पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)

उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 16.08.2013
Date of Reporting : 17.08.2013

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
35002	1930	36932	50.14	30329	200	30529	50.49	768.0	21.48

* 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:

UI [OD:(+ve), UD: (-ve)]

State	State's Control Area Generation (Net MU)				Drawal Schedule	Actual Drawal	UI	Consumption	Shortages *
	Thermal	Hydro	Renewable/others $	Total	(Net MU)	(Net MU)	(Net MU)	(Net MU)	(MU)
Punjab	9.12	16.87		25.99	104.20	104.21	0.01	130.20	0.00
Haryana	49.65	0.60		50.25	72.45	71.58	-0.86	121.83	0.00
Rajasthan	52.74	6.71	5.41	64.85	56.49	52.35	-4.13	117.21	0.00
Delhi	20.17			20.17	65.39	63.64	-1.75	83.81	0.12
UP	112.46	3.78	1.20	117.44	116.53	111.73	-4.79	229.17	19.64
Uttarakhand		20.79		20.79	12.61	12.28	-0.32	33.07	0.00
HP		22.99		22.99	0.63	-0.29	-0.92	22.70	0.01
J & K		13.68	0.00	13.68	13.71	11.26	-2.45	24.94	1.70
Chandigarh				0.00	5.50	5.09	-0.41	5.09	0.00
Total	**244.13**	**85.41**	**6.61**	**336.15**	**447.50**	**431.87**	**-15.63**	**768.02**	**21.48**

*** Shortage furnished by the respective constituent.$ Others include UP Co-generation and JK Diesel**

II. B. State's Demand Met in MWs:

UI/OA/PX [OD/Import: (+ve), UD/Export: (-ve)

State	Evening Peak (20:00 Hrs) MW				Off Peak (03:00 Hrs) MW				Day Energy MU
	Demand Met	Shortage	UI	STOA/PX transactior	Demand Met	Shortage	UI	STOA/PX transaction	STOA/PX transaction
Punjab	5793	0	-181	1844	5031	0	-87	1852	44.23
Haryana	5798	0	129	553	4896	0	-59	521	11.72
Rajasthan	5568	0	-10	36	4561	0	-308	93	2.34
Delhi	3971	0	-40	297	2970	0	-74	-161	3.69
UP	9570	1830	27	623	10091	200	-232	1645	21.67
Uttarakhand	1591	0	74	13	1158	0	-132	-88	-1.39
HP	1056	0	73	-1165	705	0	-160	-1131	-26.16
J&K	1418	100	66	-347	747	0	-165	-646	-10.54
Chandigarh	238	0	-17	-15	171	0	-13	-30	-0.01
Total	**35002**	**1930**	**120**	**1838**	**30329**	**200**	**-1231**	**2054**	**45.54**

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

III. Regional Entities :

UI [OG:(+ve), UG: (-ve)]

	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	1935	2061	1687	39.67	1653	39.78	-0.11
	Rihand I STPS	1000	920	940	665	16.59	691	17.07	-0.48
	Rihand II STPS	1000	470	518	326	8.30	346	8.63	-0.34
	Rihand III STPS	500	485	510	341	8.78	366	8.94	-0.17
	Dadri I STPS	840	600	361	374	7.51	313	8.05	-0.54
	Dadri II STPS	980	975	955	688	17.41	725	17.66	-0.25
	Unchahar I TPS	420	391	372	312	6.77	282	6.74	0.04
	Unchahar II TPS	420	403	359	306	6.84	285	6.87	-0.03
	Unchahar III TPS	210	201	192	154	3.48	145	3.45	0.03
	ISTPP (Jhajjhar)	1500	1470	372	325	7.18	299	7.41	-0.23
	Dadri GPS	830	523	0	163	3.89	162	3.82	0.07
	Anta GPS	419	403	248	143	4.69	195	4.74	-0.05
	Auraiya GPS	663	625	154	117	3.27	136	3.31	-0.05
	Sub Total (A)	**10782**	**9399**	**7042**	**5601**	**134.38**	**5599**	**136.48**	**-2.10**
B. NPC	NAPS	440	289	332	332	7.07	294	6.94	0.13
	RAPS- B	440	399	438	445	9.53	397	9.58	-0.04
	RAPS- C	440	364	405	237	6.95	290	8.74	-1.79
	Sub Total (B)	**1320**	**1052**	**1175**	**1014**	**23.55**	**981**	**25.25**	**-1.70**
C. NHPC	Chamera I HPS	540	534	540	540	12.89	537	12.82	0.08
	Chamera II HPS	300	300	302	301	7.17	299	7.23	-0.06
	Chamera III HPS	231	231	231	229	5.48	228	5.54	-0.06
	Bairasuil HPS	180	121	179	140	2.53	105	2.66	-0.13
	Salal-HPS	690	625	669	669	14.56	607	14.99	-0.43
	Tanakpur-HPS	94	93	94	94	2.19	91	2.18	0.01
	Uri-HPS	480	450	463	450	10.22	426	10.60	-0.38
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	333	406	259	7.98	333	8.00	-0.02
	Sewa-II HPS	120	119	127	120	2.92	122	2.88	0.04
	Sub Total (C)	**3305**	**2806**	**3011**	**2802**	**65.94**	**2748**	**66.90**	**-0.96**
D.NJPC	Nathpa Jhakri	1500	1605	1621	1622	38.66	1611	38.52	0.14
	Sub Total (D)	1500	1605	1621	1622	38.66	1611	38.52	0.14
E. THDC	Tehri HPS	1000	1060	1060	956	25.03	1043	25.25	-0.22
	Koteshwar HPS	400	360	363	361	8.60	359	8.64	-0.04
	Sub Total (E)	**1400**	**1420**	**1423**	**1317**	**33.64**	**1402**	**33.89**	**-0.25**
F. BBMB	Bhakra HPS	1480	1189	1341	1254	29.23	1218	28.54	0.69
	Dehar HPS	990	616	825	605	15.45	644	14.78	0.67
	Pong HPS	396	366	372	372	8.99	375	8.78	0.21
	Sub Total (F)	**2866**	**2171**	**2538**	**2231**	**53.67**	**2236**	**52.10**	**1.57**
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	215	200	4.61	192	4.52	0.09
	KWHEP HPS(IPP)	1000	0	1200	1100	28.10	1171	28.51	-0.41
	Malana Stg-II HPS	100	0	112	113	2.58	107	2.45	0.13
	Shree Cement TPS	300	0	125	100	2.90	121	3.00	-0.10
	Budhil HPS(IPP)	70	0	75	75	1.78	74	1.68	0.10
	Sub Total (G)	1662	0	1727	1588	39.96	1665	40.15	-0.19
H. Total Regional Entities (A-G)		**22836**	**18453**	**18537**	**16175**	**389.80**	**16242**	**393.29**	**-3.49**

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	170	170	3.93	164
	Guru Nanak Dev TPS(Bhatinda)	440	90	0	0.83	35
	Guru Hargobind Singh TPS(L.mbt)	920	373	149	4.36	182
	Goindwal(GVK)		0	0	0.00	0
	Thermal (Total)	2620	633	319	9.12	380
	Total Hydro	1148	712	655	16.87	703
	Total Punjab	**3768**	**1345**	**974**	**25.99**	**1083**
Haryana	Panipat TPS	1367	385	381	9.18	383
	DCRTPP (Yamuna nagar)	600	0	0	0.00	0
	Faridabad GPS (NTPC)	432	193	160	4.42	184
	RGTPP (khedar) (IPP)	1200	756	378	16.06	669
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	966	761	19.99	833
	Thermal (Total)	4944	2300	1680	49.65	2069
	Total Hydro	62	25	20	0.60	25
	Total Haryana	**5006**	**2325**	**1700**	**50.25**	**2094**
Rajasthan	kota TPS	1240	486	433	10.61	442
	suratgarh TPS	1500	621	537	13.26	552
	Chabra TPS	500	200	196	4.54	189
	Dholpur GPS	330	98	98	2.03	85
	Ramgarh GPS	111	26	28	0.68	28
	RAPS A (NPC)	300	176	176	4.10	171
	Barsingsar (NLC)	250	91	91	2.11	88
	Giral LTPS	250	0	0	0.00	0
	Rajwest LTPS (IPP)	1080	293	77	4.30	179
	VSLP LTPS (IPP)	135	0	0	0.00	0
	Kalisindh Thermal	600	0	0	0.00	0
	Kawai(Adani)	660	502	447	11.12	463
	Thermal (Total)	6956	2493	2083	52.74	2198
	Total Hydro	550	258	260	6.71	280
	Wind power	2191	120	92	3.87	161
	Biomass	91	29	29	0.69	29
	Solar	201	0	0	0.85	35
	Renewable/Others (Total)	2483	149	121	5.41	225
	Total Rajasthan	**9989**	**2900**	**2464**	**64.85**	**2702**
UP	Anpara TPS	1630	1346	1312	28.50	1188
	Obra TPS	1288	501	498	10.90	454
	Paricha TPS	1140	842	937	19.40	808
	Panki TPS	210	50	120	1.70	71
	Harduaganj TPS	665	325	363	7.50	313
	Tanda TPS (NTPC)	440	385	357	8.98	374
	Roza TPS (IPP)	1200	828	837	20.26	844
	Anpara-C (IPP)	1200	774	561	14.99	624
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	25	0	0.23	10
	Thermal (Total)	8223	5076	4985	112.46	4686
	Vishnuparyag HPS (IPP)	400	0	0	0.00	0
	Other Hydro	527	209	129	3.78	158
	Cogeneration	981	50	50	1.20	50
	Total UP	**10131**	**5335**	**5164**	**117.44**	**4893**
Uttarakhand	Total Hydro	1303	864	933	20.79	866
	Total Uttarakhand	**1303**	**864**	**933**	**20.79**	**866**
Delhi	Rajghat TPS	135	32	43	1.01	42
	Delhi Gas Turbine	282	82	71	1.94	81
	Pragati Gas Turbine	330	263	150	4.37	182
	Rithala GPS	95	0	0	0.00	0
	Bawana GPS	686	236	205	5.15	215
	Badarpur TPS (NTPC)	705	425	260	7.69	321
	Thermal (Total)	2232	1038	729	20.17	840
	Total Delhi	**2232**	**1038**	**729**	**20.17**	**840**
HP	Baspa HPS (IPP)	330	307	307	7.57	316
	Malana HPS (IPP)	86	75	54	1.52	63
	Other Hydro	589	586	578	13.90	579
	Total HP	**1005**	**968**	**939**	**22.99**	**958**
J & K	Baglihar HPS (IPP)	450	436	436	10.47	436
	Other Hydro	323	135	135	3.21	134
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	**956**	**571**	**571**	**13.68**	570
Total State Control Area Generation		**34390**	**15346**	**13474**	**336.15**	**14006**
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			**2261**	**985**	**39.17**	**1632**
Total Regional Availability(Gross)		**57226**	**36144**	**30634**	**765.12**	**31880**

IV. Total Hydro Generation:

Regional Entities Hydro	**10364**	**10120**	**9385**	**227.19**	**9466**
State Control Area Hydro	**5368**	**3607**	**3507**	**85.41**	**3559**
Total Regional Hydro	**15731**	**13727**	**12892**	**312.61**	**13025**

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
	MW	MW	Import	Export	Import	Export	MU
Vindhychal B/B	-150	-500	0	-500	0.00	8.74	-8.74
Gwalior-Agra (D/C)	876	293	1334	88	16.24	0.00	16.24
Zerda-Kankroli	-48	-217	0	295	0.00	4.70	-4.70
Zerda-Bhinmal	4	-151	30	278	0.00	3.61	-3.61
Malanpur-Auraiya	-110	-70	0	125	0.00	1.51	-1.51
Badod-Kota/Morak	17	-126	36	184	0.00	1.07	-1.07
Mundra-Mohindergarh(HVDC)	997	627	997	0	18.18	0.00	18.18
Sub Total WR	**1586**	**-144**			**34.42**	**19.64**	**14.78**
Pusauli Bypass	-395	-140	0	411	0.00	5.42	-5.42
MZP- GKP (D/C)	322	569	706	0	11.19	0.00	11.19
Patna-Balia(D/C)	261	307	426	0	7.58	0.00	7.58
B'Sharif-Balia (D/C)	165	247	284	0	5.18	0.00	5.18
Pusauli-Balia	-20	6	28	20	0.01	0.00	0.01
Gaya-Fatehpur (765 Kv)	19	-38	54	44	0.00	0.25	-0.25
Pusauli-Sahupuri	126	154	154	0	3.57	0.00	3.57
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-38	-40	0	45	0.00	0.90	-0.90
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	235	64	235	0	3.43	0.00	3.43
Sub Total ER	**675**	**1129**			**30.95**	**6.56**	**24.39**
Total IR Exch	**2261**	**985**			**65.37**	**26.20**	**39.17**

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
24.65	3.71	28.36	-9.51	40.45	-0.42	-20.15	3.18	-3.18

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
21.62	48.43	70.05	24.39	14.78	39.17	2.77	-33.66	-30.88

VI. Frequency Profile <---------- % of Time Frequency ---------->

<48.80	<49.0	<49.20	<49.50	<49.7	49.5 - 50.2	49.7-49.8	49.7 - 50.2	> 50.00	> 50.2
0.00	0.00	0.00	0.00	0.00	61.10	1.00	61.10	83.40	38.90

<---------- Frequency (Hz) ---------->				Average	Frequency	Std. Dev.	Frequency in 15 Min Block	
Maximum		Minimum		Frequency	Variation		MAX	MIN
Freq	Time	Freq	Time	Hz	Index		(Hz)	(Hz)
50.55	13.03	49.72	14.08	50.15	0.47	0.15	50.55	49.92

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	416	17:05	408	00:00	0.0	0.0	0.0	0.0
Gorakhpur	400	417	10:00	406	22:00	0.0	0.0	0.0	0.0
Bareilly	400	419	07:09	400	05:27	0.0	0.0	0.0	0.0
Kanpur	400	420	07:05	405	19:37	0.0	0.0	0.0	0.0
Dadri	400	420	03:23	406	19:22	0.0	0.0	0.0	0.0
Ballabhgarh	400	427	03:05	411	13:50	0.0	0.0	46.6	0.0
Bawana	400	420	02:44	406	19:23	0.0	0.0	0.0	0.0
Bassi	400	428	02:53	406	19:36	0.0	0.0	33.1	0.0
Hissar	400	412	03:25	397	14:05	0.0	0.0	0.0	0.0
Moga	400	413	21:48	400	14:08	0.0	0.0	0.0	0.0
Abdullapur	400	416	03:23	402	12:17	0.0	0.0	0.0	0.0
Nalagarh	400	412	03:25	398	12:24	0.0	0.0	0.0	0.0
Kishenpur	400	420	00:02	408	12:16	0.0	0.0	0.0	0.0
Wagoora	400	417	00:03	400	19:30	0.0	0.0	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	782	17:01	742	19:42	0.0	0.0	0.0	0.0
Balia	765	769	17:04	735	14:08	0.0	7.1	0.0	0.0
Moga	765	784	21:55	755	12:24	0.0	0.0	0.0	0.0
Agra	765	809	03:24	771	19:44	0.0	0.0	15.1	0.0
Bhiwani	765	792	17:05	770	14:08	0.0	0.0	0.0	0.0
Unnao	765	765	17:04	739	19:42	0.0	1.1	0.0	0.0

IX. Reservior Parameters:

Name of Reservior	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	506.77	1396.66	487.96	644.48	1484.00	877.82
Pong	426.72	384.05	421.05	931.43	405.91	344.07	2049.09	513.27
Tehri	829.79	740.04	819.35	988.00	818.65	982.26	729.35	555.00
Koteshwar	612.50	598.50	NA	NA	NA	NA	NA	NA
Chamera-I	760.00	748.75	NA	NA	NA	NA	953.02	347.96
Rihand	268.22	252.98	257.89	196.40	260.12	311.30	NA	NA
RPS	352.80	343.81	345.25	NA	NA	NA	NA	NA
Jawahar Sagar	298.70	295.78	NA	NA	NA	NA	NA	NA
RSD	527.91	487.91	521.67	144.00	502.54	144.00	926.24	134.45

*** NA: Not Available**

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 16.08.2013 :

1. Rain

XIII. Synchronisation of new generating units :

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

XV. Tripping of lines in pooling stations :

XVI. Complete generation loss in a generating station :

1. Dhauliganga (280 MW) closed down till 30.09.2013 due to flooding of power house.

2. Vishnuprayg(UPPCL) (400 MW) Closed due to High Silt level in river water.

Report for : 16.08.2013 **पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER**