh(UT) | 2132 | 533 | 43.8 | 21.1 | -0.2 | 362 | 10.3 |
| | Chandigarh | 166 | 0 | 3.5 | 3.5 | 0.0 | 25 | 0.0 |
| WR | Chhattisgarh | 3314 | 0 | 76.5 | 24.4 | -1.2 | 159 | 0.0 |
| | Gujarat | 14247 | 0 | 306.5 | 94.9 | 2.7 | 514 | 0.0 |
| | MP | 9105 | 0 | 205.5 | 121.8 | -1.0 | 376 | 0.0 |
| | Maharashtra | 18534 | 0 | 405.1 | 145.9 | -0.2 | 685 | 0.0 |
| | Goa | 460 | 0 | 8.9 | 8.7 | -0.2 | 119 | 0.0 |
| | DD | 196 | 0 | 4.3 | 4.2 | 0.1 | 25 | 0.0 |
| | DNH | 339 | 0 | 7.6 | 7.5 | 0.1 | 29 | 0.0 |
| | AMNSIL | 769 | 0 | 16.2 | 3.2 | 1.0 | 266 | 0.0 |
| SR | Andhra Pradesh | 9506 | 0 | 185.5 | 101.5 | 1.2 | 748 | 0.0 |
| | Telangana | 7258 | 0 | 152.8 | 61.0 | -0.2 | 417 | 0.0 |
| | Karnataka | 10423 | 0 | 204.1 | 65.0 | 0.7 | 574 | 0.0 |
| | Kerala | 3570 | 0 | 71.2 | 46.4 | 0.7 | 227 | 0.0 |
| | Tamil Nadu | 13159 | 0 | 296.5 | 162.0 | 0.9 | 566 | 0.0 |
| | Puducherry | 348 | 0 | 7.4 | 7.6 | -0.2 | 38 | 0.0 |
| ER | Bihar | 5086 | 0 | 101.9 | 95.6 | -0.8 | 265 | 0.0 |
| | DVC | 2423 | 0 | 53.0 | -29.0 | 0.1 | 220 | 0.0 |
| | Jharkhand | 1339 | 0 | 25.9 | 18.4 | -1.5 | 115 | 0.0 |
| | Odisha | 3812 | 0 | 81.3 | 7.8 | 0.3 | 190 | 0.0 |
| | West Bengal | 7045 | 0 | 151.7 | 43.6 | 1.6 | 330 | 0.0 |
| | Sikkim | 75 | 0 | 0.9 | 1.3 | -0.4 | 15 | 0.0 |
| NER | Arunachal Pradesh | 106 | 0 | 1.9 | 1.7 | 0.1 | 31 | 0.0 |
| | Assam | 1353 | 127 | 22.1 | 17.1 | -0.4 | 125 | 1.5 |
| | Manipur | 181 | 2 | 2.2 | 2.3 | -0.1 | 31 | 0.0 |
| | Meghalaya | 323 | 0 | 5.1 | 3.1 | -0.3 | 63 | 0.1 |
| | Mizoram | 98 | 1 | 1.5 | 1.5 | -0.1 | 17 | 0.0 |
| | Nagaland | 118 | 3 | 2.4 | 2.2 | 0.1 | 13 | 0.0 |
| | Tripura | 259 | 2 | 4.2 | 4.9 | -0.3 | 36 | 0.0 |

**D. Transnational Exchanges (MU) - Import(+ve)/Export(-ve)**

| | Bhutan | Nepal | Bangladesh |
|---|---|---|---|
| Actual (MU) | 23.9 | -0.4 | -25.7 |
| Day Peak (MW) | 1342.6 | -95.0 | -1142.0 |

**E. Import/Export by Regions (in MU) - Import(+ve)/Export(-ve); OD(+)/UD(-)**

| | NR | WR | SR | ER | NER | TOTAL |
|---|---|---|---|---|---|---|
| Schedule(MU) | 226.9 | -292.4 | 148.2 | -84.7 | 1.9 | -0.1 |
| Actual(MU) | 212.6 | -293.8 | 166.2 | -85.2 | -1.3 | -1.4 |
| O/D/U/D(MU) | -14.3 | -1.4 | 18.0 | -0.5 | -3.2 | -1.3 |

**F. Generation Outage(MW)**

| | NR | WR | SR | ER | NER | TOTAL |
|---|---|---|---|---|---|---|
| Central Sector | 5625 | 15678 | 10152 | 1721 | 649 | 33825 |
| State Sector | 18035 | 22238 | 10758 | 5552 | 11 | 56594 |
| Total | 23660 | 37915 | 20910 | 7273 | 660 | 90418 |

**G. Sourcewise generation (MU)**

| | NR | WR | SR | ER | NER | All India |
|---|---|---|---|---|---|---|
| Coal | 368 | 1075 | 429 | 460 | 7 | 2339 |
| Lignite | 24 | 16 | 32 | 0 | 0 | 72 |
| Hydro | 277 | 35 | 80 | 79 | 10 | 482 |
| Nuclear | 27 | 33 | 47 | 0 | 0 | 107 |
| Gas, Naptha & Diesel | 34 | 78 | 18 | 0 | 30 | 161 |
| RES (Wind, Solar, Biomass & Others) | 73 | 103 | 158 | 5 | 0 | 339 |
| Total | 803 | 1340 | 765 | 544 | 47 | 3500 |
| | | | | | | |
| Share of RES in total generation (%) | 9.11 | 7.72 | 20.60 | 0.89 | 0.08 | 9.69 |
| Share of Non-fossil fuel (Hydro,Nuclear and RES) in total generation(%) | 47.04 | 12.77 | 37.27 | 15.47 | 21.63 | 26.53 |

**H. All India Demand Diversity Factor**

| | |
|---|---|
| Based on Regional Max Demands | 1.052 |
| Based on State Max Demands | 1.097 |

*Diversity factor = Sum of regional or state maximum demands / All India maximum demand*

***Source: RLDCs for solar connected to ISTS; SLDCs for embedded solar. Limited visibility of embedded solar data.**

**Executive Director-NLDC**

## INTER-REGIONAL EXCHANGES

Import=(+ve) /Export =(-ve) for NET (MU)

Date of Reporting: 17-May-2020

| Sl No | Voltage Level | Line Details | Circuit | Max Import (MW) | Max Export (MW) | Import (MU) | Export (MU) | NET (MU) |
|---|---|---|---|---|---|---|---|---|
| Import/Export of ER (With NR) | | | | | | | | |
| 1 | HVDC | ALIPURDUAR-AGRA | - | 0 | 0 | 0.0 | 0.0 | 0.0 |
| 2 | HVDC | PUSAULI B/B | S/C | 0 | 248 | 0.0 | 6.1 | -6.1 |
| 3 | 765 kV | GAYA-VARANASI | D/C | 0 | 541 | 0.0 | 5.9 | -5.9 |
| 4 | 765 kV | SASARAM-FATEHPUR | S/C | 132 | 148 | 0.0 | 0.7 | -0.7 |
| 5 | 765 kV | GAYA-BALIA | S/C | 0 | 324 | 0.0 | 5.6 | -5.6 |
| 6 | 400 kV | PUSAULI-VARANASI | S/C | 0 | 221 | 0.0 | 4.4 | -4.4 |
| 7 | 400 kV | PUSAULI -ALLAHABAD | S/C | 0 | 106 | 0.0 | 1.5 | -1.5 |
| 8 | 400 kV | MUZAFFARPUR-GORAKHPUR | D/C | 0 | 746 | 0.0 | 9.8 | -9.8 |
| 9 | 400 kV | PATNA-BALIA | Q/C | 0 | 659 | 0.0 | 10.0 | -10.0 |
| 10 | 400 kV | BIHARSHARIFF-BALIA | D/C | 0 | 216 | 0.0 | 2.2 | -2.2 |
| 11 | 400 kV | MOTIHARI-GORAKHPUR | D/C | 0 | 337 | 0.0 | 5.3 | -5.3 |
| 12 | 400 kV | BIHARSHARIFF-VARANASI | D/C | 112 | 193 | 0.0 | 0.4 | -0.4 |
| 13 | 220 kV | PUSAULI-SAHUPURI | S/C | 0 | 228 | 0.0 | 3.4 | -3.4 |
| 14 | 132 kV | SONE NAGAR-RIHAND | S/C | 0 | 0 | 0.0 | 0.0 | 0.0 |
| 15 | 132 kV | GARWAH-RIHAND | S/C | 30 | 0 | 0.5 | 0.0 | 0.5 |
| 16 | 132 kV | KARMANASA-SAHUPURI | S/C | 0 | 0 | 0.0 | 0.0 | 0.0 |
| 17 | 132 kV | KARMANASA-CHANDAULI | S/C | 0 | 0 | 0.0 | 0.0 | 0.0 |
| | | | | | ER-NR | 0.5 | 55.2 | -54.7 |
| Import/Export of ER (With WR) | | | | | | | | |
| 1 | 765 kV | JHARSUGUDA-DHARAMJAIGARH | Q/C | 1484 | 0 | 21.0 | 0.0 | 21.0 |
| 2 | 765 kV | NEW RANCHI-DHARAMJAIGARH | D/C | 1124 | 0 | 15.3 | 0.0 | 15.3 |
| 3 | 765 kV | JHARSUGUDA-DURG | D/C | 172 | 122 | 0.3 | 0.0 | 0.3 |
| 4 | 400 kV | JHARSUGUDA-RAIGARH | Q/C | 168 | 68 | 1.6 | 0.0 | 1.6 |
| 5 | 400 kV | RANCHI-SIPAT | D/C | 398 | 0 | 6.4 | 0.0 | 6.4 |
| 6 | 220 kV | BUDHIPADAR-RAIGARH | S/C | 0 | 68 | 0.0 | 0.9 | -0.9 |
| 7 | 220 kV | BUDHIPADAR-KORBA | D/C | 160 | 0 | 2.6 | 0.0 | 2.6 |
| | | | | | ER-WR | 47.2 | 0.9 | 46.3 |
| Import/Export of ER (With SR) | | | | | | | | |
| 1 | HVDC | JEYPORE-GAZUWAKA B/B | D/C | 0 | 400 | 0.0 | 8.0 | -8.0 |
| 2 | HVDC | TALCHER-KOLAR BIPOLE | D/C | 0 | 2468 | 0.0 | 48.8 | -48.8 |
| 3 | 765 kV | ANGUL-SRIKAKULAM | D/C | 0 | 3137 | 0.0 | 61.9 | -61.9 |
| 4 | 400 kV | TALCHER-I/C | D/C | 0 | 903 | 0.0 | 4.4 | -4.4 |
| 5 | 220 kV | BALIMELA-UPPER-SILERRU | S/C | 1 | 0 | 0.0 | 0.0 | 0.0 |
| | | | | | ER-SR | 0.0 | 118.7 | -118.7 |
| Import/Export of ER (With NER) | | | | | | | | |
| 1 | 400 kV | BINAGURI-BONGAIGAON | D/C | 103 | 190 | 0.0 | 1.4 | -1.4 |
| 2 | 400 kV | ALIPURDUAR-BONGAIGAON | D/C | 0 | 395 | 0.0 | 5.4 | -5.4 |
| 3 | 220 kV | ALIPURDUAR-SALAKATI | D/C | 0 | 76 | 0.0 | 0.9 | -0.9 |
| | | | | | ER-NER | 0.0 | 7.6 | -7.6 |
| Import/Export of NER (With NR) | | | | | | | | |
| 1 | HVDC | BISWANATH CHARIALI-AGRA | - | 0 | 401 | 0.0 | 9.6 | -9.6 |
| | | | | | NER-NR | 0.0 | 9.6 | -9.6 |
| Import/Export of WR (With NR) | | | | | | | | |
| 1 | HVDC | CHAMPA-KURUKSHETRA | D/C | 0 | 1200 | 0.0 | 26.2 | -26.2 |
| 2 | HVDC | V'CHAL B/B | D/C | 271 | 0 | 4.0 | 0.0 | 4.0 |
| 3 | HVDC | APL -MHG | D/C | 0 | 1171 | 0.0 | 29.1 | -29.1 |
| 4 | 765 kV | GWALIOR-AGRA | D/C | 0 | 2647 | 0.0 | 47.0 | -47.0 |
| 5 | 765 kV | PHAGI-GWALIOR | D/C | 0 | 1099 | 0.0 | 23.0 | -23.0 |
| 6 | 765 kV | JABALPUR-ORAI | D/C | 0 | 906 | 0.0 | 29.6 | -29.6 |
| 7 | 765 kV | GWALIOR-ORAI | S/C | 544 | 0 | 11.6 | 0.0 | 11.6 |
| 8 | 765 kV | SATNA-ORAI | S/C | 0 | 1460 | 0.0 | 31.0 | -31.0 |
| 9 | 765 kV | CHITORGARH-BANASKANTHA | D/C | 276 | 780 | 0.0 | 4.9 | -4.9 |
| 10 | 400 kV | ZERDA-KANKROLI | S/C | 146 | 64 | 1.1 | 0.0 | 1.1 |
| 11 | 400 kV | ZERDA -BHINMAL | S/C | 126 | 151 | 0.0 | 0.7 | -0.7 |
| 12 | 400 kV | V'CHAL -RIHAND | S/C | 982 | 0 | 22.4 | 0.0 | 22.4 |
| 13 | 400 kV | RAPP-SHUJALPUR | D/C | 80 | 219 | 0.0 | 2.0 | -2.0 |
| 14 | 220 kV | BHANPURA-RANPUR | S/C | 7 | 80 | 1.8 | 0.7 | 1.1 |
| 15 | 220 kV | BHANPURA-MORAK | S/C | 0 | 115 | 0.0 | 1.8 | -1.8 |
| 16 | 220 kV | MEHGAON-AURAIYA | S/C | 83 | 0 | 0.1 | 0.0 | 0.1 |
| 17 | 220 kV | MALANPUR-AURAIYA | S/C | 59 | 22 | 0.6 | 0.0 | 0.6 |
| 18 | 132 kV | GWALIOR-SAWAI MADHOPUR | S/C | 0 | 0 | 0.0 | 0.0 | 0.0 |
| | | | | | WR-NR | 41.6 | 196.0 | -154.4 |
| Import/Export of WR (With SR) | | | | | | | | |
| 1 | HVDC | BHADRAWATI B/B | - | 0 | 999 | 0.0 | 19.5 | -19.5 |
| 2 | HVDC | BARSUR-L.SILERU | - | 0 | 0 | 0.0 | 0.0 | 0.0 |
| 3 | 765 kV | SOLAPUR-RAICHUR | D/C | 0 | 1846 | 0.0 | 30.8 | -30.8 |
| 4 | 765 kV | WARDHA-NIZAMABAD | D/C | 0 | 2491 | 0.0 | 45.0 | -45.0 |
| 5 | 400 kV | KOLHAPUR-KUDGI | D/C | 224 | 151 | 1.3 | 0.5 | 0.8 |
| 6 | 220 kV | KOLHAPUR-CHIKODI | D/C | 0 | 0 | 0.0 | 0.0 | 0.0 |
| 7 | 220 kV | PONDA-AMBEWADI | S/C | 1 | 0 | 0.0 | 0.0 | 0.0 |
| 8 | 220 kV | XELDEM-AMBEWADI | S/C | 1 | 92 | 1.2 | 0.0 | 1.2 |
| | | | | | WR-SR | 2.5 | 95.7 | -93.2 |

## INTERNATIONAL EXCHANGES

| State | Region | Line Name | Max (MW) | Min (MW) | Avg (MW) | Energy Exchange (MU) |
|---|---|---|---|---|---|---|
| BHUTAN | ER | DAGACHU ( 2 * 63 ) | 0 | 0 | 0 | 0.0 |
| | ER | CHUKA ( 4 * 84 ) BIRPARA RECEIPT | 152 | 68 | 96 | 2.3 |
| | ER | MANGDECHHU (4 x 180) ALIPURDUAR RECEIPT | 607 | 471 | 420 | 10.1 |
| | ER | TALA ( 6 * 170 ) BINAGURI RECEIPT | 428 | 169 | 400 | 9.6 |
| | NER | 132KV-SALAKATI - GELEPHU | 0 | 0 | 5 | 0.1 |
| | NER | 132KV-RANGIA - DEOTHANG | 0 | 0 | 36 | 0.9 |
| NEPAL | NR | 132KV-Tanakpur(NH) - Mahendranagar(PG) | 0 | 0 | 0 | 0.0 |
| | ER | 132KV-BIHAR - NEPAL | -9 | -2 | -6 | -0.1 |
| | ER | 220KV-MUZAFFARPUR - DHALKEBAR DC | 104 | 2 | -10 | -0.2 |
| BANGLADESH | ER | Bheramara HVDC(Bangladesh) | -960 | -756 | -929 | -22.3 |
| | NER | 132KV-SURAJMANI NAGAR - COMILLA(BANGLADESH)-1 | 91 | 0 | -72 | -1.7 |
| | NER | 132KV-SURAJMANI NAGAR - COMILLA(BANGLADESH)-2 | 91 | 0 | -72 | -1.7 |