



National Load Despatch Centre
राष्ट्रीय भार प्रेषण केंद्र
GRID CONTROLLER OF INDIA LIMITED
ग्रीड कंट्रोलर ऑफ इंडिया 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: 12th January 2024

To,

- कार्यकारी निदेशक, पू.क्षे.भा.प्रे.के., 14, गोल्फ क्लब रोड, कोलकाता - 700033
Executive Director, ERLDC, 14 Golf Club Road, Tollygunge, Kolkata, 700033
- 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
- 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
- कार्यकारी निदेशक, ऊ.पू.क्षे.भा.प्रे.के., डोंगतेह, लोअर नोंग्रह, लापलंग, शिलोंग - 793006
Executive Director, NERLDC, Dongteih, Lower Nongrah, Lapalang, Shillong - 793006, Meghalaya
- 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 11.01.2024.

महोदय/Dear Sir,

आईईजीसी-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 11-जनवरी-2024 की अखिल भारतीय प्रणाली की दैनिक ग्रीड 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 11th January 2024, is available at the NLDC website.

धन्यवाद,

Report for previous day

Date of Reporting: 12-Jan-2024

A. Power Supply Position at All India and Regional level

	NR	WR	SR	ER	NER	TOTAL
Demand Met during Evening Peak hrs(MW) (at 19:00 hrs; from RLDCs)	62054	61029	45079	21193	2672	192027
Peak Shortage (MW)	97	0	0	274	39	410
Energy Met (MU)	1280	1446	1107	441	49	4323
Hydro Gen (MU)	94	29	38	16	11	189
Wind Gen (MU)	6	80	102	-	-	188
Solar Gen (MU)*	125.69	58.40	112.60	2.26	0.82	300
Energy Shortage (MU)	1.59	0.00	0.00	2.21	0.43	4.23
Maximum Demand Met During the Day (MW) (From NLDC SCADA)	66712	71871	56168	22058	2755	215228
Time Of Maximum Demand Met	11:12	10:20	09:42	18:23	17:33	10:23

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	0.035	0.00	0.00	0.57	0.57	72.54	26.90

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	9166	0	167.4	70.0	0.4	360	0.00
	Haryana	9202	0	166.3	100.6	0.1	177	0.51
	Rajasthan	17337	0	321.9	122.9	-2.1	170	0.00
	Delhi	5370	0	92.7	78.5	0.5	489	0.00
	UP	21131	0	371.5	125.5	3.1	898	0.00
	Uttarakhand	2478	0	47.7	36.7	0.9	164	0.08
	HP	2080	0	38.0	32.7	0.2	156	0.00
	J&K(UT) & Ladakh(UT)	3075	0	65.7	61.0	0.2	215	1.00
	Chandigarh	319	0	5.7	5.2	0.5	108	0.00
Railways NR ISTS	165	0	3.2	3.4	-0.1	21	0.00	
WR	Chhattisgarh	5234	0	107.1	46.8	-0.6	481	0.00
	Gujarat	21450	0	420.4	147.7	-0.2	777	0.00
	MP	15421	0	281.4	173.8	-4.7	462	0.00
	Maharashtra	26268	0	563.2	184.3	-3.8	750	0.00
	Goa	701	0	14.2	13.8	-0.2	44	0.00
	DNHDDPDCL	1282	0	29.8	29.7	0.1	76	0.00
	AMNSIL	836	0	17.8	6.2	0.0	322	0.00
	BALCO	523	0	12.5	12.5	0.0	12	0.00
SR	Andhra Pradesh	11457	0	210.0	64.5	-1.8	527	0.00
	Telangana	13429	0	246.2	128.8	-1.1	522	0.00
	Karnataka	14175	0	258.4	107.9	-4.3	677	0.00
	Kerala	4130	0	81.3	66.6	1.1	389	0.00
	Tamil Nadu	14859	0	302.9	159.1	-3.4	989	0.00
	Puducherry	392	0	8.6	8.2	-0.2	26	0.00
ER	Bihar	5225	0	96.2	84.7	-0.2	378	0.47
	DVC	3255	0	71.8	-44.7	0.5	474	0.00
	Jharkhand	1706	0	33.5	23.3	-0.3	261	1.74
	Odisha	4583	0	94.6	21.0	-0.8	422	0.00
	West Bengal	7007	0	142.4	31.4	-2.3	222	0.00
	Sikkim	137	0	2.1	2.1	-0.1	12	0.00
	Railways ER ISTS	10	0	0.1	0.1	0.0	8	0.00
NER	Arunachal Pradesh	171	0	2.8	2.7	0.0	20	0.00
	Assam	1563	0	27.9	22.9	0.3	154	0.00
	Manipur	202	20	3.2	3.1	0.0	35	0.20
	Meghalaya	338	0	6.5	5.4	-0.3	46	0.23
	Mizoram	151	0	2.3	1.8	-0.2	16	0.00
	Nagaland	140	0	2.4	2.3	0.0	24	0.00
	Tripura	238	0	4.0	3.6	-0.5	26	0.00

