

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 09.12.2011
Date of Reporting : 10.12.2011

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
29339	3542	32881	49.86	23388	650	24038	50.15	634.8	47.98

* 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	48.11	10.80		58.91	25.82	23.11	-2.71	82.03	7.72
Haryana	55.92	0.68		56.60	27.58	33.20	5.62	89.80	12.25
Rajasthan	80.86	4.88	7.61	93.35	52.34	57.06	4.72	150.40	1.59
Delhi	24.56			24.56	32.20	33.17	0.97	57.73	0.37
UP	89.96	4.76	14.40	109.12	80.02	68.21	-11.81	177.33	23.59
Uttarakhand		8.47		8.47	15.15	16.71	1.56	25.18	0.56
HP		5.46		5.46	17.05	16.54	-0.52	21.99	0.00
J & K		5.56	0.00	5.56	24.12	21.41	-2.71	26.96	1.90
Chandigarh				0.00	3.38	3.34	-0.04	3.34	0.00
Total	299.40	40.60	22.01	362.02	277.66	272.74	-4.92	634.76	47.98

* 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 (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	
Punjab	3969	600	-345	-403	2486	0	-146	-753	-10.25
Haryana	3989	1124	105	-58	3608	0	271	-70	-1.55
Rajasthan	6588	369	366	431	6364	0	39	546	14.72
Delhi	3072	23	149	-122	1427	0	-33	-598	-6.27
UP	7634	1245	-1165	267	7163	650	-203	267	6.41
Uttarakhand	1349	80	30	332	896	0	95	332	7.97
HP	1205	0	-157	78	671	0	19	237	4.39
J&K	1355	100	-293	223	702	0	-322	254	5.77
Chandigarh	179	0	-25	0	72	0	-20	-30	-0.24
Total	29339	3542	-1335	748	23388	650	-299	185	20.95

* 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	1927	2079	2055	46.66	1944	46.25	0.41
	Rihand I STPS	1000	817	995	876	19.80	825	19.60	0.21
	Rihand II STPS	1000	977	1041	1036	23.62	984	23.45	0.17
	Dadri I STPS	840	585	632	510	13.92	580	13.80	0.12
	Dadri II STPS	980	450	479	483	10.99	458	10.80	0.19
	Unchahar I TPS	440	374	427	369	8.67	361	8.92	-0.25
	Unchahar II TPS	440	374	436	365	8.89	370	8.87	0.02
	Unchahar III TPS	210	187	227	189	4.48	187	4.46	0.02
	ISTPP (Jhajjar)	1000	474	478	452	10.54	439	11.26	-0.71
	Dadri GPS	830	805	687	542	16.32	680	16.27	0.05
	Anta GPS	419	272	226	232	5.87	244	5.64	0.22
	Auraiya GPS	663	639	559	494	13.18	549	12.70	0.48
	Sub Total (A)	9822	7882	8266	7603	182.94	7623	182.01	0.93
	B. NPC	NAPS	440	200	232	245	4.79	200	4.80
RAPS- B		440	412	462	460	10.02	417	9.89	0.13
RAPS- C		440	420	470	474	10.13	422	10.08	0.05
Sub Total (B)		1320	1032	1164	1179	24.94	1039	24.77	0.17
C. NHPC	Chamera I HPS	540	0	0	0	0.00	0	0.00	0.00
	Chamera II HPS	300	297	215	0	1.38	58	1.42	-0.03
	Bairasuil HPS	180	120	80	0	0.58	24	0.58	0.00
	Salal-HPS	690	192	230	136	4.22	176	4.22	0.00
	Tanakpur-HPS	94	36	37	30	0.87	36	0.86	0.01
	Uri-HPS	480	115	214	19	2.94	123	2.96	-0.01
	Dhauliganga-HPS	280	277	198	0	1.23	51	1.38	-0.15
	Dulhasti-HPS	390	388	323	0	2.92	122	3.38	-0.46
	Sewa-II HPS	120	0	0	0	0.00	0	0.00	0.00
	Sub Total (C)	3074	1424	1297	185	14.15	590	14.79	-0.64
D. NJPC	Nathpa Jhakri	1500	1267	1418	0	8.67	361	8.59	0.08
	Sub Total (D)	1500	1267	1418	0	8.67	361	8.59	0.08
E. THDC	Tehri HPS	1000	823	1003	0	6.85	286	7.00	-0.15
	Koteshwar HPS	200	115	200	0	2.71	113	2.15	0.56
Sub Total (E)	1200	938	1203	0	9.56	398	9.15	0.41	
F. BBMB	Bhakra HPS	1480	650	947	524	15.83	660	15.60	0.23
	Dehar HPS	990	149	495	0	3.66	153	3.58	0.08
	Pong HPS	396	272	366	186	6.78	283	6.53	0.25
	Sub Total (F)	2866	1071	1808	710	26.27	1095	25.71	0.56
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	0	0	0.39	16	0.30	0.09
	KWHEP HPS(IPP)	1000	0	300	0	4.82	201	4.80	0.02
	Malana Stg-II HPS	100	0	0	0	0.00	0	0.00	0.00
	Shree Cement TPS	150	0	0	0	0.00	0	0.00	0.00
	Sub Total (G)	1442	0	300	0	5.21	217	5.10	0.11
H. Total Regional Entities (A-G)	21225	13614	15456	9677	271.74	11322	270.13	1.60	

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	808	22.86	952	
	Guru Nanak Dev TPS(Bhatinda)	440	215	215	4.65	194	
	Guru Hargobind Singh TPS(L.mbt)	920	954	840	20.61	859	
	Thermal (Total)	2620	2219	1863	48.11	2005	
	Total Hydro	1148	394	294	10.80	450	
	Total Punjab	3768	2613	2157	58.91	2455	
Haryana	Panipat TPS	1360	1081	1106	25.78	1074	
	DCRTPP (Yamuna nagar)	600	270	272	6.62	276	
	Faridabad GPS (NTPC)	432	454	445	10.02	418	
	RGTPP (kheldar) (IPP)	1200	528	516	13.50	562	
	Magnum Diesel (IPP)	25	0	0	0.00	0	
	Thermal (Total)	3617	2333	2339	55.92	2330	
	Total Hydro	62	25	29	0.68	28	
	Total Haryana	3679	2358	2368	56.60	2358	
	Rajasthan	kota TPS	1240	1180	1161	23.71	988
suratgarh TPS		1500	1160	1152	27.57	1149	
Chabra TPS		500	413	207	7.37	307	
Dholpur GPS		330	182	215	4.70	196	
Ramgarh GPS		113	65	65	1.68	70	
RAPS A (NPC)		300	173	177	4.40	183	
Barsingsar (NLC)		250	60	28	0.92	39	
Giral LTPS (IPP)		250	110	107	2.41	100	
Rajwest LTPS (IPP)		540	355	352	8.09	337	
VSLP LTPS (IPP)		135	0	0	0.00	0	
Thermal (Total)		5158	3698	3464	80.86	3369	
Total Hydro		550	227	136	4.88	203	
Wind power		1294	88	116	1.80	75	
Biomass		71	39	39	0.94	39	
Solar		50	0	0	0.00	0	
Renewable/Others (Total)		1365	127	155	7.61	317	
Total Rajasthan		7073	4052	3755	93.35	3889	
UP		Anpara TPS	1630	1422	1087	31.90	1329
		Obra TPS	1442	445	534	11.40	475
	Paricha TPS	640	329	341	7.90	329	
	Panki TPS	210	149	158	3.70	154	
	Harduaganj TPS	415	38	40	0.90	38	
	Tanda TPS (NTPC)	440	404	398	9.82	409	
	Roza TPS (IPP)	600	495	446	11.70	488	
	Anpara-C (IPP)	1200	549	405	10.01	417	
	Bajaj Energy Pvt.Ltd(IPP) TPS	180	118	116	2.63	110	
	Thermal (Total)	6757	3949	3525	89.96	3748	
	Vishnuparyag HPS (IPP)	400	109	114	2.62	109	
	Other Hydro	527	104	21	2.14	89	
	Cogeneration	951	600	600	14.40	600	
	Total UP	8635	4762	4260	109.12	4438	
	Uttarakhand	Total Hydro	1303	489	268	8.47	353
Total Uttarakhand		1303	489	268	8.47	353	
Delhi	Rajghat TPS	135	97	96	2.27	95	
	Delhi Gas Turbine	282	239	156	4.84	202	
	Pragati Gas Turbine	330	299	297	6.81	284	
	Rithala GPS	108	0	0	0.00	0	
	Bawana GPS	440	0	0	0.00	0	
	Badarpur TPS (NTPC)	705	495	435	10.64	443	
	Thermal (Total)	2000	1130	984	24.56	1023	
	Total Delhi	2000	1130	984	24.56	1023	
HP	Baspa HPS (IPP)	330	28	28	1.33	55	
	Malana HPS (IPP)	101	30	0	0.28	12	
	Other Hydro	571	217	112	3.85	160	
	Total HP	1002	275	140	5	227	
J & K	Baglihar HPS (IPP)	450	238	124	4.13	172	
	Other Hydro	323	54	100	1.43	60	
	Gas/Diesel/Others	183	0	0	0.00	0	
	Total J & K	956	292	224	5.56	231	
Total State Control Area Generation		28416	15971	14156	362.02	14975	
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			141	942	30.83	1284	
Total Regional Availability(Gross)		49641	31568	24775	664.58	27582	

IV. Total Hydro Generation:

Regional Entities Hydro	10083	6026	895	63.86	2661
State Control Area Hydro	5365	1806	1112	37.98	1582
Total Regional Hydro	15447	7832	2007	101.84	4243

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	-300	-200	0	500	0.00	7.74	-7.74
Gwalior-Agra (D/C)	186	379	841	0	12.10	0.00	12.10
Zerda-Kankroli	-225	-150	101	225	0.00	2.72	-2.72
Zerda-Bhinmal	-134	-36	257	193	0.00	0.16	-0.16
Malanpur-Auraiya	-235	-201	0	265	0.00	4.04	-4.04
Badod-Kota/Morak	-110	-108	0	132	0.00	1.92	-1.92
Sub Total WR	-818	-316			12.10	16.58	-4.48
Pusauli Bypass	300	300	300	0	7.24	0.00	7.24
MZP- GKP (D/C)	203	307	597	0	9.38	0.00	9.38
Patna-Balia(D/C)	107	132	297	0	3.34	0.00	3.34
B'Sharif-Balia (D/C)	81	266	499	0	6.54	0.00	6.54
Barh - balia(D/C)	197	203	413	0	6.48	0.00	6.48
Pusauli-Sahupuri	103	86	180	0	2.78	0.00	2.78
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-32	-36	0	48	0.00	0.46	-0.46
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	959	1258			35.76	0.46	35.30
Total IR Exch	141	942			47.86	17.03	30.83

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
17.34	0.57	17.91	14.99	7.92	-3.56	-3.16	2.90	-2.90

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
32.24	-3.76	28.48	35.30	-4.48	30.83	3.06	-0.71	2.34

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	0.10	5.70	30.80	93.30	68.20	20.10	1.00

<----- 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					
50.26	8.07	49.19	22.08	49.81	0.76	0.20	50.21	49.63

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	407	03:04	398	10:49	0.0	0.0	0.0	0.0
Gorakhpur	400	429	00:51	410	06:48	0.0	0.0	29.1	0.0
Bareilly	400	426	04:02	396	11:37	0.0	0.0	8.1	0.0
Kanpur	400	420	04:01	396	09:40	0.0	0.0	0.0	0.0
Dadri	400	422	03:59	395	11:42	0.0	0.0	1.2	0.0
Ballabgarh	400	424	04:00	395	11:49	0.0	0.0	3.9	0.0
Bawana	400	425	04:02	398	11:43	0.0	0.0	7.1	0.0
Bassi	400	420	04:02	383	09:42	0.0	6.8	0.0	0.0
Hissar	400	415	04:01	390	12:13	0.0	0.0	0.0	0.0
Moga	400	426	04:02	400	09:36	0.0	0.0	6.7	0.0
Abdullapur	400	422	03:59	398	10:49	0.0	0.0	2.0	0.0
Nalagarh	400	429	03:59	405	10:53	0.0	0.0	25.7	0.0
Kishenpur	400	433	04:01	393	16:16	0.0	0.0	17.5	0.5
Wagoora	400	422	04:01	364	17:56	40.6	55.4	0.4	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	505.71	1339.30	507.66	1440.82	231.49	433.93
Pong	426.72	384.05	416.24	730.66	419.11	848.35	69.83	404.62
Tehri	829.79	740.04	814.46	740.06	818.65	982.26	70.82	144.00
Koteshwar	612.50	598.50	605.95	3.10	NA	NA	141.00	152.00
Chamera-I	760.00	748.75	750.10	NA	747.00	NA	45.94	NA
Rihand	268.22	252.98	264.20	558.40	257.62	184.40	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	515.90	NA	517.33	NA	16.00	178.34

* NA: Not Available

IX. System Constraints:

X. Grid Disturbance / Any Other Significant Event:

XI. Weather Conditions For 09.12.2011 :

Scattered rains in J&K and Punjab.

XII. Synchronisation of new generating units :

XIII. Synchronisation of new 220 / 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 : 09.12.2011

पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER