पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)

उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 23.10.2013
Date of Reporting : 24.10.2013

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
33770	2405	36175	50.16	28231	750	28981	0.00	729.0	37.65

* 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	31.29	10.63		41.92	61.15	62.77	1.62	104.69	0.00
Haryana	53.05	0.71		53.76	57.03	56.58	-0.45	110.34	0.05
Rajasthan	67.91	2.55	5.99	76.45	79.51	74.67	-4.83	151.13	0.00
Delhi	20.05			20.05	50.68	50.43	-0.26	70.48	0.01
UP	122.68	3.09	1.20	126.97	79.77	79.38	-0.40	206.35	34.97
Uttarakhand		12.04		12.04	17.01	18.35	1.35	30.39	0.93
HP		10.06		10.06	11.81	12.42	0.62	22.49	0.00
J & K		7.57	0.00	7.57	22.56	21.90	-0.66	29.47	1.70
Chandigarh				0.00	3.71	3.64	-0.07	3.64	0.00
Total	**294.99**	**46.66**	**7.19**	**348.83**	**383.22**	**380.14**	**-3.08**	**728.98**	**37.65**

*** 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	5038	0	98	160	3823	0	63	198	7.34
Haryana	4973	0	-412	-412	4375	0	150	-428	-13.91
Rajasthan	6986	0	-27	1582	6070	0	-139	1210	35.56
Delhi	3486	0	-108	-516	2184	0	41	-1167	-16.51
UP	8967	2230	29	-106	8748	750	-129	660	-0.13
Uttarakhand	1458	75	113	235	1107	0	-8	331	7.58
HP	1095	0	41	-396	703	0	-84	60	-1.30
J&K	1575	100	-42	139	1119	0	-79	148	2.74
Chandigarh	191	0	1	-41	103	0	-8	0	-0.29
Total	**33770**	**2405**	**-306**	**644**	**28231**	**750**	**-192**	**1012**	**21.07**

