

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 22.03.2014
Date of Reporting : 23.03.2014

I. Regional Availability/Demand:

Evening Peak (19:00 Hrs) MW				Off Peak (03:00 Hrs) MW				Day Energy (Net MU)	
Demand Met	Shortage	Requirement	Freq* (Hz)	Demand Met	Shortage	Requirement	Freq* (Hz)	Demand Met	Shortage
33978	1747	35725	49.99	29990	805	30795	49.97	779.3	36.10

* Half hourly (two 15 minutes block-one block each before and after the designated time) average frequency

II. A. State's Load Details (At States periphery) in MUs:

UI (OD:(+ve), UD: (-ve))

State	State's Control Area Generation (Net MU)				Drawal Schedule (Net MU)	Actual Drawal (Net MU)	UI (Net MU)	Consumption (Net MU)	Shortages * (MU)
	Thermal	Hydro	Renewable/others \$	Total					
Punjab	43.33	11.81		55.14	42.73	43.11	0.38	98.25	0.00
Haryana	35.69	0.55		36.25	67.31	69.11	1.80	105.36	1.65
Rajasthan	111.01	2.05	7.38	120.43	67.80	67.52	-0.28	187.95	0.00
Delhi	15.75			15.75	43.40	42.70	-0.70	58.45	0.00
UP	116.04	3.37	14.40	133.81	101.61	103.00	1.40	236.82	32.01
Uttarakhand		8.81		8.81	21.01	22.77	1.77	31.58	0.67
HP		9.25		9.25	15.23	15.49	0.26	24.74	0.07
J & K		10.17	0.00	10.17	25.78	22.78	-3.00	32.95	1.70
Chandigarh				0.00	3.32	3.25	-0.07	3.25	0.00
Total	321.83	46.00	21.78	389.61	388.18	389.73	1.55	779.34	36.10

* Shortage furnished by the respective constituent.\$ Others include UP Co-generation and JK Diesel

II. B. State's Demand Met in MWs:

UI/OA/PX (OD/Import: (+ve), UD/Export: (-ve))

State	Evening Peak (19:00 Hrs) MW				Off Peak (03:00 Hrs) MW				Day Energy MU	
	Demand Met	Shortage	UI	STOA/PX transaction	Demand Met	Shortage	UI	STOA/PX transaction	STOA/PX transaction	
Punjab	4639	0	-23	-698	3420	0	95	-310	-10.68	
Haryana	4925	32	6	167	3845	0	37	175	1.61	
Rajasthan	7193	0	10	801	7209	0	-2	985	21.09	
Delhi	3031	0	190	-827	1657	0	-25	-1181	-22.65	
UP	9919	1615	-290	820	10562	805	467	661	14.52	
Uttarakhand	1575	0	84	449	1112	0	76	348	9.64	
HP	1003	0	-35	-56	791	0	67	-20	1.15	
J&K	1522	100	-200	123	1309	0	-94	242	4.22	
Chandigarh	172	0	-19	0	85	0	-6	0	0.00	
Total	33978	1747	-277	779	29990	805	614	900	18.89	

* STOA figures are at sellers boundary & PX figures are at regional boundary.

III. Regional Entities :

UI (OG:(+ve), UG: (-ve))

Station/ Constituent	Inst. Capacity (Effective) MW	Declared Capacity(MW)	Peak MW (Gross)	Off Peak MW (Gross)	Energy (Net MU)	Average Sentout(MW)	Schedule Net MU	UI Net MU
A. NTPC								
Singrauli STPS	2000	1334	1556	1055	32.32	1347	31.87	0.45
Rihand I STPS	1000	931	1024	1008	21.95	914	21.68	0.27
Rihand II STPS	1000	975	1010	1028	23.23	968	22.95	0.28
Rihand III STPS	1000	473	491	461	11.05	460	10.79	0.26
Dadri I STPS	840	815	755	632	15.43	643	15.48	-0.05
Dadri II STPS	980	980	922	716	19.69	820	20.32	-0.63
Unchahar I TPS	420	408	439	359	8.76	365	8.78	-0.02
Unchahar II TPS	420	406	444	325	8.41	351	8.44	-0.02
Unchahar III TPS	210	203	218	158	4.04	168	4.05	0.00
ISTPP (Jhajjhar)	1500	1500	496	347	9.10	379	9.35	-0.25
Dadri GPS	830	825	379	398	8.97	374	9.02	-0.05
Anta GPS	419	408	270	269	6.18	257	6.12	0.06
Auraiya GPS	663	658	151	158	3.58	149	3.65	-0.07
Sub Total (A)	11282	9916	8155	6914	172.70	7196	172.47	0.23
B. NPC								
NAPS	440	293	318	332	6.93	289	6.00	0.93
RAPS- B	440	415	457	460	9.94	414	9.96	-0.02
RAPS- C	440	430	469	473	10.20	425	10.32	-0.13
Sub Total (B)	1320	1138	1244	1265	27.07	1128	26.28	0.79
C. NHPC								
Chamera I HPS	540	540	540	180	9.05	377	8.95	0.10
Chamera II HPS	300	300	300	0	2.81	117	2.80	0.01
Chamera III HPS	231	231	223	0	1.34	56	1.30	0.04
Bairasuil HPS	180	137	122	120	2.91	121	2.92	-0.01
Salal-HPS	690	316	404	327	7.76	323	7.57	0.19
Tanakpur-HPS	94	0	0	0	0.00	0	0.00	0.00
Uri-HPS	480	475	476	472	11.41	475	11.40	0.01
Uri-II HPS	240	180	181	186	4.39	183	4.32	0.07
Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
Dulhasti-HPS	390	387	303	0	2.95	123	2.80	0.15
Sewa-II HPS	120	122	127	127	3.00	125	2.93	0.08
Parbati 3	260	0	0	0	0.82	34	0.82	0.00
Sub Total (C)	3805	2688	2676	1412	46	1935	45	1
D. NJPC								
Nathpa Jhakri	1500	1605	758	0	7.54	314	7.40	0.14
Sub Total (D)	1500	1605	758	0	7.54	314	7.40	0.14
E. THDC								
Tehri HPS	1000	808	807	0	7.36	307	7.30	0.06
Koteshwar HPS	400	132	302	0	3.11	129	3.00	0.11
Sub Total (E)	1400	940	1109	0	10.47	436	10.30	0.17
F. BBMB								
Bhakra HPS	1497	633	1141	367	15.83	660	15.20	0.63
Dehar HPS	990	254	330	145	6.07	253	6.09	-0.02
Pong HPS	396	216	306	126	5.16	215	5.19	-0.03
Sub Total (F)	2883	1103	1777	638	27.06	1128	26.48	0.58
G. IPP(s)/JV(s)								
ADHPL HPS(IPP)	192	0	106	0	0.50	21	0.49	0.01
KWHEP HPS(IPP)	1000	0	371	0	4.09	170	4.08	0.01
Malana Stg-II HPS	100	0	0	0	0.00	0	0.00	0.00
Shree Cement TPS	300	0	260	242	6.21	259	6.21	0.01
Budhil HPS(IPP)	70	0	0	0	0.02	1	0.31	-0.29
Sub Total (G)	1662	0	737	242	10.83	451	11.09	-0.26
H. Total Regional Entities (A-G)	23852	17390	16456	10471	302.10	12588	299.00	3.10

I. State Entities	Station	Effective Installed Capacity (MW)	Peak MW	Off Peak MW	Energy(MU)	Average(Sent out MW)	
Punjab	Guru Gobind Singh TPS (Ropar)	1260	660	660	15.60	650	
	Guru Nanak Dev TPS(Bhatinda)	440	90	90	1.94	81	
	Guru Hargobind Singh TPS(L.mbt)	920	749	695	18.90	788	
	Goindwal(GVK)		0	0	0.00	0	
	Rajpura	700	284	297	6.89	287	
	Talwandi Saboo	660	0	0	0.00	0	
	Thermal (Total)	3980	1783	1742	43.33	1805	
	Total Hydro	1148	536	530	11.81	492	
Total Punjab	5128	2319	2272	55.14	2297		
Haryana	Panipat TPS	1367	226	210	5.21	217	
	DCRTPP (Yamuna nagar)	600	555	500	12.39	516	
	Faridabad GPS (NTPC)	432	388	284	8.06	336	
	RGTPP (khedar) (IPP)	1200	0	0	0.00	0	
	Magnum Diesel (IPP)	25	0	0	0.00	0	
	Jhajjar(CLP)	1320	368	371	10.03	418	
	Thermal (Total)	4944	1537	1365	35.69	1487	
	Total Hydro	62	20	23	0.55	23	
	Total Haryana	5006	1557	1388	36.25	1510	
	Rajasthan	kota TPS	1240	917	958	22.30	929
suratgarh TPS		1500	1232	1317	30.88	1287	
Chabra TPS		750	419	412	10.88	453	
Dholpur GPS		330	121	132	2.81	117	
Ramgarh GPS		221	122	119	2.99	124	
RAPS A (NPC)		300	175	175	4.13	172	
Barsingsar (NLC)		250	96	183	2.24	93	
Giral LTPS		250	70	65	1.39	58	
Rajwest LTPS (IPP)		1080	240	121	4.59	191	
VSLP LTPS (IPP)		135	0	0	0.00	0	
Kalisindh Thermal		600	0	0	0.00	0	
Kawai(Adani)		1320	1183	1190	28.79	1200	
Thermal (Total)		7976	4575	4672	111.01	4625	
Total Hydro		550	54	48	2.05	85	
Wind power		2191	70	370	6.27	261	
Biomass		91	21	21	0.52	21	
Solar		201	6	0	0.59	25	
Renewable/Others (Total)		2483	91	391	7.38	307	
Total Rajasthan	11009	4720	5111	120.43	5018		
UP	Anpara TPS	1630	1441	1458	34.40	1433	
	Obra TPS	1288	241	323	6.20	258	
	Paricha TPS	1140	692	617	15.60	650	
	Panki TPS	210	0	0	0.00	0	
	Harduaganj TPS	665	204	220	5.10	213	
	Tanda TPS (NTPC)	440	398	400	9.65	402	
	Roza TPS (IPP)	1200	1125	1116	25.84	1077	
	Anpara-C (IPP)	1200	803	806	19.25	802	
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	0	0	0.00	0	
	Thermal (Total)	8223	4904	4940	116.04	4835	
	Vishnuparyag HPS (IPP)	400	0	0	0.00	0	
	Other Hydro	527	131	173	3.37	140	
	Cogeneration	981	600	600	14.40	600	
	Total UP	10131	5635	5713	133.81	5576	
	Uttarakhand	Total Hydro	1303	370	278	8.81	367
		Total Uttarakhand	1303	370	278	8.81	367
Delhi	Rajghat TPS	135	0	0	0.00	0	
	Delhi Gas Turbine	282	77	75	1.77	74	
	Pragati Gas Turbine	330	280	260	6.53	272	
	Rithala GPS	95	0	0	0.00	0	
	Bawana GPS	686	0	0	0.00	0	
	Badarpur TPS (NTPC)	705	350	350	7.46	311	
	Thermal (Total)	2232	707	685	15.75	656	
	Total Delhi	2232	707	685	15.75	656	
HP	Baspa HPS (IPP)	330	29	0	1.04	43	
	Malana HPS (IPP)	86	61	0	0.32	13	
	Other Hydro	589	358	290	7.89	329	
	Total HP	1005	448	290	9.25	385	
J & K	Baqilhar HPS (IPP)	450	416	290	7.87	328	
	Other Hydro	323	73	132	2.30	96	
	Gas/Diesel/Others	183	0	0	0.00	0	
	Total J & K	956	489	422	10.17	424	
Total State Control Area Generation		36770	16245	16159	389.61	16234	
J. Net Inter Regional Exchange (Import (+ve)/Export (-ve))			3908	3911	99.78	4157	
Total Regional Availability(Gross)		60623	36609	30541	791.49	32979	

IV. Total Hydro Generation:

Regional Entities Hydro	10880	6797	2050	96.10	4004
State Control Area Hydro	5368	2048	1764	46.00	1917
Total Regional Hydro	16248	8845	3814	142.10	5921

V(A). Inter Regional Exchange [Import (+ve)/Export (-ve)] [Linkwise]

Element	Peak(19:00 Hrs)	Off Peak(03:00 Hrs)	Maximum Interchange (MW)		Energy (MU)		Net Energy MU
	MW	MW	Import	Export	Import	Export	
Vindhychal B/B	250	500	500	0	9.97	0.00	9.97
Gwalior-Agra (D/C)	1120	1361	1784	0	31.81	0.00	31.81
Zerda-Kankroli	-211	-334	0	334	0.00	5.66	-5.66
Zerda-Bhinmal	-116	-254	0	277	0.00	3.11	-3.11
Malanpur-Auraiya	-87	-72	0	132	0.00	1.86	-1.86
Badod-Kota/Morak	-96	-187	0	187	0.00	2.85	-2.85
Mundra-Mohinderghar(HVDC)	2001	1998	2007	0	48.32	0.00	48.32
Sub Total WR	2861	3012			90.09	13.48	76.61
Pusauli Bypass	100	300	300	0	4.31	0.00	4.31
MZP- GKP (D/C)	208	145	270	0	3.45	0.00	3.45
Patna-Balia(D/C)	457	415	688	0	11.96	0.00	11.96
B'Sharni-Balia (D/C)	125	116	332	0	4.04	0.00	4.04
Pusauli-Balia	-91	-95	11	122	0.00	1.41	-1.41
Gaya-Fatehpur (765 Kv)	21	-62	54	95	0.00	0.69	-0.69
Pusauli-Sahupuri	110	146	148	0	3.05	0.00	3.05
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-28	-25	0	32	0.00	0.56	-0.56
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	145	-41	193	78	0.00	0.97	-0.97
Sub Total ER	1047	899			26.81	3.64	23.17
Total IR Exch	3908	3911			116.90	17.12	99.78

V(B). Inter Regional Schedule & Actual Exchanges [Import (+ve)/Export (-ve)] [Corridor wise]

ISGS/LT Schedule (MU)			Bilateral Schedule (MU)		Power Exchange Shdl (MU)		Wheeling (MU)	
ER	Bhutan	Total	Through ER	Through WR	Through ER	Through WR	Through ER	Through WR
31.71	0.26	31.97	-0.03	7.38	2.15	0.64	0.00	0.00

Total IR Schedule (MU)			Total IR Actual (MU)			Net IR UI (MU)		
Through ER	Through WR Inclds Mndra	Total	Through ER	Through WR	Total	Through ER	Through WR	Total
34.10	68.84	102.93	23.17	76.61	99.78	-10.93	7.77	-3.15

VI. Frequency Profile <----- % of Time Frequency ----->

<49.2	<49.7	<49.8	<49.9	<50.0	49.9-50.05	50.05-50.10	>50.10	>50.20	>50.50
0.00	NA	NA	30.50	71.32	55.50	5.00	6.00	3.00	0.00

<----- Frequency (Hz) ----->				Average Frequency	Frequency Variation Index	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum					MAX (Hz)	MIN
Freq	Time	Freq	Time	Hz				
50.28	18.01	49.63	12.20	49.95	0.10	0.12	50.20	49.78

VII. Voltage profile 400 kV

Station	Voltage Level (kV)	Maximum		Minimum		Voltage (in % of Time)			
		Voltage(KV)	Time	Voltage (KV)	Time	<380 kV	<390 kV	>420 kV	>430 kV
Rihand	400	406	00:25	400	06:21	0.1	0.1	0.0	0.0
Gorakhpur	400	421	05:10	409	12:15	0.0	0.0	1.5	0.0
Bareilly	400	420	00:00	401	18:59	0.0	0.0	0.0	0.0
Kanpur	400	415	04:02	399	18:57	0.0	0.0	0.0	0.0
Dadri	400	424	02:53	406	18:52	0.0	0.0	19.7	0.0
Ballabgarh	400	431	04:00	411	18:55	0.0	0.0	37.8	0.2
Bawana	400	429	04:00	408	18:55	0.0	0.0	27.3	0.0
Bassi	400	428	03:59	403	11:27	0.0	0.0	13.0	0.0
Hissar	400	418	04:01	396	18:57	0.0	0.0	0.0	0.0
Moga	400	421	03:29	399	18:55	0.0	0.0	1.1	0.0
Abdullapur	400	426	00:01	405	18:57	34.3	34.3	19.6	0.0
Nalagarh	400	429	04:01	406	18:57	0.0	0.0	23.4	0.0
Kishenpur	400	417	03:57	394	19:24	0.0	0.0	0.0	0.0
Wagoora	400	398	18:00	366	19:24	46.4	70.8	0.0	0.0

VIII. Voltage profile 765 kV

Station	Voltage Level (kV)	Maximum		Minimum		Voltage (in % of Time)			
		Voltage(KV)	Time	Voltage (KV)	Time	<728 kV	<742 kV	>800 kV	>820 kV
Fatehpur	765	766	04:02	737	18:57	0.0	6.6	0.0	0.0
Balia	765	767	07:08	744	12:18	0.0	0.0	0.0	0.0
Moga	765	800	04:01	758	18:57	0.0	0.0	0.0	0.0
Agra	765	803	04:01	768	18:56	0.0	0.0	0.8	0.0
Bhiwani	765	810	04:03	770	18:57	0.0	0.0	16.8	0.0
Unnao	765	750	04:03	728	19:18	0.0	66.9	0.0	0.0

IX. Reservoir Parameters:

Name of Reservoir	Parameters		Present Parameters		Last Year		Last day	
	FRL (m)	MDDL (m)	Level (m)	Energy (MU)	Level (m)	Energy (MU)	Inflow (m ³ /s)	Usage (m ³ /s)
Bhakra	513.59	445.62	484.60	577.33	483.04	536.06	126.09	550.17
Pong	426.72	384.05	403.52	304.55	401.39	252.05	89.20	315.65
Tehri	829.79	740.04	788.45	425.58	818.65	982.26	48.18	195.00
Koteshwar	612.50	598.50	610.35	4.69	609.60	4.21	195.00	198.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	81.53	107.03
Rihand	268.22	252.98	259.45	274.80	258.99	250.70	NA	NA
RPS	352.80	343.81	NA	NA	NA	NA	NA	NA
Jawahar Sagar	298.70	295.78	NA	NA	NA	NA	NA	NA
RSD	527.91	487.91	508.60	144.00	508.99	144.00	105.85	120.77

* NA: Not Available

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 22.03.2014 :

1. Normal Weather

XIII. Synchronisation of new generating units :

0.00

XIV. Synchronisation of new 220 / 400 / 765 KV lines and energising of bus / /substation :

XV. Tripping of lines in pooling stations :

XVI. Complete generation loss in a generating station :

Vishnuprayag (400MW) and Dhauliganga (280MW) are out of operation since 16.06.2013.

Civil construction is in progress for rectification of the major damages in Plants/Dam caused due to flood Vishnuprayag and Dhauliganga expected by Mar, 2014 .

Report for : 22.03.2014

पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER