पॉवर सिस्टम ऑपरेशन कार्पोरेशन लिमिटेड

(पावरग्रिड की पूर्ण स्वामित्व प्राप्त सहायक कंपनी)

उत्तरी क्षेत्रीय भार प्रेषण केंद्र

Power Supply Position in Northern Region for 22.04.2014
Date of Reporting : 23.04.2014

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
33947	2440	36387	50.11	30008	1705	31713	50.10	759.5	36.82

* 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	36.22	7.12		43.34	53.96	54.60	0.64	97.94	0.00
Haryana	47.39	0.52		47.91	55.46	54.14	-1.32	102.06	0.00
Rajasthan	104.11	0.00	3.62	107.73	37.56	36.57	-0.99	144.30	0.00
Delhi	18.31			18.31	55.03	55.37	0.33	73.68	0.24
UP	127.58	5.26	9.10	141.93	108.81	109.93	1.12	251.86	33.49
Uttarakhand		8.92		8.92	21.49	22.96	1.47	31.88	1.34
HP		11.58		11.58	11.53	12.64	1.11	24.22	0.05
J & K		13.63	0.00	13.63	18.43	16.13	-2.31	29.76	1.70
Chandigarh				0.00	3.33	3.84	0.51	3.84	0.00
Total	**333.60**	**47.02**	**12.72**	**393.35**	**365.60**	**366.18**	**0.58**	**759.53**	**36.82**

*** 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 transactio	Demand Met	Shortage	UI	STOA/PX transaction	STOA/PX transaction
Punjab	4653	0	3	-164	3811	0	40	-166	-5.02
Haryana	4964	0	-152	308	3970	0	-132	317	6.67
Rajasthan	5400	0	5	-66	5566	0	-126	-267	0.55
Delhi	3511	0	-81	-279	2458	0	-41	-693	-9.61
UP	11089	2195	341	624	11013	1635	349	1146	17.30
Uttarakhand	1547	145	177	385	1130	70	62	321	9.14
HP	1094	0	11	-375	820	0	57	-45	-3.74
J&K	1493	100	-63	-227	1133	0	-96	-232	-5.53
Chandigarh	197	0	9	0	108	0	-5	0	0.00
Total	**33947**	**2440**	**249**	**206**	**30008**	**1705**	**108**	**381**	**9.75**

* 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	1735	1780	1865	41.22	1717	40.90	0.32
	Rihand I STPS	1000	866	945	915	20.73	864	20.44	0.29
	Rihand II STPS	1000	863	965	825	20.01	834	19.67	0.34
	Rihand III STPS	1000	790	692	883	18.17	757	18.10	0.08
	Dadri I STPS	840	811	814	829	17.50	729	18.10	-0.60
	Dadri II STPS	980	473	460	372	9.85	410	10.23	-0.38
	Unchahar I TPS	420	408	405	401	8.84	368	9.61	-0.78
	Unchahar II TPS	420	204	200	195	4.38	183	4.70	-0.32
	Unchahar III TPS	210	204	205	187	4.28	178	4.66	-0.39
	ISTPP (Jhajjhar)	1500	1000	62	319	7.81	325	8.01	-0.20
	Dadri GPS	830	805	166	182	4.15	173	4.35	-0.20
	Anta GPS	419	396	200	197	5.03	210	5.01	0.02
	Auraiya GPS	663	648	148	151	3.44	143	3.48	-0.05
	Dadri Solar	5		0	0	0.00	0		0.00
	Unchahar Solar	10		0	0	0.03	1		0.03
	Sub Total (A)	**11297**	**9203**	**7042**	**7321**	**165**	**6893**	**167**	**-2**
B. NPC	NAPS	440	292	324	332	6.83	284	6.00	0.83
	RAPS- B	440	410	402	400	9.16	382	9.84	-0.68
	RAPS- C	440	420	462	406	9.98	416	10.08	-0.10
	Sub Total (B)	**1320**	**1122**	**1188**	**1138**	**25.97**	**1082**	**25.92**	**0.05**
C. NHPC	Chamera I HPS	540	540	540	0	8.53	355	8.50	0.03
	Chamera II HPS	300	300	203	0	3.18	132	3.13	0.05
	Chamera III HPS	231	231	225	0	1.84	77	1.80	0.04
	Bairasuil HPS	180	122	122	122	2.94	122	2.93	0.01
	Salal-HPS	690	422	493	460	10.46	436	10.14	0.32
	Tanakpur-HPS	94	21	31	18	0.54	22	0.50	0.04
	Uri-HPS	480	475	475	471	11.52	480	11.40	0.12
	Uri-II HPS	240	180	185	191	4.46	186	4.32	0.14
	Dhauliganga-HPS	280	0	0	0	0.00	0	0.00	0.00
	Dulhasti-HPS	390	290	403	0	5.04	210	4.80	0.24
	Sewa-II HPS	120	122	126	130	3.07	128	2.93	0.14
	Parbati 3	390	257	0	0	0.95	40	0.90	0.05
	Sub Total ©	**3935**	**2960**	**2803**	**1392**	**53**	**2188**	**51**	**1**
D.SJVNL	NJPC	1500	1605	756	164	9.60	400	9.45	0.15
	Rampur HEP	206		0	0	0.75	31		0.75
	Sub Total (D)	1706	1605	756	164	10.34	431	9.45	0.89
E. THDC	Tehri HPS	1000	510	519	0	8.09	337	8.00	0.08
	Koteshwar HPS	400	168	301	0	3.70	154	3.60	0.10
	Sub Total (E)	**1400**	**678**	**820**	**0**	**11.78**	**491**	**11.60**	**0.18**
F. BBMB	Bhakra HPS	1514	276	281	280	6.72	280	6.62	0.10
	Dehar HPS	990	331	495	280	8.47	353	7.95	0.53
	Pong HPS	396	11	62	0	0.30	13	0.26	0.05
	Sub Total (F)	**2900**	**618**	**838**	**560**	**15.49**	**645**	**14.82**	**0.67**
G. IPP(s)/JV(s)	ADHPL HPS(IPP)	192	0	332	0	0.49	21	0.48	0.01
	KWHEP HPS(IPP)	1000	0	525	150	4.73	197	4.73	0.00
	Malana Stg-II HPS	100	0	0	0	0.29	12	0.27	0.02
	Shree Cement TPS	300	0	285	284	6.96	290	6.96	0.00
	Budhil HPS(IPP)	70	0	0	0	0.00	0	0.91	-0.91
	Sub Total (G)	1662	0	1142	434	12.47	520	13.35	-0.88
H. Total Regional Entities (A-G)		**24221**	**16185**	**14589**	**11009**	**293.98**	**12249**	**293.74**	**0.24**

