पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)

उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 16.02.2014
Date of Reporting : 17.02.2014

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
33283	1277	34560	50.11	26942	0	26942	50.24	747.5	26.19

* 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	41.80	8.93		50.73	35.68	37.71	2.02	88.44	0.00
Haryana	34.40	0.50		34.90	60.23	58.11	-2.11	93.02	0.00
Rajasthan	94.03	4.98	4.69	103.70	85.69	83.97	-1.71	187.67	0.00
Delhi	19.92			19.92	41.79	40.19	-1.60	60.11	0.00
UP	119.09	2.82	16.80	138.71	86.07	84.74	-1.33	223.45	23.77
Uttarakhand		8.90		8.90	21.60	22.76	1.17	31.66	0.30
HP		5.17		5.17	16.64	15.82	-0.82	20.99	0.42
J & K		6.10	0.00	6.10	33.74	32.76	-0.98	38.86	1.70
Chandigarh				0.00	3.14	3.30	0.15	3.30	0.00
Total	**309.24**	**37.41**	**21.49**	**368.14**	**384.58**	**379.36**	**-5.22**	**747.50**	**26.19**

*** 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 (19:00 Hrs) MW				Off Peak (03:00 Hrs) MW				Day Energy MU
	Demand Met	Shortage	UI	STOA/PX transactio	Demand Met	Shortage	UI	STOA/PX transaction	STOA/PX transaction
Punjab	4453	0	146	-298	3017	0	135	18	-6.84
Haryana	4614	0	-333	-130	3141	0	66	-194	-9.47
Rajasthan	7660	0	-174	934	6787	0	75	1078	39.39
Delhi	3070	0	1	-930	1467	0	-42	-1525	-26.92
UP	9154	1095	-195	413	9105	0	-45	470	6.95
Uttarakhand	1535	40	97	515	1124	0	76	417	10.53
HP	965	42	-57	153	666	0	-8	334	6.62
J&K	1660	100	-60	533	1544	0	-125	719	12.43
Chandigarh	172	0	-6	0	91	0	-2	0	0.00
Total	**33283**	**1277**	**-580**	**1190**	**26942**	**0**	**130**	**1315**	**32.69**

* 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	1753	2017	1775	41.16	1715	41.59	-0.43
	Rihand I STPS	1000	945	1003	741	20.92	871	21.05	-0.14
	Rihand II STPS	1000	975	1005	830	21.43	893	21.90	-0.47
	Rihand III STPS	1000	421	500	466	8.48	353	9.59	-1.11
	Dadri I STPS	840	815	832	615	16.95	706	17.57	-0.62
	Dadri II STPS	980	985	962	728	20.47	853	21.26	-0.79
	Unchahar I TPS	420	408	314	314	8.31	346	8.43	-0.12
	Unchahar II TPS	420	405	308	316	7.93	331	8.06	-0.13
	Unchahar III TPS	210	202	154	154	3.98	166	4.03	-0.05
	ISTPP (Jhajjhar)	1500	1500	711	646	14.34	597	14.44	-0.11
	Dadri GPS	830	843	335	427	8.61	359	8.93	-0.32
	Anta GPS	419	423	230	256	6.31	263	6.39	-0.08
	Auraiya GPS	663	673	139	163	3.66	153	3.69	-0.03
	Sub Total (A)	**11282**	**10349**	**8509.79**	**7431.31**	**182.54**	**7606**	**186.94**	**-4.40**
B. NPC	NAPS	440	298	333	338	7.18	299	7.15	0.03
	RAPS- B	440	410	439	462	9.81	409	9.84	-0.03
	RAPS- C	440	430	471	475	10.27	428	10.32	-0.05
	Sub Total (B)	**1320**	**1138**	**1243**	**1275**	**27.26**	**1136**	**27.31**	**-0.05**
C. NHPC	Chamera I HPS	540	540	540	0	2.59	108	2.60	-0.01
	Chamera II HPS	300	200	204	0	1.16	48	1.06	0.10
	Chamera III HPS	231	154	151	0	0.61	25	0.60	0.01
	Bairasuil HPS	180	154	120	0	1.06	44	1.01	0.05
	Salal-HPS	690	145	230	65	3.23	135	3.27	-0.04
	Tanakpur-HPS	94	0	0	0	0.00	0	0.00	0.00
	Uri-HPS	480	220	376	398	5.03	209	4.97	0.06
	Uri-II HPS	180	120	123	123	2.94	123	2.88	0.06
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	258	268	0	2.91	121	2.89	0.02
	Sewa-II HPS	120	119	124	0	1.32	55	1.32	0.00
	Sub Total (C)	**3485**	**1910**	**2136**	**586**	**20.85**	**869**	**20.59**	**0.25**
D.NJPC	Nathpa Jhakri	1500	1605	1150	0	6.82	284	6.74	0.08
	Sub Total (D)	1500	1605	1150	0	6.82	284	6.74	0.08
E. THDC	Tehri HPS	1000	878	909	0	7.12	297	7.10	0.02
	Koteshwar HPS	400	116	301	0	2.82	118	2.80	0.02
	Sub Total (E)	**1400**	**994**	**1210**	**0**	**9.95**	**414**	**9.90**	**0.05**
F. BBMB	Bhakra HPS	1497	654	1155	390	16.01	667	15.69	0.32
	Dehar HPS	990	134	390	0	3.38	141	3.22	0.16
	Pong HPS	396	185	312	66	4.71	196	4.45	0.26
	Sub Total (F)	**2883**	**973**	**1857**	**456**	**24.10**	**1004**	**23.36**	**0.74**
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	0	0	0.36	15	0.35	0.01
	KWHEP HPS(IPP)	1000	0	0	0	3.59	150	3.36	0.22
	Malana Stg-II HPS	100	0	0	0	0.03	1	0.04	-0.02
	Shree Cement TPS	300	0	262	142	5.06	211	5.19	-0.12
	Budhil HPS(IPP)	70	0	8	0	0.12	5	0.17	-0.06
	Sub Total (G)	1662	0	270	142	9.16	381	9.11	0.04
H. Total Regional Entities (A-G)		**23532**	**16970**	**16376**	**9890**	**280.67**	**11694**	**283.96**	**-3.30**

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	600	600	13.89	579
	Guru Nanak Dev TPS(Bhatinda)	440	0	0	0.00	0
	Guru Hargobind Singh TPS(L.mbt)	920	834	693	16.19	675
	Goindwal(GVK)		0	0	0.00	0
	Rajpura	700	658	282	11.73	489
	Talwandi Saboo	660	0	0	0.00	0
	Thermal (Total)	3980	2092	1575	41.80	1742
	Total Hydro	1148	353	340	8.93	372
	Total Punjab	**5128**	**2445**	**1915**	**50.73**	**2114**
Haryana	Panipat TPS	1367	226	214	5.18	216
	DCRTPP (Yamuna nagar)	600	560	511	12.63	526
	Faridabad GPS (NTPC)	432	181	174	4.85	202
	RGTPP (khedar) (IPP)	1200	0	0	0.00	0
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	546	382	11.75	489
	Thermal (Total)	4944	1513	1281	34.40	1433
	Total Hydro	62	18	22	0.50	21
	Total Haryana	**5006**	**1531**	**1303**	**34.90**	**1454**
Rajasthan	kota TPS	1240	1090	1097	26.73	1114
	suratgarh TPS	1500	1238	1239	30.84	1285
	Chabra TPS	750	385	331	9.31	388
	Dholpur GPS	330	113	114	2.82	117
	Ramgarh GPS	221	113	113	3.08	128
	RAPS A (NPC)	300	175	175	4.36	182
	Barsingsar (NLC)	250	210	210	4.96	207
	Giral LTPS	250	77	77	1.45	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)	1320	0	0	10.49	437
	Thermal (Total)	7976	3401	3356	94.03	3918
	Total Hydro	550	246	107	4.98	207
	Wind power	2191	83	218	3.42	143
	Biomass	91	28	28	0.67	28
	Solar	201	6	0	0.60	25
	Renewable/Others (Total)	2483	111	246	4.69	196
	Total Rajasthan	**11009**	**3758**	**3709**	**103.70**	**4321**
UP	Anpara TPS	1630	1124	1137	24.30	1013
	Obra TPS	1288	532	512	11.40	475
	Paricha TPS	1140	781	968	20.00	833
	Panki TPS	210	60	65	1.30	54
	Harduaganj TPS	665	422	422	9.20	383
	Tanda TPS (NTPC)	440	340	324	8.84	368
	Roza TPS (IPP)	1200	756	810	19.42	809
	Anpara-C (IPP)	1200	695	865	20.21	842
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	196	194	4.41	184
	Thermal (Total)	8223	4906	5297	119.09	4962
	Vishnuparyag HPS (IPP)	400	0	0	0.00	0
	Other Hydro	527	174	80	2.82	118
	Cogeneration	981	700	700	16.80	700
	Total UP	**10131**	**5780**	**6077**	**138.71**	**5780**
Uttarakhand	Total Hydro	1303	390	245	8.90	371
	Total Uttarakhand	**1303**	**390**	**245**	**8.90**	**371**
Delhi	Rajghat TPS	135	0	0	0.00	0
	Delhi Gas Turbine	282	115	116	2.78	116
	Pragati Gas Turbine	330	318	268	7.03	293
	Rithala GPS	95	0	0	0.00	0
	Bawana GPS	686	0	0	0.04	2
	Badarpur TPS (NTPC)	705	515	435	10.07	420
	Thermal (Total)	2232	948	819	19.92	830
	Total Delhi	**2232**	**948**	**819**	**19.92**	**830**
HP	Baspa HPS (IPP)	330	60	0	0.94	39
	Malana HPS (IPP)	86	0	0	0.15	6
	Other Hydro	589	177	132	4.07	170
	Total HP	**1005**	**237**	**132**	**5.17**	**215**
J & K	Baglihar HPS (IPP)	450	150	118	3.40	142
	Other Hydro	323	88	130	2.70	113
	Gas/Diesel/Others	183	0	0	0.00	0
	Total J & K	**956**	**238**	**248**	**6.10**	254
Total State Control Area Generation		**36770**	**15327**	**14448**	**368.14**	**15339**
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			**5321**	**3893**	**111.15**	**4631**
Total Regional Availability(Gross)		**60303**	**37024**	**28231**	**759.95**	**31665**

IV. Total Hydro Generation:

Regional Entities Hydro	**10560**	**6353**	**1042**	**65.68**	**2737**
State Control Area Hydro	**5368**	**1656**	**1174**	**37.41**	**1559**
Total Regional Hydro	**15928**	**8009**	**2216**	**103.09**	**4295**

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
	MW	MW	Import	Export	Import	Export	MU
Vindhychal B/B	400	-100	500	500	8.18	0.17	8.01
Gwalior-Agra (D/C)	1388	1376	2051	0	29.36	0.00	29.36
Zerda-Kankroli	25	-185	46	255	0.00	1.83	-1.83
Zerda-Bhinmal	147	-48	250	126	1.74	0.00	1.74
Malanpur-Auraiya	-64	-74	0	132	0.00	2.07	-2.07
Badod-Kota/Morak	-13	-31	73	112	0.00	0.53	-0.53
Mundra-Mohindergarh(HVDC)	1997	1499	2007	0	44.69	0.00	44.69
Sub Total WR	**3880**	**2437**			**83.96**	**4.59**	**79.36**
Pusauli Bypass	300	300	300	0	7.28	0.00	7.28
MZP- GKP (D/C)	157	229	329	0	5.18	0.00	5.18
Patna-Balia(D/C)	426	486	560	0	10.58	0.00	10.58
B'Sharif-Balia (D/C)	255	294	346	0	5.80	0.00	5.80
Pusauli-Balia	97	-68	0	130	0.00	2.21	-2.21
Gaya-Fatehpur (765 Kv)	-6	6	188	87	0.00	0.90	-0.90
Pusauli-Sahupuri	165	172	179	0	3.86	0.00	3.86
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-31	-28	0	34	0.00	0.65	-0.65
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	78	65	307	44	2.84	0.00	2.84
Sub Total ER	**1441**	**1456**			**35.55**	**3.76**	**31.79**
Total IR Exch	**5321**	**3893**			**119.51**	**8.36**	**111.15**

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
31.69	0.11	31.79	13.60	2.79	5.60	5.75	0.07	-0.07

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
51.06	68.92	119.98	31.79	79.36	111.15	-19.27	10.45	-8.83

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	81.40	1.20	81.40	76.50	18.60

<---------- 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)
50.53	18.02	49.71	9.09	50.09	0.23	0.12	50.39	49.93

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	415	03:28	401	10:32	0.0	0.0	0.0	0.0
Gorakhpur	400	427	07:42	409	19:18	0.0	0.0	49.2	0.0
Bareilly	400	426	03:22	412	06:42	0.0	0.0	64.5	0.0
Kanpur	400	421	03:19	401	09:05	0.0	0.0	5.4	0.0
Dadri	400	428	23:59	409	09:34	0.0	0.0	47.8	0.0
Ballabhgarh	400	435	03:39	414	09:05	0.0	0.0	80.4	31.8
Bawana	400	431	03:59	411	09:34	0.0	0.0	65.7	0.4
Bassi	400	428	04:05	394	08:50	0.0	0.0	47.2	0.0
Hissar	400	421	03:54	397	09:42	0.0	0.0	0.6	0.0
Moga	400	421	04:01	397	09:34	0.0	0.0	0.1	0.0
Abdullapur	400	428	23:59	398	18:43	0.0	0.0	19.5	0.0
Nalagarh	400	427	00:52	414	05:53	0.0	0.0	74.9	0.0
Kishenpur	400	417	03:59	390	18:42	0.0	0.0	0.0	0.0
Wagoora	400	404	05:01	369	19:14	16.4	46.2	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	771	03:20	747	05:52	0.0	0.0	0.0	0.0
Balia	765	782	04:01	747	09:20	0.0	0.0	0.0	0.0
Moga	765	800	23:59	755	09:41	0.0	0.0	0.0	0.0
Agra	765	816	04:02	747	07:32	0.0	0.0	58.6	0.0
Bhiwani	765	814	23:59	773	09:34	0.0	0.0	46.7	0.0
Unnao	765	765	03:31	728	09:34	0.0	23.8	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	492.03	848.04	486.93	644.48	162.77	489.46
Pong	426.72	384.05	407.10	407.15	405.49	352.07	94.83	269.80
Tehri	829.79	740.04	796.30	544.69	818.65	982.26	66.94	185.00
Koteshwar	612.50	598.50	610.40	4.69	610.00	4.69	185.00	188.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	59.52	69.18
Rihand	268.22	252.98	259.84	296.30	259.78	292.90	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	508.74	148.00	510.66	150.00	99.99	116.98

*** NA: Not Available**

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 16.02.2014 :
Normal weather in NR.

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 :
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 : 16.02.2014 **पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER**