



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

Ref: POSOCO/NLDC/SO/Daily PSP Report

दिनांक: 20<sup>th</sup> Jul 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., डोंगतिह, 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 19.07.2020.**

महोदय/Dear Sir,

आईईजीसी-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 19-जुलाई-2020 की अखिल भारतीय प्रणाली की दैनिक ग्रिड निष्पादन रिपोर्ट रांभांप्रेके की वेबसाइट पर उपलब्ध 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 19<sup>th</sup> July 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: 20-Jul-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)	56496	41806	33033	19433	2518	153286
Peak Shortage (MW)	501	0	0	0	160	661
Energy Met (MU)	1317	1015	792	447	46	3617
Hydro Gen (MU)	344	22	80	147	28	621
Wind Gen (MU)	33	79	36	-	-	148
Solar Gen (MU)*	33.52	24.20	70.40	4.07	0.02	132
Energy Shortage (MU)	9.5	0.0	0.0	0.0	4.1	13.6
Maximum Demand Met During the Day (MW) (From NLDC SCADA)	63274	42911	36432	22606	2556	160144
Time Of Maximum Demand Met (From NLDC SCADA)	00:03	11:29	12:50	00:00	19:40	00:00

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	0.023	0.00	0.00	0.47	0.47	77.62	21.91

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	11006	0	239.2	153.1	-1.3	140	0.0
	Haryana	8900	0	186.7	134.6	0.7	248	0.0
	Rajasthan	11711	0	260.4	100.5	-2.3	417	0.0
	Delhi	5457	0	101.8	88.6	-0.6	183	0.1
	UP	21788	0	417.7	208.6	-1.7	295	0.0
	Uttarakhand	1719	0	38.8	17.6	0.0	102	0.0
	HP	1232	0	26.9	-1.9	-0.3	348	0.0
	J&K(UT) & Ladakh(UT)	2100	525	39.7	18.0	-1.4	284	9.4
WR	Chandigarh	302	0	5.7	5.7	0.0	28	0.0
	Chhattisgarh	4082	0	99.1	33.3	-0.2	218	0.0
	Gujarat	12525	0	281.3	75.3	2.9	675	0.0
	MP	9877	0	223.8	118.5	-2.7	310	0.0
	Maharashtra	16624	0	367.5	133.6	-0.7	581	0.0
	Goa	367	0	7.4	7.2	-0.3	46	0.0
	DD	211	0	4.8	4.7	0.1	18	0.0
	DNH	600	0	13.7	13.6	0.1	33	0.0
SR	AMNSIL	779	0	17.6	5.5	0.0	268	0.0
	Andhra Pradesh	6934	0	147.8	61.6	1.1	526	0.0
	Telangana	9967	0	193.2	90.3	0.0	576	0.0
	Karnataka	7234	0	140.3	54.7	0.9	802	0.0
	Kerala	2920	0	57.0	45.1	0.9	197	0.0
	Tamil Nadu	10540	0	246.3	118.6	-0.8	419	0.0
	Puducherry	333	0	7.0	7.1	-0.1	36	0.0
	ER	Bihar	5730	0	99.9	99.8	-5.1	150
DVC		2928	0	63.9	-36.3	1.0	500	0.0
Jharkhand		1357	0	26.5	21.0	-2.8	100	0.0
Odisha		4563	0	96.7	16.7	1.3	250	0.0
West Bengal		8297	0	159.0	48.9	-1.6	355	0.0
Sikkim		77	0	1.0	1.2	-0.2	20	0.0
NER	Arunachal Pradesh	103	0	1.9	1.7	0.2	28	0.0
	Assam	1574	121	28.4	24.7	0.0	106	4.0
	Manipur	178	2	2.5	2.5	0.1	42	0.0
	Meghalaya	294	0	5.2	-0.9	-0.3	42	0.0
	Mizoram	96	0	1.6	1.2	0.2	15	0.0
	Nagaland	126	1	2.4	2.4	-0.2	9	0.0
	Tripura	258	1	4.5	6.2	-0.3	40	0.0

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

	Bhutan	Nepal	Bangladesh
Actual (MU)	54.7	-0.8	-26.2
Day Peak (MW)	2345.0	-101.5	-1116.0

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

	NR	WR	SR	ER	NER	TOTAL
Schedule(MU)	306.2	-291.0	107.3	-115.8	-6.7	0.0
Actual(MU)	287.4	-280.6	122.2	-126.1	-4.7	-1.9
O/D/U/D(MU)	-18.8	10.4	14.9	-10.3	1.9	-1.9

F. Generation Outage(MW)

	NR	WR	SR	ER	NER	TOTAL
Central Sector	3989	15947	10612	1350	677	32574
State Sector	8649	21046	15395	5492	47	50629
Total	12638	36993	26007	6842	723	83203

G. Sourcewise generation (MU)

	NR	WR	SR	ER	NER	All India
Coal	538	1074	365	454	6	2437
Lignite	19	15	22	0	0	55
Hvdro	344	22	80	147	28	621
Nuclear	26	33	47	0	0	106
Gas, Naptha & Diesel	35	46	19	0	23	124
RES (Wind, Solar, Biomass & Others)	88	122	151	4	0	365
Total	1051	1312	684	604	58	3709
Share of RES in total generation (%)	8.35	9.34	22.06	0.68	0.03	9.85
Share of Non-fossil fuel (Hydro,Nuclear and RES) in total generation(%)	43.62	13.53	40.64	24.95	48.74	29.46

H. All India Demand Diversity Factor

Based on Regional Max Demands	1.048
Based on State Max Demands	1.079

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: 20-Jul-2020

Sl No	Voltage Level	Line Details	Circuit	Max Import (MW)	Max Export (MW)	Import (MU)	Export (MU)	NET (MU)	
<b>Import/Export of ER (With NR)</b>									
1	HVDC	ALIPURDUAR-AGRA	D/C	0	1201	0.0	28.7	-28.7	
2	HVDC	PUSAULI B/B	-	1	398	0.0	9.5	-9.5	
3	765 kV	GAYA-VARANASI	D/C	0	573	0.0	9.1	-9.1	
4	765 kV	SASARAM-FATEHPUR	S/C	121	92	1.0	0.0	1.0	
5	765 kV	GAYA-BALIA	S/C	0	470	0.0	7.5	-7.5	
6	400 kV	PUSAULI-VARANASI	S/C	0	285	0.0	6.0	-6.0	
7	400 kV	PUSAULI-ALLAHABAD	S/C	6	173	0.0	3.2	-3.2	
8	400 kV	MUZAFFARPUR-GORAKHPUR	D/C	0	810	0.0	15.1	-15.1	
9	400 kV	PATNA-BALIA	O/C	0	847	0.0	14.9	-14.9	
10	400 kV	BIHARSHARIFF-BALIA	D/C	0	378	0.0	6.6	-6.6	
11	400 kV	MOTHARI-GORAKHPUR	D/C	0	326	0.0	5.0	-5.0	
12	400 kV	BIHARSHARIFF-VARANASI	D/C	16	246	0.0	2.7	-2.7	
13	220 kV	PUSAULI-SAHUPURI	S/C	0	100	0.0	1.9	-1.9	
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	0.4	0.0	0.4	
16	132 kV	KARMANASA-SAHUPURI	S/C	0	0	0.0	0.0	0.0	
17	132 kV	KARMANASA-CHANDAUJI	S/C	0	0	0.0	0.0	0.0	
						ER-NR	1.4	110.1	-108.7
<b>Import/Export of ER (With WR)</b>									
1	765 kV	JHARSUGUDA-DHARAMJAIGARH	Q/C	1114	0	18.4	0.0	18.4	
2	765 kV	NEW RANCHI-DHARAMJAIGARH	D/C	1134	0	13.9	0.0	13.9	
3	765 kV	JHARSUGUDA-DURG	D/C	100	123	0.4	0.0	0.4	
4	400 kV	JHARSUGUDA-RAIGARH	Q/C	146	98	0.5	0.0	0.5	
5	400 kV	RANCHI-SIPAT	D/C	399	0	5.0	0.0	5.0	
6	220 kV	BUDHIPADAR-RAIGARH	S/C	0	134	0.0	2.0	-2.0	
7	220 kV	BUDHIPADAR-KORBA	D/C	155	0	2.3	0.0	2.3	
						ER-WR	40.5	2.0	38.5
<b>Import/Export of ER (With SR)</b>									
1	HVDC	JEYPORE-GAZUWAKA B/B	D/C	0	369	0.0	8.5	-8.5	
2	HVDC	TALCHER-KOLAR BIPOLE	D/C	0	1584	0.0	39.6	-39.6	
3	765 kV	ANGUL-SRIKAKULAM	D/C	0	2563	0.0	45.6	-45.6	
4	400 kV	TALCHER-I/C	D/C	268	632	0.0	1.3	-1.3	
5	220 kV	BALIMELA-UPPER-SILERRU	S/C	1	0	0.0	0.0	0.0	
						ER-SR	0.0	93.7	-93.7
<b>Import/Export of ER (With NER)</b>									
1	400 kV	BINAGURI-BONGAIGAOON	D/C	0	334	0.0	3.5	-3.5	
2	400 kV	ALIPURDUAR-BONGAIGAOON	D/C	74	406	0.0	2.6	-2.6	
3	220 kV	ALIPURDUAR-SALAKATI	D/C	0	112	0.0	1.4	-1.4	
						ER-NER	0.0	7.5	-7.5
<b>Import/Export of NER (With NR)</b>									
1	HVDC	BISWANATH CHARIALI-AGRA	D/C	0	705	0.0	13.5	-13.5	
						NER-NR	0.0	13.5	-13.5
<b>Import/Export of WR (With NR)</b>									
1	HVDC	CHAMPA-KURUKSHETRA	D/C	0	1502	0.0	43.8	-43.8	
2	HVDC	VINDHYACHAL B/B	-	451	201	8.1	0.7	7.5	
3	HVDC	MUNDRA-MOHINDERGARH	D/C	0	1169	0.0	22.7	-22.7	
4	765 kV	GWALIOR-AGRA	D/C	0	2516	0.0	39.5	-39.5	
5	765 kV	PHAGI-GWALIOR	D/C	0	1195	0.0	20.0	-20.0	
6	765 kV	JABALPUR-ORAI	D/C	0	1006	0.0	33.0	-33.0	
7	765 kV	GWALIOR-ORAI	S/C	438	0	8.3	0.0	8.3	
8	765 kV	SATNA-ORAI	S/C	0	1444	0.0	28.7	-28.7	
9	765 kV	CHITORGARH-BANASKANTHA	D/C	0	1339	0.0	19.1	-19.1	
10	400 kV	ZERDA-KANKROLI	S/C	33	217	0.0	2.1	-2.1	
11	400 kV	ZERDA-BHINMAL	S/C	78	329	0.0	1.7	-1.7	
12	400 kV	VINDHYACHAL-RIHAND	S/C	966	0	22.4	0.0	22.4	
13	400 kV	RAPP-SHIVAJIPUR	D/C	73	407	0.0	1.9	-1.9	
14	220 kV	BHANPUR-AKANPUR	S/C	11	0	0.0	1.2	-1.2	
15	220 kV	BHANPUR-MORAK	S/C	0	100	0.0	1.6	-1.6	
16	220 kV	MEHGAON-AURAIYA	S/C	95	0	0.5	0.1	0.4	
17	220 kV	MALANPUR-AURAIYA	S/C	55	26	1.2	0.0	1.2	
18	132 kV	GWALIOR-SAWAL MADHOPUR	S/C	0	0	0.0	0.0	0.0	
19	132 kV	RAJGHAT-LALITPUR	D/C	0	0	0.0	0.0	0.0	
						WR-NR	40.5	216.1	-175.6
<b>Import/Export of WR (With SR)</b>									
1	HVDC	BHADRAWATI B/B	-	0	309	0.0	10.4	-10.4	
2	HVDC	RAIGARH-PTIGALUR	D/C	0	0	0.0	0.0	0.0	
3	765 kV	SOLAPUR-RAICHUR	D/C	159	1984	0.1	24.8	-24.8	
4	765 kV	WARDHA-NIZAMABAD	D/C	0	2538	0.0	38.7	-38.7	
5	400 kV	KOLHAPUR-KUDGI	D/C	500	0	6.2	0.0	6.2	
6	220 kV	KOLHAPUR-CHIKODI	D/C	0	0	0.0	0.0	0.0	
7	220 kV	PONDA-AMBEWADI	S/C	0	0	0.0	0.0	0.0	
8	220 kV	XELDEM-AMBEWADI	S/C	0	81	1.3	0.0	1.3	
						WR-SR	7.5	74.0	-66.5

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	351	336	317	7.6
	ER	MANGDECHHU ( 4 x 180 ) ALIPURDUAR RECEIPT	783	778	777	18.6
	ER	TALA ( 6 * 170 ) BINAGURI RECEIPT	1066	1057	1077	25.9
	NER	132KV-SALAKATI - GELEPHU	64	0	54	1.3
	NER	132KV-RANGIA - DEOTHANG	61	0	54	1.3
NEPAL	NR	132KV-Tanakpur(NH) - Mahendranagar(PG)	-54	0	-25	-0.6
	ER	132KV-BIHAR - NEPAL	72	0	7	0.2
	ER	220KV-MUZAFFARPUR - DHALKEBAR DC	-24	-2	-1	0.0
BANGLADESH	ER	Bheramara HVDC(Bangladesh)	-958	-946	-952	-22.8
	NER	132KV-SURAJMANI NAGAR - COMILLA(BANGLADESH)-1	79	0	-71	-1.7
	NER	132KV-SURAJMANI NAGAR - COMILLA(BANGLADESH)-2	79	0	-71	-1.7