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	630	450	11.68	487
	Guru Nanak Dev TPS(Bhatinda)	440	120	90	2.25	94
	Guru Hargobind Singh TPS(L.mbt)	920	422	312	8.70	363
	Goindwal(GVK)		0	0	0.00	0
	Rajpura	700	626	654	13.58	566
	Talwandi Saboo	660	0	0	0.00	0
	Thermal (Total)	3980	1798	1506	36.22	1509
	Total Hydro	1148	405	206	7.12	297
	Total Punjab	**5128**	**2203**	**1712**	**43.34**	**1806**
Haryana	Panipat TPS	1367	410	391	9.45	394
	DCRTPP (Yamuna nagar)	600	538	511	12.36	515
	Faridabad GPS (NTPC)	432	150	190	4.12	172
	RGTPP (khedar) (IPP)	1200	593	505	12.66	528
	Magnum Diesel (IPP)	25	0	0	0.00	0
	Jhajjar(CLP)	1320	613	11	8.81	367
	Thermal (Total)	4944	2304	1608	47.39	1975
	Total Hydro	62	23	21	0.52	22
	Total Haryana	**5006**	**2327**	**1629**	**47.91**	**1996**
Rajasthan	kota TPS	1240	1152	1138	26.07	1086
	suratgarh TPS	1500	1082	1057	24.99	1041
	Chabra TPS	750	360	405	9.26	386
	Dholpur GPS	330	131	134	3.30	137
	Ramgarh GPS	221	39	13	1.52	63
	RAPS A (NPC)	300	175	175	4.11	171
	Barsingsar (NLC)	250	60	84	1.51	63
	Giral LTPS	250	44	44	1.46	61
	Rajwest LTPS (IPP)	1080	636	778	18.92	788
	VSLP LTPS (IPP)	135	0	0	0.00	0
	Kalisindh Thermal	600	0	0	0.00	0
	Kawai(Adani)	1320	488	489	12.97	540
	Thermal (Total)	7976	4167	4317	104.11	4338
	Total Hydro	550	0	0	0.00	0
	Wind power	2746	49	133	2.80	117
	Biomass	99	32	32	0.76	32
	Solar	692	0	0	0.06	2
	Renewable/Others (Total)	3537	81	165	3.62	151
	Total Rajasthan	**12063**	**4248**	**4482**	**107.73**	**4489**
UP	Anpara TPS	1630	1330	1207	29.73	1239
	Obra TPS	1194	410	366	9.43	393
	Paricha TPS	1140	761	604	14.92	622
	Panki TPS	210	72	63	1.63	68
	Harduaganj TPS	665	369	369	8.83	368
	Tanda TPS (NTPC)	440	273	186	5.58	232
	Roza TPS (IPP)	1200	1125	1118	27.08	1128
	Anpara-C (IPP)	1200	888	884	21.10	879
	Bajaj Energy Pvt.Ltd(IPP) TPS	450	402	401	9.28	387
	Thermal (Total)	8129	5630	5198	127.58	5316
	Vishnuparyag HPS (IPP)	400	83	83	2.08	87
	Other Hydro	527	149	152	3.18	132
	Cogeneration	1133	380	380	9.10	379
	Total UP	**10189**	**6242**	**5813**	**141.93**	**5827**
Uttarakhand	Total Hydro	1398	418	335	8.92	372
	Total Uttarakhand	**1398**	**418**	**335**	**8.92**	**372**
Delhi	Rajghat TPS	135	109	109	2.53	105
	Delhi Gas Turbine	282	114	119	2.76	115
	Pragati Gas Turbine	330	96	100	2.34	97
	Rithala GPS	95	0	0	0.00	0
	Bawana GPS	1370	0	0	0.00	0
	Badarpur TPS (NTPC)	705	495	510	10.69	446
	Thermal (Total)	2917	814	838	18.31	763
	Total Delhi	**2917**	**814**	**838**	**18.31**	**763**
HP	Baspa HPS (IPP)	300	70	0	1.19	50
	Malana HPS (IPP)	86	61	0	0.39	16
	Other Hydro	728	456	380	9.99	416
	Total HP	**1114**	**587**	**380**	**11.58**	**482**
J & K	Baglihar HPS (IPP)	450	438	436	10.49	437
	Other Hydro/IPP	436	132	128	3.14	131
	Gas/Diesel/Others	209	0	0	0.00	0
	Total J & K	**1094**	**570**	**564**	**13.63**	568
Total State Control Area Generation		**38909**	**17409**	**15753**	**393.35**	**16303**
J. Net Inter Regional Exchange [Import (+ve)/Export (-ve)]			**2820**	**4292**	**90.12**	**3755**
Total Regional Availability(Gross)		**63130**	**34818**	**31054**	**777.45**	**32307**

IV. Total Hydro Generation:

Regional Entities Hydro	**11233**	**6074**	**2266**	**95.63**	**3985**
State Control Area Hydro	**5684**	**2152**	**1658**	**47.02**	**1873**
Total Regional Hydro	**16918**	**8226**	**3924**	**142.65**	**5857**

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	200	500	500	0	7.56	0.00	7.56
Gwalior-Agra (D/C)	1139	1856	1983	0	36.31	0.00	36.31
Zerda-Kankroli	-304	-305	0	416	0.00	7.69	-7.69
Zerda-Bhinmal	-232	-255	0	381	0.00	5.89	-5.89
Malanpur-Auraiya	-69	-15	0	84	0.00	0.79	-0.79
Badod-Kota/Morak	-222	-238	0	304	0.00	5.38	-5.38
Mundra-Mohindergarh(HVDC)	1912	1911	1913	0	46.27	0.00	46.27
Sub Total WR	**2424**	**3454**			**90.14**	**19.74**	**70.40**
Pusauli Bypass	400	300	400	0	8.36	0.00	8.36
MZP- GKP (D/C)	-74	164	260	74	2.84	0.00	2.84
Patna-Balia(D/C)	228	291	399	0	7.35	0.00	7.35
B'Sharif-Balia (D/C)	57	137	227	0	2.40	0.00	2.40
Pusauli-Balia	-145	-99	0	145	0.00	2.73	-2.73
Gaya-Fatehpur (765 Kv)	-117	-50	53	194	0.00	1.07	-1.07
Pusauli-Sahupuri	162	166	176	0	3.64	0.00	3.64
K'nasa-Sahupuri	0	0	0	0	0.00	0.00	0.00
Son Ngr-Rihand	-28	-30	0	32	0.00	0.64	-0.64
Garhwa-Rihand	0	0	0	0	0.00	0.00	0.00
Sasaram - Fatehpur(765 KV)	-87	-41	99	185	0.00	0.42	-0.42
Sub Total ER	**396**	**838**			**24.58**	**4.86**	**19.72**
Total IR Exch	**2820**	**4292**			**114.72**	**24.60**	**90.12**

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
34.92	0.18	35.10	3.27	-0.02	-7.93	2.88	0.00	0.00

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
30.44	54.77	85.21	19.72	70.40	90.12	-10.72	15.63	4.91

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

<49.2	<49.7	<49.8	<49.9	<50.0	49.9-50.05	50.05-50.10	>50.10	>50.20	>50.50
0.00	0.07	3.81	26.09	66.06	57.33	11.19	5.38	0.22	0.00

<---------- 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)
50.24	17.02	49.69	1.10	49.96	0.10	0.09	50.16	49.86

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	404	03:56	399	23:02	0.0	0.0	0.0	0.0
Gorakhpur	400	434	13:03	410	21:17	0.0	0.0	64.3	6.2
Bareilly	400	417	02:48	404	05:41	0.0	0.0	0.0	0.0
Kanpur	400	417	02:47	404	11:12	0.0	0.0	0.0	0.0
Dadri	400	420	02:22	403	14:13	0.0	0.0	0.0	0.0
Ballabhgarh	400	429	03:01	411	14:20	0.0	0.0	51.8	0.0
Bawana	400	426	02:48	410	14:20	0.0	0.0	27.1	0.0
Bassi	400	432	02:48	412	11:20	0.0	0.0	68.0	6.3
Hissar	400	417	02:48	401	19:14	0.0	0.0	0.0	0.0
Moga	400	420	02:48	401	19:14	0.0	0.0	0.0	0.0
Abdullapur	400	427	13:00	409	19:13	0.0	0.0	39.4	0.0
Nalagarh	400	428	02:52	409	19:15	0.0	0.0	27.1	0.0
Kishenpur	400	422	02:48	402	19:12	0.0	0.0	5.3	0.0
Wagoora	400	412	03:01	387	07:09	0.0	1.0	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	771	03:57	746	11:11	0.0	0.0	0.0	0.0
Balia	765	768	13:03	737	21:41	0.0	7.9	0.0	0.0
Moga	765	798	02:54	764	19:15	0.0	0.0	0.0	0.0
Agra	765	804	20:30	768	11:17	0.0	0.0	1.8	0.0
Bhiwani	765	0	00:00	9999	00:00	0.0	0.0	0.0	0.0
Unnao	765	760	08:01	742	11:11	0.0	0.0	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	482.85	527.87	479.45	447.73	306.95	222.15
Pong	426.72	384.05	402.41	273.51	400.34	223.85	83.25	20.08
Tehri	829.79	740.04	763.85	154.42	818.65	982.26	82.39	244.00
Koteshwar	612.50	598.50	610.98	4.95	601.50	0.98	244.00	243.00
Chamera-I	760.00	748.75	NA	NA	NA	NA	206.25	230.88
Rihand	268.22	252.98	NA	NA	257.13	163.30	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	516.64	144.00	506.65	144.00	224.47	197.51

*** NA: Not Available**

X. System Constraints:

XI. Grid Disturbance / Any Other Significant Event:

XII. Weather Conditions For 22.04.2014 :
Normal

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 :
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
Dhauliganga expected by April, 2014 .

Report for : 22.04.2014 **पारी प्रभारी अभियंता / SHIFT CHARGE ENGINEER**