

पावर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)

उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 11.07.2011
Date of Reporting : 12.07.2011

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
35256	1656	36912	49.56	32768	0	32768	50.13	818.5	14.60

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

II. A. State's Load Energy 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	48.91	19.37		68.28	116.29	116.83	0.53	185.10	1.80
Haryana	53.37	1.02		54.39	63.89	68.35	4.46	122.75	0.95
Rajasthan	64.37	0.00	4.89	69.25	28.13	44.23	16.10	113.48	1.80
Delhi	21.74			21.74	76.52	69.78	-6.74	91.52	0.02
UP	68.47	12.55	1.20	82.22	135.76	137.82	2.06	220.04	9.00
Uttarakhand		21.67		21.67	7.92	8.46	0.55	30.13	0.15
HP		22.91		22.91	-1.17	-0.94	0.24	21.98	0.00
J & K		15.37	0.00	15.37	15.35	12.78	-2.57	28.16	0.00
Chandigarh				0.00	6.20	5.35	-0.85	5.35	0.88
Total	256.86	92.89	6.09	355.84	448.89	462.66	13.78	818.51	14.60

* Shortage furnished by the respective constituent.

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	
Punjab	7805	600	88	1960	7824	0	-133	2674	58.62
Haryana	5612	17	1	1218	4636	0	138	716	21.12
Rajasthan	4820	439	989	-773	4462	0	168	-578	-16.43
Delhi	4128	0	-360	525	3213	0	-295	383	9.70
UP	9154	600	432	1723	9659	0	846	1723	41.33
Uttarakhand	1379	0	108	-100	1106	0	-167	-100	-2.40
HP	828	0	-103	-1634	781	0	-100	-1644	-39.23
J&K	1287	0	-35	-540	910	0	-331	-490	-12.45
Chandigarh	243	0	-21	26	177	0	-59	54	1.28
Total	35256	1656	1099	2406	32768	0	67	2738	61.55

* 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	1705	1835	1848	41.32	1722	40.92	0.40
	Rihand I STPS	1000	915	1045	1045	23.92	997	21.95	1.97
	Rihand II STPS	1000	970	1042	1024	24.80	1033	23.16	1.64
	Dadri I STPS	840	800	870	579	17.25	719	16.86	0.40
	Dadri II STPS	980	845	997	342	18.87	786	18.34	0.53
	Unchahar I TPS	440	403	439	436	9.52	397	9.49	0.03
	Unchahar II TPS	440	579	431	414	9.22	384	9.00	0.23
	Unchahar III TPS	210	189	216	210	4.47	186	4.37	0.09
	ISTPP (Jhajjar)	500	435	418	376	8.63	360	9.78	-1.15
	Dadri GPS	830	498	372	383	8.28	345	9.07	-0.79
	Anta GPS	419	392	389	312	8.54	356	7.92	0.61
	Auraiya GPS	663	551	416	468	10.40	433	9.71	0.69
	Sub Total (A)	9322	8283	8470	7437	185.23	7718	180.57	4.65
	B. NPC	NAPS	440	185	215	224	4.47	186	4.44
RAPS- B		440	386	431	436	9.29	387	9.26	0.02
RAPS- C		440	79	117	0	1.76	73	1.90	-0.14
Sub Total (B)		1320	650	763	660	15.52	647	15.60	-0.09
C. NHPC	Chamera I HPS	540	535	540	540	12.85	535	12.74	0.11
	Chamera II HPS	300	297	301	301	7.19	300	7.20	0.00
	Bairasuil HPS	180	179	179	110	1.93	80	2.01	-0.08
	Salal-HPS	690	625	626	626	14.98	624	14.98	0.00
	Tanakpur-HPS	94	87	64	94	2.03	85	2.04	-0.01
	Uri-HPS	480	469	480	479	11.29	470	11.36	-0.07
	Dhauliganga-HPS	280	277	283	278	6.64	277	6.62	0.03
	Dulhasti-HPS	390	387	410	407	9.18	383	9.19	-0.01
	Sewa-II HPS	120	79	87	36	0.64	27	0.60	0.05
	Sub Total (C)	3074	2934	2970	2871	66.73	2780	66.73	0.00
D.NJPC	Nathpa Jhakri	1500	1593	1614	1617	38.44	1602	38.22	0.22
	Sub Total (D)	1500	1593	1614	1617	38.44	1602	38.22	0.22
E. THDC	Tehri HPS	1000	710	714	599	16.65	694	16.50	0.15
	Koteshwar HPS	100	90	82	93	2.10	88	2.00	0.10
	Sub Total (E)	1100	800	796	692	18.75	781	18.50	0.25
F. BBMB	Bhakra HPS	1480	1013	1076	968	25.10	1046	24.31	0.79
	Dehar HPS	990	609	660	620	15.10	629	14.61	0.49
	Pong HPS	396	294	366	246	7.30	304	7.07	0.23
	Sub Total (F)	2866	1916	2102	1834	47.50	1979	45.98	1.52
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	199	137	3.75	156	3.35	0.40
	KWHEP HPS(IPP)	500	0	600	600	13.78	574	14.25	-0.47
	Sub Total (G)	692	0	799	737	17.53	730	17.60	-0.07
H. Total Cental (A-G)	19875	16176	17514	15848	389.69	16237	383.21	6.48	

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	1050.00	935.00	22.50	938
	Guru Nanak Dev TPS(Bhatinda)	440	288.00	288.00	6.06	252
	Guru Hargobind Singh TPS(L.mbt)	920	943.00	922.00	20.35	848
	Thermal (Total)	2620	2281.00	2145.00	48.91	2038
	Total Hydro	1148	969.00	752.00	19.37	807
	Total Punjab	3768	3250	2897	68.28	2845
Haryana	Panipat TPS	1360	1125.00	989.00	24.74	1031
	DCRTPP (Yamuna nagar)	600	442.00	434.00	10.86	452
	Faridabad GPS (NTPC)	432	392.00	325.00	8.98	374
	RGTPP (khedar) (IPP)	1200	515.00	255.00	8.80	367
	Magnum Diesel (IPP)	25	0.00	0.00	0.00	0
	Thermal (Total)	3617	2474.00	2003.00	53.37	2224
	Total Hydro	62	40.00	38.00	1.02	42
	Total Haryana	3679	2514	2041	54.39	2266
Rajasthan	kota TPS	1240	736.00	663.00	15.77	657
	suratgarh TPS	1500	1125.00	1313.00	30.64	1276
	Chabra TPS	500	220.00	207.00	4.84	202
	Dholpur GPS	330	277.00	240.00	6.74	281
	Ramgarh GPS	113	55.00	54.00	1.21	50
	RAPS A (NPC)	300	170.00	214.00	4.25	177
	Barsingsar (NLC)	250	0.00	0.00	0.00	0
	Giral LTPS (IPP)	250	48.00	57.00	0.92	38
	Rajwest LTPS (IPP)	135	0.00	0.00	0.00	0
	VSLP LTPS (IPP)	135	0.00	0.00	0.00	0
	Thermal (Total)	4753	2631.00	2748.00	64.37	2682
	Total Hydro	550	0.00	0.00	0.00	0
	Wind power	1294	133.00	170.00	4.40	183
	Biomass	71	21.00	21.00	0.49	20
	Renewable/Others (Total)	1365	154	191	4.89	204
	Total Rajasthan	6668	2785	2939	69.25	2886
	UP	Anpara TPS	1630	1299	1145	28.77
Obra TPS		1442	371	348	8.70	363
Paricha TPS		640	245	239	7.81	325
Panki TPS		210	165	150	3.40	142
Harduaganj TPS		375	0	0	0.00	0
Tanda TPS (NTPC)		440	270	289	6.96	290
Roza TPS (IPP)		600	450	554	12.82	534
Thermal (Total)		5337	2800	2725	68.47	2853
Vishnuparyag HPS (IPP)		400	436	436	10.46	436
Other Hydro		527	88	0	2.09	87
Cogeneration		951	50	50	1.20	50
Total UP		7215	3374	3211	82.22	2990
Uttarakhand		Total Hydro	1303	907	900	21.67
	Total Uttarakhand	1303	907	900	21.67	903
Delhi	Rajghat TPS	135	0	0	0.00	0
	Delhi Gas Turbine	282	143	152	3.66	152
	Pragati Gas Turbine	330	290	362	7.33	305
	Rithala GPS	108	44	29	1.04	43
	Bawana GPS	440	0	0	0.00	0
	Badarpur TPS (NTPC)	705	505	395	9.72	405
	Thermal (Total)	2000	982	938	21.74	906
	Total Delhi	2000	982	938	21.74	906
HP	Baspa HPS (IPP)	300	533	507	12.48	520
	Malana HPS (IPP)	86	105	106	2.51	104
	Other Hydro	584	330	330	7.93	330
	Total HP	970	968	943	22.91	955
J & K	Baglihar HPS (IPP)	450	442	442	10.60	442
	Other Hydro	323	171	49	4.78	199
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	956	613	491	15.37	641
Total State Generation		26559	15393	14360	355.84	14391
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			3962	3392	90.41	3767
Total Regional Availability(Gross)		46434	36869	33600	835.95	34396

