

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 13.12.2011
Date of Reporting : 14.12.2011

I. Regional Availability/Demand:

Demand Met	Evening Peak (19:00 Hrs) MW			Off Peak (03:00 Hrs) MW			Day Energy (Net MU)		
	Shortage	Requirement	Freq* (Hz)	Demand Met	Shortage	Requirement	Freq* (Hz)	Demand Met	Shortage
29377	3628	33005	49.83	24210	650	24860	50.13	651.1	51.93

* 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	48.88	10.98		59.87	26.43	24.18	-2.25	84.05	5.00
Haryana	51.59	0.64		52.24	27.45	35.27	7.82	87.50	13.35
Rajasthan	80.77	4.75	6.90	92.42	52.47	63.59	11.12	156.01	0.49
Delhi	23.86			23.86	38.42	33.07	-5.35	56.93	0.08
UP	89.11	5.65	14.40	109.16	78.80	69.48	-9.32	178.64	30.87
Uttarakhand		8.35		8.35	17.66	19.51	1.85	27.86	0.24
HP		5.17		5.17	17.25	18.45	1.19	23.61	0.00
J & K		5.45	0.00	5.45	24.30	27.60	3.29	33.04	1.90
Chandigarh				0.00	3.46	3.42	-0.04	3.42	0.00
Total	294.22	40.98	21.30	356.50	286.25	294.56	8.31	651.06	51.93

* 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	STOA/PX transaction	Day Energy MU
Punjab	3938	600	-133	-403	3070	0	2	-901	-11.18	
Haryana	3781	1153	206	-56	3293	0	-56	-70	-1.61	
Rajasthan	6790	138	683	431	6363	0	909	546	14.72	
Delhi	3017	2	-237	-122	1315	0	-108	-598	-6.27	
UP	7496	1635	-1043	167	6993	650	-472	167	4.01	
Uttarakhand	1481	0	122	332	916	0	-19	332	7.97	
HP	1235	0	-276	78	758	0	146	237	4.19	
J&K	1445	100	-231	216	1419	0	209	254	5.91	
Chandigarh	194	0	-1	0	84	0	-10	-30	-0.24	
Total	29377	3628	-911	643	24210	650	601	-63	17.50	

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

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	1730	1861	1857	41.96	1748	41.52	0.43
	Rihand I STPS	1000	817	1006	875	19.79	825	19.60	0.19
	Rihand II STPS	1000	977	1040	1038	23.67	986	23.45	0.22
	Dadri I STPS	840	592	649	454	13.30	554	13.23	0.06
	Dadri II STPS	980	900	924	712	20.46	852	20.37	0.09
	Unchahar I TPS	440	404	430	357	9.51	396	9.47	0.05
	Unchahar II TPS	440	402	441	387	9.53	397	9.46	0.07
	Unchahar III TPS	210	201	218	193	4.78	199	4.75	0.03
	ISTPP (Jhajjar)	1000	465	496	486	10.75	448	11.03	-0.27
	Dadri GPS	830	832	705	537	16.28	678	16.37	-0.09
	Anta GPS	419	276	230	233	5.77	240	5.56	0.20
	Auraiya GPS	663	552	454	382	10.45	435	10.54	-0.09
	Sub Total (A)	9822	8147	8454	7511	186.22	7759	185.34	0.89
B. NPC	NAPS	440	200	253	256	5.22	217	4.80	0.42
	RAPS- B	440	430	464	464	10.10	421	10.32	-0.22
	RAPS- C	440	420	472	476	10.20	425	10.08	0.12
	Sub Total (B)	1320	1050	1189	1196	25.52	1063	25.20	0.32
C. NHPC	Chamera I HPS	540	0	0	0	0.00	0	0.00	0.00
	Chamera II HPS	300	297	220	0	1.35	56	1.38	-0.03
	Bairasuil HPS	180	120	20	0	0.48	20	0.47	0.01
	Salal-HPS	690	135	230	145	3.01	126	3.29	-0.28
	Tanakpur-HPS	94	32	33	24	0.78	32	0.79	-0.02
	Uri-HPS	480	137	217	106	3.47	145	3.42	0.05
	Dhauliganga-HPS	280	277	139	0	1.22	51	1.27	-0.05
	Dulhasti-HPS	390	388	220	0	3.39	141	3.75	-0.36
	Sewa-II HPS	120	0	0	0	0.00	0	0.00	0.00
	Sub Total (C)	3074	1386	1079	275	13.70	571	14.37	-0.67
D. NJPC	Nathpa Jhakri	1500	1133	806	0	8.61	359	8.17	0.44
	Sub Total (D)	1500	1133	806	0	8.61	359	8.17	0.44
E. THDC	Tehri HPS	1000	1040	637	0	6.02	251	6.00	0.02
	Koteshwar HPS	200	119	203	0	2.20	92	2.10	0.10
	Sub Total (E)	1200	1159	840	0	8.22	343	8.10	0.12
F. BBMB	Bhakra HPS	1480	627	945	499	16.03	668	15.05	0.98
	Dehar HPS	990	158	495	0	4.05	169	3.79	0.26
	Pong HPS	396	254	366	186	6.43	268	6.11	0.32
	Sub Total (F)	2866	1039	1806	685	26.51	1105	24.94	1.57
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	0	0	0.35	14	0.31	0.04
	KWHEP HPS(IPP)	1000	0	450	0	4.65	194	4.44	0.20
	Malana Stg-II HPS	100	0	0	0	0.00	0	0.00	0.00
	Shree Cement TPS	150	0	140	25	2.10	88	2.78	-0.68
	Sub Total (G)	1442	0	590	25	7.09	295	7.53	-0.44
H. Total Regional Entities (A-G)		21225	13914	14764	9692	275.87	11495	273.65	2.22

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	900	23.23	968	
	Guru Nanak Dev TPS(Bhatinda)	440	215	215	4.62	192	
	Guru Hargobind Singh TPS(L.mbt)	920	955	946	21.04	877	
	Thermal (Total)	2620	2220	2061	48.88	2037	
	Total Hydro	1148	271	384	10.98	458	
	Total Punjab	3768	2491	2445	59.87	2494	
Haryana	Panipat TPS	1360	867	1038	21.64	902	
	DCRTPP (Yamuna nagar)	600	276	274	6.58	274	
	Faridabad GPS (NTPC)	432	428	481	10.35	431	
	RGTPP (khedar) (IPP)	1200	521	496	13.03	543	
	Magnum Diesel (IPP)	25	0	0	0.00	0	
	Thermal (Total)	3617	2092	2289	51.59	2150	
	Total Hydro	62	8	26	0.64	27	
		Total Haryana	3679	2100	2315	52.24	2176
Rajasthan	kota TPS	1240	1150	1166	27.52	1147	
	suratgarh TPS	1500	1167	1159	27.39	1141	
	Chabra TPS	500	317	331	7.46	311	
	Dholpur GPS	330	255	253	6.11	255	
	Ramgarh GPS	113	65	65	1.69	70	
	RAPS A (NPC)	300	176	177	4.39	183	
	Barsingar (NLC)	250	0	0	0.00	0	
	Giral LTPS (IPP)	250	52	0	0.59	25	
	Rajwest LTPS (IPP)	540	210	235	5.62	234	
	VSLP LTPS (IPP)	135	0	0	0.00	0	
	Thermal (Total)	5158	3392	3386	80.77	3365	
	Total Hydro	550	229	123	4.75	198	
	Wind power	1294	124	0	1.55	65	
	Biomass	71	25	25	0.60	25	
	Solar	50	0	0	0.00	0	
	Renewable/Others (Total)	1365	149	25	6.90	288	
		Total Rajasthan	7073	3770	3534	92.42	3851
	UP	Anpara TPS	1630	1584	1592	33.70	1404
Obra TPS		1442	512	474	10.60	442	
Paricha TPS		640	377	380	8.00	333	
Panki TPS		210	45	45	1.10	46	
Harduaganj TPS		415	0	0	0.00	0	
Tanda TPS (NTPC)		440	402	325	10.75	448	
Roza TPS (IPP)		600	400	394	9.75	406	
Anpara-C (IPP)		1200	493	541	12.38	516	
Bajaj Energy Pvt.Ltd(IPP) TPS		180	119	75	2.84	118	
Thermal (Total)		6757	3932	3826	89.11	3713	
Vishnuparyag HPS (IPP)		400	109	108	2.54	106	
Other Hydro		527	170	31	3.11	130	
Cogeneration		951	600	600	14.40	600	
		Total UP	8635	4811	4565	109.16	4443
Uttarakhand		Total Hydro	1303	472	261	8.35	348
	Total Uttarakhand	1303	472	261	8.35	348	
Delhi	Rajghat TPS	135	49	46	1.30	54	
	Delhi Gas Turbine	282	199	154	4.54	189	
	Praagati Gas Turbine	330	312	298	7.65	319	
	Rithala GPS	108	0	0	0.00	0	
	Bawana GPS	440	0	0	0.00	0	
	Badarpur TPS (NTPC)	705	480	415	10.37	432	
	Thermal (Total)	2000	1040	913	23.86	994	
	Total Delhi	2000	1040	913	23.86	994	
HP	Baspa HPS (IPP)	330	0	0	1.35	56	
	Malana HPS (IPP)	101	40	0	0.28	12	
	Other Hydro	571	190	88	3.54	147	
	Total HP	1002	230	88	5	215	
J & K	Baglihar HPS (IPP)	450	258	148	3.91	163	
	Other Hydro	323	54	100	1.54	64	
	Gas/Diesel/Others	183	0	0	0.00	0	
		Total J & K	956	312	248	5.45	227
Total State Control Area Generation		28416	15226	14369	356.50	14748	
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			1556	1184	37.54	1564	
Total Regional Availability(Gross)		49641	31546	25245	669.91	27807	

IV. Total Hydro Generation:

Regional Entities Hydro	10083	5121	985	64.13	2672
State Control Area Hydro	5365	1692	1161	38.45	1602
Total Regional Hydro	15447	6813	2146	102.57	4274

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	-200	-200	0	200	0.00	4.92	-4.92
Gwalior-Agra (D/C)	454	381	916	0	14.06	0.00	14.06
Zerda-Kankroli	-39	-87	115	178	0.00	0.36	-0.36
Zerda-Bhinmal	40	56	295	50	2.77	0.00	2.77
Malanpur-Auraiya	-137	-145	0	191	0.00	2.56	-2.56
Badod-Kota/Morak	-10	-63	0	126	0.00	6.83	-6.83
Sub Total WR	108	-58			16.83	14.67	2.16
Pusauli Bypass	300	300	300	0	7.28	0.00	7.28
MZP- GKP (D/C)	415	371	732	0	10.21	0.00	10.21
Patna-Balia(D/C)	194	346	469	0	7.06	0.00	7.06
B'Sharif-Balia (D/C)	228	216	353	0	5.30	0.00	5.30
Barh - balia(D/C)	233	0	400	0	4.39	0.00	4.39
Pusauli-Sahupuri	110	45	131	0	2.10	0.00	2.10
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-32	-36	0	48	0.00	0.95	-0.95
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	1448	1242			36.34	0.95	35.39
Total IR Exch	1556	1184			53.16	15.62	37.54

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
17.25	0.60	17.86	14.89	4.58	-3.71	4.42	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
31.94	0.86	32.79	35.39	2.16	37.54	3.45	1.30	4.75

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	0.00	5.60	36.60	94.10	63.10	10.40	0.30

←----- 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				
50.28	7.04	49.34	17.39	49.77	0.82	0.17	50.16	0.00

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	408	03:14	401	09:47	0.0	0.0	0.0	0.0
Gorakhpur	400	431	20:48	12	19:41	0.3	0.3	40.9	0.1
Bareilly	400	425	03:16	401	06:31	0.0	0.0	15.0	0.0
Kanpur	400	418	03:19	399	06:31	0.0	0.0	0.0	0.0
Dadri	400	419	02:18	400	11:12	0.0	0.0	0.0	0.0
Ballabgarh	400	422	03:16	401	11:51	0.0	0.0	4.1	0.0
Bawana	400	422	02:29	402	11:52	0.0	0.0	7.5	0.0
Bassi	400	426	04:01	393	06:31	0.0	0.0	5.0	0.0
Hissar	400	413	20:55	394	06:32	0.0	0.0	0.0	0.0
Moga	400	419	20:52	401	10:01	0.0	0.0	0.0	0.0
Abdullapur	400	422	02:27	403	06:31	0.0	0.0	2.1	0.0
Nalagarh	400	426	02:23	407	06:33	0.0	0.0	22.2	0.0
Kishenpur	400	409	00:30	386	16:25	0.0	1.6	0.0	0.0
Wagoora	400	385	02:28	357	16:26	78.0	100.0	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	505.17	1312.37	506.86	1396.66	209.94	443.34
Pong	426.72	384.05	415.69	705.67	418.60	821.34	51.17	418.72
Tehri	829.79	740.04	813.45	872.26	818.65	982.26	70.82	187.00
Koteswar	612.50	598.50	606.85	3.10	NA	NA	155.00	152.00
Chamera-I	760.00	748.75	747.99	NA	747.07	NA	48.55	NA
Rihand	268.22	252.98	264.05	548.10	257.59	183.00	NA	NA
RPS	352.80	343.81	114.99	NA	NA	NA	NA	223.70
Jawahar Sagar	298.70	295.78	97.67	NA	NA	NA	NA	233.90
RSD	527.91	487.91	515.12	NA	515.34	NA	149.94	178.34

* NA: Not Available

IX. System Constraints:

X. Grid Disturbance / Any Other Significant Event:

XI. Weather Conditions For 13.12.2011 :

1. Fog in Central & Eastern U.P.

XII. Synchronisation of new generating units :

XIII. Synchronisation of new 220 / 400 / 765 KV lines and energising of bus //substation :

1: 220kV Fatehpur (UP) - Navbasta (Kanpur) & Fatehpur (UP)- Kanpur (south) lines LILO at Fatehpur (PG) and again charged from Fatehpur (PG) bus between 23.08 to 23.58 hrs of dt. 13.12.2011.

XIV. Tripping of lines in pooling stations :

XV. Complete generation loss in a generating station :

Report for : 13.12.2011

पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER