

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरसिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 30.07.2014
Date of Reporting : 31.07.2014

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
43319	2855	46174	49.87	40141	2190	42331	50.15	995.3	51.81

* 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	68.08	23.33		91.41	113.82	114.12	0.30	205.52	0.00
Haryana	58.62	0.52		59.13	109.42	108.69	-0.73	167.83	0.00
Rajasthan	98.12	0.99	5.78	104.88	47.32	49.48	2.16	154.37	0.75
Delhi	27.59			27.59	75.49	75.96	0.47	103.55	0.11
UP	123.90	14.30	1.20	139.40	126.16	129.70	3.54	269.10	48.66
Uttarakhand		14.80		14.80	18.30	19.45	1.15	34.25	0.59
HP		26.41		26.41	-0.73	-0.90	-0.17	25.51	0.00
J & K		14.70	0.00	14.70	16.52	14.46	-2.06	29.16	1.70
Chandigarh				0.00	5.54	6.02	0.48	6.02	0.00
Total	376.30	95.04	6.98	478.32	511.85	516.98	5.13	995.30	51.81

* 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				# Max(hourly) Demand Met of Day (MW)
	Demand Met	Shortage	UI	STOA/PX transaction	Demand Met	Shortage	UI	STOA/PX transaction	
Punjab	9067	0	2	1452	8469	0	189	1717	9231
Haryana	7490	20	300	1477	6648	0	-103	1649	8109
Rajasthan	6607	248	227	-795	6149	0	89	-326	7250
Delhi	4486	87	201	479	3868	0	-25	296	4941
UP	11273	2365	237	656	11780	2190	0	923	12012
Uttarakhand	1587	35	199	91	1296	0	-38	87	1621
HP	1073	0	-20	-1296	886	0	12	-1447	1207
J&K	1464	100	20	-306	847	0	-436	-580	1541
Chandigarh	273	0	32	0	199	0	-8	0	309
Total	43319	2855	1197	1758	40141	2190	-320	2319	44495

* STOA figures are at sellers boundary & PX figures are at regional boundary. # figures may not be at simultaneous hour.

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III. Regional Entities :

A. NTPC	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
	Singrauli STPS	2000	1700	1762	1784	40.08	1670	40.02	0.05
	Rihand I STPS	1000	423	442	426	10.70	446	9.74	0.26
	Rihand II STPS	1000	871	970	740	21.68	903	19.99	1.68
	Rihand III STPS	1000	799	850	770	20.17	840	18.90	1.27
	Dadri I STPS	840	770	605	531	15.82	659	14.82	1.00
	Dadri II STPS	980	470	435	388	10.12	422	10.24	-0.12
	Unchahar I TPS	420	397	395	330	9.54	398	8.72	0.82
	Unchahar II TPS	420	399	385	287	9.09	379	8.25	0.84
	Unchahar III TPS	210	198	190	152	4.44	185	4.04	0.40
	ISTPP (Jhajjar)	1500	950	996	635	16.07	670	16.34	-0.27
	Dadri GPS	830	519	366	186	5.52	230	5.68	-0.16
	Anta GPS	419	390	245	234	5.91	246	5.85	0.06
	Auraiya GPS	663	609	235	320	6.26	261	6.19	0.06
	Dadri Solar	5	1	0	0	0.02	1	0.03	-0.01
	Unchahar Solar	10	3	0	0	0.02	1	0.07	-0.05
	Sub Total (A)	11297	8499	7876	6783	175	7309	169	7
B. NPC	NAPS	440	270	306	309	6.49	270	6.48	0.01
	RAPS- B	440	394	434	440	9.44	393	9.46	-0.02
	RAPS- C	440	390	410	414	8.81	367	9.36	-0.55
	Sub Total (B)	1320	1054	1150	1163	24.74	1031	25.30	-0.56
C. NHPC	Chamera I HPS	540	534	540	540	13.09	546	12.82	0.28
	Chamera II HPS	300	292	207	301	6.95	289	6.96	-0.01
	Chamera III HPS	231	229	235	231	5.47	228	5.50	-0.03
	Bairasui HPS	180	159	180	180	3.57	149	3.46	0.12
	Salal-HPS	690	653	679	669	16.02	667	15.67	0.35
	Tanakpur-HPS	94	83	88	64	2.00	83	1.98	0.02
	Uri-HPS	480	455	479	454	11.07	461	10.91	0.15
	Uri-II HPS	240	238	243	242	5.74	239	5.72	0.03
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	386	399	395	9.34	389	9.26	0.08
	Sewa-II HPS	120	119	130	123	2.95	123	2.86	0.09
	Parbati 3	390	253	268	258	6.16	257	6.07	0.09
	Sub Total ©	3935	3400	3447	3457	82	3432	81	1
D.SJVNL	NJPC	1500	1605	1615	1617	38.55	1606	38.50	0.05
	Rampur HEP	275	280	291	285	6.88	287	6.72	0.16
	Sub Total (D)	1775	1885	1906	1902	45.43	1893	45.22	0.21
E. THDC	Tehri HPS	1000	880	888	875	21.12	880	21.00	0.12
	Koteshwar HPS	400	400	399	305	8.23	343	8.20	0.03
	Sub Total (E)	1400	1280	1287	1180	29.36	1223	29.20	0.16
F. BBMB	Bhakra HPS	1514	967	1337	824	23.46	977	23.21	0.25
	Dehar HPS	990	571	660	585	14.20	592	13.71	0.50
	Pong HPS	396	214	384	126	5.35	223	5.13	0.22
	Sub Total (F)	2900	1752	2381	1535	43.01	1792	42.04	0.97
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	227	228	5.41	225	5.26	0.15
	KWHEP HPS(IPP)	1000	0	1200	1200	28.58	1191	28.34	0.25
	Malana Stg-II HPS	100	0	113	112	2.66	111	2.50	0.16
	Shree Cement TPS	300	0	136	139	3.28	137	3.27	0.00
	Budhil HPS(IPP)	70	0	59	68	1.52	64	1.67	-0.15
	Sub Total (G)	1662	0	1735	1746	41.46	1727	41.05	0.41
H. Total Regional Entities (A-G)		24289	17870	19782	17767	441.78	18407	432.90	8.87

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	1070	1060	25.22	1051	
	Guru Nanak Dev TPS(Bhatinda)	440	435	373	8.98	374	
	Guru Hargobind Singh TPS(L.mbt)	920	923	728	17.84	743	
	Goindwal(GVK)		0	0	0.00	0	
	Rajpura	700	788	684	16.04	668	
	Talwandi Saboo	660	0	0	0.00	0	
	Thermal (Total)	3980	3216	2845	68.08	2837	
	Total Hydro	1148	978	977	23.33	972	
	Total Punjab	5128	4194	3822	91.41	3809	
	Haryana	Panipat TPS	1367	203	211	4.98	208
DCRTPP (Yamuna nagar)		600	484	432	10.64	443	
Faridabad GPS (NTPC)		432	193	196	4.60	192	
RGTPP (khedar) (IPP)		1200	814	895	19.14	798	
Magnum Diesel (IPP)		25	0	0	0.00	0	
Jhajjar(CLP)		1320	740	739	19.25	802	
Thermal (Total)		4944	2434	2473	58.62	2442	
Total Hydro		62	25	21	0.52	22	
Total Haryana		5006	2459	2494	59.13	2464	
Rajasthan		kota TPS	1240	932	882	21.22	884
	suratgarh TPS	1500	802	1036	23.04	960	
	Chabra TPS	750	350	343	8.50	354	
	Dholpur GPS	330	76	76	2.91	121	
	Ramgarh GPS	271	115	112	3.06	127	
	RAPS A (NPC)	300	0	0	0.00	0	
	Barsingsar (NLC)	250	192	175	4.27	178	
	Giral LTPS	250	0	0	0.00	0	
	Rajwest LTPS (IPP)	1080	950	862	21.81	909	
	VSLP LTPS (IPP)	135	0	0	0.00	0	
	Kalisindh Thermal	600	0	0	0.00	0	
	Kawai(Adani)	1320	620	497	13.32	555	
	Thermal (Total)	8026	4037	3983	98	4088	
	Total Hydro	550	49	0	0.99	41	
	Wind power	2798	218	223	4.50	188	
	Biomass	99	31	31	0.74	31	
	Solar	730	0	0	0.54	22	
	Renewable/Others (Total)	3627	249	254	5.78	241	
	Total Rajasthan	12203	4335	4237	104.88	4370	
	UP	Anpara TPS	1630	850	866	20.50	854
Obra TPS		1288	400	433	10.00	417	
Paricha TPS		1140	639	752	16.10	671	
Panki TPS		210	135	54	2.70	113	
Harduaganj TPS		665	229	245	5.90	246	
Tanda TPS (NTPC)		440	370	372	9.10	379	
Roza TPS (IPP)		1200	1098	1098	25.70	1071	
Anpara-C (IPP)		1200	1060	1062	24.60	1025	
Bajaj Energy Pvt.Ltd(IPP) TPS		450	401	361	9.30	388	
Thermal (Total)		8223	5182	5243	123.90	5163	
Vishnuparyag HPS (IPP)		400	436	436	10.50	438	
Other Hydro		527	160	125	3.80	158	
Cogeneration		981	50	50	1.20	50	
Total UP		10131	5828	5854	139.40	5371	
Uttarakhand		Total Hydro	1303	637	639	14.80	617
		Total Uttarakhand	1303	637	639	14.80	617
Delhi	Rajghat TPS	135	89	83	2.09	87	
	Delhi Gas Turbine	282	71	74	1.67	70	
	Pragati Gas Turbine	330	283	281	6.89	287	
	Rithala GPS	95	0	0	0.00	0	
	Bawana GPS	1370	297	297	7.11	296	
	Badarpur TPS (NTPC)	705	390	290	9.83	410	
	Thermal (Total)	2917	1130	1025	27.59	1149	
	Total Delhi	2917	1130	1025	27.59	1149	
HP	Baspa HPS (IPP)	300	330	300	7.56	315	
	Malana HPS (IPP)	86	105	104	2.53	105	
	Other Hydro	728	675	648	16.32	680	
	Total HP	1114	1110	1052	26.41	1100	
J & K	Baqilhar HPS (IPP)	450	436	436	10.48	437	
	Other Hydro/IPP	436	163	175	4.22	176	
	Gas/Diesel/Others	209	0	0	0.00	0	
	Total J & K	1094	599	611	14.70	613	
Total State Control Area Generation		38896	20292	19734	478.32	19493	
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			5389	4081	106.24	4427	
Total Regional Availability(Gross)		63186	45463	41582	1026.34	42326	

IV. Total Hydro Generation:

Regional Entities Hydro	11302	10560	9613	236.81	9867
State Control Area Hydro	5589	3558	3425	95.04	3523
Total Regional Hydro	16891	14118	13038	331.86	13390

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	200	250	250	400	0.18	6.12	-5.94
Gwalior-Agra (D/C)	1683	774	2115	0	32.24	0.00	32.24
Zerda-Kankroli	-22	-194	13	226	0.00	3.25	-3.25
Zerda-Bhinmal	-6	-159	53	233	0.00	2.90	-2.90
Malanpur-Auraiya	-95	-41	0	105	0.00	1.48	-1.48
Badod-Kota/Morak	-47	-88	0	132	0.00	1.63	-1.63
Mundra-Mohindergarh(HVDC)	1800	2000	2005	0	44.90	0.00	44.90
Vindhychal - Rihand	389	297	412	0	8.45	0.00	8.45
Sub Total WR	3902	2839			85.77	15.37	70.40
Pusaui Bypass	400	400	400	0	9.67	0.00	9.67
MZP- GKP (D/C)	484	400	630	0	10.93	0.00	10.93
Patna-Balia(D/C)	243	147	327	0	4.81	0.00	4.81
B'Sharif-Balia (D/C)	238	233	318	0	5.85	0.00	5.85
Pusaui-Balia	-79	-57	0	89	0.00	1.42	-1.42
Gaya-Fatehpur (765 Kv)	38	-37	127	51	0.56	0.00	0.56
Pusaui-Sahupuri	44	166	182	0	3.64	0.00	3.64
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-33	-36	0	40	0.00	0.78	-0.78
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	152	26	243	0	2.58	0.00	2.58
Sub Total ER	1487	1242			38.04	2.20	35.84
Total IR Exch	5389	4081			123.80	17.57	106.24

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
19.61	3.74	23.35	12.78	4.61	-0.80	10.62	1.13	-1.13

Total IR Schedule (MU)			Total IR Actual (MU)			Net IR UI (MU)		
Through ER	Through WR incld Mndra	Total	Through ER	Through WR	Total	Through ER	Through WR	Total
36.46	62.67	99.13	35.84	70.40	106.24	-0.62	7.73	7.11

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	>50.20	>50.50
0.00	1.60	7.01	29.44	63.95	54.24	10.49	4.65	1.18	NA

Frequency (Hz)				Average Frequency	Frequency Variation	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum					MAX (Hz)	MIN (Hz)
Freq	Time	Freq	Time	Hz	Index			
50.34	4.02	49.65	19.08	49.95	0.13	0.10	50.30	49.81

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	411	04:27	402	21:51	0.0	0.0	0.0	0.0
Gorakhpur	400	415	04:05	395	19:39	0.0	0.0	0.0	0.0
Bareilly	400	419	04:04	398	19:39	0.0	0.0	0.0	0.0
Kanpur	400	415	17:57	403	19:39	0.0	0.0	0.0	0.0
Dadri	400	414	04:01	398	11:37	0.0	0.0	0.0	0.0
Ballabgarh	400	423	04:01	404	11:37	0.0	0.0	4.5	0.0
Bawana	400	417	04:07	401	11:37	0.0	0.0	0.0	0.0
Bassi	400	433	03:41	415	09:11	0.0	0.0	71.2	8.3
Hissar	400	413	04:04	397	11:37	0.0	0.0	0.0	0.0
Moga	400	414	05:08	403	23:46	0.0	0.0	0.0	0.0
Abdullapur	400	417	04:04	396	22:41	0.0	0.0	0.0	0.0
Nalagarh	400	416	04:01	401	13:45	0.0	0.0	0.0	0.0
Kishenpur	400	416	08:02	407	23:27	0.0	0.0	0.0	0.0
Wagoora	400	412	03:58	398	21:30	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	787	04:06	744	19:38	0.0	0.0	0.0	0.0
Balia	765	786	04:06	750	19:39	0.0	0.0	0.0	0.0
Moga	765	801	04:04	776	11:41	0.0	0.0	0.4	0.0
Agra	765	800	04:03	759	11:39	0.0	0.0	0.0	0.0
Bhiwani	765	791	18:01	770	12:10	0.0	0.0	0.0	0.0
Unnao	765	761	18:03	739	21:43	0.0	3.0	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	487.48	652.97	491.45	778.28	1057.52	746.49
Pong	426.72	384.05	400.80	237.89	404.34	328.16	215.09	376.70
Tehri	829.79	740.04	748.65	42.00	NA	NA	301.26	205.00
Koteshwar	612.50	598.50	610.77	4.95	608.40	3.76	208.00	207.00
Chamera-I	760.00	748.75	757.00	12.82	NA	NA	505.02	347.40
Rihand	268.22	252.98	258.07	205.10	256.79	149.00	NA	NA
RPS	352.80	343.81	348.06	NA	NA	NA	NA	NA
Jawahar Sagar	298.70	295.78	298.80	NA	NA	NA	NA	NA
RSD	527.91	487.91	516.64	144.00	506.65	144.00	224.47	197.51

* NA: Not Available

X(A). Short-Term Open Access Details:

State	Off- Peak Hours (03:00 Hrs)			Peak Hours (20:00 Hrs)			Day Energy (MU)		
	Bilateral (MW)	IEX (MW)	PXIL (MW)	Bilateral (MW)	IEX (MW)	PXIL (MW)	Bilateral (MU)	IEX / PXIL (MU)	Total (MU)
Punjab	1345	372	0	1296	156	0	31.50	7.62	39.12
Delhi	313	34	-51	352	177	-50	10.32	3.56	13.88
Haryana	1479	170	0	1432	45	0	34.30	3.70	38.00
HP	-1144	-303	0	-991	-305	0	-23.23	-8.44	-31.68
J&K	-357	-223	0	-464	158	0	-11.28	-2.11	-13.38
CHD	0	0	0	0	0	0	0.33	0.17	0.50
Rajasthan	-791	464	1	-791	-4	0	-17.85	8.82	-9.03
UP	531	344	49	263	344	49	8.63	4.56	13.20
Uttarakhand	84	3	0	84	7	0	2.01	0.27	2.27
Total	1459	861	-1	1180	579	-1	34.72	18.16	52.88

X(B). Short-Term Open Access Details:

State	Bilateral (MW)		IEX (MW)		PXIL (MW)	
	Maximum	Minimum	Maximum	Minimum	Maximum	Minimum
Punjab	1345	1296	689	84	0	0
Delhi	776	264	584	-203	-1	-51
Haryana	1479	1311	189	43	0	0
HP	-839	-1144	-254	-430	0	0
J&K	-357	-646	158	-344	0	0
CHD	41	0	20	0	0	0
Rajasthan	-629	-791	475	-4	2	0
UP	586	208	541	0	49	0
Uttarakhand	84	84	32	1	0	0

XI. System Constraints:**XII. Grid Disturbance / Any Other Significant Event:****XIII. Weather Conditions For 30.07.2014 :**
Normal**XIV. Synchronisation of new generating units :**
0.00**XV. Synchronisation of new 220 / 400 / 765 KV lines and energising of bus / /substation :****XVI. Tripping of lines in pooling stations :****XVII. Complete generation loss in a generating station :**