

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 12.03.2013
Date of Reporting : 13.03.2013

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
30725	3216	33941	50.00	29506	1185	30691	50.14	749.6	61.85

* 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	45.34	12.27		57.61	46.88	47.16	0.28	104.77	1.14
Haryana	44.58	0.49		45.08	60.65	61.56	0.92	106.64	2.77
Rajasthan	96.47	4.76	7.00	108.22	70.05	67.76	-2.29	175.98	0.26
Delhi	23.56			23.56	35.42	36.27	0.85	59.83	0.57
UP	103.08	7.01	19.20	129.29	78.97	80.75	1.78	210.04	55.11
Uttarakhand		14.02		14.02	15.68	17.08	1.40	31.10	0.00
HP		8.57		8.57	13.87	14.48	0.61	23.05	0.31
J & K		10.41	0.00	10.41	27.00	24.32	-2.68	34.74	1.70
Chandigarh				0.00	3.60	3.48	-0.11	3.48	0.00
Total	313.03	57.52	26.20	396.75	352.11	352.87	0.76	749.63	61.85

* 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	4325	0	-318	-263	4009	0	31	55	-3.71
Haryana	4950	67	142	106	4111	0	-57	-59	-2.49
Rajasthan	6189	0	-200	567	7359	0	54	996	21.77
Delhi	3000	254	224	-813	1645	0	-2	-1519	-24.02
UP	7785	2745	-164	-118	9172	1185	261	-42	-2.02
Uttarakhand	1537	0	138	314	1101	0	38	166	6.37
HP	927	50	21	-394	750	0	68	73	-0.56
J&K	1820	100	131	-5	1266	0	-161	-5	-0.20
Chandigarh	192	0	7	-56	93	0	4	0	-0.40
Total	30725	3216	-20	-660	29506	1185	236	-335	-5.26

* 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
A. NTPC	Singrauli STPS	2000	1970	2114	2084	47.62	1984	47.06	0.56	
	Rihand I STPS	1000	930	980	1005	21.90	912	22.12	-0.23	
	Rihand II STPS	1000	948	1019	1036	22.38	932	22.51	-0.13	
	Rihand III STPS	500	288	0	514	6.46	269	6.92	-0.46	
	Dadri I STPS	840	807	819	838	17.27	720	19.34	-2.06	
	Dadri II STPS	980	485	345	350	9.59	400	8.03	1.56	
	Unchahar I TPS	420	408	440	438	9.74	406	9.45	0.28	
	Unchahar II TPS	420	406	441	441	9.72	405	9.10	0.62	
	Unchahar III TPS	210	202	222	220	4.84	202	4.60	0.24	
	ISTPP (Jhajjar)	1500	995	482	377	10.06	419	10.83	-0.77	
	Dadri GPS	830	826	389	336	8.62	359	8.81	-0.19	
	Anta GPS	419	405	260	207	5.56	232	5.52	0.04	
	Auraiva GPS	663	641	160	158	3.56	148	3.75	-0.19	
	Sub Total (A)	10782	9312	7671	8004	177.30	7388	178.04	-0.74	
B. NPC	NAPS	440	300	330	339	7.06	294	7.20	-0.14	
	RAPS- B	440	421	460	464	10.05	419	10.10	-0.05	
	RAPS- C	440	430	472	475	10.20	425	10.32	-0.12	
	Sub Total (B)	1320	1151	1262	1278	27.32	1138	27.62	-0.31	
C. NHPC	Chamera I HPS	540	550	540	0	4.44	185	4.40	0.04	
	Chamera II HPS	300	306	124	0	1.74	72	1.62	0.11	
	Chamera III HPS	231	231	179	0	1.04	43	1.03	0.01	
	Bairasuil HPS	180	182	182	20	1.73	72	1.66	0.07	
	Salal-HPS	690	281	443	242	6.55	273	6.52	0.03	
	Tanakpur-HPS	94	27	27	28	0.67	28	0.64	0.04	
	Uri-HPS	480	475	477	466	11.38	474	11.27	0.12	
	Dhauliganga-HPS	280	288	193	0	1.27	53	1.24	0.03	
	Dulhasti-HPS	390	386	355	9	3.23	135	3.24	-0.01	
	Sewa-II HPS	120	120	125	120	2.89	120	2.88	0.01	
	Sub Total (C)	3305	2845	2645	885	34.94	1456	34.49	0.45	
	D.NJPC	Natpcha Jhakri	1500	1605	1467	0	7.99	333	7.80	0.19
		Sub Total (D)	1500	1605	1467	0	7.99	333	7.80	0.19
E. THDC	Tehri HPS	1000	639	640	0	8.17	340	8.25	-0.08	
	Koteshwar HPS	400	400	388	90	3.38	141	3.30	0.08	
	Sub Total (E)	1400	1039	1028	90	11.55	481	11.55	0.00	
F. BBMB	Bhakra HPS	1480	670	997	414	16.13	672	16.07	0.06	
	Dehar HPS	990	217	495	0	5.37	224	5.21	0.16	
	Pong HPS	396	226	306	63	5.60	233	5.01	0.59	
	Sub Total (F)	2866	1112	1798	477	27.10	1129	26.29	0.81	
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	0	0	0.39	16	0.37	0.02	
	KWHEP HPS(IPP)	1000	0	260	0	4.13	172	4.09	0.04	
	Malana Stg-II HPS	100	0	50	0	0.22	9	0.19	0.03	
	Shree Cement TPS	300	0	128	128	3.17	132	3.10	0.07	
	Budhil HPS(IPP)	70	0	0	0	0.00	0	0.00	0.00	
	Sub Total (G)	1662	0	438	128	7.90	329	7.75	0.15	
H. Total Regional Entities (A-G)	22836	17064	16309	10862	294.10	12254	293.54	0.55		

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	850	870	21.58	899
	Guru Nanak Dev TPS(Bhatinda)	440	200	120	3.73	155
	Guru Hargobind Singh TPS(L.mbt)	920	763	964	20.04	835
	Thermal (Total)	2620	1813	1954	45.34	1889
	Total Hydro	1148	458	453	12.27	511
	Total Punjab	3768	2271	2407	57.61	2400
Haryana	Panipat TPS	1367	841	828	19.96	832
	DCRTPP (Yamuna nagar)	600	284	279	7.46	311
	Faridabad GPS (NTPC)	432	167	154	4.08	170
	RGTPP (khedar) (IPP)	1200	0	0	0.00	0
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	616	560	13.08	545
	Thermal (Total)	4944	1908	1821	44.58	1858
	Total Hydro	62	18	20	0.49	21
	Total Haryana	5006	1926	1841	45.08	1878
	Rajasthan	kota TPS	1240	911	970	23.34
suratgarh TPS		1500	1187	1151	29.98	1249
Chabra TPS		500	407	458	10.70	446
Dholpur GPS		330	140	140	3.34	139
Ramgarh GPS		111	68	70	1.78	74
RAPS A (NPC)		300	182	183	4.79	200
Barsingsar (NLC)		250	185	184	4.36	182
Giral LTPS		250	131	128	2.81	117
Rajwest LTPS (IPP)		675	630	632	15.37	641
VSLP LTPS (IPP)		135	0		0.00	0
Thermal (Total)		5291	3841	3916	96.47	4020
Total Hydro		550	182	73	4.76	198
Wind power		2191	0	552	5.77	241
Biomass		91	27	27	0.66	27
Solar		201	14	0	0.57	24
Renewable/Others (Total)		2483	27	579	7.00	292
Total Rajasthan		8324	4050	4568	108.22	4509
UP	Anpara TPS	1630	1435	1286	27.30	1138
	Obra TPS	1382	508	503	12.20	508
	Paricha TPS	890	692	761	16.50	688
	Panki TPS	210	81	81	1.90	79
	Harduaganj TPS	665	264	260	6.30	263
	Tanda TPS (NTPC)	440	400	407	9.89	412
	Roza TPS (IPP)	1200	810	810	19.43	809
	Anpara-C (IPP)	1200	0	0	0.00	0
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	405	404	9.56	398
	Thermal (Total)	8067	4595	4512	103.08	4295
	Vishnuparyag HPS (IPP)	400	71	69	1.55	65
	Other Hydro	527	254	235	5.46	227
	Cogeneration	981	800	800	19.20	800
	Total UP	9975	5720	5616	129.29	5322
Uttarakhand	Total Hydro	1303	618	580	14.02	584
	Total Uttarakhand	1303	618	580	14.02	584
Delhi	Rajghat TPS	135	55	52	1.26	52
	Delhi Gas Turbine	282	150	156	3.70	154
	Pragati Gas Turbine	330	141	136	3.32	138
	Rithala GPS	108	0	0	0.00	0
	Bawana GPS	677	0	0	0.00	0
	Badarpur TPS (NTPC)	705	705	670	15.28	637
	Thermal (Total)	2237	1051	1014	23.56	982
	Total Delhi	2237	1051	1014	23.56	982
	HP	Baspa HPS (IPP)	330	0	30	1.13
Malana HPS (IPP)		86	47	0	0.22	9
Other Hydro		589	320	218	7.22	301
Total HP		1005	367	248	8.57	357
J & K	Baglihar HPS (IPP)	450	246	244	5.87	244
	Other Hydro	323	95	130	4.55	189
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	956	341	374	10.41	434
Total State Control Area Generation		32574	16344	16648	396.75	16467
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			1734	2621	64.93	2705
Total Regional Availability(Gross)		55410	34387	30131	755.78	31426

IV. Total Hydro Generation:

Regional Entities Hydro	10364	7248	1452	86.31	3596
State Control Area Hydro	5368	2238	1983	57.52	2332
Total Regional Hydro	15731	9486	3435	143.83	5928

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	300	200	2.66	0.74	1.92
Gwalior-Agra (D/C)	141	266	470	0	6.75	0.00	6.75
Zerda-Kankroli	-121	-103	0	181	0.00	2.34	-2.34
Zerda-Bhinmal	-64	-66	85	184	0.00	0.76	-0.76
Malanpur-Auraiya	-183	-144	0	184	0.00	3.20	-3.20
Badod-Kota/Morak	-115	-111	0	185	0.00	0.93	-0.93
Mundra-Mohindergarh(HVDC)	1265	1266	1267	0	30.64	0.00	30.64
Sub Total WR	723	1308			40.05	7.97	32.08
Pusauli Bypass	300	300	400	0	7.38	0.00	7.38
MZP- GKP (D/C)	84	162	220	0	2.85	0.00	2.85
Patna-Balia(D/C)	451	616	735	0	14.50	0.00	14.50
B'Sharif-Balia (D/C)	117	233	343	0	5.65	0.00	5.65
Barh - Balia(D/C)	0	0	0	0	0.00	0.00	0.00
Pusauli-Balia	-183	-139	0	186	0.00	1.49	-1.49
Gaya-Fatehpur (765 Kv)	148	45	191	0	2.40	0.00	2.40
Pusauli-Sahupuri	132	136	151	0	2.69	0.00	2.69
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-38	-40	0	44	0.00	1.14	-1.14
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	1011	1313			35.47	2.63	32.85
Total IR Exch	1734	2621			75.52	10.59	64.93

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
44.37	0.16	44.53	-7.49	-0.35	2.30	-13.40	-2.77	2.77
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
36.58	35.95	72.52	32.85	32.08	64.93	-3.73	-3.87	-7.60

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	3.22	96.38	93.16	60.74	3.62

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					
50.64	17.05	49.65	19.10	50.04	0.21	0.11	50.35	49.78

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	18:02	399	6:09	0.0	0.0	0.0	0.0
Gorakhpur	400	427	22:13	412	0:09	0.0	0.0	25.3	0.0
Bareilly	400	428	18:02	401	12:14	0.0	0.0	8.1	0.0
Kanpur	400	421	18:01	402	10:07	0.0	0.0	0.3	0.0
Dadri	400	421	17:54	399	12:13	0.0	0.0	0.5	0.0
Ballabgarh	400	425	18:00	404	11:07	0.0	0.0	9.7	0.0
Bawana	400	423	17:59	401	11:11	0.0	0.0	5.1	0.0
Bassi	400	426	18:00	399	6:21	0.0	0.0	5.4	0.0
Hissar	400	416	18:01	389	11:08	0.0	0.3	0.0	0.0
Moga	400	415	4:03	394	11:07	0.0	0.0	0.0	0.0
Abdullapur	400	422	21:00	401	12:13	0.0	0.0	1.5	0.0
Nalagarh	400	424	21:26	400	11:06	0.0	0.0	3.5	0.0
Kishenpur	400	419	18:01	397	8:49	0.0	0.0	0.0	0.0
Wagoora	400	409	17:59	382	7:28	0.0	24.0	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	484.01	560.76	483.58	552.50	217.53	486.11
Pong	426.72	384.05	402.31	273.51	406.18	379.44	106.90	387.57
Tehri	829.79	740.04	784.15	375.00	818.65	982.26	63.47	218.00
Koteswar	612.50	598.50	610.10	4.69	NA	NA	226.00	218.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	92.44	119.71
Rihand	268.22	252.98	258.90	NA	260.91	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	508.69	NA	497.45	NA	110.86	178.96

* NA: Not Available

IX. System Constraints:

X. Grid Disturbance / Any Other Significant Event:

XI. Weather Conditions For 12.03.2013 :
Normal Weather in Northern Region.

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 : 12.03.2013

पारी प्रभाती अश्विनी / SHIFT CHARGE ENGINEER