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

	Bhutan	Nepal	Bangladesh	Godda -> Bangladesh
Actual (MU)	-10.4	-9.1	-20.8	-17.2
Day Peak (MW)	-550.8	-400.0	-1042.0	-766.0

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

	NR	WR	SR	ER	NER	TOTAL
Schedule(MU)	302.8	-317.6	129.7	-119.0	4.1	0.0
Actual(MU)	300.8	-312.3	123.0	-119.0	2.9	-4.5
O/D/U/D(MU)	-2.0	5.3	-6.7	0.0	-1.2	-4.5

F. Generation Outage(MW)

	NR	WR	SR	ER	NER	TOTAL	% Share
Central Sector	6588	7759	4848	4461	336	23991	49
State Sector	7556	9739	5085	2582	281	25243	51
Total	14144	17498	9933	7043	617	49234	100

G. Sourcewise generation (Gross) (MU)

	NR	WR	SR	ER	NER	All India	% Share
Coal	745	1644	642	622	15	3668	78
Lignite	28	18	59	0	0	105	2
Hydro	94	29	38	16	11	189	4
Nuclear	23	36	69	0	0	128	3
Gas, Naptha & Diesel	19	19	4	0	25	67	1
RES (Wind, Solar, Biomass & Others)	155	142	242	4	1	544	12
Total	1064	1888	1054	642	52	4701	100

Share of RES in total generation (%)	14.60	7.54	22.93	0.60	1.57	11.59
Share of Non-fossil fuel (Hydro,Nuclear and RES) in total generation(%)	25.60	10.96	33.14	2.26	22.94	18.21

H. All India Demand Diversity Factor

Based on Regional Max Demands	1.020
Based on State Max Demands	1.046

I. All India Peak Demand and shortage at Solar and Non-Solar Hour

	Max Demand Met(MW)	Time	Shortage(MW)
Solar hr	215228	10:23	205
Non-Solar hr	199570	18:45	609