IV. Total Hydro Generation:

Central +BBMB Hydro	8541	7482	7014	171.42	7143
State Hydro	4497	3603	3321	83.94	3497
Regional Hydro	13037	11085	10335	255.36	10640

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	500	400	500	0	11.06	0.00	11.06
Gwalior-Agra (D/C)	1152	1071	1480	0	27.87	0.00	27.87
Zerda-Kankroli	0	0	0	0	0.00	0.00	0.00
Zerda-Bhinmal	425	271	502	0	7.46	0.00	7.46
Malanpur-Auraiya	25	2	12	27	0.52	0.00	0.52
Badod-Kota/Morak	132	113	201	0	3.07	0.00	3.07
Sub Total WR	2102	1744			46.91	0.00	46.91
Pusauli Bypass	-84	-141	222	186	0.34	2.74	-2.41
MZP- GKP (D/C)	934	926	1178	0	22.68	0.00	22.68
Patna-Balia(D/C)	399	330	486	0	8.65	0.00	8.65
B'Sharif-Balia (D/C)	456	362	652	0	10.44	0.00	10.44
Pusauli-Sahupuri	155	171	179	0	4.14	0.00	4.14
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	0	0	0	0	0.00	0.00	0.00
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	1860	1648			46.25	2.74	43.51
Total IR Exch	3962	3392			93.15	2.74	90.41

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
22.34	3.75	26.10	25.56	40.35	-11.20	0.58	0.00	0.00

Total IR Schedule (MU)			Total IR Actual (MU)			Net IR UI (MU)		
Through ER	Through WR	Total	Through ER	Through WR	Total	Through ER	Through WR	Total
40.45	40.72	81.17	43.51	46.91	90.41	3.06	6.18	9.24

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

<48.80	<49.0	<49.20	<49.50	<49.7	49.5 - 50.2	49.7 - 50.2	> 50.00	> 50.2
0.00	0.00	3.00	5.70	16.70	93.00	81.30	23.00	1.30

<----- Frequency (Hz) ----->				Average Frequency Hz	Frequency Variation Index	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum					MAX (Hz)	MIN (Hz)
Freq	Time	Freq	Time					
50.28	8.00	49.18	10.36	49.86	56.00	0.19	50.23	49.41

VII. Voltage profile

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	405	03:47	394	22:19	0.0	0.0	0.0	0.0
Gorakhpur	400	426	16:18	399	13:53	1.0	1.0	30.9	2.6
Bareilly	400	415	16:07	380	23:11	0.0	4.4	0.0	0.0
Kanpur	400	412	04:14	386	23:06	0.0	3.5	0.0	0.0
Dadri	400	407	04:01	387	23:06	0.0	2.4	0.0	0.0
Ballabgarh	400	414	03:46	386	23:07	0.0	2.1	0.0	0.0
Bawana	400	409	03:41	384	23:07	0.0	7.5	0.0	0.0
Bassi	400	428	04:12	394	23:13	0.0	0.0	19.9	0.0
Hissar	400	408	04:13	385	23:06	0.0	9.9	0.0	0.0
Moga	400	409	04:13	387	21:10	0.0	0.8	0.0	0.0
Abdullapur	400	412	03:47	282	10:26	0.1	0.1	0.0	0.0
Nalagarh	400	414	04:13	392	23:13	0.0	0.0	0.0	0.0
Kishenpur	400	408	03:56	390	21:06	0.0	0.0	0.0	0.0
Wagoora	400	409	04:19	384	21:07	0.0	5.4	0.0	0.0

VIII. 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 (m³/s)	Usage (m³/s)
Bhakra	513.59	445.62	489.65	719.44	473.44	324.44	1087.00	849.50
Pong	426.72	384.05	412.43	577.87	394.06	111.75	477.62	457.20
Tehri	829.79	740.04	766.85	180.91	NA	NA	559.07	496.00
Koteswar	612.50	598.50	NA	NA	NA	NA	NA	NA
Chamera-I	760.00	748.75	756.55	12.96	754.58	NA	355.78	346.99
Rihand	268.22	252.98	256.67	NA	253.81	NA	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	NA	NA	NA	NA	NA	NA

IX. System Constraints:

X. Grid Disturbance / Any Other Significant Event:

XI. Weather Conditions For 11.07.2011 :

1 : Partil rains and cloudy weather in NR.

XII. Synchronisation of new generating units :

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

XIV. Tripping of lines in pooling stations :

XV. Complete generation loss in a generating station :

Report for : 11.07.2011

पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER