

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

दिनांक: 23<sup>rd</sup> Jan 2021

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Ref: POSOCO/NLDC/SO/Daily PSP Report

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 22.01.2021.

महोदय/Dear Sir,

आई॰ई॰जी॰सी॰-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 22-जनवरी -2021 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 22<sup>nd</sup> January 2021, is available at the NLDC website.

धन्यवाद,

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



Report for previous day A. Power Supply Position at All India and Regional level Date of Reporting: 23-Jan-2021 NR WR SR ER NER TOTAL Demand Met during Evening Peak hrs(MW) (at 19:00 hrs; from RLDCs) 52871 53400 43530 19053 171436 Peak Shortage (MW) 900 0 0 2.7 927 394 Energy Met (MU) 1054 1283 1035 45 3811 Hydro Gen (MU) 101 88 292 Wind Gen (MU) 28 17 69 Solar Gen (MU)\* 37.19 89.14 0.17 165 Energy Shortage (MU) 12.77 0.00 0.00 0.000.85 13.62 Maximum Demand Met During the Day (MW) (From NLDC SCADA) 55125 51519 19115 2620 187195 Time Of Maximum Demand Met (From NLDC SCADA) 10:39 11:26 11:33 18:30 10:28 B. Frequency Profile (%) Region All India FVI < 49.7 49.7 - 49.8 49.8 - 49.9 < 49.9 49.9 - 50.05 > 50.05 0.030 0.00 0.02 16.88 C. Power Supply Position in States Max.Demand Drawal Shortage during Energy Met Energy Region States Met during the Schedule Shortage maximum (MU) (MU) (MW) day(MW) Demand(MW) (MU) (MU) 128.0 -1.3 41 Punjab 6656 51.5 0.00Haryana 83.6 195 Rajasthan 14054 265.6 71.7 0.7 598 0.00 -1.0 Delhi NR UP 17623 310.3 92.4 -0.4 349 0.00 Uttarakhand 0.10 HP 1890 33.5 0.6 0.00 J&K(UT) & Ladakh(UT) 2811 56.1 50.9 -0.1 245 12.40 Chandigarh 263 4. 3.9 0.2 0.00 4391 94.2 43.8 1.0 290 Chhattisgarh 0.00 Gujarat 16944 353.5 116.7 -0.3 520 0.00 294.2 MP 15206 0 186.0 -0.5 768 0.00WR Maharashtra 23829 0 486. 154.4 535 0.00 Goa 492 10.3 10.3 -0.341 0.00 0.4 DNH 832 19.4 19.5 -0.1 53 0.00 AMNSIL 16.9 10.5 -0.1 241 0.00 0.6 Andhra Pradesh 9432 184.6 0.00 Telangana 124.8 717 13157 251.0 228.0 0.00 12009 3683 88.6 49.7 SR Karnataka 0.1 662 0.00 Kerala 0 76.1 1.1 252 0.00 Tamil Nadu 13795 287.5 169.6 804 0.00 372 7.5 7.7 Puducherry 0 -0.2 27 0.00 Bihar 4865 91.2 83.3 DVC 3058 69.2 -41.3 1.3 321 0.00 Jharkhand 1442 19.8 26.4 ER Odisha 4009 75.3 -0.6 0.4 398 0.00 West Bengal 6583 130.3 248 -1.7 Sikkim 122 1.9 1.9 0.0 24 0.00 Arunachal Pradesh 144 2.3 2.8 -0.6 26 0.01 Assam 1450 24.5 19.8 0.2 139 0.80 Manipur 237 2.7 -0.8 35 0.01 NER Meghalaya 393 4.6 0.0 0.00 121 1.7 1.6 Mizoram -0.3 0.02 Nagaland 138 0.0 0.01 Tripura 4.6 -0.4 0.00

D. Transnational Exchanges (MU) - Import(+ve)/Export(-ve)			
	Bhutan	Nepal	Bangladesh
Actual (MU)	4.8	-12.7	-13.8
D. D. I. (MIII)	200.0	(40.6	020.0

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

	NR	WR	SR	ER	NER	TOTAL
Schedule(MU)	242.2	-240.9	131.5	-132.2	-0.6	0.1
Actual(MU)	243.0	-254.3	137.4	-133.2	0.3	-6.8
O/D/U/D(MU)	0.8	-13.4	5.9	-1.0	0.9	-6.8

F. Generation Outage(MW)

	NR	WR	SR	ER	NER	TOTAL	% Share
Central Sector	6056	12863	5872	2455	564	27809	43
State Sector	9000	13728	9557	4452	11	36747	57
Total	15056	26590	15429	6907	575	64556	100

G. Sourcewise generation (MU)

	NR	WR	SR	ER	NER	All India	% Share
Coal	588	1372	591	514	7	3072	79
Lignite	21	9	36	0	0	66	2
Hydro	101	55	88	36	12	292	7
Nuclear	15	24	40	0	0	79	2
Gas, Naptha & Diesel	23	31	11	0	29	95	2
RES (Wind, Solar, Biomass & Others)	88	63	145	5	0	302	8
Total	836	1554	912	554	49	3906	100
Share of RES in total generation (%)	10.58	4.05	15.94	0.84	0.35	7.72	
Share of Non-fossil fuel (Hydro, Nuclear and RES) in total generation(%)	24.36	9.14	30.02	7.30	25.56	17.22	

H. All India Demand Diversity Factor

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Based on Regional Max Demands	1.019
Based on State Max Demands	1.044

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.

## INTER-REGIONAL EXCHANGES

Import=(+ve) /Export =(-ve) for NET (MU)
Date of Reporting: 23-Jan-2021

						Date of Reporting:	
Sl Voltage Level	Line Details	No. of Circuit	Max Import (MW)	Max Export (MW)	Import (MU)	Export (MU)	NET (MU)
Import/Export of ER (	(With NR)	ı	-	-		_	
1 HVDC 2 HVDC	ALIPURDUAR-AGRA PUSAULI B/B	2	0	0 249	0.0	0.0 6.0	0.0 -6.0
3 765 kV	GAYA-VARANASI	2	0	883	0.0	12.5	-0.0 -12.5
4 765 kV	SASARAM-FATEHPUR	1	0	303	0.0	4.6	-4.6
5 765 kV 6 400 kV	GAYA-BALIA PUSAULI-VARANASI	i	0	536 194	0.0	8.4 2.5	-8.4 -2.5
7 400 kV	PUSAULI -ALLAHABAD	1	0	261	0.0	3.6	-3.6
8 400 kV 9 400 kV	MUZAFFARPUR-GORAKHPUR PATNA-BALIA	4	0	738 1069	0.0	9.1 18.5	-9.1 -18.5
10 400 kV	BIHARSHARIFF-BALIA	2	0	417	0.0	6.7	-6.7
11 400 kV 12 400 kV	MOTIHARI-GORAKHPUR BIHARSHARIFF-VARANASI	2 2	0 19	345 269	0.0	5.8 2.7	-5.8 -2.7
13 220 kV	PUSAULI-SAHUPURI	ĩ	71	49	0.1	0.0	0.1
14 132 kV	SONE NAGAR-RIHAND	1 1	0	0	0.0	0.0	0.0
15 132 kV 16 132 kV	GARWAH-RIHAND KARMANASA-SAHUPURI	1	20	0	0.4	0.0	0.4
17 132 kV	KARMANASA-CHANDAULI	1	0	0	0.0	0.0	0.0
Import/Export of ER (	(With WR)			ER-NR	0.4	80.3	-79.9
1 765 kV	JHARSUGUDA-DHARAMJAIGARH	4	747	99	7.3	0.0	7.3
2 765 kV	NEW RANCHI-DHARAMJAIGARH	2	491	403	2.4	0.0	2.4
3 765 kV	JHARSUGUDA-DURG	2	30	247	0.0	3.3	-3.3
4 400 kV	JHARSUGUDA-RAIGARH	4	89	388	0.0	4.1	-4.1
5 400 kV	RANCHI-SIPAT	2	203	110	1.8	0.0	1.8
6 220 kV	BUDHIPADAR-RAIGARH	1	3	125	0.0	1.8	-1.8
7 220 kV	BUDHIPADAR-KORBA	2	130	0 ER-WR	1.5	9.0 9.3	1.5 3.8
Import/Export of ER (							
1 HVDC	JEYPORE-GAZUWAKA B/B	2	0	537	0.0	12.4	-12.4
2 HVDC 3 765 kV	TALCHER-KOLAR BIPOLE ANGUL-SRIKAKULAM	2 2	0	1991 2559	0.0	45.0 47.9	-45.0 -47.9
4 400 kV	TALCHER-I/C	2	Ō	638	0.0	11.3	-11.3
5 220 kV	BALIMELA-UPPER-SILERRU	1	1	0 ER-SR	0.0	0.0	0.0
Import/Export of ER (	(With NER)			ER-SK	0.0	105.2	-105.2
1 400 kV	BINAGURI-BONGAIGAON	2	277	82	2.5	0.0	2.5
2 400 kV 3 220 kV	ALIPURDUAR-BONGAIGAON ALIPURDUAR-SALAKATI	2 2	450 79	84 30	4.7 0.7	0.0	4.7 0.7
3 220 KV	ALIFURDUAR-SALAKATI		/9	ER-NER	7.9	0.0	7.9
Import/Export of NER							
1 HVDC	BISWANATH CHARIALI-AGRA	2	483	0 NER-NR	8.8 8.8	0.0	8.8 8.8
Import/Export of WR	(With NR)						
1 HVDC	CHAMPA-KURUKSHETRA	2	0	1496	0.0	49.0	-49.0
2 HVDC 3 HVDC	VINDHYACHAL B/B MUNDRA-MOHINDERGARH	2	240	0 1738	6.0 0.0	0.0 43.5	6.0 -43.5
4 765 kV	GWALIOR-AGRA	2	Ŏ	2810	0.0	39.4	-39.4
5 765 kV	PHAGI-GWALIOR	2 2	0	1221	0.0	19.7	-19.7
6 765 kV 7 765 kV	JABALPUR-ORAI GWALIOR-ORAI	1	707	1129 0	0.0 13.6	34.1 0.0	-34.1 13.6
8 765 kV	SATNA-ORAI	1	0	1487	0.0	28.7	-28.7
9 765 kV 10 400 kV	CHITORGARH-BANASKANTHA ZERDA-KANKROLI	2	487 220	697 91	4.4	2.0	2.5
11 400 kV	ZERDA-RANKROLI ZERDA -BHINMAL	1	362	298	2.4 0.2	0.0	2.4 0.2
12 400 kV	VINDHYACHAL -RIHAND	1	492	0	11.3	0.0	11.3
13 400 kV 14 220 kV	RAPP-SHUJALPUR BHANPURA-RANPUR	2	182 43	525 146	0.6 0.0	3.7 0.3	-3.1 -0.3
15 220 kV	BHANPURA-MORAK	î	0	30	0.0	0.0	0.0
16 220 kV	MEHGAON-AURAIYA	1	143	0	1.3	1.8	-0.5
17 220 kV 18 132 kV	MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR	1	95 0	14 0	0.9	0.2 0.0	0.8
19 132 kV	RAJGHAT-LALITPUR	2	Õ	0	0.0	0.8	-0.8
Import/Export of WR	(With SD)			WR-NR	40.7	223.1	-182.4
1 HVDC	BHADRAWATI B/B	-	202	1016	0.0	10.0	-10.0
2 HVDC	RAIGARH-PUGALUR	2	144	992	0.0	8.6	-8.6
3 765 kV 4 765 kV	SOLAPUR-RAICHUR WARDHA-NIZAMABAD	2	644	1928 3015	0.0	21.1 49.7	-21.1
5 400 kV	KOLHAPUR-KUDGI	2	1475	3015 0	0.0 21.2	49.7 0.0	-49.7 21.2
6 220 kV	KOLHAPUR-CHIKODI	2	0	0	0.0	0.0	0.0
7 220 kV 8 220 kV	PONDA-AMBEWADI XELDEM-AMBEWADI	1	1 0	0 43	0.0	0.0	0.0
3 440 KV	TOTAL PROPERTY AND INC.			WR-SR	22.0	89.3	-67.3
		INTER	NATIONAL EXCHA	NGES			
State	Region	Line	Name	Max (MW)	Min (MW)	Avg (MW)	Energy Exchange
		400kV MANGDECHH			()		(MI)
	ER	i.e. ALIPURDUAR RE	CEIPT (from	118	0	113	2.7
		MANGDECHU HEP 4 400kV TALA-BINAGU	*180MW)				
	ER	MALBASE - BINAGU	RI) i.e. BINAGURI	119	0	102	2.5
		RECEIPT (from TALA 220kV CHUKHA-BIR	HEP (6*170MW)				
BHUTAN	ER	MALBASE - BIRPAR		15	0	-17	-0.4
		RECEIPT (from CHU			-		
	NER	132KV-GEYLEGPHU	- SALAKATI	28	10	16	0.4
	IVER			20	10	10	VT
	NER	132kV Motanga-Rangi	ia	19	1	8	0.2
	· CR			.,		,	0.2
	NR	132KV-TANAKPUR(N		-81	0	-72	-1.7
	.NR	MAHENDRANAGAR	(PG)	-01	J	-12	-1./
	ER	400KV-MUZAFFADD	UR - DHALKERAR DC	-300	-208	-275	.64
	EK	400KV-MUZAFFARPUR - DHALKEBAR DC		-300	-408	-4/5	-6.6
	1	122KV-RIHAD - NEDAT		260	-60	-185	-4.4
	pn	132KV-BIHAR - NEPAL		-260	-00	-185	-4.4
NEPAL	ER						
NEPAL				_	_		
NEPAL	ER ER	BHERAMARA HVDC	(BANGLADESH)	-729	-356	-500	-12.0
	ER	BHERAMARA HVDC					
NEPAL BANGLADESH			NAGAR -	-729 50	-356	-500 -37	-12.0 -0.9
	ER NER	BHERAMARA HVDC 132KV-SURAJMANI COMILLA(BANGLAI	NAGAR - DESH)-1	50	0	-37	-0.9
	ER	BHERAMARA HVDC	NAGAR - DESH)-1 NAGAR -				