

## 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, कृतुब इन्स्टीट्यूशनल एरिया, कटवारिया सराये, न्यू दिल्ली-110016

Ref: POSOCO/NLDC/SO/Daily PSP Report

दिनांक: 23<sup>rd</sup> Mar 2019

To,

- 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. मुख्य महाप्रबंधक, ऊ. पू. क्षे. भा. प्रे. के., डोंगतिएह, लोअर नोंग्रह , लापलंग, शिलोंग 793006 Chief General Manager, 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 22.03.2019.

महोदय/Dear Sir,

आई॰ई॰जी॰सी॰-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 22-मार्च-2019 की अखिल भारतीय प्रणाली की दैनिक ग्रिड निष्पादन रिपोर्ट रा॰भा॰प्रे॰के॰ 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 22nd March 2019, 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 23-Mar-19

#### A. Maximum Demand

	NR	WR	SR	ER	NER	Total
Demand Met during Evening Peak hrs(MW) (at 1900 hrs; from RLDCs)	38345	45455	47572	18359	2257	151988
Peak Shortage (MW)	754	0	0	0	63	817
Energy Met (MU)	839	1052	1108	374	39	3413
Hydro Gen (MU)	146	29	77	30	4	286
Wind Gen (MU)	19	43	24			87
Solar Gen (MU)*	26.24	25.61	81.55	1.02	0.04	134
Energy Shortage (MU)	9.7	0.0	0.0	0.0	1.4	11.0
Maximum Demand Met during the day	39353	49133	48746	18837	2293	154823
(MW) & time (from NLDC SCADA)	19:00	11:38	15:43	20:25	18:27	19:21

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	0.041	0.00	0.41	5.20	5.60	66.45	27.95

C. Power Supply Position in State

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
	Punjab	5589	0	114.6	47.8	-1.5	53	0.0
	Haryana	5370	0	109.1	67.7	-0.3	143	0.0
	Rajasthan	9528	0	199.1	61.2	-1.8	181	0.0
	Delhi	3027	0	54.4	45.6	-0.9	186	0.0
NR	UP	13659	330	268.5	110.5	4.9	1790	0.0
	Uttarakhand	1466	0	27.3	13.6	0.5	171	0.0
	HP	1267	0	21.7	12.1	0.2	106	0.0
	J&K	2059	515	40.9	37.2	-4.4	28	9.7
	Chandigarh	167	0	3.0	3.1	-0.1	25	0.0
	Chhattisgarh	3747	0	79.3	25.1	-2.6	621	0.0
	Gujarat	14195	0	300.0	106.6	1.1	605	0.0
	MP	9679	0	193.0	64.5	-0.6	702	0.0
WR	Maharashtra	20584	0	439.2	131.5	1.6	673	0.0
WK	Goa	499	0	9.9	9.7	-0.1	52	0.0
	DD	288	0	5.4	5.2	0.1	44	0.0
	DNH	690	0	14.0	13.5	0.5	137	0.0
	Essar steel	559	0	11.5	11.6	-0.1	258	0.0
	Andhra Pradesh	8984	0	196.4	67.7	0.4	429	0.0
	Telangana	10035	0	225.6	96.8	0.0	851	0.0
SR	Karnataka	12297	0	248.4	78.8	-0.1	642	0.0
3N	Kerala	3993	0	82.2	59.5	0.8	156	0.0
	Tamil Nadu	15988	0	347.6	198.8	0.5	403	0.0
	Pondy	412	0	8.2	8.1	0.1	45	0.0
	Bihar	4360	0	74.6	71.2	-1.5	460	0.0
	DVC	3014	0	61.0	-42.8	-0.8	396	0.0
ER	Jharkhand	1095	0	21.2	16.7	-0.5	169	0.0
LIX	Odisha	3837	0	80.0	34.5	1.9	267	0.0
	West Bengal	6801	0	136.4	35.8	0.3	309	0.0
	Sikkim	99	0	1.2	1.5	-0.3	18	0.0
	Arunachal Pradesh	117	2	2.0	2.1	-0.2	16	0.0
	Assam	1306	43	21,2	16.7	0.8	106	1.3
	Manipur	173	3	2.7	2.3	0.3	29	0.0
NER	Meghalaya	336	0	5.7	4.9	-0.1	53	0.0
	Mizoram	89	2	1.8	1.3	0.4	33	0.0
	Nagaland	106	2	2.0	1.9	0.0	11	0.0
	Tripura	245	4	3.8	2.9	-0.3	59	0.0

### $\textbf{D. Transnational Exchanges} \ \ (\textbf{MU}) \textbf{-} \textbf{Import} (+\textbf{ve}) / \textbf{Export} (-\textbf{ve})$

	Bhutan	Nepal	Bangladesh
Actual(MU)	-0.2	-7.8	-20.1
Day peak (MW)	79.2	-465.3	-1026.0

 $\underline{E.\ Import/export\ By\ Regions(in\ MU)\ -\ Import(+ve)/Export(-ve);\ OD(+)/UD(-)}$ 

	NR	WR	SR	ER	NER	TOTAL
Schedule(MU)	151.1	-243.3	160.3	-69.1	1.4	0.5
Actual(MU)	144.9	-257.5	163.7	-55.9	-0.5	-5.4
O/D/U/D(MU)	-6.2	-14.3	3.4	13.2	-2.0	-5.9

F. Generation Outage(MW)

	NR	WR	SR	ER	NER	Total
Central Sector	6461	13523	5232	810	536	26562
State Sector	12785	14430	5290	3525	50	36080
Total	19246	27953	10522	4335	586	62642

G. Sourcewise generation (MII)

	NR	WR	SR	ER	NER	All India
Coal	419	1132	633	447	7	2637
Lignite	21	14	54	0	0	89
Hydro	146	29	77	30	4	286
Nuclear	23	31	32	0	0	86
Gas, Naptha & Diesel	21	37	16	0	30	105
RES (Wind, Solar, Biomass & Others)	77	74	144	1	0	296
Total	708	1317	956	478	41	3499

Share of RES in total generation (%)	10.82	5.60	15.08	0.22	0.10	8.45
Share of Non-fossil fuel (Hydro, Nuclear and	34.76	10.19	26.48	6.52	8,69	19.09
RES) in total generation (%)	34.70	10.19	20.40	0.53	0.07	19.09

H. Diversity Factor
All India Demand Diversity Factor
1.023
Diversity factor = Sum of regional maximum demands / All India maximum demand

 $<sup>\</sup>textbf{*}\underline{\textbf{Source}}\textbf{:} \textbf{RLDCs for solar connected to ISTS; SLDCs for embedded solar. Limited visibility of embedded solar data.}$ 

<u>INTER-REGIONAL EXCHANGES</u> Date of Reporting: 23-M								23-Mar-19
								Import=(+ve) /Export =(-ve) for NET (MU)
Sl No	Voltage Level	Line Details	Circuit	Max Import (MW)	Max Export (MW)	Import (MU)	Export (MU)	NET (MU)
Import/E	export of	ER (With NR)						
1	765kV	GAYA-VARANASI	D/C	0	537	0.0	6.8	-6.8
3	/USK V	SASARAM-FATEHPUR GAYA-BALIA	S/C S/C	0	235 279	0.0	3.8 4.5	-3.8 -4.5
4	HVDC	ALIPURDUAR-AGRA	-	0	0	0.0	0.0	0.0
5	HVDC	PUSAULI B/B	S/C	4	0	0.0	0.0	0.0
6		PUSAULI-VARANASI	S/C	61	39	0.0	0.0	0.0
7		PUSAULI -ALLAHABAD	S/C	40	53	0.1	0.0	0.1
8	400 kV	MUZAFFARPUR-GORAKHPUR	D/C	0	690	0.0	8.9	-8.9
9	400 KV	PATNA-BALIA	Q/C D/C	0	749 303	0.0	14.6 4.8	-14.6 -4.8
11		BIHARSHARIFF-BALIA MOTIHARI-GORAKHPUR	D/C D/C	0	344	0.0	6.0	-6.0
12	1	BIHARSHARIFF-VARANASI	D/C	62	235	0.0	2.4	-2.4
13	220 kV	PUSAULI-SAHUPURI	S/C	0	119	0.0	2.2	-2.2
14		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		KARMANASA-CHANDAULI	S/C	2	0	0.0	0.0	0.0
					ER-NR	0.5	53.9	-53.4
1mport/E	xport of	ER (With WR)	1			-		ı
18	765 kV	JHARSUGUDA-DHARAMJAIGARH S/C	D/C	1798	0	32.5	0.0	32.5
19		NEW RANCHI-DHARAMJAIGARH	D/C	337	124	3.7	0.0	3.7
20	400 kV	JHARSUGUDA-RAIGARH	Q/C	153	108	1.0	0.0	1.0
21		RANCHI-SIPAT	D/C	150	4	2.4	0.0	2.4
22	220 kV	BUDHIPADAR-RAIGARH	S/C	0	98	0.0	1.4	-1.4
23		BUDHIPADAR-KORBA	D/C	167	0 ER-WR	2.6	0.0	2.6
Import/E	'xport of	ER (With SR)			ER-WK	42.3	1.4	40.9
24	765 kV	ANGUL-SRIKAKULAM	D/C	0.0	1931.0	0.0	38.4	-38.4
25	HVDC	JEYPORE-GAZUWAKA B/B	D/C	0.0	673.0	0.0	15.0	-15.0
26	LINK	TALCHER-KOLAR BIPOLE	D/C	0.0	2441.0	0.0	50.8	-50.8
27	400 kV	TALCHER-I/C	D/C	0.0	634.0	0.0	5.9	-5.9
28	220 kV	BALIMELA-UPPER-SILERRU	S/C	1.0	0.0	0.0	0.0	0.0
					ER-SR	0.0	104.2	-104.2
	export of	ER (With NER)	T	201				1
29	400 kV	BINAGURI-BONGAIGAON	D/C	391	0	6.1	0.0	6
30	220 kV	ALIPURDUAR-BONGAIGAON ALIPURDUAR-SALAKATI	D/C D/C	513 87	0 22	8.4 1.1	0.0	8
31	220 KV	ALIFURDUAR-SALAKATI	D/C	67	ER-NER	15.6	0.0	15.6
Import/E	xport of	NER (With NR)				1010	0.0	1510
32		BISWANATH CHARIALI-AGRA	-	658	0	16.2	0.0	16.2
					NER-NR	16.2	0.0	16.2
Import/E	xport of	WR (With NR)						
33		CHAMPA-KURUKSHETRA	D/C	0	501	0.0	6.4	-6.4
34	HVDC	V'CHAL B/B	D/C	243	0	6.0	0.0	6.0
35		APL -MHG	D/C	0	1269	0.0	31.5	-31.5
36		GWALIOR-AGRA	D/C	0	2186	0.0	38.8	-38.8
37		PHAGI-GWALIOR	D/C D/C	0	1284	0.0	20.5	-20.5
38	765 kV	JABALPUR-ORAI GWALIOR-ORAI	S/C	0 550	627 0	0.0 9.8	0.0	-22.0 9.8
40		SATNA-ORAI	S/C	0	1296	0.0	26.8	-26.8
41	1	CHITORGARH-BANASKANTHA	D/C	0	0	0.0	0.0	0.0
42		ZERDA-KANKROLI	S/C	184	0	2.6	0.0	2.6
43	400 kV	ZERDA -BHINMAL	S/C	171	102	1.0	0.0	1.0
44	-00 KV	V'CHAL -RIHAND	S/C	971	0	19.8	0.0	19.8
45		RAPP-SHUJALPUR	D/C	131	301	0	1	-1
46		BADOD-KOTA	S/C	2	54	0.0	1.3	-1.3
47	220 kV	BADOD-MORAK	S/C	0	127	0.0	1.7	-1.7
48		MEHGAON-AURAIYA	S/C	93	0	1.4	0.0	1.4
49 50	1221.77	MALANPUR-AURAIYA GWALIOP SAWALMADHODUP	S/C	40	7	0.4	0.0	0.4
50	132kV	GWALIOR-SAWAI MADHOPUR	S/C	0	0 WR-NR	0.0 <b>41.1</b>	0.0 <b>150.3</b>	0.0 -109.2
Import/E	aport of	WR (With SR)			WK-INK	41.1	130.3	-105.2
51	HVDC	BHADRAWATI B/B	-	0	995	0.0	23.9	-23.9
52	LINK	BARSUR-L.SILERU	-	0	0	0.0	0.0	0.0
53	705	SOLAPUR-RAICHUR	D/C	0	2294	0.0	42.6	-42.6
54	765 kV	WARDHA-NIZAMABAD	D/C	0	2692	0.0	50.6	-50.6
55	400 kV	KOLHAPUR-KUDGI	D/C	682	7	8.8	0.0	8.8
56		KOLHAPUR-CHIKODI	D/C	0	0	0.0	0.0	0.0
57	220 kV	PONDA-AMBEWADI	S/C	1	0	0.0	0.0	0.0
58		XELDEM-AMBEWADI	S/C	0	59	0.9	0.0	0.9
					WR-SR	9.8	117.2	-107.4
		TRA	ANSNAT	IONAL EXC	CHANGE			
59		BHUTAN						-0.2
60		NEPAL BANGLADESH	1					-7.8
61	1	BANGLADESH	1					-20.1