

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 09.02.2013
Date of Reporting : 10.02.2013

I. Regional Availability/Demand:

Demand Met	Evening Peak (19:00 Hrs) MW			Demand Met	Off Peak (03:00 Hrs) MW			Day Energy (Net MU)	
	Shortage	Requirement	Freq* (Hz)		Shortage	Requirement	Freq* (Hz)	Demand Met	Shortage
31661	2857	34518	50.06	25701	665	26366	50.26	707.9	56.80

* 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	34.49	10.14		44.63	41.49	42.08	0.59	86.71	2.67
Haryana	38.53	0.34		38.87	50.19	51.29	1.09	90.15	0.54
Rajasthan	86.73	3.77	4.07	94.56	71.26	72.81	1.56	167.38	0.47
Delhi	26.80			26.80	34.67	31.38	-3.29	58.18	0.83
UP	107.89	6.34	19.20	133.43	71.02	74.89	3.87	208.31	50.59
Uttarakhand		11.22		11.22	22.18	21.23	-0.95	32.44	0.00
HP		6.21		6.21	18.40	17.41	-1.00	23.61	0.00
J & K		7.20	0.00	7.20	33.22	30.28	-2.95	37.48	1.70
Chandigarh				0.00	3.68	3.61	-0.07	3.61	0.00
Total	294.44	45.21	23.27	362.92	346.10	344.97	-1.14	707.88	56.80

* 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	4416	600	-100	-328	2811	0	150	177	0.99
Haryana	4450	184	99	46	2898	0	150	-748	-8.26
Rajasthan	6605	0	-133	816	6387	0	-37	834	28.26
Delhi	2999	0	-90	-899	1470	0	-60	-1513	-27.74
UP	8662	1973	-195	-5	8612	665	135	-70	-2.63
Uttarakhand	1562	0	7	562	1154	0	-141	506	11.94
HP	1067	0	-70	229	768	0	-6	381	8.36
J&K	1707	100	-211	327	1508	0	-142	404	8.37
Chandigarh	193	0	-9	-10	94	0	-9	-30	-0.32
Total	31661	2857	-701	738	25701	665	39	-59	18.98

* 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	
										UI (OG:(+ve), UG:(-ve))
A. NTPC	Singrauli STPS	2000	1331	1571	1348	31.88	1328	31.95	-0.07	
	Rihand I STPS	1000	920	1002	960	21.38	891	21.82	-0.44	
	Rihand II STPS	1000	975	1045	912	22.89	954	22.97	-0.08	
	Rihand III STPS	500	475	497	441	10.91	455	11.14	-0.23	
	Dadri I STPS	840	810	552	637	15.27	636	16.01	-0.74	
	Dadri II STPS	980	975	1012	732	20.11	838	21.60	-1.50	
	Unchahar I TPS	420	407	428	322	8.95	373	9.00	-0.06	
	Unchahar II TPS	420	405	433	323	8.49	354	8.43	0.06	
	Unchahar III TPS	210	202	210	152	4.23	176	4.28	-0.05	
	ISTPP (Jhajjar)	1500	980	359	359	8.90	371	8.76	0.14	
	Dadri GPS	830	836	370	354	8.68	362	8.73	-0.06	
	Anta GPS	419	424	202	209	5.02	209	5.07	-0.05	
	Auraiva GPS	663	664	323	292	7.32	305	7.16	0.17	
	Sub Total (A)	10782	9403	8004	7041	174.01	7250	176.92	-2.91	
	B. NPC	NAPS	440	300	340	344	7.32	305	7.20	0.12
		RAPS- B	440	426	469	469	10.26	427	10.22	-0.03
RAPS- C		440	430	474	477	10.26	428	10.32	-0.06	
Sub Total (B)		1320	1156	1283	1290	27.84	1160	27.74	0.10	
C. NHPC	Chamera I HPS	540	550	360	0	2.35	98	2.36	-0.01	
	Chamera II HPS	300	204	201	0	1.61	67	1.68	-0.07	
	Chamera III HPS	231	154	145	0	0.73	30	0.90	-0.17	
	Bairasuil HPS	180	182	60	0	0.80	33	0.73	0.07	
	Salal-HPS	690	173	327	66	4.18	174	4.20	-0.02	
	Tanakpur-HPS	94	36	45	31	0.89	37	0.91	-0.02	
	Uri-HPS	480	328	346	313	7.50	312	7.54	-0.04	
	Dhauliganga-HPS	280	210	202	0	1.23	51	0.97	0.25	
	Dulhasti-HPS	390	0	0	0	0.00	0	0.00	0.00	
	Sewa-II HPS	120	80	83	80	1.85	77	1.88	-0.03	
	Sub Total (C)	3305	1917	1769	490	21.14	881	21.18	-0.03	
	D. NJPC	Natpda Jhakri	1500	1085	1078	0	6.58	274	6.48	0.09
Sub Total (D)		1500	1085	1078	0	6.58	274	6.48	0.09	
E. THDC	Tehri HPS	1000	920	906	0	8.95	373	9.00	-0.05	
	Koteshwar HPS	400	400	301	90	2.20	92	2.80	-0.60	
	Sub Total (E)	1400	1320	1207	90	11.15	464	11.80	-0.66	
F. BBMB	Bhakra HPS	1480	536	949	370	13.64	568	12.87	0.77	
	Dehar HPS	990	191	495	140	4.38	183	4.60	-0.22	
	Pong HPS	396	182	312	66	4.47	186	5.01	-0.54	
	Sub Total (F)	2866	910	1756	576	22.49	937	22.47	0.02	
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	0	0	0.32	13	0.42	-0.10	
	KWHEP HPS(IPP)	1000	0	0	0	0.00	0	1.80	-1.80	
	Malana Stg-II HPS	100	0	0	30	0.12	5	0.11	0.01	
	Shree Cement TPS	300	0	287	248	6.60	275	6.64	-0.05	
	Budhil HPS(IPP)	70	0	0	0	0.00	0	0.00	0.00	
	Sub Total (G)	1662	0	287	278	7.04	293	8.98	-1.94	
H. Total Regional Entities (A-G)	22836	15791	15384	9765	270.24	11260	275.57	-5.33		

