

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरसिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 19.07.2014
Date of Reporting : 20.07.2014

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
41665	2670	44335	49.96	37971	1810	39781	50.09	947.5	38.35

* 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	63.10	22.60		85.70	117.14	120.09	2.96	205.79	0.00
Haryana	57.10	0.51		57.62	102.71	100.73	-1.98	158.34	0.00
Rajasthan	98.83	0.05	20.10	118.98	36.58	35.75	-0.83	154.73	0.00
Delhi	22.46			22.46	77.13	75.42	-1.71	97.88	0.00
UP	120.80	3.00	1.20	125.00	115.34	115.32	-0.02	240.32	35.54
Uttarakhand		10.49		10.49	16.76	17.49	0.73	27.98	1.11
HP		24.36		24.36	-0.05	0.19	0.24	24.55	0.00
J & K		14.73	0.00	14.73	18.66	18.40	-0.26	33.13	1.70
Chandigarh				0.00	5.15	4.77	-0.38	4.77	0.00
Total	362.30	75.75	21.30	459.34	489.41	488.16	-1.25	947.50	38.35

* 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	8752	0	-149	1381	8473	0	202	1731	9123
Haryana	7224	0	-133	1432	6481	0	162	1876	7438
Rajasthan	6465	0	-436	-526	6157	0	-94	-341	6985
Delhi	4291	0	139	203	3672	0	-176	243	4643
UP	10503	2500	134	268	9805	1810	-207	422	11195
Uttarakhand	1520	70	3	136	994	0	106	74	1520
HP	982	0	-11	-1216	880	0	-14	-1393	1180
J&K	1703	100	44	-226	1330	0	-59	-325	1851
Chandigarh	226	0	-6	0	179	0	-19	0	226
Total	41665	2670	-415	1451	37971	1810	-98	2288	42909

* 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	Off Peak MW	Energy	Average	Schedule	UI
				(Gross)	(Gross)	(Net MU)	Sentout(MW)	Net MU	Net MU
	Singrauli STPS	2000	1672	1818	1595	36.51	1521	35.72	0.79
	Rihand I STPS	1000	885	955	747	20.46	852	18.75	1.71
	Rihand II STPS	1000	950	987	786	21.35	890	19.72	1.63
	Rihand III STPS	1000	878	903	708	19.12	797	17.87	1.25
	Dadri I STPS	840	813	684	530	16.46	686	15.79	0.67
	Dadri II STPS	980	746	429	644	14.50	604	14.48	0.02
	Unchahar I TPS	420	397	417	383	9.37	391	8.64	0.73
	Unchahar II TPS	420	400	441	334	8.99	375	8.21	0.78
	Unchahar III TPS	210	198	212	157	4.37	182	4.01	0.36
	ISTPP (Jhajjar)	1500	900	913	917	20.04	835	20.05	-0.01
	Dadri GPS	830	519	182	184	4.40	183	4.49	-0.09
	Anta GPS	419	379	0	0	0.07	3	0.08	-0.01
	Auraiya GPS	663	631	155	157	3.73	155	3.61	0.12
	Dadri Solar	5	1	0	0	0.02	1	0.03	-0.01
	Unchahar Solar	10	3	0	0	0.01	0	0.07	-0.06
	Sub Total (A)	11297	9372	8096	7142	179	7474	172	8
B. NPC	NAPS	440	271	307	313	6.52	272	6.50	0.02
	RAPS- B	440	393	437	440	9.45	394	9.43	0.02
	RAPS- C	440	375	409	414	8.74	364	9.00	-0.26
	Sub Total (B)	1320	1039	1153	1167	24.71	1030	24.94	-0.23
C. NHPC	Chamera I HPS	540	534	540	540	13.02	543	12.82	0.21
	Chamera II HPS	300	301	309	306	7.26	303	7.22	0.04
	Chamera III HPS	231	229	237	232	5.51	230	5.50	0.02
	Bairasui HPS	180	155	182	180	3.07	128	2.97	0.10
	Salal-HPS	690	657	672	671	15.99	666	15.78	0.21
	Tanakpur-HPS	94	8	0	21	0.21	9	0.18	0.02
	Uri-HPS	480	475	477	475	11.50	479	11.40	0.10
	Uri-II HPS	240	240	244	246	5.82	242	5.76	0.06
	Dhauliganga-HPS	280	37	0	139	0.77	32	0.90	-0.13
	Dulhasti-HPS	390	365	397	397	8.81	367	8.75	0.06
	Sewa-II HPS	120	119	128	122	2.04	85	2.00	0.04
	Parbati 3	390	253	270	262	6.13	256	6.05	0.09
	Sub Total ©	3935	3373	3456	3590	80	3338	79	1
D.SJVNL	NJPC	1500	1605	1614	1618	38.50	1604	38.46	0.04
	Rampur HEP	275	255	292	287	6.92	288	6.72	0.20
	Sub Total (D)	1775	1860	1906	1905	45.42	1893	45.18	0.24
E. THDC	Tehri HPS	1000	752	727	333	8.36	348	8.30	0.06
	Koteshwar HPS	400	152	394	92	3.66	153	3.60	0.06
	Sub Total (E)	1400	904	1121	425	12.03	501	11.90	0.13
F. BBMB	Bhakra HPS	1514	942	1332	808	22.71	946	22.62	0.09
	Dehar HPS	990	577	825	560	13.91	579	13.85	0.06
	Pong HPS	396	174	368	0	4.22	176	4.19	0.04
	Sub Total (F)	2900	1694	2525	1368	40.83	1701	40.65	0.18
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	230	230	5.42	226	5.28	0.14
	KWHEP HPS(IPP)	1000	0	1200	1200	28.63	1193	28.51	0.12
	Malana Stg-II HPS	100	0	112	112	1.96	82	1.87	0.09
	Shree Cement TPS	300	0	229	202	5.10	212	5.18	-0.09
	Budhil HPS(IPP)	70	0	71	71	1.68	70	1.67	0.01
	Sub Total (G)	1662	0	1842	1815	42.80	1783	42.52	0.27
H. Total Regional Entities (A-G)		24289	18241	20099	17411	425.28	17720	416.01	9.27

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	1240	1080	27.06	1128	
	Guru Nanak Dev TPS(Bhatinda)	440	401	310	7.69	321	
	Guru Hargobind Singh TPS(L.mbt)	920	707	501	14.01	584	
	Goindwal(GVK)		0	0	0.00	0	
	Rajpura	700	650	646	14.33	597	
	Talwandi Saboo	660	0	0	0.00	0	
	Thermal (Total)	3980	2998	2537	63.10	2629	
	Total Hydro	1148	979	923	22.60	942	
	Total Punjab	5128	3977	3460	85.70	3571	
	Haryana	Panipat TPS	1367	609	434	13.53	564
DCRTPP (Yamuna nagar)		600	515	422	10.44	435	
Faridabad GPS (NTPC)		432	195	0	2.21	92	
RGTPP (khedar) (IPP)		1200	922	906	21.55	898	
Magnum Diesel (IPP)		25	0	0	0.00	0	
Jhajjar(CLP)		1320	404	371	9.38	391	
Thermal (Total)		4944	2645	2133	57.10	2379	
Total Hydro		62	20	18	0.51	21	
Total Haryana		5006	2665	2151	57.62	2401	
Rajasthan		kota TPS	1240	860	859	20.25	844
		suratgarh TPS	1500	1010	956	23.30	971
	Chabra TPS	750	442	338	8.58	357	
	Dholpur GPS	330	0	0	0.24	10	
	Ramgarh GPS	271	100	60	1.77	74	
	RAPS A (NPC)	300	0	0	0.00	0	
	Barsingsar (NLC)	250	95	97	2.15	90	
	Giral LTPS	250	0	0	0.00	0	
	Rajwest LTPS (IPP)	1080	554	369	12.04	502	
	VSLP LTPS (IPP)	135	0	0	0.00	0	
	Kalisindh Thermal	600	407	406	9.88	412	
	Kawai(Adani)	1320	567	1006	20.61	859	
	Thermal (Total)	8026	4035	4091	99	4118	
	Total Hydro	550	0	0	0.05	2	
	Wind power	2798	855	915	18.73	780	
	Biomass	99	34	34	0.81	34	
	Solar	730	0	0	0.56	23	
	Renewable/Others (Total)	3627	889	949	20.10	837	
	Total Rajasthan	12203	4924	5040	118.98	4958	
	UP	Anpara TPS	1630	932	930	22.00	917
Obra TPS		1288	530	531	12.40	517	
Paricha TPS		1140	415	386	10.40	433	
Panki TPS		210	131	122	3.10	129	
Harduaganj TPS		665	401	405	9.80	408	
Tanda TPS (NTPC)		440	362	366	9.00	375	
Roza TPS (IPP)		1200	1098	900	22.60	942	
Anpara-C (IPP)		1200	1077	1074	24.40	1017	
Bajaj Energy Pvt.Ltd(IPP) TPS		450	403	280	7.10	296	
Thermal (Total)		8223	5349	4994	120.80	5033	
Vishnuparyag HPS (IPP)		400	0	0	0.00	0	
Other Hydro		527	125	111	3.00	125	
Cogeneration		981	50	50	1.20	50	
Total UP		10131	5524	5155	125.00	5208	
Uttarakhand		Total Hydro	1303	748	255	10.49	437
		Total Uttarakhand	1303	748	255	10.49	437
Delhi	Rajghat TPS	135	38	43	1.17	49	
	Delhi Gas Turbine	282	174	109	3.14	131	
	Pragati Gas Turbine	330	272	273	6.74	281	
	Rithala GPS	95	0	0	0.00	0	
	Bawana GPS	1370	0	0	0.00	0	
	Badarpur TPS (NTPC)	705	478	437	11.41	476	
	Thermal (Total)	2917	962	862	22.46	936	
	Total Delhi	2917	962	862	22.46	936	
HP	Baspa HPS (IPP)	300	300	300	7.51	313	
	Malana HPS (IPP)	86	101	103	2.46	102	
	Other Hydro	728	564	660	14.39	600	
	Total HP	1114	965	1063	24.36	1015	
J & K	Baqilhar HPS (IPP)	450	438	438	10.51	438	
	Other Hydro/IPP	436	163	175	4.22	176	
	Gas/Diesel/Others	209	0	0	0.00	0	
	Total J & K	1094	601	613	14.73	614	
Total State Control Area Generation		38896	20366	18599	459.34	19139	
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			4088	4049	95.48	3978	
Total Regional Availability(Gross)		63186	44553	40059	980.10	40837	

IV. Total Hydro Generation:

Regional Entities Hydro	11302	10549	8829	214.42	8934
State Control Area Hydro	5589	3438	2983	75.75	3156
Total Regional Hydro	16891	13987	11812	290.16	12090

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	150	200	300	300	2.02	2.55	-0.53
Gwalior-Agra (D/C)	1724	1403	1914	0	36.38	0.00	36.38
Zerda-Kankroli	-107	-254	0	303	0.00	4.79	-4.79
Zerda-Bhinmal	-108	-276	0	331	0.00	4.70	-4.70
Malanpur-Auraiya	-69	-55	0	74	0.00	0.98	-0.98
Badod-Kota/Morak	-113	-107	0	215	0.00	3.18	-3.18
Mundra-Mohindergarh(HVDC)	1701	2001	2004	0	45.15	0.00	45.15
Vindhychal - Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total WR	3178	2912			83.55	16.20	67.35
Pusaui Bypass	400	400	400	0	9.77	0.00	9.77
MZP- GKP (D/C)	310	400	448	0	8.58	0.00	8.58
Patna-Balia(D/C)	72	204	276	0	3.03	0.00	3.03
B'Sharif-Balia (D/C)	81	94	215	0	2.73	0.00	2.73
Pusaui-Balia	-94	-84	107	0	1.89	0.00	1.89
Gaya-Fatehpur (765 Kv)	0	0	0	0	0.00	0.00	0.00
Pusaui-Sahupuri	140	144	179	179	3.46	0.00	3.46
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-35	-36	0	36	0.00	0.57	-0.57
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	36	15	75	146	0.00	0.75	-0.75
Sub Total ER	910	1137			29.45	1.32	28.13
Total IR Exch	4088	4049			112.99	17.51	95.48

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	
20.03	3.70	23.73	15.23	9.39	-5.76	3.97	0.00	0.00	

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
33.21	60.02	93.22	28.13	67.35	95.48	-5.08	7.33	2.25

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	0.00	1.36	11.42	51.29	65.25	15.27	7.59	0.47	0.00

Frequency (Hz)				Average Frequency Hz	Frequency Variation Index	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum					MAX (Hz)	MIN (Hz)
50.22	5.04	49.71	19.15	49.99	0.07	0.08	50.24	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	412	05:05	401	14:56	0.0	0.0	0.0	0.0
Gorakhpur	400	413	05:05	395	22:39	0.0	0.0	0.0	0.0
Bareilly	400	421	05:05	400	19:40	0.0	0.0	0.1	0.0
Kanpur	400	423	04:01	404	22:32	0.0	0.0	6.7	0.0
Dadri	400	421	05:01	400	14:48	0.0	0.0	0.7	0.0
Ballabgarh	400	427	03:58	404	14:48	0.0	0.0	29.3	0.0
Bawana	400	421	04:02	402	19:40	0.0	0.0	0.5	0.0
Bassi	400	430	04:05	408	14:34	0.0	0.0	34.0	0.0
Hissar	400	414	04:00	397	19:43	0.0	0.0	0.0	0.0
Moga	400	415	04:03	403	19:42	0.0	0.0	0.0	0.0
Abdullapur	400	421	03:59	396	19:40	0.0	0.0	0.6	0.0
Nalagarh	400	416	03:45	404	14:17	0.0	0.0	0.0	0.0
Kishenpur	400	415	05:01	406	20:39	0.0	0.0	0.0	0.0
Wagoora	400	410	01:59	400	03:16	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	783	05:05	747	22:32	0.0	0.0	0.0	0.0
Balia	765	777	05:05	741	22:51	0.0	0.3	0.0	0.0
Moga	765	802	04:03	777	16:56	0.0	0.0	3.2	0.0
Agra	765	799	04:02	762	19:44	0.0	0.0	0.0	0.0
Bhiwani	765	806	05:05	771	19:42	0.0	0.0	9.0	0.0
Unnao	765	761	05:05	726	22:45	1.4	50.4	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	1405	327	0	1356	25	0	32.93	6.59	39.52
Delhi	313	-60	-10	301	-88	-10	10.84	-2.25	8.59
Haryana	1724	153	0	1380	53	0	37.92	3.18	41.11
HP	-927	-465	0	-877	-339	0	-19.57	-10.57	-30.14
J&K	-305	-20	0	-334	109	0	-9.65	-1.97	-11.62
CHD	0	0	0	0	0	0	0.33	0.00	0.33
Rajasthan	-758	414	3	-758	229	3	-16.13	8.66	-7.47
UP	422	0	0	268	0	0	8.04	0.00	8.04
Uttarakhand	-8	82	0	-8	144	0	-0.19	2.27	2.08
Total	1864	431	-8	1327	132	-8	44.52	5.92	50.44

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

State	Bilateral (MW)		IEX (MW)		PXIL (MW)	
	Maximum	Minimum	Maximum	Minimum	Maximum	Minimum
Punjab	1405	1356	366	0	0	0
Delhi	775	263	178	-285	-10	-10
Haryana	1724	1380	175	31	0	0
HP	-725	-927	-339	-491	0	0
J&K	-305	-537	109	-299	0	0
CHD	41	0	0	0	0	0
Rajasthan	-463	-758	416	207	3	3
UP	482	251	0	0	0	0
Uttarakhand	-8	-8	187	23	0	0

XI. System Constraints:**XII. Grid Disturbance / Any Other Significant Event:****XIII. Weather Conditions For 19.07.2014 :**

1. Scattered Rain in NR.

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 :**