



# **DELHI TRANSCO LIMITED.**

**(A Govt. of NCT of Delhi Undertaking)**

## **STATE LOAD DESPATCH CENTER**

**REGD. OFFICE : SHAKTI SADAN, KOTLA MARG, NEW DELHI-110002**

**SLDC Building, 33kV Minto Road Grid Sub-Station, New Delhi-110002**

# **Annual Report**

## **2011-12**

## **CONTENTS**

Sr. No.	Chapter	Page nos.
1	Introduction	4
2	Licensees Operating in Delhi Power System	5
3	Organization set up	6
4	Functions of SLDC	7-8
5	Major Activities of SLDC during 2011-12	9-12
6	Salient features of Delhi Power System	13
7	Performance of generating stations within Delhi	14
8	Details of outage of generating stations within Delhi	15-40
9	Power Supply position of Delhi	41-82
10	Frequency spectrum	83
11	Details of Under Frequency Relay Trippings	83
12	Interstate Transmission Losses	84-89
13	Allocation of power to Distribution Licensees	90-94
14	Inter Discom Transfer of Power	95-98
15	Implementation of Inter State ABT in Delhi	99-109
16	Capacitor Requirement in Delhi	110-116
17	Availability of Delhi Transco's Transmission System	117
18	New Elements commissioned in Transmission network during 2011-12	118
19	Trippings / Break-downs in 400/220kV System.	119-167

## **1 INTRODUCTION**

Delhi Transco Limited is the State Transmission Utility of the National Capital Territory of Delhi. It is responsible for transmission of power at 220KV and 400KV level, besides up gradation operation and maintenance of EHV Network as per system requirements.

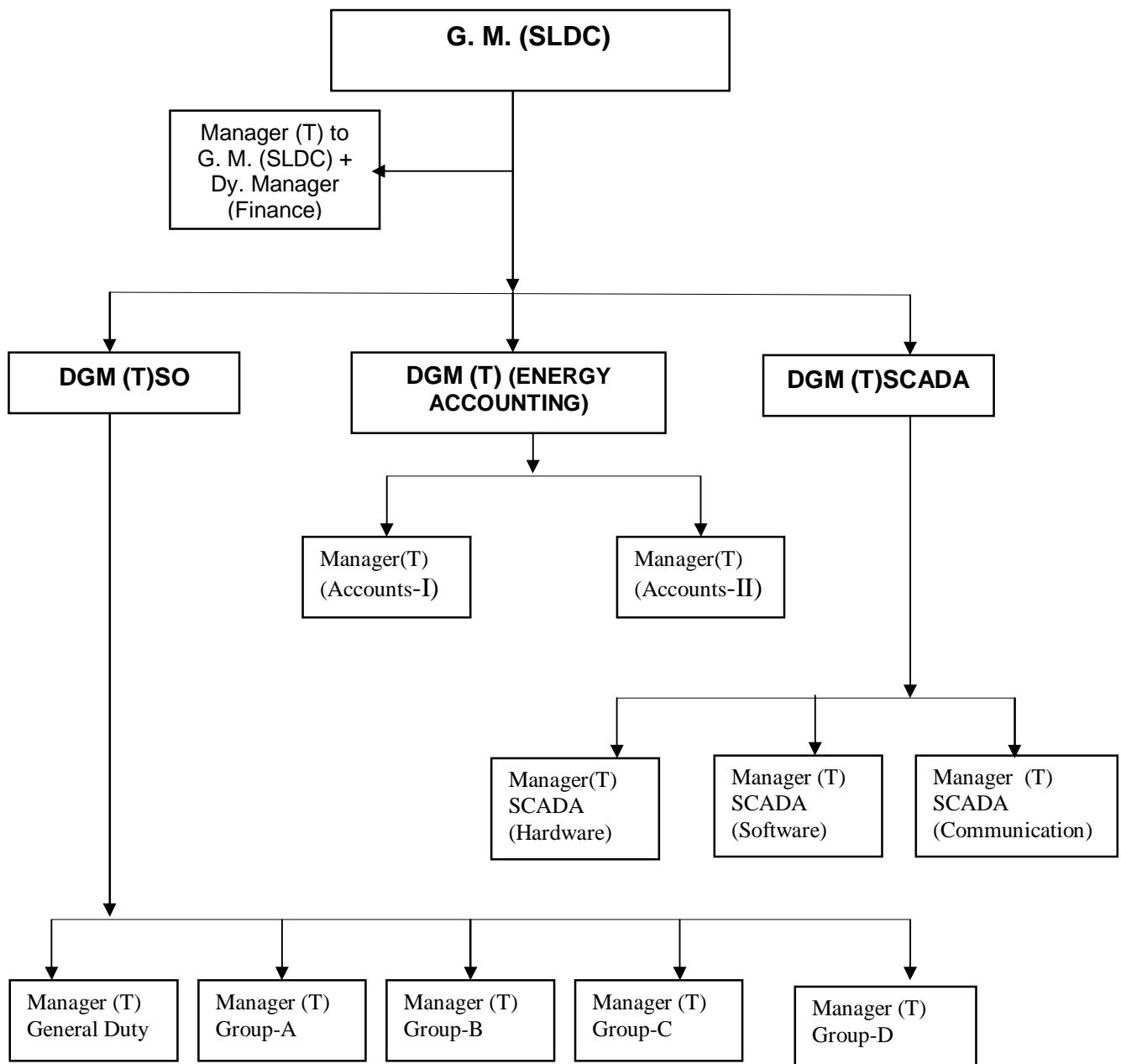
After the enactment of Electricity Act 2003, a new department under the name and style of **State Load Despatch Centre (SLDC)** under Delhi Transco Limited was created, as an Apex body to ensure integrated operation of the power system in Delhi. Earlier the department was part of O&M Department of Delhi Transco Ltd / Delhi Vidyut Board. SLDC Delhi started its function on the First of January 2004. SLDC is responsible for the real time Load Despatch function, O&M of SCADA System and Energy Accounting.

It's mission is to facilitate intra and inter state transfer of power with Reliability, Security and Economy on sound commercial principles.

## **2 LICENSEES OPERATING IN DELHI POWER SYSTEM**

- |    |  |   |                                       |
|----|--|---|---------------------------------------|
| 1) | DELHI TRANSCO LTD.   | : | TRANSMISSION LICENSEE<br>(STU, DELHI) |
| 2) | INDRAPRASTHA POWER GENERATING COMPANY LTD.                             | : | GENERATING LICENSEE                   |
| 3) | PRAGATI POWER CORPORATION LTD.   | : | GENERATING LICENSEE                   |
| 4) | BSES RAJDHANI POWER LTD.   | : | DISTRIBUTION LICENSEE                 |
| 5) | BSES YAMUNA POWER LTD.   | : | DISTRIBUTION LICENSEE                 |
| 6) | NORTH DELHI POWER LTD.<br>(Renamed TATA POWER DELHI DISTRIBUTION LTD.) | : | DISTRIBUTION LICENSEE                 |
| 7) | NEW DELHI MUNICIPAL COUNCIL  | : | DEEMED DISTRIBUTION<br>LICENSEE       |
| 8) | MILITARY ENGINEERING SERVICE   | : | DEEMED DISTRIBUTION<br>LICENSEE       |

### 3 ORGANISATIONAL SETUP OF SLDC DEPARTMENT



#### **4 Functions of various circles of SLDC**

- i) System Operation
- ii) SCADA Division
- iii) Energy Accounting

##### **4.1 System Operation**

System Operation Circle is mainly responsible for secure operation of the State Grid and economic scheduling and dispatch of electricity within the NCT of Delhi in accordance with the contracts entered into with the licensees or the generating companies operating in Delhi.

The System Operation Circle monitors grid operations, exercise supervision and control over the intra-state transmission system and carry out the real time operation of grid control and dispatch of electricity within Delhi through secure and economic operations of the State Grid in accordance with the Grid standards and the State Grid Code.

The responsibility for implementation of these procedures lies with the Managers (System Operation) General Shift as well as in Manager (System Operation) shifts round the clock under the overall supervision and control of Dy.G.M.(S.O).

##### **4.2 Supervisory Control and Data Acquisition (SCADA)**

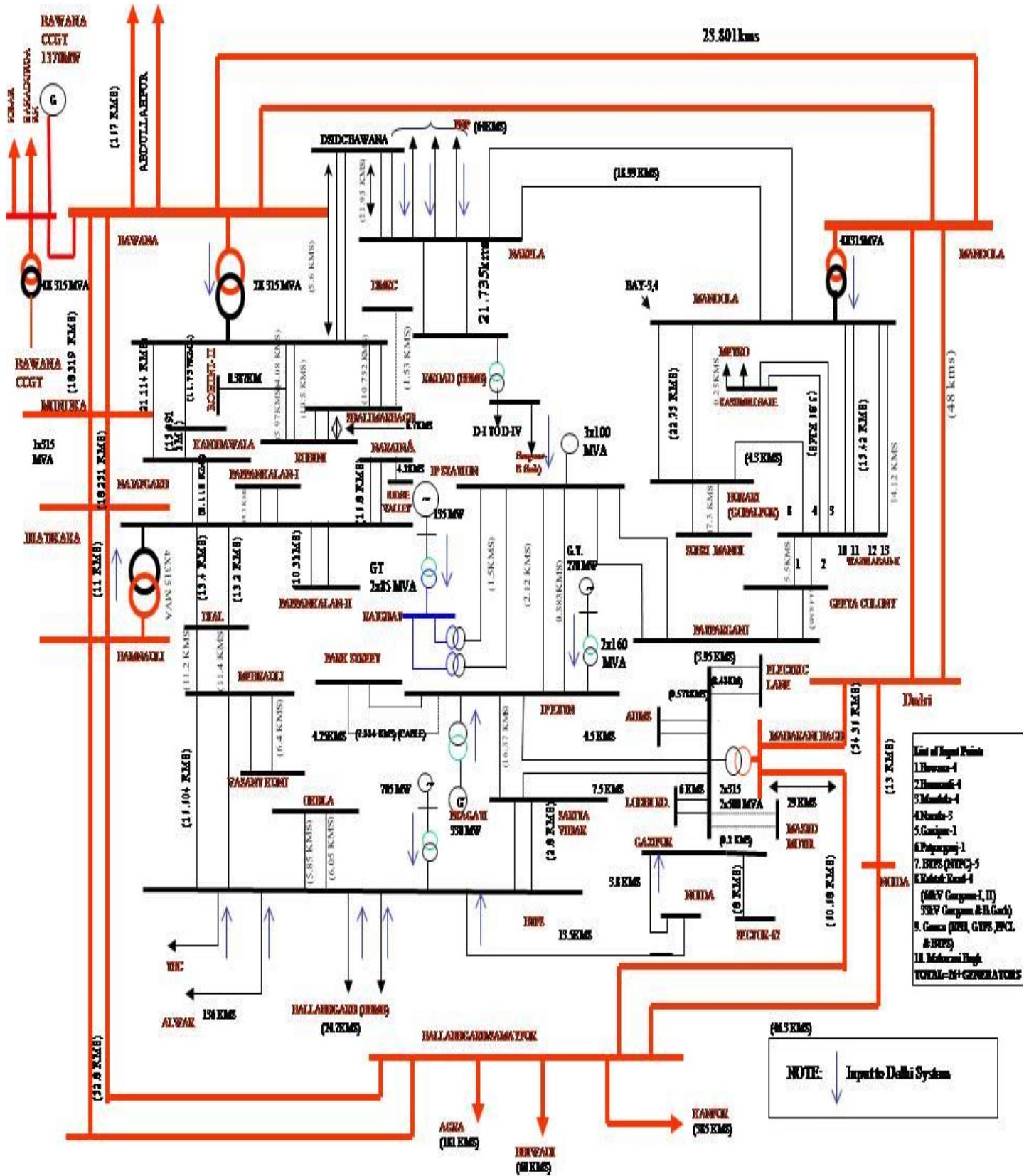
SLDC has a state of art Load despatch centre having SCADA (Supervisor Control And Data Acquisition System) for retrieving information from generating stations and grid sub stations consisting of analog data (like Mega Watt, Voltage, Current, MVar) and digital status of various elements (like Circuit Breaker, Isolator etc.) for real time operation of grid, enabling it to operate safely, securely and economically.

The data from sub station is received through an existing communication ring comprising of OPGW, Microwave and PLCC links. For indicating this data on control room monitors, the hardware and communication links at sub stations are maintained round the clock by the Communication sub division of SCADA Circle. The software sub division of SCADA has developed in-house softwares for various activities. Scheduling Software as per ABT, energy accounting and the transmission system availability have been developed and are in use.

##### **4.3 Energy Accounting**

The circle is to undertake the accounting of the quantity of electricity transmitted through the state grid as envisaged in the Electricity Act. This includes the preparation of State Energy Accounts indicating Availability, Scheduled Generation, Plant Load Factor computation, Open Cycle Operation of Gas Turbines etc. in respect of Generating Stations within Delhi. It has to prepare weekly UI Accounts for Intrastate Utilities [BTPS, RPH, IP Station (IPGCL Utilities), Pragati CCGT, BAwana CCGT (Pragati Power Corporation Ltd.), BRPL, BYPL, TPDDL, NDMC & MES (Distribution Licensees)]. At present, this circle's responsibilities are being discharged by System Operation circle.

## **4.4 Single Line Diagram of Delhi Power System**



## **5 MAJOR ACTIVITIES OF SLDC DURING 2011-12.**

In the second phase of power reforms undertaken in Delhi, the power purchase agreements executed by DESU / DVB / DTL have been reassigned to Distribution Licensees / Deemed Distribution Licensees from 01.04.2007. Subsequently, Intrastate ABT has also been introduced in Delhi w.e.f. 01.04.2007 which is first in the country. Delhi State Electricity Regulatory Commission has subsequently come out with Delhi Grid code (DGC) notified in official Gezette on 22.04.2008. Delhi Grid Code envisages Grid Coordination Committee whose responsibilities are :-

The Grid Coordination Committee shall be responsible for the following matters namely -

- (a) facilitating the implementation of these Regulations and the procedures developed under the provisions of these Regulations;
- (b) assessing and recommending remedial measures for issues that might arise during the course of implementation of provisions of these Regulations and the procedures developed under the provisions of these Regulations;
- (c) review of the DGC, in accordance with the provisions of the Act and these Regulations;
- (d) analyse any major grid disturbance after its occurrence,
- (e) examining problems raised by the Users, and
- (f) investigate in case any Beneficiary is indulging in unfair gaming or collusion after getting reported from SLDC.
- (g) review of the complete statement of the State UI and the State Reactive Energy account tabled by the SLDC through its Commercial Committee (a sub-committee of GCC); and
- (h) such other matters as may be directed by the Commission from time to time.

Deputy General Manager (System Operation) is the Convener of the GCC. GCC further formed various Sub-Committees whose responsibilities are detailed hereunder:-

- a) **Operation Co-ordination Sub-Committee (OCC)**
- b) **Commercial Sub-Committee (CC)**
- c) **Protection Sub-Committee (PC)**
- d) **System Study Sub-Committee**

## **5.1 OPERATION CO-ORDINATION SUB-COMMITTEE (OCC)**

### **Functions and Responsibilities :**

Operation Co-ordination Committee (OCC) is responsible for

- Settle all issues related to operation of the Delhi / Regional grid viz. reviewing the schedule v/s. actual generation of various power stations drawn up in the previous month;
- estimating availability of power and energy from each power station and demand of each licensee for the current and next month;
- drawing up coordinated maintenance schedule for generating units and transmission network;
- reviewing operational discipline and its norms to be observed by constituents;
- reviewing the operation of Automatic Under-Frequency Relays;
- discussing system occurrences, if any, during the previous month ;
- reviewing the status of implementation of the recommendations of the Inquiry Committees;
- monitoring / reviewing violation of provisions of IEGC/DGC related to grid operation;
- discussing / reviewing measures for ensuring economic grid operation including optimization of energy transfer with other constituents;
- examining possibility of optimizing intra state energy exchanges;
- discussing optimization of energy transfer with other states; and
- any other matter referred by the GCC.

## **5.2 COMMERCIAL SUB-COMMITTEE (CC):**

### **Functions and Responsibilities :**

Commercial Sub-Committee(CC) is responsible for

- all commercial related issues viz. energy accounting ;
- schemes required for inclusion in the Bulk Power Supply Agreements ;
- requirement of power from the new projects ;
- installation of special energy meters and its cost sharing, etc.;
- metering aspects;
- reviewing of the payments towards UI charges, Reactive Charges and their auditing ;
- treatment of transmission losses;
- commercial declaration of lines / substation and Generating units;
- commercial issues in intra state exchange of power ;
- issues concerning settlement of payments among constituents, if any, etc. and ;
- any other matter referred by the GCC.

### **5.3 PROTECTION SUB-COMMITTEE (PC)**

#### **Functions and Responsibilities :**

Protection Sub-Committee (PC) is responsible for

- all power system protection related issues viz. analysis of system disturbances in the state;
- review of protective relaying schemes ;
- relay co-ordination ;
- islanding schemes;
- automatic under frequency load shedding schemes;
- review of the implementation of recommendations made by the Inquiry Committee of the grid disturbance in the state / region concerning the above matters, etc.;
- and any other matter referred by the GCC.

### **5.4 SYSTEM STUDY SUB-COMMITTEE:**

#### **Functions and Responsibilities**

System Study Sub-Committee entrusted with the work to carry out following system studies

- Studies for assessment of the quantum of capacitors required in the state taking into account the expected additions in the generation and transmission systems and the low voltage conditions in the system. The study shall be correlated with that of capacitor requirement study of being carried out at Regional level at NRPC.
- Studies for review of area wise reactive compensation requirement
- Operational load flow studies as & when required, for peak conditions off peak conditions etc.
- Short-circuit studies as and when required.
- Transient stability studies for major events like grid disturbances or other issues periodically or as and when requested by the constituent(s).
- System studies related to transmission constraints.
- Studies specific to high / low voltage conditions with specific reference to reactors or capacitors operation / requirement.
- Identification of requirement of reactors as and when required
- Co-relation of protection related issues from Studies as and when required
- To draw out the contingency plan of Delhi Power System.
- Any other technical study referred by the GCC.

The above said Sub-Committee meets periodically to transact business as envisaged in their formation.

There were number of coordination meetings held in SLDC to resolve various issues. The details are as under :-

<b>S. No.</b>	<b>Date of meeting</b>	<b>Decision on the issue(s)</b>
01	01.04.11	Resolve the issues regarding the payment of NRLDC charges bills raised by NRLDC for the period October, 2010 onwards under the chairmanship of Director (Ops), DTL
02	05.04.11	Further meeting to resolve the issues regarding the payment of NRLDC charges bills raised by NRLDC for the period October, 2010 onwards under the chairmanship of Director (Ops), DTL
03	08.07.11	Meeting of the Committee constituted to finalize the guide lines for implementation of Open Access in Delhi under the chairmanship of ED(T), DTL.
04	21.10.11	Meeting under the Chairmanship of ED(T), DTL to consider the strategy to be adopted for the compliance of CERC interim order dated 14.10.11 in petition no. 195/MP/2011 filed by NRLDC before CERC with regard to overdrawal by NR states during low frequency regime.
05	21.11.11	Resolve the scheduling and other related issues of Bawana CCGT with regard to declaration of COD of GT under open cycle operation under the chairmanship of ED(T), DTL.
06	03.02.12	Further meeting to resolve the scheduling and other related issues of Bawana CCGT with regard to declaration of capacity of GT 220.2MW – 216MW as per OEM stipulations under the chairmanship of Director (Ops), DTL.
07	10.02.12	Meeting under the Chairmanship of Director (Ops), DTL for finalizing the scheduling principle of 16MW TOWMCL unit at Okhla.
08	28.02.12	2 <sup>nd</sup> Meeting of the Committee constituted to finalize the guide lines for implementation of Open Access in Delhi under the chairmanship of ED(T), DTL.
09	23.03.12	3 <sup>rd</sup> and final Meeting of the Committee constituted to finalize the guide lines for implementation of Open Access in Delhi under the chairmanship of ED(T), DTL.
10	23.03.12	Meeting to finalize the planned shutdown of BTPS and Dadri(Th) units for the year 2012-13.

## 6 SALIENT FEATURES OF DELHI POWER SYSTEM

Sr. No.	Features	2010-11	2011-12
1	<b>Effective Generation Capacity within Delhi in MW</b>		
	Rithala (owned by TPDDL)	63.2	94.8
	Rajghat Power House	135	135
	Gas Turbine	270	270
	Pragati Power Corporation Ltd.	330	330
	Badapur Thermal Power Station	705	705
	Bawana CCGT	0	216
	Total	1503.2	1750.8
2	<b>Maximum Unrestricted Demand (MW)</b>	<b>4809</b>	<b>5031</b>
	Date	24.06.10	02.08.11
	Time	15:29:24	15:07:47
3	<b>Peak Demand met (MW)</b>	<b>4720</b>	<b>5028</b>
	Date	01.07.2010	02.08.11
	Time	16:10:13	15:07:47
4	Peak Availability (MW)	5136	4929
5	Shortage (-) / Surplus (+) in MW	(+)416	(-)99
6	Percentage Shortage (-) / Surplus (+)	(+)8.81	(-)1.97
7	Maximum Energy Consumed in a day (Mus)	89.725	100.742
8	Energy Consumed during the year (operational figures)	<b>24437</b>	<b>25889</b>
9	<b>Load Shedding in Mus</b>		
A)	Due to Grid Restrictions		
i)	Under Frequency Relay Operations	9.767	3.125
ii)	Load Shedding by		
	NDPL (TPDDL)	4.916	12.252
	BRPL	1.778	23.049
	BYPL	0.588	11.662
	NDMC	0.015	0.182
	MES	0.000	0.000
iii)	Due to Transmission Constraints in Central Sector System	7.297	0.042
	<b>Total due to Grid Restriction</b>	<b>17.064</b>	<b>50.312</b>
B)	Due to Constraints in System in Mus		
	DTL	25.708	12.489
	NDPL (TPDDL)	7.815	11.011
	BRPL	13.835	4.618
	BYPL	6.454	3.531
	NDMC	1.577	0.028
	MES	0.000	0.000
	Other Agencies	3.363	0.994
	<b>Total</b>	<b>58.752</b>	<b>32.671</b>
11	<b>Total Load Shedding in MUs</b>	<b>75.816</b>	<b>82.983</b>
12	<b>Load shedding in percentage of Energy Consumption</b>	<b>0.31</b>	<b>0.32</b>

\* Rithala CCGT Unit-1, II & STG declared on Commercial Operation on 05.02.2011, 05.02.2011 and on 04.09.2011 respectively

**7. PERFORMANCE OF GENERATING STATIONS WITHIN DELHI DURING YEAR 2011-12**

<b>Power Station</b>	<b>Effective Capacity (MW)</b>	<b>Actual Generation In MUs</b>	<b>%age Availability</b>	<b>% PLF</b>
Rithala CCTG	94.8	237.368	66.00	29.10
Rajghat TPS	135	716.841	68.37	68.15
Gas Turbine	270	1194.051	79.41	51.30
PPCL	330	2497.360	92.61	87.79
BTPS	705	4361.754	87.93	76.70
Bawana CCGT	216	323.19968	68.65	35.27
<b>Total</b>	<b>1750.8</b>	<b>9330.57368</b>		

**Note :**

- 1 Rithala CCGT Unit-1, II & STG declared on Commercial Operation on 05.02.2011, 05.02.2011 and on 04.09.2011 respectively
- 2 Unit-1 of Bawana CCGT declared under Commercial Operation w.e.f. 27.12.2011
- 3 In addition to above, generation from Renewable sources was as under :-

<b>Sr. No.</b>	<b>Source</b>	<b>Capacity in kW</b>	<b>Generation Ex-bus in MUs</b>
	Solar Generation		
1	Poothkhurd	54.00	0.064729
2	CENPEID	14.85	0.012379
3	Corporate Office	3.96	0.004594
4	CENNET	25	0.023527
5	KPM	1000	1.253914
6	Narela A-7 Grid	43	0.049558
7	Bawana CWG Grid	45	0.049010
8	Narela DSIDC	60	0.038987
9	GT Karnal Road	25	0.011360
10	Thyagraj Stadium	1000	0.936000
a)	<b>Total Solar Generation</b>	<b>2270.81</b>	<b>2.444059</b>
	Non-Solar Generation		
b)	Timarpur Okhla Waste Management Company Ltd.	16000	1.868163
c)	<b>Total Energy from Renewable Sources</b>	<b>18270.81</b>	<b>4.312222</b>

## 8. DETAILS OF OUTAGES OF GENERATING STATIONS WITHIN DELHI FOR 2011-12

### (A) RPH STATION

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	67.5	11.05.11	20.11	11.05.11	21.28	Tripped in jerk with the trippings of 33kV Bay-19-20 (RPH – Kamla Market)
		21.05.11	01.53	21.05.11	05.25	Tripped alongwith tripping of associated transmission lines
		22.05.11	23.00	23.05.11	01.55	Boiler flame failure
		31.05.11	12.35	02.06.11	03.03	Condenser tube leakage
		10.06.11	05.40	10.06.11	12.32	UAT abnormality
		10.06.11	12.45	10.06.11	13.00	UAT abnormality
		03.07.11	11.40	06.07.11	17.19	Due to fire in 220/33kV 100MVA Pr. Tr.
		10.07.11	21.30	28.07.11	10.08	Tripped alongwith tripping of associated transmission lines
		30.07.11	14.50	31.07.11	24.00	Moisture in IBT -2
		06.08.11	06.32	08.08.11	01.31	Desynchronization due to moisture in 220kV Pr. Tr.
		15.08.11	14.17	15.08.11	21.20	Stopped due to low demand and high frequency.
		25.08.11	18.07	27.08.11	4.17	Boiler tube leakage
		01.09.11	11.41	01.09.11	12.52	Turbine tripped
		02.09.11	04.22	12.09.11	05.20	Boiler tube leakage
		13.09.11	07.05	13.09.11	09.01	Boiler flame failure
		15.09.11	12.01	15.09.11	13.12	Boiler flame failure
		15.09.11	12.45	16.09.11	00.09	Boiler flame failure
		16.09.11	17.03	18.09.11	17.50	Stopped due to wet coal
		19.09.11	00.10	19.09.11	01.28	Boiler flame failure
		21.09.11	03.46	21.09.11	04.50	Boiler flame failure
		02.10.11	12.33	02.10.11	12.54	High furnace pressure
		04.10.11	18.16	05.10.11	07.53	Leakage in boiler durm
		17.10.11	18.23	17.10.11	20.50	C&I Fault
		19.10.11	09.42	19.10.11	10.40	Furnace pressure high
		19.10.11	13.20	23.10.11	02.08	Boiler tube leakage
		23.10.11	15.58	23.10.11	16.35	Durm level very low
		01.11.11	13.03	01.11.11	13.35	Due to tripping of bay No. 9
		10.11.11	09.55	10.11.11	12.42	C & I Problem
		11.11.11	11.27	11.11.11	13.18	Due to tripping of bay No. 2
		11.11.11	13.33	11.11.11	17.19	Turbine problem
		15.11.11	21.35	26.11.11	23.05	Boiler tube leakage
		05.12.11	22.08	06.12.11	08.07	Grid Disturbance
		06.12.11	08.58	06.12.11	09.32	Boiler flame failure
		12.12.11	11.47	12.12.11	12.44	Both FD fans tripped
		12.12.11	22.21	19.12.11	16.32	Boiler tube leakage
		24.12.11	17.10	24.12.11	17.35	Flame failure
		24.12.11	20.15	29.12.11	21.16	Boiler tube leakage
		04.01.12	14.06	21.01.12	21.50	Flame failure
		23.01.12	21.35	27.01.12	01.28	Very low furnace pressure
		03.02.12	21.33	08.02.12	13.12	Boiler tube leakage
		26.02.12	11.40	26.02.12	13.42	Grid disturbance
		04.03.12	16.04	04.03.12	17.05	Drum level low
		11.03.12	18.50	11.03.12	19.10	Drum level low
		11.03.12	19.16	15.03.12	03.44	Very high furnace pressure
		15.03.12	19.12	17.03.12	09.24	Boiler tube leakage
		25.03.12	10.55	25.03.12	15.01	Flash over due to monkey electrocution

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
2	67.5	03.04.11	23.45	04.04.11	01.40	Turbine shaft vibration high
		28.04.11	06.38	28.04.11	15.27	To attend hot spot on 33kV Breaker
		21.05.11	01.53	21.05.11	07.32	Tripped alongwith tripping of associated transmission lines
		22.05.11	21.14	22.05.11	22.00	FD fan tripping
		26.05.11	12.10	26.05.11	13.00	Low boiler drum level
		31.05.11	23.15	01.06.11	08.12	Condenser tube leakage
		02.06.11	11.07	04.06.11	11.14	Boiler tube leakage
		04.06.11	16.50	04.06.11	17.50	Tripped on jerk
		04.06.11	18.18	04.06.11	20.12	Feed pump problem
		03.07.11	11.40	06.07.11	10.37	Due to fire in 220/33kV 100MVA Pr. Tr.
		10.07.11	13.53	27.07.11	05.10	Due to IBT-I, protection relay operated
		27.07.11	11.38	27.07.11	21.04	Due to tripping of bay no. 17
		30.07.11	14.50	31.07.11	03.45	Moisture in IBT -2
		06.08.11	07.00	08.08.11	00.10	Desynchronization due to moisture in 220kV Pr. Tr.-II
		15.08.11	14.21	15.08.11	22.00	Stopped due to low demand and high frequency.
		20.08.11	00.31	20.08.11	01.20	Boiler flame failure
		30.08.11	00.24	01.09.11	08.38	Boiler tube leakage
		10.09.11	00.08	12.09.11	05.00	Coal handling plant problem
		13.09.11	03.50	13.09.11	05.00	Electrical fault
		25.09.11	10.57	25.09.11	11.30	Turbine vibration
		30.09.11	22.14	03.10.11	06.00	Boiler tube leakage
		01.11.11	13.03	01.11.11	13.50	Due to tripping of bay no. 19
		03.11.11	20.16	03.11.11	23.45	Turbine problem
		08.11.11	21.05	11.11.11	00.13	Boiler tube leakage
		11.11.11	11.27	11.11.11	14.16	Due to tripping of bay no. 2
		16.11.11	16.10	16.11.11	16.50	Electrical fault
		17.11.11	09.36	17.11.11	10.05	Turbine tripped
		25.11.11	12.35	25.11.11	13.23	
		30.11.11	20.58	30.11.11	22.55	Turbine vibration high
		30.11.11	23.12	01.12.11	03.35	
		01.12.11	10.06	01.12.11	10.33	
		05.12.11	22.08	06.12.11	05.22	Grid disturbance
		07.12.11	13.08	07.12.11	14.07	Due to tripping of Pr. Tr.
		05.01.12	06.02	05.01.12	12.30	Tripped on jerk
		16.01.12	14.54	17.01.12	01.10	Electrical fault
		24.02.12	07.17	24.02.12	09.46	Due to leakage in boiler leakage pump
		26.02.12	10.54	26.02.12	13.02	Grid disturbance
		11.03.12	19.30	11.03.12	20.35	Tripped on jerk
		17.03.12	06.50	17.03.12	07.45	Electrocution of monkey in the yard.
		20.03.12	00.13	20.03.12	00.50	Tripped on jerk
		21.03.12	03.38	23.03.12	06.00	Boiler tube leakage
		24.03.12	09.28	27.03.12	15.00	Stopped due to low demand and high frequency.

(B)

## Gas Turbine Power Station (IPGCL)

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	30	31.03.11	15.10	11.04.11	20.25	Machine stopped as generation available in open cycle mode
		12.04.11	00.02	12.04.11	18.25	
		16.04.11	17.17	17.04.11	10.15	
		17.04.11	17.02	22.04.11	11.10	
		30.04.11	12.20	05.05.11	00.45	
		15.05.11	06.15	16.05.11	23.50	
		17.05.11	08.37	17.05.11	17.29	
		21.05.11	12.13	21.05.11	16.36	
		02.06.11	09.32	03.06.11	10.25	
		08.06.11	20.35	09.06.11	00.34	
		17.06.11	01.02	18.06.11	01.22	
		19.06.11	07.04	21.06.11	03.05	
		26.06.11	12.20	27.06.11	11.26	
		30.06.11	11.50	02.07.11	20.29	
		08.07.11	23.05	10.07.11	16.42	
		07.08.11	21.40	17.08.11	11.40	
		20.08.11	12.20	20.08.11	22.00	
		20.08.11	22.00	21.08.11	18.30	
		21.08.11	18.30	22.08.11	15.58	Machine stopped as generation available on spot RLNG
		23.08.11	14.15	25.08.11	12.40	
		31.08.11	14.32	31.08.11	15.36	
		03.09.11	09.02	03.09.11	10.30	
		03.09.11	13.05	03.09.11	13.35	
		04.09.11	02.47	06.09.11	17.20	
		11.09.11	22.05	14.09.11	20.36	
		15.09.11	01.14	19.09.11	11.55	
		20.09.11	01.15	20.09.11	13.40	
		21.09.11	01.32	21.09.11	17.16	
		22.09.11	00.02	22.09.11	08.42	
		23.09.11	00.35	24.09.11	10.47	
		25.09.11	00.02	26.09.11	10.10	
		27.09.11	00.20	27.09.11	08.40	
		27.09.11	15.15	27.09.11	15.25	
		28.09.11	01.10	28.09.11	08.52	
		29.09.11	02.10	29.09.11	10.57	
		30.09.11	00.12	30.09.11	10.20	
		30.09.11	23.50	01.10.11	19.38	
		01.10.11	23.04	03.10.11	10.45	
		03.10.11	23.59	04.10.11	10.54	
		08.10.11	23.59	09.10.11	08.37	Machine stopped due to swapping of gas to PPCL
		25.10.11	00.50	25.10.11	05.58	Machine stopped as generation available on spot RLNG
		25.10.11	07.45	25.10.11	10.17	Machine tripped on rotating diode earth fault
		07.11.11	02.05	07.11.11	08.14	Machine stopped to maintain only 115 MW load due to overloading of Pragati- Maharani bagh ckt .
		07.11.11	22.17	07.11.11	23.31	Tripped due to tripping of 2 MVA Tx-I
		08.11.11	00.45	12.11.11	18.06	Machine stopped as generation available on spot RLNG
		12.11.11	20.02	13.11.11	18.02	
		20.11.11	03.15	20.11.11	09.40	
		26.11.11	15.02	30.11.11	10.20	Stopped due to high TAD
						Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	30	07.12.11	03.35	08.12.11	00.50	Machine stopped as generation available on spot RLNG
		13.12.11	00.05	13.12.11	05.46	
		16.12.11	01.30	16.12.11	08.43	
		16.12.11	22.30	17.12.11	06.20	
		18.12.11	23.06	21.12.11	12.55	
		23.12.11	00.02	23.12.11	09.50	
		23.12.11	22.05	24.12.11	08.55	
		25.12.11	01.20	25.12.11	07.10	
		25.12.11	17.05	27.12.11	05.40	
		28.12.11	00.02	28.12.11	05.48	
		28.12.11	22.19	29.12.11	09.48	
		29.12.11	14.02	30.12.11	06.40	
		31.12.11	00.45	31.12.11	08.50	
		31.12.11	19.55	02.01.12	06.25	
		05.01.12	03.22	05.01.12	11.45	Stopped along with STG#1 due to high TAD.
		05.01.12	18.02	07.01.12	07.55	Machine stopped as generation available on spot RLNG
		08.01.12	00.05	09.01.12	07.55	
		10.01.12	01.46	10.01.12	06.41	
		10.01.12	23.55	11.01.12	06.55	
		11.01.12	19.02	12.01.12	09.25	
		16.01.12	00.28	20.01.12	07.40	
		20.01.12	10.30	24.01.12	14.15	
		01.02.12	07.30	06.02.12	09.20	
		06.02.12	21.00	26.02.12	11.00	
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	09.03.12	08.58	Stopped due to low demand and high frequency
		21.03.12	12.31	22.03.12	13.25	
2	30	27.03.11	00.05	11.04.11	21.37	Machine stopped as generation is available in open cycle mode.
		12.04.11	00.02	12.04.11	20.27	
		12.04.11	21.00	21.04.11	12.48	
		24.04.11	23.35	25.04.11	05.20	Machine tripped on high vibration
		30.04.11	18.15	05.05.11	19.45	Due to swapping of gas to PPCL.
		13.05.11	16.02	13.05.11	18.10	High exhaust temp spread.
		15.05.11	06.18	15.05.11	21.35	Stopped due to low demand and high frequency.
		21.05.11	12.13	21.05.11	12.55	
		15.06.11	07.35	15.06.11	08.25	Loss of flame
		15.06.11	17.40	15.06.11	18.40	Loss of flame
		15.06.11	22.10	16.06.11	03.22	Loss of flame
		18.06.11	02.02	20.06.11	17.35	Machine stopped as generation available in open cycle mode
		02.07.11	21.12	03.07.11	16.10	
		08.07.11	23.02	10.07.11	19.27	
		06.08.11	00.05	07.08.11	15.50	
		07.08.11	23.10	16.08.11	12.20	Machine stopped as generation available on spot RLNG
		17.08.11	14.30	17.08.11	19.00	
		03.09.11	11.05	03.09.11	17.05	
		11.09.11	22.05	12.09.11	21.58	
		13.09.11	00.02	14.09.11	17.45	Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
2	30	15.09.11	01.04	19.09.11	11.56	Machine stopped as generation available in open cycle mode
		20.09.11	01.15	20.09.11	13.14	
		21.09.11	01.32	21.09.11	17.20	
		22.09.11	00.02	22.09.11	08.27	
		23.09.11	01.02	24.09.11	10.40	
		25.09.11	00.02	26.09.11	09.45	
		27.09.11	00.10	27.09.11	08.48	
		28.09.11	01.05	28.09.11	08.40	
		29.09.11	02.02	29.09.11	10.55	
		30.09.11	00.12	30.09.11	10.20	
		30.09.11	23.50	01.10.11	19.10	
		01.10.11	23.06	03.10.11	10.50	
		03.10.11	23.59	04.10.11	10.50	
		16.10.11	13.03	16.10.11	07.12	Tripped on condensate level high trip alarm & reverse power on protection pannel
		07.11.11	02.05	07.11.11	08.05	Machine stopped as generation available on spot RLNG
		20.11.11	05.55	20.11.11	09.32	Machine stopped as generation available in open cycle mode
		26.11.11	18.41	29.11.11	10.14	Machine stopped as generation available on spot RLNG
		30.11.11	10.15	30.11.11	14.00	Machine tripped on combined cycle trip alarm
		30.11.11	14.00	30.11.11	17.35	Machine stopped as generation available on spot RLNG
		08.12.11	17.10	09.12.11	07.56	
		14.12.11	00.55	14.12.11	05.58	
		14.12.11	22.31	15.12.11	13.15	
		16.12.11	22.45	17.12.11	10.13	
		19.12.11	03.35	19.12.11	15.20	Tripped on TAD very high.
		24.12.11	19.52	25.12.11	00.35	Tripped on high exhaust temp. spread.
		03.01.12	12.10	05.01.12	11.04	Machine stopped as generation available on spot RLNG
		17.01.12	06.32	18.01.12	10.25	
		22.01.12	00.01	23.01.12	08.36	
		24.01.12	22.20	25.01.12	07.25	
		27.01.12	20.01	28.01.12	00.40	Stopped due to low demand and high frequency
		28.01.12	16.15	01.02.12	01.05	
		01.02.12	07.31	26.02.12	11.00	
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	09.03.12	11.32	Stopped due to low demand and high frequency

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
3	30	11.04.11	11.25	11.04.11	20.41	Due to failure of Auxiliary supply.
		12.04.11	00.02	12.04.11	18.35	
		12.04.11	21.10	13.04.11	09.40	Machine stopped as generation available on open cycle mode
		16.04.11	03.50	17.04.11	21.27	
		19.04.11	00.02	19.04.11	05.52	
		20.04.11	00.02	20.04.11	05.52	Due to low demand and high frequency.
		28.04.11	02.05	28.04.11	13.55	Due to swapping of gas to PPCL.
		04.05.11	01.32	04.05.11	11.50	Machine stopped as generation available on spot RLNG
		08.05.11	03.16	08.05.11	22.44	
		09.05.11	21.45	10.05.11	15.37	Stopped due to low demand and high frequency.
		10.05.11	15.37	10.05.11	20.15	Electrical trouble
		10.05.11	20.15	11.05.11	16.20	
		12.05.11	00.05	12.05.11	10.11	Machine stopped as generation available on spot RLNG
		17.05.11	18.15	17.05.11	23.59	
		18.05.11	00.00	27.07.11	00.00	Start command executed but smoke observed from the Diesel Engine
		27.07.11	00.00	27.07.11	12.25	
		27.07.11	19.02	28.07.11	15.00	
		28.07.11	21.35	29.07.11	12.00	
		29.07.11	16.40	30.07.11	01.37	
		30.07.11	02.10	30.07.11	13.02	Machine started for making the drum per 10Kg/cm sq. for passivation of boiler #3
		30.07.11	14.10	30.07.11	23.32	
		30.07.11	23.58	31.07.11	23.59	
		01.08.11	19.50	03.08.11	11.01	
		13.08.11	05.35	16.08.11	05.20	
		17.08.11	20.10	18.08.11	10.45	
		18.08.11	12.32	18.08.11	17.32	
		25.08.11	14.15	26.08.11	12.20	
		03.09.11	09.05	09.09.11	19.35	Machine stopped as generation available on spot RLNG
		21.09.11	05.02	21.09.11	13.43	Machine stopped as generation available on open cycle mode.
		27.09.11	15.15	27.09.11	15.58	Machine tripped during checking of Bus Coupler differential trippings, Differential relay on BB-3 & 4 operated .
		27.10.11	15.15	31.10.11	07.12	
		03.11.11	02.32	03.11.11	09.27	Stopped due to low demand and high frequency.
		23.11.11	00.05	26.11.11	04.50	
		26.11.11	15.40	26.11.11	18.10	
		08.12.11	23.16	09.12.11	08.06	
		10.12.11	23.30	12.12.11	05.46	
		14.12.11	15.15	15.12.11	12.50	
		15.12.11	14.17	15.12.11	17.30	Machine tripped on 63TP-1,Buch-1 alarm operated on protection pannel.
		18.12.11	20.20	18.12.11	22.30	Machine stopped as generation available on spot RLNG
		19.12.11	02.15	19.12.11	12.55	Tripped on TAD very high.
		19.12.11	23.25	20.12.11	14.15	
		21.12.11	14.30	21.12.11	17.50	
		28.12.11	15.35	28.12.11	22.04	Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
3	30	06.01.12	23.55	07.01.12	07.37	Machine stopped as generation available on spot RLNG
		14.01.12	23.00	18.01.12	10.02	
		20.01.12	00.05	20.01.12	07.55	
		21.01.12	00.05	21.01.12	08.10	
		22.01.12	16.47	22.01.12	21.44	
		24.01.12	11.20	24.01.12	13.50	Machine tripped due to failure of Aux.supply as 20 MVA Transformer tripped on lind stage gas pressure
		24.01.12	22.20	25.01.12	07.28	Stopped due to low demand and high frequency
		25.01.12	18.20	27.01.12	05.48	
		28.01.12	23.50	31.01.12	16.30	
		01.02.12	01.56	01.02.12	07.26	Machine stopped as generation available on spot RLNG
		06.02.12	21.12	11.02.12	19.02	Stopped due to low demand and high frequency
		26.02.12	09.45	27.02.12	17.25	Machine tripped on high LTTH as ACW already stopped at 9:02 hrs.to attend the leakages of ACW line near GT#5 Transformer.
		06.03.12	16.38	21.03.12	09.10	Stopped due to low demand and high frequency
		22.03.12	14.25	02.04.12	13.48	
4	30	11.04.11	11.25	11.04.11	20.00	Due to failure of Auxiliary supply.
		12.04.11	19.45	12.04.11	20.35	Machine came on FSNL
		13.04.11	09.14	14.04.11	00.45	Machine stopped as generation available on open cycle mode
		16.04.11	10.05	17.04.11	12.50	Stopped due to low demand and high frequency.
		21.05.11	04.00	23.05.11	10.37	
		23.05.11	14.25	26.05.11	14.42	Machine stopped as generation available on spot RLNG
		26.05.11	18.24	30.05.11	16.05	
		02.06.11	09.35	03.06.11	10.50	
		03.06.11	11.15	06.06.11	10.40	Stopped due to low demand and high frequency.
		22.06.11	18.02	23.06.11	02.57	
		16.07.11	14.20	05.08.11	12.17	Machine stopped as generation available on spot RLNG
		11.08.11	06.58	11.08.11	09.05	Machine tripped on loss of flame
		12.08.11	04.40	12.08.11	05.35	Machine tripped on high TAD
		12.08.11	06.52	12.08.11	15.40	Tripped without any alarm in control room
		15.08.11	10.42	16.08.11	06.15	Machine stopped as generation available on spot RLNG.
		16.08.11	15.31	16.08.11	20.28	
		16.08.11	23.50	21.08.11	00.55	
		21.08.11	08.15	27.08.11	23.59	
		03.09.11	13.05	03.09.11	13.40	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		03.09.11	14.10	09.09.11	19.50	Machine stopped as generation available on spot RLNG
		16.09.11	09.13	16.09.11	11.34	Machine tripped on exhaust over temp high
		16.09.11	15.35	16.09.11	17.08	Due to problem of AC supply the Battery voltage came down to 111 Volt. Machine stopped as per request from C&l division.
		21.09.11	14.23	21.09.11	21.27	Machine stopped as generation available on open cycle mode
		24.10.11	06.00	24.10.11	11.40	Machine stopped as generation available on spot RLNG
		25.10.11	00.52	25.10.11	05.55	
		25.10.11	19.20	26.10.11	17.55	
		27.10.11	15.15	02.11.11	11.40	
		13.11.11	23.58	14.11.11	05.58	Stopped due to low demand and high frequency.
		19.11.11	01.16	19.11.11	13.44	Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
4	30	20.11.11	07.15	20.11.11	09.33	Machine tripped on high TAD
		20.11.11	10.15	20.11.11	15.55	Machine tripped on high TAD
		02.12.11	01.02	02.12.11	10.53	Gas Restriction
		03.12.11	19.05	05.12.11	05.25	
		18.12.11	00.01	19.12.11	02.44	Machine stopped as generation available on spot RLNG
		19.12.11	07.42	19.12.11	11.22	Stopped on TAD very high.
		20.12.11	02.55	20.12.11	09.30	Tripped on TAD very high.
		21.12.11	00.02	21.12.11	07.50	Machine stopped due to low demand.
		21.12.11	18.14	22.12.11	08.25	
		26.12.11	12.54	26.12.11	22.15	Machine stopped as generation available on spot RLNG
		14.01.12	23.00	18.01.12	12.10	
		28.01.12	00.16	28.01.12	00.40	On protection pannel negative phase sequence trip appeared
		28.01.12	00.40	28.01.12	15.30	
		06.02.12	21.00	11.02.12	18.12	Machine stopped due to low demand.
		26.02.12	09.00	27.02.12	17.10	Machine stopped for attending the leakages of ACW line near GT#5 Transformer.
		07.03.12	15.15	02.04.12	13.48	Stopped due to low demand and high frequency
5	30	11.04.11	11.25	11.04.11	12.55	Due to failure of Auxiliary supply.
		11.04.11	14.25	11.04.11	14.55	Due to failure of Auxiliary supply.
		12.04.11	17.42	16.04.11	17.15	Generation available on open cycle
		17.04.11	14.32	18.04.11	20.17	
		21.04.11	22.45	30.04.11	17.24	Due to low demand and high frequency.
		03.05.11	04.01	03.05.11	14.40	
		04.05.11	01.35	04.05.11	12.40	
		05.05.11	11.05	05.05.11	11.50	
		05.06.11	19.16	05.07.11	19.25	
		07.05.11	21.35	08.05.11	21.45	
		13.05.11	01.05	13.05.11	05.50	Machine stopped as available in open cycle
		13.05.11	18.30	15.05.11	18.28	
		20.05.11	01.17	20.05.11	13.35	Machine stopped as available on spot RLNG
		21.05.11	10.55	23.05.11	19.15	Due to low demand and high freq.
		31.05.11	00.05	31.05.11	16.13	
		31.05.11	23.02	03.06.11	10.15	Machine stopped as generation available in open cycle mode
		05.06.11	08.04	05.06.11	12.28	
		07.06.11	14.58	07.06.11	16.28	Machine tripped on high exhaust temperature trip
		14.06.11	03.46	15.06.11	19.45	
		15.06.11	22.03	16.06.11	01.14	Machine stopped as generation available in open cycle mode
		16.06.11	05.17	16.06.11	11.44	Machine tripped on high vibration
		16.06.11	20.02	16.06.11	22.50	Electrical trouble
		16.06.11	23.50	17.06.11	00.15	Machine came on FSNL while changing the faulty u/v relay
		26.06.11	09.02	03.07.11	16.18	Due to low demand and high freq
		07.07.11	14.55	16.07.11	13.15	
		07.08.11	00.02	08.08.11	00.10	
		15.08.11	10.42	16.08.11	06.15	
		16.08.11	15.31	16.08.11	20.28	
		16.08.11	23.50	21.08.11	00.55	
		21.08.11	08.15	21.08.11	11.25	
		21.08.11	14.02	31.08.11	23.59	Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
5	30	01.09.11	17.38	02.09.11	21.50	.
		03.09.11	13.05	03.09.11	13.45	Machine stopped as available on spot RLNG
		04.09.11	02.50	14.09.11	18.30	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		14.09.11	18.30	29.10.11	22.45	Machine is stopped due to low demand and high freq
		30.10.11	01.50	31.10.11	11.38	Machine taken under shut down for turbine rotor replacement
		01.11.11	07.20	01.11.11	17.50	Machine stopped as generation available in open cycle
		02.11.11	01.11	08.11.11	12.00	Machine is stopped due to low demand and high freq
		08.11.11	12.00	11.11.11	12.40	Machine not taken on load due problem in diesel Engine
		11.11.11	18.53	26.11.11	13.06	Machine stopped due to high vibration at BB4 & BB5 i.e 9 mm/se for further inspection by BGGTS
		29.11.11	14.25	29.11.11	21.14	Machine tripped by tripping 11 KV breaker manually as reverse power operated fail alarm appeared on protection pannel.
		03.12.11	14.37	06.12.11	18.02	Machine stopped as generation available on spot RLNG
		07.12.11	03.40	07.12.11	06.00	Machine taken under Shut down by M-I division to attend lube oil leakage.
		07.12.11	11.30	07.12.11	18.30	
		07.12.11	23.35	08.12.11	16.23	Machine stopped as generation available on spot RLNG
		12.12.11	19.29	14.12.11	14.23	
		19.12.11	09.20	19.12.11	13.10	Tripped on TAD very high.
		02.01.12	08.40	03.01.12	11.20	
		13.01.12	01.15	14.01.12	06.48	
		19.01.12	00.00	19.01.12	08.00	
		20.01.12	00.00	20.01.12	10.10	
		24.01.12	11.20	24.01.12	12.45	Machine tripped due to failure of Aux.supply as 20 MVA Transformer tripped on lind stage gas pressure
		25.01.12	18.20	27.01.12	10.05	
		27.01.12	15.02	06.02.12	08.35	Machine is stopped due to low demand and high freq
		29.02.12	11.32	09.02.12	11.45	Machine came on FSNL as both 160MVA transformer tripped at both end.
		11.02.12	19.15	26.02.12	11.00	Machine is stopped due to low demand and high freq
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	06.03.12	12.55	
		09.03.12	10.15	14.03.12	09.10	
		17.03.12	00.32	02.04.12	15.45	Machine is stopped due to low demand and high freq
6	30	11.04.11	11.25	11.04.11	13.20	Due to failure of Auxiliary supply.
		11.04.11	14.25	11.04.11	20.55	Due to failure of Auxiliary supply.
		12.04.11	00.02	12.04.11	17.40	Machine stopped as generation available on open cycle mode
		12.04.11	18.37	16.04.11	12.20	
		17.04.11	21.56	18.04.11	19.55	
		19.04.11	00.02	19.04.11	05.55	
		20.04.11	00.02	20.04.11	05.42	Due to low demand and high frequency

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
6	30	22.04.11	12.18	24.04.11	11.45	Machine stopped as generation available on Spot RLNG
		24.04.11	16.10	26.04.11	21.20	
		27.04.11	00.05	30.04.11	12.12	Due to low demand and high frequency
		07.05.11	03.40	07.05.11	11.02	
		08.05.11	22.02	09.05.11	21.25	
		12.05.11	10.51	12.05.11	15.18	Machine stopped as generation available on spot RLNG
		13.05.11	00.05	13.05.11	18.33	
		21.05.11	18.30	23.05.11	10.55	Stopped due to low demand and high frequency.
		26.06.11	09.02	04.07.11	11.00	
		04.07.11	15.15	05.07.11	11.00	Machine stopped as generation available on spot RLNG
		15.07.11	23.05	20.07.11	12.50	Due to low demand and high frequency
		23.07.11	02.17	23.07.11	03.27	Machine tripped on loss of flame
		24.07.11	04.15	25.07.11	09.17	Due to low demand and high frequency
		03.08.11	15.25	03.08.11	20.20	
		05.08.11	02.01	05.08.11	20.58	
		17.08.11	04.02	20.08.11	22.10	Machine stopped as generation available on spot RLNG
		22.08.11	16.30	23.08.11	11.30	
		24.08.11	01.50	31.08.11	23.59	
		01.09.11	17.48	02.09.11	21.40	Machine stopped as generation available on spot RLNG
		03.09.11	13.05	03.09.11	13.45	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		06.09.11	18.35	11.09.11	18.25	Stopped due to low demand and high frequency.
		21.09.11	18.40	23.09.11	00.27	Machine tripped due to blowing of fuse of Mark-Vi.
		27.09.11	15.15	27.09.11	15.30	Machine came on FSNL during checking of Bus Coupler differential trippings, Differential relay on BB-3 & 4 operated .
		01.10.11	17.30	01.10.11	22.02	Tripped with STG#3 Generator breaker trip battery voltage ground alarm
		20.10.11	20.16	21.10.11	15.10	Tripped on communication link failed with any of IO pack & loss of flame
		31.10.11	10.32	03.11.11	09.20	Stopped due to low demand and high frequency
		01.12.11	00.45	01.12.11	06.25	
		01.12.11	09.58	03.12.11	13.55	
		05.12.11	19.02	07.12.11	03.05	
		09.12.11	22.20	12.12.11	18.40	
		15.12.11	23.55	16.12.11	08.41	
		18.12.11	14.02	18.12.11	20.10	
		19.12.11	04.10	19.12.11	10.55	Tripped on TAD very high.
		20.12.11	01.25	20.12.11	09.15	Tripped on TAD very high.
		21.12.11	18.32	22.12.11	07.52	
		22.12.11	17.50	23.12.11	09.52	
		23.12.11	14.20	24.12.11	08.40	
		25.12.11	00.46	25.12.11	07.02	Machine stopped as generation available on spot RLNG

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
6	30	25.12.11	23.55	26.12.11	11.58	Machine stopped as generation available on spot RLNG
		27.12.11	00.05	27.12.11	05.25	
		28.12.11	00.45	28.12.11	05.15	
		28.12.11	23.25	29.12.11	09.40	
		29.12.11	23.01	30.12.11	07.55	
		31.12.11	00.45	31.12.11	05.25	
		31.12.11	17.10	02.01.12	06.15	
		04.01.12	23.02	05.01.12	02.50	
		05.01.12	23.52	06.01.12	07.46	
		06.01.12	23.50	11.01.12	12.30	
		12.01.12	00.30	12.01.12	08.00	
		12.01.12	23.58	13.01.12	00.59	
		13.01.12	02.00	13.01.12	07.55	
		13.01.12	14.45	14.01.12	06.40	
		16.01.12	00.30	17.01.12	06.10	
		21.01.12	00.10	21.01.12	08.20	
		22.01.12	00.02	23.01.12	08.45	
		24.01.12	00.02	24.01.12	06.45	
		24.01.12	11.25	24.01.12	12.25	Machine stopped as DD of HRSG#6 not taking close command due to failure of DC supply.
		24.01.12	22.25	25.01.12	11.40	Stopped due to low demand and high frequency
		25.01.12	16.55	01.02.12	07.10	
		09.02.12	11.32	09.02.12	11.47	Machine came on FSNL as both 160MVA transformer tripped at both end.
		11.02.12	20.53	26.02.12	11.00	Stopped due to low demand and high frequency
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	06.03.12	17.12	Stopped due to low demand and high frequency
		06.03.12	17.35	07.03.12	14.25	
		08.03.12	12.30	09.03.12	05.50	
		09.03.12	11.40	14.03.12	09.45	
		15.03.12	00.02	15.03.12	07.20	
		17.03.12	00.32	02.04.12	15.50	

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
STG -1	30	18.02.11	20.00	16.04.11	00.40	Shut-down to attend miscellaneous problems
		16.04.11	11.10	17.04.11	14.27	Machine stopped attend leakage.
		17.04.11	17.02	21.04.11	20.58	Machine stopped due to low demand
		23.04.11	06.32	23.04.11	11.10	Problem in 24 Volt DC supply.
		30.04.11	00.52	30.04.11	02.56	
		30.04.11	18.15	05.05.11	05.05	
		05.05.11	23.35	06.05.11	02.28	
		07.05.11	01.45	07.05.11	03.40	
		10.05.11	13.50	10.05.11	17.40	Low vacuum
		15.05.11	06.20	15.05.11	22.54	To attend various leakages
		21.05.11	09.50	21.05.11	14.05	Tripped on Ch-I &II
		21.05.11	16.22	21.05.11	17.35	Machine tripped on low vacuum.
		30.05.11	09.20	30.05.11	11.05	Machine tripped on low vacuum.
		07.06.11	02.43	07.06.11	05.20	Tripped on Ch-I &II
		19.06.11	07.04	21.06.11	02.10	To attend various leakages
		21.06.11	15.58	21.06.11	16.59	To attend various leakages
		08.07.11	23.05	10.07.11	19.34	Due to low demand and high frequency
		26.07.11	13.50	26.07.11	15.01	
		26.07.11	15.20	26.07.11	16.46	Machine tripped on flase alarm of Shaft Vibratrtion very high and Housing vibration very high.
		29.07.11	15.55	29.07.11	17.31	Machine tripped mannualy as the vaccum dropped upto -0.40 kg/cm2 due to tripping of BFP-1A as another BFP-1B was under preventive maintenance
		29.07.11	17.42	29.07.11	18.11	Machine tripped on hot well level high
		07.08.11	18.58	15.08.11	00.00	Machine tripped due to problem in Control valve and boxed up for further inspection
		15.08.11	00.00	16.08.11	15.20	Machine not taken on bar due to low demand
		03.09.11	13.05	03.09.11	14.40	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		11.09.11	17.25	14.10.11	05.10	Machine tripped on Generator shaft vibration v. high. Machine boxed for further inspection of generator Rotor & Excitor. After examining the parameters of Generator Rotor it was decided to replace it with new Rotor
		07.11.11	22.17	08.11.11	01.28	Tripped due to tripping of 2 MVA Tx-I
		08.11.11	06.48	08.11.11	08.18	STG#1 tripped due to coupling breaker of 2MVA Tx-1&II and DG set tripped and no relay/alarm appearing on breaker of Tx.
		20.11.11	04.48	20.11.11	12.05	Machine tripped with following relay operated 27G, 40G ,86GA II, 27GX, 30GTA/30GTB,63 GT-1,multipliers,aux relay in Class A Group-I and Class B -86 GB, AVR VTI fuse and AVR VT-2 .
		25.11.11	19.02	25.11.11	22.15	Stopped to attend hot spot on Y-Phase line isolater.
		26.11.11	18.41	28.11.11	12.44	Machine stopped as generation available on spot RLNG
		28.11.11	12.58	29.11.11	14.55	Machine stopped due to high vibration on Turbine FJB & RJB.
		30.11.11	10.15	30.11.11	13.29	Machine tripped manually due to tripping of GT# 2
		12.12.11	06.59	12.12.11	08.53	Tripped on low vaccum due to tripping CEP as 800KVA Trf-1 tripped on Buchhloz relay
		13.12.11	11.05	13.12.11	13.32	Machine tripped
		16.12.11	22.45	17.12.11	08.20	Machine stopped as generation available on spot RLNG
		19.12.11	03.35	19.12.11	16.46	Tripped due to tripping of GT#2 as TAD of GT#2 very high.
		24.12.11	19.10	24.12.11	21.40	Tripped on Gen. front bearings vibration very high on right side probe.Relay operated 86GB,aux. relay 60A,60AX,Aux. relay for 60PP,60PPX,Aux. relay for 60 Pmax.

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
STG 1	30	29.12.11	14.34	29.12.11	19.35	Tripped on class A relay trip alarm.Following relay appear in DDC room of STG#1:Gen.class A trip relay 86GA, Gen.class B tripping relay86GB, Aux.relay for 60AX,60PPA,60PMA,32G &27GX also appeared.
		30.12.11	14.53	30.12.11	15.52	Tripped on CH-I &CH-II operated.
		05.01.12	03.22	05.01.12	12.37	Stopped due to stopping of GT#1 due to high TAD.
		17.01.12	03.51	17.01.12	06.32	Tripped on turbine shaft vibration(RJB) very high alarm.
		17.01.12	06.32	18.01.12	12.25	Machine stopped as generation available on spot RLNG
		18.01.12	13.10	18.01.12	19.55	Tripped on Low vacuum.
		22.01.12	00.01	23.01.12	10.55	Machine stopped as generation available on spot RLNG
		24.01.12	11.20	24.01.12	16.10	Machine tripped due to failure of Aux.supply as 20 MVA Transformer tripped on lind stage gas pressure
		01.02.12	03.03	01.02.12	18.15	Tripped & ESV closed MI appeared in alarm pannel.
		01.02.12	18.15	06.02.12	11.25	Machine stopped due to low demand
		06.02.12	21.00	26.02.12	11.00	
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	09.03.12	12.35	Machine stopped due to low demand
		11.03.12	11.00	11.03.12	15.20	Machine stopped as all the parameters at BCD got freezed.
		15.03.12	00.50	15.03.12	02.55	Machine tripped due to Grid disturbance as Pragati-Maharani Bagh Ckt tripped.
STG 2	30	11.04.11	10.40	17.04.11	16.20	Low vacuum
		21.05.11	04.00	23.05.11	11.00	Machine stopped due to low demand
		23.05.11	11.00	25.05.11	12.59	Machine tripped on Rotor earth fault
		24.05.11	13.00	26.05.11	18.20	Machine stopped as generation available on spot RLNG
		26.05.11	18.24	30.05.11	20.25	
		02.06.11	09.36	06.06.11	10.40	Machine stopped due to low demand & high frequency
		19.06.11	15.05	19.06.11	20.00	Low vacuum
		22.06.11	18.02	23.06.11	04.25	To attend various leakages
		28.06.11	16.03	28.06.11	17.53	Tripped on Ch-I &II
		16.07.11	14.20	03.08.11	14.45	Machine stopped as generation available on spot RLNG
		14.08.11	11.36	16.08.11	07.50	
		03.09.11	03.20	03.09.11	04.25	Machine stopped for replacement of speed pick up
		03.09.11	13.05	03.09.11	14.10	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		03.09.11	14.10	09.09.11	21.25	Machine stopped as generation available on spot RLNG
		25.09.11	12.05	25.09.11	14.28	Machine tripped due to malfunctioning of Derator level as BFP-2A tripped and 2B did not take start command due to non availability of Derator level.
		26.09.11	20.35	26.09.11	21.50	BFP-2A tripped due to malfunctioning of Derator level. Derator Level very Low. High, very high alarm appeared. BFP-2B taken into service it also tripped on same alarm. Machine tripped on low vacuum.
		11.10.11	14.30	11.10.11	16.50	Machine tripped from DDC for checking the hunting in parameters.

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
STG 2	30	19.10.11	03.02	19.10.11	07.08	Machine tripped due to class B relay operated.
		20.10.11	12.50	20.10.11	14.02	Tripped due to jerk in control room.
		21.10.11	11.50	21.10.11	13.05	Machine stopped due to choking of CEP Stainer as another CEP was under preventive maintenance
		27.10.11	15.15	31.10.11	10.20	Machine stopped due to low demand & high frequency
		12.12.11	06.59	12.12.11	10.10	Tripped due to tripping of 800KVA Trf-1 on low vaccum as both running CEPs tripped.
		18.12.11	14.50	18.12.11	15.45	Tripped due to the following parameters disappeared on BCD & CRT:lube oil temp.,exhaust steam temp.,condensate temp.,BFP discharge header pressure &temp.
		18.12.11	19.20	19.12.11	00.08	Tripped due to HRSG#3 drum level very low.
		19.12.11	02.15	19.12.11	03.40	Tripped due to tripping of GT#3 as TAD of GT#3 very high.
		19.12.11	07.42	19.12.11	13.45	Stopped due to stopping of GT#4 because TAD very high.
		20.12.11	02.55	20.12.11	11.58	Tripped due to tripping of GT#4 as TAD of GT#4 very high.
		14.01.12	23.00	18.01.12	12.00	Machine stopped as generation on Spot R-LNG is not required by SLDC
		24.01.12	11.20	24.01.12	13.35	Machine tripped due to failure of Aux.supply as 20 MVA Transformer tripped on lind stage gas pressure
		06.02.12	08.40	06.02.12	09.25	Machine stopped due to BFP
		06.02.12	21.12	10.02.12	20.48	Machine stopped due to low demand
		26.02.12	09.00	27.02.12	19.25	Machine stopped for attending the leakages of ACW line near GT#5 Transformer.
		04.03.12	23.15	05.03.12	01.40	Machine tripped due to heavy jerk observed,both160MVA ICTs & Akshardham O/C feeder tripped
		07.03.12	15.12	19.03.12	16.30	Machine stopped due to low demand
		19.03.12	16.30	21.03.12	12.15	Machine stopped due to low demand
		22.03.12	14.25	02.04.12	16.25	Machine stopped due to low demand
STG 3	30	11.04.11	11.25	17.04.11	16.28	Due to failure of Auxiliary supply.
		17.04.11	20.05	18.04.11	21.55	Machine stopped due to low demand
		22.04.11	12.17	30.04.11	16.16	Machine available on spot R-LNG
		01.05.11	14.52	01.05.11	15.40	Steam Turbine Speed very high.
		07.05.11	03.40	07.05.11	13.58	Machine stopped due to low demand
		12.05.11	09.16	13.05.11	20.35	Main steam temperature low
		21.05.11	18.30	23.05.11	13.55	Machine stopped due to low demand
		05.06.11	10.15	05.06.11	11.15	Low vacuum
		06.06.11	09.05	06.06.11	11.25	Turbine shaft vibration high
		13.06.11	13.10	13.06.11	14.34	Machine tripped on CH-I& II.
		26.06.11	09.02	03.07.11	22.18	Machine stopped due to low demand
		20.07.11	13.50	20.07.11	14.20	Machine tripped on Both the boiler trip alarm. No alarm appeared in the Turbine interlock page.
		20.07.11	14.36	20.07.11	15.20	
		28.07.11	07.04	28.07.11	07.43	Machine tripped due to tripping of HRSGs. HRSG tripped on low drum level as BFP-3A tripped due to malfunctioning of temperature of NDE of motor.
		17.08.11	04.02	21.08.11	00.15	Machine stopped as generation available on spot RLNG.
		22.08.11	13.15	23.08.11	13.45	Machine tripped on Class A. machine cleared from Elect division but not taken on load due to low demand.

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
STG 3	30	24.08.11	01.50	03.09.11	05.15	Machine stopped due to low demand
		03.09.11	13.05	03.09.11	15.10	Machine tripped as Bus differential relay on BB-3 & 4 operated.
		06.09.11	18.35	11.09.11	22.10	Machine Stopped due to low demand & high frequency
		16.09.11	09.35	16.09.11	11.45	Machine tripped on class A alarm
		18.09.11	08.54	18.09.11	09.25	Machine tripped on Gen class A trip, AVR trip command and excitation field breaker open.
		20.09.11	09.03	20.09.11	09.27	Machine tripped on class A alarm
		21.09.11	16.40	23.09.11	03.10	Machine tripped due to tripping of GT#6
		27.09.11	15.15	27.09.11	16.00	Machine tripped as GT#6 came on FSNL
		01.10.11	17.30	02.10.11	01.45	Tripped with GT#6 Generator breaker trip battery voltage ground alarm.
		13.10.11	05.10	13.10.11	08.33	Machine tripped as all the parameters disapperaed.
		13.10.11	14.42	13.10.11	14.55	Machine tripped on low vaccum as CEP-3A tripped on Hot well very low alarm. It is found that Condensate water drained from the drain of CPH-5. This drain valve is being cut by the O/h team.
		20.10.11	20.16	21.10.11	17.25	Tripped due to tripping of GT#6.
		31.10.11	10.30	03.11.11	12.35	Machine Stopped due to low demand & high frequency
		19.12.11	09.20	19.12.11	12.57	Tripped due to tripping of GT#5 as TAD of GT#5 very high
		02.01.12	06.05	02.01.12	06.55	Stopped due to MS temprature low.
		04.01.12	07.09	04.01.12	07.39	Tripped on Hot well level high.
		13.01.12	02.00	14.01.12	08.58	Machine stopped as generation available on spot RLNG
		24.01.12	11.20	24.01.12	14.15	Machine tripped due to failure of Aux.supply as 20 MVA Transformer tripped on lind stage gas pressure
		24.01.12	15.40	24.01.12	17.30	Machine tripped while normalizing the supply from 20 MVA Tx
		25.01.12	18.20	27.01.12	12.35	Machine Stopped due to low demand & high frequency
		27.01.12	15.02	06.02.12	12.05	
		09.02.12	11.32	09.02.12	13.25	Machine tripped as both 160MVA transformer tripped at both end.
		11.02.12	20.53	26.02.12	11.00	Machine Stopped due to low demand & high frequency
		26.02.12	11.00	27.02.12	17.00	Machine not available due to leakage in ACW line near GT#5 Transformer.
		27.02.12	17.00	06.03.12	16.22	Machine Stopped due to low demand & high frequency
		09.03.12	08.40	09.03.12	13.00	Machine stopped due to problem in Oil Cooler of BFP 3B as the Another BFP-3A was under PTW
		09.03.12	13.00	14.03.12	11.55	Machine was cleared by Mech-II division but not taken on load due to low Schedule from SLDC.
		17.03.12	00.32	02.04.12	21.25	Machine Stopped due to low demand & high frequency

(C)

**PRAGATI STATION**

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	104	01.04.11	23.28	03.04.11	11.37	Stopped for maintenance work
		03.04.11	20.03	04.04.11	19.09	Rotor earth fault
		04.04.11	14.45	06.04.11	13.35	Unit stopped due to low demand and high frequency
		06.04.11	21.45	08.04.11	08.01	Stopped for maintenance work
		08.04.11	18.45	08.04.11	24.00	Internal fault
		09.04.11	00.00	10.04.11	15.52	Unit stopped due to low demand and high frequency
		25.04.11	17.58	25.04.11	23.08	Tripped alongwtih trippings of associated transmission lines.
		21.05.11	01.30	21.05.11	02.56	Grid disturbance
		21.05.11	22.10	23.05.11	08.45	Generation backing down due to low demand and high frequency
		05.06.11	11.02	05.06.11	17.43	Shutdown for attending hot spot and general maintenance
		28.07.11	21.18	29.07.11	22.59	Leakage of air compressor
		02.11.11	00.00	02.11.11	05.58	Inspection of boiler
		09.02.12	11.36	09.02.12	13.04	Grid disturbance
		15.03.12	00.51	15.03.12	05.31	
2	104	03.04.11	13.50	03.04.11	20.28	Stopped for maintenance work
		06.04.11	13.50	06.04.11	21.35	Stopped for maintenance work
		08.04.11	08.22	08.04.11	19.20	Stopped for maintenance work
		10.04.11	21.27	11.04.11	12.11	Internal fault
		30.04.11	00.52	30.04.11	01.10	Tripped alongwtih trippings of associated transmission lines.
		05.05.11	10.51	07.05.11	05.26	Internal problem
		14.05.11	07.21	14.05.11	19.13	Internal check
		05.06.11	05.00	05.06.11	10.43	Shutdown for attending hot spot and general maintenance
		10.06.11	05.54	11.06.11	15.44	Generation backing down due to low demand and high frequency
		26.06.11	11.38	27.06.11	10.29	
		27.06.11	10.29	27.06.11	10.55	Lube oil system fault
		15.08.11	10.35	16.08.11	07.00	Generation backing down due to low demand and high frequency
		05.09.11	05.39	05.09.11	07.21	Grid disturbance
		05.12.11	22.00	06.12.11	01.07	Electrical fault
		09.12.11	14.05	09.12.11	14.32	Due to heavy jerk
		19.12.11	13.58	19.12.11	17.03	Air filter damage
		30.12.11	10.30	30.12.11	14.04	Replacement of air tube valve
		05.01.12	06.02	05.01.12	08.04	Grid disturbance
		07.01.12	22.03	07.01.12	22.21	AVR Fault at generation end
		13.01.12	04.36	13.02.12	16.00	Generation backing down due to low demand and high frequency
		26.02.12	10.54	26.02.12	11.53	Grid disturbance
		15.03.12	00.51	15.03.12	02.13	

Unit No	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
STG	122	12.04.11	09.00	12.04.11	18.59	High furnace temperature
		25.04.11	17.57	25.04.11	18.56	Tripped alongwtih trippings of associated transmission lines.
		21.05.11	01.32	21.05.11	02.53	
		05.06.11	09.50	05.06.11	13.38	Shutdown for attending hot spot and general maintenance
		07.06.11	00.47	13.06.2011	10.19	Internal fault
		05.09.11	09.44	05.09.11	10.28	
		19.11.11	09.39	19.11.11	11.16	
		05.12.11	22.00	06.12.11	02.18	
		09.12.11	14.05	09.12.11	16.51	Electrical fault
		26.12.11	01.01	26.12.11	02.01	Due to heavy jerk
		05.01.12	06.02	05.01.12	12.06	Internal fault
		07.01.12	22.03	08.01.12	00.43	Grid disturbance
		09.02.12	11.42	09.02.12	13.14	AVR fault at generator end.
		26.02.12	10.54	26.02.12	12.48	
		15.03.12	00.51	15.03.12	05.06	

(D) **BADARPUR THERMAL POWER STATION**

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	95	10.06.11	11.03	13.06.11	21.58	Generation backing down due to low demand and high frequency
		26.06.11	09.43	27.06.11	13.07	
		27.06.11	17.20	27.06.11	17.51	Furnaces pressure high
		01.07.11	15.40	01.07.11	16.20	Furnace vaccum low
		08.07.11	20.25	12.07.11	15.53	Generation backing down due to low demand and high frequency
		15.07.11	18.11	15.07.11	18.47	Low vacuum
		20.08.11	11.22	20.08.11	12.05	Condenser tube leakage
		01.09.11	23.18	22.09.11	19.24	Planned shutdown
		23.09.11	02.09	23.09.11	18.54	Problem in coal mill
		25.09.11	13.24	25.09.11	14.20	Fire out
		03.10.11	21.06	03.10.11	22.26	Flame failure in furnance
		04.10.11	18.16	05.10.11	07.53	Boiler tube leakage
		05.10.11	19.48	15.10.11	20.30	Furnance vaccume failure
		08.10.11	08.27	08.10.11	09.17	Flame failure
		22.10.11	09.14	22.10.11	10.21	Furnance vaccume low
		30.10.11	00.05	30.10.11	01.17	Fire out
		17.12.11	01.45	17.12.11	04.24	Furnance vaccume failure
		17.12.11	05.00	18.12.11	00.04	Condenser vaccum low
		25.12.11	03.25	27.12.11	01.19	Boiler tube leakage
		02.01.12	17.39	03.01.12	14.25	Boiler tube leakage
		07.01.12	02.38	07.01.12	03.28	Internal fault
		09.01.12	01.44	09.01.12	03.26	Flame failure
		16.01.12	15.05	16.01.12	15.47	False tripping of IO fan
		04.02.12	21.00	05.02.12	13.00	Generation backing down due to low demand and high frequency
		07.02.12	11.32	07.02.12	20.35	Electrical protection failure

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
2	95	03.04.11	00.50	20.04.11	21.35	Shut-down for over-hauling
		21.05.11	23.13	23.05.11	20.52	Generation backing down due to low demand and high frequency
		27.06.11	16.41	02.07.11	17.41	
		11.07.11	14.54	11.07.11	16.37	False relay tripping
		12.09.11	10.34	12.09.11	17.27	Furnace disturbance
		14.09.11	10.45	14.09.11	13.28	Furnace disturbance
		10.10.11	11.20	10.10.11	13.56	Flame failure
		17.10.11	12.32	24.10.11	21.35	Water shortage
		13.11.11	17.35	13.11.11	19.19	Grid disturbance
		20.12.11	08.12	20.12.11	09.33	Vacuum pressure low
		07.03.12	20.55	12.03.12	09.20	Generation backing down due to low demand and high frequency
3	95	17.04.11	17.00	17.04.11	18.58	Tripped along with tripping of associated transmission lines
		30.04.11	18.32	01.05.11	19.32	Due to tripping of generator transformer
		01.05.11	21.52	02.05.11	10.04	Electrical fault
		26.05.11	17.13	30.05.11	10.24	Generation backing down due to low demand and high frequency
		02.06.11	19.00	06.06.11	11.43	
		07.07.11	01.47	26.07.11	15.35	Turbine blade failure
		09.08.11	03.24	10.08.11	02.38	Generator failure
		15.09.11	17.07	15.09.11	18.06	Furnace failure
		02.10.11	21.56	02.10.11	23.10	Flame failure
		06.10.11	00.48	06.10.11	03.10	Flame failure
		11.10.11	20.16	11.10.11	21.07	Furnace fire out
		13.10.11	07.07	14.10.11	04.42	Boiler tube leakage
		15.10.11	01.12	25.10.11	18.27	Boiler tube leakage
		26.10.11	05.12	27.10.11	02.18	Water shortage
		20.11.11	14.11	21.11.11	07.23	Boiler tube leakage
		25.11.11	05.33	26.11.11	09.50	Economizer tube leakage
		15.12.11	10.30	16.12.11	15.00	Water wall tube leakage
		26.12.11	16.29	27.12.11	10.55	Boiler tube leakage
		05.02.12	13.54	06.02.12	12.40	Charging from Unit #3 to unit #1
		21.02.12	12.08	22.02.12	18.00	Generation backing down due to low demand and high frequency
		08.03.12	00.01	10.03.12	15.15	
4	210	17.04.11	17.00	17.04.10	20.26	Tripped along with tripping of associated transmission lines
		04.05.11	07.41	08.05.11	11.18	Control system failure
		24.06.11	13.07	24.06.11	16.16	Excitation system failure
		22.08.11	06.59	24.08.11	08.40	Shortage of water
		11.09.11	19.38	13.09.11	16.19	Low furnace pressure
		16.09.11	05.21	16.09.11	07.28	Flame failure
		16.09.11	10.25	16.09.11	11.40	Flame failure
		11.10.11	07.16	11.10.11	08.55	Flame failure
		11.10.11	11.33	11.10.11	12.30	Flame failure
		27.10.11	13.05	31.10.11	23.59	Furnace vacuum low
		01.11.11	00.00	22.12.11	20.18	Annual maintenance

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
4	210	23.12.11	01.30	24.12.11	19.10	Boiler tube leakage
		12.01.12	06.09	13.01.12	09.50	Boiler tube leakage
		09.02.12	19.57	10.02.12	19.00	Electrical protection fault
		07.03.12	06.42	07.03.12	08.25	ID Fan failure
		21.03.12	12.02	21.03.12	13.51	HPL level very high
5	210	17.06.11	17.47	21.06.11	10.20	Generation backing down due to low demand and high frequency
		21.06.11	11.41	21.06.11	13.04	Furnaces vacuum high
		22.06.11	01.09	22.06.11	04.54	Furnaces vacuum high
		22.06.11	05.07	22.06.11	08.15	Unit auxiliary transformer problem
		12.07.11	13.59	13.07.11	08.05	Hot spot on generation bus
		14.08.11	10.37	17.08.11	08.37	Generation backing down due to low demand and high frequency
		14.09.11	10.45	14.09.11	13.28	Flame failure
		16.09.11	13.50	16.09.11	15.15	Flame failure
		16.09.11	19.33	16.09.11	20.42	Flame failure
		17.09.11	07.52	17.09.11	13.47	Fire out
		19.10.11	11.16	29.10.11	16.45	Water shortage
		26.11.11	00.22	27.11.11	02.27	Boiler tube leakage
		26.12.11	19.05	28.12.11	09.42	Furnace failure
		13.02.12	10.30	16.02.12	21.42	Generation backing down due to low demand and high frequency
		17.03.12	09.47	17.03.12	11.12	Pump tripped
		27.03.12	00.22	27.03.12	15.43	Feed water leakage

(E) **BAWANA CCGT 1500MMW**

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	216	27.12.11	11:30	27.12.11	14:44	Generator Mechanical Fault trip
		30.12.11	7:49	31.12.11	20:43	High Fuel gas temp trip
		01.01.12	22:07	08.01.12	18:46	Gas restriction
		23.01.12	17:46	31.01.12	23:18	Gas restriction
		04.02.12	21:17	06.02.12	11:49	Hot water generator leakage
		07.02.12	6:57	07.02.12	11:43	Tripped on gas valve closure due to compressor trip
		19.02.12	5:45	26.12.12	14:06	Stopped due to gas restriction
		04.03.12	5:33	05.03.12	7:56	Stopped due to gas restriction
		07.03.12	22:10	12.03.12	11:24	backing down
		17.03.12	22:10	28.03.12	17:06	backing down
		29.03.12	15:57	04.04.12	12.05	backing down

**Note : Unit-1 of Bawana CCGT declared in Commercial Operation w.e.f. 00.00hrs. of 27.12.2012**

## (F) RITHALA CCGT (OWNED BY TPDDL)

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	31.6	16:23	05.04.11	17:45	05.04.11	GT tripped on "Loss of Exhaust thermocouple lockout".
		11:34	07.04.11	12:48	07.04.11	When RG 1 Line 1 was opened as planned, RG 1 Line 2 got overloaded and RG 1 line 2 breaker opened due to wrong overcurrent relay setting. This led to GT 1 GCB opening.
		16:02	14.04.11	17:23	14.04.11	GT 1 tripped due to fault at CENNET end. Both the line of RG1 got tripped due to which blackout condition occurred.
		8:21	15.04.11	11:55	15.04.11	GT-1 tripped at "Exhaust spread high trip" alarm as exhaust thermocouple "TT-XD-12" failed & its value reached to 600°C.
		4:40	17.04.11	6:27	17.04.11	GT 1 tripped on over voltage due to fault at CENNET end.
		16:57	21.04.11	13:39	22.04.11	GT1 forced outage taken as IGV cylinder hydraulic impulse line got punctured due to rubbing and vibration.
		10:00	25.04.11	12:44	25.04.11	GT 1 tripped due to tripping of PP1, RG 4. RG 1 line 1 & 2 breaker opened at RG-1 side at Rohini end and RG-1 Line-2 Breaker open on 50N fault at Rithala end. Black out occurred
		16:36	26.04.11	0:00	27.04.11	Station black out occurred due to opening of all 66 kV Breaker as there was bus 1 fault.
		11:37	06.05.11	13:08	06.05.11	Both RG line breakers at Cennet end tripped. Due to this GT-1 GCB tripped on overvoltage. Machine came on FSNL
		16:22	09.05.11	18:24	09.05.11	GT tripped on Under Frequency due to tripping of RG3/PP1 RG1 grid due to breaking of conductor at Tower 12,13 of PP1 RG1 circuit
		12:18	20.05.11	14:29	20.05.11	GT 1 GCB tripped on "Exhaust fan cooling pressure low-unload" due tripping of TK-1 fan on Earth fault
		15:25	20.05.11	3:15	21.05.11	GT 1 tripped again due to Triconex card failure. All exhaust Thermo couple, Bearing LO drain temp, Load gear bearing Temp., CTD, Wheel space temp., comp. I/L TC, LO headers temp were showing zero value. All above parameter Fail alarm appeared with "Loss of exhaust thermocouple lockout"
		3:21	21.05.11	3:57	21.05.11	Turbine tripped on "IO main alarm TS 3000 in dual mode". Checked by IMD and found controller cards on fault (Rack-3 all card on fault).
		14:45	21.05.11	11:01	23.05.11	<ul style="list-style-type: none"> <li>• At 4:03hrs TK1 fan again tripped on earth fault. So load was maintained at 5 MW.</li> <li>• At 14:45Hrs shutdown of GT1 taken due non availability of TK1 (Turbine frame cooling fan)</li> </ul>
		17:31	23.05.11	19:55	23.05.11	GT 1 shutdown for TK-1 fan frame strengthening job.

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage	
		Date	Time	Date	Time		
1	31.6		18:26	24.05.11	20:00	24.05.11	RG-1 line-2 breaker R-Phase string insulator got damaged due to short circuit by bird.GT-1 tripped on under voltage.
			16:48	27.05.11	17:36	27.05.11	GT-1 Came on FSNL due to blackout and GT was stopped manually as the auxiliaries were not available.
			15:43	28.05.11	16:36	28.05.11	GT-1 Came on FSNL due to blackout and GT was stopped manually as the auxiliaries were not available.
			10:00	30.05.11	1:15	31.05.11	Planned for Jumper Connection for 6, 7 Bay; GT-2 TK Fan modifications; Damper Logic checking; Isolator rectification; Deluge Valve Inlet line strainer etc.
			5:43	31.05.11	7:20	31.05.11	As per CENNET islanding occurred. GT 1 GCB opened & turbine came to FSNL.
			11:10	05.06.11	14:48	05.06.11	GT 1 tripped on over frequency due to fault in switchyard in GT1 bay B-Phase line due to birds nest
			4:00	07.06.11	17:20	07.06.11	GT 1 taken shutdown coz TK 1 Fan got tripped on earth leakage fault and having high abnormal sound from motor DE bearing side
			18:26	14.06.11	0:03	15.06.11	GT 2 tripped due to fault at CENNET end. Turbine ready to start not coming due to 33CB1 bleed valve position feedback problem.
			14:52	17.06.11	16:26	17.06.11	GT 1 GCB got open on over current protection due to fault at Cennet end
			10:11	19.06.11	11:44	19.06.11	GT1 Tripped due to faults in Triconex Rack3 control cards.
			10:00	06.07.11	18:49	06.07.11	GT 1 shutdown taken for diverting damper logic checks.
			8:19	10.07.11	11:57	10.07.11	Black out occurred due to grid failure at Cennet end.
			17:10	18.07.11	17:45	18.07.11	GT1 tripped on "Exhaust Temp High" due to exhaust thermocouple-12 Failure
			5:56	26.07.11	8:47	26.07.11	At 5:56 hrs station black out happened and both GTs GCB got opened due to problem at Cennet end and suspected lin-2 side fault.
			6:02	27.07.11	8:14	27.07.11	GT GCB got opened due to black out due to CENNET and tripped on exhaust spread is high.
			10:08	29.07.11	19:37	29.07.11	GT1 was taken shutdown for implementation of islanding scheme.
			19:47	29.07.11	20:00	29.07.11	GCB tripped on under excitation
			17:16	02.08.11	21:58	02.08.11	At 17:16 hrs GT 1 tripped on trip on exhaust spread high while implementing the islanding scheme on house load.
			14:59	03.08.11	15:35	03.08.11	GT-01 islanding scheme working status checked on home load for the second attempt.
			9:35	04.08.11	17:37	05.08.11	GT shut down taken due to unavailability of Tk1 fan motor as its winding lead insulation damaged.
			11:10	13.08.11	11:42	13.08.11	GCB got opened due to fault in 220KVat Rohini grid, GT sustained on FSNL
			12:15	15.08.11	19:07	15.08.11	GT shutdown taken due to High grid frequency as per cennet (LD) instructions.
			14:36	16.08.11	18:51	16.08.11	GT shutdown taken for Exhaust frame cooling fan-02 maintenance. Motor checked found motor rotor got jammed position.

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage	
		Date	Time	Date	Time		
1	31.6		19:30	16.08.11	20:17	16.08.11	GT shutdown taken as per instruction from Cennet for RG Line swithing purpose.
			9:04	20.08.11	10:13	20.08.11	GT has tripped due to GT auxiliary supply failure
			19:11	25.08.11	20:05	25.08.11	GT-1 tripped as GFD not closed due to over load relay actuated during the shutdown of HRSG-1
			12:38	06.09.11	21:45	06.09.11	GT forced shutdown taken due to heavy lube oil leak from hydraulic oil pump suction line.
			20:14	08.09.11	22:45	08.09.11	GT-1 GCB open on under frequency and over voltage as CENET side 220 kV line tripped.
			17:57	29.09.11	19:20	29.09.11	GT-1 tripped on spread high (reached to 92), Checked by IMD and found Rack-3 control card in Triconex panel were found faulty.
			20:17	29.09.11	20:41	29.09.11	GT-1 load selection change from droop mode to isochronous mode due to low frequency (48.8 Hz). GCB was open manually to change the load selection to droop mode
			21:02	29.09.11	23:20	29.09.11	GT-1 load selection change from droop mode to isochronous mode due to low frequency (48.8 Hz).
			10:19	01.10.11	22:47	01.10.11	GT#1 shut down taken to arrest the water leak from the turbine frame support cooling jacket
			12:33	07.10.11	17:19	08.10.11	GT1 came on Islanding at 12:02 Hrs due to under frequency. At 12:46 Hrs black out occurred due to tripping of both PP1 circuit 1 & 2 from CENNET side.
			17:21	08.10.11	17:58	08.10.11	On as machine synchronised load shoot-up to 26MW. For load shootup problem “Min speed reference control constant” changed by C&I and clearance given for synchronise.
			10:54	09.10.11	13:30	09.10.11	GT got tripped on “SRV not tracking”
			11:45	15.10.11	13:17	15.10.11	GT 1 GCB opened on SRV not tracking trip and TRICONEX rack-3 control cards were also found faulty.
			20:45	17.10.11	22:43	17.10.11	GT 1 tripped due to fault at CENNET end.
			14:00	19.10.11	16:21	19.10.11	GT 1 tripped on over voltage due to fault in 220 KV from CENNET side.
			22:50	22.10.11	23:25	22.10.11	GT1 tripped on “SRV not Tracking-Trip”.
			7:01	23.10.11	8:27	23.10.11	GT1 tripped on “SRV not Tracking-Trip”.
			12:23	02.11.11	13:52	02.11.11	GT-01 generator vibration transducer BB #4, 7, 8, 11, &12 fault alarms came and as per logic GT #1 went under shut down
			5:44	20.11.11	16:42	20.11.11	GT tripped on IGV&SRV not tracking trip
			19:28	20.11.11	20:05	20.11.11	GT tripped on SRV failed to track
			19:00	29.11.11	19:35	29.11.11	GT 1 GCB manually opened for RG 1 line 1 supply changeover at 220 kV side from Gopalpur to Rohini at 19:00 hrs
			01:27	01.12.11	20:01	26.12.11	GT-1 shut down taken for cumbustion inspection
			20:41	26.12.11	22:36	26.12.11	IGV not Tracking Trip
			18:03	28.12.11	18:31	28.12.11	GFD close feedback trip
			07:05	30.12.11	10:25	30.12.11	RG1 line supply failed at CENNET end due to which GT came on “ISLANDING MODE” and sustained at 15 MW.
			09:55	02.01.12	11:20	02-01-12	Boiler damper trip
			01:59	05.01.12	3:31	05.01.12	GT came on ISLANDING mode
			03:35	05.01.12	10:46	05.01.12	GT tripped on GFD not closed feedback

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
1	31.6	06:51	07.01.12	13:09	07.01.12	RG1 line1 tripped at CENNET end
		09:39	10.01.12	13:18	10.01.12	tripping of 220 kV rohini grid
		16:44	04.02.12	23:25	04.02.12	shutdown taken manually to attend the oil leakage from the HT side bushing of Generator Transformer-1.
		20:50	14.02.12	23:50	14.02.12	Shutdown command given due to tripping of 88BT fan motor on overload.
		17:29	16.02.12	18:47	16.02.12	GT-1 came on island mode due to tripping of RG1 - PP1 line
		12:36	21.02.12	19:51	22.02.12	GT-1 shutdown taken to start GT-2
		17:47	29.02.12	20:23	29.02.12	GT-1 was stopped due to gas allocation.
		15:06	01.03.12	18:05	19.03.12	shutdown taken due to fuel gas unavailability.
		01:42	20.03.12	18:40	29.03.12	GT-1 was stopped
2	31.6	11:34	07.04.11	5:56	15.04.11	When RG 1 Line 1 was opened as planned, RG 1 Line 2 got overloaded and RG 1 line 2 breaker opened due to wrong overcurrent relay setting. This led to GT 2 GCB opening.
		4:40	17.04.11	6:48	17.04.11	GT 2 tripped on over voltage due to fault at CENNET end.
		4:12	20.04.11	10:49	20.04.11	GT 2 tripped on “m63QTX Lube oil pressure trip”.
		22:15	22.04.11	0:17	23.04.11	GT-2 tripped due to “GCV not tracking-mGCV_track” ALARM & “GCV not tracking mGCV_tr” TRIP fault.
		10:00	25.04.11	15:28	25.04.11	GT 2 tripped due to tripping of PP1,RG-04. RG-1 line 1 & 2 breaker open at RG-1 side at rohini end and RG-1 Line-2 Breaker open on 50N fault at rithala end. Black out
		18:42	25.04.11	20:47	25.04.11	GT 2 got tripped on “m63QTX Lube oil pressure trip”.
		16:36	26.04.11	18:06	26.04.11	Station black out occurred due to opening of all 66 kV Breaker as there was bus 1 fault.
		12:28	06.05.11	19:57	06.05.11	At 11:37 hrs Both RG line breakers at Cennet end tripped. Due to GT-2 came on house load of 0.5 MW in isochronous mode. At 12:28 hrs GT-2 tripped at lube oil pressure low though the actual lube oil pressure was 1.8 bar in the turbine bearing header
		16:22	09.05.11	17:55	09.05.11	GT tripped on Under Frequency due to tripping of RG3/PP1 RG1 grid due to breaking of conductor at Tower 12,13 of PP1 RG1 circuit
		13:06	13.05.11	16:59	13.05.11	GT 2 tripped due to “GCV not tracking” fault.
		12:45	15.05.11	13:55	15.05.11	GT 2 tripped due to “GCV not tracking” fault.
		12:34	17.05.11	15:09	17.05.11	GT 2 tripped on Low Lube Oil pressure.
		20:44	17.05.11	23:49	17.05.11	GT 2 tripped due to “GCV not tracking” fault. (FSR-42.09% and GCV -50.48%) At the same time, exhaust temperature High alarm also appeared
		3:35	21.05.11	4:30	21.05.11	GT 2 tripped on “Lube oil pressure low trip”. Triconex controller problem (rack 3 one card on fault).

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage
		Date	Time	Date	Time	
2	31.6	9:00	22.05.11	10:06	23.05.11	Shutdown as per CENNET
		23:48	23.05.11	0:38	24.05.11	GT 2 tripped on "GCV not tracking trip".
		18:26	24.05.11	20:40	24.05.11	RG-1 line-2 breaker R-Phase string insulator damaged due to short circuit by bird.GT-1 &2 tripped on under voltage, Generator transformer -1 & 2 HV side breaker open on 51N. RG-1 line- 1 & 2 breakers were not tripped.
		15:20	25.05.11	17:37	25.05.11	GT-2 tripped due to "GCV not tracking alarm"
		16:48	27.05.11	18:12	27.05.11	GT-2 Came on FSNL due to blackout and GT was stopped manually as the auxiliaries were not available.
		15:43	28.05.11	16:28	28.05.11	GT-2 Came on FSNL due to blackout and GT was stopped manually as the auxiliaries were not available.
		10:14	30.05.11	1:19	31.05.11	Planned for Jumper Connection for 6, 7 Bay; GT-2 TK Fan modifications; Damper Logic checking; Isolator rectification; Deluge Valve Inlet line strainer etc.
		5:43	31.05.11	7:12	31.05.11	As per CENNET islanding occurred, normalization started by CENNET by reducing load in steps of 5MW. At around 6MW GT 2 GCB opened on overvoltage. Total black out occurred.
		11:10	05.06.11	14:39	05.06.11	GT 2 tripped on over frequency due to fault in switchyard in GT1 bay B-Phase line due to birds nest.
		3:06	06.06.11	3:36	06.06.11	GT 2 tripped on "Lube Oil Pressure Low".
		6:35	06.06.11	8:01	06.06.11	GT 2 tripped on "Lube Oil Pressure Low".
		18:26	14.06.11	20:38	14.06.11	GT 2 tripped due to fault at CENNET end.
		14:52	17.06.11	16:16	17.06.11	GT 2 GCB got open on over current protection due to fault at Cennet end
		20:18	20.06.11	1:58	21.06.11	GT 2 got trip on "lube oil pressure low alarm" m63QTX when diverter damper checking was going on. At 21:17 hrs GT 2 ratchet got stop due to "RATCHER TROUBLE".
		17:13	21.06.11	17:41	21.06.11	GT got trip on "loss of flame" m28fdt during control system remote/local command checking.
		14:11	27.06.11	15:17	27.06.11	GT got trip on "Lube oil pr low" m63QTX.
		1:36	28.06.11	4:03	28.06.11	GT 2 tripped on "exhaust spread high trip" m30SPT since exhaust thermocouple 9 showing erratic value.
		10:00	28.06.11	8:32	01.07.11	GT 2 planned outage taken for inter connection of STG generator cables to GTR 2
		17:38	02.07.11	18:13	02.07.11	GT2 tripped on "Exhaust spread high trip" due to exhaust thermocouple No.12 failure.
		3:05	08.07.11	11:12	08.07.11	STG synchronizing works
		8:19	10.07.11	10:41	10.07.11	Black out occurred due to grid failure at Cennet end.
		19:43	13.07.11	22:41	13.07.11	For synchronizing STG on Generator Transformer 2.
		14:10	20.07.11	16:14	20.07.11	For STG commissioning activities
		18:41	20.07.11	23:00	20.07.11	For STG commissioning activities
		5:56	26.07.11	8:15	26.07.11	Station black out happened and both GTs GCB got opened due to problem at Cennet end and suspected line-2 side fault.

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage	
		Date	Time	Date	Time		
2	31.6		6:00	27.07.11	8:23	27.07.11	GT GCB got opened due to black out due to CENNET and tripped on exhaust spread is high.
			11:10	27.07.11	11:45	27.07.11	GT-2 GCB tripped while downloading system software and turbine sustained in FSNL.
			17:30	06.08.11	22:50	06.08.11	GT shut down taken for STG start up activity.
			23:20	06.08.11	6:38	07.08.11	GT shut down given; due to 88TK fan-1 gives more humming noise from the module
			8:54	07.08.11	11:43	07.08.11	GT shut down given due to 88TK fan-1 motor bolts are loose condition.
			12:44	09.08.11	23:30	10.08.11	GT shut down taken for STG start up activity.
			15:49	11.08.11	20:27	11.08.11	GT shutdown taken for removing the STG cables from the GT2 transformer
			11:11	13.08.11	17:32	13.08.11	GCB got opened due to fault in 220KVat Rohini grid, GT sustained on FSNL
			13:04	15.08.11	19:30	15.08.11	GT shutdown taken due to High grid frequency as per cennet (LD) instructions
			19:03	16.08.11	20:23	16.08.11	GT generator CB got open due to fault in RG-01 line-02 and GT got trip on "Exhaust spread high"
			11:23	18.08.11	11:41	18.08.11	GCB was opened at 11:23 hrs as its load selection came on NONE and its load was fluctuating very much.
			20:30	18.08.11	22:15	18.08.11	GT-2 got tripped on Exhaust spread high.
			9:02	20.08.11	10:21	20.08.11	GT has tripped due to GT auxiliary supply failure
			8:07	21.08.11	6:50	22.08.11	GT has taken into shutdown for attending load gear bearing oil seal replacement towards generator side.
			9:18	22.08.11	10:08	22.08.11	GT came on 7 MW islanding due fault at RG-05 grid.
			1:23	04.09.11	15:10	15.02.12	At 1:23hrs GT tripped on High bearing vibration of compressor section (i.e. BB1& BB2).Too many metal parts were observed in the diffuser duct.
			18:13	15.02.12	13:06	21.02.12	shutdown taken due to lube oil leakage from load gear box
			10:17	22.02.12	12:39	29.02.12	GT 2 shutdown taken.
			12:52	29.02.12	17:20	29.02.12	tripped on "Loss of exhaust thermocouple lockout
			19:38	01.03.12	18:57	01.03.12	GCB got opened without any alarm.
			10:45	05.03.12	13:15	05.03.12	
			09:38	08.03.12	9:56	08.03.12	GCB tripped on 'under frequency' due to fault at CENNET end.
			10:12	09.03.12	11:27	09.03.12	GT-2 was stopped to attend TK fan imbalance current
			17:57	13.03.12	18:32	13.03.12	GT-2 came on islanding mode due to fault at CENNET end
			17:41	17.03.12	19:56	17.03.12	Turbine co part ent gas detector high - trip
			01:58	18.03.12	2:30	18.03.12	Gas co part ent gas detected- Trip
			06:07	18.03.12	14:45	18.03.12	planned outage taken as per the Gail instructions
			14:08	19.03.12	15:20	19.03.12	GT-2 de-synchronized for transferring RG-1 Line-2 on Gopalpur grid and RG-1 Line-1 on Rohini grid
			17:57	21.03.12	18:21	21.03.12	GCB got tripped on over voltage due to fault at CENNET end.

Unit	Capacity in MW	Outage		Synchronization		Reason of Outage	
		Date	Time	Date	Time		
STG	31.6		10:01	08.07.11	20:16	13.07.11	STG Trip command given due to AVR problem.
			22:08	13.07.11	14:21	20.07.11	Heavy Leak observed from Flange Gasket of LP Feed water V/V at LP Drum
			14:49	20.07.11	18:58	20.07.11	Both CEP pumps filters got chock up and HP drum Level transmitter gas kit damage.
			22:22	20.07.11	18:00	06.08.11	low vaccum since the CW pump got tripped due to malfunctioning of discharge valve limit switch.
			21:00	06.08.11	16:07	09.08.11	STG shut down given, because of cooling water sump level low.
			8:22	10.08.11	12:30	10.08.11	STG was tripped manually through EPB as the gas flow damper was closed due to HP drum level transmitter trouble
			20:20	10.08.11	18:55	23.08.11	STG was tripped on "Exhaust pressure high" due to CW PP1 discharge valve trouble. (Hydraulic oil leak.)
			19:35	25.08.11	18:52	26.08.11	STG GCB opened due to HRSG-2 tripped on low HP circulation flow. STG Gen. Transformer tripped on under voltage at time of STG GCB opening
			2:11	02.09.11	5:03	02.09.11	STG tripped on high vibration (ZIT518A), which was malfunctioning. Later it got rested by itself. Same time both the WHRSG's were tripped on interlock
			12:38	06.09.11	3:54	29.12.11	STG desynchronised and shut down taken for attending hydraulic oil leakage in GT#01 hydraulic oil pump.
			12:53	29.12.11	10:41	30.12.11	STG tripped on Generator bearing vibration (exciter End)
			09:55	02.01.12	13:30	02.01.12	STG tripped manually as HRSG 1 GFD got tripped
			17:18	03.01.12	16:31	04.01.12	Generator vibration high
			03:34	04.01.12	6:30	04.01.12	GCB tripped on over frequency due to grid.
			16:04	06.01.12	17:32	06.01.12	high vibrations at Exciter end
			09:15	07.01.12	0:00	05.04.12	STG is under forced outage due to high vibrations at its Exciter end.

## 9. POWER SUPPLY POSITION OF DELHI DURING 2011-12

### 9.1 Power supply position during the month of April 2011

All figures in MUs

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	81.307	79.055	81.251	79.000
(ii)	RIHAND-I	69.564	67.651	69.483	67.572
(iii)	RIHAND-II	85.566	83.205	85.450	83.092
(iv)	UNCHAHAR-I	8.716	8.476	8.526	8.291
(v)	UNCHAHAR-II	32.244	31.358	31.547	30.680
(vi)	UNCHAHAR-III	20.279	19.721	19.815	19.270
(vii)	DADRI(TH)	485.691	472.321	466.533	453.717
(viii)	DADRI(TH)- Stage-II	505.469	491.532	498.054	484.327
(ix)	FARAKA	9.627	9.363	7.708	7.497
(x)	KHELGAON	21.600	21.000	21.209	20.621
(xi)	KHELGAON-II	80.296	78.079	79.531	77.336
(xii)	ANTA(GT)	18.019	17.521	13.654	13.279
(xiii)	ANTA(Liquid)	1.624	1.582	0.053	0.052
(xiv)	ANTA(RLNG)	9.334	9.076	0.199	0.194
(xv)	AURAIYA(GT)	30.017	29.190	23.084	22.453
(xvi)	AURAIYA(Liquid)	3.526	3.432	0.000	0.000
(xvii)	AURAIYA(RLNG)	14.873	14.462	0.353	0.345
(xviii)	DADRI(GT)	44.391	43.167	32.982	32.079
(xix)	DADRI(Liquid)	1.780	1.733	0.000	0.000
(xx)	DADRI (RLNG)	15.524	15.097	0.339	0.330
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1539.447</b>	<b>1497.021</b>	<b>1439.771</b>	<b>1400.135</b>
(i)	TANAKPUR	1.666	1.620	1.666	1.620
(ii)	CHAMERA-I	19.478	18.947	19.478	18.947
(iii)	CHAMERA-II	16.520	16.071	16.520	16.071
(iv)	BAIRA-SUIL	10.559	10.271	10.559	10.271
(v)	SALAL	33.402	32.489	33.402	32.489
(vi)	DULASTI	25.619	24.923	25.619	24.923
(vii)	DAULI GANGA	6.547	6.371	6.547	6.371
(viii)	URI (HEP)	34.392	33.445	34.392	33.445
(ix)	SEWA -II	10.769	10.472	10.769	10.472
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>158.952</b>	<b>154.609</b>	<b>158.952</b>	<b>154.609</b>
(i)	TEHRI	34.937	33.981	34.937	33.981
(ii)	KOTESHWAR	3.461	3.364	3.396	3.301
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>38.398</b>	<b>37.345</b>	<b>38.333</b>	<b>37.282</b>
(i)	NAPP	17.380	16.901	17.380	16.901
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	24.850	24.156	24.850	24.156
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>42.230</b>	<b>41.057</b>	<b>42.230</b>	<b>41.057</b>
<b>E</b>	NATHPA JHAKHRI (SJVNLL)	37.002	35.998	37.002	35.998
<b>F</b>	JHAJJAR	85.849	83.470	85.842	83.463
<b>G</b>	TALA	1.524	1.482	1.524	1.482
<b>H</b>	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1903.402	1850.982	1803.654	1754.026

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	GUJRAT	20.195	19.397	18.570	18.075
(ii)	MAHARASHTRA	8.201	7.865	7.446	7.241
(iii)	DVC	38.354	37.402	36.042	35.052
(iv)	DVC (TATA STEEEL)	24.666	24.051	23.176	22.530
(v)	WEST BENGAL	12.032	11.735	11.343	11.040
(vi)	CHATTISHGARH	60.470	58.120	55.110	53.604
(vii)	ORISSA	120.955	117.973	113.038	109.925
(viii)	PUNJAB	50.404	49.054	50.404	49.054
(ix)	POWER EXCHANGE(IEX)	0.470	0.458	0.470	0.458
(x)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	335.747	326.055	315.599	306.979
J	TOTAL IMPORT (H + I)	2239.149	2177.037	2119.253	2061.005
	<u>EXPORT</u>				
(i)	RAJASTHAN	-1.780	-1.829	-1.780	-1.829
(ii)	UTTAR PRADESH	-18.017	-18.518	-18.017	-18.518
(iii)	PUNJAB	-0.015	-0.015	-0.015	-0.015
(iv)	ANDHRA PRADESH	-53.414	-56.562	-56.562	-58.162
(v)	KERALA	-5.168	-5.458	-5.458	-5.623
(vi)	TAMILNADU	-5.195	-5.502	-5.502	-5.658
(vii)	MEGHALAYA	-11.453	-11.745	-11.745	-12.078
(viii)	HIMACHAL PRADESH	-0.022	-0.023	-0.022	-0.023
(ix)	MADHYA PRADESH	-0.164	-0.170	-0.170	-0.175
(x)	WEST BENGAL	-37.464	-38.430	-38.430	-39.539
(xi)	POWER EXCHANGE (IEX)	-285.734	-293.903	-285.734	-293.903
(xii)	POWER EXCHANGE (PX)	-17.859	-18.389	-17.859	-18.389
(xiii)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(xiv)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-436.285	-450.544	-441.294	-453.912
L	TOTAL DRAWAL FROM THE GRID	1802.864	1726.493	1677.959	1607.098
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-386.842
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				89.467
(ii)	JHAZZAR SHARE IN RPH				0.660
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				88.807
O	GAS TURBINE				93.085
P	PRAGATI				162.228
Q	RITHALA CCGT				23.388
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				393.105
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				760.613
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.145
(ii)	RENEWABLE SOLAR (BRPL)				0.102
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.247
V	TOTAL AVAILABILITY WITHIN DELHI				760.860
W	TOTAL CONSUMPTION				1981.116
X	LOAD SHEDDING				1.504
Y	REQUIREMENT				1982.620
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				18.193
AA	NET CONSUMPTION OF DELHI				1962.923

## 9.2 Power supply position during the month of May 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	98.710	96.141	97.542	95.003
(ii)	RIHAND-I	75.494	73.538	74.787	72.848
(iii)	RIHAND-II	93.838	91.406	92.862	90.454
(iv)	UNCHAHAR-I	13.761	13.401	12.954	12.615
(v)	UNCHAHAR-II	28.574	27.847	27.906	27.196
(vi)	UNCHAHAR-III	21.720	21.158	21.248	20.698
(vii)	DADRI(TH)	506.033	492.907	479.855	467.420
(viii)	DADRI(TH)- Stage-II	536.218	522.334	510.458	497.249
(ix)	FARAKA	11.786	11.480	10.858	10.578
(x)	KHELGAON	30.364	29.578	28.235	27.509
(xi)	KHELGAON-II	67.840	66.097	63.634	62.007
(xii)	ANTA(GT)	20.964	20.419	16.430	16.006
(xiii)	ANTA(Liquid)	1.580	1.540	0.000	0.000
(xiv)	ANTA(RLNG)	8.284	8.070	1.807	1.761
(xv)	AURAIYA(GT)	33.123	32.268	26.312	25.636
(xvi)	AURAIYA(Liquid)	5.885	5.729	0.017	0.016
(xvii)	AURAIYA(RLNG)	11.579	11.280	2.422	2.361
(xviii)	DADRI(GT)	50.003	48.710	40.540	39.498
(xix)	DADRI(Liquid)	0.000	0.000	0.000	0.000
(xx)	DADRI (RLNG)	12.918	12.580	2.157	2.102
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1628.674</b>	<b>1586.483</b>	<b>1510.024</b>	<b>1470.957</b>
(i)	TANAKPUR	5.189	5.054	5.189	5.054
(ii)	CHAMERA-I	30.335	29.549	30.335	29.549
(iii)	CHAMERA-II	31.506	30.690	31.506	30.690
(iv)	BAIRA-SUIL	12.932	12.599	12.932	12.599
(v)	SALAL	49.923	48.627	49.923	48.627
(vi)	DULASTI	37.377	36.410	37.377	36.410
(vii)	DAULI GANGA	17.549	17.092	17.549	17.092
(viii)	URI (HEP)	39.531	38.508	39.531	38.508
(ix)	SEWA -II	12.056	11.744	12.056	11.744
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>236.398</b>	<b>230.273</b>	<b>236.398</b>	<b>230.273</b>
(i)	TEHRI	41.343	40.273	41.278	40.210
(ii)	KOTESHWAR	0.000	0.000	0.000	0.000
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>41.343</b>	<b>40.273</b>	<b>41.278</b>	<b>40.210</b>
(i)	NAPP	10.637	10.356	10.637	10.356
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	25.006	24.349	25.006	24.349
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>35.643</b>	<b>34.705</b>	<b>35.643</b>	<b>34.705</b>
<b>E</b>	<b>NATHPA JHAKHRI (SJVNLL)</b>	<b>110.580</b>	<b>107.710</b>	<b>110.580</b>	<b>107.710</b>
<b>F</b>	<b>JHAJJAR</b>	<b>16.391</b>	<b>15.981</b>	<b>16.391</b>	<b>15.981</b>
<b>G</b>	<b>TALA</b>	<b>5.185</b>	<b>5.049</b>	<b>5.185</b>	<b>5.049</b>
<b>H</b>	<b>TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)</b>	<b>2074.214</b>	<b>2020.474</b>	<b>1955.499</b>	<b>1904.885</b>

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(x)	DVC	66.765	64.902	62.537	60.924
(xi)	DVC (TATA STEEEL)	18.054	17.549	16.909	16.467
(xii)	WEST BENGAL	62.108	60.376	58.354	56.851
(xiii)	CHATTISHGARH	29.144	28.023	26.596	25.907
(xiv)	UTTRANCHAL	16.800	16.326	16.800	16.326
(xvi)	ORISSA	159.575	155.125	148.618	144.768
(xviii)	ANDHRA PRADESH	1.083	1.031	0.983	0.959
(xix)	HIMACHAL PRADESH	13.276	12.911	13.276	12.911
(xx)	JAMMU & KASHMIR	74.400	72.474	74.400	72.474
(xxi)	UNREQUISITIONED SURPLUS	0.050	0.049	0.050	0.049
(xxii)	POWER EXCHANGE(IEX)	3.927	3.828	3.927	3.828
(xxiii)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	Total Bilateral Import	445.182	432.594	422.450	411.464
J	Total Import	2519.396	2453.068	2377.949	2316.349
	<u>Export</u>				
(vii)	KERALA	-0.754	-0.774	-0.774	-0.794
(ix)	MEGHALAYA	-6.036	-6.246	-6.246	-6.412
(xv)	HARYANA	-8.557	-8.787	-8.557	-8.787
(xvi)	POWER EXCHANGE (IEX)	-156.829	-160.983	-156.829	-160.983
(xvii)	POWER EXCHANGE (PX)	-0.055	-0.056	-0.055	-0.056
(xviii)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(xix)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	Total Export	-172.231	-176.846	-172.461	-177.032
L	TOTAL DRAWAL FROM THE GRID	2347.165	2276.222	2205.488	2139.317
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-361.477
	<b>AVAILABILITY FROM OWN SOURCES</b>				
(i)	RPH				90.992
(ii)	JHAZZAR SHARE IN RPH				0.660
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				90.332
O	GAS TURBINE				118.350
P	PRAGATI				208.868
Q	RITHALA CCGT				24.982
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				410.363
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				852.895
	<b>RENEWABLE ENERGY SOURCES</b>				
(i)	RENEWABLE SOLAR (NDPL)				0.145
(ii)	RENEWABLE SOLAR (BRPL)				0.114
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.259
V	TOTAL AVAILABILITY WITHIN DELHI				853.154
W	TOTAL CONSUMPTION				2630.994
X	LOAD SHEDDING				3.434
Y	REQUIREMENT				2634.428
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				21.316
AA	NET CONSUMPTION OF DELHI				2609.678

### 9.3 Power supply position during the month of June 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	100.307	97.615	95.176	92.624
(ii)	RIHAND-I	73.701	71.731	69.877	68.012
(iii)	RIHAND-II	88.814	86.435	83.635	81.397
(iv)	UNCHAHAR-I	17.207	16.747	14.504	14.118
(v)	UNCHAHAR-II	29.317	28.540	25.529	24.856
(vi)	UNCHAHAR-III	21.466	20.892	18.485	17.993
(vii)	DADRI(TH)	518.400	504.533	427.516	416.127
(viii)	DADRI(TH)- Stage-II	498.973	485.621	452.567	440.503
(ix)	FARAKA	13.356	12.998	6.789	6.609
(x)	KHELGAON	24.873	24.205	17.432	16.976
(xi)	KHELGAON-II	52.049	50.671	38.758	37.767
(xii)	ANTA(GT)	24.954	24.286	14.597	14.211
(xiii)	ANTA(Liquid)	0.000	0.000	0.000	0.000
(xiv)	ANTA(RLNG)	5.723	5.571	0.404	0.393
(xv)	AURAIYA(GT)	29.436	28.649	17.465	17.005
(xvi)	AURAIYA(Liquid)	2.315	2.250	0.000	0.000
(xvii)	AURAIYA(RLNG)	8.155	7.935	0.450	0.438
(xviii)	DADRI(GT)	51.586	50.205	30.634	29.825
(xix)	DADRI(Liquid)	0.000	0.000	0.000	0.000
(xx)	DADRI (RLNG)	10.957	10.664	0.626	0.609
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1571.589</b>	<b>1529.548</b>	<b>1314.444</b>	<b>1279.463</b>
(i)	TANAKPUR	7.039	6.850	7.039	6.850
(ii)	CHAMERA-I	29.991	29.187	29.991	29.187
(iii)	CHAMERA-II	30.321	29.511	30.321	29.511
(iv)	BAIRA-SUIL	8.112	7.896	8.112	7.896
(v)	SALAL	48.923	47.605	48.923	47.605
(vi)	DULASTI	36.627	35.648	36.627	35.648
(vii)	DAULI GANGA	21.396	20.822	21.396	20.822
(viii)	URI (HEP)	38.263	37.239	38.263	37.239
(ix)	SEWA -II	5.730	5.576	5.730	5.576
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>226.402</b>	<b>220.334</b>	<b>226.402</b>	<b>220.334</b>
(i)	TEHRI	21.970	21.375	21.970	21.375
(ii)	KOTESHWAR	0.000	0.000	0.000	0.000
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>21.970</b>	<b>21.375</b>	<b>21.970</b>	<b>21.375</b>
(i)	NAPP	17.743	17.269	17.743	17.269
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	38.983	37.926	38.983	37.926
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>56.726</b>	<b>55.195</b>	<b>56.726</b>	<b>55.195</b>
E	NATHPA JHAKHRI (SJVNLL)	112.522	109.512	112.522	109.512
F	JHAJJAR	77.856	75.790	70.712	68.843
G	TALA	12.453	12.115	12.453	12.115
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	2079.518	2023.869	1815.229	1766.837

S. no.	<u>SOURCE</u>	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL IMPORT</u>				
(i)	RAJASTHAN	35.208	34.267	35.208	34.267
(ii)	GOA	25.732	24.690	23.472	22.844
(iii)	MADHYA PRADESH	47.920	45.951	43.581	42.400
(iv)	MAHARASHTRA	31.365	30.092	28.494	27.729
(v)	SIKKIM	20.608	20.030	20.014	19.482
(vi)	KERALA	26.496	25.190	24.950	24.282
(vii)	DVC	161.893	157.352	151.605	147.549
(viii)	DVC (TATA STEEEL)	30.806	29.944	28.850	28.082
(ix)	WEST BENGAL	18.770	18.238	17.625	17.155
(x)	CHATTISHGARH	59.288	56.902	53.990	52.532
(xi)	UTTRANCHAL	70.747	68.867	70.747	68.867
(xii)	MEGHALAYA	5.415	5.263	5.074	4.938
(xiii)	ORISSA	100.478	97.667	93.460	90.955
(xiv)	ANDHRA PRADESH	9.165	8.712	8.312	8.086
(xv)	HIMACHAL PRADESH	28.803	28.038	28.803	28.038
(xvi)	POWER EXCHANGE(IEX)	1.524	1.482	1.524	1.482
(xvii)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	674.218	652.685	635.709	618.688
J	TOTAL IMPORT (H + I)	2753.736	2676.554	2450.938	2385.525
	<u>EXPORT</u>				
(i)	PUNJAB	-3.832	-3.940	-3.832	-3.940
(ii)	ANDHRA PRADESH	-0.732	-0.766	-0.766	-0.788
(iii)	MEGHALAYA	-5.006	-5.178	-5.178	-5.321
(iv)	MAHARASHTRA	-0.789	-0.823	-0.823	-0.843
(v)	POWER EXCHANGE (IEX)	-158.379	-162.700	-158.379	-162.700
(vi)	POWER EXCHANGE (PX)	-7.347	-7.543	-7.347	-7.543
(vii)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(viii)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-176.085	-180.950	-176.325	-181.135
L	TOTAL DRAWAL FROM THE GRID	2577.651	2495.604	2274.613	2204.390
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-280.857
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				83.761
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				83.761
O	GAS TURBINE				109.202
P	PRAGATI				188.420
Q	RITHALA CCGT				27.033
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				354.284
T	TOTAL AVAILABILITY WITHIN DELHI(7+8) RENEWABLE ENERGY SOURCES				762.700
(i)	RENEWABLE SOLAR (NDPL)				0.133
(ii)	RENEWABLE SOLAR (BRPL)				0.108
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.241
V	TOTAL AVAILABILITY WITHIN DELHI				762.941
W	TOTAL CONSUMPTION				2686.474
X	LOAD SHEDDING				4.037
Y	REQUIREMENT				2690.511
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				19.908
AA	NET CONSUMPTION OF DELHI				2666.566

## 9.4 Power supply position during the month of July 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	107.965	105.191	105.715	102.999
(ii)	RIHAND-I	76.659	74.688	75.070	73.140
(iii)	RIHAND-II	93.267	90.870	91.338	88.992
(iv)	UNCHAHAR-I	16.865	16.432	15.272	14.880
(v)	UNCHAHAR-II	35.181	34.276	32.226	31.398
(vi)	UNCHAHAR-III	21.451	20.900	19.546	19.044
(vii)	DADRI(TH)	530.658	517.016	437.260	426.023
(viii)	DADRI(TH)- Stage-II	504.381	491.424	456.773	445.045
(ix)	FARAKA	14.581	14.206	6.562	6.393
(x)	KHELGAON	26.323	25.647	17.918	17.457
(xi)	KHELGAON-II	71.534	69.702	55.978	54.544
(xii)	ANTA(GT)	25.388	24.735	20.069	19.554
(xiii)	ANTA(Liquid)	0.099	0.096	0.000	0.000
(xiv)	ANTA(RLNG)	7.475	7.284	0.391	0.382
(xv)	AURAIYA(GT)	36.033	35.106	29.749	28.984
(xvi)	AURAIYA(Liquid)	0.239	0.233	0.000	0.000
(xvii)	AURAIYA(RLNG)	13.451	13.108	0.381	0.371
(xviii)	DADRI(GT)	37.732	36.763	31.790	30.974
(xix)	DADRI(Liquid)	0.252	0.245	0.001	0.001
(xx)	DADRI (RLNG)	11.841	11.536	0.703	0.685
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1631.375</b>	<b>1589.458</b>	<b>1396.742</b>	<b>1360.866</b>
(i)	TANAKPUR	8.246	8.034	8.246	8.034
(ii)	CHAMERA-I	31.353	30.547	31.353	30.547
(iii)	CHAMERA-II	31.568	30.756	31.568	30.756
(iv)	BAIRA-SUIL	8.403	8.187	8.403	8.187
(v)	SALAL	51.977	50.641	51.977	50.641
(vi)	DULASTI	37.159	36.204	37.159	36.204
(vii)	DAULI GANGA	28.136	27.412	28.136	27.412
(viii)	URI (HEP)	32.439	31.603	32.439	31.603
(ix)	SEWA -II	4.455	4.341	4.455	4.341
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>233.736</b>	<b>227.725</b>	<b>233.736</b>	<b>227.725</b>
(i)	TEHRI	55.523	54.099	55.523	54.099
(ii)	KOTESHWAR	1.086	1.057	1.086	1.057
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>56.609</b>	<b>55.156</b>	<b>56.609</b>	<b>55.156</b>
(i)	NAPP	15.904	15.495	15.904	15.495
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	38.547	37.558	38.547	37.558
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>54.451</b>	<b>53.053</b>	<b>54.451</b>	<b>53.053</b>
E	NATHPA JHAKHRI (SJVNLL)	106.120	103.386	106.120	103.386
F	JHAJJAR	151.637	147.740	136.694	133.185
G	TALA	22.651	22.069	22.651	22.069
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	2256.579	2198.587	2007.003	1955.440

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL IMPORT</u>				
(i)	RAJASTHAN	72.881	72.099	72.099	70.246
(ii)	MADHYA PRADESH	114.590	112.629	112.629	109.733
(iii)	SIKKIM	48.745	48.116	48.116	46.879
(iv)	NAGALAND	3.629	3.582	3.582	3.492
(v)	KERALA	74.830	73.444	73.444	71.556
(vi)	DVC	165.695	163.059	163.059	158.867
(vii)	DVC (TATA STEEEL)	23.956	23.549	23.549	22.939
(viii)	WEST BENGAL	57.247	56.337	56.337	54.889
(ix)	CHATTISHGARH	12.956	12.646	12.646	12.317
(x)	ORISSA	27.460	27.011	27.011	26.315
(xi)	HIMACHAL PRADESH	37.659	37.255	37.255	36.297
(xii)	JAMMU & KASHMIR	37.659	37.255	37.255	36.297
(xiii)	UNREQUISITIONED SURPLUS	72.005	70.160	72.005	70.160
(xiv)	POWER EXCHANGE(IEX)	3.791	3.693	3.791	3.693
(xv)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	753.103	740.835	742.778	723.680
J	TOTAL IMPORT (H + I)	3009.682	2939.422	2749.781	2679.120
	<u>EXPORT</u>				
(i)	ANDHRA PRADESH	-3.960	-4.042	-4.042	-4.146
(ii)	JAMMU & KASHMIR	-0.641	-0.648	-0.648	-0.665
(iii)	KERALA	-6.890	-7.040	-7.040	-7.229
(iv)	HIMACHAL PRADESH	-0.158	-0.160	-0.160	-0.164
(v)	MAHARASHTRA	-0.134	-0.137	-0.137	-0.140
(vi)	POWER EXCHANGE (IEX)	-244.546	-250.990	-244.546	-250.990
(vii)	POWER EXCHANGE (PX)	-16.298	-16.727	-16.298	-16.727
(viii)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(ix)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-272.627	-279.744	-272.871	-280.061
L	TOTAL DRAWAL FROM THE GRID	2737.055	2659.678	2476.910	2399.061
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-382.164
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				24.629
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				24.629
O	GAS TURBINE				101.398
P	PRAGATI				220.098
Q	RITHALA CCGT				29.626
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				369.892
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				745.643
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.116
(ii)	RENEWABLE SOLAR (BRPL)				0.066
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.182
V	TOTAL AVAILABILITY WITHIN DELHI				745.825
W	TOTAL CONSUMPTION				2762.722
X	LOAD SHEDDING				2.244
Y	REQUIREMENT				2764.966
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				14.23
AA	NET CONSUMPTION OF DELHI				2748.492

## 9.5 Power supply position during the month of August 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	88.508	86.378	87.039	84.946
(ii)	RIHAND-I	74.509	72.697	72.712	70.945
(iii)	RIHAND-II	66.202	64.566	64.728	63.129
(iv)	UNCHAHAR-I	15.313	14.939	13.774	13.439
(v)	UNCHAHAR-II	27.909	27.230	25.224	24.612
(vi)	UNCHAHAR-III	18.608	18.154	16.946	16.534
(vii)	DADRI(TH)	423.616	413.291	359.843	351.063
(viii)	DADRI(TH)- Stage-II	510.139	497.711	445.058	434.251
(ix)	FARAKA	11.504	11.224	5.274	5.144
(x)	KHELGAON	30.333	29.600	20.292	19.801
(xi)	KHELGAON-II	48.033	46.870	38.417	37.483
(xii)	ANTA(GT)	23.875	23.297	19.688	19.214
(xiii)	ANTA(Liquid)	0.000	0.000	0.000	0.000
(xiv)	ANTA(RLNG)	7.428	7.248	0.434	0.424
(xv)	AURAIYA(GT)	32.397	31.606	27.031	26.374
(xvi)	AURAIYA(Liquid)	0.649	0.634	0.000	0.000
(xvii)	AURAIYA(RLNG)	18.907	18.448	0.871	0.850
(xviii)	DADRI(GT)	44.921	43.826	37.341	36.435
(xix)	DADRI(Liquid)	0.966	0.943	0.000	0.000
(xx)	DADRI (RLNG)	18.908	18.450	0.976	0.952
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1462.725</b>	<b>1427.112</b>	<b>1235.648</b>	<b>1205.596</b>
(i)	TANAKPUR	8.220	8.021	8.220	8.021
(ii)	CHAMERA-I	30.557	29.815	30.557	29.815
(iii)	CHAMERA-II	29.951	29.227	29.951	29.227
(iv)	BAIRA-SUIL	8.363	8.158	8.363	8.158
(v)	SALAL	50.468	49.240	50.468	49.240
(vi)	DULASTI	35.181	34.325	35.181	34.325
(vii)	DAULI GANGA	27.082	26.425	27.082	26.425
(viii)	URI (HEP)	21.770	21.242	21.770	21.242
(ix)	SEWA -II	9.756	9.519	9.756	9.519
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>221.348</b>	<b>215.972</b>	<b>221.348</b>	<b>215.972</b>
(i)	TEHRI	75.500	73.673	75.500	73.673
(ii)	KOTESHWAR	6.552	6.393	6.552	6.393
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>82.052</b>	<b>80.066</b>	<b>82.052</b>	<b>80.066</b>
(i)	NAPP	13.789	13.449	13.789	13.449
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	44.238	43.162	44.238	43.162
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>58.027</b>	<b>56.611</b>	<b>58.027</b>	<b>56.611</b>
E	NATHPA JHAKHRI (SJVNLL)	114.661	111.876	114.661	111.876
F	JHAJJAR	92.941	90.620	70.925	69.146
G	TALA	22.572	22.022	22.572	22.022
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	2054.326	2004.279	1805.233	1761.289
	<u>BILATERAL IMPORT</u>				
(i)	RAJASTHAN	70.814	69.662	69.662	67.971
(ii)	MADHYA PRADESH	143.439	140.792	140.792	137.382
(iii)	SIKKIM	22.595	22.335	22.335	21.796

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(iv)	KERALA	21.328	20.851	20.851	20.345
(v)	DVC	112.548	111.245	111.245	108.552
(vi)	DVC (TATA STEEEL)	31.702	31.351	31.351	30.599
(vii)	WEST BENGAL	50.442	49.860	49.860	48.652
(viii)	CHATTISHGARH	12.019	11.832	11.832	11.550
(ix)	ORISSA	54.687	54.055	54.055	52.750
(x)	HIMACHAL PRADESH	37.620	37.236	37.236	36.338
(xi)	UNREQUISITIONED SURPLUS	61.334	59.851	61.334	59.851
(xii)	POWER EXCHANGE(IEX)	3.146	3.070	3.146	3.070
(xiii)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	621.674	612.140	613.699	598.856
J	TOTAL IMPORT (H + I)	2676.000	2616.419	2418.932	2360.145
	<u>EXPORT</u>				
(i)	PUNJAB	-37.411	-37.784	-37.784	-38.702
(ii)	ANDHRA PRADESH	-0.890	-0.914	-0.914	-0.939
(iii)	KERALA	-2.364	-2.412	-2.412	-2.472
(iv)	POWER EXCHANGE (IEX)	-181.614	-186.244	-181.614	-186.244
(v)	POWER EXCHANGE (PX)	-0.771	-0.791	-0.771	-0.791
(vi)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(vii)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-223.050	-228.145	-223.495	-229.148
L	TOTAL DRAWAL FROM THE GRID	2452.950	2388.274	2195.437	2130.994
M	OVER DRAWAL(+)/UNDER DRAWAL(-) FROM THE GRID				-256.310
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				70.978
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				70.978
O	GAS TURBINE				106.466
P	PRAGATI				222.130
Q	RITHALA CCGT				29.334
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				386.265
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				815.173
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.112
(ii)	RENEWABLE SOLAR (BRPL)				0.036
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.148
V	TOTAL AVAILABILITY WITHIN DELHI				815.321
W	TOTAL CONSUMPTION				2690.005
X	LOAD SHEDDING				3.913
Y	REQUIREMENT				2693.918
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				19.235
AA	NET CONSUMPTION OF DELHI				2670.770

## 9.6 Power supply position during the month of September 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	88.633	86.711	87.105	85.217
(ii)	RIHAND-I	66.880	65.430	64.637	63.235
(iii)	RIHAND-II	45.610	44.619	44.283	43.321
(iv)	UNCHAHAR-I	14.927	14.603	13.679	13.382
(v)	UNCHAHAR-II	23.625	23.113	21.700	21.230
(vi)	UNCHAHAR-III	18.546	18.144	17.203	16.829
(vii)	DADRI(TH)	473.971	463.678	409.430	400.528
(viii)	DADRI(TH)- Stage-II	508.222	497.181	444.938	435.268
(ix)	FARAKA	9.984	9.767	5.625	5.502
(x)	KHELGAON	31.011	30.338	22.670	22.177
(xi)	KHELGAON-II	57.007	55.771	46.017	45.020
(xii)	ANTA(GT)	25.172	24.626	22.654	22.162
(xiii)	ANTA(Liquid)	0.000	0.000	0.000	0.000
(xiv))	ANTA(RLNG)	6.714	6.567	1.171	1.146
(xv)	AURAIYA(GT)	33.601	32.871	30.611	29.946
(xvi)	AURAIYA(Liquid)	0.219	0.214	0.000	0.000
(xvii)	AURAIYA(RLNG)	12.233	11.968	1.758	1.720
(xviii)	DADRI(GT)	48.241	47.193	43.330	42.388
(xix)	DADRI(Liquid)	0.106	0.103	0.000	0.000
(xx)	DADRI (RLNG)	15.435	15.100	2.003	1.960
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1480.137</b>	<b>1447.997</b>	<b>1278.814</b>	<b>1251.031</b>
(i)	TANAKPUR	8.441	8.258	8.441	8.258
(ii)	CHAMERA-I	27.006	26.421	27.006	26.421
(iii)	CHAMERA-II	27.575	26.977	27.575	26.977
(iv)	BAIRA-SUIL	7.584	7.419	7.584	7.419
(v)	SALAL	45.713	44.720	45.713	44.720
(vi)	DULASTI	36.240	35.453	36.240	35.453
(vii)	DAULI GANGA	23.199	22.696	23.199	22.696
(viii)	URI (HEP)	30.887	30.216	30.887	30.216
(ix)	SEWA -II	9.615	9.406	9.615	9.406
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>216.260</b>	<b>211.566</b>	<b>216.260</b>	<b>211.566</b>
(i)	TEHRI	59.090	57.812	59.090	57.812
(ii)	KOTESHWAR	6.291	6.154	6.291	6.154
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>65.381</b>	<b>63.966</b>	<b>65.381</b>	<b>63.966</b>
(i)	NAPP	14.779	14.458	14.779	14.458
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	42.811	41.881	42.811	41.881
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>57.590</b>	<b>56.339</b>	<b>57.590</b>	<b>56.339</b>
E	NATHPA JHAKHRI (SJVN)	101.011	98.822	101.011	98.822
F	JHAJJAR	153.485	150.154	36.218	35.420
G	TALA	20.067	19.630	20.067	19.630
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	2093.931	2048.474	1775.341	1736.774

S. no.	<u>SOURCE</u>	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	MADHYA PRADESH	25.835	25.414	25.414	24.862
(ii)	DVC	77.598	76.909	76.909	75.240
(iii)	DVC (TATA STEEEL)	83.570	82.800	82.800	81.001
(iv)	WEST BENGAL	16.253	16.120	16.120	15.770
(v)	CHATTISHGARH	58.286	57.522	57.522	56.267
(vi)	UTTRANCHAL	50.727	49.976	49.976	48.897
(vii)	HIMACHAL PRADESH	17.779	17.623	17.623	17.242
(viii)	POWER EXCHANGE(IEX)	1.647	1.611	1.647	1.611
(ix)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	331.695	327.975	328.011	320.890
J	TOTAL IMPORT (H + I)	2425.626	2376.449	2103.352	2057.664
	<u>EXPORT</u>				
(i)	PUNJAB	-52.711	-53.183	-53.183	-54.372
(ii)	POWER EXCHANGE (IEX)	-63.120	-64.529	-63.120	-64.529
(iii)	POWER EXCHANGE (PX)	-1.487	-1.524	-1.487	-1.524
(iv)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(v)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-117.318	-119.236	-117.790	-120.425
L	TOTAL DRAWAL FROM THE GRID	2308.308	2257.213	1985.562	1937.237
M	OVER DRAWAL(+)/UNDER DRAWAL(-) FROM THE GRID				-199.500
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				58.800
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				58.800
O	GAS TURBINE				86.632
P	PRAGATI				217.924
Q	RITHALA CCGT				21.497
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				344.439
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				729.292
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.131
(ii)	RENEWABLE SOLAR (BRPL)				0.096
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.227
V	TOTAL AVAILABILITY WITHIN DELHI				729.519
W	TOTAL CONSUMPTION				2467.256
X	LOAD SHEDDING				4.131
Y	REQUIREMENT				2471.387
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				18.153
AA	NET CONSUMPTION OF DELHI				2449.103

## 9.7 Power supply position during the month of October 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	92.041	89.497	91.928	89.388
(ii)	RIHAND-I	66.173	64.378	65.711	63.932
(iii)	RIHAND-II	69.631	67.654	69.179	67.217
(iv)	UNCHAHAR-I	15.041	14.628	14.648	14.250
(v)	UNCHAHAR-II	20.693	20.095	19.960	19.390
(vi)	UNCHAHAR-III	19.857	19.319	19.394	18.873
(vii)	DADRI(TH)	515.348	501.508	442.495	430.708
(viii)	DADRI(TH)- Stage-II	523.349	509.299	451.890	439.771
(ix)	FARAKA	12.001	11.670	8.262	8.049
(x)	KHELGAON	28.952	28.155	23.122	22.519
(xi)	KHELGAON-II	48.055	46.691	40.007	38.917
(xii)	ANTA(GT)	18.840	18.333	17.415	16.959
(xiii)	ANTA(Liquid)	0.700	0.680	0.068	0.067
(xiv)	ANTA(RLNG)	13.135	12.781	5.747	5.610
(xv)	AURAIYA(GT)	30.757	29.931	28.668	27.916
(xvi)	AURAIYA(Liquid)	1.372	1.334	0.095	0.093
(xvii)	AURAIYA(RLNG)	19.959	19.421	8.558	8.353
(xviii)	DADRI(GT)	43.847	42.674	40.900	39.830
(xix)	DADRI(Liquid)	0.910	0.885	0.043	0.042
(xx)	DADRI (RLNG)	21.601	21.012	8.893	8.680
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1562.262</b>	<b>1519.945</b>	<b>1356.983</b>	<b>1320.564</b>
(i)	TANAKPUR	7.535	7.338	7.535	7.338
(ii)	CHAMERA-I	10.465	10.195	10.465	10.195
(iii)	CHAMERA-II	13.982	13.616	13.982	13.616
(iv)	BAIRA-SUIL	3.742	3.644	3.742	3.644
(v)	SALAL	24.862	24.218	24.862	24.218
(vi)	DULASTI	31.723	30.896	31.723	30.896
(vii)	DAULI GANGA	12.748	12.417	12.748	12.417
(viii)	URI (HEP)	17.000	16.556	17.000	16.556
(ix)	SEWA -II	3.242	3.158	3.242	3.158
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>125.299</b>	<b>122.038</b>	<b>125.299</b>	<b>122.038</b>
(i)	TEHRI	26.486	25.789	26.486	25.789
(ii)	KOTESHWAR	5.266	5.126	5.266	5.126
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>31.752</b>	<b>30.915</b>	<b>31.752</b>	<b>30.915</b>
(i)	NAPP	16.473	16.028	16.473	16.028
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	40.434	39.347	40.434	39.347
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>56.907</b>	<b>55.375</b>	<b>56.907</b>	<b>55.375</b>
<b>E</b>	<b>NATHPA JHAKHRI (SJVNLL)</b>	<b>53.174</b>	<b>51.783</b>	<b>53.174</b>	<b>51.783</b>
<b>F</b>	<b>JHAJJAR</b>	<b>24.442</b>	<b>23.874</b>	<b>23.732</b>	<b>23.183</b>
<b>G</b>	<b>TALA</b>	<b>13.406</b>	<b>13.062</b>	<b>13.406</b>	<b>13.062</b>
<b>H</b>	<b>TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)</b>	<b>1867.242</b>	<b>1816.992</b>	<b>1661.253</b>	<b>1616.920</b>

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	DVC	64.342	63.835	63.835	62.089
(ii)	DVC (TATA STEEEL)	30.469	30.225	30.225	29.364
(iii)	CHATTISHGARH	49.214	48.732	48.732	47.318
(iv)	POWER EXCHANGE(IEX)	12.583	12.263	12.583	12.263
(v)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	156.608	155.055	155.375	151.034
J	TOTAL IMPORT (H + I)	2023.850	1972.047	1816.628	1767.954
	<u>EXPORT</u>				
(i)	JAMMU & KASHMIR	-1.536	-1.559	-1.559	-1.605
(ii)	HIMACHAL PRADESH	-16.910	-17.136	-17.136	-17.675
(iii)	MAHARASHTRA	-96.164	-97.129	-97.129	-99.834
(iv)	WEST BENGAL	-0.164	-0.166	-0.166	-0.170
(v)	POWER EXCHANGE (IEX)	-72.019	-74.133	-72.019	-74.133
(vi)	POWER EXCHANGE (PX)	-1.662	-1.703	-1.662	-1.703
(vii)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(viii)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-188.455	-191.826	-189.671	-195.120
L	TOTAL DRAWAL FROM THE GRID	1835.395	1780.221	1626.957	1572.835
M	OVER DRAWAL(+)/UNDER DRAWAL(-) FROM THE GRID				-252.570
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				77.655
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				77.655
O	GAS TURBINE				119.472
P	PRAGATI				229.947
Q	RITHALA CCGT				18.608
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				283.154
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				728.836
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.125
(ii)	RENEWABLE SOLAR (BRPL)				0.090
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.215
V	TOTAL AVAILABILITY WITHIN DELHI				729.051
W	TOTAL CONSUMPTION				2049.316
X	LOAD SHEDDING				34.026
Y	REQUIREMENT				2083.342
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				19.768
AA	NET CONSUMPTION OF DELHI				2029.548

## 9.8 Power supply position during the month of November 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	102.435	98.193	102.435	98.193
(ii)	RIHAND-I	56.624	54.279	56.624	54.279
(iii)	RIHAND-II	87.667	84.055	87.667	84.055
(iv)	UNCHAHAR-I	15.628	14.981	15.402	14.765
(v)	UNCHAHAR-II	30.921	29.642	30.615	29.348
(vi)	UNCHAHAR-III	18.985	18.200	18.790	18.013
(vii)	DADRI(TH)	428.161	410.586	404.733	388.136
(viii)	DADRI(TH)- Stage-II	496.633	476.103	478.469	458.713
(ix)	FARAKA	12.022	11.526	7.237	6.936
(x)	KHELGAON	30.581	29.315	26.884	25.770
(xi)	KHELGAON-II	67.396	64.641	64.884	62.240
(xii)	ANTA(GT)	17.365	16.652	16.632	15.950
(xiii)	ANTA(Liquid)	0.000	0.000	0.000	0.000
(xiv))	ANTA(RLNG)	13.166	12.614	2.428	2.318
(xv)	AURAIYA(GT)	25.356	24.303	23.773	22.787
(xvi)	AURAIYA(Liquid)	2.774	2.657	0.000	0.000
(xvii)	AURAIYA(RLNG)	21.313	20.438	3.474	3.318
(xviii)	DADRI(GT)	35.417	33.950	33.671	32.280
(xix)	DADRI(Liquid)	0.000	0.000	0.000	0.000
(xx)	DADRI (RLNG)	19.883	19.038	3.781	3.609
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1482.327</b>	<b>1421.173</b>	<b>1377.499</b>	<b>1320.710</b>
(i)	TANAKPUR	4.422	4.240	4.422	4.240
(ii)	CHAMERA-I	6.594	6.319	6.594	6.319
(iii)	CHAMERA-II	7.322	7.020	7.322	7.020
(iv)	BAIRA-SUIL	2.147	2.059	2.147	2.059
(v)	SALAL	13.191	12.646	13.191	12.646
(vi)	DULASTI	16.026	15.364	16.026	15.364
(vii)	DAULI GANGA	6.602	6.330	6.602	6.330
(viii)	URI (HEP)	11.957	11.467	11.957	11.467
(ix)	SEWA -II	0.970	0.931	0.970	0.931
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>69.231</b>	<b>66.376</b>	<b>69.231</b>	<b>66.376</b>
(i)	TEHRI	14.237	13.638	14.237	13.638
(ii)	KOTESHWAR	4.278	4.098	4.278	4.098
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>18.515</b>	<b>17.736</b>	<b>18.515</b>	<b>17.736</b>
(i)	NAPP	15.563	14.919	15.563	14.919
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	38.735	37.133	38.735	37.133
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>54.298</b>	<b>52.052</b>	<b>54.298</b>	<b>52.052</b>
E	NATHPA JHAKHRI (SJVN)	30.349	29.097	28.827	27.648
F	JHAJJAR	0.176	0.168	0.000	0.000
G	TALA	5.983	5.738	5.983	5.738
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1660.879	1592.340	1554.353	1490.260

S. no.	<u>SOURCE</u>	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	MAHARASHTRA	0.029	0.028	0.028	0.027
(ii)	DVC	58.486	58.015	58.015	55.618
(iii)	DVC (TATA STEEEL)	69.294	68.685	68.685	65.992
(iv)	POWER EXCHANGE(IEX)	2.796	2.660	2.796	2.660
(v)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	130.605	129.388	129.524	124.297
J	TOTAL IMPORT (H + I)	1791.484	1721.728	1683.877	1614.557
	<u>EXPORT</u>				
(i)	UTTAR PRADESH	-33.892	-34.654	-34.654	-36.148
(ii)	ANDHRA PRADESH	-38.657	-39.676	-39.676	-41.384
(iii)	JAMMU & KASHMIR	-8.614	-8.788	-8.788	-9.182
(iv)	HIMACHAL PRADESH	-27.332	-27.861	-27.861	-29.063
(v)	MAHARASHTRA	-5.619	-5.684	-5.684	-5.902
(vi)	MADHYA PRADESH	-159.934	-161.918	-161.918	-168.922
(vii)	UTTRANCHAL	-45.728	-46.614	-46.614	-48.628
(viii)	POWER EXCHANGE (IEX)	-88.881	-92.606	-88.881	-92.606
(ix)	POWER EXCHANGE (PX)	-3.510	-3.660	-3.510	-3.660
(x)	SHARE PROJECT (HARYANA)	0.000	0.000	0.000	0.000
(xi)	POWER EXCHANGE (PUNJAB)	0.000	0.000	0.000	0.000
K	TOTAL EXPORT (SUM i to xix)	-412.167	-421.461	-417.586	-435.495
L	TOTAL DRAWAL FROM THE GRID	1379.317	1300.267	1266.291	1179.066
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-227.531
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				60.744
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				60.744
O	GAS TURBINE				124.246
P	PRAGATI				220.537
Q	RITHALA CCGT				17.001
R	BAWANA (CCGT)				0.000
S	IMPORT FROM BTPS				291.532
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				714.060
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.104
(ii)	RENEWABLE SOLAR (BRPL)				0.054
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.158
V	TOTAL AVAILABILITY WITHIN DELHI				714.218
W	TOTAL CONSUMPTION				1665.753
X	LOAD SHEDDING				4.645
Y	REQUIREMENT				1670.398
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				17.265
AA	NET CONSUMPTION OF DELHI				1648.488

## 9.9 Power supply position during the month of December 2011

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	95.247	90.063	94.955	89.787
(ii)	RIHAND-I	58.854	55.643	58.658	55.459
(iii)	RIHAND-II	86.624	81.887	86.316	81.597
(iv)	UNCHAHAR-I	15.270	14.440	14.870	14.063
(v)	UNCHAHAR-II	29.805	28.184	29.021	27.445
(vi)	UNCHAHAR-III	18.368	17.369	17.888	16.917
(vii)	DADRI(TH)	433.280	409.537	413.843	391.184
(viii)	DADRI(TH)- Stage-II	503.787	476.334	488.493	461.900
(ix)	FARAKA	13.730	12.983	12.098	11.440
(x)	KHELGAON	24.401	23.079	23.195	21.942
(xi)	KHELGAON-II	55.205	52.207	53.091	50.214
(xii)	ANTA(GT)	11.585	10.955	10.900	10.309
(xiii)	ANTA(Liquid)	0.066	0.063	0.000	0.000
(xiv))	ANTA(RLNG)	10.647	10.065	5.951	5.623
(xv)	AURAIYA(GT)	26.941	25.476	26.112	24.695
(xvi)	AURAIYA(Liquid)	0.994	0.939	0.000	0.000
(xvii)	AURAIYA(RLNG)	23.077	21.817	11.000	10.394
(xviii)	DADRI(GT)	37.124	35.109	35.623	33.694
(xix)	DADRI(Liquid)	0.000	0.000	0.000	0.000
(xx)	DADRI (RLNG)	30.319	28.660	15.164	14.328
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1475.324</b>	<b>1394.810</b>	<b>1397.178</b>	<b>1320.991</b>
(i)	TANAKPUR	2.107	1.993	2.107	1.993
(ii)	CHAMERA-I	1.362	1.292	1.362	1.292
(iii)	CHAMERA-II	5.423	5.129	5.423	5.129
(iv)	BAIRA-SUIL	1.684	1.592	1.684	1.592
(v)	SALAL	10.307	9.747	10.307	9.747
(vi)	DULASTI	12.250	11.587	12.250	11.587
(vii)	DAULI GANGA	4.939	4.672	4.939	4.672
(viii)	URI (HEP)	10.037	9.491	10.037	9.491
(ix)	SEWA -II	0.310	0.292	0.310	0.292
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>48.419</b>	<b>45.795</b>	<b>48.419</b>	<b>45.795</b>
(i)	TEHRI	20.575	19.457	20.575	19.457
(ii)	KOTESHWAR	5.848	5.530	5.848	5.530
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>26.423</b>	<b>24.987</b>	<b>26.423</b>	<b>24.987</b>
(i)	NAPP	16.751	15.837	16.751	15.837
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	39.652	37.493	39.652	37.493
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>56.403</b>	<b>53.330</b>	<b>56.403</b>	<b>53.330</b>
E	NATHPA JHAKHRI (SJVN)	23.689	22.404	12.036	11.388
F	JHAJJAR	0.000	0.000	0.000	0.000
G	TALA	3.295	3.117	3.295	3.117
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1633.553	1544.443	1543.754	1459.608

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	DVC	65.419	64.583	64.583	61.062
(ii)	DVC (TATA STEEEL)	62.283	61.454	61.454	58.042
(iii)	POWER EXCHANGE(IEX)	2.011	1.900	2.011	1.900
(iv)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	129.713	127.937	128.048	121.004
J	TOTAL IMPORT (H + I)	1763.266	1672.380	1671.802	1580.612
	<u>EXPORT</u>				
(i)	RAJASTHAN	-47.387	-48.633	-48.633	-51.434
(ii)	ANDHRA PRADESH	-13.677	-14.070	-14.070	-14.881
(iii)	JAMMU & KASHMIR	-45.287	-46.463	-46.463	-49.139
(iv)	KERALA	-0.590	-0.602	-0.602	-0.640
(v)	HIMACHAL PRADESH	-34.833	-35.738	-35.738	-37.796
(vi)	MADHYA PRADESH	-97.684	-99.295	-99.295	-104.966
(vii)	UTTRANCHAL	-31.983	-32.812	-32.812	-34.697
(viii)	POWER EXCHANGE (IEX)	-86.698	-91.712	-86.698	-91.712
(ix)	POWER EXCHANGE (PX)	-13.321	-14.099	-13.321	-14.099
(x)	SHARE PROJECT (HARYANA)	-5.465	-5.619	-5.465	-5.619
(xi)	POWER EXCHANGE (PUNJAB)	-2.339	-2.405	-2.339	-2.405
K	TOTAL EXPORT (SUM i to xix)	-379.264	-391.448	-385.436	-407.388
L	TOTAL DRAWAL FROM THE GRID	1384.002	1280.932	1286.366	1173.225
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-186.346
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				61.327
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				61.327
O	GAS TURBINE				140.909
P	PRAGATI				228.471
Q	RITHALA CCGT				2.879
R	BAWANA (CCGT)				35.409
S	IMPORT FROM BTPS				332.319
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				801.314
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.093
(ii)	RENEWABLE SOLAR (BRPL)				0.048
(iii)	NON SOLAR (BRPL)				0.000
U	TOTAL SOLAR ENERGY				0.141
V	TOTAL AVAILABILITY WITHIN DELHI				801.455
W	TOTAL CONSUMPTION				1788.334
X	LOAD SHEDDING				12.906
Y	REQUIREMENT				1801.240
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				18.041
AA	NET CONSUMPTION OF DELHI				1770.293

## 9.10 Power supply position during the month of January 2012

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	100.596	95.255	97.300	92.131
(ii)	RIHAND-I	59.729	56.568	54.199	51.325
(iii)	RIHAND-II	91.514	86.667	83.758	79.312
(iv)	UNCHAHAR-I	16.221	15.364	13.723	12.997
(v)	UNCHAHAR-II	31.906	30.219	27.312	25.867
(vi)	UNCHAHAR-III	19.694	18.653	16.747	15.861
(vii)	DADRI(TH)	525.243	497.407	455.086	430.974
(viii)	DADRI(TH)- Stage-II	428.647	405.833	403.561	382.139
(ix)	FARAKA	15.001	14.207	11.590	10.974
(x)	KHELGAON	22.771	21.558	19.957	18.896
(xi)	KHELGAON-II	92.156	87.280	84.302	79.841
(xii)	ANTA(GT)	19.372	18.349	13.627	12.908
(xiii)	ANTA(Liquid)	0.104	0.099	0.000	0.000
(xiv)	ANTA(RLNG)	13.918	13.177	2.063	1.949
(xv)	AURAIYA(GT)	23.222	21.992	16.751	15.863
(xvi)	AURAIYA(Liquid)	9.610	9.104	0.155	0.147
(xvii)	AURAIYA(RLNG)	20.024	18.963	1.958	1.850
(xviii)	DADRI(GT)	41.729	39.522	30.901	29.267
(xix)	DADRI(Liquid)	0.099	0.094	0.000	0.000
(xx)	DADRI (RLNG)	26.047	24.664	3.102	2.931
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1557.603</b>	<b>1474.975</b>	<b>1336.092</b>	<b>1265.232</b>
(i)	TANAKPUR	1.567	1.484	1.567	1.484
(ii)	CHAMERA-I	2.726	2.592	2.726	2.592
(iii)	CHAMERA-II	4.976	4.712	4.976	4.712
(iv)	BAIRA-SUIL	1.884	1.785	1.884	1.785
(v)	SALAL	10.751	10.183	10.751	10.183
(vi)	DULASTI	7.928	7.509	7.928	7.509
(vii)	DAULI GANGA	3.938	3.729	3.938	3.729
(viii)	URI (HEP)	8.728	8.270	8.728	8.270
(ix)	SEWA -II	2.293	2.174	2.293	2.174
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>44.791</b>	<b>42.438</b>	<b>44.791</b>	<b>42.438</b>
(i)	TEHRI	25.796	24.429	25.796	24.429
(ii)	KOTESHWAR	8.005	7.579	8.005	7.579
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>33.801</b>	<b>32.008</b>	<b>33.801</b>	<b>32.008</b>
(i)	NAPP	15.376	14.546	15.376	14.546
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	39.652	37.552	39.652	37.552
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>55.028</b>	<b>52.098</b>	<b>55.028</b>	<b>52.098</b>
E	NATHPA JHAKHRI (SJVNLL)	19.662	18.617	5.737	5.433
F	JHAJJAR	0.000	0.000	0.000	0.000
G	TALA	1.950	1.845	1.950	1.845
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1712.835	1621.981	1477.399	1399.054

S. no.	<u>SOURCE</u>	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	DVC	122.514	121.205	121.205	114.939
(ii)	DVC (TATA STEEEL)	112.503	111.294	111.294	105.426
(iii)	POWER EXCHANGE(IEX)	2.451	2.312	2.451	2.312
(iv)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	237.468	234.811	234.950	222.677
J	TOTAL IMPORT (H + I)	1950.303	1856.792	1712.349	1621.731
	<u>EXPORT</u>				
(i)	RAJASTHAN	-46.928	-48.146	-48.146	-50.839
(ii)	JAMMU & KASHMIR	-44.771	-45.935	-45.935	-48.508
(iii)	HIMACHAL PRADESH	-34.875	-35.780	-35.780	-37.782
(iv)	MAHARASHTRA	-0.057	-0.058	-0.058	-0.062
(v)	MADHYA PRADESH	-74.728	-75.902	-75.902	-80.148
(vi)	POWER EXCHANGE (IEX)	-126.636	-133.668	-126.636	-133.668
(vii)	POWER EXCHANGE (PX)	-7.938	-8.375	-7.938	-8.375
(viii)	SHARE PROJECT (HARYANA)	-6.182	-6.536	-6.182	-6.536
(ix)	POWER EXCHANGE (PUNJAB)	-2.750	-2.910	-2.750	-2.910
K	TOTAL EXPORT (SUM i to xix)	-344.865	-357.310	-349.327	-368.828
L	TOTAL DRAWAL FROM THE GRID	1605.438	1499.482	1363.022	1252.904
M	OVER DRAWAL(+)/UNDER DRAWAL(-) FROM THE GRID				-196.818
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				55.234
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				55.234
O	GAS TURBINE				117.983
P	PRAGATI				229.268
Q	RITHALA CCGT				13.302
R	BAWANA (CCGT)				52.768
S	IMPORT FROM BTPS				409.177
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				877.732
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.095
(ii)	RENEWABLE SOLAR (BRPL)				0.060
(iii)	NON SOLAR (BRPL)				0.110
U	TOTAL SOLAR ENERGY				0.265
V	TOTAL AVAILABILITY WITHIN DELHI				877.997
W	TOTAL CONSUMPTION				1934.083
X	LOAD SHEDDING				7.622
Y	REQUIREMENT				1941.705
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				17.020
AA	NET CONSUMPTION OF DELHI				1917.063

## 9.11 Power supply position during the month of February 2012

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	93.428	89.682	85.611	82.195
(ii)	RIHAND-I	58.274	55.954	50.965	48.944
(iii)	RIHAND-II	84.974	81.538	74.038	71.055
(iv)	UNCHAHAR-I	16.099	15.449	13.063	12.538
(v)	UNCHAHAR-II	31.120	29.865	25.325	24.308
(vi)	UNCHAHAR-III	19.415	18.631	15.719	15.087
(vii)	DADRI(TH)	491.176	471.256	408.881	392.238
(viii)	DADRI(TH)- Stage-II	495.647	475.588	456.917	438.401
(ix)	FARAKA	0.000	0.000	0.000	0.000
(x)	KHELGAON	16.543	15.892	16.541	15.890
(xi)	KHELGAON-II	62.668	60.160	62.624	60.117
(xii)	ANTA(GT)	19.694	18.918	12.673	12.169
(xiii)	ANTA(Liquid)	0.625	0.596	0.000	0.000
(xiv))	ANTA(RLNG)	10.013	9.597	0.121	0.115
(xv)	AURAIYA(GT)	26.104	25.044	16.938	16.241
(xvi)	AURAIYA(Liquid)	4.170	4.002	0.000	0.000
(xvii)	AURAIYA(RLNG)	18.400	17.663	0.177	0.169
(xviii)	DADRI(GT)	36.803	35.327	26.153	25.084
(xix)	DADRI(Liquid)	0.123	0.117	0.000	0.000
(xx)	DADRI (RLNG)	22.737	21.797	0.268	0.255
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1508.013</b>	<b>1447.076</b>	<b>1266.014</b>	<b>1214.806</b>
(i)	TANAKPUR	0.952	0.912	0.797	0.762
(ii)	CHAMERA-I	6.928	6.657	5.239	5.020
(iii)	CHAMERA-II	5.474	5.258	4.191	4.014
(iv)	BAIRA-SUIL	4.080	3.924	2.906	2.786
(v)	SALAL	13.016	12.501	9.975	9.555
(vi)	DULASTI	4.179	3.988	4.179	3.988
(vii)	DAULI GANGA	3.167	3.038	2.575	2.465
(viii)	URI (HEP)	18.506	17.797	13.099	12.557
(ix)	SEWA -II	7.112	6.837	5.159	4.945
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>63.414</b>	<b>60.912</b>	<b>48.120</b>	<b>46.092</b>
(i)	TEHRI	25.127	24.105	25.127	24.105
(ii)	KOTESHWAR	7.552	7.251	7.552	7.251
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>32.679</b>	<b>31.356</b>	<b>32.679</b>	<b>31.356</b>
(i)	NAPP	11.020	10.582	11.020	10.582
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	37.094	35.596	37.094	35.596
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>48.114</b>	<b>46.178</b>	<b>48.114</b>	<b>46.178</b>
E	NATHPA JHAKHRI (SJVN)	17.309	16.611	5.051	4.847
F	JHAJJAR	0.000	0.000	0.000	0.000
G	TALA	1.433	1.374	1.433	1.374
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1670.962	1603.507	1401.411	1344.653

S. no.	<u>SOURCE</u>	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	DVC	151.883	150.299	150.299	144.281
(ii)	DVC (TATA STEEEL)	128.956	127.605	127.605	122.665
(iii)	POWER EXCHANGE(IEX)	1.657	1.585	1.657	1.585
(iv)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	282.496	279.489	279.561	268.531
J	TOTAL IMPORT (H + I)	1953.458	1882.996	1680.972	1613.184
	<u>EXPORT</u>				
(i)	RAJASTHAN	-49.441	-50.354	-50.354	-52.405
(ii)	CHHATTISGARH	-27.311	-27.907	-27.907	-29.082
(iii)	ANDHRA PRADESH	-0.360	-0.371	-0.371	-0.383
(iv)	JAMMU & KASHMIR	-8.278	-8.436	-8.436	-8.792
(v)	KERALA	-12.993	-13.286	-13.286	-13.808
(vi)	TAMILNADU	-10.755	-11.010	-11.010	-11.471
(vii)	HIMACHAL PRADESH	-40.904	-41.688	-41.688	-43.448
(viii)	MADHYA PRADESH	-70.371	-71.469	-71.469	-74.478
(ix)	UTTRANCHAL	-47.009	-47.906	-47.906	-49.920
(x)	POWER EXCHANGE (IEX)	-129.361	-134.652	-129.361	-134.652
(xi)	POWER EXCHANGE (PX)	-14.563	-15.152	-14.563	-15.152
(xii)	SHARE PROJECT (HARYANA)	-10.211	-10.668	-10.211	-10.668
(xiii)	POWER EXCHANGE (PUNJAB)	-4.451	-4.643	-4.451	-4.643
K	TOTAL EXPORT (SUM i to xix)	-426.008	-437.542	-431.013	-448.902
L	TOTAL DRAWAL FROM THE GRID	1527.450	1445.454	1249.959	1164.284
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-247.807
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				73.084
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				73.084
O	GAS TURBINE				56.053
P	PRAGATI				209.629
Q	RITHALA CCGT				14.038
R	BAWANA (CCGT)				81.151
S	IMPORT FROM BTPS				369.175
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				803.130
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.140
(ii)	RENEWABLE SOLAR (BRPL)				0.042
(iii)	NON SOLAR (BRPL)				0.880
U	TOTAL SOLAR ENERGY				<b>1.062</b>
V	TOTAL AVAILABILITY WITHIN DELHI				<b>804.192</b>
W	TOTAL CONSUMPTION				<b>1720.669</b>
X	LOAD SHEDDING				2.831
Y	REQUIREMENT				1723.500
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				17.421
AA	NET CONSUMPTION OF DELHI				1703.248

## 9.12 Power supply position during the month of March 2012

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	106.025	102.363	103.713	100.13
(ii)	RIHAND-I	67.319	64.995	65.696	63.428
(iii)	RIHAND-II	88.522	85.461	86.509	83.517
(iv)	UNCHAHAR-I	16.972	16.386	14.462	13.962
(v)	UNCHAHAR-II	33.092	31.950	28.330	27.351
(vi)	UNCHAHAR-III	20.439	19.734	17.457	16.853
(vii)	DADRI(TH)	530.285	511.978	433.564	418.611
(viii)	DADRI(TH)- Stage-II	500.993	483.657	459.314	443.421
(ix)	FARAKA	15.352	14.821	8.463	8.172
(x)	KHELGAON	33.563	32.405	27.547	26.597
(xi)	KHELGAON-II	106.260	102.593	89.474	86.386
(xii)	ANTA(GT)	27.433	26.487	17.98	17.358
(xiii)	ANTA(Liquid)	0.000	0.000	0.000	0.000
(xiv))	ANTA(RLNG)	4.301	4.153	0.008	0.007
(xv)	AURAIYA(GT)	25.045	24.176	15.471	14.931
(xvi)	AURAIYA(Liquid)	3.380	3.265	0.000	0.000
(xvii)	AURAIYA(RLNG)	13.741	13.273	0.111	0.107
(xviii)	DADRI(GT)	57.191	55.211	37.185	35.894
(xix)	DADRI(Liquid)	0.000	0.000	0.000	0.000
(xx)	DADRI (RLNG)	8.438	8.153	0.000	0.000
<b>A.</b>	<b>TOTAL NTPC (TOTAL 1 TO 20)</b>	<b>1658.351</b>	<b>1601.061</b>	<b>1405.284</b>	<b>1356.725</b>
(i)	TANAKPUR	1.029	0.994	0.300	0.289
(ii)	CHAMERA-I	12.556	12.125	3.664	3.538
(iii)	CHAMERA-II	9.922	9.577	2.895	2.794
(iv)	BAIRA-SUIL	9.349	9.025	2.729	2.635
(v)	SALAL	23.324	22.514	6.805	6.569
(vi)	DULASTI	11.909	11.492	3.475	3.353
(vii)	DAULI GANGA	4.283	4.134	1.250	1.206
(viii)	URI (HEP)	34.140	32.953	9.963	9.617
(ix)	SEWA -II	10.511	10.147	3.066	2.960
<b>B.</b>	<b>TOTAL NHPC (TOTAL 22 TO 30)</b>	<b>117.023</b>	<b>112.961</b>	<b>34.147</b>	<b>32.961</b>
(i)	TEHRI	22.815	22.026	22.815	22.026
(ii)	KOTESHWAR	7.513	7.256	7.513	7.256
<b>C</b>	<b>TOTAL THDC (TOTAL 31 TO 32)</b>	<b>30.328</b>	<b>29.282</b>	<b>30.328</b>	<b>29.282</b>
(i)	NAPP	21.607	20.862	21.607	20.862
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	39.652	38.284	39.652	38.284
<b>D</b>	<b>TOTAL NPC (33 TO 35)</b>	<b>61.259</b>	<b>59.146</b>	<b>61.259</b>	<b>59.146</b>
E	NATHPA JHAKHRI (SJVN)	23.486	22.670	6.853	6.615
F	JHAJJAR	0.000	0.000	0.000	0.000
G	TALA	1.357	1.309	1.357	1.309
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	1891.804	1826.429	1539.228	1486.038

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	HARYANA	3.443	3.373	3.373	3.242
(ii)	DVC	170.247	168.426	168.426	162.622
(iii)	DVC (TATA STEEEL)	178.014	176.125	176.125	170.027
(iv)	WEST BENGAL	6.184	6.116	6.116	5.879
(v)	POWER EXCHANGE(IEX)	0.000	0.000	0.000	0.000
(vi)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	357.888	354.040	354.040	341.770
J	TOTAL IMPORT (H + I)	2249.692	2180.469	1893.268	1827.808
	<u>EXPORT</u>				
(i)	RAJASTHAN	-3.434	-3.483	-3.483	-3.602
(ii)	UTTAR PRADESH	-4.312	-4.401	-4.401	-4.579
(iii)	CHHATTISGARH	-53.845	-54.994	-54.994	-56.961
(iv)	JAMMU & KASHMIR	-42.944	-43.577	-43.577	-45.098
(v)	KERALA	-26.969	-27.581	-27.581	-28.566
(vi)	TAMILNADU	-2.910	-2.976	-2.976	-3.083
(vii)	HIMACHAL PRADESH	-35.018	-35.550	-35.550	-36.821
(viii)	MADHYA PRADESH	-85.096	-86.369	-86.369	-89.411
(ix)	WEST BENGAL	-9.918	-10.054	-10.054	-10.419
(x)	POWER EXCHANGE (IEX)	-211.517	-219.048	-211.517	-219.048
(xi)	POWER EXCHANGE (PX)	-20.202	-20.930	-20.202	-20.930
(xii)	SHARE PROJECT (HARYANA)	-6.017	-6.227	-6.017	-6.227
(xiii)	POWER EXCHANGE (PUNJAB)	-4.456	-4.612	-4.456	-4.612
K	TOTAL EXPORT (SUM i to xix)	-506.638	-519.802	-511.177	-529.357
L	TOTAL DRAWAL FROM THE GRID	1743.054	1660.667	1382.091	1298.452
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-391.929
	<u>AVAILABILITY FROM OWN SOURCES</u>				
(i)	RPH				71.438
(ii)	JHAZZAR SHARE IN RPH				0.000
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				71.438
O	GAS TURBINE				64.535
P	PRAGATI				223.794
Q	RITHALA CCGT				20.176
R	BAWANA (CCGT)				48.295
S	IMPORT FROM BTPS				399.760
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				827.998
	<u>RENEWABLE ENERGY SOURCES</u>				
(i)	RENEWABLE SOLAR (NDPL)				0.169
(ii)	RENEWABLE SOLAR (BRPL)				0.120
(iii)	NON SOLAR (BRPL)				0.880
U	TOTAL SOLAR ENERGY				1.169
V	TOTAL AVAILABILITY WITHIN DELHI				829.167
W	TOTAL CONSUMPTION				1735.690
X	LOAD SHEDDING				1.690
Y	REQUIREMENT				1737.380
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				18.499
AA	NET CONSUMPTION OF DELHI				1717.191

## 9.13 Consolidated Power Supply Position for 2011-12

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
(i)	SINGRAULI	1155.202	1116.144	1129.770	1091.613
(ii)	RIHAND-I	803.780	777.552	778.419	753.119
(iii)	RIHAND-II	982.229	948.363	949.763	917.138
(iv)	UNCHAHAR-I	182.020	175.846	164.877	159.300
(v)	UNCHAHAR-II	354.387	342.319	324.695	313.681
(vi)	UNCHAHAR-III	238.828	230.875	219.238	211.972
(vii)	DADRI(TH)	5861.862	5666.018	5139.039	4966.729
(viii)	DADRI(TH)- Stage-II	6012.458	5812.617	5546.492	5360.988
(ix)	FARAKA	138.944	134.245	90.466	87.294
(x)	KHELGAON	321.315	310.772	265.002	256.155
(xi)	KHELGAON-II	808.499	780.762	716.717	691.872
(xii)	ANTA(GT)	252.661	244.578	196.319	190.079
(xiii)	ANTA(Liquid)	4.798	4.656	0.121	0.119
(xiv)	ANTA(RLNG)	110.138	106.203	20.724	19.922
(xv)	AURAIYA(GT)	352.032	340.612	281.965	272.831
(xvi)	AURAIYA(Liquid)	35.133	33.793	0.267	0.256
(xvii)	AURAIYA(RLNG)	195.712	188.776	31.513	30.276
(xviii)	DADRI(GT)	528.985	511.657	421.050	407.248
(xix)	DADRI(Liquid)	4.236	4.120	0.044	0.043
(xx)	DADRI (RLNG)	214.608	206.751	38.012	36.441
A.	TOTAL NTPC (TOTAL 1 TO 20)	18557.827	17936.659	16314.493	15767.076
(i)	TANAKPUR	56.413	54.798	55.529	53.943
(ii)	CHAMERA-I	209.351	203.646	198.770	193.422
(iii)	CHAMERA-II	214.540	208.544	206.230	200.517
(iv)	BAIRA-SUIL	78.839	76.559	71.045	69.031
(v)	SALAL	375.857	365.131	356.297	346.240
(vi)	DULASTI	292.218	283.799	283.784	275.660
(vii)	DAULI GANGA	159.586	155.138	155.961	151.637
(viii)	URI (HEP)	297.650	288.787	268.066	260.211
(ix)	SEWA -II	76.819	74.597	67.421	65.518
B.	TOTAL NHPC (TOTAL 22 TO 30)	1817.125	1764.807	1718.890	1669.924
(i)	TEHRI	423.399	410.657	423.334	410.594
(ii)	KOTESHWAR	55.852	53.808	55.787	53.745
C	TOTAL THDC (TOTAL 31 TO 32)	479.251	464.465	479.121	464.339
(i)	NAPP	187.022	180.702	187.022	180.702
(ii)	RAPP 'B'	0.000	0.000	0.000	0.000
(iii)	RAPP 'C'	449.654	434.437	449.654	434.437
D	TOTAL NPC (33 TO 35)	636.676	615.139	636.676	615.139
E	NATHPA JHAKHRI (SJVN)	749.565	728.486	693.574	675.018
F	JHAJJAR	602.777	587.797	440.514	429.221
G	TALA	111.876	108.812	111.876	108.812
H	TOTAL FROM CENTRAL SECTOR STATIONS (A+B+C+D+E+F+G)	22955.097	22206.165	20395.144	19729.529

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
	<u>BILATERAL</u>				
	<u>IMPORT</u>				
(i)	RAJASTHAN	178.903	176.028	176.969	172.484
(ii)	GUJRAT	20.195	19.397	18.570	18.075
(iii)	GOA	25.732	24.690	23.472	22.844
(iv)	MADHYA PRADESH	331.784	324.786	322.416	314.377
(v)	HARYANA	3.443	3.373	3.373	3.242
(vi)	MAHARASHTRA	39.595	37.985	35.968	34.997
(vii)	SIKKIM	91.948	90.481	90.465	88.157
(viii)	NAGALAND	3.629	3.582	3.582	3.492
(ix)	KERALA	122.654	119.485	119.245	116.183
(x)	DVC	1255.744	1237.232	1227.760	1186.795
(xi)	DVC (TATA STEEEL)	794.273	784.632	782.023	753.134
(xii)	WEST BENGAL	223.036	218.782	215.755	210.236
(xiii)	CHATTISHGARH	281.377	273.777	266.428	259.495
(xiv))	UTTRANCHAL	138.274	135.169	137.523	134.090
(xv)	MEGHALAYA	5.415	5.263	5.074	4.938
(xvi)	ORISSA	463.155	451.831	436.182	424.713
(xvii)	PUNJAB	50.404	49.054	50.404	49.054
(xviii)	ANDHRA PRADESH	10.248	9.743	9.295	9.045
(xix)	HIMACHAL PRADESH	135.137	133.063	134.193	130.826
(xx)	JAMMU & KASHMIR	112.059	109.729	111.655	108.771
(xxi)	UNREQUISITIONED SURPLUS	133.389	130.060	133.389	130.060
(xxii)	POWER EXCHANGE(IEX)	36.003	34.862	36.003	34.862
(xxiii)	POWER EXCHANGE (PX)	0.000	0.000	0.000	0.000
I	TOTAL BILATERAL IMPORT (SUM i to xxiii)	4456.397	4373.004	4339.744	4209.870
J	TOTAL IMPORT (H + I)	27411.494	26579.169	24734.888	23939.399
	<u>EXPORT</u>				
(i)	RAJASTHAN	-148.970	-152.445	-152.396	-160.109
(ii)	UTTAR PRADESH	-56.221	-57.573	-57.072	-59.245
(iii)	PUNJAB	-93.969	-94.922	-94.814	-97.029
(iv)	CHHATTISGARH	-81.156	-82.901	-82.901	-86.043
(v)	ANDHRA PRADESH	-111.690	-116.401	-116.401	-120.683
(vi)	JAMMU & KASHMIR	-152.071	-155.406	-155.406	-162.989
(vii)	KERALA	-55.728	-57.153	-57.153	-59.132
(viii)	TAMILNADU	-18.860	-19.488	-19.488	-20.212
(ix)	MEGHALAYA	-22.495	-23.169	-23.169	-23.811
(x)	HIMACHAL PRADESH	-190.052	-193.936	-193.935	-202.772
(xi)	MAHARASHTRA	-102.763	-103.831	-103.831	-106.781
(xii)	MADHYA PRADESH	-487.977	-495.123	-495.123	-518.100
(xiii)	WEST BENGAL	-47.546	-48.650	-48.650	-50.128
(xiv))	UTTRANCHAL	-124.720	-127.332	-127.332	-133.245
(xv)	HARYANA	-8.557	-8.787	-8.557	-8.787
(xvi)	POWER EXCHANGE (IEX)	-1805.334	-1865.168	-1805.334	-1865.168
(xvii)	POWER EXCHANGE (PX)	-105.013	-108.949	-105.013	-108.949
(xviii)	SHARE PROJECT (HARYANA)	-27.875	-29.050	-27.875	-29.050
(xix)	POWER EXCHANGE (PUNJAB)	-13.996	-14.570	-13.996	-14.570
K	TOTAL EXPORT (SUM i to xix)	-3654.993	-3754.854	-3688.446	-3826.803

S. no.	SOURCE	Availability at Power Plant bus	Availability at Delhi periphery	Allocation made by NRLDC at Power Plant	Allocation Made by NRLDC at Delhi periphery
L	TOTAL DRAWAL FROM THE GRID	23756.501	22824.315	21046.442	20112.596
M	OVER DRAWL(+)/UNDER DRAWAL(-) FROM THE GRID				-3370.151
<b>AVAILABILITY FROM OWN SOURCES</b>					
(i)	RPH				818.109
(ii)	JHAZZAR SHARE IN RPH				1.320
N	NET GENERATION AVAILABLE FOR DELHI IN RPH				816.789
O	GAS TURBINE				1238.331
P	PRAGATI				2561.314
Q	RITHALA CCGT				241.864
R	BAWANA (CCGT)				217.623
S	IMPORT FROM BTPS				4343.465
T	TOTAL AVAILABILITY WITHIN DELHI(7+8)				9419.386
<b>RENEWABLE ENERGY SOURCES</b>					
(i)	RENEWABLE SOLAR (NDPL)				1.508
(ii)	RENEWABLE SOLAR (BRPL)				0.936
(iii)	NON SOLAR (BRPL)				1.870
U	TOTAL SOLAR ENERGY				4.314
V	TOTAL AVAILABILITY WITHIN DELHI				9423.700
W	TOTAL CONSUMPTION				26112.400
X	LOAD SHEDDING				82.983
Y	REQUIREMENT				26195.383
Z	AUXILIARY CONSUMPTION OF GENERATION UNITS WITHIN DELHI				219.049
AA	NET CONSUMPTION OF DELHI				25893.351

## 9.14 LOAD SHEDDING DETAILS FOR 2011-12

Month	Number of Under Frequency Trippings	Load shedding due to under Frequency Relay Operation in MUs				
		BYPL	BRPL	NDPL	NDMC	Total
Apr 2011	4	0.013	0.005	0.013	0.000	0.031
May 2011	0	0.000	0.000	0.000	0.000	0.000
Jun 2011	0	0.000	0.000	0.000	0.000	0.000
July 2011	1	0.000	0.000	0.006	0.000	0.006
Aug. 2011	10	0.003	0.000	0.023	0.000	0.026
Sept 2011	5	0.001	0.031	0.001	0.000	0.033
Oct. 2011	227	0.373	1.503	1.084	0.000	2.960
Nov. 2011	1	0.001	0.000	0.000	0.000	0.001
Dec. 2011	16	0.045	0.002	0.000	0.000	0.047
Jan. 2012	3	0.020	0.001	0.000	0.000	0.021
Feb. 2012	0	0.000	0.000	0.000	0.000	0.000
Mar. 2012	0	0.000	0.000	0.000	0.000	0.000
<b>TOTAL</b>	<b>267</b>	<b>0.456</b>	<b>1.542</b>	<b>1.127</b>	<b>0.000</b>	<b>3.125</b>

Months	Load Shedding due to Grid Restriction in MUs							
	To restrict over drawal at low frequency and low voltage				Due to TTC / ATC Violation			
	BYPL	BRPL	NDPL	NDMC	BYPL	BRPL	NDPL	NDMC
Apr 2011	0.000	0.000	0.063	0.000	0.000	0.000	0.000	0.000
May 2011	0.104	0.183	0.191	0.000	0.000	0.000	0.000	0.000
Jun 2011	0.000	0.156	0.080	0.000	0.000	0.000	0.000	0.000
July 2011	0.000	0.000	0.060	0.000	0.000	0.000	0.000	0.000
Aug. 2011	0.000	0.000	0.024	0.000	0.000	0.000	0.000	0.000
Sept 2011	0.225	0.698	0.086	0.000	0.000	0.000	0.000	0.000
Oct. 2011	5.112	17.186	7.354	0.182	0.000	0.000	0.000	0.000
Nov. 2011	0.443	0.585	2.151	0.000	0.000	0.000	0.000	0.000
Dec. 2011	4.913	2.843	1.802	0.000	0.000	0.000	0.000	0.000
Jan. 2012	0.859	1.175	0.256	0.000	0.000	0.000	0.000	0.000
Feb. 2012	0.006	0.022	0.185	0.000	0.000	0.000	0.000	0.000
Mar. 2012	0.000	0.201	0.000	0.000	0.000	0.000	0.000	0.000
<b>TOTAL</b>	<b>11.662</b>	<b>23.049</b>	<b>12.252</b>	<b>0.182</b>	<b>0.000</b>	<b>0.000</b>	<b>0.000</b>	<b>0.000</b>

Month	Load Shedding due to Transmission Constraints in Central Sector Transmission System in MUs				Total in MUs	Total Shedding due to Grid Restrictions in MUs
	BYPL	BRPL	NDPL	NDMC		
Apr 2011	0.000	0.000	0.000	0.000	0.063	0.094
May 2011	0.000	0.000	0.000	0.000	0.478	0.478
Jun 2011	0.000	0.000	0.000	0.000	0.236	0.236
July 2011	0.000	0.000	0.000	0.000	0.060	0.066
Aug. 2011	0.000	0.000	0.000	0.000	0.024	0.050
Sept 2011	0.000	0.000	0.000	0.000	1.009	1.042
Oct. 2011	0.000	0.000	0.000	0.000	29.834	32.794
Nov. 2011	0.000	0.000	0.000	0.000	3.179	3.180
Dec. 2011	0.000	0.000	0.000	0.000	9.558	9.605
Jan. 2012	0.000	0.000	0.000	0.000	2.290	2.311
Feb. 2012	0.000	0.000	0.000	0.000	0.213	0.213
Mar. 2012	0.000	0.000	0.042	0.000	0.243	0.243
<b>TOTAL</b>	<b>0.000</b>	<b>0.000</b>	<b>0.042</b>	<b>0.000</b>	47.187	50.312

Month	Load Shedding due to Trippings / Break-downs / Shutdowns / Constraints in DTL System in MUs					Total in MUs
	BYPL	BRPL	NDPL	NDMC	MES	
Apr 2011	0.066	0.311	0.132	0.076	0.006	<b>0.591</b>
May 2011	0.182	1.397	0.077	0.000	0.000	<b>1.656</b>
Jun 2011	1.368	0.528	0.269	0.055	0.000	<b>2.220</b>
July 2011	0.247	0.263	0.127	0.000	0.000	<b>0.637</b>
Aug. 2011	0.205	1.713	0.167	0.009	0.000	<b>2.094</b>
Sept 2011	0.618	0.386	0.301	0.040	0.000	<b>1.345</b>
Oct. 2011	0.054	0.106	0.171	0.000	0.000	<b>0.331</b>
Nov. 2011	0.002	0.089	0.179	0.000	0.000	<b>0.270</b>
Dec. 2011	0.001	0.252	0.353	0.001	0.000	<b>0.607</b>
Jan. 2012	0.737	0.244	1.307	0.000	0.000	<b>2.288</b>
Feb. 2012	0.068	0.012	0.008	0.012	0.000	<b>0.100</b>
Mar. 2012	0.118	0.183	0.049	0.000	0.000	<b>0.350</b>
<b>TOTAL</b>	<b>3.666</b>	<b>5.484</b>	<b>3.140</b>	<b>0.193</b>	<b>0.006</b>	<b>12.489</b>

Months	Load shedding due to Constraints in Discoms System in MUs				Load shedding due to Shut-downs / Break-downs / Trippings in the System of other utilities in MUs				
	BYPL	BRPL	NDPL	NDMC	BYPL	BRPL	NDPL	NDMC	Total
Apr 2011	0.209	0.321	0.256	0.000	0.011	0.022	0.000	0.000	0.033
May 2011	0.140	0.653	0.475	0.000	0.032	0.000	0.000	0.000	0.032
Jun 2011	0.388	0.630	0.506	0.000	0.034	0.008	0.015	0.000	0.057
July 2011	0.328	0.687	0.398	0.027	0.085	0.000	0.016	0.000	0.101
Aug. 2011	0.618	0.764	0.352	0.001	0.000	0.000	0.000	0.000	0.000
Sept 2011	0.255	0.643	0.337	0.000	0.478	0.000	0.031	0.000	0.509
Oct. 2011	0.397	0.133	0.274	0.000	0.054	0.000	0.000	0.000	0.054
Nov. 2011	0.184	0.190	0.177	0.000	0.006	0.035	0.016	0.000	0.057
Dec. 2011	0.159	0.092	0.221	0.000	0.030	0.003	0.005	0.000	0.038
Jan. 2012	0.044	0.268	0.288	0.000	0.031	0.000	0.015	0.000	0.046
Feb. 2012	0.103	0.160	0.409	0.000	0.000	0.000	0.008	0.000	0.008
Mar. 2012	0.706	0.077	0.255	0.000	0.058	0.000	0.001	0.000	0.059
<b>TOTAL</b>	<b>3.531</b>	<b>4.618</b>	<b>3.948</b>	<b>0.028</b>	<b>0.819</b>	<b>0.068</b>	<b>0.107</b>	<b>0.000</b>	<b>0.994</b>

Month	Load shedding carried out in theft prone areas in MUs			Total shedding due to T& D Constraints in MUs	Total Load Shedding in MUs	Net Consumption in MUs	Max Demand met in MW	Date	Time in Hrs.
	BYPL	BRPL	NDPL						
Apr 2011	0.000	0.000	0.000	1.410	1.504	1962.676	4066	29.04.2011	15:28:13
May 2011	0.000	0.000	0.000	2.956	3.434	2609.419	4823	18.05.2011	16:10:34
Jun 2011	0.000	0.000	0.000	3.801	4.037	2666.325	4994	24.06.2011	16:04:28
July 2011	0.000	0.000	0.000	2.178	2.244	2748.310	4819	20.07.2011	15:37:38
Aug. 2011	0.000	0.000	0.034	3.863	3.913	2670.622	5028	02.08.2011	15:07:47
Sept 2011	0.000	0.000	0.000	3.089	4.131	2448.876	4713	01.09.2011	21:55:16
Oct. 2011	0.000	0.000	0.043	1.232	34.026	2029.333	3919	05.10.2011	18:51:07
Nov. 2011	0.000	0.000	0.587	1.465	4.645	1648.330	3294	04.11.2011	18:16:43
Dec. 2011	0.000	0.000	2.184	3.301	12.906	1770.152	3619	29.12.2011	18:18:47
Jan. 2012	0.000	0.000	2.377	5.311	7.622	1916.798	3934	20.01.2012	10:01:16
Feb. 2012	0.000	0.000	1.838	2.618	2.831	1702.186	3608	03.02.2012	10.04.57
Mar. 2012	0.000	0.000	0.000	1.447	1.690	1716.022	3316	30.03.2012	19:34:22
<b>TOTAL</b>	<b>0.000</b>	<b>0.000</b>	<b>7.063</b>	<b>32.671</b>	<b>82.983</b>	<b>25889.049</b>	<b>5028</b>	<b>02.08.2011</b>	<b>15:07:47</b>

<b>Month</b>	<b>Shedding at the time of Peak Demand in MW</b>	<b>Un-restricted Demand in MW</b>	<b>Maximum Un-restricted Demand in MW</b>	<b>Date</b>	<b>Time</b>	<b>Demand at that Time in MW</b>	<b>Shedding at that time in MW</b>
<b>Apr 2011</b>	4	<b>4070</b>	<b>4070</b>	29.04.2011	15:28:13	4066	4
<b>May 2011</b>	18	<b>4841</b>	<b>4845</b>	18.05.2011	15:00	4650	195
<b>Jun 2011</b>	20	<b>5014</b>	<b>5014</b>	24.06.2011	16:04:28	4994	20
<b>July 2011</b>	0	<b>4819</b>	<b>4819</b>	20.07.2011	15:37:38	4819	0
<b>Aug. 2011</b>	3	<b>5031</b>	<b>5031</b>	02.08.2011	15:07:47	5028	3
<b>Sept 2011</b>	0	<b>4713</b>	<b>4713</b>	01.09.2011	21:55:16	4713	0
<b>Oct. 2011</b>	0	<b>3919</b>	<b>3991</b>	01.10.2011	19:20:56	3879	112
<b>Nov. 2011</b>	0	<b>3294</b>	<b>3294</b>	04.11.2011	18:16:43	3294	0
<b>Dec. 2011</b>	0	<b>3619</b>	<b>3731</b>	26.12.2011	10:00	3509	222
<b>Jan. 2012</b>	0	<b>3934</b>	<b>3934</b>	20.01.2012	10:01:16	3934	0
<b>Feb. 2012</b>	0	<b>3608</b>	<b>3608</b>	03.02.2012	10:04:57	3608	0
<b>Mar. 2012</b>	0	<b>3316</b>	<b>3316</b>	30.03.2012	19:34:22	3316	0
<b>Max</b>	3	<b>5031</b>	<b>5031</b>	02.08.2011	15:07:47	5028	3

**9.15 DEMAND - AVAILABILITY-DEMAND POSITION OF DELHI AT THE TIME OF PEAK DEMAND MET DURING 2011-12**

Month	Date	Time of peak demand	Generation within Delhi in MW							Import from the Grid in MW	Scheduled from the Grid in MW	OD (-) / UD (+)	Demand met	Shedding	Unrestricted Demand
			RPH	GT	PPC L	BT PS	Rit hal a	Baw ana CCG T	Total						
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)= (3) to (8)	(10)	(11)	(12)= (11) - (10)	(13)= (11)+ (12)	(14)	(15)= (13)+(14)	
Apr 11	29	15:28:13	112	138	285	553	31	0	1119	2947	3027	80	4066	4	4070
May 11	18	16:10:34	112	168	275	621	21	0	1197	3626	3295	-331	4823	18	4841
Jun 11	24	16:04:28	118	180	285	410	29	0	1022	3922	3762	-160	4944	20	4964
July 11	20	15:37:38	0	138	289	520	24	0	971	3848	3766	-82	4819	0	4819
Aug. 11	2	15:07:47	103	139	283	597	32	0	1154	3874	3775	-99	5028	3	5031
Sept 11	1	21:55:16	104	147	294	567	50	0	1162	3551	3100	-451	4713	0	4713
Oct. 11	5	18:51:07	106	161	297	480	26	0	1070	2849	2975	126	3919	0	3919
Nov. 11	4	18:16:43	101	193	303	388	21	0	1006	2288	2428	140	3294	0	3294
Dec. 11	29	10:18:47	50	231	314	592	22	204	1413	2206	2015	-191	3619	0	3619
Jan. 12	20	10:01:16	58	190	323	610	19	59	1259	2675	2416	-259	3934	0	3934
Feb. 12	3	10:04:57	96	84	314	581	19	153	1247	2361	2304	-57	3608	0	3608
Mar. 12	30	19:34:22	103	76	292	579	34	0	1084	2232	2179	-53	3316	0	3316
Max	2.8. 11	15:07:47	103	139	283	597	32	0	1154	3874	3775	-99	5028	3	5031

**9.16 POWER AVAILABILITY- DEMAND POSITION AT THE TIME OF OCCURRENCE OF MAXIMUM UNRESTRICTED DEMAND DURING 2011-12**

Month	Date	Time of peak demand	Generation within Delhi							Import from the Grid	Schedule from the Grid	OD (-) / UD (+)	Demand met	Shedding	Unrestricted Demand
			RPH	GT	PPC L	BT PS	Rit hal a	Baw ana CCG T	Total						
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)= (3) to (8)	(10)	(11)	(12)= (11) - (10)	(13)= (11)+ (12)	(14)	(15)= (13)+ (14)	
Apr 11	29	15:28:13	112	138	285	553	31	0	1119	2947	3027	80	4066	4	4070
May 11	18	15:00:00	113	162	272	627	22	0	1196	3454	3325	-129	4650	195	4845
Jun 11	24	16:04:28	118	180	285	410	29	0	1022	3922	3762	-160	4944	20	4964
July 11	20	15:37:38	0	138	289	520	24	0	971	3848	3766	-82	4819	0	4819
Aug. 11	2	15:07:47	103	139	283	597	32	0	1154	3874	3775	-99	5028	3	5031
Sept 11	1	21:55:16	104	147	294	567	50	0	1162	3551	3100	-451	4713	0	4713
Oct. 11	1	19:20:56	47	76	295	538	0	0	956	2923	2940	17	3879	112	3991
Nov. 11	4	18:16:43	101	193	303	388	21	0	1006	2288	2428	140	3294	0	3294
Dec. 11	26	10:00:00	50	161	320	518	0	0	1049	2460	2410	-50	3509	222	3731
Jan. 12	20	10:01:16	58	190	323	610	19	59	1259	2675	2416	-259	3934	0	3934
Feb. 12	3	10:04:57	96	84	314	581	19	153	1247	2361	2304	-57	3608	0	3608
Mar. 12	30	19:34:22	103	76	292	579	34	0	1084	2232	2179	-53	3316	0	3316
Max	2.8. 11	15:07:47	103	139	283	597	32	0	1154	3874	3775	-99	5028	3	5031

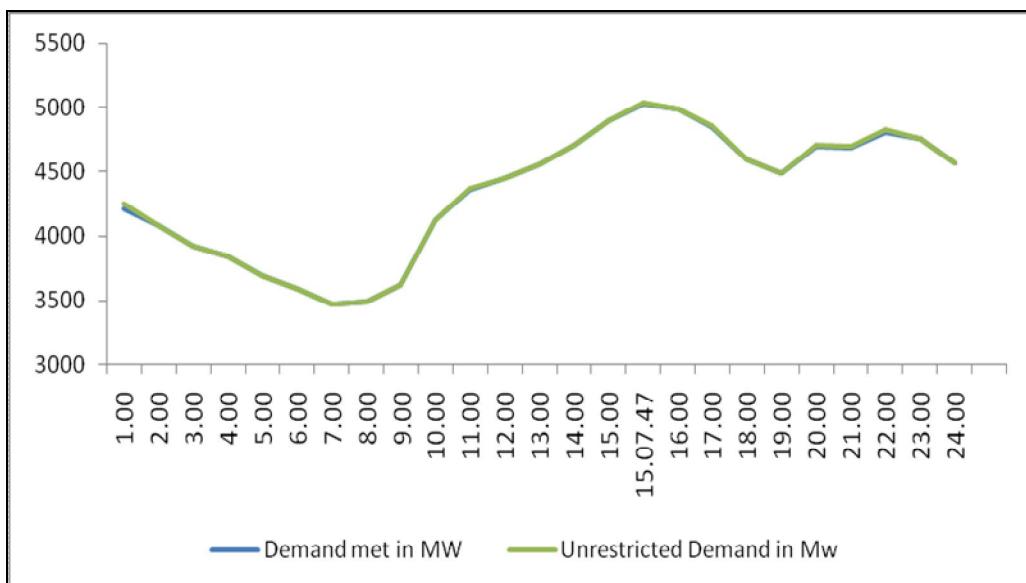
## 9.17 LOAD PATTERN

### 9.17.1 SUMMER SEASON

#### 9.17.1.1 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM PEAK DEMAND MET DURING SUMMER 2011-12 – 02.08.2011 – 5028MW at 15:07:47Hrs.

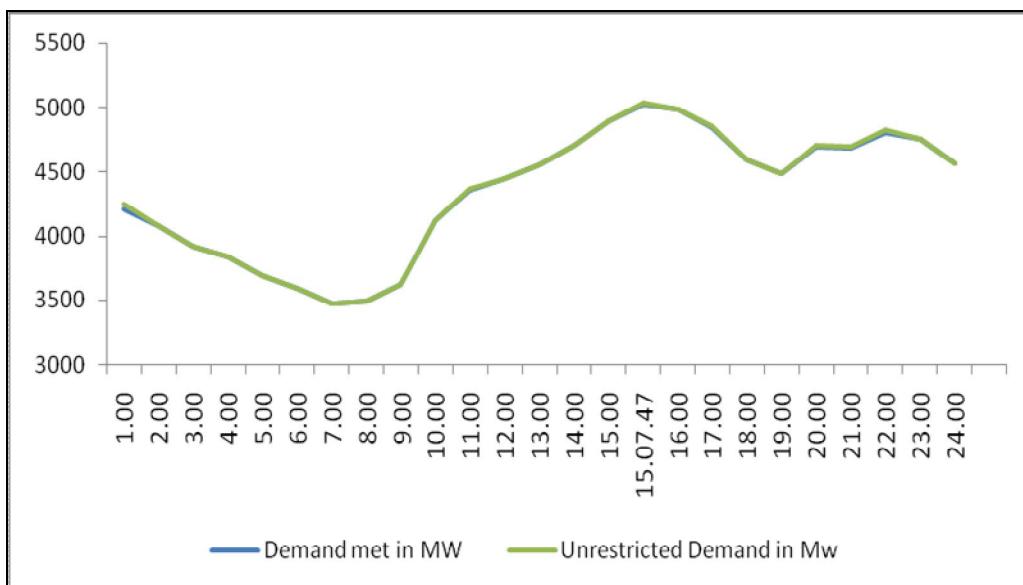
All figures in MW

Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	4204	48	4252
2.00	4078	0	4078
3.00	3918	0	3918
4.00	3836	0	3836
5.00	3687	0	3687
6.00	3593	0	3593
7.00	3476	0	3476
8.00	3491	0	3491
9.00	3622	0	3622
10.00	4116	0	4116
11.00	4355	11	4366
12.00	4442	0	4442
13.00	4553	3	4556
14.00	4707	0	4707
15.00	4899	0	4899
<b>15.07.47</b>	<b>5028</b>	<b>3</b>	<b>5031</b>
16.00	4979	8	4987
17.00	4845	7	4852
18.00	4592	6	4598
19.00	4485	0	4485
20.00	4699	7	4706
21.00	4681	17	4698
22.00	4802	25	4827
23.00	4751	2	4753
24.00	4568	0	4568
ENERGY IN Mus	100.742	0.135	100.851



**9.17.1.2 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM UNRESTRICTED DEMAND DURING SUMMER 2011-12 – 02.08.2011 – 5031MW at 15:07:47Hrs.**

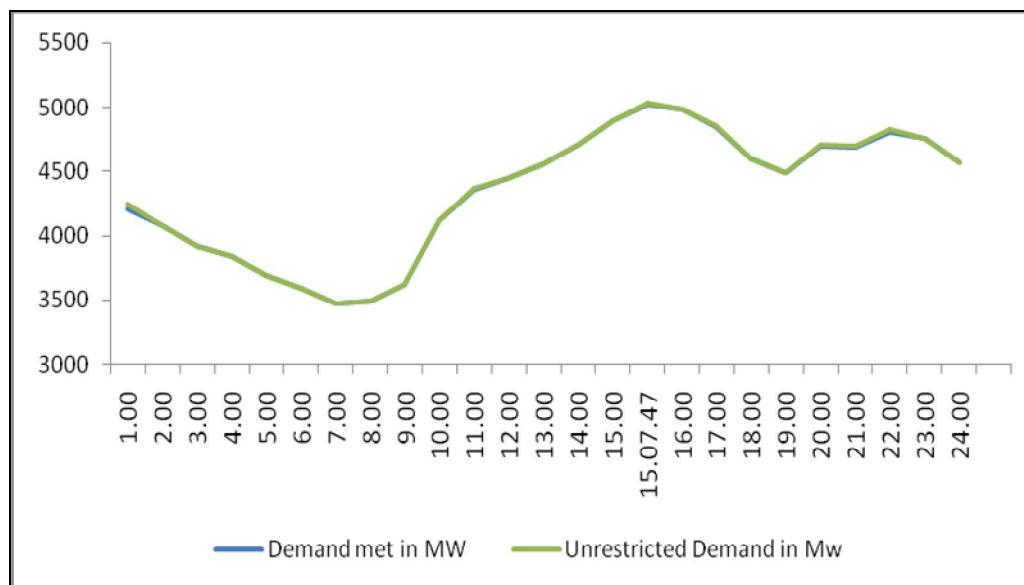
<b>All figures in MW</b>			
<b>Hrs.</b>	<b>Demand</b>	<b>Load Shedding</b>	<b>Un-Restricted Demand</b>
1.00	4204	48	4252
2.00	4078	0	4078
3.00	3918	0	3918
4.00	3836	0	3836
5.00	3687	0	3687
6.00	3593	0	3593
7.00	3476	0	3476
8.00	3491	0	3491
9.00	3622	0	3622
10.00	4116	0	4116
11.00	4355	11	4366
12.00	4442	0	4442
13.00	4553	3	4556
14.00	4707	0	4707
15.00	4899	0	4899
<b>15.07.47</b>	<b>5028</b>	<b>3</b>	<b>5031</b>
16.00	4979	8	4987
17.00	4845	7	4852
18.00	4592	6	4598
19.00	4485	0	4485
20.00	4699	7	4706
21.00	4681	17	4698
22.00	4802	25	4827
23.00	4751	2	4753
24.00	4568	0	4568
ENERGY IN Mus	100.742	0.135	100.851



**9.17.1.3 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM ENERGY CONSUMED DURING SUMMER 2011-12 – 100.742 ON 02.08.2011**

All figures in MW

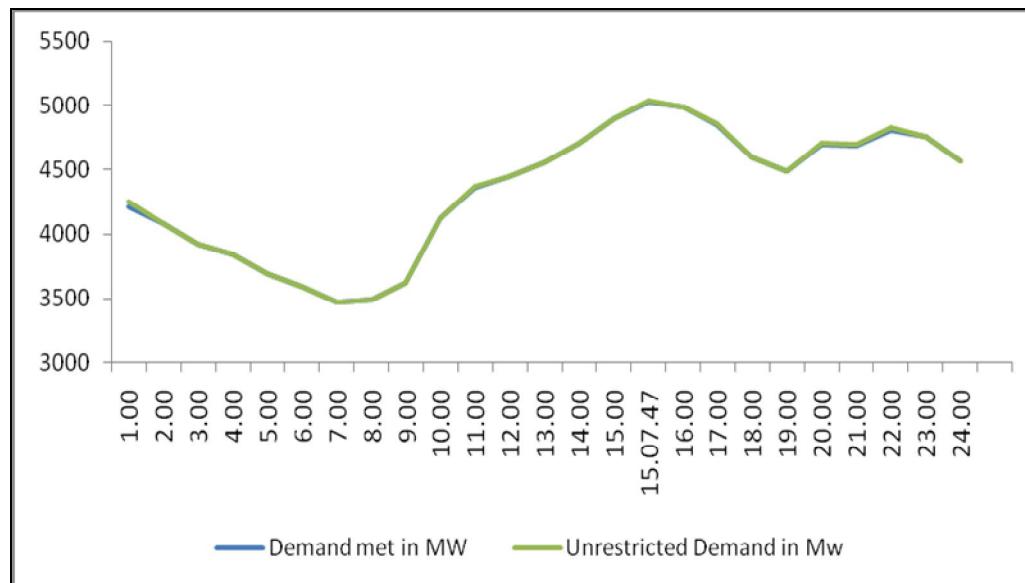
Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	4204	48	4252
2.00	4078	0	4078
3.00	3918	0	3918
4.00	3836	0	3836
5.00	3687	0	3687
6.00	3593	0	3593
7.00	3476	0	3476
8.00	3491	0	3491
9.00	3622	0	3622
10.00	4116	0	4116
11.00	4355	11	4366
12.00	4442	0	4442
13.00	4553	3	4556
14.00	4707	0	4707
15.00	4899	0	4899
<b>15.07.47</b>	<b>5028</b>	<b>3</b>	<b>5031</b>
16.00	4979	8	4987
17.00	4845	7	4852
18.00	4592	6	4598
19.00	4485	0	4485
20.00	4699	7	4706
21.00	4681	17	4698
22.00	4802	25	4827
23.00	4751	2	4753
24.00	4568	0	4568
ENERGY IN Mus	100.742	0.135	100.851



**9.17.1.4 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM UNRESTRICTED ENERGY DEMAND DURING SUMMER 2011-12 – 100.851 MUs ON 02.08.2011**

All figures in MW

Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	4204	48	4252
2.00	4078	0	4078
3.00	3918	0	3918
4.00	3836	0	3836
5.00	3687	0	3687
6.00	3593	0	3593
7.00	3476	0	3476
8.00	3491	0	3491
9.00	3622	0	3622
10.00	4116	0	4116
11.00	4355	11	4366
12.00	4442	0	4442
13.00	4553	3	4556
14.00	4707	0	4707
15.00	4899	0	4899
<b>15.07.47</b>	<b>5028</b>	<b>3</b>	<b>5031</b>
16.00	4979	8	4987
17.00	4845	7	4852
18.00	4592	6	4598
19.00	4485	0	4485
20.00	4699	7	4706
21.00	4681	17	4698
22.00	4802	25	4827
23.00	4751	2	4753
24.00	4568	0	4568
ENERGY IN Mus	100.742	0.135	100.851

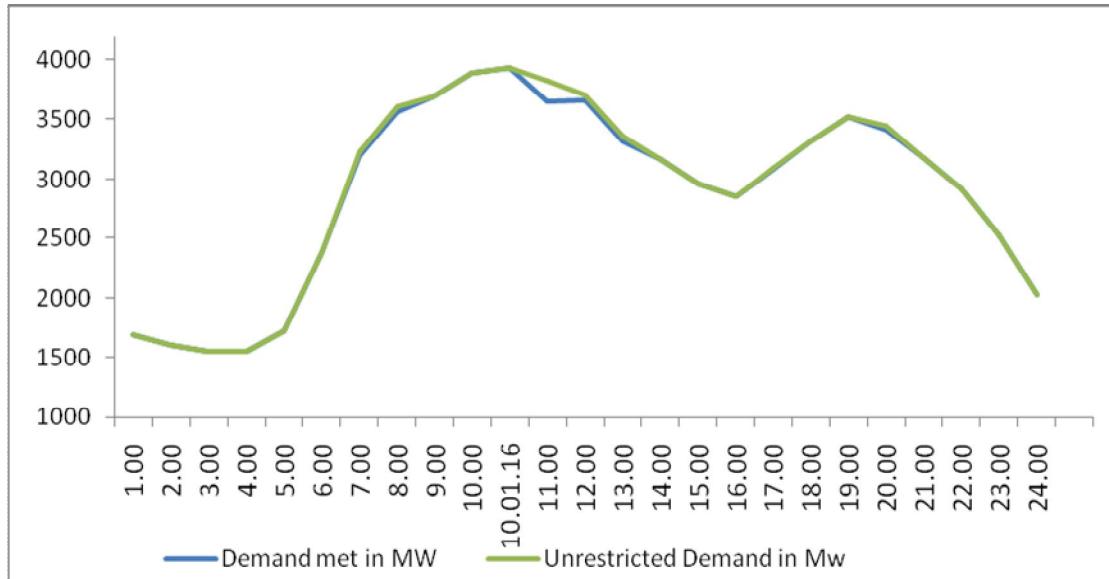


## 9.17.2 WINTER LOAD PATTERN

### 9.17.2.1 LOAD PATTERN OF DELHI ON THE DAY OF PEAK DEMAND MET DURING WINTER 2011-12 – 3934MW ON 20.01.2012 at 10:01:16Hrs.

All figures in MW

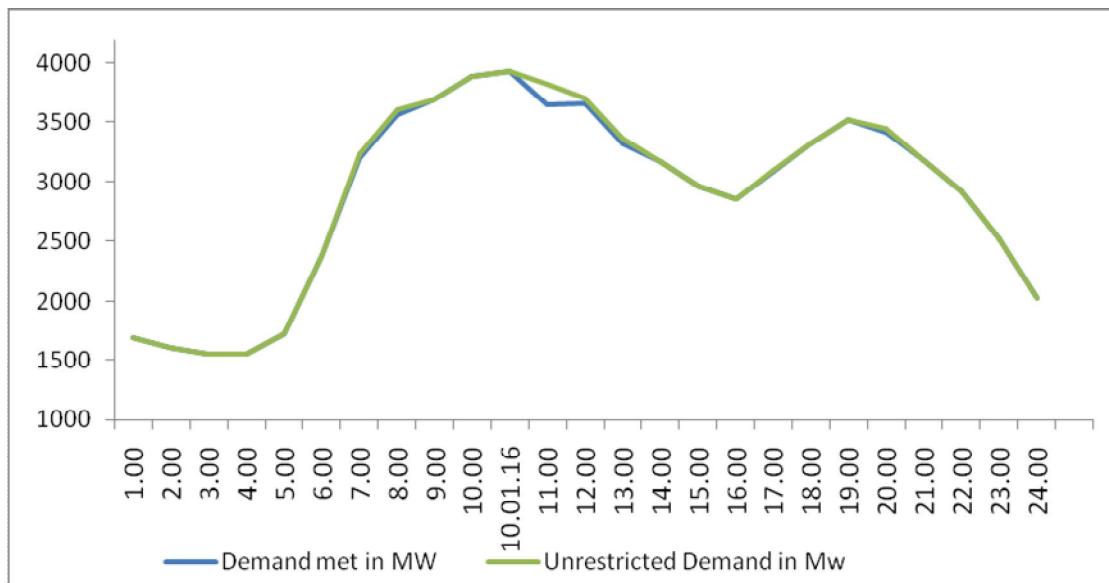
Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	1695	0	1695
2.00	1602	0	1602
3.00	1553	0	1553
4.00	1551	0	1551
5.00	1720	0	1720
6.00	2380	0	2380
7.00	3205	23	3228
8.00	3566	41	3607
9.00	3700	0	3700
10.00	3894	0	3894
<b>10.01.16</b>	<b>3934</b>	<b>0</b>	<b>3934</b>
11.00	3653	172	3825
12.00	3667	44	3711
13.00	3322	37	3359
14.00	3165	0	3165
15.00	2967	0	2967
16.00	2857	0	2857
17.00	3084	5	3089
18.00	3313	0	3313
19.00	3527	0	3527
20.00	3413	38	3451
21.00	3173	0	3173
22.00	2923	0	2923
23.00	2525	0	2525
24.00	2024	0	2024
<b>ENERGY IN Mus</b>	<b>69.248</b>	<b>0.528</b>	<b>69.776</b>



**9.17.2.2 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM UN-RESTRICTED DEMAND  
WINTER 2011-12 – 3934 MW ON 20.01.2012 at 10:01:16Hrs.**

All figures in MW

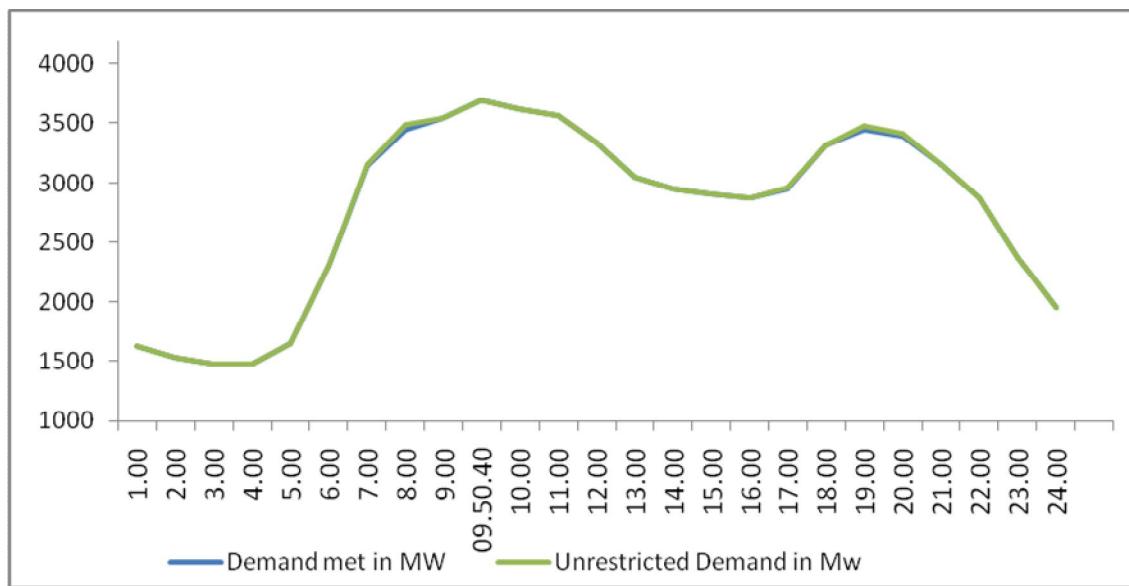
Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	1695	0	1695
2.00	1602	0	1602
3.00	1553	0	1553
4.00	1551	0	1551
5.00	1720	0	1720
6.00	2380	0	2380
7.00	3205	23	3228
8.00	3566	41	3607
9.00	3700	0	3700
10.00	3894	0	3894
<b>10.01.16</b>	<b>3934</b>	<b>0</b>	<b>3934</b>
11.00	3653	172	3825
12.00	3667	44	3711
13.00	3322	37	3359
14.00	3165	0	3165
15.00	2967	0	2967
16.00	2857	0	2857
17.00	3084	5	3089
18.00	3313	0	3313
19.00	3527	0	3527
20.00	3413	38	3451
21.00	3173	0	3173
22.00	2923	0	2923
23.00	2525	0	2525
24.00	2024	0	2024
<b>ENERGY IN Mus</b>	<b>69.248</b>	<b>0.528</b>	<b>69.776</b>



**9.17.2.3 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM ENERGY CONSUMED  
DURING WINTER 2011-12 – 69.264MUs ON 19.01.2012**

All figures in MW

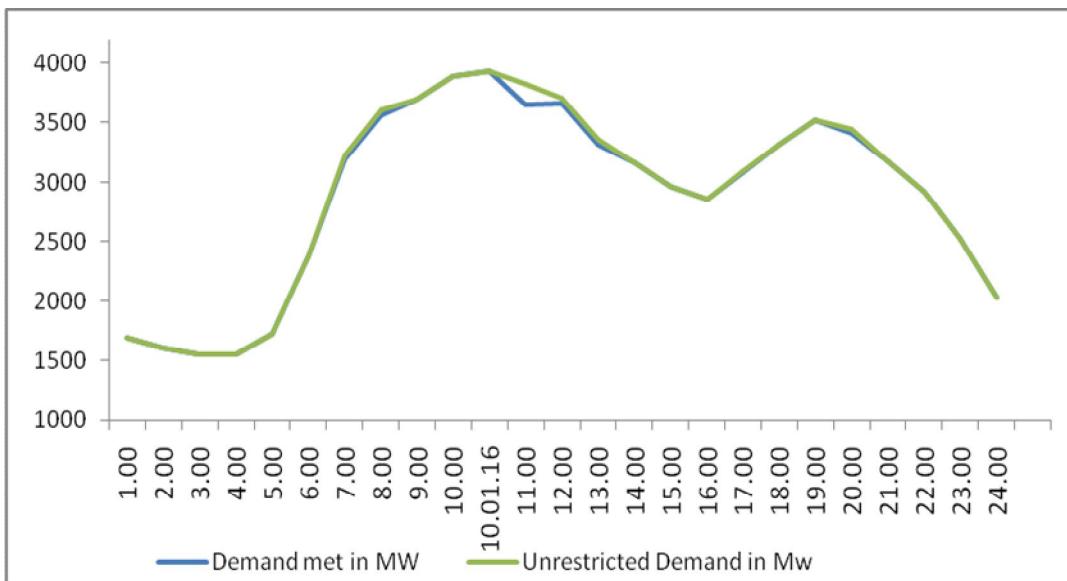
Hrs.	Demand	Load Shedding	Un-Restricted Demand
1.00	1631	0	1631
2.00	1533	0	1533
3.00	1478	0	1478
4.00	1479	0	1479
5.00	1650	0	1650
6.00	2304	0	2304
7.00	3144	18	3162
8.00	3448	47	3495
9.00	3539	1	3540
09.50.40	3691	0	3691
10.00	3624	0	3624
11.00	3563	0	3563
12.00	3341	0	3341
13.00	3048	0	3048
14.00	2955	0	2955
15.00	2907	0	2907
16.00	2872	0	2872
17.00	2957	5	2962
18.00	3320	0	3320
19.00	3447	35	3482
20.00	3395	19	3414
21.00	3159	0	3159
22.00	2873	0	2873
23.00	2367	0	2367
24.00	1952	0	1952
ENERGY IN Mus	69.264	0.104	69.368



**9.17.2.4 LOAD PATTERN OF DELHI ON THE DAY OF MAXIMUM UNRESTRICTED ENERGY DEMAND DURING WINTER 2011-12 – 69.776 MUs ON 20.01.2012**

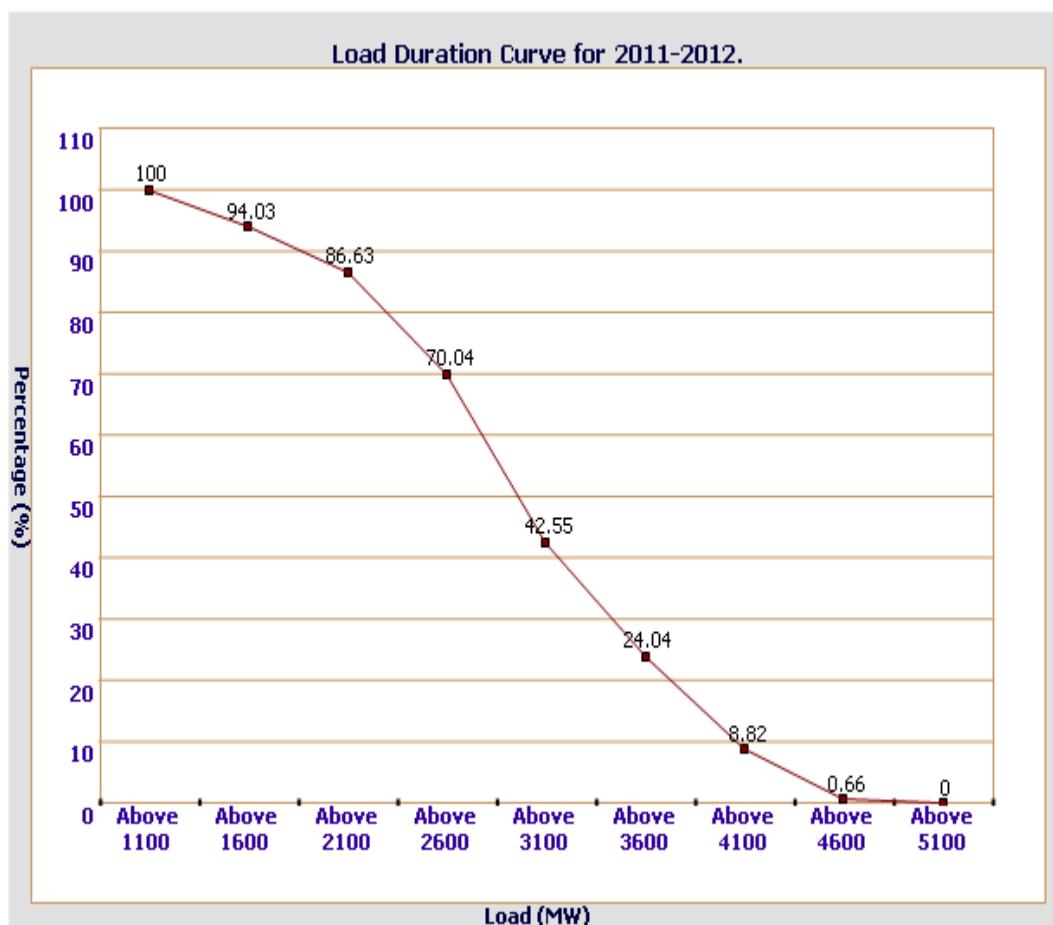
All figures in MW

Hrs.	Demand met	Load Shedding	Un-Restricted Demand
1.00	1695	0	1695
2.00	1602	0	1602
3.00	1553	0	1553
4.00	1551	0	1551
5.00	1720	0	1720
6.00	2380	0	2380
7.00	3205	23	3228
8.00	3566	41	3607
9.00	3700	0	3700
10.00	3894	0	3894
<b>10.01.16</b>	<b>3934</b>	<b>0</b>	<b>3934</b>
11.00	3653	172	3825
12.00	3667	44	3711
13.00	3322	37	3359
14.00	3165	0	3165
15.00	2967	0	2967
16.00	2857	0	2857
17.00	3084	5	3089
18.00	3313	0	3313
19.00	3527	0	3527
20.00	3413	38	3451
21.00	3173	0	3173
22.00	2923	0	2923
23.00	2525	0	2525
24.00	2024	0	2024
<b>ENERGY IN Mus</b>	<b>69.248</b>	<b>0.528</b>	<b>69.776</b>



### 9.18 LOAD DURATION CURVE FOR 2011-12 (Based on SCADA)

LOAD (MW)	% TIME
Above 1100	100.00
Above 1600	94.03
Above 2100	86.63
Above 2600	70.04
Above 3100	42.55
Above 3600	24.04
Above 4100	8.82
Above 4600	0.66
Above 5100	0.00



**10 FREQUENCY SPECTRUM OF NORTHERN REGION [(NORTH-EAST-WEST)(NEW)] FOR 2011-12**

Month	Frequency in Hz.			Frequency Variation index (FVI)	Percentage of Time				
	Ave.	Max	Min.		Above 50.2Hz.	Between 50.2-49.5Hz.	Below 49.5Hz.	Below 48.8Hz.	Total
<b>Apr-11</b>	49.79	50.65	48.80	0.69	1.42	91.08	7.50	0.00	100.00
<b>May-11</b>	49.89	50.95	49.00	0.52	3.50	93.33	3.17	0.00	100.00
<b>Jun-11</b>	49.89	50.60	48.82	0.69	4.48	91.07	4.45	0.00	100.00
<b>Jul-11</b>	49.85	50.49	48.81	0.62	1.83	93.53	4.64	0.00	100.00
<b>Aug-11</b>	49.87	50.69	48.78	0.64	4.50	91.62	3.88	0.00	100.00
<b>Sep-11</b>	49.84	50.66	48.78	0.96	5.41	83.85	10.74	0.00	100.00
<b>Oct-11</b>	49.65	50.63	48.57	0.14	0.80	75.97	23.23	0.91	100.00
<b>Nov-11</b>	49.74	50.58	48.85	1.04	0.51	88.94	10.55	0.00	100.00
<b>Dec-11</b>	49.71	50.42	48.82	1.32	0.65	82.70	16.65	0.00	100.00
<b>Jan-12</b>	49.85	50.84	48.99	0.72	5.11	89.66	5.23	0.00	100.00
<b>Feb-12</b>	49.84	50.49	49.05	0.57	1.82	95.46	2.72	0.00	100.00
<b>Mar-12</b>	49.86	50.61	48.96	0.50	2.50	95.35	2.15	0.00	100.00
<b>2011-12</b>	<b>49.81</b>	<b>50.95</b>	<b>48.57</b>	<b>0.70</b>	<b>2.72</b>	<b>89.34</b>	<b>7.95</b>	<b>0.08</b>	<b>100.00</b>

**11 DETAILS OF UNDER FREQUECY RELAY TRIPPINGS OCCURRED IN 2011-12**

MONTH	STAGE-1	STAGE-2	df/dt (49.9Hz with slop 0.1, 0.2, 0.3Hz/Sec)	TOTAL
<b>APRIL 2011</b>	4	0	0	4
<b>MAY 2011</b>	0	0	0	0
<b>JUNE 2011</b>	0	0	0	0
<b>JULY 2011</b>	1	0	0	1
<b>AUGUST 2011</b>	10	0	0	10
<b>SEPTEMBER 2011</b>	5	0	0	5
<b>OCTOBER 2011</b>	227	0	0	227
<b>NOVEMBER 2011</b>	1	0	0	1
<b>DECEMBER 2011</b>	0	0	16	16
<b>JANUARY 2012</b>	0	0	3	3
<b>FEBRUARY 2012</b>	0	0	0	0
<b>MARCH 2012</b>	0	0	0	0
<b>TOTAL 2011-12</b>	<b>248</b>	<b>0</b>	<b>19</b>	<b>267</b>

## 12 INTRASTATE TRANSMISSION LOSSES

### 12.1 WEEK WISE INTRASTATE TRANSMISSION LOSSES FOR 2011-12 (Based on SEM data)

Week No.	Avg Trans. Loss in %age	Actual drawal from the grid in Mus	Actual Ex-bus generation with in Delhi in Mus							Total Consumption of Delhi at DTL periphery in Mus
			RPH	GT	PRAGATI	BTPS	Bawana	Total		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)= sum (3 to 89) SU	(10)=	
1	1.23	116.120	7.884	10.810	6.546	38.833	-0.011	64.063	180.182	
2	1.30	286.060	18.265	23.868	15.709	87.568	3.549	148.958	435.018	
3	1.38	289.249	18.333	12.123	43.416	89.449	1.117	164.437	453.686	
4	1.43	287.416	18.608	22.400	50.530	91.698	-0.036	183.201	470.617	
5	1.37	366.058	17.970	23.746	48.450	99.193	-0.028	189.331	555.389	
6	1.28	421.644	18.459	25.931	42.494	80.527	-0.019	167.391	589.036	
7	1.28	427.350	18.307	28.624	47.017	103.258	-0.029	197.177	624.526	
8	1.30	428.632	17.360	25.081	44.569	98.336	-0.061	185.285	613.917	
9	1.41	411.287	18.251	23.492	47.660	91.443	-0.084	180.762	592.049	
10	1.35	449.307	12.463	22.640	46.354	84.309	-0.069	165.696	615.004	
11	1.16	470.322	18.145	29.325	30.743	89.333	-0.042	167.505	637.826	
12	1.10	466.743	18.451	24.308	45.504	78.539	-0.054	166.748	633.491	
13	1.17	495.379	18.385	26.016	46.633	87.182	-0.066	178.148	673.527	
14	1.15	460.786	16.826	15.320	46.644	80.271	-0.058	159.003	619.789	
15	1.13	472.175	8.975	21.370	49.272	85.273	0.186	165.075	637.251	
16	1.21	488.651	-0.237	23.984	49.684	74.105	-0.113	147.423	636.074	
17	1.18	494.639	-0.180	22.011	49.567	80.799	-0.146	152.050	646.689	
18	1.21	472.841	5.477	24.326	44.742	93.881	-0.078	168.347	641.188	
19	1.33	486.877	11.667	26.732	49.155	100.981	0.227	188.762	675.639	
20	1.19	426.985	16.089	21.920	49.104	90.801	-0.150	177.764	604.749	
21	1.17	398.417	14.388	20.267	46.287	72.928	1.036	154.907	553.324	
22	1.16	443.061	14.471	22.753	49.987	83.177	0.580	170.969	614.030	
23	1.14	478.786	9.840	23.898	49.378	86.574	-0.154	169.535	648.321	
24	1.07	433.207	5.673	15.984	48.470	74.928	-0.170	144.885	578.092	
25	1.16	455.229	12.085	18.045	49.552	69.521	-0.175	149.028	604.258	
26	1.17	416.483	16.195	19.284	50.192	84.701	-0.142	170.230	586.713	
27	1.27	372.553	12.913	21.628	50.317	97.370	-0.362	181.866	554.419	

Week No.	Avg Trans. Loss in %age	Actual drawal from the grid in Mus	Actual Ex-bus generation with in Delhi in Mus							Total Consumption of Delhi at DTL periphery in Mus
			RPH	GT	PRAGATI	BTPS	Bawana	Total		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)= sum (3 to89) SU	(10)	
28	1.40	344.194	16.378	25.342	50.129	86.722	-0.049	178.522	522.716	
29	1.39	330.004	17.207	27.790	49.830	75.369	-0.259	169.937	499.941	
30	1.31	308.264	12.572	30.161	50.863	44.410	14.376	152.382	460.646	
31	1.16	253.332	16.956	23.875	51.329	41.360	17.688	151.207	404.540	
32	1.25	216.667	16.585	26.333	48.868	63.745	24.873	180.404	397.071	
33	1.24	204.594	12.715	26.285	51.129	68.929	25.002	184.059	388.653	
34	1.38	213.616	9.954	30.379	49.225	73.813	14.953	178.325	391.941	
35	1.33	234.854	8.912	27.414	51.397	63.966	-0.018	151.671	386.525	
36	1.05	211.038	15.274	30.081	51.531	73.475	-0.013	170.348	381.385	
37	1.29	218.632	14.549	30.168	49.108	73.517	-0.002	167.340	385.972	
38	1.23	228.601	7.979	31.740	49.779	68.384	8.312	166.194	394.796	
39	1.29	247.503	13.059	29.377	51.119	74.537	6.587	174.678	422.181	
40	1.42	221.863	11.019	31.698	50.968	87.180	23.833	204.699	426.562	
41	1.53	236.127	10.223	30.278	49.546	91.374	0.431	181.851	417.978	
42	1.18	235.497	8.126	31.313	50.915	88.167	23.455	201.976	437.473	
43	1.36	246.786	9.470	21.984	50.770	97.530	21.919	201.672	448.457	
44	1.26	237.393	13.328	22.927	50.766	94.544	2.901	184.466	421.859	
45	1.26	234.902	13.918	13.726	50.629	94.599	14.321	187.194	422.096	
46	1.27	223.156	14.214	14.454	50.334	90.613	26.980	196.594	419.751	
47	1.25	220.311	17.056	13.298	46.650	82.027	27.566	186.596	406.907	
48	1.14	214.586	16.140	12.197	49.710	90.349	4.682	173.078	387.664	
49	1.03	185.978	16.614	11.785	50.084	96.515	20.820	195.817	381.796	
50	0.91	188.834	17.035	12.187	48.748	79.193	6.846	164.010	352.844	
51	1.02	178.999	11.597	17.942	48.140	91.461	28.581	197.721	376.720	
52	1.01	228.397	11.321	13.236	49.635	95.433	-0.083	169.542	397.940	
53	1.14	217.591	12.456	11.311	42.947	79.563	4.854	151.131	368.722	
<b>Total 2011-12</b>	1.21	17297.976	702.758	1193.161	2492.127	4361.754	323.200	9079.963	26370.976	

Week	Actual drawal of distribution licensees and deemed licensees in MUs								Trans. Loss in %
	NDPL	BRPL	BYPL	NDMC	MES	IP	Total	Avg. Trans Loss in Mus	
(1)	(10)=(3)+(9)	(11)	(12)	(13)	(14)	(15)	(16)=(11)+(12)+(13)+(14)+(15)	(17)=(10)-(16)	(18)=(17)*100/10
1	49.624	73.819	44.205	8.821	1.424	0.073	177.966	2.217	1.23
2	122.163	177.392	103.930	22.369	3.417	0.073	429.344	5.674	1.30
3	126.381	186.426	108.916	22.197	3.417	0.073	447.409	6.277	1.38
4	130.366	192.592	113.532	23.831	3.516	0.073	463.909	6.708	1.43
5	150.185	231.926	132.624	28.809	4.163	0.073	547.779	7.610	1.37
6	158.603	247.659	139.789	30.969	4.419	0.073	581.511	7.524	1.28
7	166.470	263.759	149.103	32.502	4.625	0.073	616.532	7.995	1.28
8	164.035	259.189	146.800	31.367	4.494	0.073	605.958	7.959	1.30
9	158.245	247.690	141.959	31.383	4.377	0.073	583.727	8.322	1.41
10	164.124	259.121	146.602	32.200	4.551	0.073	606.671	8.333	1.35
11	170.439	269.392	151.025	34.793	4.714	0.073	630.435	7.392	1.16
12	170.330	266.320	150.826	34.231	4.725	0.073	626.506	6.986	1.10
13	180.946	284.782	159.497	35.309	5.023	0.073	665.631	7.897	1.17
14	166.907	257.626	149.710	33.656	4.682	0.073	612.655	7.135	1.15
15	171.425	267.172	152.231	34.319	4.841	0.073	630.061	7.190	1.13
16	173.154	266.418	149.538	34.379	4.839	0.073	628.402	7.673	1.21
17	176.651	270.820	152.011	34.598	4.914	0.073	639.067	7.623	1.18
18	175.332	266.956	151.672	34.566	4.841	0.073	633.439	7.749	1.21
19	185.308	280.077	160.508	35.651	5.066	0.073	666.682	8.957	1.33
20	163.150	252.961	143.888	32.859	4.602	0.073	597.533	7.216	1.19
21	149.065	230.793	133.296	29.336	4.267	0.073	546.831	6.493	1.17
22	166.767	256.457	147.710	31.331	4.581	0.073	606.919	7.111	1.16
23	174.165	274.857	153.308	33.676	4.859	0.073	640.938	7.383	1.14
24	159.513	238.882	136.791	32.162	4.480	0.073	571.901	6.191	1.07
25	166.087	249.471	143.455	33.521	4.662	0.073	597.269	6.989	1.16
26	163.214	240.674	138.934	32.444	4.490	0.073	579.829	6.884	1.17
27	152.988	226.982	132.884	30.352	4.100	0.073	547.378	7.041	1.27

Week	Actual drawal of distribution licensees and deemed licensees in MUs								Trans . Loss in %
	NDPL	BRPL	BYPL	NDMC	MES	Total	IP	Avg. Trans Loss in Mus	
(1)	(10)=(3)+(9 )	(11)	(12)	(13)	(14)	(15)	(16)=(11)+(12)+(13)+(14)+(15)	(17)=(10)-(16)	(18)=(17)*100/10
28	144.731	212.708	126.174	27.946	3.769	0.073	515.401	7.315	1.40
29	140.647	197.904	122.631	27.958	3.770	0.073	492.982	6.959	1.39
30	131.665	183.209	111.073	25.292	3.315	0.073	454.627	6.019	1.31
31	109.030	169.316	96.694	21.707	3.037	0.073	399.858	4.682	1.16
32	112.664	161.294	92.998	21.911	3.154	0.073	392.094	4.977	1.25
33	111.964	158.226	89.950	20.569	3.051	0.073	383.833	4.820	1.24
34	112.812	158.178	90.881	21.406	3.180	0.073	386.530	5.411	1.38
35	110.986	156.864	89.345	20.836	3.266	0.073	381.371	5.154	1.33
36	113.013	153.709	87.132	20.034	3.414	0.073	377.375	4.010	1.05
37	114.312	156.400	86.971	19.771	3.452	0.073	380.978	4.993	1.29
38	116.070	160.507	88.509	20.575	4.200	0.073	389.934	4.862	1.23
39	120.773	173.468	95.040	22.458	4.941	0.073	416.752	5.429	1.29
40	119.305	177.501	95.251	22.984	5.407	0.073	420.522	6.040	1.42
41	114.866	174.421	94.745	22.287	5.196	0.073	411.588	6.390	1.53
42	122.346	182.682	98.379	23.256	5.591	0.073	432.327	5.146	1.18
43	123.953	186.641	101.240	24.602	5.856	0.073	442.365	6.092	1.36
44	116.833	174.757	95.478	24.031	5.373	0.073	416.545	5.314	1.26
45	120.480	171.357	95.319	24.517	5.011	0.073	416.757	5.338	1.26
46	121.019	169.402	94.625	24.463	4.842	0.073	414.425	5.326	1.27
47	117.439	165.767	92.716	21.378	4.448	0.073	401.819	5.088	1.25
48	113.697	155.380	89.268	21.117	3.729	0.073	383.263	4.400	1.14
49	112.015	153.203	88.511	20.473	3.581	0.073	377.856	3.940	1.03
50	98.948	146.909	81.805	18.689	3.204	0.073	349.628	3.215	0.91
51	110.430	152.752	86.615	19.775	3.232	0.073	372.876	3.844	1.02
52	116.817	160.666	91.820	21.271	3.288	0.073	393.934	4.006	1.01
53	108.157	148.762	85.320	19.250	2.947	0.073	364.510	4.212	1.14
Total 2011- 12	7310.609	10902.196	6203.231	1410.184	222.344	3.823	26052.388	318.588	1.21

## 12.2 MONTH WISE TRANSMISSION LOSSES FOR 2011-12

All Figures in MUs

<b>Month</b>	<b>NDPL</b>	<b>BRPL</b>	<b>BYPL</b>	<b>NDMC</b>	<b>MES</b>	<b>IP</b>	<b>Total supply to disoms</b>
<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>	<b>6</b>	<b>7</b>	<b>8=sum(2 to 7)</b>
Apr-11	557.456	829.021	484.148	102.745	15.382	0.312	1989.063
May-11	718.358	1129.355	639.798	139.789	19.876	0.326	2647.500
Jun-11	732.661	1148.880	650.079	146.586	20.338	0.309	2698.852
Jul-11	766.906	1181.804	669.945	151.178	21.385	0.324	2791.542
Aug-11	740.325	1140.522	652.153	144.039	20.614	0.323	2697.975
Sep-11	701.488	1051.681	603.599	140.339	19.481	0.314	2516.902
Oct-11	580.551	845.327	504.689	113.147	15.361	0.323	2059.397
Nov-11	480.641	677.060	387.247	90.358	13.652	0.312	1649.270
Dec-11	519.685	732.244	402.645	94.178	19.251	0.323	1768.327
Jan-12	528.610	792.117	429.752	104.358	24.256	0.323	1879.418
Feb-12	486.112	678.528	382.841	93.179	18.119	0.302	1659.081
Mar-12	497.816	695.659	396.336	90.288	14.631	0.333	1695.062
<b>Total</b>	<b>7310.609</b>	<b>10902.196</b>	<b>6203.231</b>	<b>1410.184</b>	<b>222.344</b>	<b>3.823</b>	<b>26052.388</b>

<b>Month</b>	<b>GT</b>	<b>RPH</b>	<b>PPCL</b>	<b>BTPS</b>	<b>Bawana</b>	<b>Drawal from the Grid</b>
<b>1</b>	<b>8</b>	<b>9</b>	<b>10</b>	<b>11</b>	<b>12</b>	<b>13</b>
Apr-11	89.634	77.504	157.630	394.526	4.592	1291.804
May-11	113.777	78.913	202.592	411.996	-0.226	1875.104
Jun-11	104.722	72.626	181.472	356.315	-0.241	2015.445
Jul-11	97.238	19.985	213.840	371.161	-0.169	2122.306
Aug-11	102.317	60.617	215.824	387.593	1.629	1962.536
Sep-11	83.052	49.598	212.176	346.038	-0.742	1855.638
Oct-11	115.205	67.021	223.950	284.323	34.066	1361.682
Nov-11	120.200	51.935	215.319	292.821	62.290	927.814
Dec-11	136.714	52.375	223.276	333.180	35.059	1009.695
Jan-12	114.083	47.313	223.733	410.825	52.427	1055.915
Feb-12	54.062	63.217	204.429	371.595	83.127	902.531
Mar-12	62.156	61.654	217.887	401.383	51.388	917.506
<b>Total</b>	<b>1193.161</b>	<b>702.758</b>	<b>2492.127</b>	<b>4361.754</b>	<b>323.200</b>	<b>17297.976</b>

<b>Month</b>	<b>Total Injection For supply to Discoms in MUs</b>	<b>Losses in MUs</b>	<b>Losses in %</b>	<b>Losses in % during previous year</b>
1	14=Sum(8to13)	15=14-7	16=15*100/14	17
Apr-11	2015.689	26.627	1.32	1.37
May-11	2682.157	34.657	1.29	1.30
Jun-11	2730.340	31.488	1.15	1.17
Jul-11	2824.361	32.819	1.16	1.22
Aug-11	2730.515	32.541	1.19	1.15
Sep-11	2545.759	28.857	1.13	1.12
Oct-11	2086.246	26.849	1.29	1.31
Nov-11	1670.380	21.110	1.26	1.39
Dec-11	1790.298	21.971	1.23	1.51
Jan-12	1904.296	24.879	1.31	1.36
Feb-12	1678.960	19.879	1.18	1.40
Mar-12	1711.975	16.913	0.99	1.18
<b>Total</b>	<b>26370.976</b>	<b>318.588</b>	<b>1.21</b>	<b>1.28</b>

13

13.1

13.1.1

## ALLOCATION OF POWER TO DISCOMS FOR 2011-12

### ALLOCATION FROM CENTRAL SECTOR

**Allocation to Delhi w.e.f.08.03.2011@ 0% allocation from unallocated quota of Central Sector Generating Stations.**

All figures in MW

Name of the Stn	Installed capacity	Total Un-allocate d	Basic Allocation	Basic Allocation at periphery	Allocation out of Unallocate d Quota	Allocation out of Un-allocation Quota at Delhi periphery	Total allocation at Delhi periphery
1	2	3	4	5	6	7	(8)=(5)+(7)
<b>NTPC STATIONS</b>							
Singrauli STPS	2000	300	150	130	0	0	130
Rihand	1000	150	100	87	0	0	87
Rihand Stage -II	1000	150	126	109	0	0	109
ANTA GPS	419	63	44	41	0	0	41
Auriya GPS	663.36	99	72	67	0	0	67
Dadri GPS	829.78	129	91	85	0	0	85
Dadri NCTPS (Th)	840	0	756	657	0	0	657
Dadri NCTPS (Th) Stage-II	980	147	735	639	0	0	639
Unchahaar-I TPS	420	20	24	21	0	0	21
Unchahaar-II TPS	420	63	47	41	0	0	41
Unchahaar-III TPS	210	31	29	25	0	0	25
<b>TOTAL</b>	<b>8782</b>	<b>1152</b>	<b>2174</b>	<b>1902</b>	<b>0</b>	<b>0</b>	<b>1902</b>
<b>NHPC</b>							
Baira Suil HPS	180	0	20	19	0	0	19
Salal HPS	690	0	80	76	0	0	76
Tanakpur HEP	94	0	12	11	0	0	11
Chamera HEP	540	0	43	41	0	0	41
Chamera-II HEP	300	54	40	38	0	0	38
URI HEP	480	0	53	50	0	0	50
Sewa HEP	120	18	16	15	0	0	15
Dhauli Ganga HEP	280	42	37	35	0	0	35
Dulhasti HEP	390	58	50	48	0	0	48
<b>TOTAL</b>	<b>3074</b>	<b>172</b>	<b>351</b>	<b>333</b>	<b>0</b>	<b>0</b>	<b>333</b>
<b>NPC</b>							
Narora APS	440	64	47	41	0	0	41
RAPP(B)	440	66	0	0	0	0	0
RAPP (C )	440	64	56	49	0	0	49
<b>TOTAL</b>	<b>1320</b>	<b>194</b>	<b>103</b>	<b>89</b>	<b>0</b>	<b>0</b>	<b>89</b>
<b>SVJNL</b>							
Nathpa Jhakri HEP	1500	149	142	123	0	0	123
<b>THDC</b>							
Tehri Hydro	1000	99	103	89	0	0	89
<b>Total</b>	<b>15676</b>	<b>1766</b>	<b>2873</b>	<b>2537</b>	<b>0</b>	<b>0</b>	<b>2537</b>
<b>Allocation from ER and Tala HEP</b>							
Farakka	1600	0	22	19	0	0	19
Kahalgaon	840	0	51	43	0	0	43
Talchar	1000	0	0	0	0	0	0
Tala HEP	1020	153	30	25	0	0	25
Mejia TPS Unit-6	250	0	29	25	0	0	25
Kahalgaon-II	1500	0	157	131	0	0	131
<b>Total ER</b>	<b>6210</b>	<b>153</b>	<b>290</b>	<b>242</b>	<b>0</b>	<b>0</b>	<b>242</b>
Jhajjar TPS	500	38	231	201	0	0	201
<b>Grand Total</b>	<b>22386</b>	<b>1957</b>	<b>3393</b>	<b>2980</b>	<b>0</b>	<b>0</b>	<b>2980</b>

**13.1.2 a)Allocation to Delhi w.e.f.22.05.2011@ 0% allocation from unallocated quota of Central Sector Generating Stations during 00.00hrs. to 12.00hrs. and 23.00hrs. to 24.00hrs.**

All figures in MW

Name of the Stn	Installed capacity	Total Un-allocate d	Basic Allocation	Basic Allocation at periphery	Allocation out of Unallocate d Quota	Allocation out of Un- allocation Quota at Delhi periphery	Total allocation at Delhi periphery
1	2	3	4	5	6	7	(8)=(5)+(7)
<b>NTPC STATIONS</b>							
Singrauli STPS	2000	300	150	130	0	0	130
Rihand	1000	150	100	87	0	0	87
Rihand Stage -II	1000	150	126	109	0	0	109
ANTA GPS	419	63	44	41	0	0	41
Auriya GPS	663.36	99	72	67	0	0	67
Dadri GPS	829.78	129	91	85	0	0	85
Dadri NCTPS (Th)	840	0	756	657	0	0	657
Dadri NCTPS (Th) Stage-II	980	147	735	639	0	0	639
Unchahaar-I TPS	420	20	24	21	0	0	21
Unchahaar-II TPS	420	63	47	41	0	0	41
Unchahaar-III TPS	210	31	29	25	0	0	25
<b>TOTAL</b>	<b>8782</b>	<b>1152</b>	<b>2174</b>	<b>1902</b>	<b>0</b>	<b>0</b>	<b>1902</b>
<b>NHPC</b>							
Baira Suil HPS	180	0	20	19	0	0	19
Salal HPS	690	0	80	76	0	0	76
Tanakpur HEP	94	0	12	11	0	0	11
Chamera HEP	540	0	43	41	0	0	41
Chamera-II HEP	300	54	40	38	0	0	38
URI HEP	480	0	53	50	0	0	50
Sewa HEP	120	18	16	15	0	0	15
Dhauli Ganga HEP	280	42	37	35	0	0	35
Dulhasti HEP	390	58	50	48	0	0	48
<b>TOTAL</b>	<b>3074</b>	<b>172</b>	<b>351</b>	<b>333</b>	<b>0</b>	<b>0</b>	<b>333</b>
<b>NPC</b>							
Narora APS	440	64	47	41	0	0	41
RAPP(B)	440	66	0	0	0	0	0
RAPP (C )	440	64	56	49	0	0	49
<b>TOTAL</b>	<b>1320</b>	<b>194</b>	<b>103</b>	<b>89</b>	<b>0</b>	<b>0</b>	<b>89</b>
<b>SVJNL</b>							
Nathpa Jhakri HEP	1500	149	142	123	0	0	123
<b>THDC</b>							
Tehri Hydro	1000	99	103	89	0	0	89
<b>Total</b>	<b>15676</b>	<b>1766</b>	<b>2873</b>	<b>2537</b>	<b>0</b>	<b>0</b>	<b>2537</b>
<b>Allocation from ER and Tala HEP</b>							
Farakka	1600	0	22	19	0	0	19
Kahalgaon	840	0	51	43	0	0	43
Talchar	1000	0	0	0	0	0	0
Tala HEP	1020	153	30	25	0	0	25
Mejia TPS Unit-6	250	0	29	25	0	0	25
Kahalgaon-II	1500	0	157	131	0	0	131
<b>Total ER</b>	<b>6210</b>	<b>153</b>	<b>290</b>	<b>242</b>	<b>0</b>	<b>0</b>	<b>242</b>
Jhajjar TPS	500	38	231	201	0	0	201
<b>Grand Total</b>	<b>22386</b>	<b>1957</b>	<b>3393</b>	<b>2980</b>	<b>0</b>	<b>0</b>	<b>2980</b>

**b)Allocation to Delhi w.e.f.22.05.2011@ 16% allocation from unallocated quota of Central Sector Generating Stations during 12.00hrs. to 23hrs.**

All figures in MW

Name of the Stn	Installed capacity	Total Un-allocate d	Basic Allocation	Basic Allocation at periphery	Allocation out of Unallocate d Quota	Allocation out of Un- allocation Quota at Delhi periphery	Total allocation at Delhi periphery
1	2	3	4	5	6	7	(8)=(5)+(7)
<b>NTPC STATIONS</b>							
Singrauli STPS	2000	300	150	130	39	34	165
Rihand	1000	150	100	87	20	17	104
Rihand Stage -II	1000	150	126	109	20	17	127
ANTA GPS	419	63	44	41	8	8	49
Auriya GPS	663.36	99	72	67	9	9	76
Dadri GPS	829.78	129	91	85	8	7	92
Dadri NCTPS (Th)	840	0	756	657	0	0	657
Dadri NCTPS (Th) Stage-II	980	147	735	639	19	17	655
Unchahaar-I TPS	420	20	24	21	3	2	23
Unchahaar-II TPS	420	63	47	41	8	7	48
Unchahaar-III TPS	210	31	29	25	4	4	29
<b>TOTAL</b>	<b>8782</b>	<b>1152</b>	<b>2174</b>	<b>1902</b>	<b>138</b>	<b>122</b>	<b>2023</b>
<b>NHPC</b>							
Baira Suil HPS	180	0	20	19	0	0	19
Salal HPS	690	0	80	76	0	0	76
Tanakpur HEP	94	0	12	11	0	0	11
Chamera HEP	540	0	43	41	0	0	41
Chamera-II HEP	300	54	40	38	7	7	45
URI HEP	480	0	53	50	0	0	50
Sewa HEP	120	18	16	15	2	2	17
Dhauli Ganga HEP	280	42	37	35	6	5	40
Koteshwar HEP	100	0	10	9	1	1	11
Dulhasti HEP	390	58	50	48	8	7	55
<b>TOTAL</b>	<b>3174</b>	<b>172</b>	<b>361</b>	<b>343</b>	<b>24</b>	<b>23</b>	<b>365</b>
<b>NPC</b>							
Narora APS	440	64	47	41	8	7	48
RAPP(B)	440	66	0	0	0	0	0
RAPP (C )	440	64	56	49	14	12	61
<b>TOTAL</b>	<b>1320</b>	<b>194</b>	<b>103</b>	<b>89</b>	<b>23</b>	<b>20</b>	<b>109</b>
<b>SVJNL</b>							
Nathpa Jhakri HEP	1500	149	142	123	20	19	142
<b>THDC</b>							
Tehri Hydro	1000	99	103	89	13	12	102
<b>Total</b>	<b>15776</b>	<b>1766</b>	<b>2882</b>	<b>2547</b>	<b>217</b>	<b>195</b>	<b>2741</b>
<b>Allocation from ER and Tala HEP</b>							
Farakka	1600	0	22	19	0	0	19
Kahalgaon	840	0	51	43	0	0	43
Talchar	1000	0	0	0	0	0	0
Tala HEP	1020	153	30	25	0	0	25
Mejia TPS Unit-6	250	0	29	25	0	0	25
Kahalgaon-II	1500	0	157	131	0	0	131
<b>Total ER</b>	<b>6210</b>	<b>153</b>	<b>290</b>	<b>242</b>	<b>0</b>	<b>0</b>	<b>242</b>
Jhajjar TPS	500	38	231	201	5	4	205
<b>Grand Total</b>	<b>22486</b>	<b>1957</b>	<b>3403</b>	<b>2989</b>	<b>222</b>	<b>199</b>	<b>3188</b>

**13.1.3 a)Allocation to Delhi w.e.f. 14.12.2011@ 0% allocation from unallocated quota of Central Sector Generating Stations during 00.00hrs. to 24.00hrs.**

All figures in MW

Name of the Stn	Installed capacity	Total Un-allocate d	Basic Allocation	Basic Allocation at periphery	Allocation out of Unallocate d Quota	Allocation out of Un-allocation Quota at Delhi periphery	Total allocation at Delhi periphery
1	2	3	4	5	6	7	(8)=(5)+(7)
<b>NTPC STATIONS</b>							
Singrauli STPS	2000	300	150	130	0	0	130
Rihand	1000	150	100	87	0	0	87
Rihand Stage -II	1000	150	126	109	0	0	109
ANTA GPS	419	63	44	41	0	0	41
Auriya GPS	663.36	99	72	67	0	0	67
Dadri GPS	829.78	129	91	85	0	0	85
Dadri NCTPS (Th)	840	0	756	657	0	0	657
Dadri NCTPS (Th) Stage-II	980	147	735	639	0	0	639
Unchahaar-I TPS	420	20	24	21	0	0	21
Unchahaar-II TPS	420	63	47	41	0	0	41
Unchahaar-III TPS	210	31	29	25	0	0	25
<b>TOTAL</b>	<b>8782</b>	<b>1152</b>	<b>2174</b>	<b>1902</b>	<b>0</b>	<b>0</b>	<b>1902</b>
<b>NHPC</b>							
Baira Suil HPS	180	0	20	19	0	0	19
Salal HPS	690	0	80	76	0	0	76
Tanakpur HEP	94	0	12	11	0	0	11
Chamera HEP	540	0	43	41	0	0	41
Chamera-II HEP	300	54	40	38	0	0	38
Chamera-III HEP	231	35	29	28	0	0	28
URI HEP	480	0	53	50	0	0	50
Sewa HEP	120	18	16	15	0	0	15
Dhauli Ganga HEP	280	42	37	35	0	0	35
Dulhasti HEP	390	58	50	48	0	0	48
<b>TOTAL</b>	<b>3305</b>	<b>206</b>	<b>380</b>	<b>361</b>	<b>0</b>	<b>0</b>	<b>361</b>
<b>NPC</b>							
Narora APS	440	64	47	41	0	0	41
RAPP(B)	440	66	0	0	0	0	0
RAPP (C )	440	64	56	49	0	0	49
<b>TOTAL</b>	<b>1320</b>	<b>194</b>	<b>103</b>	<b>89</b>	<b>0</b>	<b>0</b>	<b>89</b>
<b>SVJNL</b>							
Nathpa Jhakri HEP	1500	149	142	123	0	0	123
<b>THDC</b>							
Tehri Hydro	1000	99	103	89	0	0	89
Koteshwar HEP	400	40	39	37	0	0	37
<b>TOTAL</b>	<b>1400</b>	<b>139</b>	<b>142</b>	<b>127</b>	<b>0</b>	<b>0</b>	<b>127</b>
<b>Total</b>	<b>16307</b>	<b>1840</b>	<b>2941</b>	<b>2603</b>	<b>0</b>	<b>0</b>	<b>2603</b>
<b>Allocation from ER and Tala HEP</b>							
Farakka	1600	0	22	19	0	0	19
Kahalgaon	840	0	51	43	0	0	43
Talchar	1000	0	0	0	0	0	0
Tala HEP	1020	153	30	25	0	0	25
Mejia TPS Unit-6	250	0	29	25	0	0	25
Kahalgaon-II	1500	0	157	131	0	0	131
<b>Total ER</b>	<b>6210</b>	<b>153</b>	<b>290</b>	<b>242</b>	<b>0</b>	<b>0</b>	<b>242</b>
Jhajjar TPS	1000	76	231	201	0	0	201
<b>Grand Total</b>	<b>23517</b>	<b>2069</b>	<b>3462</b>	<b>3045</b>	<b>0</b>	<b>0</b>	<b>3045</b>

**13.2 ALLOCATION OF POWER TO DELHI DISCOMS FROM VARIOUS SOURCES  
(Allocation In % )**

**(A) 10.00hrs. to 17.00hrs.**

SOURCES	LICENSEES					TOTAL
	NDMC	MES	NDPL	BRPL	BYPL	
1. Central Sector without Dadri (Th)	0.00	0.00	29.18	43.58	27.24	100.00
2. Dadri (Th)	14.98	0.00	24.18	36.87	23.97	100.00
3. BTPS	15.94	7.09	21.88	33.37	21.72	100.00
4. IP	0.00	0.00	0.00	0.00	0.00	100.00
5. RPH	0.86	0.00	28.35	43.04	27.75	100.00
6. GT	0.93	0.00	28.28	42.99	27.80	100.00
7. Pragati	26.69	0.00	20.77	31.76	20.78	100.00
8. DVC	0.00	0.00	29.18	43.58	27.24	100.00

**(B) 00.00hrs. to 10.00hrs. and 17.00hrs. to 24.00hrs.**

SOURCES	LICENSEES					TOTAL
	NDMC	MES	NDPL	BRPL	BYPL	
1. Central Sector without Dadri (Th)	0.00	0.00	29.18	43.58	27.24	100.00
2. Dadri (Th)	14.05	0.00	24.18	36.87	24.90	100.00
3. BTPS	15.07	7.09	21.88	33.37	22.59	100.00
4. IP	0.00	0.00	0.00	0.00	0.00	100.00
5. RPH	0.00	0.00	28.35	43.04	28.61	100.00
6. GT	0.00	0.00	28.28	42.99	29.73	100.00
7. Pragati	25.76	0.00	20.77	31.76	21.71	100.00
8. DVC	0.00	0.00	29.18	43.58	27.24	100.00

## **14 Inter Discom transfer of power**

As per the order of Delhi Electricity Regulatory Commission (DERC) dated 14.08.2007, surplus power by virtue of allocation of the licensees should be distributed to the needy distribution licensees to the ratio of the allocation of the sources to the extent of requirement. SLDC started such scheduling from 19.08.2007. Upto 19.02.2008, the scheduling was done on the basis of requirement and availability assessed by the licensees involved. From 20.02.2008 for better management of inter discom surplus, the same has been done on actual basis. As per the order of commission dated 14.08.2007, *for the settlement rate, Commission orders that the fixed cost of Badarpur Power Station, the variable charge for BTPS and a mark up of 10 paise over and above the two charges towards income tax and any other item which is unforeseen at this stage shall be added. As per the current indications, the fixed charge for BTPS is Rs. 0. 53 per kwhr and the variable charge is Rs. 2.11 per Kwhr as of 30-6-07. Adding 10 paise per kwhr for all other adjustments, the single settlement rate between the Discom for such transaction is fixed at Rs. 2.75 per kwhr. Any fuel price adjustment to Rs. 2.11 per kw hr beyond 30.06.07 shall be added at actuals to the prescribed rate of 2.75 kwhr.*

As per the above order, the inter discom transfer rates for 2011-12 has been as under :-

**All figures in Ps/Unit**

<b>Month</b>	<b>Basic Price for Interdiscom Transfer of surplus power in Ps/Unit</b>	<b>Variation in Variable Charges in Ps/Unit</b>	<b>Total Rate for Inter Discom Transfer of power in Ps/unit</b>
Apr-11	275.00	1.91	4.66
May-11	275.00	1.02	3.77
Jun-11	275.00	1.22	3.97
Jul-11	275.00	1.12	3.87
Aug-11	275.00	1.11	3.86
Sep-11	275.00	0.30	3.05
Oct-11	275.00	0.89	3.64
Nov-11	275.00	1.40	4.15
Dec-11	275.00	1.53	4.28
Jan-12	275.00	1.12	3.87
Feb-12	275.00	1.16	3.91
Mar-12	275.00	1.81	4.56

## 14.1 The details of inter discom surplus sale of power for the year

### 14.1.1 Military Engineering Services (MES)

All figures in MUs

From→	MES									
	BRPL		BYPL		NDPL (TPDDL)		NDMC		TOTAL	
Month	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose
Apr-11	<b>1.435104</b>	0.251366	<b>0.289748</b>	0.037580	<b>0.002336</b>	0.007159	<b>0.002336</b>	0.000177	<b>1.729524</b>	<b>0.296282</b>
May-11	1.508265	2.017006	1.184050	0.334607	0.034635	1.072513	0.034635	0.062590	<b>2.761585</b>	<b>3.486716</b>
Jun-11	2.234760	2.048594	0.978064	0.358308	0.156599	1.124005	0.156599	0.090734	<b>3.526022</b>	<b>3.621640</b>
Jul-11	0.154968	1.279487	0.107329	0.165757	0.000007	0.727141	0.000007	0.087700	<b>0.262311</b>	<b>2.260085</b>
Aug-11	5.090828	1.972031	1.432256	0.303608	0.131737	1.261851	0.131737	0.103785	<b>6.786558</b>	<b>3.641275</b>
Sep-11	1.277346	0.514151	0.939176	0.033109	0.019696	0.464394	0.019696	0.069330	<b>2.255914</b>	<b>1.080985</b>
Oct-11	0.325348	0.060158	0.149748	0.003711	0.030306	0.162203	0.030306	0.006880	<b>0.535708</b>	<b>0.232952</b>
Nov-11	0.409710	0.000039	0.286116	0.000000	0.018060	0.019787	0.018060	0.000000	<b>0.731946</b>	<b>0.019825</b>
Dec-11	0.325348	0.029968	0.149748	0.000000	0.030306	0.145280	0.030306	0.000000	<b>0.535708</b>	<b>0.175248</b>
Jan-12	1.461814	0.034228	0.636349	0.000000	0.000000	0.047554	0.000000	0.000000	<b>2.098163</b>	<b>0.081782</b>
Feb-12	0.001025	0.001395	0.027916	0.000000	0.000000	0.004501	0.000000	0.000000	<b>0.028941</b>	<b>0.005896</b>
Mar-12	0.018021	0.011336	0.028194	0.001157	0.005647	0.018898	0.005647	0.000000	<b>0.057509</b>	<b>0.031391</b>
<b>Total</b>	14.242537	8.219759	6.208694	1.237838	0.429329	5.055285	0.429329	0.421195	21.309889	14.93408

### 14.1.2 New Delhi Municipal Council (NDMC)

All figures in MUs

From→	NDMC									
	BRPL		BYPL		NDPL (TPDDL)		MES		TOTAL	
Month	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose
Apr-11	13.336637	1.066865	2.590257	0.076429	0.000000	0.039052	0.003033	0.000000	15.929927	1.182346
May-11	8.366747	7.249076	6.483502	0.726072	0.000000	3.294872	0.019307	0.000000	14.869556	11.270021
Jun-11	9.131607	7.662370	3.973065	1.146854	0.000000	3.750662	0.008152	0.000373	13.112824	12.560258
Jul-11	7.517466	6.489177	5.074414	0.618806	0.000000	3.283432	0.137651	0.007627	12.729531	10.399042
Aug-11	18.076110	6.749058	4.306986	0.907121	0.000000	4.001112	0.000000	0.000894	22.383096	11.658186
Sep-11	5.207617	2.172120	4.020317	0.118328	0.000000	1.535025	0.002955	0.009947	9.230889	3.835420
Oct-11	1.033398	0.346881	0.381175	0.020715	0.000000	0.611120	0.085765	0.043679	1.500338	1.022396
Nov-11	2.522048	0.014721	1.637070	0.001962	0.000000	0.146950	0.075869	0.012895	4.234987	0.176528
Dec-11	4.493512	1.449215	2.356958	0.006053	0.000000	1.897542	0.003662	0.146127	6.854132	3.498937
Jan-12	7.313993	0.975719	2.961240	0.000000	0.000000	0.755503	0.000587	0.041573	10.275820	1.772794
Feb-12	0.013442	0.013679	0.289727	0.000000	0.000000	0.055489	0.044079	0.007743	0.347248	0.076911
Mar-12	0.096242	0.022052	0.152903	0.001963	0.000000	0.046712	0.015365	0.000000	0.264510	0.070727
<b>Total</b>	77.108819	34.210933	34.227614	3.624304	0.000000	19.417471	0.396425	0.270859	111.732858	57.523567

### 14.1.3 BSES Rajdhani Power Ltd. (BRPL)

All figures in MUs

From→	BRPL									
To→	BYPL		NDPL (TPDDL)		NDMC		MES		TOTAL	
Month	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose
Apr-11	0.000000	0.001600	0.000000	0.000000	0.000000	0.001718	0.000000	0.000000	0.000000	0.003318
May-11	3.959831	0.006242	0.240239	0.082937	0.240239	0.211964	0.043450	0.000747	4.483759	0.301891
Jun-11	0.658801	0.000000	0.310001	0.211895	0.310001	0.233787	0.005662	0.000000	1.284465	0.445682
Jul-11	0.114520	0.000000	0.005199	0.166132	0.005199	0.574347	0.085974	0.010165	0.210892	0.750644
Aug-11	0.095963	0.020462	0.091162	0.638835	0.091162	0.270883	0.000000	0.000000	0.278287	0.930180
Sep-11	0.583307	0.000000	0.029529	0.868086	0.029529	1.130668	0.000000	0.051814	0.642365	2.050567
Oct-11	0.400538	0.063143	0.723241	3.097209	0.723241	0.314689	0.616405	0.291513	2.463425	3.766553
Nov-11	0.356456	0.000000	0.077822	0.595893	0.077822	0.000000	0.108898	0.049261	0.620998	0.645155
Dec-11	0.899354	0.000000	0.030056	1.965315	0.030056	0.000000	0.003834	0.175812	0.963300	2.141127
Jan-12	0.362298	0.000000	0.000000	0.564216	0.000000	0.000000	0.000043	0.025340	0.362341	0.589556
Feb-12	1.254100	0.000000	0.003242	0.252277	0.003242	0.000000	0.199998	0.033069	1.460582	0.285346
Mar-12	1.243864	0.000000	0.339194	0.020350	0.339194	0.000000	0.101776	0.000000	2.024028	0.020350
<b>Total</b>	9.929032	0.091447	1.849685	8.463144	1.849685	2.738056	1.166040	0.637721	14.794442	11.930367

### 14.1.4 BSES Yamuna Power Ltd. (BYPL)

All figures in MUs

From→	BYPL									
To→	BYPL		NDPL (TPDDL)		NDMC		MES		TOTAL	
Month	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose	On Day Ahead basis	Final for Payment Purpose
Apr-11	7.651023	1.109407	0.000000	0.001431	0.000000	0.002708	0.001471	0.000000	7.652494	1.113545
May-11	0.883001	7.551499	0.032834	2.380277	0.032834	0.562926	0.002973	0.003910	0.951642	10.498613
Jun-11	3.769938	8.034568	0.915725	2.825951	0.915725	0.689198	0.006894	0.003925	5.608282	11.553643
Jul-11	0.203983	8.404200	0.005370	4.147234	0.005370	1.343393	0.057906	0.017332	0.272629	13.912160
Aug-11	7.960519	7.593048	0.133681	4.167631	0.133681	0.826069	0.000000	0.003351	8.227881	12.590099
Sep-11	0.274125	4.797552	0.017195	4.769371	0.017195	1.837635	0.000000	0.150973	0.308515	11.555532
Oct-11	1.526152	0.443444	0.550252	2.956819	0.550252	0.249237	0.422620	0.225675	3.049276	3.875175
Nov-11	0.402653	0.019693	0.068205	0.480849	0.068205	0.000000	0.076555	0.042060	0.615618	0.542603
Dec-11	1.090824	2.941178	0.013732	4.504606	0.013732	0.000000	0.002706	0.448885	1.120994	7.894669
Jan-12	5.481519	1.944633	0.000000	1.717001	0.000000	0.000000	0.000127	0.102826	5.481646	3.764459
Feb-12	0.017007	0.046803	0.000641	0.189861	0.000641	0.000000	0.070240	0.026493	0.088529	0.263157
Mar-12	0.023768	0.004347	0.096915	0.026534	0.096915	0.000000	0.042142	0.000000	0.259740	0.030781
<b>Total</b>	29.284512	42.890371	1.834550	28.167567	1.834550	5.511165	0.683634	1.025432	33.637246	77.594435

#### 14.1.5 North Delhi Power Ltd. (NDPL)- [Tata Power Delhi Distribution Ltd.]

All figures in MUs

From→	NDPL									
To→	BRPL		BYPL		NDMC		MES		TOTAL	
Month	On Day Ahead basis	Final for Payment Purpose								
Apr-11	2.724600	1.545987	0.179669	0.032190	0.000000	0.003602	0.000224	0.000000	2.904493	1.581779
May-11	2.135166	1.324889	3.533615	0.008800	0.169231	0.128919	0.039952	0.000526	5.877964	1.463134
Jun-11	3.121297	1.396901	1.555068	0.010087	0.943639	0.174679	0.012143	0.002651	5.632147	1.584318
Jul-11	0.284635	1.046764	0.148281	0.016063	0.005104	0.315331	0.029907	0.008716	0.467927	1.386874
Aug-11	3.433853	0.643379	0.142590	0.001103	0.011743	0.168892	0.000000	0.001140	3.588186	0.814514
Sep-11	0.145315	0.376207	0.206005	0.000000	0.027339	0.449492	0.000000	0.023364	0.378659	0.849062
Oct-11	0.642982	0.037151	0.415597	0.000697	0.486100	0.033597	0.369532	0.104152	1.914211	0.175596
Nov-11	4.094651	0.006396	2.383068	0.000393	0.157372	0.000000	0.219234	0.032547	6.854325	0.039335
Dec-11	2.168503	0.502627	1.049904	0.000000	0.027567	0.000000	0.001367	0.177673	3.247341	0.680300
Jan-12	8.413489	0.427026	2.359390	0.000000	0.000000	0.000000	0.000138	0.036114	10.773017	0.463140
Feb-12	0.043043	0.022878	1.119023	0.000000	0.003183	0.000000	0.171059	0.012519	1.336308	0.035397
Mar-12	0.008139	0.000000	0.865855	0.000000	0.236698	0.000000	0.071484	0.000000	1.182176	0.000000
<b>Total</b>	27.215673	7.330203	13.958065	0.069333	2.067976	1.274512	0.915040	0.399401	44.156754	9.073449

## 15 IMPLEMENTATION OF INTRASTATE ABT IN DELHI

In the second phase of power reforms undertaken in Delhi, the power purchase agreements entered into by DESU/DVB/DTL have been reassigned to distribution licensees as per DERC order dated 31.03.2007. Intrastate ABT has also been introduced in Delhi from 01.04.2007. SLDC has started issuing UI bills from covering the period from 01.04.2007 on weekly basis. The Intrastate UI Pool Account is also operated by SLDC as per the DERC order. The details of Main meters used for ABT billing are as under :

### 15.1 For Intrastate (Meters provided by DTL) -As on 31/3/2012

S.no.	Main Metering Points				No. of meters as per beneficiary / utility	Check metering points			No. of meters as per beneficiary / utility	Number of meters
	Discom	220/66/33KV	11/6.6KV	TOTAL		( + )	220/66/33KV	11/6.6KV	TOTAL	
1)	NDPL	53	37	90	70	42	0	42	36	106
2)	BRPL	67	42	109	62	63	11	74	48	110
3)	BYPL	60	22	82	50	57	1	58	46	96
4)	NDMC	26	6	32	30	26	4	30	30	60
5)	MES	7	8	15	14	7	7	14	14	28
	<b>TOTAL</b>	<b>213</b>	<b>115</b>	<b>328</b>	<b>226</b>	<b>195</b>	<b>23</b>	<b>218</b>	<b>174</b>	<b>400</b>
	<b>GRAND TOTAL</b>			<b>546</b>	<b>400</b>					

### 15.2 For Generating Stations (Meters provided by DTL)

Sr. No.	Station	Metering points (feeders)	Main		check
			Nos. of meters as per beneficiary utility		Nos. of meters as per beneficiary utility
01	IP Station	27	3		3
02	RPH	12	2		2
03	G.T.	8	2		2
04	Pragati	3	3		--
05	BTPS	11	6		6
	<b>TOTAL</b>	<b>61</b>	<b>16</b>		<b>13</b>

- a) No. of Meters involved for Intrastate ABT billing with DISCOMs = 226(M)+174(C)+26(Local TX.)
- b) No of Meters involved for UI billing of Genco = 16(M)+13 (C)
- c) Overall meters dealt by DTL = 455

### 15.3 For Interstate (Meters provided by NRLDC)

S. N.	Details	Main	Stand by / check
01	Nos. of meters to compute input from the Grid to DTL system	29	19
	Total		48

## 15.4 The details of the UI Transactions for 2011-12 at Intrastate Level are as under :

### 15.4.1 UI Transactions of TPDDL

Month	Schedule d drawal in MUs	Actual drawal in MUs in MUs	UI Energy in MUs	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amount in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	713.335	580.455	-132.880	-3814.263	-4268.075	344.614	3.724	-3919.737	294.98
May-11	815.208	718.358	-96.850	-2109.851	-2267.272	65.999	0.901	-2200.372	227.19
Jun-11	800.772	732.661	-68.110	-1475.414	-1598.151	64.412	10.273	-1523.465	223.68
Jul-11	844.232	766.906	-77.327	-2136.604	-2277.210	123.926	8.399	-2144.885	277.38
Aug-11	799.603	740.325	-59.278	-1441.869	-1567.205	56.107	10.904	-1500.194	253.08
Sep-11	737.451	701.488	-35.962	-1205.972	-1312.271	119.303	7.827	-1185.141	329.55
Oct-11	641.016	580.551	-60.465	-1808.147	-1840.042	171.648	248.044	-1420.351	234.90
Nov-11	510.825	480.641	-30.184	-818.198	-810.566	98.599	57.970	-653.997	216.67
Dec-11	598.042	519.685	-78.356	-2485.456	-2737.604	282.299	16.007	-2439.298	311.31
Jan-12	666.391	528.610	-137.781	-3652.895	-3911.720	315.415	1.121	-3595.184	260.93
Feb-12	644.407	486.112	-158.295	-4362.204	-4505.279	171.573	0.000	-4333.707	273.77
Mar-12	727.722	497.816	-229.907	-6147.739	-6399.829	208.885	0.000	-6190.944	269.28
<b>Total</b>	8499.004	7333.609	-1165.396	-31458.613	-33495.223	2022.778	365.171	- 31107.274	266.92

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason.

#### 15.4.2 UI Transactions of BRPL

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amount in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	886.038	856.458	-29.580	-898.834	-1080.978	62.402	23.203	-995.372	336.50
May-11	1184.199	1129.355	-54.844	-1289.521	-1385.532	31.990	18.308	-1335.234	243.46
Jun-11	1168.239	1148.880	-19.360	-677.702	-820.824	76.091	39.158	-705.575	364.46
Jul-11	1272.261	1181.804	-90.456	-2747.438	-2944.485	213.588	8.769	-2722.128	300.93
Aug-11	1165.828	1140.522	-25.306	-701.222	-803.044	46.391	29.903	-726.750	287.18
Sep-11	1044.662	1051.681	7.019	-261.472	-297.906	67.570	28.125	-202.211	-288.11
Oct-11	838.152	845.327	7.175	962.771	1243.755	11.745	611.775	1867.275	2602.58
Nov-11	696.983	677.060	-19.923	-561.071	-486.648	42.909	63.805	-379.934	190.70
Dec-11	716.416	732.244	15.827	722.631	708.458	15.404	83.676	807.539	510.21
Jan-12	750.053	792.117	42.064	1210.655	1256.132	2.728	33.597	1292.457	307.26
Feb-12	634.056	678.528	44.472	1373.977	1369.797	0.937	15.648	1386.381	311.74
Mar-12	666.493	695.659	29.166	882.177	852.090	7.773	5.901	865.764	296.84
<b>Total</b>	11023.380	10929.634	-93.747	-1985.049	-2389.183	579.528	961.867	-847.788	90.43

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.3 UI Transactions of BYPL

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Addition al UI Amount in Rs. Lacs	Differen ce in UI Capp Amount in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	559.638	493.678	-65.960	-1907.905	-2095.670	138.004	6.340	-1951.326	295.83
May-11	709.189	639.798	-69.392	-1584.597	-1708.482	58.639	3.232	-1646.612	237.29
Jun-11	733.516	650.079	-83.437	-2055.338	-2349.746	220.383	0.690	-2128.672	255.12
Jul-11	737.852	669.945	-67.908	-1935.382	-2054.575	110.308	1.204	-1943.063	286.13
Aug-11	704.699	652.153	-52.546	-1439.891	-1553.332	52.353	1.710	-1499.269	285.33
Sep-11	630.941	603.599	-27.342	-704.867	-789.135	118.071	18.978	-652.086	238.49
Oct-11	561.388	504.689	-56.699	-2267.883	-2334.367	229.771	18.727	-2085.869	367.88
Nov-11	456.777	387.247	-69.531	-2606.291	-2658.590	224.515	0.936	-2433.139	349.94
Dec-11	425.595	402.645	-22.949	-569.714	-628.543	74.633	68.973	-484.938	211.31
Jan-12	476.058	429.752	-46.306	-1248.050	-1284.165	58.813	14.737	-1210.615	261.44
Feb-12	470.148	382.841	-87.307	-2434.222	-2496.457	71.187	0.334	-2424.936	277.75
Mar-12	472.974	396.336	-76.638	-2071.318	-2138.018	52.812	0.446	-2084.759	272.03
<b>Total</b>	<b>6938.776</b>	<b>6212.762</b>	<b>-726.015</b>	<b>-20825.457</b>	<b>-22091.080</b>	<b>1409.488</b>	<b>136.307</b>	<b>20545.285</b>	<b>282.99</b>

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.4 UI Transactions of NDMC

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equivate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Addition al UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	137.621	103.817	-33.804	-947.041	-1080.740	89.660	3.987	-987.092	292.01
May-11	158.535	139.789	-18.747	-384.734	-428.923	16.589	2.870	-409.464	218.42
Jun-11	139.828	146.586	6.757	250.200	185.143	3.559	13.723	202.424	299.57
Jul-11	149.940	151.178	1.238	112.809	62.113	12.792	14.160	89.066	719.54
Aug-11	142.132	144.039	1.907	115.870	17.364	10.483	6.082	33.929	177.93
Sep-11	150.177	140.339	-9.838	-375.437	-492.431	127.187	5.780	-359.464	365.38
Oct-11	156.362	113.147	-43.216	-1596.065	-1837.641	386.876	28.954	-1421.812	329.00
Nov-11	129.905	90.358	-39.547	-1449.209	-1581.909	211.986	0.010	-1369.912	346.40
Dec-11	140.253	94.178	-46.074	-1662.230	-1999.876	350.997	0.919	-1647.961	357.67
Jan-12	151.680	104.358	-47.321	-1350.930	-1444.773	111.809	0.995	-1331.969	281.47
Feb-12	136.476	93.179	-43.297	-1276.666	-1338.182	62.538	0.000	-1275.644	294.63
Mar-12	140.426	90.288	-50.138	-1365.443	-1417.058	44.998	0.000	-1372.059	273.66
<b>Total</b>	1733.336	1411.256	-322.080	-9928.876	-11356.913	1429.475	77.480	-9849.959	305.82

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.5 UI Transactions of MES

Month	Schedule d drawal in MUs	Actual drawal in MUs in MUs	UI Energy in MUs	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equivate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	26.947	15.687	-11.260	-331.192	-383.178	39.347	0.000	-343.832	305.36
May-11	25.417	19.876	-5.542	-115.378	-126.133	5.290	0.000	-120.842	218.06
Jun-11	21.304	20.338	-0.966	1.570	-4.061	0.536	1.345	-2.181	22.58
Jul-11	22.627	21.385	-1.242	-18.281	-27.365	2.396	1.948	-23.021	185.38
Aug-11	22.889	20.614	-2.276	-41.776	-50.754	2.789	0.696	-47.268	207.73
Sep-11	23.507	19.481	-4.026	-119.348	-146.336	30.490	0.683	-115.164	286.06
Oct-11	20.277	15.361	-4.916	-212.809	-257.649	76.304	0.302	-181.043	368.25
Nov-11	20.324	13.652	-6.672	-239.346	-257.500	35.139	0.166	-222.194	333.02
Dec-11	24.236	19.251	-4.985	-161.490	-181.796	24.773	0.777	-156.245	313.40
Jan-12	29.723	24.256	-5.467	-116.310	-119.970	5.562	0.703	-113.705	207.98
Feb-12	27.076	18.119	-8.957	-234.078	-236.819	5.904	0.046	-230.869	257.75
Mar-12	27.839	14.631	-13.208	-356.091	-370.270	12.200	0.000	-358.070	271.10
<b>Total</b>	<b>292.166</b>	<b>222.649</b>	<b>-69.517</b>	<b>-1944.530</b>	<b>-2161.830</b>	<b>240.728</b>	<b>6.666</b>	<b>-1914.436</b>	<b>275.39</b>

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.6 UI Transactions of IP

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equivate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Addition al UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	0.720	0.310	-0.410	-11.643	-13.575	1.441	0.000	-12.133	296.24
May-11	0.744	0.326	-0.418	-10.018	-11.390	0.914	0.000	-10.476	250.36
Jun-11	0.720	0.309	-0.411	-9.600	-11.358	1.124	0.000	-10.235	248.92
Jul-11	0.744	0.324	-0.420	-11.467	-13.075	1.274	0.000	-11.802	280.88
Aug-11	0.744	0.323	-0.421	-10.980	-12.744	1.050	0.000	-11.694	277.56
Sep-11	0.720	0.314	-0.406	-10.701	-13.085	2.153	0.000	-10.933	268.96
Oct-11	0.744	0.323	-0.421	-15.552	-18.746	4.970	0.000	-13.776	326.97
Nov-11	0.720	0.312	-0.408	-14.408	-16.542	3.030	0.000	-13.512	331.58
Dec-11	0.744	0.323	-0.421	-15.176	-19.587	4.371	0.000	-15.216	361.71
Jan-12	0.744	0.323	-0.421	-11.609	-12.679	1.279	0.000	-11.400	271.07
Feb-12	0.696	0.302	-0.394	-11.049	-11.648	0.604	0.000	-11.044	280.52
Mar-12	0.744	0.333	-0.420	-11.197	-11.688	0.403	0.000	-11.285	268.60
<b>Total</b>	8.784	3.822	-4.971	-143.399	-166.118	22.612	0.000	-143.507	288.68

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.7 UI Transactions of RPH

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	76.336	75.045	-1.292	37.157	-51.640	-6.347	0.461	-57.526	445.37
May-11	79.946	78.727	-1.220	26.610	-41.995	-2.328	0.108	-44.216	362.55
Jun-11	72.991	72.446	-0.545	10.249	-10.584	0.057	0.043	-10.484	192.48
Jul-11	19.387	19.799	0.412	-9.735	33.155	1.390	0.067	34.613	839.30
Aug-11	60.712	60.431	-0.281	7.688	1.997	-1.386	0.165	0.777	-27.65
Sep-11	50.912	49.418	-1.494	28.111	11.442	1.357	0.925	13.725	-91.86
Oct-11	66.416	66.835	0.419	-8.212	23.442	4.999	1.188	29.630	707.90
Nov-11	52.545	51.755	-0.790	31.360	125.177	-11.764	0.870	114.283	-1446.77
Dec-11	52.179	52.189	0.010	5.907	32.868	-3.072	0.730	30.527	31771.98
Jan-12	46.717	47.127	0.410	-5.655	25.660	-0.819	0.181	25.021	610.08
Feb-12	63.696	63.043	-0.653	20.884	85.137	-0.673	0.012	84.476	-1294.49
Mar-12	62.912	61.468	-1.588	39.242	7.990	-1.030	0.010	6.970	-43.89
<b>Total</b>	<b>704.749</b>	<b>698.282</b>	<b>-6.611</b>	<b>183.607</b>	<b>242.651</b>	<b>-19.616</b>	<b>4.759</b>	<b>227.795</b>	<b>-344.57</b>

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.8 UI Transactions of GT

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equivate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	85.200	85.999	0.799	-10.825	-32.004	0.000	0.662	-31.343	-392.16
May-11	112.051	113.777	1.726	-30.459	-43.566	0.000	0.401	-43.165	-250.14
Jun-11	104.172	104.722	0.551	-6.056	-8.050	0.000	1.090	-6.960	-126.36
Jul-11	96.251	97.238	0.987	-30.242	-40.651	0.000	0.274	-40.377	-409.22
Aug-11	100.899	102.317	1.418	-35.843	-43.227	0.000	0.246	-42.981	-303.08
Sep-11	82.107	83.052	0.945	-39.111	-40.471	0.000	2.156	-38.315	-405.28
Oct-11	112.997	115.205	2.208	-102.158	-92.956	0.000	1.015	-91.942	-416.42
Nov-11	118.341	120.200	1.860	-83.838	-80.352	0.000	0.439	-79.913	-429.72
Dec-11	135.957	136.714	0.757	-48.634	-19.302	0.000	2.429	-16.873	-222.93
Jan-12	113.724	114.083	0.359	-19.283	-17.674	0.000	0.069	-17.605	-490.88
Feb-12	52.788	54.062	1.275	-37.308	-37.943	0.000	0.001	-37.942	-297.63
Mar-12	60.587	62.156	1.570	-41.377	-41.549	0.000	0.009	-41.539	-264.63
<b>Total</b>	1175.072	1189.526	14.453	-485.134	-497.745	0.000	8.791	-488.954	-338.30

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.9 UI Transactions of PPCL

Month	Schedule d drawal in MUs	Actual drawal in MUs in MUs	UI Energy in MUs	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	201.694	204.903	3.209	-100.121	-103.152	0.000	1.195	-101.957	-317.74
May-11	199.853	202.592	2.740	-76.029	-82.679	0.000	0.006	-82.673	-301.77
Jun-11	178.135	181.472	3.337	-88.175	-90.325	0.000	1.836	-88.489	-265.14
Jul-11	211.056	213.840	2.784	-82.805	-89.607	0.000	0.044	-89.564	-321.76
Aug-11	213.186	215.824	2.638	-70.418	-91.290	0.000	0.026	-91.265	-346.00
Sep-11	210.390	212.176	1.785	-74.936	-75.974	0.000	0.876	-75.097	-420.60
Oct-11	220.418	223.950	3.532	-192.984	-174.780	0.000	0.493	-174.286	-493.45
Nov-11	213.365	215.319	1.954	-96.861	-89.082	0.000	0.124	-88.958	-455.29
Dec-11	221.460	223.276	1.816	-119.993	-122.073	0.000	0.352	-121.721	-670.14
Jan-12	223.017	223.733	0.716	-41.578	-36.723	0.000	0.000	-36.723	-513.21
Feb-12	203.213	204.429	1.216	-37.551	-38.329	0.000	0.000	-38.329	-315.28
Mar-12	216.678	217.887	1.209	-29.601	-30.904	0.000	0.000	-30.904	-255.64
<b>Total</b>	<b>2512.466</b>	<b>2539.401</b>	<b>26.935</b>	<b>-1011.051</b>	<b>-1024.917</b>	<b>0.000</b>	<b>4.951</b>	<b>-1019.966</b>	<b>-378.68</b>

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

#### 15.4.10 UI Transactions of BTPS

Month	Schedule d drawal in Mus	Actual drawal in MUs in Mus	UI Energy in Mus	UI amount as per Intrastate UI account in Rs. Lacs	Adjusted UI Amount to equate the same with Interstate UI Issued by NRPC for the state Delhi as a whole in Rs. Lacs	Additional UI Amount in Rs. Lacs	Difference in UI Capp Amoun t in Rs. Lacs	Net UI Amount in Rs. Lacs	Avg. cost in Ps/ Unit
Apr-11	381.889	391.637	9.748	-334.907	-422.571	69.044	0.388	-353.138	-362.28
May-11	413.807	411.996	-1.811	-67.954	-173.728	26.356	0.069	-147.303	813.48
Jun-11	356.809	356.315	-0.494	-98.526	-173.099	32.812	0.829	-139.458	2820.9
Jul-11	355.729	371.161	15.433	-560.128	-694.812	124.918	0.335	-569.559	-369.06
Aug-11	379.816	387.593	7.777	-334.538	-444.937	66.197	0.509	-378.230	-486.35
Sep-11	348.694	346.038	-2.656	-15.452	-83.565	58.609	3.628	-21.328	80.29
Oct-11	284.166	284.323	0.156	-11.031	-2.331	12.447	10.756	20.872	1334.6
Nov-11	288.617	292.821	4.204	-165.264	-156.393	51.722	0.936	-103.734	-246.78
Dec-11	330.711	333.180	2.469	-102.031	-149.148	44.274	2.731	-102.144	-413.73
Jan-12	406.936	410.825	3.890	-210.550	-236.672	36.429	0.614	-199.628	-513.23
Feb-12	365.071	371.595	6.523	-258.202	-295.767	31.693	0.489	-263.585	-404.06
Mar-12	387.083	401.383	14.300	-488.484	-530.220	36.875	0.020	-493.325	-344.97
<b>Total</b>	4299.328	4358.866	59.538	-2647.068	-3363.242	591.376	21.305	-2750.561	-461.98

**Note :**

- i) (-)ve indicates amount receivable by the Utility
- ii) (+)ve indicates amount payable by the Utility.
- iii) The above UI accounts are subject to change if UI accounts are revised by NRPC due to any reason

## **16 CAPACITOR REQUIREMENT IN DELHI**

### **16.1 CAPACITOR REQUIREMENT AND INSTALLED CAPACITY OF CAPACITORS IN DELHI AS PER NRPC STUDY FOR 2010-11 AND 2011-12**

**(All figures in MVAR)**

<b>Requirement</b>		<b>Installed Capacity</b>		<b>Working Capacity in MVAR</b>	
2010-11	2011-12	2010-11	2011-12	2010-11	2011-12
4043	4227	3697	3657*	3424	3473

**[The above does not include LT Capacitors]**

- \* Installed Capacity of capacitor banks in 2011-12 is reduced to 3657MVAR as compared to 3697MVAR during 2010-11 as Tata Power Delhi Distribution Ltd has corrected the capacity of 7.2MVAR capacitors banks to 5.4MVAR of 11kV Banks at 11kV voltage level.

**16.2 DETAILS OF THE CAPACITORS INSTALLED IN DELHI SYSTEM  
LUMPED TO  
THE NEAREST 220KV GRID SUB-STATIONS AS ON 31.03.2012 IS AS UNDER :-**

Sl. No.	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66kV	33kV	11kV	TOTAL
1	<b>IP YARD</b>		30		<b>30</b>
1	Kamla Market			16.35	<b>16.35</b>
2	Minto Road				
3	GB Pant Hosp			15.88	<b>15.88</b>
4	Delhi Gate			10.9	<b>10.9</b>
5	Tilakmarg			5.04	<b>5.04</b>
6	Electric Lane			5.04	<b>5.04</b>
7	Cannought Place			10.08	<b>10.08</b>
8	Kilokri		10.08	10.48	<b>20.56</b>
9	NDSE			5.03	<b>5.03</b>
10	AIIMS		10	5.04	<b>15.04</b>
11	Nizamuddin				
12	Exhibition-I		10		<b>10</b>
13	Exhibition-II				
14	Defence Colony				
15	IG Stadium		10.08	5.45	<b>15.53</b>
16	Lajpat Nagar				
17	IP Estate			10.9	<b>10.9</b>
	Total				<b>170.4</b>
2	<b>IP Extn.</b>				
1	School Lane			5.04	<b>5.04</b>
2	Scindia House			5.04	<b>5.04</b>
3	Vidyut Bhawan			10.08	<b>10.08</b>
4	Nirman Bhawan			5.04	<b>5.04</b>
5	Dalhousie Road			5.04	<b>5.04</b>
	Total				<b>30.24</b>
3	<b>RPH Station</b>		20	5.04	<b>25.04</b>
1	Lahori Gate			10.49	<b>10.49</b>
2	Jama Masjid			5.03	<b>5.03</b>
4	Kamla Market				
5	Minto Road			10.9	<b>10.9</b>
6	GB Pant Hosp				
7	IG Stadium				
	Total				<b>51.46</b>
4	<b>Parkstreet S/stn</b>	20	20		<b>40</b>
1	Shastri Park		10.896	5.45	<b>16.35</b>
2	Faiz Road			10.9	<b>10.9</b>
3	Motia Khan			16.3	<b>16.3</b>
4	Prasad Nagar			16.25	<b>16.25</b>
5	Anand Parbat			10.8	<b>10.8</b>
6	Shankar Road			5.04	<b>5.04</b>
7	Rama Road			14.4	<b>14.4</b>
8	Baird Road			10.08	<b>10.08</b>
9	Hanuman Road			5.04	<b>5.04</b>
10	Pusa			7.2	<b>7.2</b>
11	Ridge Valley				
12	SJ Airport			5.04	<b>5.04</b>
13	B. D. Marg				

	Total						157.4
--	-------	--	--	--	--	--	-------

Sl. No	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66KV	33kV	11kV	TOTAL
5	<b>Naraina S/stn</b>		20	5.04	<b>25.04</b>
1	DMS			10.85	<b>10.85</b>
2	Mayapuri		10.87	5	<b>15.87</b>
3	Inderpuri		13.26	5.04	<b>18.3</b>
4	Rewari line			7.2	<b>7.2</b>
5	Khyber Lane			5.04	<b>5.04</b>
6	Kirbi Place	10		5.97	<b>15.97</b>
7	Payal			14.4	<b>14.4</b>
	Total				<b>112.7</b>
6	<b>Mehrauli S/stn</b>	80		5.04	<b>85.04</b>
1	Adchini			15.12	<b>15.12</b>
2	Andheria Bagh			10.85	<b>10.85</b>
3	IIT			10.9	<b>10.9</b>
4	JNU		10.03	10.08	<b>20.11</b>
5	Bijwasan			10.08	<b>10.08</b>
6	DC Saket		10.08	4.54	<b>14.62</b>
7	Malviya Nagar				
8	C Dot			5.4	<b>5.4</b>
9	Vasant kunj B-Blk	21.79		10.9	<b>32.69</b>
10	Vasant kunj C-Blk	20.16		10.49	<b>30.65</b>
11	Palam				
12	IGNOU				
13	R. K. Puram-I			10.08	<b>10.08</b>
14	Vasant Vihar			15.12	<b>15.12</b>
15	Pusp Vihar			9.6	<b>9.6</b>
16	Bhikaji Cama Place		10	10.08	<b>20.08</b>
	Total				<b>290.3</b>
7	<b>Vasantkunj S/stn</b>	40		5.04	<b>45.04</b>
1	R. K. Puram-II			7.2	<b>7.2</b>
2	Vasant kunj C-Blk				
3	Vasant kunj D-Blk	20.16		10.25	<b>30.41</b>
4	Race Course			5.04	<b>5.04</b>
5	Bapu Dham			10.08	<b>10.08</b>
6	Nehru Park			10	<b>10</b>
7	Ridge Valley				
	Total				<b>107.8</b>
8	<b>Okhla S/stn</b>	60	10	5.04	<b>75.04</b>
1	Balaji			7.2	<b>7.2</b>
2	East of Kailash			10	<b>10</b>
3	Alaknanda			16.25	<b>16.25</b>
4	Malviya Nagar	21.79	20.16	10.49	<b>52.44</b>
5	Masjid Moth			15.94	<b>15.94</b>
6	Nehru Place			21.35	<b>21.35</b>
7	Okhla Ph-I	21.79		10.9	<b>32.69</b>
8	Okhla Ph-II		20.93	15.53	<b>36.46</b>
9	Shivalik			10.9	<b>10.9</b>
10	Batra			15.8	<b>15.8</b>
11	VSNL			10.8	<b>10.8</b>
12	Siri Fort			10.49	<b>10.49</b>
13	Tuglakabad			10.8	<b>10.8</b>
	Total				<b>326.2</b>

Sl. No	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66kV	33kV	11kV	TOTAL
<b>9</b>	<b>Lodhi Road S/stn</b>		20		<b>20</b>
1	Defence Colony			10.9	<b>10.9</b>
2	Hudco			10.9	<b>10.9</b>
4	Lajpat Nagar			10.9	<b>10.9</b>
5	Nizamuddin			10.49	<b>10.49</b>
6	Vidyut Bhawan				
7	Kidwai Nagar			5.04	<b>5.04</b>
8	Ex. Gr. II				
9	IHC				
	Total				<b>68.23</b>
<b>10</b>	<b>Sarita Vihar S/stn</b>	20		5.04	<b>25.04</b>
1	Sarita Vihar			10.08	<b>10.08</b>
2	MCIE			10.06	<b>10.06</b>
3	Mathura Road	20.16		10.08	<b>30.24</b>
4	Jamia Millia			5.4	<b>5.4</b>
5	Sarai Julena		10.08	10.9	<b>20.98</b>
	Total				<b>101.8</b>
<b>11</b>	<b>South of Wazirabad</b>				
1	Bhagirathi		10.03	10.9	<b>20.93</b>
2	Ghonda	21.79	22.56	15.94	<b>60.29</b>
3	Seelam Pur		10.08	21.39	<b>31.47</b>
4	Dwarkapuri			15.46	<b>15.46</b>
5	Nandnagri	20.16		16.35	<b>36.51</b>
6	Yamuna Vihar			10.8	<b>10.8</b>
7	East of Loni Road			10.8	<b>10.8</b>
8	Shastri Park			10.9	<b>10.9</b>
9	Karawal Nagar			5.4	<b>5.4</b>
	Total				<b>202.6</b>
<b>12</b>	<b>Geeta Colony</b>				
1	Geeta Colony			10.49	<b>10.49</b>
2	Kanti Nagar			10.9	<b>10.9</b>
3	Kailash Nagar			15.48	<b>15.48</b>
4	Seelam Pur				
5	Shakar Pur				
	Total				<b>36.87</b>
<b>13</b>	<b>Gazipur S/stn</b>	40		5.04	<b>45.04</b>
1	Dallupura	21.79		10.9	<b>32.69</b>
2	Vivek Vihar			10.57	<b>10.57</b>
3	GT Road			10.85	<b>10.85</b>
4	Kondli	20.16		10.85	<b>31.01</b>
5	MVR-I			10.9	<b>10.9</b>
6	MVR-II	20.16		10.9	<b>31.06</b>
7	PPG Ind. Area			10.06	<b>10.06</b>
	Total				<b>182.2</b>
<b>14</b>	<b>Patparganj S/stn</b>	40	20	5.04	<b>65.04</b>
1	GH-I	19.89		10.45	<b>30.34</b>
2	GH-II	20.09		10.9	<b>30.99</b>
3	CBD		10.03	15.48	<b>25.51</b>
4	Guru Angad Nagar			15.49	<b>15.49</b>
5	Karkadooma		10.08	10.44	<b>20.52</b>
6	Preet Vihar			10.07	<b>10.07</b>

Sl. No	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66kV	33kV	11kV	TOTAL
7	CBD-II			7.2	7.2
8	Shakarpur			5.4	5.4
9	Jhilmil			9	9
10	Dilshad Garden	20.16		16.35	36.51
11	Khichripur	21.79		10.49	32.28
12	Mother Dairy				
13	Scope Building				
14	Vivek Vihar				
15	Akhardham			14.4	14.4
	Total				302.8
<b>15</b>	<b>Najafgarh S/stn</b>	60		5.04	<b>65.04</b>
1	A4 Paschim Vihar			10.9	10.9
2	Nangloi	21.73		15.85	37.58
3	Nangloi W/W	20.89		5.45	26.34
4	Pankha Road			15.69	15.69
5	Jaffarpur			15.49	15.49
7	Inst. Area Janakpuri			15.9	15.9
8	Paschimpuri		10.05	15.53	25.58
9	Paschim Vihar	41.83		15.44	57.27
10	Mukherjee Park			15.49	15.49
11	Udyog Nagar			10.04	10.04
12	Choukhandi			10.08	10.08
	Total				305.4
<b>16</b>	<b>Pappankalan-I S/stn</b>	20		5.04	<b>25.04</b>
1	Bindapur	21.73		15.9	37.63
2	Bodella-I	20.1		15.9	36
3	Bodella-II	21.73		14.53	36.26
4	DC Janakpuri			10.04	10.04
5	G-2 PPK			10.9	10.9
6	G-5 PPK			15.53	15.53
7	G-6 PPK			5.45	5.45
8	G-15 PPK			10.08	10.08
9	Harinagar	21.18		10.49	31.67
	Total				218.6
<b>17</b>	<b>BBMB Rohtak Road</b>				
1	S.B. Mill			10.08	10.08
2	GTK Road				0
3	Ram Pura			12.24	12.24
4	Rohtak Road			10.08	10.08
5	Vishal			5.4	5.4
6	Madipur			10.43	10.43
7	Sudershan Park			10.08	10.08
	Total				58.31
<b>18</b>	<b>Shalimarbagh S/stn</b>		40	6	<b>46</b>
1	S.G.T. Nagar			13.15	13.15
2	Wazirpur-1			20.7	20.7
3	Wazirpur-2			14.4	14.4
4	Shalimarbagh				
5	Ashok Vihar			20.35	20.35
6	Rani Bagh			14.4	14.4

Sl. No	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66KV	33kV	11kV	TOTAL
7	Haiderpur			13.15	<b>13.15</b>
8	SMB FC			7.2	<b>7.2</b>
9	SMB KHOSLA			7.2	<b>7.2</b>
	Total				<b>156.6</b>
<b>19</b>	<b>Subzimandi S/stn</b>			6	<b>6</b>
1	Shakti Nagar			5.04	<b>5.04</b>
2	Gulabibagh			7.2	<b>7.2</b>
3	Shahzadabagh			19.44	<b>19.44</b>
4	Tripolia			14.4	<b>14.4</b>
5	B. G. Road				
	Total				<b>52.08</b>
<b>20</b>	<b>Narela S/stn</b>	40		5.04	<b>45.04</b>
1	A-7 Narela			14.4	<b>14.4</b>
2	AIR Kham pur			13.15	<b>13.15</b>
3	Badli	20		5.95	<b>25.95</b>
4	DSIDC Narela	20		5.95	<b>25.95</b>
5	DSIDC Narela-2			14.4	<b>14.4</b>
6	Jahangirpuri	20	20	5.95	<b>45.95</b>
	Total				<b>184.8</b>
<b>21</b>	<b>Gopalpur S/stn</b>		30	5.04	<b>35.04</b>
1	Azad Pur			21.6	<b>21.6</b>
2	Hudson Lane			5.95	<b>5.95</b>
3	Wazirabad			7.2	<b>7.2</b>
4	Indra Vihar			5.95	<b>5.95</b>
5	Tri Nagar			14.4	<b>14.4</b>
6	GTK Road			13.15	<b>13.15</b>
7	Jahangirpuri				<b>0</b>
8	Civil lines			6	<b>6</b>
9	DIFR			7.2	<b>7.2</b>
10	Delhi Univ.			7.2	<b>7.2</b>
11	Tiggipur			14.4	<b>14.4</b>
	Total				<b>138.1</b>
<b>22</b>	<b>Rohini S/stn</b>	40		6	<b>46</b>
1	Rohini Sec-24 Ckt-I			14.4	<b>14.4</b>
2	Rohini Sec-24 Ckt-II	20		14.4	<b>34.4</b>
3	Rohini-1			7.2	<b>7.2</b>
4	Rohini-2			13.15	<b>13.15</b>
5	Rohini-3			5.95	<b>5.95</b>
6	Rohini-4			13.15	<b>13.15</b>
7	Rohini-5			13.15	<b>13.15</b>
8	Rohini-6	20		5.95	<b>25.95</b>
9	Mangolpuri-1			20.35	<b>20.35</b>
10	Mangolpuri-2	20		5.04	<b>25.04</b>
11	Saraswati Garden			10.08	<b>10.08</b>
12	Pitam Pura-1	20		12.24	<b>32.24</b>
13	Pitam Pura-2			12.24	<b>12.24</b>
14	Pitam Pura-3			7.2	<b>7.2</b>
15	Rohini DC-1			14.4	<b>14.4</b>
	Total				<b>294.9</b>

Sl. No	SUB-STATION	INSTALLED CAPACITY IN MVAR			
		66kV	33kV	11kV	TOTAL
<b>23</b>	<b>Kanjhwala S/stn</b>	20		5.04	<b>25.04</b>
1	Bawana Clear Water			14.4	<b>14.4</b>
2	Pooth Khoord			7.2	<b>7.2</b>
3	Ghevra			14.4	<b>14.4</b>
	Total				<b>61.04</b>
<b>24</b>	<b>BAWANA S/stn</b>				
1	Bawana S/stn No. 6				<b>0</b>
2	Bawana S/stn No. 7				<b>0</b>
	Total				<b>0</b>
<b>25</b>	<b>Kashmeregate S/stn</b>			5.04	<b>5.04</b>
1	Civil lines			6	<b>6</b>
2	Town Hall			8.64	<b>8.64</b>
3	Fountain			5.45	<b>5.45</b>
	Total				<b>25.13</b>
<b>26</b>	<b>Pappankalan-II</b>				
1	DMRC-I				
2	DMRC-II				
	Total				
	<b>TOTAL CAPACITY</b>				<b>3636</b>

**17. TRANSMISSION SYSTEM AVAILABILITY OF DELHI TRANSCO LTD. FOR THE YEAR 2011-12**

<b>SI. No.</b>	<b>Name of Elements</b>	<b>Availability in %age</b>
1	AVAILABILITY OF 11NOS. 400kV, 315MVA ICTs	98.21%
2	AVAILABILITY OF 8NOS. 400kV LINES	99.78%
3	AVAILABILITY OF 73NOS. 220kV LINES	99.03%
4	AVAILABILITY OF 49NOS. 220/66kV ICTs	94.31%
5	AVAILABILITY OF 33NOS. 220/33kV ICTs	94.80%
6	AVAILABILITY OF 3NOS. 66/33kV ICTs	99.13%
7	AVAILABILITY OF 23NOS. 66/11kV PR. TXS	99.73%
8	AVAILABILITY OF 16NOS. 33/11kV PR. TXS	95.41%
9	AVAILABILITY OF 116NOS. 66kV FEEDER BAYs	99.90%
10	AVAILABILITY OF 123NOS. 33kV FEEDER BAYs	99.84%
11	AVAILABILITY OF 204NOS. 11kV FEEDER BAYs	100.00%
12	AVAILABILITY OF 59NOS. CAP. BANKS	91.46%
<b>TOTAL AVAILABILITY OF DTL SYSTEM =</b>		<b>98.38%</b>

$$(98.21*11+99.78*8+99.03*73+94.31*49+94.80*33+99.13*3+99.73*23 +95.41*16 +99.90*116+99.84*123+100*204+91.46*59)$$

$$(9+8+73+49+33+3+23+16+116+123+204+59)$$

=98.38%

## 18. NEW ELEMENTS COMMISSIONED IN TRANSMISSION SYSTEM

The following elements added in the Transmission System of Delhi during the year 2011-12

Sr No.	Name of the Element	Date of Commissioning
<b>400kV SYSTEM</b>		
1	400/220, 315 MVA ICT-IV AT 400kV MUNDKA	12.05.2011 AT 17:57HRS.
2	400/220, 315 MVA ICT-VI AT 400kV BAWANA CCGT YARD	15.11.2011 AT 16:40HRS.
3	400/220, 315 MVA ICT-V AT 400kV BAWANA CCGT YARD	20.11.2011 AT 15:38HRS.
<b>220kV SYSTEM</b>		
4	220/33, 100 MVA TX-I at 220kV MASJID MOTH	23.05.2011 AT 16:31HRS.
5	220/33, 100 MVA TX-II at 220kV MASJID MOTH	23.05.2011 AT 16:42HRS.
6	220kV MAHARANIBAGH -TRAUMA CENTER CKT-II (CABLE)	29.06.2011 AT 16:42Hrs.
7	220kV MAHARANIBAGH-TRAUMA CENTER CKT-I (CABLE)	01.07.2011 AT 16:42Hrs.
8	220kV MAHARANIBAGH-MASJID MOTH CKT-I	24.11.2011 AT 14:10HRS.
9	220kV MAHARANIBAGH-MASJID MOTH CKT-II	23.05.2011 AT 16:10HRS.
10	220/66KV 160 MVA TX-III AT 400kV MUNDKA	18.07.2011 at 18:02Hrs.
11	220/33, 100 MVA TX-II at 220kV TRAUMA CENTER	09.07.2011 AT 20:30HRS
12	220/33, 100 MVA TX-I at 220kV TRAUMA CENTER	11.07.2011 AT 15:15HRS.
<b>66kV SYSTEM</b>		
13	66kV DSIDC-2 NARELA CKT-I AT 220kV DSIDC BAWANA S/STN	09.07.2011 AT 17:05HRS.
14	66kV DSIDC-2 NARELA CKT-II AT 220kV DSIDC BAWANA S/STN	09.07.2011 AT 17:05HRS.
15	66KV MEHRAULI - DMRC CKT AT 220KV MEHRAULI	60.05.2010 AT 15:13HRS.
16	66kV NANGLOI CKT AT 400kV MUNDKA S/STN	01.08.2011 AT 16:35HRS.
17	66kV NANGLOI W/W CKT AT 400kV MUNDKA S/STN	02.08.2011 AT 17:40HRS.
18	66kV DMRC CKT AT 400kV MUNDKA S/STN	18.08.2011 AT 17:23HRS.
19	66KV GHEVRA SHAVDA CKT AT 400kV MUNDKA S/STN	30.01.2012 AT 16:25HRS.
20	66KV MANGOLPURI CKT AT 400kV MUNDKA S/STN	18.02.2012 AT 13:04HRS.
21	66kV SONIA VIHAR CKT-I AT 220kV WAZIRABAD	23.03.2012 AT 16:13HRS.
22	66kV SONIA VIHAR CKT-II AT 220kV WAZIRABAD	23.03.2012 AT 16:15HRS.
<b>33kV SYSTEM</b>		
23	33kV PUSP VIHAR CKT AT 220kV MASJID MOTH	09.06.2011 AT 15:07HRS.
24	33kV COURTCOMPLEX NO-II CKT AT 220kV MASJID MOTH	28.06.2011 AT 16:00HRS
25	33kV VSNL CKT AT 220kV MASJID MOTH	11.06.2011 AT 14:16HRS

## 19 TRIPPINGS / BREAK-DOWNS IN 400/220KV SYSTEM FOR THE YEAR 2011-12

### 19.1 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH APRIL 2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.04.11	17.07	220/33KV 100MVA PR. TR.-I AT IP	01.04.11	17.18	TR. TRIPPED WITHOUT INDICATION
02	01.04.11	18.38	220KV PATPARGANJ – GEETA COLONY CKT-I	01.04.11	18.48	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT PATPARGANJ AND ON DIST PROT 'ABC' PHASE ZONE-I AT GEETA COLONY
03	01.04.11	21.14	220KV SARITA VIHAR – MAHARANI BAGH CKT.	01.04.11	22.21	CKT. TRIPPED ON DIST PROT ZONE-I AT MAHARANI BAGH AND ON DIST PROT 'A' PHASE ZONE-I, 186A, 52X, 86B, 186X AT SARITA VIHAR,
04	04.04.11	11.52	220KV NAJAFGARH – KANJHAWALA CKT	05.04.11	17.02	CKT. TRIPPED ON DIST PROT 'RYB' PHASE AT NAJAFGARH AND ON 186, ABC PHASE AT NAJAFGARH.
05	04.04.11	11.52	220KV BAWANA – KANJHAWALA CKT.	04.04.11	12.07	CKT. TRIPPED ON DIST PROT 'RYB' PHASE AT BAWANA. NO TRIPPING AT KANJHAWALA.
06	05.04.11	15.18	220/33KV 100MVA PR. TR.-I AT IP	05.04.11	15.32	TR. TRIPPED ON DIFFERENTIAL ALONG WITH ITS 33KV IC-I WHICH TRIPPED WITHOUT INDICATION.
07	06.04.11	17.02	220KV NARELA – ROHTAK ROAD CKT-II	07.04.11	01.02	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA.
08	06.04.11	19.59	400KV BAWANA – MUNDKA CKT-I	07.04.11	20.27	CB-152 TRIPPED ON 186A, 185B, 80B1 AND CB-252 CKT. TRIPPED ON 186A, 186B AT BAWANA.
09	07.04.11	02.11	400KV BAWANA – MUNDKA CKT-I	07.04.11	02.36	CKT. TRIPPED ON 186AB ON BOTH BREAKERS, 30C-I, & II. NO TRIPPING AT MUNDKA.
10	07.04.11	06.14	400KV BAWANA – MUNDKA CKT-I	07.04.11	06.31	CKT. TRIPPED ON 186A&B, 30CH-2 AT BAWANA. NO TRIPPING AT MUNDKA.
11	07.04.11	09.42	400KV BAWANA – MUNDKA CKT-I	07.04.11	19.45	CKT. TRIPPED ON 186, 30CH-2 AT BAWANA
12	08.04.11	16.54	220/33KV 100MVA PR. TR.-I AT IP	08.04.11	17.46	TR. TRIPPED ON KBCH
13	08.04.11	23.23	220/33KV 100MVA PR. TR.-I AT IP	08.04.11	23.50	TR. TRIPPED ON KBCH ALONG WITH 33KV IC-I WHICH TRIPPED ON LOCK OUT RELAY.
14	10.04.11	09.43	400KV BAWANA – MUNDKA CKT-I	10.04.11	10.05	CB-42052 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA.
15	11.04.11	11.23	220KV SARITA VIHAR – MAHARANI BAGH CKT	11.04.11	11.45	CKT.T RIPPED ON DIST PROT 'RYB' PHASE AT MAHARANI BAGH.
16	11.04.11	11.23	220/66KV 100MVA PR. TR.-I & II AT PRAGATI	11.04.11	11.59	BOTH TRANSFORMERS TRIPPED ON 86.
17	13.04.11	04.15	220KV BAWANA – SHALIMAR BAGH CKT-I	13.04.11	04.47	CKT. TRIPPED ON DIST PROT 'B' PHASE, 195AC, 195BC, 195CC, TRIP CKT SUPERVISION AT BAWANA. NO TRIPPING AT SHALIMAR BAGH.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
18	13.04.11	04.15	220KV BAWANA – NAJAFGARH CKT	13.04.11	04.30	CKT. TRIPPED ON 186 'B' PH AT NAJAF GARH. NO TRIPPING AT BAWANA.
19	14.04.11	16.04	400/220KV ICT-II AT BAWANA	14.04.11	16.23	ICT TRIPPED ON 86A & B PHASE.
20	14.04.11	17.07	400/220KV 315MVA MVA ICT-II AT BAWANA	14.04.11	17.14	ICT TRIPPED DUE TO BUS BAR PROTECTION AT BAWANA.
21	14.04.11	17.07	220/66KV 100MVA PR. TR.-I AT BAWANA	14.04.11	17.10	TR. TRIPPED WITHOUT INDICATION DUE TO BUS BAR PROT. AT BAWANA.
22	17.04.11	08.00	220/33KV 100MVA PR. TR.-I AT IP	16.04.11	18.20	TR. TRIPPED ON KBCH RELAY ALONG WITH ITS 33KV I/C-I WHICH TRIPPED WITOUT INDICATION.
23	17.04.11	08.07	400KV BAWANA – MUNDKA CKT-I	17.04.11	11.51	CB-42052 TRIPPED ON POLE DISCREPANCY AT MUNDKA.. NO TRIPPING AT BAWANA.
24	17.04.11	17.35	220KV SARITA VIHAR – MAHARANI BAGH CKT.	17.04.11	17.53	CKT. TRIPPED ON DIST PROT 'A' PHASE ZONE-I AND ON DIST PROT 'R' PHASE, ZONE-I AT MAHARANI BAGH.
25	18.04.11	16.52	220/66KV 100MVA PR. TR -I AT PAPPANKALAN-II	18.04.11	17.10	TR. TRIPPED ON LBB PROT. ALOING WITH ITS 66KV I/C-I WHICH TRIPPED ON IMT E/F, LBB PROTECTION, 86.
26	19.04.11	17.02	220KV BTPS – MEHRAULI CKT-I	19.04.11	17.17	CKT. TRIPPED ON 'C' PHASE E/F AT BTPS AND ON DIST PROT 'C' PHASE ZONE-I, 186 AT MEHRAULI.
27	20.04.11	15.27	220KV MANDOLA – WAZIRABAD CKT-III	20.04.11	15.45	CKT. TRIPPED ON DIST PROT 'RYB' PHASE AT MANDOLA. NO TRIPPING AT WAZIRABAD.
28	20.04.11	15.27	220/66KV 100MVA PR. TR-III AT WAZIRABAD	20.04.11	16.15	TR. TRIPPED ON E/F ALONG WITH ITS 66KV I/C-I WHICH TRIPPED ON INTER TRIPPING.
29	20.04.11	15.27	220KV WAZIRABAD – GEETA COLONY CKT-I	20.04.11	16.25	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD AND ON DIST PROT 'ABC' PHASE ZONE-II AT GEETA COLONY.
30	22.04.11	01.20	400KV BALLABHGARH – BAMNAULI CKT-I & II	22.04.11	03.08	BOTH CKT. TRIPPED DUE TO FLASH ON 315MVA ICT-IV BUS-I SIDE.AT BAMNAULI. ICT CHARGED THROUGH TIE CB AT BAMNAULI. CKT-I & II CHARGED AT 02.13HRS. AND 02.27HRS RESPECTIVELY.
31	22.04.11	01.20	400KV MUNDKA – BAMNAULI CKT-I & II	22.04.11	08.32	THE FOLLOWING TRIPPINGS OCCURRED : AT MUNDKA : CB-40152-BAMNAULI CKT-I: 286, 86 CB-40252 BAMNAULI CKT-I : AUTO RECLOSE RYB CB-40352 BAMNAULI CKT-II: RYB, 86AB CB-40452 BAMNAULI CKT-II : AUTO RECLOSE RYB CKT-I & II CHARGED AT 02.39HRS. AND 08.32HRS RESPECTIVELY.
32	22.04.11	01.20	220/66KV 100MVA PR. TR.-I & II AT PAPPANKALAN-II	22.04.11	02.22	BOTH TR. TRIPPED ON O/C, E/F, LBB PROTECTION, 86 ALONG WITH 66KV I-C-I & II WHICH TRIPPED ON INTER TRIPPING.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
33	22.04.11	01.20	220KV BAMNAULI – DIAL CKT-I & II	22.04.11	02.15	THE FOLLOWING TRIPPINGS OCCURRED : AT DIAL : 220KV BAMNAULI CKT-I : 86, RED COMMUNICATION FAIL, REL95, REL MAIN PROT TRIP, MAIN RYB 220KV BAMNAULI CKT-II : REL EXT 86, TRIP REL MAIN TRIP, RE COMMUNICATIO FAIL, R PHASE FAULTY, R&C MAIN PROT, RYB TRIP, RYB PHASE AT BAMNAULI 220KV DIAL CKT-I & II : NO TRIPPING CKT-I & II CHARGED AT 02.15HRS.
34	22.04.11	01.20	220KV BAMNAULI – NARAINA CKT-I & II	22.04.11	02.25	THE FOLLOWING TRIPPINGS OCCURRED : AT NARAINA 220KV BAMNAULI CKT-I : E/F, 186 220KV BAMNAULI CKT-II : NO TRIPPING AT BAMNAULI : NO TRIPPING. FLASH OBSERVED IN BUS-I AND 315MVA ICT-IV. 220/33KV 100MVA PR. TR.-I, II & III ALSO TRIPPED AT NARAINA ON 51N, 86. 33KV I/C-II & II TRIPPED ON 86.
35	22.04.11	01.20	220KV NARAINA – RIDGE VALLEY CKT.	22.04.11	03.07	CKT. TRIPPED ON E/F, 86A&B AT RIDGE VALLEY AND ON DIST PROT 186 AT NARAINA. 220/66KV 160MVA PR. TR.-II TRIPPED ON E/F, 86A&B AT RIDGE VALLEY. CKT. CHARGED AT 03.07HRS AND 160MVA PR. TR.-II CHARGED AT 04.06HRS.
35	22.04.11	01.20	220KV BAMNAULI – NAJAFGARH CKT-II	22.04.11	01.35	SUPPLY FAILED FROM BAMNAULI. 220/66KV 100MVA PR. TR-II AND IV TRIPPED AT NAJAFGARH. TR.-II TRIPPED ON WITHOUT INDICATION AND TR-IV TRIPPED ON O/C, E/F TR-II & IV CHARGED T 01.50HRS. AND 02.35HRS. RESPECTIVELY.
36	22.04.11	01.20	220KV BAMNAULI – PAPPANKALAN-I CKT-I & II	22.04.11	02.15	BOTH CKTS. TRIPPED ON E/F, 186A&B, SUPERVISION AT PAPPANKALAN-I. NO TRIPPING AT BAMNAULI. 220/66KV 100MVA PR. TR-IV ALSO TRIPPED ON O/C, LBB PROTECTION. TR. CHARGED AT 02.20HRS.
37	22.04.11	13.43	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	22.04.11	13.47	TR. TRIPPED ON 51R, O/C, 86
38	23.04.11	04.30	66/33KV 30MVA PR. TR. AT NARELA	23.04.11	04.58	TR. TRIPPED ON 86
39	24.04.11	11.59	220KV BAMNAULI – NARAINA CKT-I	23.04.11	22.10	CKT.T RIPPED ON DIST PROT 'BC' PHASE, 186A&B AT BAMNAULI. NO TRIPPING AT NARAINA.
40	24.04.11	17.17	220/66KV 100MVA PR. TR.-II AT PAPPANKALAN-II	24.04.11	20.50	TR. TRIPPED ON LBB PROTECTION.
41	24.04.11	19.10	220KV BTPS – SARITA VIHAR CKT-I	25.04.11	20.37	CKT. TRIPPED WITHOUT INDICATION AT BTPS. 'R' PHASE LA DAMAGED AT SARITA VIHAR.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
42	25.04.11	00.52	33/11KV 16MVA PR. TR.-II AT SUBZI MANDI	25.04.11	01.20	TR. TRIPPED ON O/C, 86
43	25.04.11	17.56	220KV PATPARGANJ – GEETA COLONY CKT-II	25.04.11	18.06	CKT. TRIPPED ON DIST PROT ABC' PHASE ZONE-II AT PATPARGANJ AND ON DIST PROT 'ABC' PHASE ZONE-I AT PATPARGANJ.
44	26.04.11	23.08	66/11KV 20MVA PR. TR.-II AT OKHLA	27.04.11	03.15	TR. TRIPPED ON 51AX AND CX, 86 ALONG WITH ITS 11KV I/C WHICH TRIPPED ON 'R&B' PHASE, O/C, 86
45	27.04.11	06.20	400KV BAWANA – BAHADURGARH CKT	27.04.11	06.49	CKT. TRIPPED ON MAIN-I AB TRIP ZONE-I MAIN-II ABC TRIP ZONE-I, 86A, 86A, 186A&B AT BAWANA.
46	28.04.11	13.45	220KV MANDOLA – NARELA CKT-I & II	28.04.11	14.20	BOTH CKTS TRIPPED ON DIST PROT 'B' PHASE ZONE-II, 86RYB AT MANDOLA. NO TRIPPING AT NARELA.

## 19.2 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH MAY –2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.05.11	14.38	220/33KV 100MVA PR. TR. AT IP	01.05.11	15.22	TR. TRIPPED ON KBCH RELAY.
02	02.05.11	04.00	66/11KV 20MVA PR. TR-II AT SARITA VIHAR	02.05.11	11.25	TR. TRIPPED ON BUCHLOZ.
03	02.05.11	10.45	220/33KV 100MVA PR. TR.-I AT IP	02.05.11	10.55	TR. TRIPPED ON KBCH ALONG WITH 33KV I/C-I WHICH TRIPPED WITHOUT INDICATION.
04	02.05.11	12.21	220KV MAHARANI BAGH – PRAGATI CKT.	02.05.11	12.40	CKT. TRIPPED ON DIST PROT 'R' PHASE ZONE-I AT MAHARANI BAGH AND ON DIST PROT ZONE-I AT PRAGATI
05	02.05.11	14.10	220/33KV 100MVA PR. TR.-I AT IP	02.05.11	14.15	TR. TRIPPED O KBCH
06	03.05.11	11.50	220KV BAMNAULI – NARAINA CKT-I	03.05.11	12.10	CKT. TRIPPED ON DIST PROT 'A&C' PHASE, ZONE-III 186&B, 86 AT NARAINA.
07	03.05.11	14.46	220KV MANDOLA – NARELA CKT-I & II	03.05.11	18.16	CKT-I & II TRIPPED ON DIST PROT ZONE-III AT MANDOLA. CKT-I TRIPPED ON DIST PROT 'ABC' PHASE ZONE-II AT NARELA. CKT-II DID NOT TRIP AT NARELA
08	04.05.11	02.43	400KV MUNDKA – BAWANA CKT-I	04.05.11	07.59	CB-420 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA.
09	05.05.11	22.24	400KV MUNDKA – BAWANA CKT-I	05.05.11	23.54	CB-420 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA.
10	05.05.11	23.45	220KV SARITA VIHAR – MAHARANI BAGH CKT	05.05.11	23.45	CKT. TRIPPED ON AUTO RECLOSE LOCK OUT, DIST PROT ZONE-I, 186A&B AT SARITA VIHAR AND ON DIST PROT ZONE-I AT MAHARANI BAGH.
11	06.05.11	01.37	220/66KV 100MVA PR. TR.-II AT PAPPANKALAN-II	06.05.11	01.52	TR. TRIPPED ON LBB PROTECTION ALONG WITH ITS 66KV I/C WHICH TRIPPED ON E/F, LBB PROTECTION
12	07.05.11	11.20	66/11KV 20MVA PR. TR-II AT SARITA VIHAR	07.05.11	20.20	TR. TRIPPED ON 87T.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
13	08.05.11	10.35	66/11KV 20MVA PR. TR.-I AT PAPPANKALAN-I	08.05.11	16.12	TR. TRIPPED ON PRV, 86
14	09.05.11	11.03	220KV BTPS – NOIDA – GAZIPUR CKT.	09.05.11	11.33	CKT. TRIPPED ON 186A&B, 86A
15	11.05.11	17.22	220KV BTPS – MEHRAULI CKT-II	11.05.11	17.39	CKT. TRIPPED ON 'R' PHASE E/F AT BTPS AND ON DIST PROT. ZONE-I, 186 AT MEHRAULI.
16	11.05.11	17.22	220KV MEHRAULI – DIAL CKT-I & II	11.05.11	17.32	BOTH CKT. TRIPPED ON MAIN-I RYB' PHASE TRIP PROTECTION AT DIAL.
17	12.05.11	03.40	220KV BTPS – NOIDA – GAZIPUR CKT.	12.05.11	18.15	CKT. TRIPPED ON O/C ALONG WITH 66KV I/C-II WHICH TRIPPED ON 86, O/C.
18	12.05.11	09.11	220KV BAMNAULI – PAPPANKALAN-I CKT-II	13.05.11	00.30	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-II AT BAMNAULI. 'Y' PHASE CT BURNT AT PAPPANKALAN-I
19	12.05.11	09.11	220/66KV 100MVA PR. TR.-IV AT PAPPANKALAN-I	12.05.11	09.18	TR. TRIPPED ON O/C, E/F, 86 ALONG WITH ITS 66KV I/C-IV WHICH TRIPPED DUE TO VT FUSE FAIL.
20	12.05.11	09.07	220KV NARAINA – RIDGE VALLEY CKT.	12.05.11	09.20	CKT. TRIPPED ON 86A, 86B, E/F AT RIDGE VALLEY.
21	12.05.11	17.28	220KV MEHRAULI – VASANT KUNJ CKT-II	12.05.11	17.36	CKT. TRIPPED ON DIST PROT 'A&B' PHASE AT MEHRAULI.
22	12.05.11	17.03	400/220KV 315MVA ICT-IV AT MUNDKA	12.05.11	17.22	ICT-IV TRIPPED ON OVER FLUX, 86
23	12.05.11	20.40	220/66KV 160MVA PR. TR.-I AT PRAGATI	13.05.11	12.49	TR. TRIPPED ON 86
24	12.05.11	21.00	220/66KV 100MVA PR. TR.-I AT PAPPANKALAN-II	13.05.11	03.51	TR. TRIPPED ON DIFFERENTIAL, LBB PROTECTION ALONG WITH ITS 66KV I/C-I WHICH TRIPPED ON E/F, LBB PROTECTION, 86
25	12.05.11	22.30	220/66KV 100MVA PR. TR.-II AT PAPPANKALAN-II	13.05.11	21.55	TR. TRIPPED ON REF, DIFFERENTIAL, LBB PROTECTION, 86 ALONG WITH ITS 66KV I/C WHICH TRIPPED ON LOW IDMT O/C
26	13.05.11	00.15	400KV BAWANA – ABDULLAPUR CKT-I	13.05.11	01.33	CKT. TRIPPED ON MAIN-I : 2/AA, AB ZONE, MAIN-II : DIST AIDED ABN ZONE- I AT BAWANA.
27	13.05.11	06.10	400KV BALLABHGARH – BAMNAULI CKT-II	13.05.11	06.34	CKT. TRIPPED ON 186A&B, ZONE-I, CH-I, CH-II, 30 AT BAMNAULI.
28	14.05.11	10.28	220KV BTPS – NOIDA – GAZIPUR CKT.	14.05.11	10.51	CKT. TRIPPED ON 'B' PHASE E/F AT BTPS.
29	15.05.11	19.05	220KV PATPARGANJ – GEETA COLONY CKT-II	15.05.11	19.29	BUS BAR PROTECTION OPERATED AT GEETA COLONY
30	15.05.11	19.05	220KV GEETA COLONY – WAZIRABAD CKT-II	15.05.11	19.29	BUS BAR PROTECTION OPERATED AT GEETA COLONY
31	15.05.11	19.05	220/33KV 100MVA PR. TR.-II AT GEETA COLONY	15.05.11	19.51	BUS BAR PROTECTION OPERATED AT GEETA COLONY

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
32	15.05.11	20.32	220KV BTPS – OKHLA CKT-I	15.05.11	21.01	CKT. TRIPPED ON 186, 30A, 30G, 86X1, 86X2 AT BTPS. NO TRIPPING AT OKHLA. 'R' PHASE CT DAMAGED AT OKHLA
33	15.05.11	20.32	220/66KV 100MVA PR. TR.-II	15.05.11	21.32	TR. TRIPPED ON 96T
34	15.05.11	20.32	220/33KV 100MVA PR. TR.-III & IV AT OKHLA	15.05.11	21.45	TR.-III TRIPPED ON 96T AND TR.-IV TRIPPED ON POLE DISCREPANCY. 100MVA PR. TR.-III & IV CHARGED AT 21.10HRS AND 21.45HRS RESPECTIVELY.
35	16.05.11	17.37	220KV BTPS – OKHLA CKT-I	16.05.11	17.52	CKT. TRIPPED ON 186, 67AX, 86X-1, 86X-2 AT BTPS. CKT. TRIPPED WITHOUT INDICATION AT OKHLA
36	18.05.11	20.42	400KV MUNDKA – BAWANA CKT-I	18.05.11	22.53	BREAKER NO-42052 TRIPPED DUE TO LOW GAS PRESSURE.
37	21.05.11	01.35	220KV IP – RPH CKT-II	21.05.11	13.50	CKT. TRIPPED ON DIRECTIONAL E/F AT IP. CKT CLOSED AT 01.48HRS. BUT AGAIN TRIPPED AT 01.50HRS.
38	21.05.11	01.35	220KV IP – PATPAR GANJ CKT-I	21.05.11	13.50	CKT. TRIPPED ON DIRECTIONAL E/F AT IP. CKT CLOSED AT 01.48HRS. BUT AGAIN TRIPPED AT 01.50HRS.
39	21.05.11	01.52	220KV IP – PATPAR GANJ CKT-II	21.05.11	13.50	CKT. TRIPPED ON DIRECTIONAL E/F AT IP
40	21.05.11	08.56	220KV MANDOLA – WAZIRABAD CKT-IV	21.05.11	10.22	CKT. TRIPPED ON DIST PROT 'R&B' PHASE ZONE-II AT MANDOLA AND ON DIST PROT 'R&B' PHASE AT WAZIRABAD.
41	21.05.11	09.14	220KV BTPS – MEHRAULI CKT-II	21.05.11	10.10	CKT. TRIPPED ON DIST PROT 'C' PHASE 186A, 186B, 186C AT MEHRAULI AND ON 30A, 30G, 30H, 30B, 86X, 86X2, 186 AT BTPS.
42	21.05.11	09.31	400KV MUNDKA – BAWANA CKT-I	21.05.11	11.15	CB-40252 OF THE CKT. TRIPPED ON AIR GAS PRESSURE LOW AT MUNDKA.
43	21.05.11	09.40	66/11KV 20MVA PR. TR-II AT PAPPANKALAN-II	21.05.11	09.42	TR. TRIPPED ON BACK UP PROTECTION
44	21.05.11	11.39	400KV MUNDKA – BAWANA CKT-I	21.05.11	17.37	BREAKER NO-40252 OF THE CKT. TRIPPED ON AUTO RECLOSE LOCK OUT, 286LO.
45	21.05.11	14.33	220/33KV 100MVA PR. TR-III AT PATPARGANJ	21.05.11	17.02	TR. TRIPPED ON DIFFERENTIAL, 86, 64RLV
46	21.05.11	21.59	220KV MANDOLA – WAZIRABAD CKT-IV	22.05.11	15.03	CKT. TRIPPED ON Z-COM, GENERAL TRIP, 'RYB' PHASE, RXME18 AT WAZIRABAD AND ON DIST PROT 'Y&B' PHASE ZONE-II AT MANDOLA
47	22.05.11	00.30	220KV GEETA COLONY – WAZIRABAD CKT-II	22.05.11	00.39	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD AND ON DIST PROT 'ABC' PHASE ZONE-I AT GEETA COLONY.
48	22.05.11	00.34	220KV SARITA VIHAR – MAHARANI BAGH CKT	22.05.11	00.46	CKT. TRIPPED ON DIST PROT 'B' PHASE ZONE-I AT SARITA VIHAR AND ON DIST PROT 'B' PHASE AT MAHARANI BAGH
49	22.05.11	00.43	400/220KV ICT-II AT BAMNAULI	22.05.11	07.45	ICT-II TRIPPED ON 186A&B, 86B-1, 30L, OLTC BUCHLOZ, 30AH CONTROL SUPPLY FAILED.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
50	22.05.11	03.48	400KV MUNDKA – JHAJJAR CKT-I	22.05.11	09.52	CKT. TRIPPED ON SUPERVISION, AIR PRESSURE LOW, CVT FUSE FAIL AT MUNDKA.
51	22.05.11	13.25	220/33KV 100MVA PR. TR.-IV AT OKHLA	22.05.11	18.45	TR. TRIPPED ON SUDDEN PRESSURE LOW ALONG WITH 33KV I/C-IV WHICH TRIPPED ON 86
52	22.05.11	13.45	220KV BAMNAULI – NAJAFGARH CKT-I & II	22.05.11	13.58	CKT-I & II TRIPPED ON 186 AT NAJAFGARH. NO TRIPPING AT BAMNAULI.
53	27.05.11	16.52	400/220KV 315MVA ICT-II AT BAWANA	27.05.11	17.05	ICT TRIPPED ON 86A, 186B
54	27.05.11	17.52	220/66KV 100MVA PR. TR. AT BAWANA	27.05.11	17.05	TR TRIPPED ON 296BUS PROTECTION.
55	29.05.11	08.34	220KV MANDOLA – GOPALPUR CKT-I	29.05.11	08.40	CKT. TRIPPED ON DIST PROT ZONE-I AT MANDOLA AND ON DIST PROT 'R' PHASE ZONE-I AT GOPALPUR
56	29.05.11	21.45	220KV BAMNAULI – NARAINA CKT-I	29.05.11	22.17	CKT. TRIPPED ON DIST PROT 'A' PHASE 186A&B AT BAMNAULI. NO TRIPPING AT NARAINA.
57	29.05.11	21.57	220KV BTPS – MEHRAULI CKT-II	29.05.11	23.03	CKT. TRIPPED ON 30C AT BTPS AND ON DIST PROT 'C' PHASE ZONE-I AT MEHRAULI.

### 19.3 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH JUNE – 2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.06.11	09.00	66/33KV 30MVA PR. TR.-II AT PARK STREET	01.06.11	17.35	TR. TRIPPED ON 86, REF, 64RLV.
02	01.06.11	15.57	220KV BAWANA – ROHINI CKT-II	01.06.11	16.00	CKT. TRIPPED DURING PROTECTION TESTING AT BAWANA.
03	01.06.11	20.10	66/33KV 30MVA PR. TR.-II AT PARK STREET	02.06.11	10.50	TR. TRIPPED ON 86, EE/F, 64R
04	03.06.11	12.40	220KV MANDOLA – GOPALPUR CKT-I	03.06.11	13.00	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-II AT MANDOLA. NO TRIPPING AT GOPALPUR.
05	03.06.11	22.42	220KV WAZIRABAD – GEETA COLONY CKT-II	04.06.11	10.25	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD. TOP JUMPER OF TOWER NO.350 SNAPPED.
06	04.06.11	08.45	220/66KV 100MVA PR. TR.-III AT DSIDC BAWANA	04.06.11	09.28	TR. TRIPPED ON 86 ALONG WITH ITS 66KV I/C-III WHICH TRIPPED ON 86, 95, E/F.
07	04.06.11	08.45	66/11KV 20MVA PR. TR.-III AT DSIDC BAWANA	04.06.11	09.28	TR. TRIPPED ON 96 AUX.
08	05.06.11	03.04	220KV IP – PATPAR GANJ CKT-I	05.06.11	11.20	CKT. TRIPPED ON DIST PROT 'BC' PHASE ZONE-I, 86X AT PATPARGANJ AND ON 186, DIRECTIONAL O/C, DIST PROT ZONE-I AT IP.
09	06.06.11	09.50	220/66KV 100MVA PR. TR.-II AT GOPALPUR	06.06.11	22.50	TR. TRIPPED ON DIFFERENTIAL, INSTANTANEOUS E/F RELAY ALONG WITH 66KV I/C-II WHICH TRIPPED ON O/C, E/F, 86

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
10	06.06.11	18.23	220KV MANDOLA – WAZIRABAD CKT-III	06.06.11	18.35	CKT. TRIPPED ON RXME, DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD AND ON DIST PROT 'RYB' PHASE ZONE-I AT MANDOLA.
11	09.06.11	04.38	220/66KV 100MVA PR. TR.-II AT NARELA	09.06.11	04.54	TR. TRIPPED ON 86 ALONG WITH 66KV I-II WHICH TRIPPED ON TRIP CKT. FAULTY.
12	09.06.11	13.06	220/33KV 100MVA PR. TR-IV AT OKHLA	09.06.11	13.06	TR. TRIPPED WITHOUT INDICAITON ALONG WITH 33KV I-C-III & III. 33KV I/C-III TRIPPED ON 86, 51A AND I/C-IV TRIPPED ON O/C, 86.
13	09.06.11	16.35	220/33KV 100MVA PR. TR.-I & II AT IP	09.06.11	18.00	TR.-I TRIPPED WITHOUT INDICATION AND TR.-II TRIPPED ON O/C 'B' PHASE. TR.-I-II ENERGIZED AT 16.48HRS. AND 18.00HRS. RESPECTIVELY.
14	10.06.11	05.17	220KV BAWANA – ROHINI CKT-II	10.06.11	06.39	BUS BAR PROTECITON OPERATED ON 220KV BUS-II
15	10.06.11	05.17	220/66KV 100MVA PR. TR-III AT ROHINI	10.06.11	06.39	BUS BAR PROTECITON OPERATED ON 220KV BUS-II
16	10.06.11	05.42	220KV SARITA VIHAR – PRAGATI CKT.	10.06.11	06.55	CKT. TRIPPED ON DIST PROT 186A&B, DIST PROT 'AB' PHASE AT SARITA VIHAR AND ON DIST PROT 'ABC' PHASE ZONE-I AT PRAGATI.
17	10.06.11	05.42	220KV GEETA COLONY – PATPARGANJ CKT-II	10.06.11	06.15	CKT. TRIPPED ON DIST PROT 'ABC' PHASE AT GEETA COLONY.
18	10.06.11	05.28	220/33KV 100MVA PR. TR.-I & II AT IP	10.06.11	06.35	BOTH TRS TRIPPED ON 86. TR.-I & II CHARGED AT 06.25HRS. AND 06.35HRS. RESPECTIVELY.
19	10.06.11	06.25	220KV GEETA COLONY – PATPARGANJ CKT-II	10.06.11	06.50	CKT. TRIPPED ON 186
20	10.06.11	05.28	220/66KV 100MVA PR. TR.-I AT VASANT KUNJ	10.06.11	06.19	TR. TRIPPED ON 86, E/F, 87CA ALONG WITH 66KV I/C-I WHICH TRIPPED ON 86.
21	10.06.11	12.36	220KV SARITA VIHAR – MAHARANI BAGH CKT.	10.06.11	12.44	CKT. TRIPPED ON DIST PROT 'A' PHASE, 186X, ZONE-I AT SARITA VIHAR AND ON L1 TO N AT MAHARANI BAGH.
22	10.06.11	13.43	220KV SARITA VIHAR – MAHARANI BAGH CKT.	10.06.11	14.46	CKT TRIPPED DUE TO OPERATION OF BUS BAR PROTECTION AT SARITA VIHAR.
23	10.06.11	13.43	220KV SARITA VIHAR – PRAGATI CKT.	10.06.11	21.30	CKT TRIPPED DUE TO OPERATION OF BUS BAR PROTECTION AT SARITA VIHAR.
24	10.06.11	13.43	220KV BTPS – SARITA VIHAR CKT-II	10.06.11	14.46	CKT. TRIPPED ON DIST. PROT 186A&B, ZONE-III AT BOTH END.
25	10.06.11	13.43	220/66KV 100MVA PR. TR.-I & II AT SARITA VIHAR	10.06.11	15.55	BOTH TRF. TRIPPED DUE TO OPERATION OF BUS BAR PROT. TR-I & II CHARGED AT 14.31HRS. AND 15.55HRS. RESPECTIVELY.
26	10.06.11	15.56	220KV PATPARGANJ – GEETA COLONY CKT-I	10.06.11	16.04	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT GEETA COLONY.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
27	10.06.11	15.56	220KV IP – PATPAR GANJ CKT-I	10.06.11	16.08	CKT. TRIPPED ON DIST PROT `ABC` PHASE AT IP. NO TRIPPING AT PATPARGANJ.
28	10.06.11	20.31	220KV MAHARANI BAGH – SARITA VIHAR CKT.	10.06.11	21.30	CKT. TRIPPED ON DIST PROT ZONE-I AT MAHARANI BAGH. NO TRIPPING AT SARITA VIHAR.
29	11.06.11	08.05	220KV BTPS – NOIDA – GAZIPUR CKT.	11.06.11	21.05	CKT. TRIPPED WITHOUT INDICATION. CKT. TRIED TO CLOSE AT 08.10HRS. BUT AGAIN TRIPPED ON POLE DISCREPANCY.
30	14.06.11	18.24	400KV BAWANA – ABDULLAPUR CKT-I & II	14.06.11	19.05	BUS BAR PROTECTION OPERATED ON 400KV BUS-II DUE TO WHICH BREAKER NO,252 (400KV MUNDKA CKT-I), 452 (400KV MUNDKA CKT-II), 752 (ICT-III), 1052 (ICT-II), 1652(400KV MANDOLA CKT-I), 1852 (400KV MANDOLA CKT-II), 2152 (ICT-I), 2452 (PPLC CKT), 1252 (ABDULLAPUR CKT-I), 1152 (ABDULLAPUR CKT-I) TRIPPED. CKT.-I & II CHARGED AT 18.54HRS. AND 19.09HRS. RESPECTIVELY.
31	14.06.11	22.24	400KV MUNDKA – BAWANA CKT-I	15.06.11	00.39	BREAKER NO. 42052 TRIPPED ON LOW AIR PRESSURE AT MUNDKA..
32	14.06.11	22.38	400KV MUNDKA – BAMNAULI CKT-I	15.06.11	00.40	BREAKER NO.40252 TRIPPED ON 286LO AT MUNDKA.
33	14.06.11	22.55	220KV BTPS – OKHLA CKT-II	14.06.11	23.01	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I, 86T AT OKHLA.
34	14.06.11	23.04	220KV MAHARANI BAGH – SARITA VIHAR CKT.	15.06.11	00.02	CKT. TRIPPED ON DIST PROT `A` PHASE AUTO RECLOSE LOCK OUT, AT SARITA VIHAR AND ON DIST PROT ZONE-I L1-N AT MAHARANI BAGH.
35	14.06.11	23.11	220/66KV 100MVA PR. TR.-I & II AT SARITA VIHAR	15.06.11	12.39	TR-I & II CHARGED AT 12.39HRS. AND 01.38HRS. ON 15.06.2011 RESPECTIVELY.
36	15.06.11	03.10	66/11KV 20MVA PR. TR.-III AT DSIDC BAWANA	15.06.11	16.00	TR. TRIPPED ON REF, 86, DIFFERENTIAL.
37	16.06.11	07.28	220KV BAWANA – NAJAFGARH CKT.	16.06.11	07.34	CKT. TRIPPED ON 186, 86 AT NAJAFGARH.
38	17.06.11	15.55	220KV MAHARANI BAGH – SARITA VIHAR CKT.	17.06.11	16.16	CKT. TRIPPED ON L-2 E/F, ZONE-I AT MAHARANI BAGH AND ON AUTO RECLOSE, 186A&B, AT SARITA VIHAR.
39	17.06.11	15.57	220KV BAWANA – ROHINI CKT-II	17.06.11	18.54	CKT. TRIPPED ON DIST PROT `AB` PHASE ZONE-II AT BAWANA. `R` PHASE LINE ISOLATOR JUMPER OF 220KV BAWANA CKT-II DAMAGED AT ROHINI.
40	18.06.11	06.50	33/11KV 20MVA PR. TR.-II AT GOPALPUR	18.06.11	19.20	TR. TRIPPED ALONGWITH 11KV I/C-II ON O/C.
41	18.06.11	08.17	66/11KV 20MVA PR. TR-I AT KANJAWALA	18.06.11	08.27	TR. TRIPPED ON 30G, OLTC, 86, TR. TROUBLE ALARM ALONG WITH ITS 11KV I/C WHICH TRIPPED ON INTER TRIPPING.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
42	18.06.11	11.37	66/11KV 20MVA PR. TR.-IV AT WAZIRABAD	18.06.11	13.50	TR. TRIPPED ON DIFFERENTIAL, 86 'R' PHASE, REF ALONG WITH ITS 11KV I/C WHICH TRIPPED WITHOUT INDICATION.
43	19.06.11	19.10	220KV GOPALPUR – SUBZI MANDI CKT-II	19.06.11	19.29	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT GOPALPUR.
44	20.06.11	10.25	220KV MANDOLA – WAZIRABAD CKT-IV	20.06.11	11.16	CKT. TRIPPED ON DIST PROT 'RY' PHASE ZONE-I AT MANDOLA AND ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD.
45	21.06.11	10.31	220/33KV 100MVA PR. TR.-I AT GEETA COLONY	21.06.11	14.05	TR. TRIPPED ON BUCHLOZ, DIFFERENTIAL.
46	22.06.11	19.22	220KV GEETA COLONY – PATPARGANJ CKT-I	22.06.11	19.33	CKT. TRIPPED ON DIST PROT ABC' PHASE ZONE-I AT GEETA COLONY AND ON DIST PROT 'ABC' PHASE ZONE-I, MASTER RELAY AT PATPARGANJ.
47	22.06.11	19.52	220KV MANDOLA – WAZIRABAD CKT-I & II	22.06.11	20.06	THE FOLLOWING TRIPPING OCCURRED : AT MANDOLA : WAZIRABAD CKT-I : DIST. PROT 'C' PHASE ZONE-II WAZIRABAD CKT-II : DIST PROT 'A' PHASE ZONE-I AT WAZIRABAD MANDOLA CKT-I : DIST PROT 'RYB' PHASE ZONE-I MANDOLA CKT-II : DIST PROT RYB' PHASE ZONE-III CKT-I & II CHARGED AT 20.04HRS. AND 20.06HRS RESPECTIVELY.
48	22.06.11	22.57	220KV BTPS – NOIDA – GAZIPUR CKT.	24.06.11	12.11	CKT. TRIPPED ON AN, C-N, 86A, 86C, 186A&B AT BTPS. NO TRIPPING AT GAZIPUR
49	23.06.11	11.24	220/ 66KV 100MVA PR. TR.-I AT PATPARGANJ	23.06.11	11.34	TR. TRIPPED ON PRV, 86
50	23.06.11	19.35	220KV GEETA COLONY – PATPARGANJ CKT-I	23.06.11	20.18	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT GEETA COLONY. NO TRIPPING AT PATPARGANJ.
51	24.06.11	06.30	220/33KV 100MVA PR. TR.-II AT PARK STREET	24.06.11	07.19	TR. TRIPPED ON 86 ALONG WITH ITS 33KV I/C WHICH TRIPPED ON E/F, 51, 86.
52	24.06.11	13.27	220KV BTPS – SARITA VIHAR CKT-I	24.06.11	13.40	CKT. TRIPPED WITHOUT INDICATION AT SARITA VIHAR.
53	24.06.11	17.00	220KV NARAINA – RIDGE VALLEY CKT.	24.06.11	17.24	CKT. TRIPPED ON 86, E/F AT RIDGE VALLEY.
54	24.06.11	19.46	220/33KV 100MVA PR. TR-I AT GEETA COLONY	24.06.11	20.21	BUS BAR PROTECTION OPERATED ON 220KV BUS-I AT GEETA COLONY
55	24.06.11	19.46	220KV GEETA COLONY – PATPARGANJ CKT-I	24.06.11	20.19	BUS BAR PROTECTION OPERATED ON 220KV BUS-I AT GEETA COLONY
56	24.06.11	19.46	220KV GEETA COLONY – WAZIRABAD CKT-I	24.06.11	20.18	BUS BAR PROTECTION OPERATED ON 220KV BUS-I AT GEETA COLONY
57	25.06.11	05.38	220KV NARAINA – RIDGE VALLEY CKT.	25.06.11	07.07	CKT. TRIPPED ON 86A&B, E/F AT RIDGE VALLEY.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
58	25.06.11	07.47	220/33KV 100MVA PR. TR.-I & II AT GEETA COLONY	25.06.11	08.28	BOTH TRS. TRIPPED ON AUTO RECLOSE, OIL PRESSURE ALARM. TR-I & II CHARGED AT 08.15HRS. AND 08.28HRS. RESPECTIVELY.
59	25.06.11	14.01	220/33KV 100MVA PR. TR-II & III AT IP	25.06.11	17.55	TR-II TRIPPED ON E/F AND TR.-III TRIPPED ON O/C, E/F TRIPPING OCCURRED DUE TO ELECTROCUTION OF MONKEY ON WEST BUS-I. TR.-II & III CHARGED AT 14.45HRS. AND 15.05HRS. RESPECTIVLEY.
60	25.06.11	21.34	220/33KV 100MVA PR. TR.-I AT PARK STREET	25.06.11	21.55	TR. TRIPPED ON 86 ALONGWITH ITS 33KV I/C WHICH TRIPPED ON 51A, O/C 'A' PHASE, 86
61	26.06.11	06.00	220/33KV 100MVA PR. TR.-II AT SHALIMAR BAGH	26.06.11	10.19	TR. TRIPPED ON 30 SUDDEN PRESSURE, 86 ALONG WITH ITS 33KV I/C-II WHICH TRIPPED ON 86.
62	26.06.11	08.58	400KV MUNDKA – BAMNAULI CKT-I	26.06.11	09.15	CB-40252 OF THE CKT. TRIPPED ON 286 (AIR LOCK OUT) AT MUNDKA.
63	26.06.11	10.44	400KV MUNDKA – BAMNAULI CKT-I	26.06.11	15.55	CB-40252 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA.
64	26.06.11	12.10	220KV WAZIRABAD – GEETA COLONY CKT-I	26.06.11	12.29	CKT. TRIPPED ON ACTIVE GROUP-I, DIST PROT 'ABC' PHASE ZONE-I AT GEETA COLONY AND ON DIST PROT ZONE-I AT WAZIRABAD.
65	26.06.11	22.14	220/33KV 100MVA PR. TR.-I AT LODHI ROAD	26.06.11	23.06	TR. TRIPPED ON AUTO RECLOSE, BUCHLOZ, 86, O/C 'R' PHASE E/F ALONG WITH 33KV I/C-I WHICH TRIPPED WITHOUT INDICATION.
66	27.06.11	14.45	220/66KV 100MVA PR. TR.-I AT GAZIPUR	27.06.11	15.20	TR. TRIPPED WITHOUT INDICATION.
65	28.06.11	08.47	220/66KV 100MVA PR. TR.-II AT PAPPANKALAN-II	28.06.11	09.20	TR. TRIPPED ON 86, LBB PROTECTION ALONG WITH ITS 66KV I/C-II WHICH TRIPPED ON SAME INDICATION.
66	29.06.11	00.05	220KV BAMNAULI – NAJAFGARH CKT-I & II	29.06.11	00.29	BOTH CKTS TRIPPED ON BACK UP TRIP, 86, 30V, 186A&B AT BAMNAULI.
67	29.06.11	00.05	220KV BAMNAULI – NARAINA CKT.-I & II	29.06.11	00.26	BOTH CKTS TRIPPED ON BACK UP TRIP, 86 3V, 186A&B AT NARAINA.
68	29.06.11	03.08	220/33KV 100MVA PR. TR.-I AT PARK STREET	29.06.11	03.35	TR. TRIPPED ON BUCHLOZ, 86A ALONG WITH 33KV I/C-I WHICH TRIPPED WITHOUT INDICATION.
69	30.06.11	11.41	400KV MUNDKA – JHAJJAR CKT-II	02.07.11	15.29	CB-41152 OF THE CKT. TRIPPED ON TRIP CKT. FAULTY AT MUNDKA.

**19.4 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH JULY -2011**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.07.11	07.35	66/11KV 20MVA PR. TR-II AT VASANT KUNJ	01.07.11	07.43	TR. TRIPPED ON 86
02	01.07.11	07.44	220KV LODHI ROAD – MAHARANI BAGH CKT	01.07.11	08.35	CKT. TRIPPED ON DIST PROT L-1, L-2 AT MAHARANI BAGH. NO TRIPPING AT LODHI ROAD.
03	02.07.11	07.44	220/33KV 100MVA PR. TR.-III & IV AT OKHLA	02.07.11	08.20	TR.-III TRIPPED ON 86 AND TR.-IV TRIPPED ON 86, 51 'R' PHASE ALONG WITH 33KV I/C-I, III & IV. 33KV I/C-III TRIPPED ON SUPERVISION, 86, 33KV I/C-III TRIPPED ON 51 'R' PHASE, O/C, 86. 33KV I/C-I CHARGED AT 08.15HRS, I/C-III & IV CHARGED 07.55HRS.
04	02.07.11	13.49	220KV MASDJI MOTH - MAHARANI BAGH CKT	02.07.11	20.18	CKT. TRIPPED ON DIST PROT 'AB' PH ZONE-I, 86, 75B AT MASJID MOTH. NO TRIPPING AT MAHARANI BAGH
05	03.07.11	00.59	400KV BAWANA – ABDULLAPUR CKT-I	03.07.11	01.25	CKT. TRIPPED ON 86B, TIMER, OVER VOLTAGE 2/5Q, L-2, 186A&B AT BAWANA.
06	03.07.11	11.40	220KV IP – RPH CKT-II	03.07.11	15.15	CKT. TRIPPED ON DIRECTIONAL E/F, AUTO RECLOSE LOCK OUT AT IP.
07	03.07.11	23.43	220KV MEHRAULI – DIAL CKT-II	04.07.11	01.16	CKT. TRIPPED ON DIST PROT 'B' PHASE AT DIAL.
08	04.07.11	00.23	220KV BTPS – OKHLA CKT-II	04.07.11	00.40	CKT. TRIPPED ON E/F AT BTPS. NO TRIPPING AT OHLA
09	04.07.11	09.14	220/66KV 100MVA PR. TR--II AT KANJHAWALA	04.07.11	11.50	TR. TRIPPED ON 75V.
10	06.07.11	14.16	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	06.07.11	15.43	TR. TRIPPED ON PRV, 86 ALONG WITH ITS 11KV I/C-I WHICH TRIPPED ON INTER TRIPPING.
11	08.07.11	09.07	220/33KV 100MVA PR. TR.-II AT LODHI ROAD	08.07.11	11.18	TR. TRIPPED ON AUTO RECLOSE LOCK OUT, LBB PROTECTION, TIMER 2/50C, 86B, E/F, 67NX, 186A, 186B ALONG WITH 33KV I/C-II WHICH TRIPPED WITHOUT INDICATION
12	09.07.11	02.16	33/11KV 16MVA PR. TR. AT SHALIMAR BAGH	09.07.11	05.35	TR. TRIPPED ON 87
13	09.07.11	08.29	220KV BAWANA – SHALIMAR BAGH CKT-I	09.07.11	08.45	CKT. TRIPPED ON DIST PROT 'R' PHASE AT BAWANA. NO TRIPPING AT SHALIMAR BAGH.
14	09.07.11	14.08	220KV PATPARGANJ – GEETA COLONY CKT-II	09.07.11	14.20	CKT. TRIPPED ON DIST PROT 'ABC' PHASE GEETA COLONY. NO TRIPPING AT PATPARGANJ.
15	10.07.11	17.24	220KV WAZIRABAD – KASHMIRI GATE CKT-I	10.07.11	17.40	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD. NO TRIPING AT KASHMIRI GATE.
16	14.07.11	03.20	220KV MASDJI MOTH - MAHARANI BAGH CKT	14.07.11	06.30	CKT. TRIPPED ON DIST PROT 'B' PHASE ZONE-I, 86A AT MASJID MOTH AND ON DIST PROT THREE PHASE GROUP-A, 86A, 86B, 50L AT MAHARANI BAGH

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
17	14.07.11	20.52	220/33KV 100MVA PR. TR.-I AT LODHI ROAD	14.07.11	21.13	TR. TRIPPED ON 86B, O/C, 67AX, ALONG WITH 33KV I/C-I WHICH TRIPPED ON 186B-1, 51A, O/C.
18	15.07.11	16.02	400/220KV ICT-IV AT MUNDKA	16.07.11	18.54	315MVA ICT-IV TRIPPED ON 86A, SUPERVISION RELAY.
19	18.07.11	18.17	400/220KV 315MVA ICT-IV AT MUNDKA	21.07.11	19.22	CB-41652 OF ICT-IV TRIPPED ON REF PROTECTION, 86B.
20	19.07.11	06.47	220/66KV 100MVA PR. TR.-III AT WAZIRABAD	19.07.11	08.21	TR. TRIPPED ON 87T, ALONG WITH ITS 66KV I/C-III WHICH TRIPPED ON INTER TRIPPING.
21	20.07.11	15.40	220KV BAMNAULI – DIAL CKT-I	20.07.11	16.02	CKT. TRIPPED ON REL FUSE FAI, REL GEPR, BSRR, MAIN-I PHASE-II TRIP, REL MAIN-I PROTECTOR, M-I REL 'R' PHASE TRIP, MAIN-I PROTECTION TRIP, REL CARRIER SEND, REL-'R' PHASE FAULTY, RED DIFF. TRIP, REL MAIN-II, ZONE-I, RED ZONE-II, MAIN-I, ZONE-I AT DIAL AND ON 186A, 186B, FACIA CB, AUTO TRIP, AUTO RECLOSE LOCK OUT AT BAMNAULI.
22	22.07.11	09.32	220/66KV 100MVA PR. TR.-II AT NARELA	22.07.11	09.54	TR. TRIPPED ON 87 ALONG WITH 66KV I/C-II WHICH TRIPPED ON TRIP CKT. FAULTY
23	24.07.11	02.40	220/66KV 160MVA PR. TR.-I AT PRAGATI	24.07.11	10.30	TR. TRIPPED ON 86 ALONG WITH ITS 66KV I/C-I WHICH TRIPPED WITHOUT INDICATION.
24	24.07.11	20.22	220/33KV 100MVA PR. TR.-I AT IP	24.07.11	20.35	TR. TRIPPED WITHOUT INDICATION ALONG WITH 33KV I/C-I WHICH TRIPPED ON E/F LV SIDE.
25	27.07.11	14.39	400/220KV ICT-IV AT MUNDKA	28.07.11	18.05	ICT-IV TRIPPED ON OLTC BUCHLOZ, 86B. 220KV I/C-IV ALSO TRIPPED WITHOUT INDICATION
26	28.07.11	06.04	400KV BALLABHGARH – BAMNAULI CKT-II	28.07.11	18.17	CKT. TRIPPED ON CNZ-I AT BAMNAULI.
27	28.07.11	06.04	400KV BAMNAULI – MUNDKA CKT-I & II	28.07.11	08.47	BOTH CKT. TRIPPED ON AUTO RECLOSE LOCK OUT, 86B AT MUNDKA.
28	28.07.11	13.49	400KV MANDOLA – BAWANA CKT-I	29.07.11	03.05	CKT. TRIPPED ON OVER VOLTAGE, CVT FAILURE OF 'Y' PHASE AT MANDOLA. CKT. TRIPPED ON 85, 186A, DIRECT TRIP, CARRIER LOCK OUT AT BAWANA.
29	29.07.11	02.25	220/33KV I/C-IV AT PATPARGANJ	29.07.11	03.00	TR. TRIPPED ON 30A, OLTC BUCHLOZ, 30F, PRV, DIFFERENTIAL FACIA, 87A, 87, E/F LV, 64RLV ALONG WITH 33KV I/C-IV WHICH TRIPPED ON 86.
30	30.07.11	16.52	400/220KV 315MVA ICT-I AT BAMNAULI	30.07.11	16.57	ICT TRIPPED ON 186A, 186B, 30AE, 30XYZ, TIMER RELAY FAIL.
31	31.07.11	15.12	220KV GEETA COLONY – PATPARGANJ CKT-I	31.07.11	15.19	CKT. TRIPPED ON MAIN-I : DIST PROT ABC PH, ZONE-II, MAIN-II, DIST PROT ABC PH. ZONE-II AT GEETA COLONY. NO TRIPPING AT PATPARGANJ.
32	31.07.11	15.12	220KV IP – PATPAR GANJ CKT-I	31.07.11	15.39	CKT. TRIPPED ON 186, 86, LOCK OUT, DIST PROT 'ABC' PHASE ZONE-II AT IP.
33	31.07.11	18.35	400/220KV ICT-I AT BAMNAULI	31.07.11	21.02	ICT TRIPPED ON 30K, 186A&B, 52X, 86A, TRIP GROUP-I, 197 FUSE FAIL, BUCHLOZ, 30V, 30X, 30X, 30A ALONG WITH 220KV I/C-I WHICH TRIPPED ON INTER TRIPPING

**19.5 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM  
DURING THE MONTH AUGUST – 2011**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	02.08.11	21.56	220/33KV 100MVA PR. TR-II AT GEETA COLONY	02.08.11	22.10	TR. TRIPPED ON 30E, 86, O/C ALONG WITH 33KV I/C-II WHICH TRIPPED ON INTER TRIPPING.
02	03.08.11	09.45	220KV IP – PRAGATI CKT-I	03.08.11	15.23	THE CKT. TRIPPED ON E/F AT PRAGATI. WAVE TRAP CONDUCTOR BROKEN AT IP STATION.
03	03.08.11	11.02	400KV BAWANA – MUNDKA CKT-II	03.08.11	11.18	CB-452 OF THE CKT. TRIPPED ON 130F, FF1, ABC TRIP, AUTO RECLOSE, CARRER CHANNEL-II FAILED AT BAWANA
04	03.08.11	17.05	220/66KV 160MVA PR.TR. AT MUNDKA	03.08.11	18.12	TR. TRIPPED ON VISUAL AUDIO ALARM, ERA, ERB TRIP, 86A&B, SUPERVISION, MASTER RELAY.
05	04.08.11	11.55	220KV WAZIRABAD – GEETA COLONY CKT..- II	04.08.11	14.06	CKT. TRIPPED DUE TO FLASH ON COMMON JUMPER AT GEETA COLONY
06	04.08.11	11.55	220KV WAZIRABAD – GEETA COLONY CKT-I	04.08.211	12.06	CKT. TRIPPED ON E/F AT WAZIRABAD.
07	04.08.11	11.55	220/33KV 100MVA PR.TR.-II AT GEETA COLONY	04.08.11	12.29	TR. TRIPPED ON 30E, 30B, E/F, 86. 220KV BUS COUPLER ALSO TRIPPED ON 86, 240 A/C, 80AC.
08	04.08.11	11.54	220/66KV 100MVA PR. TR.-I AT PATPARGANJ	04.08.11	12.13	TR. TRIPPED ON O/C, E/F, 86
09	04.08.11	11.54	220/66KV 100MVA PR. TR.-II AT PATPARGANJ	04.08.11	12.13	TR. TRIPPED ON E/F, BACK UP PROT. 86
10	04.08.11	14.15	66/11KV 20MVA PR. TR.-I AT MEHRAULI	04.08.11	18.27	TR. TRIPPED ON O/C, E/F.
11	04.08.11	15.04	220KV SARITA VIHAR – MAHARANI BAGH CKT	04.08.11	19.28	CKT. TRIPPED ON DIST. PROT`A` PHASE ZONE-I, 86A & 86B AT SARITA VIHAR AND ON DIST PROT ZONE-I AT MAHARANI BAGH
12	04.08.11	17.04	220/66KV 100MVA PR. TR.-I AT OKHLA	04.08.11	18.28	TR. TRIPPED ON 86, 51CX ALONG WITH 66KV I/C-I & II. 66KV I/C-I TRIPPED ON 51CX, 51AX AND 66KV I/C-II TRIPPED ON 51CX.
13	05.08.11	10.26	220KV SHALIMAR BAGH – ROHINI CKT-I	04.08.11	10.42	CKT. TRIPPED ON DIST. PROT AUTO RECLOSE LOCK OUT AT ROHINI
14	05.08.11	13.15	220/66KV 100MVA PR. TR.-II AT PAPPANKALAN-II	05.08.11	15.48	CKT. TRIPPED ON PRV RELAY ALONG WITH 66KV I/C-II.
15	05.08.11	18.30	66/11KV 20MVA PR. TR.-I AT PAPPANKALAN-II	05.08.11	18.50	TR. TRIPPED ON BACK UP PROTECTION
16	06.08.11	07.30	400KV BAWANA – MUNDKA CKT-I	06.08.11	07.40	CKT. TRIPPED ON 86A, 86B, DIRECT TRIP CHANNEL RECEIVED AT MUNDKA. THE TRIPPING OCCURRED WHILE ARRANGING THE SHUT-DOWN OF 400KV MANDOLA-BAWANA CKT-I AND SENDING 85LO SIGNAL

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
17	06.08.11	05.35	220/33KV 100MVA PR.TR.-I AT IP	06.08.11	05.40	TR. TRIPPED WITHOUT INDICATION.
18	06.08.11	19.17	220/33KV 100MVA PR. TR.-III AT SHALIMAR BAGH	06.08.11	21.26	TR. TRIPPED OLA, OLTC, 6, OIL TEMP. ALARM, TR. TROUBLE ALONG WITH 33KV I/C-III WHICH TRIPPED ON 86
19	06.08.11	22.45	220/66KV 100MVA PR. TR.-II AT NARELA	06.08.11	23.18	TR. TRIPPED ON 86 ALONG WITH 66KV I/C-II WHICH ALSO TRIPPED ON 86.
20	07.08.11	12.40	220KV LODHI ROAD – MAHARANI BAGH CKT-I	07.08.11	12.59	CKT. TRIPPED ON DIST PROT AT MAHARANI BAGH. NO TRIPPING AT LODHI ROAD.
21	08.08.11	07.50	220/66KV 100MVA PR. TR.-II AT NARELA	08.08.11	15.25	TR. TRIPPED ON 86
22	08.08.11	17.32	220/66KV 100MVA PR. TR.-II AT NARELA	08.08.11	20.57	TR. TRIPPED ON 86 ALONG WITH 66KV I/C-II WHICH TRIPPED ON INTER TRIPPING
23	09.08.11	09.04	220/33KV 50MVA PR.TR.-I AT OKHLA	09.08.11	09.36	TR. TRIPPED ON 95C, E/F ALONG WITH 33KV I/C-I WHICH TRIPPED ON 95, 86, 51A O/C
24	09.08.11	09.04	220/33KV 100MVA PR. TR.-IV AT OKHLA	10.08.11	01.05	THE FOLLOWING TRIPPINGS OCCURRED :- 33KV I/C-I (50MVA TX) : 95, TRIP SUPERVISION RELAY, 86, 51A, O/C 50MVA PR. TR.-I : 95C, E/F 33KV I/C OF 220/33KV 100MVA PR. TR.-III : 86 220/33KV 100MVA PR. TR-IV : 51AX, 51CX, 86 33KV I/C OF PR. TR.-IV : 86LV, O/C, 51A 33KV OKHLA PHASE CKT-I TRIPPED ON 67NX, E/F. ITS 33KV BUS-II CONDUCTOR SNAPPED. INSULATORS ALSO BROKEN. 50MVA PR. TR.-I ENERGIZED AT 09.36HRS AND 33KV I/C-I CHARGED AT 09.46HRS. 33KV BUS-II NORMALIZED AT 11.21HRS. 33KV OKHLA PHASE-II CKT-I ENERGIZED AT 01.05HRS. ON 10.08.2011 33KV I/C OF 100MVA PR. TR.-III ENERGIZED AT 11.31HRS. AND 100MVA PR. TR.-IV CHARGED AT 11.29HRS.
25	09.08.11	09.50	220/66KV 100MVA PR. TR.-II AT WAZIRABAD	10.08.11	13.48	TR. TRIPPED WITHOUT INDICATION
26	09.08.11	12.10	220/66KV 160MVA PR. TR-II AT RIDGE VALLEY	09.08.11	12.25	TR. TRIPPED WITHOUT INDICATION
27	09.08.11	16.55	220KV LODHI ROAD – MAHARANI BAGH CKT-I	09.08.11	19.53	CKT. TRIPPED ON DIST PROT 'R' PHASE ZONE-I AT MAHARANI BAGH.
28	10.08.11	13.12	220KV SARITA VIHAR – PRAGATI CKT.	10.08.11	13.51	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-II AT PRAGATI AND ON DIST PROT 'C' PHASE, 186A&B AT SARITA VIHAR.
29	11.08.11	12.18	220KV NARELA – DSIDC CKT-I & II	11.08.11	20.15	CKT.-I TRIPPED ON DIST PROT ZONE-II, 80A, 86A AND CKT-II TRIPPED ON DIST PROT 'A' PHASE AT DSIDC

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
30	11.08.11	12.18	220/66KV 100MVA PR. TR-II AT DSIDC	11.08.11	13.00	TR. TRIPPED ON E/F, 86, 95
31	11.08.11	15.59	220KV SARITA VIHAR – MAHARANI BAGH CKT	11.08.11	16.40	CKT. TRIPPED ON DIST PROT `A` PHASE ZONE-I, 186A&B, 186F AT SARITA VIHAR AND ON L-1, `R` PHASE E/F AT MAHARANI BAGH
32	12.08.11	08.31	220KV BAWANA – NAJAFGARH CKT.	12.08.11	08.36	CKT. TRIPPED ON 186 AT NAJAFGARH.
33	12.08.11	08.31	220KV NAJAFGARH – KANJHAWALA CKT.	12.08.11	09.08	CKT. TRIPPED ON 186 AT NAJAFGARH.
34	13.08.11	11.10	220KV SHALIMAR BAGH – ROHINI CKT-I	13.08.11	15.30	CKT. TRIPPED ON DIST PROT 186A&B, AUTO RECLOSE LOCK OUT AT ROHINI.
35	13.08.11	17.47	220/66KV 100MVA PR. TR.-IV AT PAPPANKALAN-I	13.08.11	21.17	TR. TRIPPED ON SUDDEN PRESSURE RELAY, 30H, 86 ALONG WITH 66KV I/C-IV WHICH TRIPPED ON INTER TRIPPING.
36	13.08.11	18.58	220KV GEETA COLONY – WAZIRABAD CKT-I	13.08.11	21.21	CKT. TRIPPED ON DIST PROT `RYB` PHASE ZONE-II AT WAZIRABAD AND ON DIST PROT ABC` PHASE, 27RYB AT GEETA COLONY
37	13.08.11	21.41	220/66KV 100MVA PR. TR.-IV AT PAPPANKALAN-I	13.08.11	22.35	TR. TRIPPED ON SUDDEN PRESSURE RELAY, 30H, 86 ALONG WITH 66KV I/C-IV WHICH TRIPPED ON INTER TRIPPING.
38	14.08.11	00.01	220/66KV 100MVA PR. TR.-IV AT PAPPANKALAN-I	14.08.11	09.30	TR. TRIPPED ON SUDDEN PRESSURE RELAY, 30H, 86 ALONG WITH 66KV I/C-IV WHICH TRIPPED ON INTER TRIPPING.
39	14.08.11	14.01	220KV PANIPAT – NARELA CKT-III	14.08.11	14.58	CKT. TRIPPED ON DIST PROT AT NARELA.
40	15.08.11	01.46	220/33KV 100MVA PR. TR.-I AT IP	15.08.11	02.24	TR. TRIPPED ON DIRECTIONAL E/F
41	15.08.11	07.48	33/11KV 16MVA PR TR.-II AT GOPALPUR	15.08.11	10.53	TR. TRIPPED ON OLTC BUCHLOZ.
42	15.08.11	10.59	220KV MEHRAULI – DIAL CKT-II	15.08.11	11.11	CKT. TRIPPED ON DIST PROT `RUYB` PHASE AT DIAL. NO TRIPPING AT MEHRAULI
43	15.08.11	10.58	220KV BAMNAULI – NAJAFGARH CKT-I & II	15.08.11	11.18	BOTH CKT. TRIPPED ON 186 AT NAJAFGARH. CKT-II TRIPPED ON DIST PROT `B&C` PHASE 186 AT BAMNAULI.
44	15.08.11	10.54	220/33KV 100MVA PR. TR.-I AT IP	15.08.11	11.00	TR. TRIPPED WITHOUT INDICATION ALONG WITH 33KV I/C-I WHICH TRIPPED ON E/F
45	15.08.11	13.02	220K BAWANA – ROHINI CKT-I	15.08.11	13.13	CKT. TRIPPED ON DIST PROT `R` PHASE, 186 AT BAWANA AND ON DIST PROT AUTO RECLOSE LOCK OUT AT ROHINI.
46	16.08.11	08.46	220KV MEHRAULI – VASANT KUNJ CKT-II	16.08.11	09.03	CKT. TRIPPED ON DIST PROT `B` PHASE AUTO RECLOSE, 186A&B, 295CD, 295CC AT MEHRAULI. NO TRIPPING AT VASANT KUNJ.
47	17.08.11	19.23	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	18.08.11	07.04	TR. TRIPPED ON NON DIRECTIONAL O/C, `R&B` PHASE, 86 SRP, 30ABCDEF ALONG WITH 11KV I/C-I WHICH TRIPPED WITHOUT INDICATION.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
48	17.08.11	16.34	220KV MEHRAULI – VASANT KUNJ CKT-II	17.08.11	16.40	CKT. TRIPPED DURING PROTECTION TESTING.
49	18.08.11	16.34	220KV GOPALPUR – SUBZI MANDI CKT-II	18.08.11	17.32	CKT. TRIPPED ON DIST PROT E/F AT GOPALPUR. NO TRIPPING AT SUBZI MANDI.
50	20.08.11	09.05	220KV BAWANA – NAJAFGARH CKT	20.08.11	09.13	CKT. TRIPPED ON 186 AT NAJAFGARH AND ON DIST PROT 'Y&B' PHASE AT BAWANA.
51	20.08.11	09.05	220KV KANJHAWALA – NAJAFGARH CKT.	20.08.11	09.13	CKT. TRIPPED ON 186 AT NAJAFGARH.
52	20.08.11	09.05	400/220KV 315MVA ICT-III AT BAWANA	20.08.11	09.23	ICT TRIPPED ON O/C, 86B, 186A&B
53	20.08.11	16.29	66/11KV 20MVA PR. TR.-II AT PAPPANKALAN-I	20.08.11	16.40	TR. TRIPPED ON O/C
54	20.08.11	21.53	220/66KV 160MVA TR.-II AT RIDGE VALLEY	24.10.12	11.40	TR. TRIPPED ON SUDDEN PRESSURE RELAY, 86A, 86B.
55	21.08.11	12.40	220KV MEHRAULI – VASANT KUNJ CKT-&II	21.08.11	17.35	CKT.-I TRIPPED WITHOUT INDICATION AND CKT-II TRIPPED ON DIST PROT 'C' PHASE ZONE-III, 186A, 186B AT VASANT KUNJ. NO TRIPPING AT MEHRAULI.
56	21.08.11	13.19	400KV BAWANA – HISSAR CKT.	21.08.11	14.23	CB-852 OF THE CKT. TRIPPED ON DC-I, CB AUTO TRIP LOCK OUT, POLE DISCREPANCY, ABTC, DC-II FAIL, TRIP SUPERVISION, 86, 195CB, 295CA, 295CB, 295CC, AUX RELAY 52X3, 52X7, DC2, 295CA, 295CB, 295CC AT BAWANA. THE BREAKER NO.852 HAS CREATED PROBLEM. THE CKT CHARGED THROUGH CB-952 AT 14.23HRS.
57	21.08.11	15.15	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	21.08.11	19.55	TR. TRIPPED ON SUDDEN PRESSURE RELAY, 86, 30ABCD.
58	22.08.11	09.17	220KV BAWANA – ROHINI CKT-II	22.08.11	15.38	CKT. TRIPPED AUTO RECLOSE LOCK OUT, DIST PROT ZONE-II, 186A&B AT BAWANA. NO TRIPPING AT ROHINI
59	22.08.11	14.11	220KV SARITA VIHAR – MAHARANI BAGH CKT	22.08.11	14.28	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I, 186A&B AT SARITA VIHAR AND ON DIST PROT 'R' PHASE L3-2-R AT MAHARANI BAGH.
60	23.08.11	12.47	220KV PATPARGANJ – IP CKT-I	23.08.11	12.50	CKT. TRIPPED ON DIST. PROT 'ABC' PHASE ZONE-II, 186, 86 AT IP
61	23.08.11	12.47	220KV IP PRAGATI CKT-I	23.08.11	13.58	CKT. TRIPPED ON E/F, 86T AT IP.
62	25.08.11	14.05	220KV BTPS – MEHRAULI CKT-I	25.08.11	17.08	CKT. TRIPPED ON 186, 30C, 30G, FUSE FAILURE AT BTPS AND ON DIST PROT 'ABC' PHASE ZONE-I AT MEHRAULI.
63	25.08.11	14.08	220KV MEHRAULI – VASANT KUNJ CKT-I & II	25.08.11	15.08	CKT-I TRIPPED ON 67AX (O/C), AUTO RECLOSE, 186A&B AND CKT-II TRIPPED ON 67NX, AUTO RECLOSE, 186A&B AT VASANT KUNJ. CKT-I TRIPPED ON 96, 67NX AND CKT-II TRIPPED ON 96 AT MEHRAULI.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
64	25.08.11	14.35	220KV BTPS – GAZIPUR CKT	25.08.11	15.03	CKT. TRIPPED ON 186A, 186B, 86N AT BTPS. NO TRIPPING AT GAZIPUR
65	25.08.11	14.05	220/66KV 160MVA AND 100MVA PR. TR. AT VASANT KUNJ	25.08.11	17.10	160MVA PR. TR. TRIPPED ON 96 AND 100MVA PR. TR. TRIPPED ON 96, 295C&A. 220KV BUS COUPLER ALSO TRIPPED ON 86, 96AM, 96A, 96B, 51N.
66	25.08.11	21.34	220KV PAPPANKALAN-I – BAMNAULI CKT-II	25.08.11	21.43	CKT. TRIPPED ON 186A&B, 86
67	27.08.11	15.21	220/66KV 160MVA PR. TR.-III AT MUNDKA	27.08.11	18.07	TR. TRIPPED ON 86A&B, O/C, E/F ALONG WITH ITS 66KV I/C WHICH TRIPPED ON 86
68	28.08.11	09.15	66/11KV 20MVA PR. TR. AT PATPARGANJ	28.08.11	12.20	TR. TRIPPED ON 86 'B' PHASE ALONG WITH 11KV I/C-I WHICH TRIPPED ON O/C 'R&B' PHASE.
69	28.08.11	16.07	33/11KV 20MVA PR. TR.-II AT LODHI ROAD	28.08.11	17.10	BREAKER POLE DAMAGED CAUSED THE TRIPPING OF TRANSFORMER.
70	28.08.11	16.07	220/33KV 100MVA PR. TR.-I & II AT LODHI ROAD	30.08.11	17.12	TR.-I TRIPPED ON 86B, 186X AND TR.-II TRIPPED ON AUTO RECLOSE O/C, 51C, E/F. 33KV I/C-I TRIPPED ON 186B1, B2.
71	29.08.11	18.46	220KV MANDOLA – GOPALPUR CKT-I	29.08.11	22.34	CKT. TRIPPED ON DIST PROT 'Y&B' PHASE ZONE-I AT MANDOLA. NO TRIPPING AT GOPALPUR
72	30.08.11	11.45	220/66KV 100MVA PR. TR.-II AT PATPARGANJ	30.08.11	11.59	TR. TRIPPED ON PRV STAGE-I, 86
73	30.08.11	14.55	220KV SARITA VIHAR – MAHARANI BAGH CKT	30.08.11	15.13	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I, 186A&B, 186X AT SARITA VIHAR AND ON DIST PROT L2-L-3 AT MAHARANI BAGH.

## 19.6 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH SEPTEMBER -2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.09.11	05.12	220KV PANIPAT – NARELA CKT-III	01.09.11	06.11	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA.
02	01.09.11	09.30	220KV BAWANA – SHALIMAR BAGH CKT-I	01.09.11	09.42	CKT. TRIPPED ON 186 'A' PHASE AT BAWANA. NO TRIPPING AT SHALIMAR BAGH.
03	01.09.11	18.02	220KV MANDOLA – GOPALPUR CKT-I	01.09.11	18.32	CKT. TRIPPED ON DIST PROT 'R&Y' PHASE ZONE-I, O/C AT MANDOLA. NO TRIPPING AT GOPALPUR.
04	01.09.11	21.45	66/11KV 20MVA PR. TR-II AT PAPPANKALAN-II	01.09.11	22.08	TR. TRIPPED ON 'B'C PHASE O/C
05	02.09.11	02.11	220KV BAWANA – SHALIMARBAGH CKT-II	02.09.11	07.20	CKT TRIPPED ON DIST PROT 'A' PHASE, 195AC, 295AC, 86 AT BAWANA. NO TRIPPING AT SHALIMAR BAGH.
06	02.09.11	09.20	220/66KV 100MVA PR. TR.-II AT NARELA	02.09.11	10.57	TR. TRIPPED ON 86 ALONG WITH ITS 66KV I/C WHICH TRIPPED WITHOUT INDICATION.
07	03.09.11	00.55	220KV MANDOLA – GOPALPUR CKT-I	03.09.11	02.47	CKT. TRIPPED ON DIST PROT 'RYB' PHASE AT GOPALPUR AND ON DIST PROT 'R' PHASE ZONE-I AT MANDOLA.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
08	04.09.11	00.52	220KV GEETA COLONY – PATPARGANJ CKT-I & II	04.09.11	01.30	THE FOLLOWING TRIPPINGS OCCURRED AT GEETA COLONY : 220KV PATPARGANJ CKT-I : MAIN-I DIST PROT `ABC` PHASE ZONE-I MAIN-II : DIST PROT `A` PHASE ZONE-I 220KV PATPARGANJ CKT-II : MAIN-I : ACTIVE GROUP-I, DIST PROT `ABC` PHASE ZONE-I MAIN-II : DIST PROT `ABC` PHASE ZONE-I NO TRIPPING AT PATPARGANJ. CKT-I & II CHARGED AT 01.20HRS. AND 01.30HRS. RESPECTIVELY.
09	04.09.11	03.40	220/33KV 100MVA PR. TR-I AT GEETA COLONY	04.09.11	04.52	TR. TRIPPED ON 86, 30B, 30E, E/F ALONG WITH ITS 33KV I/C-I WHICH TRIPPED ON 30B.
10	04.09.11	03.39	220KV MANDOLA – WAZIRABAD CKT-I & II	04.09.11	16.28	220KV WAZIRABAD CKT-I & II TRIPPED ON DIST PROT `B` PH. ZONE-III AND CKT-II TRIPPED ON DIST PROT `R` PHASE ZONE-I AT WAZIRABAD. TOP PHASE CONDUCTOR FOUND DECLAMPED FROM INSULATOR STRING AT TOWER NO. 49. CKT-I & II CHARGED AT 16.28HRS. AND 04.25HRS RESPECTIVELY.
11	04.09.11	03.39	220/66KV 100MVA PR. TR.-I & II AT WAZIRABAD	04.09.11	06.20	TR.-I & III TRIPPED ON E/F. TR-I CHARGED AT 06.20HRS. AND 04.39HRS RESPECTIVELY.
12	04.09.11	04.03	220/66KV 100MVA PR. TR.-I AT SARITA VIHAR	04.09.11	13.04	TR. TRIPPED ON 30B, 30H, 30K, 30L ALONG WITH ITS 66KV I/C-I WHICH TRIPPED ON INTER TRIPPING, 86.
13	04.09.11	04.25	33/11KV 16MVA PR. TR.-II AT GOPALPUR	04.09.11	13.48	TR. TRIPPED ON OLTC BUCHLOZ ALONG WITH ITS 11KV I/C-II WHICH TRIPPED ON O/C `B` PHASE.
14	04.09.11	05.42	220KV GOPALPUR – SUBZI MANDI CKT-II	05.09.11	15.16	CKT. TRIPPED ON DC SUPERVISION RELAY AT GOPALPUR. NO TRIPPING AT SUBZI MANDI.
15	04.09.11	08.47	400KV MUNDKA – JHAJJAR CKT-I	05.09.11	14.27	CB-41452 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA
16	04.09.11	15.14	220KV PANIPAT – NARELA CKT-I	04.09.11	15.37	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT, E/F AT NARELA.
17	04.09.11	15.40	400KV MUNDKA – BAMNAULI CKT-I	04.09.11	16.50	CB-401 OF THE CKT-I TRIPPED ON DIST PROT `B` PHASE ZONE-II AT MUNDKA AND ON 186A&B, DIST PROT CN ZONE-I AT BAMNAULI.
18	04.09.11	15.40	400KV MUNDKA – BAMNAULI CKT-II	04.09.11	16.37	CKT-II (BREAKER NO.403 & 404) TRIPPED ON POLE DISCREPANCY AT MUNDKA.
19	05.09.11	13.53	220/66KV 160MVA PR. TR. AT VASANT KUNJ	05.09.11	16.38	TR. TRIPPED ON SUDDEN PRESSURE RELAY.
20	06.09.11	04.48	33/11KV 20MVA PR. TR.-II AT LODHI ROAD	06.09.11	08.20	TR. TRIPPED ON BUCHLOZ, 86

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
21	06.09.11	15.27	400KV MUNDKA – JHAJJAR CKT-II	06.09.11	15.31	CKT. TRIPPED ON GAS PRESSURE LOCK OUT AT MUNDKA.
22	06.09.11	15.31	400/200KV 315MVA ICT-IV AT MUNDKA	06.09.11	21.08	315MVA ICT-IV TRIPPED ON PRV, 86X, 86X-1, 86B ALONG WITH 220KV I/C-IV WHICH TRIPPED ON SUPERVISION RELAY, RYB PHASE GROUP-A, 86A
23	06.09.11	15.31	400KV MUNDKA – BAMNAULI CKT-I & II	06.09.11	20.45	THE FOLLOWING TRIPPINGS OCCURRED :- AT MUNDKA :- 400KV JHAJJAR CKT-I (CB-41452) :- 1496X, 1496S 400KV JHAJJAR CKT-II (CB-41152):- 1196X, 1196S 400KV BAWANA CKT-II : TRIP RELAY, 196, AUX RELAY 1196 400KV BAMNAULI CKT-I : 1986S, TRIP RELAY 596K, 596S 400KV BAMNAULI CKT-II(CB-40352) : F 396H, 396, AUX RELAY 400KV BUS-I : F 396H, 396 TRIP RELAY. BREAKER NO. 41452, 41152 AND BAWANA CKT-II CHARGED AT 20.45HRS, 2030HRS. AND 20.31HRS RESPECTIVELY.
24	06.09.11	18.41	220KV BTPS - MEHRULI CKT-II	06.09.11	19.26	CKT. TRIPPED ON 'R' PHASE E/F ZONE-I AT BTPS AND ON DIST PROT ZONE-I, 186 AT MEHRAULI.
25	07.09.11	12.10	220KV BAMNAULI – DIAL CKT-II	08.09.11	02.08	CKT. TRIPPED ON DIST PROT CB PHASE ZONE-I, 186A&B AT BAMNAULI AND ON REL MAIN ZONE-II, REL MAIN ZONE-I, REL FUSE FAILURE 'B' PHASE FAULTY, REL MAIN-II PROT TRIP, REL MAIN-II 'B' PHASE TRIP RECGE TR. BFR B MAIN-I RED AT DIAL.
26	08.09.11	20.18	220KV BAWANA – ROHINI CKT-I	08.09.11	20.27	CKT. TRIPPED ON DIST PROT 'A' PHASE, 21Q AT BAWANA. NO TRIPPING AT ROHINI.
27	10.09.11	11.19	220KV BTPS – MEHRAULI CKT-I	10.09.11	12.03	CKT. TRIPPED ON 30C, ZONE-I AT BTPS AND ON ACTIVE GROUP-I, DIST PROT 'C' PHASE ZONE-I, 186A&B AT MEHRAULI.
28	10.09.11	15.04	220KV BTPS – OKHLA CKT-II	10.09.11	15.46	CKT. TRIPPED ON 30G, 30C, 186 AT BTPS. NO TRIPPING AT OKHLA.
29	11.09.11	14.17	220KV BTPS – NOIDA – GAZIPUR CKT.	11.09.11	15.07	CKT. TRIPPED ON 'R' PHASE E/F AT NOIDA. NO TRIPPING AT GAZIPUR
30	12.09.11	10.11	400KV BAWANA – ABDULLAPUR CKT-II	12.09.11	10.44	CKT. TRIPPED ON 86A, 86B, 186A, 186B AT BAWANA.
31	14.0.11	02.59	220/66KV 160MVA PR. TR.-III AT MUNDKA	14.09.11	09.58	TR. TRIPPED ON 633GRB,, 632GRA, 213, P632, 64R/86A&B ALONG WITH ITS 66KV I/C-III WHICH TRIPPED ON 86
32	14.09.11	09.00	33/11KV 16MVA PR. TR.-II AT NARAINA	14.09.11	09.35	TR. TRIPPED WITHOUT INDICATION
33	14.09.11	19.46	220KV BAWANA – DSIDC CKT-II	15.09.11	11.55	CKT. TRIPPED ON DIST PROT 'A' PHASE ZONE-I AT BAWANA AND ON DIST PROT 'ABC' PHASE, 86, 186 AT DSIDC. CKT. TRIED TO CLOSE AT 20.09HRS. BUT DID NOT HOLD. CKT. FINALLY CHARGED AT 11.55HRS. ON 15.09.11

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
34	15.09.11	01.34	220/33KV 100MVA PR. TR.-IV AT OKHLA	15.09.11	01.40	TR. TRIPPED ON O/C, 'R&B' PHASE, 86 ALONG WITH 33KV I/C-III & IV. 33KV I/C-III TRIPPED ON 51C, O/C, 86 AND 33KV I/C-IV TRIPPED ON 86LV, O/C. BOTH I/C CHARGED AT 02.08HRS.
35	15.09.11	02.23	220KV BAWANA – SHALIMAR BAGH CKT-II	15.09.11	03.03	CKT. TRIPPED ON DIST PROT 'C' PH. 186A&B AT BAWANA. NO TRIPPING AT SHALIMAR BAGH. 33KV I/C-III TRIPPED ON 86, 95ABC1, 'R' PHASE ALONG WITH 33KV O/G SANJAY GANDHI TR. NAGAR CKT. AT SHALIMAR BAGH.
36	15.09.11	19.20	220/66KV 100MVA PR. TR.-II AT MEHRAULI	05.11.11	17.22	TR. TRIPPED ON BUCHLOZ, 86 A&C PHASE, DIFFERENTIAL ALONG WITH 66KV I/C-II WHICH TRIPPED ON INSTANTANEOUS E/F
37	17.09.11	01.24	220/66KV 100MVA PR. TR.-III AT MEHRAULI	17.09.11	02.05	TR. TRIPPED ON O/C, 51CX ALONG WITH 66KV I/C-I & III. 66KV I/C-I TRIPPED ON O/C, 51CX AND 66KV I/C-III TRIPPED ON O/C, 51AX, 51BX, 51CX. 66KV BUS COUPLER ALSO TRIPPED ON 51AX, 51BX, E/F. 'B' PHASE CT DAMAGED. BOTH I/CS CHARGED AT 02.05HRS.
38	17.09.11	09.50	220/33KV 100MVA PR. TR.-I AT PARK STREET	17.09.11	15.08	TR. TRIPPED ON OLTC BUCHLOZ, 86R.
39	19.09.11	03.36	400KV MUNDKA – BAWANA CKT-I	19.09.11	04.14	CB-1652 OF THE CKT. TRIPPED ON DIST. PROT 'B' PHASE ZONE-I, 86A&B AT BAWANA.
40	20.09.11	11.55	66/11KV 20MVA PR. TR.-II AT MEHRAULI	20.09.11	14.57	TR. TRIPPED ON OLTC BUCHLOZ.
41	20.09.11	13.50	220/66KV 100MVA PR. TR.-I AT OKHLA	20.09.11	14.55	TR. TRIPPED ON BUCHLOZ, 186
42	21.09.11	11.19	220KV BTPS – MEHRAULI CKT-I	21.09.11	18.30	CKT. TRIPPED ON 186, 186, ACTIVE GROUP-A, DIST PROT 'C' PHASE ZONE-I AT MEHRAULI.
43	21.09.11	18.13	220KV MANDOLA – WAZIRABAD CKT-II	21.09.11	20.35	CKT. TRIPPED ON DIST PROT 'R&Y' PHASE AT MANDOLA AND ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD.
44	24.09.11	07.56	220/33KV 100MVA PR. TR.-II AT KASHMIRI GATE	24.09.11	13.45	TR. TRIPPED ON 86, 30F ALONG WITH ITS 33KV I/C-II WHICH TRIPPED ON 86
45	24.09.11	23.43	220KV MANDOLA – GOPALPUR CKT-I	25.09.11	18.21	CKT. TRIPPED ON DIST PROT ZONE-I AT MANDOLA AND ON DIST PROT 'R&B' P HASE ZONE-I AT GOPALPUR. TOP PHASE CONDUCTOR FOUND SNAPPED AT TOWER NO.40
46	25.09.11	10.55	220/66KV 160MVA PR. TR. AT VASANT KUNJ	25.09.11	17.05	TR. TRIPPED ON 30E, 30F, 30G, 30H, 86, SUPERVISION RELAY ALONG WITH ITS 66KV I/C-III WHICH TRIPPED ON 86
47	25.09.11	10.53	220KV BTPS – NOIDA – GAZIPUR CKT.	25.09.11	11.25	CKT. TRIPPED ON 'C' PHASE E/F AT BTPS. NO TRIPPING AT GAZIPUR
48	26.09.11	08.08	33/11KV 20MVA PR. TR. AT PATPARGANJ	26.09.11	15.25	TR. TRIPPED ON E/F, 86

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
49	26.09.11	11.27	220KV BAWANA – ROHINI CKT.-II	26.09.11	12.05	CKT. TRIPPED ON DIST PROT 'A' PH. ZONE-II, 186A&B, CB TROUBLE ALARM AT BAWANA. NO TRIPPING AT ROHINI
50	26.09.11	14.44	220/66KV 160MVA PR. TR. AT MUNDKA	26.09.11	16.27	TR. TRIPPED O VISUAL AUDIO ALARM, SF6GAS PRESSURE LOW ALONG WITH ITS 66KV I/C WHICH TRIPPED ON E/F, 86
51	27.09.11	05.55	220/66KV 100MVA PR. TR.-I AT SARITA VIHAR	27.09.11	11.43	TR. TRIPPED ON 86, 87TB, REF ALONG WITH 66KV I/C-I WHICH TRIPPED ON E/F AND 86.
52	27.09.11	11.29	220KV MANDOLA – WAZIRABAD CKT-II	27.09.11	11.41	CKT. TRIPPED WITHOUT INDICATION.
53	29.09.11	10.12	66/11KV 20MVA PR. TR. __ AT SARITA VIHAR	29.09.11	10.32	TR. TRIPPED ON 86, 87T.
54	29.09.11	17.38	220/66KV 160MVA PR. TR. AT MUNDKA	29.09.11	18.53	TR. TRIPPED ON 86, SF6 GAS PRESSURE LOW INDICATIONS.
55	30.09.11	14.54	66/11KV 20MVA PR. TR- I. AT MEHRAULI	30.09.11	17.09	TR. TRIPPED ON 86.

## 19.7 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH OCTOBER -2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	02.10.11	09.10	20/33KV 100MVA PR. TR -I &II AT LODHI ROAD	02.10.11	09.45	WHILE ARRANGING S/D ON 33KV O/G IHC CKT-II ALONG WITH 33KV BUS-I, 220/33KV 100MVA PR. TR.-I&-II TRIPPED ON AUTO RECLOSE LBB PROT., 2/30Z, 86B, 67AX, O.C. TR.-I & II CHARGED AT 09.40HRS.AND 09.45HRS RESPECTIVELY
02	04.10.11	10.10	220KV MEHRAULI – VASANT KUNJ CKT-II	04.10.11	11.14	CKT. TRIPPED ON 186A, 186B, DIST PROT AUTO RECLOSE ZONE-II AT MEHRAULI
03	07.10.11	16.18	220/66KV 160MVA PR. TR.-II AT DIAL	07.10.11	17.31	TR. TRIPPED ON 86 THREE PHASE.
04	08.10.11	12.36	220KV PATPARGANJ – GEETA COLONY CKT-II	08.10.11	13.48	CKT. TRIPPED ON 27RYB, 86, 30E MAIN-I : DIST PROT ABC PHASE MAIN-II 'C' PHASE AT GEETA COLONY.
05	08.10.11	16.26	220/66KV 100MVA PR. TR.-II AT NARELA	08.10.11	16.47	TR. TRIPPED ON 87 A&C PHASE
06	08.10.11	18.27	220/66KV 160MVA PR. TR.-II AT DIAL	10.10.11	14.43	TR. TRIPPED ON 86
07	11.10.11	13.41	220KV BTPS – MEHRAULI CKT-I	11.10.11	14.57	CKT. TRIPPED ON 30C, 30G, E/F, 186 AT BTPS AND ON DIST PROT ZONE 'C' PHASE ZONE-I AT MEHRAULI.
08	11.10.11	13.41	220KV MEHRAULI – DIAL CKT- I	11.10.11	13.58	CKT. TRIPPED ON DIST PROT 'B' PHASE AT DIAL. NO TRIPPING AT MEHRAULI.
09	11.10.11	15.54	220KV MANDOLA – NARELA CKT-I	11.10.11	16.20	CKT. TRIPPED ON DIST PROT 'R' PPHASE ZONE-II, CB AUTO TRIP, AUTO RECLOSE LOCK OUT AT MANDOLA AND ON DIST PROT 'ABC' PHASE ZONE-II, 186 AT NARELA.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
10	11.10.11	18.42	400KV BAWANA – MUNDKA CKT-I	11.10.11	19.04	CB-252 OF THE CKT. TRIPPED ON 186 AT BAWANA. NO TRIPPING AT MUNDKA.
11	13.10.11	19.10	66/33KV 30MVA PR. TR.-I AT PARK STREET	14.10.11	09.48	TR. TRIPPED ON OLTC BUCHLOZ, LBB PROTECTION, 86
12	14.10.11	12.43	220KV MANDOLA – GOPALPUR CKT-II	14.10.11	14.42	CKT. TRIPPED ON DIST PROT 'B' PHASE ZONE-I AT MANDOLA
13	14.10.11	19.55	220KV GAZIPUR – NOIDA – GAZIPUR CKT.	15.10.10	19.55	CKT. TRIPPED ON 'R' PH. E/F AT BTPS. NO TRIPPING AT GAZIPUR. 'R' PHASE CT OF 66KV KONDLI CKT-II DAMAGED.
14	15.10.11	07.04	220KV BTPS – MEHRAULI CKT-I & II	15.10.11	15.17	BOTH CKT TRIPPED ON 186 AT MEHRAULI WHILE ARRANGING SHUTDOWN OF 220KV BUS-II ALONG WITH 220KV DIAL CKT-I AT MEHRAULI. CKT-I & II CHARGED AT 15.17HRS. AND 07.26HRS RESPECTIVELY.
15	16.10.11	11.28	220KV BTPS – SARITA VIHAR CKT-I	16.10.11	17.20	CKT. TRIPPED ON DIST. PROT 'B&C' PHASE, PHASE TO PHASE AT BTPS. NO TRIPPING AT SARITA VIHAR.
16	16.10.11	12.08	220KV BAWANA – SHALIMAR BAGH CKT-II	16.10.11	12.39	CKT. TRIPPED ON 86A&B, 'C' PHASE, AUTO TRIP, AUTO RECLOSE LOCK OUT. NO TRIPPING AT SHALIMAR BAGH
17	17.10.11	06.22	220/66KV 100MVA PR. TR.-I AT PAPPANKALAN-II	17.10.11	11.40	TRANSFORMER TRIPPED ON O/C, E/F ALONG WITH 66KV I/C-I WHICH TRIPPED ON INTER TRIPPING.
18	17.10.11	06.20	400KV MUNDKA – BAMNAULI CKT-II	17.10.11	06.47	CKT. TRIPPED ON DIST PROT ZONE-I, 186A&B AT BAMNAULI. CKT. TRIPPED ON INTER TRIPPING AT MUNDKA
19	17.10.11	10.55	220/33KV 100MVA PR. TR.-I AT SUBZI MANDI	17.10.11	18.55	TR. TRIPPED ON 64RLV, E/F, 86, 87.
20	17.10.11	18.45	220/66KV 100MVA PR. TR.-III AT ROHINI	17.10.11	STILL OUT	TR. TRIPPED ON 86A&B, 87, 30A, 30D, 30C, 30E, 30F, 30G, 30H, 30K, 30JPR. TRANSFORMER COMPLETELY DAMAGED DUE TO FIRE.
21	18.10.11	21.57	400KV BALLABHGARH – BAMNAULI CKT-II	18.10.11	22.21	CKT. TRIPPED ON DIST PROT MAIN-II CNZ-I, 186A&B AT BAMNAULI. AT BALLABHGARH, IT TRIPPED BUT RELAY INDICATIONS ARE NOT AVAILABLE.
22	18.10.11	06.26	66/11KV 20MVA PR. TR.-I AT SARITA VIHAR	18.10.11	16.35	TR. TRIPPED ON TROUBLE ALARM, 30A, 86.
23	18.10.11	07.55	220KV WAZIRABAD – GEETA COLONY CKT-I	18.10.11	08.08	CKT. TRIPPED ON 30E, 86 AT GEETA COLONY END ONLY.
24	18.10.11	12.14	33/11KV 16MVA PR. TR.-I AT GOPALPUR	18.10.11	12.30	TR. TRIPPED ON OIL TEMP. ALARM.
25	18.10.11	13.43	220/66KV 100MVA PR. TR.-I AT WAZIRABAD	18.10.11	15.50	TR. TRIPPED ON 86
26	18.10.11	13.43	220KV WAZIRABAD – GEETA COLONY CKT-II	18.10.11	15.32	CKT. TRIPPED ON DIST PROT 'C' PHASE ZONE-I, 86, 27RUB AT GEETA COLONY AND ON DIST PROT AT WAZIRABAD.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
27	18.10.11	13.43	220/33KV 100MVA PR. TR-I AT GEETA COLONY	18.10.11	15.50	TR. TRIPPED ON 86, 30E (GAS PRESSURE LOW), E/F ALONG WITH 33KV I/C-I WHICH TRIPPED ON 30F
28	18.10.11	18.32	400KV MUNDKA – BAMNAULI CKT-I	18.10.11	20.42	BOTH CB OF THE CKT. TRIPPED ON DIRECT CHANNEL-I, 86A&B AT MUNDKA. NO TRIPPING AT BAMNAULI.
29	19.10.11	13.59	220KV BAWANA – ROHINI CKT-I	19.10.11	18.36	CKT. TRIPPED ON DIST PROT 'C' PHASE, 186A&B AT ROHINI AND ON AUTO RECLOSE LOCK OUT , 186A&B AT BAWANA.
30	21.10.11	03.28	220/66KV 100MVA PR. TR.-II AT WAZIRABAD	21.10.11	03.35	TR. TRIPPED WITHOUT INDICATION.
31	21.10.11	17.37	220KV MEHRAULI – VASANT KUNJ CKT-II	21.10.11	18.02	CKT. TRIPPED ON DIST. PROT 'B' PHASE, 186A&B, 295CCC, AT MEHRAULI. NO TRIPPING AT VASANT KUNJ
32	22.10.11	18.10	220/66KV 100MVA PR. TR.-II AT NARELA	22.10.11	18.28	TR. TRIPPED O 87 A&C PHASE, 86 AT IP.
33	23.10.11	07.20	220/66KV 100MVA PR. TR.-IV AT PAPPANKALAN-I	23.10.11	08.58	TX. TRIPPED ON O/C, E/F
34	23.10.11	10.55	66/11KV 20MVA PR. TR.-III AT NAJAFGARH	23.10.11	14.50	TR. TRIPPED ON O/C
35	23.10.11	16.03	220KV PATPARGANJ – IP CKT-I	23.10.11	16.57	CKT. TRIPPED ON 86 AT IP. NO TRIPPING AT PATPARGANJ.
36	25.10.11	02.45	220KV MANDOLA – NARELA CKT-II	25.10.11	09.20	CKT. TRIPPED ON 186 AT NARELA. RELAY INDICATIONS AT MANDOLA NOT AVAILABLE.
37	25.10.11	20.15	220KV MANDOLA – NARELA CKT-I	26.10.11	18.03	CKT. TRIPPED ON 186 AT NARELA. RELAY INDICATIONS AT MANDOLA NOT AVAILABLE.
38	30.10.11	03.22	400KV BALLABHGARH – BAMNAULI CKT-I	30.10.11	03.48	CKT. TRIPPED ON 186A&B 'B' PHASE ZONE-I AT BAMNAULI. RELAY INDICATIONS AT BALLBHARH END NOT AVAILABLE
39	30.10.11	23.45	400KV BAWANA – HISSAR CKT.	31.10.11	00.24	CKT. TRIPPED ON DIST PROT 'B' PHASE ZONE-I AT BAWANA. HISSAR END INDICATIONS ARE NOT AVAILABLE.
40	31.10.11	08.14	220/33KV 50MVA PR. TR. AT PATPARGANJ	31.10.11	13.45	TR. TRIPPED ON DIFFERENTIAL, REF (LV SIDE), 86
41	31.10.11	14.10	220KV NARELA – ROHTAK ROAD CKT.-I	31.10.11	14.29	CKT. TRIPPED ON DIST PROT 'ABC' PHASE AT NARELA. NO TRIPPING AT ROHTAK ROAD.
42	31.10.11	15.48	220KV WAZIRABAD – GEETA COLONY CKT-I	31.10.11	21.34	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD AND ON DIST PROT 'A' PHASE ZONE-II AT GEETA COLONY

**19.8 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH NOVEMBER – 2011**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.11.11	17.02	220KV PANIPAT – NARELA CKT-III	01.11.11	19.10	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA.
02	04.11.11	08.27	220/33KV 100MVA PR. TR.-II AT NARAINA	04.11.11	19.48	TR. TRIPPED ON TRV, 30F, OLTC BUCHLOZ, TRANSFORMER TROUBLE, 86 PROTECTION 'B' RELAY. TRANSFORMER AGAIN TRIPPED AT 16.15HRS. ON SAME INDICATIONS. TRANSFORMER FINALLY CHARGED AT 19.48HRS.
03	05.11.11	10.17	220KV BAWANA – SHALIMAR BAGH CKT-II	05.11.11	10.52	CKT. TRIPPED ON DIST PROT 'A' PHASE, 186 AT SHALIMAR BAGH AND ON DIS PROT AUTO RECLOSE LOCK OUT, CB AUTO TRIP 'R' PHASE AT BAWANA.
04	05.11.11	11.56	400KV CB-416 OF ICT-IV AT MUNDKA	05.11.11	14.10	CB-416 CONTROLLING ICT-IV TRIPPED ON LV SIDE WINDING TEMP ALARM, 86 A&B 220KV CB-213 CONTROLING 220KV ALSO TRIPPED ON 86, SUPERVISION, 86A. 220KV CB-212 TRIPPED ON MASTER RELAY, A&B, 66KV I/C TRIPPED ON 86.
05	08.11.11	06.20	220/66KV 100MVA PR. TR.-I AT PAPPANKALAN-II	08.11.11	07.15	TR. TRIPPED ON O/C, E/F, LBB PROTE ALONG WITH ITS 66KV I/C-I WHICH TRIPPED ON DC SUPERVISION RELAY
06	08.11.11	06.40	220/66KV 160MVA PR. TR-II AT RIDGE VALLEY	08.11.11	17.25	TR. TRIPPED ON GENERAL TRIP A&B, E/F, BUCHLOZ, PRV RELAY OVER FLUX ALONG WITH 66KV I/C-II WHICH TRIPPED ON 86A&B
07	08.11.11	06.40	220KV NARAINA – RIDGE VALLEY CKT.	08.11.11	07.34	CKT. TRIPPED ON TEF TRIP, 186X, 186A&B AT NARAINA.
08	08.11.11	06.35	400KV BAMNAULI – MUNDKA CKT-I & II	08.11.11	07.21	THE FOLLOWING TRIPPINGS OCCURRED :- AT BAMNAULI :- 400KV MUNDKA CKT-I : NO TRIPPING 400KV MUNDKA CKT-II : AN ZONE-I, 186A&B AT MUNDKA 400KV BAMNAULI CKT-I : AUTO RECLOSE LOCK OUT 400KV BAMNAULI CKT-II : 186LO CHANNEL-I & II FAULTY CKT-I & II CHARGED AT 07.10HRS. AND 07.21HRS. RESPECTIVELY.
09	08.11.11	08.15	220KV BAWANA – NAJAFGARH CKT.	08.11.11	08.22	CKT. TRIPPED ON 186 AT NAJAFGARH. NO TRIPPING AT BAWANA.
10	09.11.11	12.26	220KV MAHARANI BAGH - PRAGATI CKT.	09.11.11	13.09	CKT. TRIPPED ON POLE DISCREPANCY AT MAHARANI BAGH. NO TRIPPING AT PRAGATI.
11	10.11.11	09.57	220KV MAHARANI BAGH – LODHI ROAD CKT-II	10.11.11	10.31	CKT. TRIPPED ON DIST PROT ZONE-I AT MAHARANI BAGH. NO TRIPPING AT LODHI ROAD.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
12	10.11.11	11.29	220KV MAHARANI BAGH – PRAGATI CKT.	10.11.11	11.45	CKT. TRIPPED ON POLE DISCREPANCY AT MAHARANI BAGH. NO TRIPPING AT PRAGATI.
13	10.11.11	14.22	220KV BTPS – MEHRAULI CKT-	10.11.11	14.23	CKT. TRIPPED ON VT FUSE FAILURE
14	11.11.11	13.25	33/11KV 16MVA PR. TR.-III AT LODHI ROAD	11.11.11	19.22	TR. TRIPPED ON O/C ALONG WITH 11KV I/C-III WHICH TRIPPED ON O/C, E/F.
15	11.11.11	15.22	220KV BTPS – OKHLA CKT-I	11.11.11	17.35	CKT. TRIPPED ON 'R' PHASE E/F AT BTPS. NO TRIPPING AT OKHLA.
16	12.11.11	09.44	66/11KV 20MVA PR. TR-II AT MEHRAULI	12.11.11	16.36	TR. TRIPPED ON 51AX, O/C, 86, BACK UP PROTECTION ALONG WITH 11KV I/C-II WHICH TRIPPED ON O/C.
17	12.11.11	14.44	220KV BAWANA – SHALIMAR BAGH CKT-II	12.11.11	19.54	CKT. TRIPPED ON DIST. PROT 'C' PHASE, 186A&B AT SHALIMAR BAGH. NO TRIPPING AT BAWANA
18	13.11.11	17.30	220KV BTPS - OKHLA CKT-II	13.11.11	17.55	SUPPLY FAILED FROM BTPS. NO TRIPPING AT OKHLA
19	13.11.11	17.30	220/33KV 50MVA PR. TR.-I AND 100MVA PR. TR.-IV AT OKHLA	13.11.11	17.50	50MVA PR. TR-I TRIPPED ON 51AXM 51CX, 95C. 100MVA PR. TR-IV TRIPPED ON 86, 51CX. 33KV I/C-I, III & IV ALSO TRIPPED. 33KV I/C-I TRIPPED ON 88, 86, 51A, 33KV I/C-III TRIPPED ON 51C, 86 AND 33KV I/C-IV TRIPPED ON 86LV. 33KV I/C-I, III & IV CHARGED AT 17.50HRS.
20	13.11.11	17.30	220KV BTPS – NOIDA – GAZIPUR CKT.	13.11.11	18.55	SUPPLY FAILED FROM BTPS. NO TRIPPING AT GAZIPUR
21	14.11.11	00.20	400/220KV 315MVA ICT-IV AT MUNDKA	14.11.11	08.23	ICT TRIPPED ON 86A&B
22	14.11.11	00.20	220/66K 160MVA PR. TR. AT MUNDKA	14.11.11	08.31	TR. TRIPPED ON 86A ALONG WITH ITS 66KV I/C WHCH TRIPPED ON 86.
23	14.11.11	07.43	33/11KV 16MVA PR. TR.-III AT LODHI ROAD	14.11.11	15.20	TR. TRIPPED ON O/C, E/F, 86 ALONG WITH 11KV I/C-III WHICH TRIPPED ON 86, O/C.
24	17.11.11	17.01	400KV BALLABHGARH – BAMNAULI CKT-I	17.11.11	18.14	CB-152 OF THE CKT. TRIPPED WITHOUT INDICATION AND ONE POLE ('Y') OF CB-252 OF THE CKT TRIPPED.
25	18.11.11	16.52	220/33KV 100MVA PR. TR-I AT TRAUMA CENTER	22.03.12	10.00	TR. TRIPPED ON DIFFERENTIAL LV REF, LEAKAGE IN TREASURY WINDING WHILE CHARGING.
26	19.11.11	06.48	220KV BTPS – NOIDA – GAZIPUR CKT.	19.11.11	07.17	CKT. TRIPPED ON CN, 86CM 186A, 186B AT BTPS. NO TRIPPING AT GAZIPUR
27	19.11.11	07.18	220KV PANIPAT – NARELA CKT-II	19.11.11	08.15	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA.
28	19.11.11	11.20	220KV BAWANA – SHALIMAR BAGH CKT-II	19.11.11	19.22	CKT. TRIPPED ON DIST PROT 'B' PHASE, 21Q, 186A&B AT BAWANA. NO TRIPPING AT SHALIMAR BAGH. A FLASH OBSERVED ON 'Y' PHASE LA ON 220KV SHALIMAR BAGH CKT-II AT BAWANA.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
29	19.11.11	11.20	400/220KV 315MVA ICT-II AT BAWANA	19.11.11	16.26	ICT TRIPPED ON 195AC, 195BC, 195CC, 295AC, 295BC, 295CC, 86A-I GROUP, 30AF, 30E, 30F
30	19.11.11	17.12	400/220KV 315MVA I/C-II AT BAMNAULI	20.11.11	17.10	ICT TRIPPED ON 186A&B, TRIP GROUP-II MAIN CG AUTO TRIP (BOTH BREAKERS), GRUP-II, 86B-1, MAIN CB AUTO TRIP, TIE CB AUTO TRIP, AUTO RECLOSE LOCK OUT, MAIN CB DC-I & II VT FUSE FAIL. 220KV I/C-II TRIPPED ON 167NX, E/F, 295CC, TRIP CKT SUPERVISION, CB TROUBLE ALARM, CB AIR GAS PRESSURE BLOCK OUT.
31	20.11.11	02.22	220KV PANIPAT – NARELA CKT-II	20.11.11	19.01	CKT TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT NARELA
32	20.11.11	02.32	220KV PANIPAT – NARELA CKT-III	20.11.11	18.06	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT NARELA
	20.11.11	03.42	220KV SHALIMAR BAGH – ROHINI CKT-I	20.11.11	18.35	CKT. TRIPPED ON 186A&B, AUTO RECLOSE, HEAVY JERK AT ROHINI.
33	20.11.11	02.32	220KV NARELA – ROHTAK ROAD CKT-II	20.11.11	07.17	CKT. TRIPPED ON DIST PROT `ABC`PHASE ZONE-I AT NARELA.
34	20.11.11	06.35	220KV BAWANA – NAJAFGARH CKT.	20.11.11	07.54	CKT. TRIPPED ON DIST PROT 'R' PHASE ZONE-I, ATO RECLOSE LOCK OUT AT BAWANA.
35	21.11.11	12.25	220/66KV 100MVA PR. TR.-I AT GAZIPUR	23.11.11	18.42	TR. TRIPPED WITHOUT INDICATION ALONG WITH 66KV I/C-I WHICH TRIPPED ON E/F
36	22.11.11	11.05	220/33KV 100MVA PR. TR-II AT KASHMIRI GATE	22.11.11	15.50	TR. TRIPPED ON SUPERVISION, 195 AC, 195BC, 195CC, 295BC.
37	23.11.11	09.20	220/33KV 100MVA PR. TR.-I AT IP	23.11.11	10.30	TR. TRIPPED ON 86, AUTO RECLOSE LOCK OUT..
38	23.11.11	22.15	220/33KV 100MV APR. TR.-IV AT OKHLA	23.11.11	22.15	TR. TRIPPED WITHOUT INDICATION ALONG WITH 33KV I/C-III AND IV. 33KV I/C-III TRIPPED ON 86, 51C AND 33KV I/C-IV TRIPPED ON 86LV, 86, 51CX.
39	24.11.11	19.31	33/11KV 20MVA PR. TR.-II AT LODHI ROAD	24.11.11	19.35	TR. TRIPPED ON DIFFERENTIAL.
40	26.11.11	20.28	220/33KV 100MVA PR. TR.-II AT SUBZI MANDI	26.11.11	22.25	TR. TRIPPED ON 86 ALONG WITH 33KV I-C-II WHICH TRIPPED ON 86, 80CD, CB AUTO TRIPPED.
41	28.11.11	14.40	220/66KV 100MVA PR. TR.-III AT DSIDC	28.11.11	17.03	TR. TRIPPED ON 86 ALONG WITH 66KV I/C-III WHICH TRIPPED ON O/C, E/F, LBB PROTECTION, 86

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
42	28.11.11	17.47	400KV BAWANA – MUNDKA CKT-I & II	28.11.11	18.35	<p>CB-252 (MUNDKA CKT-I) AND CB-452 (MUNDKA CKT-II) TRIPPED ON 186A&amp;B,, MAIN CB AUTO TRIP AT BAWANA.</p> <p>THE ABOVE TRIPPINGS OCCURRED DUE TO 400KV BUS DIFFERENTIAL OPERATION ON 400KV BUS-II AT BAWANA.</p> <p>DUE TO THE BUS DIFFERENTIAL OPERATION AT BAWANA, THE FOLLOWING TRIPPINGS ALSO OCCURRED :-</p> <p>CB-752 : (ICT-III) : MAIN CB 186A&amp;B,, MAIN CB AUTO TRIP</p> <p>CB-1052 (ICT-II) TRIPPED MAIN CB AUTO TRIP</p> <p>CB-1252 (ABDULLAPUR CKT-I) : MAIN CB AUTO TRIP</p> <p>CB-1452 :(ABDULLAPUR CKT-II) : MAIN CB AUTO TRIP</p> <p>CB-1652 (MANDOLA CKT-I): MAIN CB AUTO TRIP</p> <p>CB-1852(MANDOLA CKT-II) : MAIN CB AUTO TRIP</p> <p>CB-2152 (ICT-I) : MAIN CAB AUTO TRIP</p> <p>220KV DSIDC CKT-I &amp; II, 220KV KANJHAWALA CKT, 220KV NAJAFGARH CKT TRIPPED ON 27X, UNDER VOLTAGE, 86.</p>
43	29.11.11	17.29	400KV BUS BAR PROTECTION AT BAWANA	29.11.11	18.32	<p>DUE TO BUS BAR PROTECTION ON 400KV BUS-II, THE FOLLOWING TRIPPINGS OCCURRED :-</p> <p>CB-252 : 96 GROUP, BB PROTECTION</p> <p>CB-452 : FACIA CARRIER 2 FAILED</p> <p>CB-552 : CB TROUBLE ALARM</p> <p>CB-752 : MAIN CB AUTO TRIP</p> <p>CB-1052 : MAIN CB AUTO TRIP</p> <p>CB-1352 : DISTANCE RECORDER FAIL</p> <p>CB-1552 : CB AUTO TRIP</p> <p>CB-1752 : CARRIER CHANNEL-I FAILED</p>

## 19.9 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH DECEMBER - 2011

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	01.12.11	02.14	220/66KV 100MVA PR. TR.-II AT SARITA VIHAR	01.12.11	05.41	TR. TRIPPED ON OVER FLUX ALONG WITH 66KV I/C-II WHICH TRIPPED ON 95C, 86.
02	04.12.11	08.22	220KV MANDOLA – NARELA CKT-I & II	04.12.11	10.34	BOTH CKT. TRIPPED ON SPS AT MANDOLA. NO TRIPPING AT NARELA
03	05.12.11	14.43	220/66KV 100MVA PR. TR .-I AT PAPPANKALAN-II	05.12.11	15.20	TR. TRIPPED ON O/C, E/F ALONG WITH 66KV I/C-I WHICH TRIPPED ON LBB PROTECTION.
04	05.12.11	17.24	220/33KV 100MVA PR. TR.-I AT PARK STREET	05.12.11	19.00	TR. TRIPPED DUE TO FLASH ON 33KV CT OF NIRMAN VIHAR CKT.
05	06.12.11	13.57	400KV BAWANA – HISSAR CKT.	06.12.11	14.11	CKT. TRIPPED ON CB AUTO TRIP, DIRECT TRIP, 186, MAIN-I : ANZONE-I, MAIN-II, DIST PROT ABC PHASE, 86, C2A2, 186 AT BAWANA.
06	07.12.11	03.25	220/33KV 100MVA PR. TR.-I AT PARK STREET	07.12.11	20.00	TR. TRIPPED ON DIFFERENTIAL PROT REF, 86A&B, 64RLV, E/F ALONG WITH 33KV I/C-I WHICH TRIPPED ON INTER TRIPPING.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
07	07.12.11	03.56	220KV MANDOLA – NARELA CKT-I	07.12.11	04.05	CKT. TRIPPED ON DIST PROT 'B' PH. ZONE-II, 86RYB, 186AB AT MANDOLA AND ON DIST PROT 'C' PH ZONE-I, 186 AT NARELA
08	07.12.11	03.47	220KV LODHI ROAD – MAHARANI BAGH CKT-I	07.12.11	04.50	CKT. TRIPPED ON DIST PROT L-1, E/F AT MAHARANI BAGH. NO TRIPPING AT LODHI ROAD.
09	07.12.11	04.56	220KV NARELA – DSIDC CKT-I	07.12.11	05.05	CKT. TRIPPED ON DIST PROT 'C' PHASE, 186 AT DSIDC.
10	07.12.11	05.00	220KV PATPARGANJ – IP CKT-II	07.12.11	17.40	CKT. TRIPPED ON DIST PROT 'ABC' PHASE AT IP AND ON DIST PROT 'C' PHASE, 186 AT PATPARGANJ.
11	09.12.11	22.46	220KV PANIPAT – NARELA CKT-II	10.12.11	11.11	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA. DETAILS OF PANIPAT END ARE NOT AVAILABLE
12	10.12.11	00.14	220KV PANIPAT – NARELA CKT-III	15.12.11	19.06	CKT. TRIPPED ON DIST PROT 'ABC' PHASE AT NARELA. DETAILS OF PANIPAT END ARE NOT AVAILABLE
13	10.12.11	04.55	400KV BAWANA – ABDULLAPUR CKT-I	10.12.11	05.30	CB-1152 OF THE CKT TRIPPED ON 186A&B, 2/AA AND CB-1252 ON 86AB, 2/AA2, 52X4 (POLE DISCREPANCY), ZONE-I AT BAWANA. DETAILS OF ABDULLAPUR END ARE NOT AVAILABLE
14	10.12.11	06.11	400KV BAWANA – ABDULLAPUR CKT-I	10.12.11	10.02	CB-1152 OF THE CKT TRIPPED ON 186A&B, 2/AA AND CB-1252 ON 86AB, 2/AA2, 52X4 (POLE DISCREPANCY), ZONE-I AT BAWANA. DETAILS OF ABDULLAPUR END ARE NOT AVAILABLE
15	10.12.11	12.41	400/220KV 315MVA ICT-IV AT MUNDKA	10.12.11	18.02	BOTH CB OF ICT TRIPPED ON 86A, 86B.
16	11.12.11	19.47	400/220KV 315MVA ICT-IV AT MUNDKA	11.12.11	21.35	TR. TRIPPED ON 86, 86
17	11.12.11	19.47	220/66KV 160MVA PR. TR. AT MUNDKA	11.12.11	21.39	TR. TRIPPED ON 86 ALONG WITH 66KV I/C WHICH ALSO TRIPPED ON SAME INDICATION.
18	12.12.11	03.15	220/66KV 100MVA PR. TR.-II AT NARELA	12.12.11	06.22	TR. TRIPPED ON 87 A&C PHASE,
19	12.12.11	06.05	220/66KV 100MVA PR. TR.-I AT SARITA VIHAR	12.12.11	13.30	TR. TRIPPED ON 30A, BUCHLOZ ALONG WITH ITS 66KV I/C-I WHICH TRIPPED WITHOUT INDICATION.
20	12.12.11	16.26	400KV BAWANA – HISSAR CKT.	12.12.11	16.44	CKT. TRIPPED ON 86A2, ABC PHASE, 86C2, ABC, 186A&B. INDICATIONS OF HISSAR END ARE NOT AVAILABLE.
21	13.12.11	03.06	400KV BAWANA – ABDULLAPUR CKT-I	13.12.11	03.25	CB-1152 OF THE CKT. TRIPPED ON 2/AA AND CB-1252 TRIPPED ON 2/AA1, 186A&B, 52XA, POLE DISCREPANCY, DIST PROT 'B' PHASE ZONE-I AT BAWANA.
22	13.12.11	19.17	220KV BTPS – OKHLA CKT-I	13.12.11	22.10	CKT. TRIPPED ON 86, 86T, AUTO RECLOSE AT OKHLA.
23	14.12.11	16.05	66/33KV 30MVA PR. TR.-II AT PARK STREET	14.12.11	19.20	TR. TRIPPED ON 30ABCDEF, 30GHIJKL

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
24	15.12.11	15.03	220KV GOPALPUR – SUBZI MANDI CKT-II	15.12.11	16.05	CKT. TRIPPED ON DIST PROT `Y&B` PHASE ZONE-I AT GOPALPUR
25	15.12.11	15.36	220KV MAHARANI BAGH – PRAGATI CKT	15.12.11	15.50	CKT. TRIPPED ON POLE DISCREPANCY AT MAHARANI BAGH. NO TRIPPING AT PRAGATI
26	19.12.11	12.11	220KV BTPS – NOIDA – GAZIPUR CKT.	19.12.11	16.15	CKT. TRIPPED ON 186 AT BTPS. NO TRIPPING AT GAZIPUR
27	19.12.11	22.38	220KV PANIPAT – NARELA CKT-I	19.12.11	23.02	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT NARELA.
28	20.12.11	02.42	VARIOUS TRIPPINGS IN DTL SYSTEM			DETAILED REPORT GIVEN BENEATH
29	21.12.11	04.10	220KV WAZIRABAD – MANDOLA CKT. –II	21.12.11	16.48	CKT. TRIPPED ON DIST. PROT. ‘ABC’ PHASE AT MANDOLA : ‘R’ PHASE ZONE-I, INSULATOR DISC FOUND PUNCHER AT TOWER NO. -12
30	21.12.11	07.34	220KV NARELA – ROHTAK ROAD CKT. –I	21.12.11	07.42	DIST. PROT. ZONE-I ‘ABC’ PHASE 186 NO TRIPPING AT ROHTAK ROAD
31	22.12.11	17.33	220KV LODHI ROAD – MAHARANI BAGH CKT-I	22.12.11	20.20	CKT. TRIPPED ON DIST PROT ‘C’ PHASE AT MAHARANI BAGH. NO TRIPPING AT LODHI ROAD
32	23.12.11	05.06	220KV BAWANA – NAJAFGARH CKT	23.12.11	07.00	CKT. TRIPPED ON 186 AT NAJAFGARH AND ON DIST PROT ‘A’ PH. ZONE-I AT BAWANA.
33	23.12.11	07.07	220KV BAWANA – ROHINI CKT-II	23.12.11	15.36	CKT. TRIPPED ON DIST PROT ‘C’ PHASE ZONE-I AT BAWANA. NO TRIPPING
34	23.12.11	07.10	220KV MANDOLA – NARELA CKT-II	23.12.11	21.18	CKT. TRIPPED ON DIST PROT ‘A’ PHASE ZONE-I AT MANDOLA AND ON DIST PROT ‘ABC’ PHASE ZONE-II AT NARELA
35	23.12.11	07.11	220KV BAWANA – NAJAFGARH CKT.	23.12.11	14.10	CKT. TRIPPED ON DIST PROT ‘A’ PHASE, 21XR1, 21XY1, 21XB1 AT BAWANA. NO TRIPPING AT NAJAFGARH.
36	23.12.11	09.52	220KV MANDOLA – NARELA CKT-I	23.12.11	16.59	CKT. TRIPPED ON DIST PROT ‘Y’ PHASE AT MANDOLA. NO TRIPPING AT NARELA AT NARELA : ‘Y’ PHASE JUMPER OF DEAD END TOWER SNAPPED AT MANDOLA
37	24.12.11	07.35	66/11KV 20MVA PR. TR.-I AT VASANT KUNJ	24.12.11	12.48	TR. TRIPPED ON 30D, OLTC, 86
38	24.12.11	22.29	220KV BAWANA – ROHINI CKT-II	25.12.11	15.01	CKT. TRIPPED ON 195CA, 195CB, 295CC, TRIP CIRCUIT FAULTY AT ROHINI.
39	25.12.11	18.13	400KV MUNDKA – BAWANA CKT-I	25.12.11	18.29	CN-252 OF THE CKT. TRIPPED ON 186AB, 80D AT BAWANA.
40	25.12.11	03.40	66/11KV 20MVA PR. TR.-III AT NAJAFGARH	25.12.11	13.15	TR. TRIPPED ON 86, 64RLV
41	25.12.11	16.33	220KV PRAGATI – SARITA VIHAR CKT.	25.12.11	17.40	CKT. TRIPPED ON DIST PROT ‘C’ PHASE ZONE-I AT SARITA VIHAR AND ON DIST PROT ‘ABC’ PH. ZONE-II AT PRAGATI

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
42	27.12.11	17.35	220/66KV 100MVA PR. TR-II AT VASANT KUNJ	27.12.11	19.45	TR. TRIPPED ON 86, 30ABC, WINDING TEMP ALARM ALONG WITH 66KV I/C-II WHICH TRIPPED ON 86
43	28.12.11	02.51	220/66KV 100MVA PR. TR.-III AT PAPPANKALAN-I	28.12.11	10.40	TR. TRIPPED ON GENERAL TRIP PROTECTION, 96, CB AUTO TRIP.
44	28.12.11	04.10	66/11KV 20MVA PR. TR.-III AT NAJAFGARH	28.12.11	08.55	TR. TRIPPED ON 86, 64RLV
45	28.12.11	09.08	220/66KV 100MVA PR. TR.-II AT VASANT KUNJ	28.12.11	13.30	TR. TRIPPED ON 30B, WINDING TEMP. 86 ALONG WITH 66KV I/C-II WHICH TRIPPED ON 86
46	28.12.11	15.30	66/11KV 20MVA PR. TR.-III AT NAJAFGARH	28.12.11	18.05	TR. TRIPPED ON 86, 64RLV
47	30.12.11	04.52	220KV KANJHAWALA – NAJAFGARH CKT.	30.12.11	12.20	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT NAJAFGARH.
48	30.12.11	05.10	220KV BAWANA – NAJAFGARH CKT	30.12.11	05.20	CKT. TRIPPED ON DIST PROT `A` PHASE ZONE-I AT BAWANA AND ON DIST PROT `B` PHASE ZONE-I, 186 AT NAJAFGARH.
49	30.12.11	07.21	220KV BAWANA – NAJAFGARH CKT	30.12.11	19.19	SHUTDOWN FOR PETROLLING THE CKT. BY LINE MTC. STAFF
50	30.12.11	07.06	220KV BAWANA – ROHINI CKT-I	30.12.11	07.15	CKT. TRIPPED ON DIST PROT `A` PHASE AT BAWANA AND ON DIST PROT `A` PHASE, 21A, 186A&B AT ROHINI.
51	30.12.11	07.28	220KV BAWANA – ROHINI CKT-I	30.12.11	19.16	CKT. TRIPPED ON DIST PROT `C` PHASE, 186A&B AT BAWANA
52	30.12.11	07.51	220KV BAWANA – KANJHAWALA CKT.	30.12.11	07.57	CKT. TRIPPED ON DIST PROT `C` PHASE ZONE-I AT BAWANA. NO TRIPPING AT KANJHAWALA
53	31.12.11	00.20	220KV BAMNAULI – NARAINA CKT-II	31.12.11	00.44	CKT. TRIPPED ON DIST PROT, AUTO RECLOSE LOCK OUT, 86BC AT NARAINA. NO TRIPPING AT BAMNAULI
54	31.12.11	00.25	220/66KV 160MVA PR. TR. AT RIDGE VALLEY	31.12.11	18.12	TR. TRIPPED ON 86A, 86B, OLTC BUCHLOZ.
55	31.12.11	04.12	220KV BAWANA – NAJAFGARH CKT.	31.12.11	09.43	CKT. TRIPPED ON DIST PROT RYB PHASE AT BAWANA
56	31.12.11	04.51	220KV BAWANA – KANJHAWALA CKT.	31.12.11	04.59	CKT. TRIPPED ON DIST PROT `C` PHASE ZONE-I AT BAWANA. NO TRIPPING AT KANJHAWALA.
57	31.12.11	07.13	220KV BAWANA – KANJHAWALA CKT.	31.12.11	08.18	CKT. TRIPPED ON DIST PROT `C` PHASE ZONE-I AT BAWANA. NO TRIPPING AT KANJHAWALA.
58	31.12.11	07.35	22/66KV 100MVA PR. TR-II AT KANJHAWALA	31.12.11	10.00	TR. TRIPPED ON LOW GAS PRESSURE.
59	31.12.11	07.57	400/220KV 315MVA ICT-IV AT BAMNAULI	31.12.11	13.06	ICT TRIPPED ON 186A&B, TRIP CKT. SUPERVISION `A` PHASE, 195, TRIP RELAY GROUP-B, 86B
60	31.12.11	10.00	66/11KV 20MVA PR. TR.-III AT NAJAFGARH	31.12.11	16.15	TR. TRIPPED ON 64RLV, 86, HV LV REF RELAY

## Details of trippings occurred in Delhi System in dense foggy weather on 20.12.2011.

The following trippings occurred in Delhi system on 20.12.2011 :

S. No	Name of the feeder/ Transformer tripped	Time of tripping in Hrs.	Time of Restoration in Hrs.	Relay indication
01	220kV Panipat – Narela Ckt-I	01.55	18.43	At Narela : Dist Prot ABC Phase Zone-I At Panipat : ckt tripped, relay indications not available. Ckt. Closed at 02.17hrs. but again tripped on same indication at 02.18hrs.
02	220kV Panipat – Narela Ckt-II	02.42	09.54	At Narela : Dist Prot ABC Phase Zone-I At Panipat : ckt tripped but relay indication are not available
03	220kV Panipat – Narela Ckt-III	02.30	18.43	At Narela : Dist Prot ABC Phase Zone-I At Panipat : ckt tripped but relay indication are not available Load normalized through 220kV DSIDC – Narela Ckt-I & II
04	220kV DSIDC – Narela Ckt-I & II	03.45	03.49	<b>At Narela :</b> DSIDC Ckt-I : Dist Prot 'C' Phase DSIDC Ckt-II : no tripping, CVT disappear (made off manually) At DSIDC Narela Ckt-I : Dist Prot 'B' Phase Zone-I, 86 Narela Ckt-II : Dist Prot 'A' Phase zone-II, 86. Ckt-I & II tried at 03.46hrs. Ckt-I did not hold and again tripped on Dist Prot 'C' Phase. Only Ckt-II could be closed at 03.46hrs. 220kV Bus Coupler made ON and load normalized at 03.47hrs.
05	220kV Mandola – Narela Ckt-I	03.34	03.46	Ckt tripped on Dist Prot 'ABC' Phase Zone-I at Narela and on Dist Prot 'B' Phase Zone-I at Mandola.
06	220kV DSIDC – Narela Ckt-II	04.17	13.56	At Narela : no tripping At DSIDC : Dist Prot 'A' Phase, Zone-1, 86 Ckt tried to close at 05.52hrs. but did not hold and tripped on Dist Prot 'A' Phase.
07	220kV Mandola – Narela Ckt-I & II	04.48	05.34	<b>At Mandola</b> Narela Ckt-I : Dist Prot 'B' Ph zone-I, 86, RYB, 186 Narela Ckt-II:Dist Prot 'B'Ph zone-II, 86, RYB, 186 <b>At Narela</b> Mandola Ckt-I : Dist Prot ABC' Phase, 86 Mandola Ckt-II : No tripping Ckt-I & II charged at 05.32hrs. and 05.34hrs. respectively.
08	220kV Bawana – Rohini Ckt-I	03.07	05.36	<b>At Bawana</b> : 186A, B, 'B' Phase <b>At Rohini</b> : Dist Prot 'A' Phase, 186A&B at Rohini. Ckt. tripped without indication at Bawana.
09	220kV Bawana – Rohini Ckt-II	02.42	11.10	<b>At Bawana</b> : Facia Auto Reclose Lock out, CB Trouble Alarm, 30D, 186A&B. Differential Zone 'F' Differential Zone-D 'ABC' Phase appeared on 220kV Bus at Bawana. <b>At Rohini : No Tripping</b> At 02.45Hrs, 220kV Bus coupler made on and load normalized through 220kV Bawana –Rohini Ckt-I. Ckt. Again tripped at 03.21hrs. on Dist Prot 'C' Phase, 186A&B at Rohini 220kV. 220kV Bawana – Rohini Ckt-II tried to close at 04.37hrs. but did not hold and tripped on Dist Prot 'C' Phase 186A&B at Bawana.

S. No	Name of the feeder/ Transformer tripped	Time of tripping in Hrs.	Time of Restoration in Hrs.	Relay indication
10	220kV Bawana – DSIDC Ckt-I & II	03.20	03.44	<b>At Bawana :</b> On 220kV DSIDC Ckt-I & II Facia : Dist Prot Auto reclose lock out, 21RX2, 21YX2, 21BX2, Dist 23Kms <b>At DSIDC :</b> Bawana Ckt-I : Dist Prot 'C' Phase, 86, Micromho, Bawana Ckt-II : Dist Prot 'A' Phase, 86, Micro mho Ckt-I & II Charged at 03.38hrs. and 03.44hrs. respectively from Bawana.
11	400kV Bawana – Abdullapur Ckt-I	03.20	03.29	<b>At Bawana :</b> Facia CBTC-1 faulty, Dist Prot 'B' Phase Zone-I, 295BC, 52XS, CVT Available <b>At Abdullapur :</b> no tripping.
12	220kV Bawana – Najafgarh Ckt.	03.26	10.19	<b>At Bawana :</b> Facia Dist Prot Auto reclose, 21XR1, 21XY1, 21XB1, Dist 3.52kms <b>At Najafgarh :</b> Ckt tried to close at 03.56hrs. but did not hold and tripped on same indication with dist. 3.97kms Ckt. Finally charged at 10.19hrs.
13	220kV Bawana – DSIDC Ckt-II	04.05	18.31	<b>At Bawana :</b> Facia Dist Prot auto reclose lock out Dist 0.58kms <b>At DSIDC :</b> Dist Prot 'A' Phase, 86 Ckt tried to close at 05.49hrs. from Bawana but did not hold and tripped on same indication with dist 1.17kms along with 220kV Bus coupler which tripped on Differential Zone 'F' Differential Zone-D 'ABC' Phase
14	220kV Bawana – DSIDC Ckt-I	05.13	05.50	<b>At Bawana :</b> Dist Prot Auto reclose, zone-I, group-I, Dist 2.29kms <b>At DSIDC :</b> Dist Prot 'C' Phase, 86
15	66kV Rohini – Rohini-IV Ckt-I & II	03.12	03.44	Ckt tripped on Dist Prot 'R&Y' Phase zone-I at Rohini 220kV
16	220kV BTPS – Mehrauli Ckt-II	04.43	05.26	At BTPS : 'B' Phase E/F At Mehrauli : Dist Prot 'B-N ABC Phase Zone-I Dist 13.7kms
17	220/33kV 100MVA Pr. Tx-II at Park Street	04.50	06.11	Tx tripped on over flux, 86A.
18	220kV Narela – Rohtak Road Ckt-II	06.38	07.03	At Narela : Dist Prot 'ABC' Phase, Dist 5.74kms At Rohtak Road : Not available
19	220kV Mandola – Narela Ckt-I	06.50	07.22	At Mandola : Dist Prot 'Y' Phase Zone-I At Narela : Dist Prot 'B' 12.28kms
20	222kV BTPS – Okhla Ckt-II	05.55	06.27	Ckt tripped on 'R' Phase E/F at BTPS and on Dist Prot ABC Phase Zone-I, Dist 3.73kms at Okhla. Load normalized through 220kV Bus Coupler through 220kV BTPS – Okhla Ckt-I
In addition to the above, the following trippings have also occurred				
21	220kV Mandola – Narela Ckt-I & II	11.34	12.50	At Mandola 220kV Narela Ckt-I & II : 85LO, 186A&B, 86BU At Narela : no tripping
22	220kV Mandola – Wazirabad Ckt-IV	11.50	12.15	At Mandola : No tripping At Wazirabad : General Trip RYB Phase, SOFT
23	220kV Wazirabad – Geeta Colony Ckt-II	11.52	12.33	At WAZirabad : General Trip Dist Prot RYB Ph. Zone-II, Dist 5.5kms At Geeta Colony : Dist Prot 'RYB' Phase Zone-II, Dist Prot 5.4kms
24	220kV Wazirabad – Kashmiri Gate Ckt-II	11.52	15.30	At Wazirabad : Dist Prot 'RYB' Phase Zone-I At Kashmiri Gate : No tripping

Flash reported in 'R' Phase Line isolator lamp of 220kV Bawana – DSIDC Ckt-II at Bawana. Flash also reported on 'Y' Phase I String of tension tower no. 223 of 220kV Bawana – DSIDC Ckt-II.

Load affected during the time is as under :-

Timing (Hrs.)		Load affected in MW		Name of the grid
From	To			
03.20	03.43	10		DSIDC
05.13	05.50	20		
04.17	05.55	26		Rohtak Road
04.45	05.34	66		Narela
02.42	02.45	21		Rohini
05.55	06.03	50		Okhla

**19.10 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH JANUARY -2012**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	02.01.12	07.46	220KV BTPS – MEHRAULI CKT-I	02.01.12	15.17	CKT. TRIPPED ON 'R' PHASE E/F AT BTPS AND ON DIST PROT 'A' PHASE, 86 AT MEHRAULI. CKT. TRIED TO CLOSE AT 08.20HRS. BUT DID NOT HOLD AND AGAIN TRIPPED ON DIST PROT 'A' PHASE ZONE-I AT MEHRAULI. LINE WAS PATROLLED AND NO FAULT OBSERVED. CKT. FINALLY CHARGED AT 15.17HRS.
02	05.01.12	00.58	VARIOUS TRIPPINGS IN DTL SYSTEM			DETAILED REPORT GIVEN BENEATH
03	05.01.12	23.01	220KV PANIPAT – NARELA CKT-I	05.01.12	23.19	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA. AUTO RECLOSE OPERATED AT PANIPAT
04	06.01.12	00.31	220KV PANIPAT – NARELA CKT-I	06.01.12	16.42	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT NARELA. RELAY INDICATIONS AT PANIPAT END ARE NOT AVAILABLE.
05	06.01.12	00.59	220KV BTPS – MEHRAULI CKT-I & II	06.01.12	01.40	THE CKTS TRIPPED ON FOLLOWING INDICATIONS :- AT BTPS 220KV MEHRAULI CKT-I : 186, 30G, 30H, 30A, 86X1, 86X2 220KV MEHRAULI CKT-II : 186, 30G, 30C, 86X1, 86X2 AT MEHRAULI : 220KV BTPS CKT-I : DIST PROT 'A' PHASE ZONE-I, 186, 86 220KV BTPS CKT-II : DIST PROT 'ABC' PHASE ZONE-I, 186 CKT-I & II CHARGED AT 01.30HRS. AND 01.40HRS RESPECTIVELY FROM BTPS.
06	06.01.12	03.23	220KV BTPS – MEHRAULI CKT-II	06.01.12	20.48	CKT. TRIPPED ON 30G, 30B, 186, 86X1, 86X2 AT MEHRAULI. EARTH WIRE REPORTED TO BE BROKEN NEAR PLOT NO.162, SULTANPUR METRO STATION.
07	06.01.12	22.25	220/33KV 100MVA PR. TR.-II AT IP	06.01.12	02.50	TR. TRIPPED ON O/C 'Y' PHASE AS 'Y' PHASE CONDUCTOR OF BAY-14 (100MVA TR-II) AND JUMPER OF 33KV BAY-25 (IP - KILOKARI) SNAPPED

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
08	06.01.12	23.15	220/33KV 100MVA PR. TR.-III AT IP	07.01.12	02.15	TR. TRIPPED AS 'Y' PHASE CONDUCTOR OF BAY-14 AND JUMPER OF 33KV BAY-25 SNAPPED
09	06.01.12	19.35	400KV BAWANA – MUNDKA CKT-I	06.01.12	20.50	CB-42052 OF 400KV BAWANA – MUNDKA CKT-I TRIPPED ON POLE DISCREPANCY AT MUNDKA. CKT. REMAINED CHARGED THROUGH CB-41952.
10	06.01.12	22.31	220KV MANDOLA – WAZIRABAD CKT-IV	07.01.12	16.33	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-III, SOTF AT WAZIRABAD AND ON DIST PROT ZONE-I AT MANDOLA.
11	06.01.12	22.35	220KV PRAGATI – SARITA VIHAR CKT.	07.01.12	02.33	CKT. TRIPPED ON POLE DISCREPANCY AT SARITA VIHAR END. CKT. TRIED TO CLOSE AT 23.45HRS. BUT DID NOT HOLD AND COULD BE CHARGED AT 02.30HRS. ON 07.01.2012
12	07.01.12	06.03	220KV BAMNAULI – NAJAFGARH CKT-I	07.01.12	06.45	CKT. TRIPPED ON POLE DISCREPANCY, 186A&B AT BAMNAULI. CKT. DID NOT TRIP AT NAJAFGARH.
13	07.01.12	07.04	400KV BAWANA – MUNDKA CKT-I	07.01.12	12.04	CB-42052 OF THE CKT. TRIPPED ON POLE DISCREPANCY AT MUNDKA END. CKT. REMAINED CHARGED THROUGH CB-41952
14	07.01.12	07.45	220KV BAMNAULI – NAJAFGARH CKT-I	07.01.12	12.14	CKT. TRIPPED ON POLE DISCREPANCY AT NAJAFGARH. NO TRIPPING AT BAMNAULI.
15	07.01.12	16.29	220/33KV 100MVA PR. TR -III AT SHALIMAR BAGH	07.01.12	18.40	TR. TRIPPED ON 86, 87, LVREF ALONG WITH 33KV I/C-III WHICH TRIPPED ON 86
16	10.01.12	07.52	220KV WAZIRABAD – GEETA COLONY CKT-II	10.01.12	08.10	CKT. TRIPPED PM 596X, 30E AT GEETA COLONY. NO TRIPPING AT WAZIRABAD. 220KV BUS BAR PROTECTION OPERATED ON 220KV BUS-II AT GEETA COLONY.
17	10.01.12	07.52	220KV GEETA COLONY – PATPARGANJ CKT-II	10.01.12	08.10	CKT. TRIPPED PM 396X, 30E AT GEETA COLONY. NO TRIPPING AT PATPARGANJ. 220KV BUS BAR PROTECTION OPERATED ON 220KV BUS-II AT GEETA COLONY.
18	10.01.12	07.52	220/33KV 100MVA PR. TR -II AT GEETA COLONY	10.01.12	08.10	TR. TRIPPED ON 796X, 30E ALONG WITH 33KV I/C-II WHICH TRIPPED ON INTER TRIPPING. 220KV BUS COUPLER ALSO TRIPPED ON 196XB, 30E. 220KV BUS BAR PROTECTION OPERATED ON 220KV BUS-II AT GEETA COLONY.
19	10.01.12	07.52	220KV MANDOLA – WAZIRABAD CKT-IV	10.01.12	08.13	CKT. TRIPPED ON SOTF AT WAZIRABAD. NO TRIPPING AT MANDOLA.
20	10.01.12	09.42	220KV BAWANA – ROHINI CKT-I	10.01.12	09.47	CKT. TRIPPED ON LOW AIR PRESSURE AT BAWANA. NO TRIPPING AT ROHINI.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
21	15.01.12	13.36	220KV WAZIRABAD – KASHMIRI GATE CKT-I	15.01.12	14.47	CKT. TRIPPED ON DIST PROT 'RYB' PHASE ZONE-I AT WAZIRABAD. NO TRIPPING AT KASHMIRI GATE.
22	16.01.12	04.01	400KV JHAJJAR – MUNDKA CKT-I	16.01.12	07.30	BOTH CB TRIPPED ON 86A&B, PANEL-I DIRECT TRIP AT MUNDKA. RELAY INDICATION AT JHAJJAR END ARE NOT AVAILABLE. CKT. REMAINED UNCHARGED UPTO 07.30HRS. DUE TO HIGH VOLTAGE AND AS PER INSTRUCTION OF NRLDC. CKT CLOSED AT 07.30HRS.
23	16.01.12	04.44	66/11KV 20MVA PR. TR.-II AT PAPPANKALAN-I	17.01.12	18.40	TR. TRIPPED ON 86, 87BC, 64RLV, E/F ALONG WITH 11KV I/C-II WHICH TRIPPED WITHOUT INDICATION. CABLE END BOX BURNT AND LA DAMAGED.
24	16.01.12	04.54	220KV BAWANA – ROHINI CKT-II	16.01.12	18.26	CKT. TRIPPED ON DIST PROT 'B' PHASE AT BAWANA. NO TRIPPING AT ROHINI. CKT. TRIED TO CLOSE AT 05.12HRS. BUT DID NOT HOLD AND TRIPPED ON SOTF, 186A&B 'Y' PHASE LA BLAST AT 220KV ROHINI.
25	17.01.12	09.15	220KV KANJHAWALA – NAJAFGARH CKT.	17.01.12	19.19	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I, 186 AT NAJAFGARH. 220KV BUS COUPLER TRIPPED AT KANJHAWALA.
26	17.01.12	09.15	220KV BAWANA – NAJAFGARH CKT.	17.01.12	09.28	CKT. TRIPPED ON 186, 21XR1, 21XY1, 21XR2, 21XYZ, 21XB2 AT BAWANA AND ON DIST PROT 'ABC' PHASE ZONE-I AT NAJAFGARH.
27	18.01.12	05.16	220KV BAMNAULI – NARAINA CKT-I & II	18.01.12	06.22	BOTH CKT. TRIPPED ON A/R/L, 186A&B AT NARAINA. NO TRIPPING AT BAMNAULI. 220KV BUS DIFFERENTIAL OPERATED AT NARAINA. CKT-I & II CHARGED AT 06.40HRS. AND 06.22HRS. RESPECTIVELY.
28	18.01.12	05.16	220/33KV 100MVA PR. TR.-III AT NARAINA	18.01.12	06.26	TR. TRIPPED WITHOUT INDICATION. 220KV BUS DIFFERENTIAL OPERATED AT NARAINA.
29	18.01.12	05.56	220KV NARAINA – RIDGE VALLEY CKT.	18.01.12	06.42	CKT. TRIPPED WITHOUT INDICATION AT NARAINA. NO TRIPPING AT RIDGE VALLEY. 220KV BUS DIFFERENTIAL OPERATED AT NARAINA.
30	18.01.12	08.00	220KV GEETA COLONY – PATPARGANJ CKT-II	18.01.12	08.46	AT GEETA COLONY, CKT. TRIPPED ON DIST PROT. ZONE-II, 3-ΦTRIP. AT PATPARGANJ, CKT. TRIPPED ON ZONE-II, 3-ΦTRIP, 186
31	19.01.12	22.53	220KV BAMNAULI – NARAINA CKT-II	19.01.12	23.05	CKT. TRIPPED ON 96, 86B AT NARAINA DUE TO OPERATION OF BUS BAR PROTECTION AT NARAINA. NO TRIPPING AT BAMNAULI
32	19.01.12	22.53	220/33KV 100MVA PR. TR.-III AT NARAINA	19.01.12	23.05	TR. TRIPPED WITHOUT INDICATION DUE TO OPERATION OF BUS BAR PROTECTION AT NARAINA.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
33	19.01.12	22.53	220KV NARAINA – RIDGE VALLEY CKT.	20.01.12	07.50	CKT. TRIPPED WITHOUT INDICATION AT NARAINA. DUE TO OPERATION OF BUS BAR PROTECTION AT NARAINA. NO TRIPPING AT RIDGE VALLEY.
34	20.01.12	11.22	220KV BTPS – NOIDA – GAZIPUR CKT.	20.01.12	14.25	CKT. TRIPPED ON E/F AT BTPS. NO TRIPPING AT GAZIPUR
35	20.01.12	14.48	220KV MAHARANI BAGH – PRAGATI CKT.	20.01.12	15.28	CKT. TRIPPED ON POLE DISCREPANCY 'R&Y' PHASE AT MAHARANI BAGH. NO TRIPPING AT PRAGATI.
36	20.01.12	17.35	400/220KV 315MVA ICT-II & II AT BAMNAULI.	20.01.12	19.46	ICT-II TRIPPED ON AUTO RECLOSE, 186A&B, TRIP GROUP-I, 86A-1, TRIP GROUP-B XB86-B-1 AND ICT-IV TRIPPED ON AUTO RECLOSE, 186A&B ALONG WITH 220KV I/C-II & IV WHICH TRIPPED ON INTER TRIPPING. BOTH ICT CHARGED AT 19.46HRS.
37	20.01.12	17.35	220KV BAMNAULI – PAPPANKALAN-II CKT-I & II	20.01.12	18.29	THE FOLLOWING TRIPPINGS OCCURRED :- AT BAMNAULI 220KV PAPPANKALAN-II CKT-I : NO TRIPPING. 220KV PAPPANKALAN-II CKT-II : DIST PROT 'A&B' PHASE  AT PAPPANKALAN-II : 220KV BAMNAULI CKT-I : 86, DIST PROT. 220KV BAMNAULI CKT-II : NO TRIPPING CKT-I & II CHARGED AT 17.53HRS. AND 18.29HRS. RESPECTIVELY.
38	20.01.12	17.35	220KV BAMNAULI – NAJAFGARH CKT-I	20.01.12	11.55	CKT. TRIPPED ON DIST PROT 'A&B' PHASE AT BAMNAULI AND ON DIST PROT ZONE-I, 186 AT NAJAFGARH.
39	20.01.12	17.35	220KV BAMNAULI – NARAINA CKT-I & II	20.01.12	17.50	CKT-I TRIPPED ON DIRECTIONAL E/F, 67N, 186XYB AND CKT-II TRIPPED ON DIST PROT 86A, 86B, 86, 186X, 186B, AUTO RECLOSE AT NARAINA.
40	20.01.12	17.35	220KV BAMNAULI – PAPPANKALAN-I CKT-I & II	20.01.12	17.45	THE FOLLOWING TRIPPINGS OCCURRED : AT PAPPANKALAN-I : 220KV BAMNAULI CKT-I : DIRECTIONAL E/F, 67N, 186XA, 186XB, ABB, AUTO RECLOSE, D/P. VT FUSE FAIL 220KV BAMNAULI CKT-I : DIST PROT, 86A, 86B, AUTO RECLOSE, 186A&B, VT FUSE FAIL. NO TRIPPING AT BAMNAULI ON BOTH CIRCUITS. CKT-I & II CHARGED AT 19.11HRS. AND 17.45HRS. RESPECTIVELY.
41	20.01.12	17.35	220/66KV 100MVA PR. TR.-I & II AT PAPPANKALAN-I	20.01.12	17.58	TR.-I TRIPPED ON PROTECTION GROUP-B, 86B, 51N, E/F, O/C AND TR.-II TRIPPED ON 51N, E/F, 86B, PROTECTION GROUP-B. 66KV I/C-II ALSO TRIPPED ON 86. BOTH TRANSFORMERS CHARGED AT 17.58HRS.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
42	20.01.12	17.35	220KV BAMNAULI – DIAL CKT-I & II	22.01.12	11.03	THE FOLLOWING TRIPINGS OCCURRED :- AT DIAL : 220KV BAMNAULI CKT-I : RLL FUSE FAIL, RED COMMUNICATION 52, CVT AVAILABLE. 220KV BAMNAULI CKT-II : BREAKER PROTECTION INDICATION, 52 CB TROUBLE ALARM, CVT AVAILABLE. NO TRIPPING AT BAMNAULI. DIAL LOAD CHANGED OVER TO MEHRAULI AT 17.40HRS.
43	20.01.12	17.35	220/66KV 100MVA PR. TR.-I AT PAPPANKALAN-II	20.01.12	18.29	TR. TRIPPED ON 86, O/C
44	20.01.12	17.35	220/66KV 160MVA PR. TR.-II AT RIDGE VALLEY	20.01.12	17.50	TR. TRIPPED ON 86A&B, GENERAL TRIP ALONG WITH 66KV I/C-II WHICH TRIPPED ON 86A&B
45	21.01.12	14.58	220KV MANDOLA – NARELA CKT-I & II	21.01.12	16.17	MAL OPERATION OF SPECIAL PROTECTION SCHEME AT MANDOLA. NO TRIPPING AT NARELA.
46	21.01.12	14.58	220KV MANDOLA – GOPALPUR CKT-II	21.01.12	16.09	MAL OPERATION OF SPECIAL PROTECTION SCHEME AT MANDOLA. NO TRIPPING AT GOPALPUR
47	21.01.12	14.58	220/33KV 100MVA PR. TR.-I AT GOPALPUR	21.01.12	15.33	TR. TRIPPED WITHOUT INDICATION.
48	26.01.12	03.53	220/33KV 100MVA PR. TR.-I & II AT GEETA COLONY	26.01.12	04.08	TR.-I & II TRIPPED ON 86, 30E. 33KV I/C-I TRIPPED ON 30, O/C AND 33KV I/C-II TRIPPED ON 30, O/C, E/F.
49	26.01.12	23.34	66/11KV 20MVA PR. TR.-I AT VASANT KUNJ	29.01.12	05.47	TR. TRIPPED ON 86, 87, O/C, HV LV REF ALONG WITH 11KV I/C-I WHICH TRIPPED ON INTER TRIPPING.
50	31.01.12	12.19	220KV PANIPAT – NARELA CKT-I	31.01.12	12.28	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I, 186 AT NARELA. NO TRIPPING AT PANIPAT.

**Subject : Preliminary report on Trippings on 05.01.2012 in Delhi system in dense foggy weather condition.**

The following trippings occurred in Delhi system on 05.01.2012 from 00:58Hrs.

(a)

**400 kV Bamnauli Sub station:**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	400/220kV 315MVA ICT-IV	186A&B, 52AX, 30W Oil Level, 86B1, GroupB	00:58	15:19	
2	220kV DIAL Ckt-I	B-Φ, 186A&B	2:39	2:54	
3	220kV DIAL Ckt-I	C-Φ, 186A&B	3:06	12:00	Tried at 5:23 Hrs. but tripped on B-Φ, 186A&B. No fault located
4	220kV DIAL Ckt-II	A-Φ, 186A&B	5:15	5:21	
5	220kV DIAL Ckt-II	B-Φ, 186A&B	5:29	5:56	
6	220kV DIAL Ckt-II	A-Φ, 186A&B	6:18	7:32	

**(b) 400 kV Bawana Sub station:--**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Rohini Ckt-I	Dist. Prot. A-Φ, 186A&B	2:00	13:48	Tried at 3:16Hrs. but tripped on same indication. No fault located
2	220kV Rohini Ckt-II	Dist. Prot. C-Φ, 186A&B	2:00	3:17	
3	220kV DSIDC Bawana Ckt-I	Dist. Prot. C-Φ, Zone-I	2:21	3:19	
4	220kV DSIDC Bawana Ckt-II	Dist. Prot. A-Φ, Zone-I	3:04	3:24	
5	220kV Najafgarh Ckt-II	Dist. Prot. A-Φ, Zone-I	3:24	18:22	
6	220kV DSIDC Bawana Ckt-I	Dist. Prot. C-Φ, Zone-I	3:27	12:04	
7	220kV DSIDC Bawana Ckt-II	Dist. Prot. A-Φ, Zone-I	3:42	10:51	
8	220kV Rohini Ckt-II	Dist. Prot. C-Φ, 186A&B	4:00	10:46	
9	220kV Kanjhawala Ckt	Dist. Prot. C-Φ, Zone-I	4:44	9:55	

**(c) 220kV NARELA S/STN**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Mandola Ckt-I	Dist. Prot. Zone-I, 186	02:06	02:21	
2	220kV Mandola Ckt-II	Dist. Prot. Zone-II, 186	02:51	20:05	
3	220kV Mandola Ckt-I	Supply failed	03:32	20:05	
4	220kV DSIDC Bawana Ckt-I	Supply failed	03:42	12:06	
5	220kV DSIDC Bawana Ckt-II	Supply failed	03:42	10:51	
6	220kV Panipat Ckt-I	Dist. Prot. Zone-I, 3-Φ trip, 186	4:26	4:50	
4	220kV Rohtak Road Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	4:51	4:58	
7	220kV Panipat Ckt-II	Dist. Prot. Zone-I, 3-Φ trip, 186	5:03	5:11	
8	220kV Panipat Ckt-I	Dist. Prot. Zone-I, 3-Φ trip, 186	5:06	5:11	
9	220kV Rohtak Road Ckt-I	186	5:17	5:22	
10	66kV Bhalswa Ckt-I&II	Made Off	3:46	11:30	
11	66kV Badli Ckt-I&II	Made Off	3:46	11:30	
12	66/33kV I/C	Made Off	3:46	5:30	
13	220kV Rohtak Road Ckt-I	186	5:24	7:20	
14	220kV Panipat Ckt-III	Dist. Prot. Zone-I, 3-Φ trip	5:49	6:58	
15	220kV Panipat Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	5:57	6:58	
16	220kV Panipat Ckt-I	Dist. Prot. Zone-I, 3-Φ trip	6:20	20:48	
17	220kV Rohtak Road Ckt-I	186	7:36	7:45	
18	220kV Rohtak Road Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	7:40	7:44	

**(d) 220kV GEETA COLONY**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Wazirabad Ckt-II	Main-I, Main-II, Dist. Prot. Zone-I, 3-Φ trip	6:55	7:14	
2	220kV Wazirabad Ckt-I	Dist. Prot. Zone-I, 3-Φ trip	6:58	7:09	
3	220kV Wazirabad Ckt-I	Dist. Prot. Zone-I, 3-Φ trip	7:39	7:55	
4	220kV Wazirabad Ckt-I	Dist. Prot. Zone-I, 3-Φ trip	7:35	7:53	
5	220kV Patparganj Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	7:58	14:06	
6	220kV Wazirabad Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	8:22	15:26 06.01.12	
7	220/33kV 100MVA Tx-I	86, 30E, E/F	8:22	12:55	
8	33kV I/C-I	Inter tripping, 30 Auto Trip Relay	8:22	12:55	
9	33kV Kailash Nagar Ckt-I	3-Φ trip, SOTF	9:26	21:22	
10	22kV Patparganj Ckt-I	Made off manually	7:45	12:30	To control loading of Maharanibagh – Pragati Ckt

(e) **220kV Wazirabad Sub station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, RXME-18, SOTF	5:05	5:12	
2	220kV Gopalpur Ckt-I	Dist. Prot. Zone-I, B-Φ, ZM-II & III, L3 Neutral, 86	5:05	5:29	
3	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, RXME-18, SOTF	6:04	6:08	
4	220kV Mandola Ckt-IV	RXME-18, SOTF	6:53	7:00	
5	220kV Gopalpur Ckt	RXME-18, SOTF	6:53	7:00	
6	220kV Geeta Colony Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	6:58	7:14	
7	220kV Gopalpur Ckt	Dist. Prot. Zone-I, 3-Φ trip	7:21	8:18	
8	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, 3-Φ trip, RXME-18, SOTF	7:21	7:24	
9	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, 3-Φ trip, RXME-18, SOTF	7:39	7:51	
10	220kV Geeta Colony Ckt-I	Dist. Prot. Zone-I, 3-Φ trip	7:35	15:17 06.01.12	Tried at 7:50 hrs. but did not hold. Again tripped on same indication OFC snapped and touched Railway track near Kailash Nagar B/W T. No. 351-352
11	220kV Geeta Colony Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	7:39	15:17 06.01.12	
12	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, 3-Φ trip, RXME-18, SOTF	8:02	8:03	
13	220kV Gopalpur Ckt	RXME-18, 3-Φ trip, Dist. Prot. Zone-3	8:24	11:19	
14	220/66kV 100MVA Tx-I	E/F	8:24	9:03	
15	220/66kV 100MVA Tx-II	E/F	8:24	8:40	
16	220/66kV 100MVA Tx-III	E/F	8:24	8:59	
17	220kV Mandola Ckt-IV	Dist. Prot. Zone-I, 3-Φ trip	8:32	14:20	
18	66kV Yamuna Vihar Ckt-I&II	Made off Manually	8:35	9:04	
19	66kV Shastri Park Ckt-I&II	Made off Manually	8:35	9:04	

(f) **220kV Gopalpur sub station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Mandola Ckt-II	Dist. Prot. Zone-I, 3-Φ trip, Main-I&II	2:39	16:53	
2	220kV Mandola Ckt-I	Dist. Prot. Zone-I, 3-Φ trip, Main-I&II	2:55	16:53	
3	66kV Jahangirpuri Ckt-I&II	Without indication	3:12	3:28	
4	220/33kV 100MVA Tx-I	Without indication	2:39	2:58	
5	220kV Wazirabad Ckt	E/F	5:05	11:19	
6	66kV Jahangirpuri Ckt-I&II	Without indication	5:41	11:47	

(g) **BTPS**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Mehrauli Ckt-I	E/F	1:36	1:47	
2	220kV Mehrauli Ckt-I	E/F	1:59	17:32	No fault found

(h) **220kV Mehrauli Sub station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV DIAL Ckt-I	Dist. Prot. Zone-I, C-Φ	0:58	00:34 06.01.12	Tried at 1:50 Hrs. but Air leakage observed in CB and CB got Lockout position at 1:55Hrs. Flash observed in Disc
2	220kV DIAL Ckt-II	Made Off Manually	0:58	1:32	B/C closed at 1:10Hrs.
3	220kV BTPS Ckt-I	Dist. Prot. Zone-I, A-Φ	1:36	1:47	
4	220/66kV 100MVA Tx-I & III	Manually made Off	2:10	2:57	
5	220kV BTPS Ckt-I	Dist. Prot. Zone-I, A-Φ	2:20	17:30	
6	66kV Palam Ckt	E/F, Backup Prot.	3:45	15:38	
7	66kV IOC Ckt	86, Dist. Prot.	3:45	13:23 06.01.12	
8	66kV Vasantkunj D-I Ckt	E/F	3:49	16:17 06.01.12	
9	66kV I/C-II	E/F	4:00	6:45	
10	220kV Vasant Kunj Ckt-I	195CB, Zone-3, 186 A&B, A/R	4:10	4:23	
11	220kV Vasant Kunj Ckt-I	195CB, Zone-3, 186A&B, A/R	4:25	18:02	
12	66kV Malviya Nagar Ckt-I & II	Manually made Off	5:15	9:02	
13	66/11kV 20MVA Tx-I	Manually made Off	5:15	17:33	
14	66kV Vasantkunj C-Blk Ckt-I&II	Manually made Off	6:40	9:02	To reduce loading due to sparking in 220kV BTPS Ckt-II
15	66kV CDOT Ckt	Manually made Off	9:02	10:20	

(i) **400kV Mandola sub station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Narela Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	2:05	2:22	
2	220kV Gopalpur Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	2:23	16:53	Tried at 9:13Hrs but tripped on same indication
3	220kV Narela Ckt-II	Dist. Prot. Zone-I, 3-Φ trip	2:51	20:05	
4	220kV Narela Ckt-I	Dist. Prot. Zone-I, 3-Φ trip, 186A&B	3:34	20:05	
5	220kV Wazirabad Ckt-IV	Dist. Prot. Zone-2, 3-Φ trip	8:02	8:23	
6	220kV Wazirabad Ckt-IV	Dist. Prot. Zone-2, 3-Φ trip	8:31	14:20	

(j) **220kV Shalimarbagh S/Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Rohini Ckt-I	Dist. Prot. Zone-I, A-Φ, 186A&B	6:19	08:32 06.01.12	Tried at 6:25 Hrs. but tripped on SOTF. Y-Φ Conductor snapped B/W T. No. 7-8
2	220kV Bawana Ckt-I	Dist. Prot. Zone-I, C-Φ, 186A&B	6:57	13:53	

(k) **220kV Rohini S/Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Bawana Ckt-II	Supply failed	2:00	10:47	
2	220kV Bawana Ckt-I	Dist. Prot. A-Φ, 186 A&B	2:00	13:48	
3	66kV RG-4 Ckt-I&II	3-Φ, Zone-I, Dist. Prot.	2:09	2:49	
4	220kV Shalimarbagh Ckt-I	Dist. Prot. A&B-Φ,186 A&B	6:19	8:32 (06.01.12)	Y-Φ Conductor snapped B/W T. No. 7-8
5	66kV RG-4 Ckt-I&II	Made off manually	7:03	8:54	
6	66kV RG-24 Ckt	Made off manually	8:53	11:10	

(l) **220kV Patparganj S/Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV IP Ckt-I & II	CVT failed	6:58	7:10	
2	220kV Geeta Colony Ckt-I	186	6:58	7:12	
3	220kV Geeta Colony Ckt-II	186	6:58	7:16	
4	220kV Geeta Colony Ckt-I	186	7:39	7:55	
5	220kV Geeta Colony Ckt-II	186	7:39	14:06	
6	220kV Geeta Colony Ckt-I	CVT failed	8:22	12:30	
7	220kV IP Ckt-I	Manually made off	8:35	8:42	
8	220kV IP Ckt-II	Manually made off	8:35	12:17	

(m) **RPH Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	33kV Bay 1,2,5,6,13,18	Under Frequency Relay	6:01	7:50	UFR operated due to islanding of RPH

(n) **220kV Kanjhawala S/Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Bawana Ckt	Supply failed	4:44	9:58	
2	220kV B/C	E/F	4:39	10:04	

(o) **220kV DIAL S/Station**

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
1	220kV Mehrauli Ckt-I	RED Main-I, 3-Φ trip, RED Main-I Prot. Trip, RED Commn. Fail, RECGE-TR-BFR, REL NDGND	00:58	1:33	
2	220kV Mehrauli Ckt-II	REL MAIN-I, B-Φ TRIP, MAIN-II PROT. TRIP, red MAIN-I 3-Φ TRIP, RECGF-TR-BFR, ZONE-I. COMMN. FAIL	00:58	16:37	
3	220kV Bamnauli Ckt-I	REL FUSE FAIL, RED COMM FAIL, 52 CB POSITION INDICATION, RECGE-TR-BFR-Y MAIN-I&II, REL MAIN-II- Y-Φ TRIP PROT. TRIP. RED MAIN-I- Y-Φ TRIP PROT. TRIP, CARRIER SENT	2:38	3:06	

S. No	Name of the feeder/ Transformer tripped	Relay indications	Time of tripping in Hrs.	Time of Restoration in Hrs.	Remarks
4	220kV Bamnauli Ckt-II	52 CB POSITION INDICATION, RECGETRBFR RMAIN-I, REL MAIN-II R-Φ TRIP, PROT TRIP, CARRIER SENT, 52 CB TROUBLE ALARM, R-Φ FAULTY, COMMN FAILED, ZONE-I	5:01	6:02	
5	66kV DIAL Ckt-I	REL EXTERNAL 86 A TRIP, TRS M2 GROUPB OPERATED, REC 86 B TRIP	2:08	1:09 06.01.12	
6	220kV Bamnauli Ckt-II	52 CB POSITION INDICATION, RECGETRBFR RMAIN-I, REL MAIN-II R-Φ TRIP, PROT TRIP, CARRIER SENT, 52 CB TROUBLE ALARM, R-Φ FAULTY, COMMN FAILED, ZONE-I	6:18	12:12	

**Details of tripping of units of generating stations:**

S. No	Name of the station	Unit no.	Time of tripping in Hrs.	Time of Restoration in Hrs.	Generation prior to the tripping in MW	Remarks
1	RPH	2	6:02	12:30	49	
2	PPCL	2	6:02	8:04	101	Due to tripping of 220kV Wazirabad Ckt-I&II, RPH Unit#2 (unit#1 was under S/D) & Pragati #2 with STG islanded from the grid and collapsed.
		STG	6:02	12:06	110	

Approximate Load affected during the incident considering the previous day load is as under :-

Name of the Grid	Time (Hrs)		Load in MW
	From	To	
Subzimandi	05:05	06:00	25
	6:00	7:00	45
	7:00	8:00	60
	8:00	9:00	65
	9:00	10:00	70
	10:00	11:00	80
	11:00	11:58	70
	12:00	12:30	40
DSIIDC Bawana	2:00	3:00	30
	3:00	4:00	25
	4:00	5:00	25
	5:00	6:00	25
	6:00	7:00	30
	7:00	8:00	35
IP	6:58	7:14	50
RPH	6:01	7:50	30
Kanjhawala	4:44	5:00	25
	5:00	6:00	30
	6:00	7:00	35
	7:00	8:00	40
	8:00	9:00	40
	9:00	9:58	45

Name of the Grid	Time (Hrs)		Load in MW
	From	To	
Gopalpur	2:39	3:00	50
	3:00	4:00	55
	4:00	5:00	60
	5:00	6:00	70
	6:00	7:00	75
	7:00	8:00	90
	8:00	9:00	110
	9:00	10:00	115
	10:00	11:00	120
	11:00	11:58	110
Geeta Colony	6:58	7:00	30
	7:00	8:00	35
	8:00	9:00	50
	9:00	10:00	60
	10:00	11:00	65
	11:00	12:00	65
	12:00	12:30	70
DIAL	6:00	7:00	17

**19.11 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH FEBRUARY – 2012**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	04.02.12	16.23	220KV GEETA COLONY – PATPARGANJ CKT-II	04.02.12	17.52	CKT. TRIPPED ON DIST PROT 'ABC' PHASE ZONE-I AT PATPARGANJ AND ON DIST PROT 'ABC' PHASE ZONE-II, 86, 30E, 27RYB AT GEETA COLONY
02	07.02.12	15.15	400/220KV 315MVA ICT-IV AT BAMNAULI	07.02.12	16.00	ICT TRIPPED ON 186A&B, 86B-I ALONG WITH 220KV I/C-IV WHICH TRIPPED ON INTER TRIPPING.
03	07.02.12	15.15	220KV BAMNAULI – DIAL CKT-I	07.02.12	19.40	CKT. TRIPPED ON 186A&B AT BAMNAULI AND ON RED MAIN-I, PROTEC. TRIP, REL RED FUSE FAIL, 52, BR POSITIN INDICATION, RECGE TRIP, BPR 'R' PHASE, MAIN-I & II, RED MAIN PHASE PROT. TRIP, REL & RED 'R' PHASE, FAULTY DIFFERENTIAL ZONE-I PROT. AT DIAL. CONDUCTOR FOUND DAMAGE BETWEEN TOWER NO.94-95.
04	08.02.12	13.59	220KV KANJHAWALA – NAJAFGARH CKT.	20.02.12	19.35	CKT. TRIPPED ON E/F, 186 AT NAJAFGARH. NO TRIPPING AT KANJHAWALA. AIR LEAKAGE IN ABB MAKE ABCB BREAKER. BREAKER REPLACED WITH SF6 CGL BREAKER.
05	09.02.12	04.46	220/33KV 100MVA PR. TR.-II AT SUBZI MANDI	09.02.12	14.15	TR. TRIPPED ON 86, REFLV.
06	09.02.12	12.01	220KV GOPALPUR – SUBZI MANDI CKT-II	09.02.12	13.26	CKT. TRIPPED ON MAIN-I DIST PROT 'RYB' PHASE AND MAIN-II DIST PROT 'Y' PHASE ZONE-I AT GOPALPUR. NO TRIPPING AT SUBZI MANDI.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
07	09.02.12	11.33	220KV MAHARANI BAGH – PRAGATI CKT	09.02.12	12.00	CKT. TRIPPED ON POLE DISCREPANCY AT MAHARANI BAGH. 220KV PRAGATI – SARITA VIHAR CKT WAS UNDER PLANNED SHUT-DOWN. DUE TO THE TRIPPING OF 220KV PRAGATI – MAHARANI BAGH CKT, PRAGATI (UNIT-I) AND GT STATION ISLANDED FROM THE GRID AND COLLAPSED. THE DETAILED REPORT IS GIVEN BENEATH AT SR NO. A
08	09.02.12	14.20	220KV MAHARANI BAGH – PRAGATI CKT	09.02.12	16.14	CKT. TRIPPED ON POLE DISCREPANCY AT MAHARANI BAGH. NO TRIPPING AT PRAGATI.
09	10.02.12	11.30	220KV MEHRAULI – DIAL CKT-II	10.02.12	12.34	CKT. TRIPPED ON 186, DIFFERENTIAL 'R' PHASE. NO TRIPPING AT DIAL.
10	16.02.12	10.50	66/11KV 20MVA PR. TR-II AT DSIDC	16.02.12	18.27	TR. TRIPPED ON 86, DIFFERENTIAL ALONG WITH 11KV I/C-II WHICH TRIPPED ON INTER TRIPPING.
11	20.02.12	23.08	220/33KV 100MVA PR. TR.-IV AT OKHLA	21.02.12	18.30	TR. TRIPPED ON BUCHLOZ ALONG WITH 33KV I/C-III & IV. 33KV I/C-III TRIPPED ON 86, 51A AND 33KV I/C-IV TRIPPED ON 86LV, 80. 'R' PHASE BREAKER ISOLATOR OF 33KV EAST OF KAILASH CKT. BROKEN AT OKHLA.
12	23.02.12	12.40	66/11KV 20MVA PR. TR-II AT DSIDC BAWANA	23.02.12	18.15	TR. TRIPPED ON 86, 87.
13	23.02.12	15.38	66/11KV 20MVA PR. TR.-I AT SARITA VIHAR	23.02.12	17.28	TR. TRIPPED ON 30E, SPR, 86.
14	25.02.12	14.47	220/66KV 160MVA PR. TR. AT MUNDKA	25.02.12	16.13	TR. TRIPPED ON 86A&B ALONG WITH 66KV I/C WHICH TRIPPED ON 86.
15	26.02.12	10.52	220KV PRAGATI – IP CKT- II	26.02.12	11.30	CKT. TRIPPED ON ACTIVE GROUP-I, DIST PROT 'ABC' PHASE ZONE-II AT PRAGATI. NO TRIPPING AT IP. 'R' PHASE WAVE TRAP CONDUCTOR OF 220KV PATPARGANJ CKT-II BROKEN AT IP STATION YARD. DETAILED REPORT GIVEN BENEATH AT SR. NO. B
16	28.02.12	15.12	220KV MANDOLA – GOPALPUR CKT-II	28.02.12	15.34	CKT. TRIPPED ON DIST PROT 'RYB' PHASE, O/C ABC PHASE AT MANDOLA AND ON DIST PROT 'RYB' PHASE, ZONE-I AT GOPALPUR
17	28.02.12	16.57	220/33KV 100MVA PR. TR.-II AT MASJID MOTH	28.02.12	17.57	TR. TRIPPED ON DC-22 FAULTY.
18	28.02.12	21.49	220KV BTPS – MEHRAULI CKT-II	28.02.12	22.13	CKT. TRIPPED ON E/F AT BTPS AND ON DIST PROT 'ABC' PHASE ZONE-I, 186 AT MEHRAULI

**A) Report on trippings occurred in Delhi System at 11.33hrs. on 09.02.2012**

The following trippings occurred in Delhi system on 09.02.2012 :

S. No	Name of the feeder/ Transformer tripped	Time of tripping in Hrs.	Time of Restoration in Hrs.	Relay indication
01	220kV Maharani Bagh – Pragati Ckt	11.33	11.40	At Maharani Bagh : Pole Discrepancy At Pragati : No tripping
02	220/66kV 160MVA Pr. Tr-I & II at Pragati	11.33	11.43	Both transformer tripped on 86

Prior to the incident, Pragati Unit-1 and GT units were connected to the Grid through 220kV Pragati – Maharani Bagh Ckt. 220kV Bus coupler at Pragati was kept opened. 220kV Pragati – Sarita Vihar Ckt was under planned shut-down for over hauling of 220kV Circuit Breaker at Sarita Vihar. Due to the tripping of 220kV Maharani Bagh – Pragati Ckt, Pragati Unit-1 and GT Station islanded from the Grid and collapsed.

220kV Bus coupler made ON at Pragati at 11.40hrs. and supply normalized on Mandola side through 220kV Pragati – IP – Patparganj – Geeta Colony – Wazirabad – Mandola Double Ckt link.

The generating units affected due to tripping are as under :-

Name of the Station	Units no.	Generation prior to the incident	Connected load in MW	Time of tripping in Hrs.	Restoration time Hrs.
Pragati	1	104	--	11.33	13.04
GT	5	30	--	11.33	11.45
	6	31	--	11.33	11.47
	STG-3	20	--	11.33	13.25
Park Street		--	161		
	Total	185			

Unit-2, 3, 4, and STG-1 & 2 were out due to backing down of generation.

**Load relief through UFR operation**

Name of the S/Stn	Feeder Name	Tripping time	Restoration time	Load in MW
Parkstreet	66kV Shastri Park Ckt-I&II	11:33	11:40	47
	33kV Sharnkar Road	11:33	11:40	13
	33kV Prashad Nagar	11:33	11:40	10
	33kV Faiz Road Ckt-I&II	11:33	11:40	14
	33kV Motia Khan Ckt-II	11:33	11:40	5
	Total			89

**Load affected during the time is as under :-**

From	To	Load affected in MW	Name of the grid
11.33	11.40	137	Park Street
11.33	11.40	60	GT

## B) Report on trippings occurred in Delhi System at 10.52hrs. on 26.02.2012

The following trippings occurred in Delhi system on 26.02.2012 :

S. No	Name of the feeder/ Transformer tripped	Time of tripping in Hrs.	Time of Restoration in Hrs.	Relay indication
01	220kV Geeta Colony – Patparganj Ckt-II	10.52	11.01	At Patparganj : E/F At Geeta Colony : No tripping
02	220kV Pragati – I.P. Ckt. –I & II	10.52	11.36	At Pragati : Ckt. –II tripped on distance prot. Phase ABC 2.248KMs. At I.P. : Ckt. –I Tripped on 186
03	220kV Patparganj – I.P. Ckt. I & II	10.52	20.00	At Patparganj : Ckt. –II Tripped on O/C R phase, 186, 56T At I.P. : Ckt. –II, No tripping , conductor snapped on Wave trap
04	100MVA Pr. Tr. – III at I.P.	10.52	11.42	Tr. tripped on 186
05	100MVA IBT –II at RPH	10.52	11.36	Auto reclose block, 186 AB, 86ABC, 86T

RPH & Pragati units (#2 & STG) were connected to the grid through 220kV RPH – I.P. / I.P.Extn. – Patparganj – Geeta Colony – Wazirabad – Mandola link, 220kV Bus coupler at Pragati was open. Due to tripping of 220kV I.P. – Pragati Ckt. I & II generating complex namely RPH & Pragati (#2 & STG) got islanded from the grid. RPH #2 tripped during the incident. However, RPH #1 sustained and operated in islanded mode upto 11.40hrs. when 220kV Bus coupler at I.P. Extn. was made closed, in order to restore the load of I.P. , the running unit at RPH tripped also Patparganj load was normalized from Geeta Colony side at 11.01hrs.

The generating units affected due to tripping are as under :-

Name of the Station	Units no.	Generation prior to the incident	Time of tripping in Hrs.	Restoration time Hrs.
RPH	#1	38	11.40	13.42
	#2	49	10.52	13.02
Pragati	#2	100	10.52	11.53
	STG	111	10.52	12.48

**Load affected during the time is as under :-**

Timing (Hrs.)	Load affected in MW		Name of the grid / Bay
	From	To	
11.00	11.32	23	I.P.
10.57	11.10	7	BAY NO. 2 - (LAHORI GATE)
10.57	11.42	8	BAY NO. - 13 (G.B.PANT)
10.57	11.07	10	BAY NO. 5 & 6 (JAMA MASJID)
10.57	11.05	8	BAY NO. 18 - (TOWN HALL)
10.57	11.40	9	BAY NO. 12 (I.G.STADIUM)
10.57	11.09	12	BAY NO. 1 - (MOTIA KHAN)
11.45	11.58	10	BAY NO. 17 - (MINTO ROAD)
11.45	12.08	4	BAY NO. 16 - (FOUNTAIN)
11.45	11.53	12	BAY NO. 19 & 20 -(KAMLA MARKET)
10.57	11.10	125	PATPARGANJ 220KV

**19.12 DETAILS OF 400/220KV BREAKDOWN/TRIPPINGS OCCURRED IN DTL SYSTEM DURING THE MONTH MARCH -2012**

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
01	04.03.12	14.04	66/33KV 30MVA PR. TR.-I AT PARK STREET	05.03.12	12.57	TR. TRIPPED ON LBB PROTECTION, 95C, 86, OLTC BUCHLOZ
02	04.03.12	23.11	220/66KV 160MVA PR. TR-I & II AT PRAGATI	04.03.12	23.23	BOTH TRANSFORMERS TRIPPED ON OLTC, 30B, 30C, WIND. TEMP. HIGH, 86.
03	06.03.12	23.12	220KV BTPS – MEHRAULI CKT-II	07.03.12	13.50	CKT. TRIPPED ON 30G, E/F, 30A, O/C, 186 AUXILIARY RELAY, 86X1, 86X2 AT BTPS AND ON DIST PROT `ABC` PHASE ZONE- I, BACK UP PROTECTION AT MEHRAULI
04	08.03.12	09.38	220KV MANDOLA – GOPALPUR CKT-I	08.03.12	09.40	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT MANDOLA AND ON DIST PROT RYB PHASE ZONE-I AT GOPALPUR
05	10.03.12	14.41	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	10.03.12	20.20	TR. TRIPPED ON 86, 87 `Y` PHASE
06	12.03.12	16.55	33/11KV 16MVA PR. TR.-I AT SUBZI MANDI	12.03.12	20.19	TR. TRIPPED ON 86, 87 `R` PHASE. LV SIDE BUSING ALSO FLASHED.
07	13.03.12	04.01	400KV MUNDKA – JHAJJAR CKT-I	13.03.12	15.10	CKT. TRIPPED ON 86A&B AT MUNDKA AND ON OVER VOLTAGE AT JHAJJAR
08	13.03.12	17.37	220KV MANDOLA – GOPALPUR CKT-I & II	13.03.12	18.05	BOTH CKTS. TRIPPED ON 85LO, 186A, 186B, 86 AT MANDOLA. NO TRIPPING AT GOPALPUR CKT. TRIPPED DUE TO FAILURE OF 400KV HVDC DADRI – RIHAND CKTS ON SPS.
09	13.03.12	17.37	220KV MANDOLA – NARELA CKT-I & II	13.03.12	18.07	CKT. TRIPPED ON 85LO, 186B, 186A, 86 AT MANDOLA. THE CKT. TRIPPED ON SPS.
10	14.03.12	17.48	220KV MANDOLA – WAZIRABAD CKT-IV	14.03.12	20.27	CKT. TRIPPED ON CB AUTO TRIP, AUTO RECLOSE LOCK OUT AT MANDOLA AND ON DIST PROT `RYB` PHASE, ZONE-I, SOTF L1-L2 AT WAZIRABAD.
11	15.03.12	00.51	220KV MAHARANI BAGH – PRAGATI CKT.	17.03.12	15.47	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT PRAGATI AND ON DIST PROT AT MAHARANI BAGH. `Y` PHASE CONDUCTOR FOUND BROKEN BETWEEN TOWER NO.1 & 2. FIRE OBSERVED AT ISOLATORS OF 220KV PRAGATI CKT AT SARITA VIHAR. DUE TO THIS PRAGATI CKT MADE OF MANUALLY. DUE TO THE INCIDENT, PRAGATI GRID COMPRISING PRAGATI UNIT-I, II & STG, RPH AND GT ISLANDED FROM THE GRID. ISLAND SURVIVED WITH GT AND RPH UNITS.
12	15.03.12	18.48	220/33KV 50MVA PR. TR.-I AT OKHLA	16.03.12	01.50	TX TRIPPED ALONG WITH 33KV I/C-I ON 51A, 95C, 86 ALONG WITH 33KV I/C-I
13	16.03.12	06.35	220KV NAJAFGARH – KANJHAWALA CKT.	16.03.12	06.46	CKT. TRIPPED ON 186 AT NAJAFGARH. NO TRIPPING AT KANJHAWALA.

SLN O	OCCURRENCE OF BREAK-DOWN		DETAILS OF THE BREAKDOWN	TIME OF RESTORATION		REMARKS
	DATE	TIME		DATE	TIME	
14	17.03.12	12.22	220KV BAWANA – DSIDC CKT-I	17.03.12	17.30	CKT. TRIPPED ON DIST PROT `A` PHASE ZONE-I AT BAWANA. NO TRIPPING AT DSIDC.
15	18.03.12	06.54	400/220KV 315MVA ICT-IV AT BAMNAULI	18.03.12	07.51	ICT TRIPPED ON TRIP RELAY GROUP-B, 186A, 186B LO ALONG WITH 220KV I/C-IV WHICH TRIPPED WITHOUT INDICATIONS.
16	18.03.12	06.54	220KV BAMNAULI – PAPPANKALAN-II CKT-II	18.03.12	12.37	CKT. TRIPPED ON DIST PROT `C` PHASE AT BAMNAULI AND ON DIST PROT `C` PHASE ZONE-I AT PAPPANKALAN-II.
17	18.03.12	06.54	220/66KV 100MVA PR. TR-I AT PAPPANKALAN-II	18.03.12	07.50	TR. TRIPPED ON E/F, MASTER RELAY
18	21.03.12	04.35	220KV PANIPAT – NARELA CKT-I	21.03.12	04.45	CKT. TRIPPED ON DIST PROT `ABC` PHASE ZONE-I AT NARELA. NO TRIPPING AT PANIPAT.
19	21.03.12	17.54	220KV MANDOLA – GOPALPUR CKT-I	21.03.12	18.20	CKT. TRIPPED ON DIST PROT `R` PHASE ZONE-I AT MANDOLA AND ON DIST PROT ZONE-I, MAIN-I `RYB` PHASE MAIN-II : `RY` PHASE AT GOPALPUR
20	22.03.12	06.54	220/66KV 160MVA PR. TR.-III AT MUNDKA	22.03.12	09.45	TR. TRIPPED ON VISUAL AUDIO ALARM, GRB TRIP ALONG WITH ITS 66KV I/C WHICH TRIPPED ON GENERAL TRIP, MASTER TRIP, DIRECTIONAL O/C.
21	24.03.12	12.44	220KV BTPS – MEHRAULI CKT-I	24.03.12	18.24	CKT. TRIPPED ON DIST PROT ZONE-I, 30C, 30G, 186 AT BTPS AND ON DIST PROT `ABC` PHASE ZONE-II AT MEHRAULI. KITE THREAD FOUND LYING BETWEEN TOWER NO.11 & 12.
22	26.03.12	11.45	220KV BTPS – NOIDA – GAZIPUR CKT.	26.03.12	12.18	CKT. TRIPPED ON 186AB, 86A-N AT BTPS. NO TRIPPING AT GAZIPUR
23	29.03.12	13.11	220KV SARITA VIHAR – PRAGATI CKT.	29.03.12	14.12	CKT. TRIPPED ON DIST PROT AT PRAGATI AND ON DIST PROT `C` PHASE ZONE-I, 195CC, 186A, 186B AT SARITA VIHAR
24	31.03.12	21.55	220KV BTPS – NOIDA – GAZIPUR CKT.	31.03.12	23.05	CKT. TRIPPED ON 186B AT BTPS. NO TRIPPING AT GAZIPUR. CT REPORTED BLAST AT NOIDA.
25	31.03.12	23.35	220/66KV 100MVA PR. TR.-III AT NARELA	31.03.12	23.51	TR. TRIPPED ON 86.