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	820	680	17.44	727
	Guru Nanak Dev TPS(Bhatinda)	440	120	105	2.45	102
	Guru Hargobind Singh TPS(L.mbt)	920	728	576	14.60	608
	Thermal (Total)	2620	1668	1361	34.49	1437
	Total Hydro	1148	576	354	10.14	423
	Total Punjab	3768	2244	1715	44.63	1860
Haryana	Panipat TPS	1367	665	441	13.67	570
	DCRTPP (Yamuna nagar)	600	281	561	11.65	486
	Faridabad GPS (NTPC)	432	0	0	0.00	0
	RGTPP (khedar) (IPP)	1200	0	0	0.00	0
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	590	358	13.20	550
	Thermal (Total)	4944	1536	1360	38.53	1605
	Total Hydro	62	15	13	0.34	14
	Total Haryana	5006	1551	1373	38.87	1619
	Rajasthan	kota TPS	1240	1156	1154	27.84
suratgarh TPS		1500	1119	1036	25.36	1057
Chabra TPS		500	210	228	4.82	201
Dholpur GPS		330	128	129	2.96	123
Ramgarh GPS		111	41	44	1.10	46
RAPS A (NPC)		300	197	197	4.91	205
Barsingsar (NLC)		250	204	204	4.84	202
Giral LTPS		250	60	13	0.68	28
Rajwest LTPS (IPP)		675	601	603	14.23	593
VSLP LTPS (IPP)		135	0	0	0.00	0
Thermal (Total)		5291	3519	3608	86.73	3614
Total Hydro		550	143	68	3.77	157
Wind power		2191	0	244	3.34	139
Biomass		91	22	22	0.53	22
Solar		201	5	0	0.20	8
Renewable/Others (Total)		2483	22	266	4.07	169
Total Rajasthan		8324	3684	3942	94.56	3940
UP		Anpara TPS	1630	1175	1198	28.00
	Obra TPS	1382	491	480	11.60	483
	Paricha TPS	890	582	556	14.40	600
	Panki TPS	210	59	84	1.40	58
	Harduaganj TPS	665	217	216	5.00	208
	Tanda TPS (NTPC)	440	399	405	9.71	404
	Roza TPS (IPP)	1200	810	792	19.13	797
	Anpara-C (IPP)	1200	377	391	9.49	395
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	400	399	9.17	382
	Thermal (Total)	8067	4510	4521	107.89	4495
	Vishnuparyag HPS (IPP)	400	70	72	1.76	73
	Other Hydro	527	142	202	4.58	191
	Cogeneration	981	800	800	19.20	800
	Total UP	9975	5522	5595	133.43	5486
	Uttarakhand	Total Hydro	1303	493	472	11.22
Total Uttarakhand		1303	493	472	11.22	467
Delhi	Rajghat TPS	135	103	100	2.34	98
	Delhi Gas Turbine	282	128	131	2.95	123
	Pragati Gas Turbine	330	309	263	7.30	304
	Rithala GPS	108	0	0	0.00	0
	Bawana GPS	677	231	209	5.12	213
	Badarpur TPS (NTPC)	705	415	400	9.09	379
	Thermal (Total)	2237	1186	1103	26.80	1117
	Total Delhi	2237	1186	1103	26.80	1117
HP	Baspa HPS (IPP)	330	56	0	1.00	42
	Malana HPS (IPP)	86	34	0	0.21	9
	Other Hydro	589	204	172	4.99	208
	Total HP	1005	294	172	6.21	259
J & K	Baglihar HPS (IPP)	450	150	150	3.80	158
	Other Hydro	323	95	130	3.40	142
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	956	245	280	7.20	300
Total State Control Area Generation		32574	15219	14652	362.92	15048
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			2981	1895	70.07	2919
Total Regional Availability(Gross)		55410	33584	26312	703.22	29228

IV. Total Hydro Generation:

Regional Entities Hydro	10364	5810	1186	61.79	2575
State Control Area Hydro	5368	1908	1561	45.21	1811
Total Regional Hydro	15731	7718	2747	107.00	4385

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	100	300	0	6.02	0.00	6.02
Gwalior-Agra (D/C)	320	136	623	0	7.59	0.00	7.59
Zerda-Kankroli	-31	-84	44	188	0.00	1.41	-1.41
Zerda-Bhinmal	48	-15	163	160	0.62	0.00	0.62
Malanpur-Auraiya	-91	-123	0	169	0.00	2.95	-2.95
Badod-Kota/Morak	-50	-123	17	162	0.00	1.54	-1.54
Mundra-Mohindergarh(HVDC)	1266	1267	1268	0	30.49	0.00	30.49
Sub Total WR	1762	1158			44.72	5.90	38.82
Pusauli Bypass	50	50	50	0	1.25	0.00	1.25
MZP- GKP (D/C)	184	80	404	0	6.27	0.00	6.27
Patna-Balia(D/C)	492	336	651	0	11.34	0.00	11.34
B'Sharif-Balia (D/C)	244	145	391	0	6.46	0.00	6.46
Barh - Balia(D/C)	0	0	0	0	0.00	0.00	0.00
Pusauli-Balia	-28	-44	44	44	0.00	0.04	-0.04
Gaya-Fatehpur (765 Kv)	137	39	256	0	4.01	0.00	4.01
Pusauli-Sahupuri	140	131	153	0	2.87	0.00	2.87
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	0	0	0	0	0.00	0.93	-0.93
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	1219	737			32.21	0.97	31.24
Total IR Exch	2981	1895			76.93	6.86	70.07

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
33.34	0.10	33.44	-0.65	6.12	-0.05	3.27	1.26	-1.26
Total IR Schedule (MU)			Total IR Actual (MU)			Net IR UI (MU)		
Through ER	Through WR Inclds Mndra	Total	Through ER	Through WR	Total	Through ER	Through WR	Total
34.00	54.31	88.31	31.24	38.82	70.07	-2.76	-15.49	-18.25

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	0.00	0.10	87.50	87.40	71.40	12.50

<----- 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					
50.46	13.00	49.65	18.42	50.06	0.20	0.12	50.38	49.92

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	410	1:58	0	12:56	18.3	18.3	0.0	0.0
Gorakhpur	400	431	4:31	414	12:43	0.0	0.0	74.8	2.4
Bareilly	400	425	4:00	0	10:30	27.9	27.9	14.8	0.0
Kanpur	400	418	4:00	396	9:05	0.0	0.0	0.0	0.0
Dadri	400	423	3:59	401	9:07	0.0	0.0	8.6	0.0
Ballabhgarh	400	428	4:00	402	9:07	0.0	0.0	27.8	0.0
Bawana	400	427	4:00	406	8:59	0.0	0.0	27.1	0.0
Bassi	400	430	4:01	392	9:08	0.0	0.0	11.7	0.0
Hissar	400	418	4:00	393	11:05	0.0	0.0	0.0	0.0
Moga	400	420	4:01	395	9:05	0.0	0.0	0.0	0.0
Abdullapur	400	427	20:45	409	18:56	0.0	0.0	28.4	0.0
Nalagarh	400	426	20:45	406	9:05	0.0	0.0	30.5	0.0
Kishenpur	400	420	4:00	395	9:04	0.0	0.0	0.0	0.0
Wagoora	400	403	3:20	373	21:04	12.8	68.8	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	487.65	661.49	494.09	869.36	311.91	326.07
Pong	426.72	384.05	406.03	379.28	410.67	514.41	128.90	255.69
Tehri	829.79	740.04	794.55	520.00	818.65	982.26	43.16	232.00
Koteswar	612.50	598.50	NA	NA	NA	NA	NA	NA
Chamera-I	760.00	748.75	NA	NA	NA	NA	40.44	49.23
Rihand	268.22	252.98	NA	500.10	262.74	617.70	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	511.18	NA	503.03	NA	39.93	115.31

* NA: Not Available

IX. System Constraints:

X. Grid Disturbance / Any Other Significant Event:

XI. Weather Conditions For 09.02.2013 :

1.Clear Weather in NR.

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 : 09.02.2013

पारी प्रभाती अशियंता / SHIFT CHARGE ENGINEER