* 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	1888	1792	1880	44.75	1865	43.98	0.77
	Rihand I STPS	1000	691	715	662	15.87	661	15.64	0.23
	Rihand II STPS	1000	850	896	749	18.88	786	19.11	-0.24
	Rihand III STPS	1000	470	498	388	10.77	449	10.80	-0.02
	Dadri I STPS	840	810	794	663	16.25	677	16.47	-0.22
	Dadri II STPS	980	975	986	717	20.63	859	20.80	-0.17
	Unchahar I TPS	420	201	221	180	4.52	188	4.52	0.00
	Unchahar II TPS	420	403	436	357	8.65	361	8.62	0.03
	Unchahar III TPS	210	201	214	155	4.25	177	4.24	0.02
	ISTPP (Jhajjhar)	1500	1480	642	592	14.43	601	14.21	0.22
	Dadri GPS	830	804	558	553	13.27	553	13.34	-0.07
	Anta GPS	419	405	397	384	9.40	392	9.48	-0.07
	Auraiya GPS	663	639	156	158	3.66	153	3.70	-0.03
	Sub Total (A)	**11282**	**9817**	**8305**	**7438**	**185.34**	**7723**	**184.89**	**0.46**
B. NPC	NAPS	440	302	336	342	7.23	301	7.25	-0.02
	RAPS- B	440	409	450	454	9.85	410	9.82	0.03
	RAPS- C	440	423	473	477	10.14	422	10.16	-0.02
	Sub Total (B)	**1320**	**1134**	**1259**	**1273**	**27.21**	**1134**	**27.22**	**-0.01**
C. NHPC	Chamera I HPS	540	539	360	0	2.70	112	2.65	0.05
	Chamera II HPS	300	300	205	0	2.27	95	2.06	0.22
	Chamera III HPS	231	231	70	0	1.20	50	1.15	0.05
	Bairasuil HPS	180	137	0	10	0.84	35	0.73	0.11
	Salal-HPS	690	193	265	198	4.62	193	4.64	-0.02
	Tanakpur-HPS	94	67	66	66	1.56	65	1.60	-0.03
	Uri-HPS	480	158	234	73	3.51	146	3.70	-0.19
	Uri-II HPS	120	85	125	38	2.17	91	2.03	0.14
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	387	406	0	5.67	236	5.61	0.06
	Sewa-II HPS	120	119	77	0	0.36	15	0.35	0.01
	Sub Total (C)	**3425**	**2216**	**1808**	**385**	**24.90**	**1038**	**24.52**	**0.39**
D.NJPC	Nathpa Jhakri	1500	1605	1514	165	13.42	559	13.40	0.02
	Sub Total (D)	1500	1605	1514	165	13.42	559	13.40	0.02
E. THDC	Tehri HPS	1000	1060	1008	0	6.63	276	6.50	0.13
	Koteshwar HPS	400	67	101	100	1.54	64	1.60	-0.06
	Sub Total (E)	**1400**	**1127**	**1109**	**100**	**8.18**	**341**	**8.10**	**0.08**
F. BBMB	Bhakra HPS	1497	488	899	370	12.03	501	11.71	0.32
	Dehar HPS	990	230	470	140	5.52	230	5.53	-0.01
	Pong HPS	396	306	312	312	7.56	315	7.34	0.22
	Sub Total (F)	**2883**	**1024**	**1681**	**822**	**25.11**	**1046**	**24.58**	**0.53**
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	69	27	0.76	32	0.73	0.03
	KWHEP HPS(IPP)	1000	0	889	159	6.72	280	6.80	-0.09
	Malana Stg-II HPS	100	0	107	0	0.41	17	0.38	0.03
	Shree Cement TPS	300	0	261	147	5.78	241	5.68	0.09
	Budhil HPS(IPP)	70	0	10	10	0.28	12	0.30	-0.02
	Sub Total (G)	1662	0	1336	343	13.93	581	13.89	0.04
H. Total Regional Entities (A-G)		**23472**	**16923**	**17012**	**10526**	**298.10**	**12421**	**296.60**	**1.50**

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	840	690	16.94	706
	Guru Nanak Dev TPS(Bhatinda)	440	212	175	3.78	158
	Guru Hargobind Singh TPS(L.mbt)	920	508	497	10.57	440
	Goindwal(GVK)		0	0	0.00	0
	Thermal (Total)	2620	1560	1362	31.29	1304
	Total Hydro	1148	458	425	10.63	443
	Total Punjab	**3768**	**2018**	**1787**	**41.92**	**1747**
Haryana	Panipat TPS	1367	80	293	4.61	192
	DCRTPP (Yamuna nagar)	600	527	502	11.90	496
	Faridabad GPS (NTPC)	432	191	158	4.02	167
	RGTPP (khedar) (IPP)	1200	457	442	10.89	454
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	1113	744	21.64	902
	Thermal (Total)	4944	2368	2139	53.05	2211
	Total Hydro	62	15	14	0.71	30
	Total Haryana	**5006**	**2383**	**2153**	**53.76**	**2240**
Rajasthan	kota TPS	1240	935	917	22.22	926
	suratgarh TPS	1500	885	767	17.37	724
	Chabra TPS	500	221	476	8.93	372
	Dholpur GPS	330	107	101	2.34	98
	Ramgarh GPS	111	100	92	2.58	108
	RAPS A (NPC)	300	179	179	4.01	167
	Barsingsar (NLC)	250	111	112	2.66	111
	Giral LTPS	250	62	62	1.47	61
	Rajwest LTPS (IPP)	1080	0	0	0.00	0
	VSLP LTPS (IPP)	135	0	0	0.00	0
	Kalisindh Thermal	600	0	0	0.00	0
	Kawai(Adani)	660	0	442	6.33	264
	Thermal (Total)	6956	2600	3148	67.91	2830
	Total Hydro	550	143	118	2.55	106
	Wind power	2191	216	239	4.76	198
	Biomass	91	29	29	0.70	29
	Solar	201	0	0	0.54	23
	Renewable/Others (Total)	2483	245	268	5.99	250
	Total Rajasthan	**9989**	**2988**	**3534**	**76.45**	**3186**
UP	Anpara TPS	1630	1387	1386	33.00	1375
	Obra TPS	1288	474	477	11.30	471
	Paricha TPS	1140	662	660	16.00	667
	Panki TPS	210	77	63	1.70	71
	Harduaganj TPS	665	445	417	9.70	404
	Tanda TPS (NTPC)	440	191	296	6.72	280
	Roza TPS (IPP)	1200	915	899	24.04	1001
	Anpara-C (IPP)	1200	528	491	12.52	522
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	280	286	7.71	321
	Thermal (Total)	8223	4959	4975	122.68	5112
	Vishnuparyag HPS (IPP)	400	0	0	0.00	0
	Other Hydro	527	108	165	3.09	129
	Cogeneration	981	50	50	1.20	50
	Total UP	**10131**	**5117**	**5190**	**126.97**	**5291**
Uttarakhand	Total Hydro	1303	571	482	12.04	502
	Total Uttarakhand	**1303**	**571**	**482**	**12.04**	**502**
Delhi	Rajghat TPS	135	97	100	2.30	96
	Delhi Gas Turbine	282	82	118	2.46	103
	Pragati Gas Turbine	330	261	262	6.38	266
	Rithala GPS	95	0	0	0.00	0
	Bawana GPS	686	0	0	0.00	0
	Badarpur TPS (NTPC)	705	405	400	8.91	371
	Thermal (Total)	2232	845	880	20.05	835
	Total Delhi	**2232**	**845**	**880**	**20.05**	**835**
HP	Baspa HPS (IPP)	330	65	97	2.38	99
	Malana HPS (IPP)	86	86	0	0.44	18
	Other Hydro	589	30	309	7.24	302
	Total HP	**1005**	**181**	**406**	**10.06**	**419**
J & K	Baglihar HPS (IPP)	450	242	138	5.00	208
	Other Hydro	323	100	128	2.57	107
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	**956**	**342**	**266**	**7.57**	315
Total State Control Area Generation		**34390**	**14445**	**14698**	**348.83**	**14535**
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			**2384.2**	**3999**	**102.79**	**4283**
Total Regional Availability(Gross)		**57862**	**33842**	**29223**	**749.72**	**31238**

IV. Total Hydro Generation:

Regional Entities Hydro	**10500**	**7177**	**1658**	**79.49**	**3312**
State Control Area Hydro	**5368**	**1818**	**1876**	**46.66**	**1944**
Total Regional Hydro	**15868**	**8995**	**3534**	**126.14**	**5256**

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	50	-300	50	300	0.80	2.12	-1.32
Gwalior-Agra (D/C)	930	1218	1648	0	27.19	0.00	27.19
Zerda-Kankroli	70	-177	93	221	0.00	1.61	-1.61
Zerda-Bhinmal	170	-79	230	157	0.95	0.00	0.95
Malanpur-Auraiya	-85	-68	0	95	0.00	1.40	-1.40
Badod-Kota/Morak	21	-117	21	157	0.00	1.86	-1.86
Mundra-Mohindergarh(HVDC)	15	1499	1504	0	35.78	0.00	35.78
Sub Total WR	**1171**	**1976**			**64.71**	**6.99**	**57.73**
Pusauli Bypass	-200	-200	0	200	0.00	4.85	-4.85
MZP- GKP (D/C)	469	788	880	0	17.64	0.00	17.64
Patna-Balia(D/C)	409	521	619	0	11.71	0.00	11.71
B'Sharif-Balia (D/C)	334	434	568	0	10.07	0.00	10.07
Pusauli-Balia	48	93	146	0	2.03	0.00	2.03
Gaya-Fatehpur (765 Kv)	60	293	372	0	6.45	0.00	6.45
Pusauli-Sahupuri	129	129	130	0	2.86	0.00	2.86
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-36	-35	0	36	0.00	0.85	-0.85
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	0	0	0		0.00	0.00	0.00
Sub Total ER	**1213**	**2023**			**50.76**	**5.70**	**45.06**
Total IR Exch	**2384**	**3999**			**115.47**	**12.69**	**102.79**

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
33.09	2.80	35.89	8.20	-9.17	2.76	8.15	0.94	-0.94

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
47.79	56.05	103.84	45.06	57.73	102.79	-2.73	1.68	-1.05

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	2.80	99.70	8.50	96.90	31.60	0.30

<---------- 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)
50.42	17.05	49.65	20.47	50.05	0.17	0.12	50.24	0.00

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	411	23:48	403	15:05	0.0	0.0	0.0	0.0
Gorakhpur	400	0	00:00	9999	00:00	0.0	0.0	0.0	0.0
Bareilly	400	420	20:42	389	11:36	0.0	0.1	0.0	0.0
Kanpur	400	418	20:00	403	18:20	0.0	0.0	0.0	0.0
Dadri	400	419	21:52	401	14:45	0.0	0.0	0.0	0.0
Ballabhgarh	400	425	23:45	406	14:45	0.0	0.0	31.0	0.0
Bawana	400	423	23:46	403	14:45	0.0	0.0	14.4	0.0
Bassi	400	425	20:41	404	14:43	0.0	0.0	7.7	0.0
Hissar	400	414	23:45	394	14:43	0.0	0.0	0.0	0.0
Moga	400	405	10:35	405	10:35	0.0	0.0	0.0	0.0
Abdullapur	400	0	00:00	9999	00:00	0.0	0.0	0.0	0.0
Nalagarh	400	426	21:56	402	14:44	0.0	0.0	20.6	0.0
Kishenpur	400	424	23:46	401	18:19	0.0	0.0	6.8	0.0
Wagoora	400	415	17:17	384	18:23	0.0	8.8	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	768	20:02	727	14:45	0.4	26.6	0.0	0.0
Balia	765	768	20:02	725	15:36	0.9	17.5	0.0	0.0
Moga	765	793	23:45	754	14:45	0.0	0.0	0.0	0.0
Agra	765	808	20:01	761	14:49	0.0	0.0	10.0	0.0
Bhiwani	765	802	23:46	764	14:45	0.0	0.0	2.0	0.0
Unnao	765	763	20:01	731	15:05	0.0	16.7	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	511.08	1605.30	503.14	NA	276.97	299.03
Pong	426.72	384.05	421.10	946.20	420.70	916.71	71.56	425.38
Tehri	829.79	740.04	824.55	1107.95	818.65	982.26	96.13	144.00
Koteshwar	612.50	598.50	611.05	5.10	NA	NA	144.00	102.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	84.37	72.94
Rihand	268.22	252.98	261.76	404.60	263.65	522.00	NA	196.65
RPS	352.80	343.81	352.74	NA	NA	NA	NA	143.51
Jawahar Sagar	298.70	295.78	297.85	NA	NA	NA	NA	117.20
RSD	527.91	487.91	518.34	144.00	520.66	144.00	89.40	137.11

*** NA: Not Available**

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 23.10.2013 :
1. Normal weather in NR.

XIII. Synchronisation of new generating units :
0.00

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 :
Vishnuprayag (400MW) and Dhauliganga (280MW) are out of operation since 16.06.2013.
Civil construction is in progress for rectification of the major damages in Plants/Dam caused due to flood
Vishnuprayag and Dhauliganga expected by Mar, 2014 .

Report for : 23.10.2013 **पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER**