

पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)



उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 29.04.2013
Date of Reporting : 30.04.2013

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
35406	1552	36958	50.07	30994	1792	32786	50.10	766.9	48.10

* 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	44.15	8.28		52.43	52.45	54.27	1.82	106.71	0.00
Haryana	54.37	0.68		55.05	50.09	49.78	-0.31	104.83	0.04
Rajasthan	83.23	0.00	7.24	90.47	66.03	62.75	-3.29	153.22	0.00
Delhi	29.39			29.39	54.73	52.22	-2.50	81.61	0.06
UP	128.54	5.02	12.00	145.56	89.07	85.51	-3.55	231.07	46.14
Uttarakhand		12.96		12.96	20.47	19.85	-0.62	32.81	0.16
HP		12.09		12.09	11.74	10.80	-0.93	22.89	0.00
J & K		11.34	0.00	11.34	20.40	18.10	-2.30	29.44	1.70
Chandigarh				0.00	4.59	4.37	-0.22	4.37	0.00
Total	339.68	50.37	19.24	409.29	369.56	357.66	-11.90	766.95	48.10

* 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 (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	5262	0	-26	85	4622	0	163	239	2.91
Haryana	5642	44	208	-49	4138	0	31	-71	-9.88
Rajasthan	6470	0	-612	942	5955	0	-141	496	17.69
Delhi	3695	3	-270	-401	2899	0	-173	-690	-10.55
UP	10129	1405	-21	-10	10323	1792	120	804	5.61
Uttarakhand	1639	0	5	538	1172	0	-77	446	11.24
HP	957	0	-162	-549	744	0	-26	-239	-6.53
J&K	1398	100	-53	-155	1004	0	-5	-121	-3.21
Chandigarh	214	0	-12	-12	137	0	-6	15	0.52
Total	35406	1552	-943	389	30994	1792	-115	879	7.81

* 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	1275	1533	1365	30.86	1286	30.20	0.66
	Rihand I STPS	1000	915	985	989	21.83	910	21.68	0.15
	Rihand II STPS	1000	970	1037	1044	23.08	962	23.02	0.07
	Rihand III STPS	500	464	495	499	11.17	465	11.13	0.04
	Dadri I STPS	840	646	647	616	14.24	594	14.86	-0.62
	Dadri II STPS	980	696	781	705	15.84	660	15.98	-0.14
	Unchahar I TPS	420	394	428	419	9.27	386	9.28	-0.02
	Unchahar II TPS	420	398	414	432	9.71	404	9.20	0.50
	Unchahar III TPS	210	125	212	0	2.48	103	2.27	0.21
	ISTPP (Jhajjar)	1500	1410	653	734	15.78	658	15.89	-0.11
	Dadri GPS	830	790	340	341	8.61	359	8.92	-0.32
	Anta GPS	419	392	227	250	5.65	235	5.70	-0.05
	Auraiva GPS	663	624	301	295	7.00	292	6.92	0.07
	Sub Total (A)	10782	9099	8053	7689	175.51	7313	175.06	0.45
	B. NPC	NAPS	440	299	333	341	7.18	299	7.18
RAPS- B		440	400	449	369	9.10	379	9.60	-0.50
RAPS- C		440	430	463	471	10.02	417	10.32	-0.30
Sub Total (B)		1320	1129	1245	1181	26.29	1095	27.10	-0.81
C. NHPC	Chamera I HPS	540	360	360	0	6.24	260	6.11	0.13
	Chamera II HPS	300	310	309	0	3.87	161	3.86	0.01
	Chamera III HPS	231	231	233	0	2.72	113	2.83	-0.11
	Bairasuil HPS	180	182	131	120	2.18	91	2.04	0.13
	Salal-HPS	690	372	543	340	9.28	387	8.93	0.35
	Tanakpur-HPS	94	42	48	34	0.95	40	0.95	0.00
	Uri-HPS	480	476	480	480	11.45	477	11.54	-0.08
	Dhauliganga-HPS	280	277	270	0	1.80	75	1.71	0.09
	Dulhasti-HPS	390	370	267	0	5.42	226	5.93	-0.50
	Sewa-II HPS	120	119	121	0	1.63	68	1.59	0.04
	Sub Total (C)	3305	2739	2762	974	45.55	1898	45.49	0.07
	D. NJPC	Nathpa Jhakri	1500	1605	1579	268	18.94	789	18.89
Sub Total (D)		1500	1605	1579	268	18.94	789	18.89	0.05
E. THDC	Tehri HPS	1000	213	347	0	4.77	199	4.75	0.02
	Koteshwar HPS	400	230	234	0	1.93	81	1.90	0.03
	Sub Total (E)	1400	443	581	0	6.71	279	6.65	0.06
F. BBMB	Bhakra HPS	1480	703	1136	521	17.06	711	16.87	0.19
	Dehar HPS	990	316	460	160	7.80	325	7.59	0.22
	Pong HPS	396	24	240	0	0.71	30	0.25	0.46
	Sub Total (F)	2866	1043	1836	681	25.57	1065	24.70	0.87
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	60	30	0.94	39	0.91	0.03
	KWHEP HPS(IPP)	1000	0	818	160	10.35	431	10.47	-0.13
	Malana Stg-II HPS	100	0	105	0	0.55	23	0.49	0.05
	Shree Cement TPS	300	0	260	267	6.30	263	6.49	-0.19
	Budhil HPS(IPP)	70	0	69	35	0.66	28	0.55	0.11
	Sub Total (G)	1662	0	1312	492	18.80	783	18.91	-0.12
H. Total Regional Entities (A-G)	22836	16058	17368	11285	317.36	13223	316.80	0.56	

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	950	1052	21.83	910
	Guru Nanak Dev TPS(Bhatinda)	440	95	110	2.09	87
	Guru Hargobind Singh TPS(L.mbt)	920	911	969	20.23	843
	Thermal (Total)	2620	1956	2131	44.15	1840
	Total Hydro	1148	471	411	8.28	345
	Total Punjab	3768	2427	2542	52.43	2185
Haryana	Panipat TPS	1367	660	607	15.30	638
	DCRTPP (Yamuna nagar)	600	574	515	12.68	528
	Faridabad GPS (NTPC)	432	174	169	4.33	180
	RGTPP (khedar) (IPP)	1200	552	447	12.48	520
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	404	401	9.58	399
	Thermal (Total)	4944	2364	2139	54.37	2266
	Total Hydro	62	28	28	0.68	28
	Total Haryana	5006	2392	2167	55.05	2294
	Rajasthan	kota TPS	1240	1055	984	24.78
suratgarh TPS		1500	962	1003	24.42	1017
Chabra TPS		500	390	446	10.11	421
Dholpur GPS		330	131	137	3.30	137
Ramgarh GPS		111	93	111	2.89	120
RAPS A (NPC)		300	0	0	0.00	0
Barsingsar (NLC)		250	106	94	2.41	100
Giral LTPS		250	115	98	2.53	105
Rajwest LTPS (IPP)		1080	565	486	12.80	533
VSLP LTPS (IPP)		135	0	0	0.00	0
Thermal (Total)		5696	3417	3359	83.23	3468
Total Hydro		550	0	0	0.00	0
Wind power		2191	173	246	5.24	218
Biomass		91	34	37	0.80	34
Solar		201	0	0	1.20	50
Renewable/Others (Total)		2483	207	283	7.24	302
Total Rajasthan		8729	3624	3642	90.47	3770
UP	Anpara TPS	1630	1183	1132	26.80	1117
	Obra TPS	1382	507	509	12.30	513
	Paricha TPS	890	768	753	18.20	758
	Panki TPS	210	140	131	2.90	121
	Harduaganj TPS	665	270	263	6.20	258
	Tanda TPS (NTPC)	440	401	406	9.82	409
	Roza TPS (IPP)	1200	1065	936	23.55	981
	Anpara-C (IPP)	1200	725	1008	19.34	806
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	405	405	9.43	393
	Thermal (Total)	8067	5464	5543	128.54	5356
	Vishnuparyag HPS (IPP)	400	154	144	3.44	143
	Other Hydro	527	85	87	1.59	66
	Cogeneration	981	500	500	12.00	500
	Total UP	9975	6203	6274	145.56	5922
Uttarakhand	Total Hydro	1303	583	472	12.96	540
	Total Uttarakhand	1303	583	472	12.96	540
Delhi	Rajghat TPS	135	106	103	2.45	102
	Delhi Gas Turbine	282	77	76	1.76	73
	Pragati Gas Turbine	330	260	297	6.95	290
	Rithala GPS	108	0	0	0.00	0
	Bawana GPS	677	230	260	5.50	229
	Badarpur TPS (NTPC)	705	585	575	12.73	531
	Thermal (Total)	2237	1258	1311	29.39	1225
	Total Delhi	2237	1258	1311	29.39	1225
HP	Baspa HPS (IPP)	330	59	195	2.48	103
	Malana HPS (IPP)	86	89	7	0.59	25
	Other Hydro	589	358	365	9.02	376
	Total HP	1005	506	567	12.09	504
J & K	Baglihar HPS (IPP)	450	436	434	9.60	400
	Other Hydro	323	70	115	1.74	73
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	956	506	549	11.34	473
Total State Control Area Generation		32979	17499	17524	409.29	16910
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			2676	2760	62.70	2612
Total Regional Availability(Gross)		55815	37543	31569	789.34	32746

IV. Total Hydro Generation:

Regional Entities Hydro	10364	7741	2113	108.60	4525
State Control Area Hydro	5368	2179	2114	50.37	1955
Total Regional Hydro	15731	9920	4227	158.97	6480

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	-200	-100	100	400	0.13	4.10	-3.97
Gwalior-Agra (D/C)	731	606	1192	0	19.63	0.00	19.63
Zerda-Kankroli	-29	-84	0	223	0.00	2.78	-2.78
Zerda-Bhinmal	0	-34	80	178	0.00	1.46	-1.46
Malanpur-Auraiya	-118	-54	0	131	0.00	1.95	-1.95
Badod-Kota/Morak	-37	-61	0	167	0.00	2.00	-2.00
Mundra-Mohindergarh(HVDC)	1268	1068	1268	0	28.93	0.00	28.93
Sub Total WR	1615	1341			48.69	12.29	36.40
Pusauli Bypass	-100	-150	0	150	0.00	3.17	-3.17
MZP- GKP (D/C)	274	484	502	0	7.77	0.00	7.77
Patna-Balia(D/C)	499	585	599	0	11.99	0.00	11.99
B'Sharif-Balia (D/C)	237	281	302	0	5.63	0.00	5.63
Pusauli-Balia	1	25	37	0	0.19	0.00	0.19
Gaya-Fatehpur (765 Kv)	27	104	165	68	1.61	0.00	1.61
Pusauli-Sahupuri	159	130	170	0	3.34	0.00	3.34
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-36	-40	0	44	0.00	1.07	-1.07
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sub Total ER	1061	1419			30.53	4.24	26.30
Total IR Exch	2676	2760			79.22	16.53	62.70

V(B). Inter Regional Schedule & Actual Exchanges [Import (+ve)/Export (-ve)] [Corridor wise]

ER	ISGS/LT Schedule (MU)		Bilateral Schedule (MU)		Power Exchange Shdi (MU)		Wheeling (MU)	
	Bhutan	Total	Through ER	Through WR	Through ER	Through WR	Through ER	Through WR
35.75	1.46	37.22	-8.71	-10.41	0.87	9.75	-2.35	2.35

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
27.03	41.31	68.35	26.30	36.40	62.70	-0.74	-4.91	-5.65

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	95.70	95.60	51.90	4.30

<----- 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				
50.52	8.06	49.69	18.44	50.01	0.12	0.11	50.45	49.90

VII. Voltage profile 400 kV

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	8:05	404	14:42	0.0	0.0	0.0	0.0
Gorakhpur	400	423	5:38	405	20:18	0.0	0.0	11.4	0.0
Bareilly	400	424	8:04	401	11:18	0.0	0.0	1.5	0.0
Kanpur	400	422	8:03	403	19:42	0.0	0.0	0.5	0.0
Dadri	400	416	8:02	402	11:11	0.0	0.0	0.0	0.0
Ballabgarh	400	422	1:40	407	11:15	0.0	0.0	5.2	0.0
Bawana	400	417	3:34	404	11:17	0.0	0.0	0.0	0.0
Bassi	400	428	3:59	405	11:15	0.0	0.0	16.7	0.0
Hissar	400	413	17:06	397	19:13	0.0	0.0	0.0	0.0
Moga	400	416	17:02	401	19:22	0.0	0.0	0.0	0.0
Abdullapur	400	418	3:41	400	19:08	0.0	0.0	0.0	0.0
Nalagarh	400	419	2:58	403	19:21	0.0	0.0	0.0	0.0
Kishenpur	400	416	17:02	395	19:41	0.0	0.0	0.0	0.0
Wagoora	400	414	16:59	385	19:59	0.0	6.2	0.0	0.0

VIII. Voltage profile 765 kV

Station	Voltage Level (kV)	Maximum		Minimum		Voltage (in % of Time)			
		Voltage(KV)	Time	Voltage (KV)	Time	<728 kV	<742 kV	>800 kV	>820 kV
Fatehpur	765	0	0:00	9999	0:00	0.0	0.0	0.0	0.0
Balia	765	772	8:03	729	19:44	0.0	0.0	100.0	100.0
Moga	765	781	17:02	751	19:42	0.0	0.0	100.0	100.0
Agra	765	781	18:02	745	5:42	0.0	0.0	0.0	0.0
Bhiwani	765	793	13:29	762	5:40	0.0	0.0	0.0	0.0
Unnao	765	758	18:17	730	5:42	0.0	37.1	0.0	0.0

IX. 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 (m ³ /s)	Usage (m ³ /s)
Bhakra	513.59	445.62	479.80	454.47	474.67	345.61	430.67	345.61
Pong	426.72	384.05	400.36	230.85	403.34	296.79	57.03	296.79
Tehri	829.79	740.04	763.10	146.00	818.65	982.26	95.83	144.00
Koteshwar	612.50	598.50	599.10	0.30	610.68	4.86	14.00	123.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	164.91	186.02
Rihand	268.22	252.98	257.10	162.00	258.32	216.70	NA	NA
RPS	352.80	343.81	346.02	NA	348.41	NA	NA	NA
Jawahar Sagar	298.70	295.78	298.16	NA	298.25	NA	NA	NA
RSD	527.91	487.91	507.32	NA	497.01	NA	152.34	29.90

* NA: Not Available

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 29.04.2013 :

1. Normal weather.

XIII. Synchronisation of new generating units :

0.00

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

1. 765 KV AGRA- JATIKARA (PGCIL) LINE First time Synchronised at 17.45 Hrs/ 29.04.2013. Power flow 543 MW Agra to Jatikara.

XV. Tripping of lines in pooling stations :

XVI. Complete generation loss in a generating station :

Report for : 29.04.2013

पारी प्रभाती अग्रियंता / SHIFT CHARGE ENGINEER