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

**Note: All generation MU figures are gross

***Godda (Jharkhand) -> Bangladesh power exchange is through the radial connection (isolated from Indian Grid)

Solar Hours -> 06:00 to 18:00hrs and rest are Non-Solar Hours

*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: 12-Jan-2024

Sl No	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)								
1	HVDC	ALIPURDUAR-AGRA	2	0	0	0.0	0.0	0.0
2	HVDC	PUSAULI B/B	-	2	49	0.0	1.1	-1.1
3	765 kV	GAYA-VARANASI	2	51	977	0.0	10.2	-10.2
4	765 kV	SASARAM-FATEHPUR	1	0	451	0.0	6.7	-6.7
5	765 kV	GAYA-BALIA	1	0	830	0.0	12.7	-12.7
6	400 kV	PUSAULI-VARANASI	1	64	53	0.0	0.1	-0.1
7	400 kV	PUSAULI-ALLAHABAD	1	5	115	0.0	1.0	-1.0
8	400 kV	MUZAFFARPUR-GORAKHPUR	2	0	746	0.0	7.7	-7.7
9	400 kV	PATNA-BALIA	2	0	646	0.0	10.1	-10.1
10	400 kV	NAUBATPUR-BALIA	2	0	682	0.0	10.5	-10.5
11	400 kV	BIHARSHARIFF-BALIA	2	0	373	0.0	4.7	-4.7
12	400 kV	MOTIHARI-GORAKHPUR	2	0	538	0.0	7.5	-7.5
13	400 kV	BIHARSHARIFF-VARANASI	2	0	414	0.0	5.9	-5.9
14	220 kV	SAHUPURI-KARAMNANA	1	17	107	0.0	1.4	-1.4
15	132 kV	NAGAR UNTARI-RIHAND	1	0	0	0.1	0.0	0.1
16	132 kV	GARWAH-RIHAND	1	30	0	0.4	0.0	0.4
17	132 kV	KARMANASA-SAHUPURI	1	0	0	0.0	0.0	0.0
18	132 kV	KARMANASA-CHANDAULI	1	0	0	0.0	0.0	0.0
ER-NR						0.5	79.4	-78.8
Import/Export of ER (With WR)								
1	765 kV	JHARSUGUDA-DHARAMJAIGARH	4	433	420	0.0	0.4	-0.4
2	765 kV	NEW RANCHI-DHARAMJAIGARH	2	873	328	7.9	0.0	7.9
3	765 kV	JHARSUGUDA-DURG	2	0	658	0.0	11.4	-11.4
4	400 kV	JHARSUGUDA-RAIGARH	4	0	601	0.0	8.3	-8.3
5	400 kV	RANCHI-SIPAT	2	208	190	0.5	0.0	0.5
6	220 kV	BUDHIPADAR-RAIGARH	1	25	129	0.0	1.3	-1.3
7	220 kV	BUDHIPADAR-KORBA	2	140	90	0.6	0.0	0.6
ER-WR						9.0	21.4	-12.4
Import/Export of ER (With SR)								
1	HVDC	JEYPORE-GAZUWAKA B/B	2	0	327	0.0	7.3	-7.3
2	HVDC	TALCHER-KOLAR BIPOLE	2	0	1296	0.0	31.3	-31.3
3	765 kV	ANGUL-SRIKAKULAM	2	0	2502	0.0	44.7	-44.7
4	400 kV	TALCHER-I/C	2	622	272	11.3	0.0	11.3
5	220 kV	BALIMELA-UPPER-SILERRU	1	0	0	0.0	0.0	0.0
ER-SR						0.0	83.4	-83.4
Import/Export of ER (With NER)								
1	400 kV	BINAGURI-BONGAIGAON	2	230	127	2.0	0.2	1.8
2	400 kV	ALIPURDUAR-BONGAIGAON	2	727	184	8.2	0.0	8.2
3	220 kV	ALIPURDUAR-SALAKATI	2	113	40	1.3	0.0	1.3
ER-NER						11.6	0.2	11.4
Import/Export of NER (With NR)								
1	HVDC	BISWANATH CHARIALI-AGRA	2	662	0	15.0	0.0	15.0
NER-NR						15.0	0.0	15.0
Import/Export of WR (With NR)								
1	HVDC	CHAMPA-KIRUKSHETRA	2	0	3007	0.0	59.0	-59.0
2	HVDC	VINDHYACHAL B/B	-	90	0	2.4	0.0	2.4
3	HVDC	MUNDRA-MOHINDERGARH	2	0	1547	0.0	30.5	-30.5
4	765 kV	GWALIOR-AGRA	2	0	3196	0.0	48.1	-48.1
5	765 kV	GWALIOR-PHAGI	2	0	1423	0.0	20.5	-20.5
6	765 kV	JABALPUR-ORAI	2	0	1389	0.0	36.0	-36.0
7	765 kV	GWALIOR-ORAI	1	892	0	14.2	0.0	14.2
8	765 kV	SATNA-ORAI	1	0	1286	0.0	23.0	-23.0
9	765 kV	BANASKANTHA-CHITORGARH	2	903	1201	5.2	4.1	1.1
10	765 kV	VINDHYACHAL-VARANASI	2	0	3347	0.0	56.1	-56.1
11	400 kV	ZERDA-KANKROLI	1	108	172	0.7	0.6	0.1
12	400 kV	ZERDA -BHINMAL	1	517	445	3.0	2.5	0.5
13	400 kV	VINDHYACHAL -RIHAND	1	963	0	21.9	0.0	21.9
14	400 kV	RAPP-SHUJALPUR	2	225	587	0.6	3.9	-3.3
15	220 kV	BHANPURA-RANPUR	1	0	149	0.0	2.4	-2.4
16	220 kV	BHANPURA-MORAK	1	0	30	0.0	1.1	-1.1
17	220 kV	MEHGAON-AURAIYA	1	77	28	0.4	0.1	0.3
18	220 kV	MALANPUR-AURAIYA	1	58	47	0.2	0.3	-0.1
19	132 kV	GWALIOR-SAWAI MADHOPUR	1	0	0	0.0	0.0	0.0
20	132 kV	RAJGHAT-LALITPUR	2	0	0	0.0	0.0	0.0
WR-NR						48.6	288.0	-239.4
Import/Export of WR (With SR)								
1	HVDC	BHADRAWATI B/B	-	0	1013	0.0	12.4	-12.4
2	HVDC	RAIGARH-PUGALUR	2	0	2502	0.0	23.8	-23.8
3	765 kV	SOLAPUR-RAICHUR	2	1243	1227	5.3	5.4	-0.1
4	765 kV	WARDHA-NIZAMABAD	2	0	2648	0.0	38.0	-38.0
5	765 kV	WARORA-WARANGAL(NEW)	2	0	2546	0.0	35.7	-35.7
6	400 kV	KOLHAPUR-KUDGI	2	1374	0	22.6	0.0	22.6
7	220 kV	KOLHAPUR-CHIKODI	2	0	0	0.0	0.0	0.0
8	220 kV	PONDA-AMBEWADI	1	0	0	0.0	0.0	0.0
9	220 kV	XELDEM-AMBEWADI	1	0	117	2.2	0.0	2.2
WR-SR						30.1	115.2	-85.2

INTERNATIONAL EXCHANGES

Import(+ve)/Export(-ve)

State	Region	Line Name	Max (MW)	Min (MW)	Avg (MW)	Energy Exchange (MU)
BHUTAN	ER	400kV MANGDECHHU-ALIPURDUAR 1,2&3 i.e. ALIPURDUAR RECEIPT (from MANGDECHHU HEP 4*180MW)	-245	-4	-149	-3.57
	ER	400kV TALA-BINAGURI 1,2,4 (& 400kV MALBASE - BINAGURI) i.e. BINAGURI RECEIPT (from TALA HEP 6*170MW)	-307	217	-92	-2.21
	ER	220kV CHUKHA-BIRPARA 1&2 (& 220kV MALBASE - BIRPARA) i.e. BIRPARA RECEIPT (from CHUKHA HEP 4*84MW)	-231	61	-172	-4.12
	NER	132kV GELEPHU-SALAKATI	-33	0	-16	-0.39
	NER	132kV MOTANGA-RANGIA	-26	24	-4	-0.10
NEPAL	NR	NEPAL IMPORT (FROM UP)	-70	0	-18	-0.44
	NR	132kV MAHENDRANAGAR-TANAKPUR(NHPC)	-70	0	-57	-1.38
	ER	NEPAL IMPORT (FROM BIHAR)	0	0	0	0.00
	ER	400kV DHALKEBAR-MUZAFFARPUR 1&2	-400	-100	-302	-7.25
BANGLADESH	ER	BHERAMARA B/B HVDC (B'DESH)	-922	-590	-771	-18.50
	ER (Isolated from Indian Grid)	400kV GODDA_TPS-RAHANPUR (B'DESH) D/C	-766	-558	-717	-17.21
	NER	132kV COMILLA-SURAJMANI NAGAR 1&2	-120	0	-95	-2.28

CROSS BORDER EXCHANGE SCHEDULE

Date of Reporting: 12-Jan-2024

Export From India (in MU)

Country	GNA (ISGS/PPA)	T-GNA							TOTAL
		BILATERAL TOTAL	COLLECTIVE						
			IDAM			RTM			
			IEX	PXIL	HPX	IEX	PXIL	HPX	
Bhutan	0.00	0.00	10.97	0.00	0.00	0.02	0.00	0.00	10.99
Nepal	0.23	0.00	7.51	0.00	0.00	0.00	0.00	0.00	7.74
Bangladesh	18.52	0.00	0.00	0.00	0.00	0.00	0.00	0.00	18.52
Myanmar	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total Export	18.75	0.00	18.48	0.00	0.00	0.02	0.00	0.00	37.25

Import by India(in MU)

Country	GNA (ISGA/PPA)	T-GNA							TOTAL
		BILATERAL TOTAL	COLLECTIVE						
			IDAM			RTM			
			IEX	PXIL	HPX	IEX	PXIL	HPX	
Bhutan	0.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.64
Nepal	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bangladesh	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Myanmar	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total Import	0.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.64

Net from India(in MU)

-ve : Export / +ve : Import

Country	GNA (ISGS/PPA)	T-GNA							TOTAL
		BILATERAL TOTAL	COLLECTIVE						
			IDAM			RTM			
			IEX	PXIL	HPX	IEX	PXIL	HPX	
Bhutan	0.64	0.00	-10.97	0.00	0.00	-0.02	0.00	0.00	-10.35
Nepal	-0.23	0.00	-7.51	0.00	0.00	0.00	0.00	0.00	-7.74
Bangladesh	-18.52	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-18.52
Myanmar	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total Net	-18.11	0.00	-18.48	0.00	0.00	-0.02	0.00	0.00	-36.61