

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरसिस्टम की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 19.08.2013
Date of Reporting : 20.08.2013

I. Regional Availability/Demand:

Evening Peak (20:00 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
36228	2080	38308	50.15	31756	260	32016	50.57	790.5	36.20

* 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:

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	9.38	17.91		27.29	109.42	108.09	-1.33	135.38	0.00
Haryana	53.99	0.54		54.53	67.80	68.96	1.16	123.49	0.00
Rajasthan	53.77	6.68	18.02	78.47	55.58	50.56	-5.02	129.02	0.00
Delhi	21.99			21.99	66.45	64.34	-2.11	86.33	0.00
UP	105.51	3.84	1.20	110.54	119.43	116.46	-2.97	227.00	33.77
Uttarakhand		20.03		20.03	13.76	13.47	-0.29	33.50	0.73
HP		23.33		23.33	0.27	-0.05	-0.32	23.28	0.00
J & K		13.67	0.00	13.67	13.68	13.80	0.12	27.47	1.70
Chandigarh				0.00	5.38	5.01	-0.37	5.01	0.00
Total	244.64	85.99	19.22	349.85	451.76	440.64	-11.12	790.49	36.20

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

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

State	Evening Peak (20:00 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	6341	0	76	1844	5212	0	-204	2009	47.28	
Haryana	6301	0	63	577	5217	0	213	280	6.16	
Rajasthan	5819	0	-260	68	5188	0	-412	108	2.91	
Delhi	3999	0	-169	177	3163	0	-111	5	-0.25	
UP	9575	1880	121	646	9949	260	-82	957	17.05	
Uttarakhand	1492	100	167	19	1331	0	-107	24	-0.98	
HP	1059	0	46	-1164	781	0	-110	-1150	-27.16	
J&K	1398	100	106	-368	760	0	-163	-651	-10.97	
Chandigarh	245	0	-10	-10	155	0	-35	-30	-0.06	
Total	36228	2080	140	1787	31756	260	-1011	1551	33.96	

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

III. Regional Entities :

Entity	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	1937	2071	1449	41.62	1734	42.17	-0.55
	Rihand I STPS	1000	920	975	697	18.49	771	18.99	-0.50
	Rihand II STPS	1000	470	506	336	9.45	394	9.66	-0.21
	Rihand III STPS	500	485	508	343	9.87	411	10.12	-0.25
	Dadri I STPS	840	600	631	313	9.52	397	9.98	-0.46
	Dadri II STPS	980	975	978	701	18.81	784	19.20	-0.39
	Unchahar I TPS	420	391	414	303	7.38	308	7.55	-0.17
	Unchahar II TPS	420	404	436	321	7.52	313	7.61	-0.08
	Unchahar III TPS	210	201	192	153	3.48	145	3.51	-0.03
	ISTPP (Jhajjar)	1500	1470	398	308	8.02	334	7.06	0.96
	Dadri GPS	830	523	190	193	4.40	183	4.82	-0.41
	Anta GPS	419	405	263	241	5.85	244	5.90	-0.05
	Auraiya GPS	663	625	156	157	3.58	149	3.87	-0.29
	Sub Total (A)	10782	9405	7718	5515	148.00	6167	150.43	-2.43
B. NPC	NAPS	440	293	329	336	6.91	288	7.03	-0.12
	RAPS- B	440	399	440	445	9.60	400	9.58	0.03
	RAPS- C	440	410	468	471	9.92	413	9.84	0.08
	Sub Total (B)	1320	1102	1237	1252	26.43	1101	26.45	-0.02
C. NHPC	Chamera I HPS	540	534	540	540	12.95	540	12.82	0.14
	Chamera II HPS	300	300	301	283	7.17	299	7.20	-0.03
	Chamera III HPS	231	231	232	233	5.52	230	5.49	0.04
	Bairasuil HPS	180	179	179	179	4.28	178	3.98	0.30
	Salal-HPS	690	667	668	668	15.90	663	15.99	-0.09
	Tanakpur-HPS	94	94	93	94	2.24	93	2.19	0.04
	Uri-HPS	480	188	247	158	4.37	182	4.38	-0.01
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	378	409	370	9.20	383	9.17	0.03
	Sewa-II HPS	120	119	125	119	2.87	120	2.92	-0.05
	Sub Total (C)	3305	2690	2794	2644	64.50	2687	64.13	0.36
D. NJPC	Nathpa Jhakri	1500	1605	1625	1621	38.71	1613	38.52	0.19
	Sub Total (D)	1500	1605	1625	1621	38.71	1613	38.52	0.19
E. THDC	Tehri HPS	1000	1060	1063	1040	25.46	1061	25.25	0.21
	Koteshwar HPS	400	367	375	352	8.75	365	8.81	-0.06
Sub Total (E)	1400	1427	1438	1392	34.21	1426	34.06	0.15	
F. BBMB	Bhakra HPS	1480	1187	1342	1097	29.08	1212	28.50	0.58
	Dehar HPS	990	619	825	610	15.17	632	14.85	0.32
	Pong HPS	396	366	372	372	9.01	375	8.78	0.23
	Sub Total (F)	2866	2172	2539	2079	53.26	2219	52.13	1.13
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	230	221	5.24	218	4.61	0.63
	KWHEP HPS(IPP)	1000	0	1198	1085	28.24	1176	27.23	1.01
	Malana Stg-II HPS	100	0	112	113	2.49	104	2.42	0.07
	Shree Cement TPS	300	0	95	85	2.07	86	2.14	-0.07
	Budhil HPS(IPP)	70	0	35	35	0.83	34	1.68	-0.85
	Sub Total (G)	1662	0	1670	1539	38.85	1619	38.07	0.78
H. Total Regional Entities (A-G)	22836	18400	19021	16042	403.95	16831	403.78	0.17	

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	210	170	3.94	164
	Guru Nanak Dev TPS(Bhatinda)	440	100	70	1.72	72
	Guru Hargobind Singh TPS(L.mbt)	920	210	162	3.73	155
	Goindwal(GVK)		0	0	0.00	0
	Thermal (Total)	2620	520	402	9.38	391
	Total Hydro	1148	864	715	17.91	746
	Total Punjab	3768	1384	1117	27.29	1137
Haryana	Panipat TPS	1367	364	383	7.64	318
	DCRTPP (Yamuna nagar)	600	0	0	0.00	0
	Faridabad GPS (NTPC)	432	182	161	4.02	168
	RGTPP (khedar) (IPP)	1200	1009	757	19.42	809
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	1086	1114	22.91	955
	Thermal (Total)	4944	2641	2415	53.99	2250
	Total Hydro	62	22	19	0.54	22
	Total Haryana	5006	2663	2434	54.53	2272
	Rajasthan	kota TPS	1240	486	442	10.84
suratgarh TPS		1500	642	569	13.87	578
Chabra TPS		500	223	198	4.89	204
Dholpur GPS		330	0	0	0.00	0
Ramgarh GPS		111	40	39	1.07	45
RAPS A (NPC)		300	176	176	3.99	166
Barsingsar (NLC)		250	91	91	2.10	88
Giral LTPS		250	0	0	0.00	0
Rajwest LTPS (IPP)		1080	230	332	6.17	257
VSLP LTPS (IPP)		135	0	0	0.00	0
Kalisindh Thermal		600	0	0	0.00	0
Kawai(Adani)		660	580	457	10.83	451
Thermal (Total)		6956	2468	2304	53.77	2240
Total Hydro		550	297	245	6.68	278
Wind power		2191	872	1064	16.76	698
Biomass		91	28	28	0.71	29
Solar		201	0	0	0.56	23
Renewable/Others (Total)		2483	900	1092	18.02	751
Total Rajasthan		9989	3665	3641	78.47	3269
UP		Anpara TPS	1630	1234	1243	29.60
	Obra TPS	1288	209	338	6.60	275
	Paricha TPS	1140	803	819	19.10	796
	Panki TPS	210	54	63	1.40	58
	Harduaganj TPS	665	140	341	6.40	267
	Tanda TPS (NTPC)	440	386	393	9.50	396
	Roza TPS (IPP)	1200	1001	999	22.10	921
	Anpara-C (IPP)	1200	493	396	10.81	450
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	0	0	0.00	0
	Thermal (Total)	8223	4320	4592	105.51	4396
	Vishnuparyag HPS (IPP)	400	0	0	0.00	0
	Other Hydro	527	202	164	3.84	160
	Cogeneration	981	50	50	1.20	50
	Total UP	10131	4572	4806	110.54	4606
	Uttarakhand	Total Hydro	1303	687	871	20.03
Total Uttarakhand		1303	687	871	20.03	834
Delhi	Rajghat TPS	135	46	45	1.07	45
	Delhi Gas Turbine	282	81	82	1.92	80
	Pragati Gas Turbine	330	292	264	6.63	276
	Riithala GPS	95	0	0	0.00	0
	Bawana GPS	686	0	202	3.09	129
	Badarpur TPS (NTPC)	705	480	425	9.28	387
	Thermal (Total)	2232	899	1018	21.99	916
	Total Delhi	2232	899	1018	21.99	916
HP	Baspa HPS (IPP)	330	334	304	7.67	320
	Malana HPS (IPP)	86	74	67	1.70	71
	Other Hydro	589	589	586	13.96	582
	Total HP	1005	997	957	23.33	972
J & K	Baglihar HPS (IPP)	450	438	438	10.46	436
	Other Hydro	323	132	137	3.21	134
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	956	570	575	13.67	570
Total State Control Area Generation		34390	15437	15419	349.85	14577
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			2727	1276	43.89	1829
Total Regional Availability(Gross)		57226	37185	32737	797.69	33237

IV. Total Hydro Generation:

Regional Entities Hydro	10364	9936	9155	226.63	9443
State Control Area Hydro	5368	3639	3546	85.99	3583
Total Regional Hydro	15731	13575	12701	312.62	13026

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

Element	Peak(20:00 Hrs)	Off Peak(03:00 Hrs)	Maximum Interchange (MW)		Energy (MU)		Net Energy MU
	MW	MW	Import	Export	Import	Export	
Vindhychal B/B	-300	-400	50	500	0.08	5.86	-5.78
Gwalior-Agra (D/C)	1104	598	1237	0	14.90	0.00	14.90
Zerda-Kankroli	-33	-334	0	374	0.00	4.77	-4.77
Zerda-Bhinmal	-4	-302	16	357	0.00	3.76	-3.76
Malanpur-Auraiya	-59	-52	0	104	0.00	1.40	-1.40
Badod-Kota/Morak	-4	105	107	19	1.30	0.00	1.30
Mundra-Mohindergarh(HVDC)	1000	670	1000	0	19.24	0.00	19.24
Sub Total WR	1704	285			35.52	15.79	19.73
Pusauli Bypass	100	100	100	0	2.39	0.00	2.39
MZP- GKP (D/C)	372	497	618	0	11.24	0.00	11.24
Patna-Balia(D/C)	346	299	364	0	6.44	0.00	6.44
B'Sharif-Balia (D/C)	89	165	208	0	2.84	0.00	2.84
Pusauli-Balia	-99	-51	0	104	0.00	1.54	-1.54
Gaya-Fatehpur (765 Kv)	-11	-96	37	98	0.00	0.92	-0.92
Pusauli-Sahupuri	124	121	139	0	2.70	0.00	2.70
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-37	-38	0	45	0.00	0.80	-0.80
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	139	-6	139	8	1.81	0.00	1.81
Sub Total ER	1023	991			27.42	3.26	24.16
Total IR Exch	2727	1276			62.94	19.05	43.89

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

ER	ISGS/LT Schedule (MU)		Bilateral Schedule (MU)		Power Exchange Shdl (MU)		Wheeling (MU)	
	Bhutan	Total	Through ER	Through WR	Through ER	Through WR	Through ER	Through WR
27.42	3.74	31.16	-9.55	38.98	-2.71	-26.15	3.08	-3.08

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
21.98	40.80	62.78	24.16	19.73	43.89	2.18	-21.07	-18.89

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

<48.80	<49.0	<49.20	<49.50	<49.7	49.5 - 50.2	49.7-49.8	49.7 - 50.2	> 50.00	> 50.2
0.00	0.00	0.00	0.00	0.00	56.48	0.31	56.48	92.51	43.52

<----- Frequency (Hz) ----->				Average Frequency	Frequency Variation Index	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum					MAX (Hz)	MIN (Hz)
Freq	Time	Freq	Time	Hz				
50.63	3.05	49.75	14.11	50.20	0.61	0.15	50.60	49.93

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	416	01:37	378	14:40	0.0	0.0	0.0	0.0
Gorakhpur	400	0	00:00	9999	00:00	0.0	0.0	0.0	0.0
Barilly	400	422	07:19	390	04:14	0.0	0.0	0.6	0.0
Kanpur	400	419	02:59	406	09:42	0.0	0.0	0.0	0.0
Dadri	400	417	01:13	400	19:37	0.0	0.0	0.0	0.0
Ballabgarh	400	428	03:05	404	19:34	0.0	0.0	30.5	0.0
Bawana	400	422	04:11	401	19:33	0.0	0.0	7.7	0.0
Bassi	400	429	03:08	400	19:37	0.0	0.0	25.6	0.0
Hissar	400	414	03:00	393	19:37	0.0	0.0	0.0	0.0
Moga	400	416	04:13	397	19:32	0.0	0.0	0.0	0.0
Abdullapur	400	416	03:03	398	19:26	0.0	0.0	0.0	0.0
Nalagarh	400	416	02:59	398	19:18	0.0	0.0	0.0	0.0
Kishenpur	400	420	02:41	402	19:26	0.0	0.0	0.0	0.0
Wagoora	400	417	03:10	390	19:27	0.0	0.0	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	771	07:10	732	19:34	0.0	7.5	0.0	0.0
Balia	765	759	07:06	726	16:49	0.9	51.5	0.0	0.0
Moga	765	784	03:03	747	19:37	0.0	0.0	0.0	0.0
Agra	765	810	03:06	751	19:37	0.0	0.0	12.2	0.0
Bhiwani	765	801	04:15	767	14:12	0.0	0.0	0.2	0.0
Unnao	765	757	03:05	0	12:31	0.0	12.2	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	507.59	1426.07	488.49	690.05	1325.00	879.10
Pong	426.72	384.05	421.29	946.20	406.30	379.44	1065.00	509.31
Tehri	829.79	740.04	819.35	988.00	818.65	982.26	729.35	555.00
Koteshwar	612.50	598.50	NA	NA	NA	NA	NA	NA
Chamera-I	760.00	748.75	NA	NA	NA	NA	953.02	347.96
Rihand	268.22	252.98	257.89	196.40	260.12	311.30	NA	NA
RPS	352.80	343.81	345.25	NA	NA	NA	NA	NA
Jawahar Sagar	298.70	295.78	NA	NA	NA	NA	NA	NA
RSD	527.91	487.91	521.67	144.00	502.54	144.00	926.24	134.45

* NA: Not Available

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 19.08.2013 :

1. Rain in NCR , PUNJAB , Raj , Haryana , HP , J & K , Uttranchal, UP.

XIII. Synchronisation of new generating units :

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 :

1. Dhauliganga (280 MW) closed down till 30.09.2013 due to flooding of power house.
2. Vishnuprayg(UPPCL) (400 MW) Closed due to High Silt level in river water.