

DIRECTORS' REPORT

Dear Members,

Your Directors are pleased to present the 39th Annual Report on the business and operations of the Company along with audited financial statements for the year ended March 31, 2015.

Financial Year 2014-15 has been yet another year of achievements for your Company. With the addition of 1,290 MW capacity (including 195 MW through Subsidiary Company) during the year, total installed capacity of your Company (including subsidiaries & JVs) as on 31.03.2015 was 44,398 MW.

Further, with the commissioning of two hydro units of 200 MW each on 10.04.2015 and 12.06.2015 respectively and a 250 MW thermal unit on 22.06.2015, the total installed capacity of NTPC Group has crossed 45,000 MW.

Major highlights for the year 2014-15 are:

- Made foray into hydro generation with the commissioning of two units of 200 MW each.
- Commissioned solar plants of 35 MW capacity.
- Declared 1,195 MW (including 500 MW through JV Company) on commercial generation.
- Average PLF of 80.23% as against all India PLF of 64.46% with two NTPC stations recording more than 90% PLF.
- Excellent MOU rating by Government of India for the year 2013-14.
- Reallocation of Coal blocks namely, Kerandari,

Talaipalli, Dulanga, Chatti-Bariatu, Chatti- Bariatu (South). Now, Banai and Bhalumuda (both exclusively) and Kundanali-Luburi (jointly with J&K State Power Development Company Limited) have been allocated to your company.

- Capital expenditure (CAPEX) for the year 2014-15 was ₹ 23,239.25 crore as against the target of ₹ 22,400 crore.
- 100% realization of current bills from customers.
- Recorded total income of ₹ 75,362.37 crore as compared to ₹ 74,664.61 crore in the FY 2013-14. Net Profit after Tax (PAT) of ₹ 10,290.86 crore.
- Company rewarded its shareholders by issue of one non-convertible, secured, redeemable bonus debenture of face value of ₹ 12.50 each for every one equity share of ₹ 10 each, aggregating to ₹ 10,306.83 crore.
- Dividend of ₹ 2.50 per share (total ₹ 2,061.38 crore) comprising interim dividend of ₹ 0.75 per equity share paid in February 2015 and recommendation of final dividend of ₹ 1.75 per equity share for the year 2014-15, subject to approval of the shareholders.
- Company has been adjudged as the 'Best Company to Work for 2015' in a study conducted by Economic Times in Energy, Oil and Gas Industry Category.

You will appreciate the fact that the company recorded growth and excellent performance despite the challenge before the sector.

1. FINANCIAL RESULTS (STAND ALONE)

Revenue	2014-15		2013-14	
	₹ Crore	US \$ Mn*	₹ Crore	US \$ Mn*
Net Revenue from Operations (including Energy Sales, Consultancy, Energy consumed internally)	73,246.05	11,591.40	72,018.93	11,397.20
Other Income	2,116.32	334.91	2,645.68	418.69
Total Revenue	75,362.37	11,926.31	74,664.61	11,815.89
Expenses				
Fuel	48,845.19	7,729.89	45,829.71	7,252.69
Employee Benefits Expense	3,669.78	580.75	3,824.78	605.28
Finance Costs	2,743.62	434.19	2,406.59	380.85
Depreciation and amortization expense	4,911.65	777.28	4,142.19	655.51
Generation, administration & other expenses	4,979.31	787.99	4,543.85	719.08
Prior period items (net)	(333.83)	(52.83)	12.84	2.03
Total Expenses	64,815.72	10,257.27	60,759.96	9,615.44
Profit before Tax	10,546.65	1,669.04	13,904.65	2,200.45
Tax Expense	255.79	40.48	2,929.91	463.67
Profit for the year	10,290.86	1,628.56	10,974.74	1,736.78

Appropriations:	2014-15		2013-14	
	₹ Crore	US \$ Mn*	₹ Crore	US \$ Mn*
Transfer to bond/ debenture redemption reserve	1,156.19	182.97	576.08	91.17
Transfer to general reserve	7,000.00	1,107.77	5,000.00	791.26
Transfer to CSR reserve	78.30	12.39	-	-
Transfer to capital reserve	0.12	0.02	4.98	0.79
Interim dividend	618.42	97.87	3,298.19	521.95
Proposed dividend	1,442.96	228.35	1,442.96	228.35
Tax on dividend	417.40	66.05	804.74	127.35

*1US \$= ₹ 63.19 as on March 31, 2015

2. ISSUE OF BONUS DEBENTURES

During the Financial Year 2014-15, your Company rewarded its shareholders by issue of one secured, non-cumulative, non-convertible, redeemable, taxable, fully paid-up debenture of face value of ₹ 12.50 each by way of bonus for every one equity share of ₹ 10 each, aggregating to ₹ 10,306.83 crore.

These debentures carry a fixed coupon rate of 8.49% p.a. and will be redeemed in three instalments of ₹ 2.50, ₹ 5.00 and ₹ 5.00 per debenture at the end of 8th, 9th and 10th year respectively.

3. DIVIDEND

3.1 Interim and Final Dividend:

Your company paid interim dividend of ₹ 0.75 per equity share in February 2015 and Directors of your Company have recommended a final dividend of ₹ 1.75 per equity share for the year 2014-15. With this the total dividend for the year is ₹ 2.50 per equity share of ₹ 10/- each. This is in addition to the Bonus Debenture of ₹ 12.50 each issued by the Company in March 2015. In the year 2013-14, the total dividend paid was ₹ 5.75 per equity share of ₹ 10/- each.

The dividend payout is 20.03% and the total dividend payout including dividend tax is 24.09% of profit after tax. The final dividend shall be paid after your approval at the Annual General Meeting.

The dividend has been recommended in accordance with your Company's policy of balancing dividend pay-out with the requirement of deployment of internal accruals for its growth plans.

4. OPERATIONAL PERFORMANCE

During the year, the power stations of your Company generated 241.26 BUs (260.58 BUs including JVs & Subsidiaries) of electricity (including solar and hydro power) which was 23.12% (24.97% including generation by JVs) of the

total power generated in India (without Bhutan import) registering an increase of 3.42% (3.93% including JVs & Subsidiaries) over the previous years' generation of 233.28 BUs.

The total generation contributed by coal stations is 229.55 BUs during the year against generation of 220.70 BUs last year registering a growth of 4.01%. Generation from coal based units could have been still higher but due to less generation schedule there was opportunity loss of 23.11 BUs. The coal based stations operated at average Plant Load Factor (PLF) of 80.23% (All India PLF 64.46%) and average Availability Factor of 88.27% on bus bar during the year. During the year, 2 coal based stations out of 17 achieved more than 90% PLF.

The gas stations having a capacity of 4,017 MW achieved annual generation of 11.588 BUs at a PLF of 32.93% as against 12.569 BUs last year mainly due to less generation schedule which accounted for an opportunity loss of 20.798 BUs. The average declared capacity of gas based stations for the year was 92.18% as compared to 95.24% during previous year.

5. COMMERCIAL PERFORMANCE

5.1 Billing and Realisation

Your Company has realized 100% payment of current bills raised for energy supplied in 2014-15, thus achieving this feat for the 12th consecutive year.

All the customers were making their payments within 60 days of billing and had established LCs at 105% of the average monthly billing.

5.2 Rebate Scheme for realization of dues:

In order to encourage early and full realization of dues, your Company has formulated a special scheme called 'NTPC Rebate Scheme'. In this Scheme for 2014-15, which was aligned with CERC Regulations, graded rebate was given to those customers who were making due payment upto 55th day of billing.

5.3 Commercial Capacity:

The following units were declared commercial during the year 2014-15, adding 1,195 MW to commercial capacity of your Company:

Project/ Unit	Capacity (MW)	COD*
NTPC Units- Coal Based (I)		
Barh-II, Unit #1	660	15.11.2014
Total (I)	660	
NTPC Units –Renewable Energy Units (II)		
Rajgarh Solar**	20	30.04.2014
Singrauli Solar	15	31.12.2014
Total (II)	35	
NTPC's JV Units- Coal Based (III)		
Vallur, Unit#3 (JV with TANGEDCO)	500	26.02.2015
Total (III)	500	
Total Capacity declared commercial during 2014-15 (incl. JVs) (I)+(II)+(III)	1,195	

* COD- Commercial Operation Date

** Out of total capacity of 50 MW, 30 MW capacity of Rajgarh Solar PV was declared on commercial operation on 31.03.2014.

Commercial Capacity of NTPC as on 30.07.2015 is as under:

Owned by NTPC	MW
Coal based projects	33,015
Gas based projects	4,017
Renewable Energy Projects	110
Hydro Projects	800
Sub-total	37,942
Joint Ventures & Subsidiaries	
Coal based projects	4,034
Gas based projects	1,967
Sub-total	6,001
Total	43,943

5.4 Tariff Regulations:

In FY 2014-15, your Company has been able to recover its full capacity charges, there was no under recovery in any of the stations due to less Declared Capability (DC) below the normative DC. Tariff petitions with Central Electricity Regulatory Commission (CERC) have been filed for all the

operating stations for determination of tariff for the period from 01.04.2014 to 31.03.2019. Hearing on these petitions had started and orders will be issued after completion of hearings. The company has also filed final true-up petitions for the stations for the period from 01.04.2009 to 31.03.2014 and final orders will be issued after completion of hearings.

5.4.1 Judgements

In case of BSES Rajdhani Power Limited (BRPL) & BSES Yamuna Power Limited (BYPL) writ petitions, Hon'ble Supreme Court directed both discoms to pay the recurring monthly payments (current bills) to the generating/ transmission companies and vacated the stay on regulation of power supply against non-payment.

APTEL, through its judgment dated 24.03.2015, upheld the allowance of employees cost to NTPC by CERC on account of wage revision for the period 2007-09 and dismissed the appeals filed by TPDDL, BYPL and PSCPL against the said CERC order.

CERC allowed capitalization of R&M works in Talcher Thermal Power Station, through its order dated 15.05.2014 with consequential billing/ impact of ₹ 740 crore towards revised fixed charges.

5.5 Strengthening Customer Relationship:

Customer Relationship Management (CRM) initiative has been taken by your company towards strengthening relationship with the customers. This is also reflected in the Core Values of your Company (BE COMMITTED) which emphasizes 'Customer Focus' as one of the core values of NTPC.

Under CRM, your Company has designed and executed several structured activities with the objective of sharing of experiences and best practices with the customers, capturing the feedback and expectations. Based on the feedback received from the customers, the Company provides various support services to them and identifies potential areas of cooperation. During the year 2014-15, 62 such services were provided to the customers.

Your Company offers training programs to the representatives of beneficiary companies at Power Management Institute (PMI) on free of cost basis. During the year 2014-15, 134 participants from various customer organizations attended training in 58 programs conducted by PMI.

Besides above, your Company has rolled out a Customer Satisfaction Index (CSI) Survey for gathering customers' feedback and responding to their requirements as an essential part of CRM programme. The CSI survey had been conducted in the year 2014-15. The survey is a useful tool for further relationship with the customers.

6. INSTALLED CAPACITY

During the year 2014-15, your Company added 1,290 MW as per details given below:

Project/ Unit installed during FY 2014-15	Capacity (MW)
NTPC owned	
Coal Based Power Projects	
Barh-II, Unit#2	660
Hydro Power Projects	
Koldam Hydro, Unit#1 and 2	400
Solar Power Projects	
Rajgarh Solar PV	20
Singrauli Solar PV	15
Under JVs (Coal Based Power Projects)	
Kanti (subsidiary of NTPC in JV with BSPGCL), Unit#3	195
Addition during FY 2014-15	1,290

With above capacity addition during 2014-15, capacity added in the first three years of 12th Plan Period has reached 7,295 MW against the target of 11,920 MW for 12th Plan Period (as per CEA).

The total installed capacity of the NTPC Group as on 31.03.2015 has become 44,398 MW (43,108.31 as on 31.03.2014) as tabulated below:

Owned by NTPC	MW
Coal based projects	33,675
Gas based projects	4,017
Renewable Energy Projects	110
Hydro Projects	400
Sub-total	38,202
Joint Ventures & Subsidiaries	
Coal based projects	4,229
Gas based projects	1,967
Sub-total	6,196
Total	44,398

With the commissioning of two units of 200 MW each of Koldam Hydro Project on 10.04.2015 and 12.06.2015 respectively and 250 MW unit of Bongaigaon thermal power project on 22.06.2015, the total installed capacity of NTPC Group has reached 45,048 MW as on 30.07.2015.

7. CAPACITY ADDITION PROGRAM

Your Company has adopted a multi-pronged growth strategy which includes capacity addition through green field projects, brown field expansions, expansion through joint ventures and acquisitions, towards its journey to achieve its vision to become world's largest and best power producer powering India's Growth.

In addition to furthering capacity addition through Coal based power projects, your Company has been pursuing enhancement of its power generation portfolio through Hydro and Renewable Energy projects.

7.1 Projects under Implementation

Your Company's various projects having aggregate capacity of 23,904 MW including 4,495 MW being undertaken by Joint Venture and subsidiary companies are under implementation at 22 locations across length and breadth of the country as on 31.03.2015. This includes 22,685 MW through coal based projects, 1,219 MW through renewable energy projects, comprising 1,211 MW through hydro capacity and 8 MW mini hydro project. The details of such projects are as under:

Ongoing Projects as on 31.03.2015	
	Capacity (MW)
I. NTPC owned:	
A. Coal Based Projects	
1. Bongaigaon, Assam*	750
2. Barh-I, Bihar	1,980
3. Lara-I, Chattisgarh	1,600
4. North Karanpura, Jharkhand	1,980
5. Kudgi-I, Karnataka	2,400
6. Gadarwara-I, Madhya Pradesh	1,600
7. Vindhyachal-V, Madhya Pradesh	500
8. Mouda-II, Maharashtra	1,320
9. Solapur, Maharashtra	1,320
10. Darlipalli, Odisha	1,600
11. Unchahar, Uttar Pradesh	500
12. Tanda, Uttar Pradesh	1,320
13. Khargone, Madhya Pradesh	1,320

Ongoing Projects as on 31.03.2015	
	Capacity (MW)
Sub Total (A)	18,190
B. Hydro Electric Power Projects (HEPP)	
14. Koldam, Himachal Pradesh*	400
15. TapovanVishnugad, Uttarakhand	520
16. LataTapovan, Uttarakhand	171
17. Rammam Hydro, West Bengal	120
18. Singrauli CW Discharge, Uttar Pradesh	8
Sub Total (B)	1,219
Total I (A)+(B)	19,409
II Projects under JVs & Subsidiaries	
Coal Based Projects	
19. Nabinagar- JV with Railways, Bihar	1,000
20. Muzaffarpur Expansion (MTPS)– Subsidiary of NTPC in JV with BSPGCL, Bihar	195
21. Nabinagar, JV with BSPGCL, Bihar	1,980
22. Meja, JV with UPRVUNL, Uttar Pradesh	1,320
Total II	4,495
III Total On-Going Projects as on 31.03.2015 (I)+(II)	23,904

*Subsequently, 250 MW unit of Bongaigaon and 400 MW of Koldam Hydro Projects has been commissioned till 30.06.2015. In addition, 250 MW of Solar PV Project was awarded on 28.05.2015 to be set up at Anantpur in the State of Andhra Pradesh.

7.2 New Projects

Currently, your Company has projects for 9,850 MW thermal capacity and 510 MW renewable capacity under bidding after investment approval accorded by the Board. Feasibility Reports for 16,830 MW capacity have already been approved by your Board and project development activities are in various stages.

Your Company has signed Memorandum of Agreement on 03.05.2015 for acquisition of Patratu Thermal Power Station (770 MW) through a joint venture company to be promoted by NTPC and Jharkhand Bijlee Vitran Nigam Limited. The proposed JVC shall also take up expansion of power project by addition of 3X800 MW units in Phase-I and 2X800 MW units in Phase-II.

7.3 New Technology

To meet the challenge of fulfilling India's electricity

demands at affordable cost with minimum environmental impact, your Company has drawn a long term Technology Roadmap up to 2032. The technology roadmap envisages development, adoption and promotion of safe, efficient and clean technologies for power generation.

Your Company is planning to set up coal fired units with ultra supercritical parameters targeting efficiency comparable to best available technology in the world. It is also setting up solar PV plants.

Your Company has adopted efficient technologies, system and practices including combined cycle gas-fired power stations, Distributed Digital Control & Management Information System, High Voltage Direct Current transmission, Sliding Pressure Operation of SG, Dry Ash Extraction and Disposal, 765 KV Switchyard, Ash Water Recirculation System, Liquid Waste Management System, Performance Analysis and Diagnostic Optimization, Tunnel Boring Machines and Super Critical Technologies. These technologies have contributed to increased efficiency and greater environmental protection in its operations. They have also been later adopted in the Indian power industry, as well.

With emphasis on efficiency of electricity generation, your Company has adopted super-critical technology for Sipat plant with Steam parameters of 247 kg/cm²/537°C/565°C. For Barh Stage-II, higher steam parameters of 247 kg/cm²/565°C/593°C have been adopted, which shall also be adopted for all 660/800 MW units being taken up thereafter. The improved heat rate at these parameters will result in around 5% gain in efficiency over the efficiency of conventional sub-critical 500 MW unit.

Steam parameters have been further improved for North Karanpura to 260 kg/cm² /593°C/ 593°C. For Khargone even further improved parameter 270 kg/cm² /600°C/600°C have been adopted, which is expected to give improvement in efficiency by 3.7% over conventional super critical plant.

Your Company has entered into MOU with BHEL and Indira Gandhi Centre for Atomic Research (IGCAR) for indigenous development of advanced ultra super critical technology. This will have enhanced efficiency of around 45% and about 15-17% less CO₂ emission as compared to 500 MW sub-critical units. The program is targeted to deliver a plant having 800 MW unit with steam parameters of 310 kg/cm²/710°C at super heater outlet and 720°C at re-heater outlet.

Your Company has issued NIT for hybrid solar thermal plant by integration of solar heat with

210 MW coal based unit at Dadri. Solar heat is being integrated along with feed heaters in the turbine cycle for conversion of solar heat to electrical power with the help of existing steam cycle of 210 MW. Once integrated, this will reduce coal consumption with corresponding reduction in CO₂ emissions.

7.3.1 Energy Conservation, Technology Absorption

Details of conservation of energy and technology absorption in accordance with section 134(3) of the Companies Act, 2013 read with Companies (Accounts) Rules, 2014 forms a part of this report at Annex-III.

7.4 Project Management

Your Company has an established state-of-the-art IT enabled Project Monitoring Centre (PMC) for facilitating fast track project implementation. PMC has advanced features like Web-based Milestone

Monitoring System (Webmiles), Project Review and Internal Monitoring System (PRIMS), Enterprise-wide Issues Tracking System, etc. PMC facilitates monitoring of key project milestones and also acts as decision support system for the management.

PMC is integrated enterprise-wide collaborative system to facilitate consolidation of project related issues and their resolution. Features like SMS based information delivery, real time video capture, storage and retrieval facility and conference facility are extensively utilized for project tracking, issues resolutions and management intervention. PMC has helped in providing effective coordination between the agencies and has provided enhanced/ efficient monitoring of the projects leading to better and faster project implementation.

7.5 Capacity addition through Subsidiaries and Joint Ventures (JVs)

Besides adding capacities on its own, your Company develops power projects through its subsidiaries and joint ventures, both in India and abroad.

The information of Indian Subsidiaries and JV Companies along with details of partners of joint ventures engaged in power generation is given below:

Name of Company	JV Partner(s)	Details
KBUNL (Kanti Bijlee Utpadan Nigam Ltd.)	Bihar State Power Generation Company Limited (erstwhile (BSEB))	A subsidiary Company in which NTPC holds 65% shares in joint venture with BSPGCL (erstwhile BSEB), took over MTPS having 2 units of 110 MW each from BSEB. Both the units of Stage-I have been declared on commercial operation. Total generation in FY 2014-15 was 875.14 MUs. The Company has also taken up expansion of the project by 2X195 MW units. Unit#3 of Stage-II has been synchronized on 31.03.2015. Construction activities are in full swing for Unit#4 of Stage-II.
BRBCL (Bhartiya Rail Bijlee Company Ltd.)	Ministry of Railways	A subsidiary of NTPC in joint venture with Ministry of Railways with equity contribution in the ratio of 74:26 respectively for setting up power project of 1000 MW (4X250 MW) capacity at Nabinagar in Bihar. Construction activities are in progress. In addition, NTPC Limited has signed Memorandum of Understanding with Ministry of Railways to set up 1,320 MW captive power project for Railways at Adra, West Bengal through this Company. Ministry of Railways is taking steps for allocation of coal mine to the proposed project.
NSPCL (NTPC-SAIL Power Co. Pvt. Ltd.)	Steel Authority of India Ltd. (SAIL)	A 50:50 Joint Venture Company between NTPC and SAIL, owns and operates captive power plants for SAIL at Durgapur (120 MW), Rourkela (120 MW) & Bhilai (74 MW) and Bhilai PP-III (2X250 MW), which is supplying power to SAIL, Chhattisgarh, DNH and D&D. Its present installed capacity is 814 MW. Captive power plants (314 MW) recorded generation of 2429.07 MU in FY 2014-15. Bhilai PP-III (2X250 MW) recorded generation of 3241.06 MU in FY 2014-15. NSPCL is pursuing Coal based Expansion Power Plants at Rourkela (1x250 MW), Durgapur (2x20 MW) & Bhilai (2x250 MW) and Green Field Lignite based Power Plant at Salem(2x40 MW). Bidding for EPC packages of Rourkela PP-II Expansion (1X250 MW) and Durgapur PP-III (2X20 MW) is presently in process. Feasibility Report is under preparation for Power Plant at Salem.

Name of Company	JV Partner(s)	Details
NTECL (NTPC Tamil Nadu Energy Co. Ltd.)	Tamilnadu Generation and Distribution Corporation Limited (TANGEDCO) (erstwhile TNEB)	A 50:50 JVC has commissioned 3x500 MW coal based power project at Vallur, Tamilnadu. All the units have been declared on commercial operation. Total generation of NTECL during FY 2014-15 was 5748.68 MUs.
APCPL (Aravali Power Company Pvt. Ltd.)	Indraprastha Power Generation Co Ltd. (IPGCL) and Haryana Power Generation Co Ltd. (HPGCL).	This JVC is operating 3X500 MW coal based Indira Gandhi Super Thermal Power Project. NTPC, IPGCL and HPGCL have contributed equity in the ratio of 50:25:25. Total generation of APCPL during FY 2014-15 was 7025.10 MUs.
MUNPL (Meja Urja Nigam Pvt. Ltd.)	Uttar Pradesh Rajya Vidyut Utpadan Nigam Ltd. (UPRVUNL)	A 50:50 JVC is implementing 1,320 MW (2X660 MW) coal based power project in the state of Uttar Pradesh. Construction activities are in progress.
NPGCL (Nabinagar Power Generating Company Pvt.Ltd.)	Bihar State Power Generation Company Limited (erstwhile (BSEB)	A 50:50 JVC is setting up a 3x660 MW Coal based plant at Nabinagar. Construction activities are in progress.
RGPP (Ratnagiri Gas and Power Pvt. Ltd.)	GAIL, ICICI Bank, SBI, IDBI, Canara Bank and MSEB Holding Co.	NTPC had a stake of 28.91% as on 31.03.2015. All the three Power Blocks have been kept at dry preservation since 12.09.2014 due to non-availability of funds. The LNG terminal received and unloaded 10 RLNG cargo(s) during the financial year 2014-15. Due to non-payment of loans and interest, as per the Shareholders' Agreement, loan of ₹ 855.37 crore due upto 30.06.2015 has been converted into equity. After conversion, the paid-up share capital of the Company increased to ₹ 3820.27 Crore as on 30.06.2015 and the stake of NTPC was reduced to 25.51% as on 30.06.2015. Based on the subsidy scheme of the Government of India for the stranded gas power stations for FY 2015-16 and 2016-17, Ministry of Power has allocated 500 MW of power from the project to the Indian Railways for FY 2015-16 and FY 2016-17. Certain waiver of duties from Maharashtra Government and agreement with GAIL is awaited.
ASHVINI (Anushakti Vidhyut Nigam Ltd.)	Nuclear Power Corporation of India Ltd. (NPCIL)	NTPC is having a stake of 49%. The company was formed for setting up nuclear power project (s) and also to explore possibilities of entering in areas of front end fuel cycle like uranium mining etc. project site at Gorakhpur, Haryana has been finalized for setting up Haryana Atomic Power Plant (2X700 MW) for which physical possession of land has been completed. However, the project is yet to be formally allocated to ASHVINI. The JV Company may establish the nuclear power project subject to the amendment in the Atomic Energy Act.

7.6 Hydro Power

Your Company is increasing its footprints in renewable energy by developing hydro projects as detailed below:

- A. Koldam HEPP (4x200MW) on the river Satluj at Barmana, District Bilaspur (Himachal Pradesh): All the four units are under commercial operation since 18.07.2015.
- B. Tapovan Vishnugad HEPP (4x130MW) on River Dhauliganga, District Chamoli (Uttarakhand) is under construction. Approximately 60% work has been completed. Head Race Tunnel (HRT) contract, after completion of 7.65 km

out of 12.08 km was terminated due to non performance by agency. Award of balance HRT works is under tendering process and award is expected by Dec'15. Construction of Barrage, Switchyard and Electro-Mechanical & Hydro-Mechanical works are in progress.

- C. Lata Tapovan HEPP (3x57MW) is just at upstream of Tapovan-Vishnugad HEPP - The work was stopped by Hon'ble Supreme Court vide order dated 07.05.2014 for 24 Hydro Projects in the State of Uttarakhand including Lata-Tapovan. The Ministry of Environment, Forests & Climate Change has

constituted an expert body to look into the various concerns related with environment due to these 24 projects and provided 3 months time to submit their opinion for Lata-Tapovan HEPP & 5 other projects which were having all the Government clearances on their commencement of construction. The expert body had their first meeting on 16.06.2015.

Regarding National Board for Wild Life Clearance for Tapovan Vishnugad HEPP and Lata Tapovan HEPP, the State Board of Wildlife of Uttarakhand has recommended the proposal to NBWL for clearance of both the projects.

- D. Rammam-III HEPP (3x40MW) project is situated on river Rammam in Teesta Basin, District Darjeeling (West Bengal). Construction of approach roads and 2 steel bridges for power house and barrage have been completed. Contracts for Civil, HM & EM works have been awarded and Barrage excavation has been started.
- E. Loharinag Pala HEPP (4x150MW) on river Bhagirathi in district Uttarkashi of Uttarakhand was discontinued on the advice of Ministry of Power in the year 2010. Possibility of revival was being explored by Cabinet Secretariat in the meeting held on 12.09.2014.

7.7 Capacity Addition through Renewable Energy Sources

Your Company is adding capacity through renewable sources of energy, to broaden its generation mix to ensure long term competitiveness, mitigation of fuel risks and promotion of sustainable power development.

Your Company has set a target to add 10,000 MW through Renewable Energy by 2022. Different initiatives in this regard are as under:

- A. An MOU has been signed with the Government of Andhra Pradesh for setting up of 1000 MW Solar PV project at AP. A letter of understanding has been signed on 10.10.2014 for developing 750 MW Solar PV project in Madhya Pradesh.
- B. Solar PV Projects commissioned during the year – 35 MWp

Sl. No.	Name of the Project	Capacity (MWp)	Commissioned on
1.	Rajgarh Solar, MP 20 MWp 30.04.2014 (30 MWp during FY 2013-14)	50	
2.	Singrauli Solar, UP	15	31.12.2014

C. Solar PV Project under execution – 250 MWp

Sl. No.	Name of the Project	Capacity (MWp)
1.	Anantpur Solar Phase-I, AP	250 (5X50 MW)

D. New Solar PV Projects under bidding – 510 MWp

Sl. No.	Name of the Project	Capacity (MWp)
1.	Solar Project at Badhla, Phase-II, Jodhpur, Rajasthan	260
2.	Solar Project at Manduar, Madhya Pradesh	250

E. Your Company is planning to add 750 MW of Solar PV Project at Anantpur, AP under Phase-II.

F. The Company has issued NIT for developing 450 KWp rooftop Solar PV Projects at Vindhyaachal. The Company is also planning for development of 7.45 MW potential rooftop Solar PV projects at existing projects.

Your Company has been nominated as implementing agency by MNRE for the selection of developers under National Solar Mission Batch-2 for total 15,000 MW. Under Tranche-I, 3,000 MW solar capacity is to be added. Out of this, tender for 1,650 MW has been already floated by NTPC in the States of AP and Rajasthan.

Your Company has signed an MOU with MNRE, National Institute of Wind Energy (NIWE), Powergrid, PFC, IREDA, PTC and GPCL to form a joint venture company for offshore wind power development in India. JV Agreement has been approved by your Board and approval from other partners is awaited.

Your Company has also signed an MOU with Chattisgarh Renewable Energy Development Agency (CREDA) for development of Tatapani Geothermal project in Chattisgarh.

The Joint Venture Company among NTPC Limited, Asian Development Bank and Kyuden International Cooperation, Japan under the name PAN-ASIAN Renewables Private Limited incorporated to develop projects portfolio of about 500 MW of renewable power generation resources in India, is under voluntary wind up as it could not find third investor in spite of great efforts. Termination agreement has been approved by NTPC on 31.10.2014. Liquidator has also been appointed.

8. STRATEGIC DIVERSIFICATION- INCREASING SELF-RELIANCE

8.1 In order to strengthen its competitive advantage in power generation business, your Company has diversified its portfolio to emerge as an integrated power major, with presence across entire power value chain through backward and forward integration into areas such as coal mining, power equipment manufacturing, power trading and distribution.

Your Company continuously explores business opportunities through market scanning and adopts new business plans accordingly.

8.2 The details of subsidiary companies engaged in business other than in power generation are as under:

8.2.1 NTPC Electric Supply Company Limited (NESCL), a wholly owned subsidiary was incorporated to foray into the business of distribution and supply of electrical energy as a sequel to reforms initiated in the power sector. The Company was implementing Rajiv Gandhi Gramin Vidyutikaran Yojna (RGGVY) projects on turnkey basis and undertakes turnkey execution of sub-stations for utilities and also takes up project management consultancy.

During 2014-15, had completed nine rural electrification projects on deposit work basis under RGGVY. Cumulatively, out of 30 RGGVY projects, 26 projects have been completed.

NESCL also undertook turnkey execution job on deposit work basis for setting up electrical distribution network within 5 kms of NTPC projects/stations. Out of the eight awarded projects two projects completed in the financial year. Cumulatively, six projects have been completed.

The shareholders of NESCL have now approved the transfer of existing business of deposit and consultancy works under RGGVY from NESCL to NTPC.

This subsidiary is also dis-associating with the business of retail distribution of power in various industrial parks developed by Kerala Industrial Infrastructure Development Corporation (KINFRA), through its Joint Venture Company namely KINESCO Power and Utilities Private Limited, as the future prospects of the JV Company are bleak.

8.2.2 NTPC Vidyut Vyapar Nigam Limited (NVVN), a wholly owned subsidiary is involved in power trading, sale of fly ash and cenosphere.

During the year 2014-15, the Company transacted

business with various state electricity boards spread all over the country and traded 10,315 MUs of electricity.

NVVN has been appointed as the nodal agency for cross border trading of electricity with Bhutan and Bangladesh. The power supply to Bangladesh from NTPC stations under PPA signed between NVVN and Bangladesh Power Development Board has commenced from October 2013.

The Company has also been designated as the Nodal Agency for implementation of Jawahar Lal Nehru National Solar Mission Phase-I by purchasing and selling of grid connected bundled solar power across the country.

NVVN had been actively involved in facilitating the development of a wholesale electricity market in India and has developed significant domain knowledge for development of power market. NVVN has been sharing the learning with other stakeholders in Indian Power market through various workshops and thus contributing to capacity building among stakeholders.

The Board of your Company had decided to transfer ash business and sale of cenospheres earlier carried out by NVVN to be carried out by NTPC stations, in order to enhance fly ash utilization considering market potential in the vicinity of power plant and local issues at stations and to have better co-ordination between potential fly ash users and Ash Management Group at stations.

8.3 The details of joint venture companies which are taking up activities in our business related areas are given below:

Name of Company	JV Partner	Activities undertaken
UPL (Utility Powertech Ltd.)	Reliance Infrastructure Limited	Takes up assignments of construction, erection and supervision of business in power sector and other sectors like O&M services, Residual Life Assessment Studies, non-conventional projects etc.
NASL (NTPC ALSTOM Power Services Pvt. Ltd.)	ALSTOM Power Generation, AG	Takes up renovation and modernization assignments of power plants both in India and in other SAARC countries. The Company booked orders of ₹ 386.08 crore in FY 2014-15. Turnover of the Company was ₹ 66.49 crore. R&M including RLA work orders are under execution. Bids have also been submitted for other work orders.

Name of Company	JV Partner	Activities undertaken
EESL (Energy Efficiency Services Ltd.)	PFC, PGCIL and REC	The Company was formed for implementation of Energy Efficiency projects and to promote energy conservation and climate change. The Company is providing consultancy on Energy Audit of Buildings and Agricultural Pump replacement under Perform Achieve Trade Scheme work and standard & leveling work of BEE, consultancy work, implementing Bachat and agricultural & municipal pump replacement for various State Govts.
NHPTL (National High Power Test Laboratory Pvt. Ltd.)	NHPC, PGCIL, DVC and CPRI	The Company has been formed for setting up facility for short circuit testing of transformers and other electrical equipment. High Voltage Transformer (HVTR) Lab and Medium Voltage Transformer (MVTR) Lab at Bina, M.P. for short circuit testing of Transformers upto 765 kV is under construction which is expected to be commissioned in 2015.
NPEX (National Power Exchange Ltd.)	NHPC, PFC, TCS, BSE, IFCI, Meenakshi, DPSC	The Company was formed to facilitate, promote, assist, regulate and manage nationwide trading of all forms of electrical energies and also to settle trades in a transparent fair and open manner. In view of the change in market scenario and the fact that NTPC's objective of joining NPEX has not been met till date, your Company has decided to exit from NPEX. The Board of NPEX has now decided to voluntary wind up the Company on the recommendations of the promoters. The liquidator has been appointed for this purpose.
NBPPL (NTPC-BHEL Power Projects Pvt. Limited)	Bharat Heavy Electricals Limited	The Company was incorporated for taking up activities of engineering, procurement and construction (EPC) of power plants and manufacturing of equipments. The manufacturing plant of NBPPL at Mannavaram, Tirupati in Andhra Pradesh for CHP and AHP has commenced production from December 2014.

Name of Company	JV Partner	Activities undertaken
NBPPL (NTPC-BHEL Power Projects Pvt. Limited)	Bharat Heavy Electricals Limited	The Company is executing EPC contracts for balance of plants packages of Palatana Combined Cycle Power plant in Tripura, Namrup Combined Cycle Power Plant in Assam, Balance of Plant including Erection & Commissioning works of the entire plant at Monarchak, Tripura for NEEPCO and EPC Contract for Unchahar. Both the units of Palatana have been commissioned and work at other sites is in progress. The Company's order bookings as on March 31, 2015 was ₹ 35 lakh. Total turnover of the Company was ₹ 520 crore (provisional) for the year 2014-15.
(BF-NTPC) BF-NTPC Energy Systems Limited	Bharat Forge Limited	This Company was incorporated to manufacture castings, forgings, fittings and high pressure piping required for power projects and other industries. As in the recent past thermal power capacity addition program has suffered a major setback due to a variety of reasons including slow environment clearance of new projects, non-availability of land, shortage of Indian coal and costly imported coal, your company has decided to withdraw from this joint venture company. Report of the Valuer has been accepted by both NTPC and Bharat Forge. The proposal of exit from this company is awaiting clearance from Ministry of Power.
TELK (Transfor mers and Electricals Kerala Limited)	Acquisition of 44.6% stake in TELK from Government of Kerala on June 19, 2009	The Company deals in manufacturing and repair of Power Transformers. TELK order booking as on 31.03.2015 was ₹ 118.58 crore and the total turnover of the Company was ₹ 130.02 crore in the financial year 2014-15.

9. GLOBALISATION INITIATIVES

- 9.1 Trincomalee Power Company Limited (TPCL), a 50:50 joint venture Company between your Company and Ceylon Electricity Board was formed to undertake the development, construction, establishment, operation and maintenance of a coal based electricity generating station of

2X250 MW capacity at Trincomalee at Sri Lanka. EIA report was submitted to Central Electricity Authority, Sri Lanka on 09.02.2015.

- 9.2 Bangladesh-India Friendship Power Company Private Limited, a 50:50 joint venture company between NTPC and Bangladesh Power Development Board (BPDB) has been formed for developing a 2X660 MW Coal based power project at Khulna Division, Rampal, Bangladesh. Project activities at site have commenced.

10. **CONSULTANCY SERVICES:** Consultancy Wing of your Company offers services like Engineering, Operation & Maintenance Management, Project Management, Contracts & Procurement Management, Quality Management, Training & Development etc.

These services have been provided in international markets in Gulf countries, Bangladesh, Nepal, Sri Lanka and Bhutan.

On international front, Owner's Engineers Services is being provided to Trincomalee Power Company Ltd. for setting up their 2x250MW Coal Based Power Project. Consultancy Wing is also providing O&M Management Services to 2X120 MW Siddhirganj Peaking Power Plant of Electricity Generation Company of Bangladesh under a World Bank funded contract.

On the domestic front, Consultancy Wing has been effectively sharing its expertise with State, Central PSUs and other clients. These include Project Monitoring Services to MPPGCL for 2x600MW Shree Singaji TPP & 2x250MW Satpura TPP by deputing NTPC experts at site.

11. **FINANCING OF NEW PROJECTS**

The capacity addition programs shall be financed with a debt to equity ratio of 70:30. Your directors believe that internal accruals of the Company would be sufficient to finance the equity component for the new projects. Given its low geared capital structure and strong credit ratings, your Company is well positioned to raise the required borrowings.

Your Company is exploring domestic as well as international borrowing options including overseas development assistance provided by bilateral agencies to mobilize the debt required for the planned capacity expansion program.

The details of funding are discussed in the Management and Discussion Analysis Report which forms part of this Report.

12. **FIXED DEPOSITS**

Your Company has discontinued the acceptance of fresh deposits and renewals of deposits under NTPC's Public Deposit Scheme with effect from

11.05.2013. As such, there was no deposits which were not in compliance with the requirements of Chapter-V of the Companies Act, 2013.

The details relating to deposits, as per the Companies Act, 2013 are as under:

(a)	Accepted during the year	Nil
(b)	Remained unpaid or unclaimed as at the end of the year	13 Deposits amounting to ₹17.51 lakh*
(c)	Whether there has been any default in repayment of deposits or payment of interest thereon during the year and if so, number of such cases and the total amount involved	
	(i) At the beginning of the year	Nil
	(ii) Maximum during the year	Nil
	(iii) At the end of the year	Nil

* Pending for completion of legal formalities/ restraint orders/ non-receipt of claims

13. **FUEL SECURITY**

- 13.1 During the year, the supply position of coal and gas is given as under:

- 13.1.1 **Coal Supplies**

Presently, long term Coal Supply Agreements are in place for 33,515 MW for the units already commissioned/ to be commissioned.

To enhance coal supply at critical units, short-term Memorandum of Understanding (MOU) has been signed with Eastern Coalfields Limited (ECL) in 2014-15 for supply of 5.0 MMT of coal. Another short term MOU has been signed with Northern Coalfields Limited (NCL) in 2014-15 for supply of 3.0 MMT.

Letter of assurance (LOA) for quantity of 7.039 MMT of erstwhile 'E' grade coal by CCL was issued on 24.03.2015 for North Karanpura Project. For Mouda Unit#2 after considerable persuasion, the pricing of coal had been revised by WCL and 'cost plus' FSA had been signed on 10.02.2015 for an ACQ of 0.6 MMT.

- 13.1.2 **Domestic Coal and Imported Coal**

During 2014-15, your Company received 167.4 MMT of coal as against 160.6 MMT in 2013-14 marking an increase of 4.23%.

Total domestic coal supply during 2014-15 was 151.1 MMT as against 149.8 MMT during 2013-14.

The total coal supply from CIL was 138.6 MMT and from SCCL was 12.5 MMT. 7.0 MMT of coal was procured through bilateral MOU during 2014-15.

During 2014-15, your Company imported 16.4 MMT of coal as against 10.8 MMT in 2013-14.

13.1.3 Sourcing of coal through E-auction

Your Company participated in 3 e-auctions for coal procurement during the financial year 2014-15 in which total coal allotted was 0.19 MMT. Total coal received through e-auction was 0.94 MMT (including receipt of coal out of previous years allocation) during 2014-15 as compared to 3.15 MMT during 2013-14.

13.1.4 Supply through Inland Waterways

During 2014-15, about 5.06 lakh MT imported coal has been supplied through inland waterways to Farakka station.

13.1.5 Rationalisation of Linkage

With the initiatives of Ministry of Power and Ministry of Coal, Inter Ministerial Task Force has recommended rationalisation of linkage for optimization of transportation cost and de-congestion of railway network. In this respect, your company has rationalised the linkage of Mouda station from MCL to SECL which may result in savings upto ₹ 45.39 crore per annum.

13.1.6 Swapping of coal with GSECL

In September 2014, NTPC had entered into swapping agreement with Gujarat State Electricity Corporation Limited (GSECL) wherein imported coal of NTPC-Sipat was swapped with GSECL's domestic coal. This will result in substantial savings for both utilities.

13.1.7 Commencement of third party sampling

Third party sampling by agency deployed by power utility has commenced for the first time in the country. Accordingly, all NTPC stations except Ramagundam STPS deployed the third party sampling agents.

13.2 Gas supplies

During 2014-15, your Company received 6.41 MMSCMD of gas and RLNG as against 6.87 MMSCMD received during 2013-14. The gas offtake in 2014-15 includes 6.17 MMSCMD of gas and 0.24 MMSCMD of RLNG. Gas offtake was less due to less availability of generation schedule on RLNG from the beneficiary states.

Your Company has Administered Price Mechanism (APM) gas agreements up to the year 2021 and Panna Mukta Tapti (PMT) gas agreements up to the year 2019 for its gas stations. The term sheet for non-APM gas with GAIL is valid till 2016 and long-

term RLNG supply agreement with GAIL is valid till 2019.

Your Company has been making arrangements for tie-up and supply of spot RLNG or Fallback RLNG from domestic suppliers on 'reasonable endeavour' basis based on requirement and availability from time to time.

The Government extended the guidelines for 'Clubbing/ diversion of gas between two or more power plants' for gas stations of your company for another year w.e.f. 12.02.2015. With the diversion of unutilised gas from NTPC WR stations to NCR stations, additional 2.37 BUs (approx) of electricity has been generated at NCR gas stations during FY 2014-15.

13.3 Development of Coal Mining projects

Your Company was allocated ten coal blocks by the Government of India, out of which, five blocks namely, Chatti-Bariatu, Kerandari, Talaipalli, Dulanga, Chatti-Bariatu (South), were cancelled by the Hon'ble Supreme Court through order dated 24.09.2014. Subsequently, the Ministry of Coal, on 24.03.2015, declared reallocation of four coal blocks to your Company (Chatti-Bariatu and Chatti-Bariatu (South) have been clubbed), for which allotment agreements had been signed between your company and Government of India on 30.03.2015.

Government of India has also issued formal allotment letters to your Company on 31.03.2015 for Banai, Bhalumuda coal blocks. Kundanali-Luburi coal block has been allotted jointly to your company and J&K State Power Development Company Limited (J&KSPDCL). For developing Kundanali-Luburi coal block, a joint venture company is proposed to be formed between your Company and J&KSPDCL.

With the allocation of total 8 coal blocks with estimated geological reserves of over 5 BT, your company expects to produce about 82 million tonnes of coal per annum.

In Pakri-Barwadih coal mining block, all the necessary statutory clearances are available. Mine opening permission has already been received from Coal Controller and DGMS. Fresh contract for appointment of Mine Developer & Operator (MDO) for Pakri-Barwadih is in progress as the earlier contract was terminated due to its poor performance. MDO contract awarded for Chatti-Bariatu was also terminated due to cancellation of the coal block by the Supreme Court.

Meanwhile, as a parallel action, short-term contracts for removal of overburden, coal extraction and transportation upto Railway

Siding are planned from a part of Pakri-Barwadih block (Eastern Pit) for which tendering has been done. Your company has received mine opening permission from DGMS for Chatti-Bariatu coal block.

Your company is trying for allocation of few more coal blocks in the next round of allotment of coal blocks for Government Companies.

Your Company had formed Joint Venture Companies namely CIL NTPC Urja Private Limited, NTPC-SCCL Global Ventures Private Limited and International Coal Ventures Private Limited to explore further avenues in the area of coal mining. However, these JV companies have not been able to achieve their objectives owing to certain constraints like inability of the JV Company to execute the work, government directive etc. In case of CIL NTPC Urja Private Limited, the company has applied to the Government of India for reallocation of coal blocks deallocated from it in 2011.

NTPC-SCCL Global Ventures Private Limited is being wound up voluntarily as the Company could not start its business since its incorporation due to non-availability of any business prospects.

Further, the Company has decided to exit from International Coal Ventures Private Limited for which clearance from cabinet is awaited.

13.4 Exploration Activities

In Cambay exploration block allotted under NELP-VIII, held by NTPC as operator with 100% participating interest, drilling of one explanatory well has been completed and drilling of second well is in progress. Drilling of balance exploration wells is planned in the FY 2015-16.

In one of KG basin exploration blocks viz. KG-OSN-2009/1 where ONGC is the operator and NTPC has 10% stake, drilling of an exploratory well has been completed. Tests conducted did not indicate presence of hydrocarbons in the well. The well has been plugged and abandoned. In other KG basin exploration block viz. KG-OSN-2009/4 where ONGC is the operator and NTPC has 10% stake, the exploration activities are in progress and ONGC has submitted a proposal to the Government of India for reduction on minimum work program as the permitted area of the block has been reduced because of non-grant of defence clearance. It has been decided to relinquish Andaman basin exploration block viz. AN-DWN-2009/13 where ONGC is the operator and NTPC has 10% stake, to the Government of India as per advice from ONGC.

14. BUSINESS EXCELLENCE: GLOBAL BENCHMARKING

To achieve higher levels of excellence, the company has developed and adopted its own 'NTPC Business Excellence Model' on the lines of globally reputed Excellence Models such as Malcom Baldrige Model, USA and EFQM Model of Europe. The model has been deployed at our Business Units (Stations) and your Company carry out assessment of generating stations using this framework of excellence.

In the financial year 2014-15, the 5th cycle of assessment was completed in which 21 generating stations were assessed by a team of certified and proficient assessors. Business Excellence Awards for Best Performance to Dadri and Runner-up shield to Talcher-Thermal stations were presented by the Union Minister of Power, GOI, in the Indian Power Stations Conference- 2015 held at New Delhi.

As a next step on the Journey of Excellence, the company is planning to implement Business Analytics and Information Management initiative to enhance overall strategic focus and alignment.

Contemporary quality initiatives and techniques like Quality Circles, Professional Circles, 5S, integrated management system (IMS) etc have been deployed across the organization for continuous improvement. Our Quality Circle teams of workmen have been consistently representing NTPC at national and international Quality Circle conventions and bringing many laurels.

15. RENOVATION & MODERNISATION

In the present scenario of severe resource constraint, Renovation and Modernization (R&M) of power plants is considered to be the best option for bridging the gap between demand and supply of power, as R&M schemes are cost effective. It increases the life of the plant, improves performance & availability, enhances capacity and ensures safe, reliable and economic electricity production by replacement of worn-out, deteriorated or obsolete electrical, mechanical, instrumentation, controls and protection system by state-of-the-art equipment. It also helps in compliance of environment norms.

With a view to removing technological obsolescence, renovation of control & instrumentation (C&I) is in progress in Singrauli-I & II, Korba -I & II, Ramagundam -I & II, Farakka-II, Dadri Thermal- I, Unchahar- I, Talcher-I and Kahalgaon-I STPS. During 2014-15, C&I R&M was completed in one 500 MW unit of Singrauli, one 200 MW unit & one 500 MW unit of Korba, two 500 MW units of Ramagundam, one 210 MW unit of Dadri Thermal, one 210 MW unit of FGUPTS and

one 500 MW unit of Talcher STPS. On completion of these schemes, the C&I systems in these stations will be brought nearly on par with the new power projects.

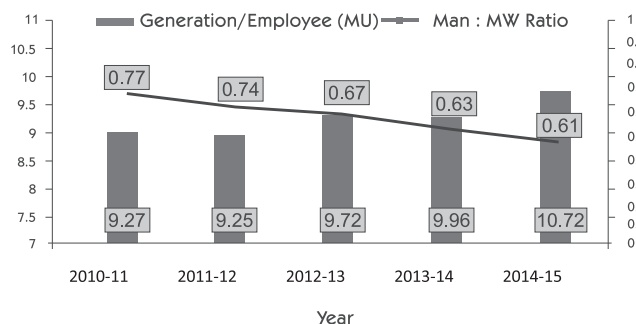
Because of the very high working temperatures, R&M of Gas Turbines including their Control & Instrumentation is essential after around 15 years of life. During the year, this activity was completed in all the 4 Gas Turbines (GT) each in Kawas and in Auraiya and 2 out of 3 GT in Gandhar.

With a view to comply with increasingly stringent environment norms of reduced emission level prescribed by State Pollution Control Boards, Renovation and Retrofitting of Electrostatic Precipitator (ESP) packages have been awarded and work is in progress in Badarpur-II, Singrauli-I & II, Farakka-I, Unchahar-I, Korba-I & II, Rihand-I, Vindhyachal-I & II, Talcher STPS -I & II and Talcher TPS-II. Amongst these, Moving Electrode Electrostatic Precipitator technology (MEEP) is being adopted for the first time in the country in Rihand Station. During 2014-15, ESP R&M of Unit#4 of Badarpur was completed.

To derive benefits of the latest advancements in technology, in cooperation with CEA, EEC/VGB/ Steag Germany, a study has been taken up on ESP performance improvement using CFD modeling in Unit#6 of Ramagundam, with scheduled completion in December 2015.

16. HUMAN RESOURCE MANAGEMENT

16.1 Your Company takes pride in its highly motivated and competent Human Resource that has contributed its best to bring the Company to its present heights. The productivity of employees is demonstrated by increase in generation per employee and reduction of Man-MW ratio year after year. The over-all Man-MW ratio for the year 2014-15 excluding JV/subsidiary capacity is 0.61 and 0.56 including capacity of JV/ Subsidiaries. Generation per employee was 10.72 MUs during the year based on generation of NTPC stations.



The total employee strength of the company stood at 24,067 as on 31.3.2015 against 25,013 as on 31.3.2014.

	FY 2014-15	FY 2013-14
NTPC		
Number of employees	22,496	23,411
Subsidiaries & Joint Ventures		
Employees of NTPC in Subsidiaries & Joint Ventures	1,571	1,602
Total employees	24,067	25,013

The attrition rate of the NTPC executives (including Executive Trainees and those posted in Subsidiaries and JVs) during the year was 1.35%.

16.2 Employee Relations

Employees are the driving force behind the sustained stellar performance of the company over all these years of company's ascendancy. As a commitment towards the Company's core values, Employees' Participation in Management was made effective based on mutual respect, trust and a feeling of being a progressive partner in growth and success. Communication meetings with unions and associations, workshop on production and productivity, etc were conducted at projects, regions and corporate level during the year.

Both, employees and management complemented each other's efforts in furthering the interest of the company as well as its stakeholders, signifying and highlighting over-all harmony and cordial employee relations prevalent in the Company.

16.3 Safety and Security

Occupational health and safety at workplace is one of the prime concerns and utmost importance is given to provide safe working environment and to inculcate safety awareness among the employees. Company recognizes and accepts its responsibility for establishing and maintaining a safe working environment for all its employees and associates. Your Company has 3-tier structure for Occupational health and Safety management, namely at Stations/Projects, at Regional Head Quarters and at Corporate Centre.

All our stations are certified with OHSAS-18001/ IS-18001. Internal safety audits by our own safety officers of various projects/stations and external safety audits by reputed organizations are carried out for each Project/Station.

Cross functional safety task force for O&M and construction projects are functional at all projects/stations to monitor unsafe working conditions at site and its rectification. For strict compliance & enforcement of safety norms and practices by the contractors, safety clauses are included in General Conditions of Contract/ Erection Condition of Contract.

Many of our plants have been awarded with prestigious safety awards conferred by various Institutions/Body like Ministry of Labour & Employment-Govt. of India, National safety council, Institution of Engineers (India), in recognition of implementing innovative safety procedures and practices.

Security: Your Company recognizes and accepts its responsibility for establishing and maintaining a secured working environment for all its installations, employees and associates. This is being taken care of by deploying CISF at all units of your Company as per norms of MHA. Concrete steps are being taken for upgrading surveillance systems at all projects/ stations by installing state-of-the-art security systems.

16.4 Training and Development

In line with its objective of being a learning organization with skilled and committed employees, your Company has relentlessly promoted training and development of not only its own employees but also other professionals of the power sector. The objective is being driven by a comprehensive infrastructure comprising Power Management Institute (PMI) at the corporate level and Employee Development Centers at its sites. The training imparted is in tune with emerging needs and challenges and for this purpose, the existing training programs are reviewed and some new programs are included in the annual calendar every year.

PMI has taken firm steps to strengthen the Project Management competency in the country through an International Project Management framework. A Post Graduate Certificate in Project Management (PGCPM) programme in collaboration with IIM-Indore is being conducted for developing long term project management competency. PMI has been providing skill based training to various public and private sector utilities/companies. A similar tie-up has been done with IIM-Ahmedabad for knowledge creation.

For all round development of India's power sector, PMI has conducted several customized training programmes for the benefit of State utilities, CPSEs

and private sector companies at their locations as well as in PMI. In addition, several individuals from State utilities have benefited from the regular training programmes being conducted at PMI, Noida. In all, 1,163 participants from such other organizations got trained at PMI during 2014-15.

During 2014-15, PMI has conducted total 441 training programmes covering 9,373 executives, logging a total of 36,235 training mandays. PMI conducted 20 training programs through Web Conferencing during 2014-15.

PMI imparts hands-on training to participants from various power utilities on Super Critical Technology through its 660 MW Simulator. So far, over 1000 power plant professionals have been provided training since its inception.

PMI also conducted 3 International Training Programmes, each of total 6 weeks' duration, for ABB Limited in Abu Dhabi on Power Plant Operation and Simulator Training on GE Combined Cycle Gas Power Plant, thus creating a global brand image for itself and Company. A high level programme titled "Strategic Business Sense and Leadership", anchored by renowned faculties, was held exclusively for senior Executives of the Company during 25-28 November, 2014. Programmes on Enterprise Risk Management are also being held for Senior Management personnel at Regional Offices of NTPC.

Your Company is among the pioneers to start an Employee Assistance Program (confidential expert counselling service for employees and their family members).

With the objective of grooming professionals into world class power plant managers, PMI has opened "NTPC School of Business" for running PG Diploma in Management approved by AICTE. This 15 months course will also include learning inputs from international faculty and provide exposure to industries outside India.

PMI is mandated to bolster the skills initiative of your Company for development of the country's youth. In line with this, PMI as the nodal agency is facilitating the adoption of existing Government ITIs and setting up of new ITIs in different parts of the country spanning 16 States. Up till now, your Company has adopted 17 ITIs and set up 7 new ITIs near its power stations, thus associating with total 24 ITIs. Of the 17 Govt. ITIs adopted by your Company, 14 ITIs were adopted under the PPP scheme of Gol and 3 ITIs have been adopted under bilateral agreement with different State governments. These initiatives by your Company

have resulted in creation of total 1,595 new seats by starting of new trades/units in the adopted & new ITIs, and, till 31.03.2015, cumulatively, a total of 23,131 students have benefitted from this initiative. For these ITI students, NTPC organised total 46,864 mandays of industrial training/plant visits. Due to all these skill development initiatives, your Company has been conferred two awards “The Education Excellence Award - 2013” and “PMI (India) Award for Community Development - 2014”.

17. SUSTAINABLE DEVELOPMENT

Your Company believes that growth and development can be sustainable only if they happen in all the three fronts i.e Environment, Economic and Social. In line with NTPC Vision, ‘Powering India’s Growth’, the Company adopts business approach which is guided by Sustainable Development i.e. development that meets the needs of the present without compromising the ability of future generations to meet their own needs.

Business Responsibility Report is attached as Annex-IX and forms part of the Annual Report.

Initiatives by the Company

Your Company has developed a policy on Sustainable Development in accordance with a sustainable development plan prepared for the year 2014-15. The main areas covered were projects on bio-diversity conservation, waste management, reduction in air emissions in addition to promotion of renewable energy. Major activities carried out under this plan included plantation of more than 2 lakh saplings in and around plants, installation of roof top solar PV, solar street lights, rain water harvesting, installation of bio-methanation plant, vermi composting, other techniques for conversion of domestic waste in organic fertilizer. Studies like pollutant source apportionment, human health risk assessment and environment impact assessment are also being taken up.

A total expenditure of ₹ 19.53 crore was incurred on these Sustainable Development Projects during the Financial Year 2014-15.

In its endeavor to achieve the goals of Sustainable Development, your Company is addressing the issues through multi-pronged approach as per the details given below:

17.1 Inclusive Growth –Initiatives for Social Growth

17.1.1 Corporate Social Responsibility:

Your Company has always discharged its social

responsibility as a part of its Corporate Governance philosophy. It follows the global practice of addressing CSR issues in an integrated multi stakeholder approach covering the environmental and social aspects.

NTPC CSR initiatives are in focus areas of basic infrastructure development like sanitation, road, drinking water, primary education, community health, vocational training, women empowerment etc. Overall impact of these initiatives includes improvement in health, academic success, reduction in number of girl dropouts, reduced hardship and improved connectivity etc. During the year special thrust has been given to the “Swachh Vidyalaya Abhiyan” for construction of toilets in government schools.

17.1.2 NTPC Foundation

NTPC Foundation is engaged in serving and empowering the physically challenged and economically weaker sections of the society.

Details of expenditure incurred and initiatives undertaken by the Company under CSR are covered in the Annual Report on CSR annexed as Annex-VII to this Report.

17.1.3 Rehabilitation & Resettlement (R&R)

Your Company is committed to help the populace displaced for execution of its projects and has been making efforts to improve the socio-economic status of Project Affected Persons (PAPs). In order to meet its social objectives, your Company is focusing on effective R&R of PAPs and undertaking community development activities in and around the projects.

R&R activities are initiated at our projects by undertaking need based community development activities in the area of health, education, water, capacity building infrastructure etc by formulating Initial Community Development (ICD) Plan in consultation with concerned Panchayat, district administration and opinion makers of the locality. As per the policy, a detailed socio-economic survey (SES) is conducted by a professional agency to create a baseline data of PAPs.

R&R plan expenditure is implemented in a time bound manner so as to complete its implementation by the time the project is commissioned. A social impact evaluation is being conducted by a professional agency to know the efficiency of R&R Plan implementation for future learning and improvements.

17.1.4 R&R achievements during the year:

(a) Initial Community Plan (ICD):

- ICD plan for Bilhaur project enhanced.
 - Community Development plan for Kahalgaon MGR to Hurra Mines approved.
 - Implementation of ICD activities continued at Barethi, Darlipalli, Gajmara, Khargone, Nabinagar (BRBCL) and Nabinagar (NPGCL) projects.
- (b) Rehabilitation and Resettlement (R&R) Plan:
- R&R plans for Barethi, Mouda-II, Khargone, Darlipalli, Unchahar-IV and Rammam -III projects covering areas like health, education, sanitation, drinking water, infrastructure facilities finalized and approved in consultation with the stakeholders.
 - R&R activities were implemented in new green/ brownfield Thermal Projects at Barh, Bongaigaon, Gadarwara, Muzaffarpur, Korba, Kudgi, Lara, Meja, Mouda, North-Karanpura, Solapur, Tanda, Vallur, Vindhyachal. In Hydro Projects at Koldam, Lata-Tapovan, Tapovan-Vishnugad and Coal Mining projects at Pakri-Barwadiah, Chhatti- Bariatu, Kerendari, Dulanga and Talaipalli, R&R activities were implemented.
 - Provisions made for running expenses for Solapur Power and Industrial Training Institute, with three trades electrician, fitter and welder.
 - IIIT, Raipur - construction is in progress.
 - Setting up of mother and child care hub and critical care unit approved for Katwa sub-division hospital, Burdwan as part of R&R expenditure for Katwa Project.
 - Mobile Health Clinic at Kudgi, Nabinagar (NPGCL), Pakri-Barwadiah, Nabinagar (BRBCL) and Gajmara projects continued this year.
 - SES for Bilhaur and Mouda-II projects was completed.

17.2 Environment Management - Initiatives for preserving Environment

Vision Statement on Environment Management:

“Going Higher on Generation, lowering GHG intensity”

Your Company is pursuing the objective of environment protection as one of its prime responsibilities and focuses its efforts to mitigate the impact of its operation on surrounding environment. To meet the environmental challenges of 21st century and beyond, the Company has adopted sound environment management practices and advanced environment

protection system to minimize impact of power generation on environment.

Your Company has adopted advanced and high efficiency technologies such as super critical boilers for recently commissioned and the upcoming green field projects. Your company is augmenting its capacity by installing solar power systems and micro hydel power systems attached to its thermal power stations, wherever possible, so as to encourage garnering of renewable energy resources. The Company is also designing its up-coming plants to use beneficiated coal and imported low ash coal. These measures are aimed not only to achieve reduction in pollution and minimize use of precious natural resources but also to lead to reduction of CO₂ emissions per unit of generation thereby reducing global warming.

17.2.1 Control of Air Emissions: High efficiency Electrostatic Precipitators (ESPs) with efficiency of the order of 99.97% and above, with advanced control systems have been provided in all coal based stations to keep Suspended Particulate Matter (SPM) below permissible limits. All up-coming new plants are being provided with ESPs designed in such a manner that would cater to the anticipated future norms. Performance enhancement of ESPs operating over the years is being carried out by augmentation of ESPs fields, retrofitting of advanced ESP controllers and adoption of sound O&M practices. Flue Gas Conditioning systems have also been provided at our old units which are helping in reduction of SPM emissions below statutory limits even during coal quality variations due to blending of coal etc.

NOx control in coal fired plants is achieved by controlling its production by adopting best combustion practices. Since tall stacks are provided in coal stations, NOx emitted through stacks is widely dispersed and diluted. In gas based stations, NOx control systems (hybrid burners or wet DeNOx) have been provided for good combustion practices.

Fugitive emission from ash pond is controlled by maintaining water cover, tree plantation on abandoned ash ponds, water spray and earth cover in inactive lagoons. Providing dust suppression and extraction system in CHP area has further added to reduction in fugitive dust in the vicinity of power stations.

17.2.2 Control of water pollution and promotion of water conservation: Various water conservation measures have been taken up to reduce water consumption in power generation by using

3Rs (Reduce, Recycle & Reuse) as guiding principle. Provision of advanced treatment facilities such as Liquid Waste Treatment Plants (LWTP), Recycling Systems for Ash Pond Effluent called Ash Water Recirculation System (AWRS) and closed cycle condenser cooling water systems with higher Cycle of Concentration (COC), rain water harvesting wherever plausible and reuse of treated sewage effluent for horticulture purposes are some of the measures implemented in most of the stations. All these measures have resulted in reduction of effluent discharge from the power plants of NTPC.

17.2.3 Automation of environment measurement system: 67 continuous ambient air quality monitoring stations (AAQMS) have been installed to capture the real time data and access thereof viz., PM 10, PM 2.5, SO₂, NO_x and access has been provided to the Central Pollution Control Board and State Pollution Control Boards. Additional ozone analyzers for ambient air are also being provided phase-wise at the stations. Installation of Continuous Emission Monitoring Systems (CEMS) to monitor emissions of SO₂, NO_x and CO₂ in all its existing units on real time basis is in advance stage. It is also installing Effluent Quality Monitoring System (EQMS). For all the upcoming projects, real time monitors for ambient air and emissions are included in the engineering packages during design stage itself.

17.2.4 Environmental Studies: Your Company has taken a number of studies for better environment protection and to develop strong scientific database.

17.2.5 Tree Plantation: Your Company has planted 21.783 million trees till date throughout the country as a measure of massive afforestation.

The afforestation has not only contributed to the 'aesthetics' but also helped in carbon sequestration by serving as a 'sink' for CO₂ released from the stations and thereby protecting the quality of ecology and environment in and around the projects.

17.2.6 ISO 14001 & OHSAS 18001 Certification: All NTPC's stations have been certified with ISO 14001 and OHSAS 18001 by reputed National and International certifying agencies as a result of sound environment management systems and practices.

17.3 Quality Assurance and Inspection (QA&I)

Your company has invested hugely in Quality with the view to secure long term plant reliability. Investment in terms of committing adequate

number of qualified and trained human resources for quality related activities, laboratories at the construction sites and, more importantly, robust processes providing for direction methods and standards of performance, for the various tasks associated with quality.

Quality in your company has a much deeper meaning: identification of needs, planning for realization of the needs jointly with the stake holders including the various suppliers and verification whether the needs have been built into the product/service during manufacturing and erection & commissioning. The quality loop is further extended to capture whether the originally indented plant reliability and operation standards have been realized or not. Gaps, if any, are filled through resetting the methods and standards through continuous improvements.

Your company's performance indicators, exceptional by any standards, bears testimony to the soundness of the quality system deployed.

Your Company is represented on various technical committees of ISO and IEC and is actively contributing in formulation and updating of power sector technical and quality standards/guidelines.

17.4 Clean Development Mechanism (CDM)

Your Company is undertaking climate change issues proactively.

Three of its solar projects namely 5MW each solar PV project at Dadri, Port Blair (Andaman & Nicobar) and Faridabad had already been registered with UNFCCC CDM Executive Board. 8MW Small Hydro Power Project at Singrauli is in advanced stage of validation and is likely to be submitted shortly to UNFCCC for CDM registration. 6173 numbers of CERs for 5MW solar PV Power project at Port Blair (A&N) had already been issued by UNFCCC CDM Executive Board. Verification/ issuance of CERs for 5 MW solar power PV project at Dadri is in process.

17.5 Ash Utilisation

During the year 2014-15, 59.15 million tonnes of ash was generated and 39.52% viz. 23.38 million tonnes of ash had been utilized for various productive purposes.

Important areas of ash utilization are - cement & asbestos industry, ready mix concrete plants (RMC), road embankment, mine filling, ash dyke raising & land development.

Pond ash from all stations of your Company is being issued free of cost to all users. Fly ash is also

being issued free of cost to fly ash/ clay-fly ash bricks, blocks and tiles manufacturers on priority basis over the other users from all coal based thermal power stations. The funds collected from sale of ash up to Dec'14 was being maintained in a separate account by NVVN, a wholly-owned subsidiary company. Now this fund has been transferred to your Company and is being maintained in the separate account. This fund is being utilized for development of infrastructure facilities, promotion and facilitation activities to enhance ash utilization.

Your Company has also introduced Ash Policy, which is a vision document dealing with the ash utilization issue in an integral way from generation to end product. This policy aims at maximizing utilization of ash for productive usage alongwith fulfilling social and environmental obligations as a green initiative in protecting the nature and giving a better environment to future generations.

The quantity of ash produced, ash utilized and percentage of such utilization during 2014-15 from NTPC Stations is at Annex-VIII.

17.6 CenPEEP – towards enhancing efficiency and protecting Environment

Your Company initiated a unique voluntary program of GHG emission reduction by establishing 'Center for Power Efficiency and Environmental Protection (CenPEEP)' and under this program, it is estimated that cumulative CO₂ avoided is 40.25 million ton since 1996.

CenPEEP is coordinating the implementation of 'Perform, Achieve & Trade (PAT) Scheme' under Prime Minister's National Mission on Enhanced Energy Efficiency (NMEEE) wherein 22 stations of your Company are Designated Consumers (DC). Based on the gap analysis, station specific action plans were prepared & implemented for efficiency improvement and reduction in auxiliary power to achieve the PAT targets.

Thrust has been given for efficiency improvement and sustenance through strategic initiatives of Energy Efficiency Management System (EEMS), and reliability improvement through Reliability Centered Maintenance (RCM) & PdM systems. A pool of over 350 certified Energy Auditors has been created in your Company helping in the culture of energy conservation. A dedicated group CEETEM – Centre for Energy Efficient Technology & Energy Management, coordinates regular Energy audits to induce focused actions and activities for improvement.

Monitoring and analysis of critical efficiency

parametric aberrations & draft power consumption is done using PI dashboards & online systems like Thermal Loss Analyser (TLA), Output Loss Analysis (OLA) and System Energy Efficiency Display (SEED). These systems assist the operator in tracking the gaps in heat rate and auxiliary power consumption & facilitate tracking and trending of degradation of equipment performance and formulation of action plans for improvement.

Under Indo-US bilateral program 'Partnership to Advance Clean Energy – Deployment (PACE-D)' supported by USAID, a manual on 'Benchmarking for Super critical Units' was prepared jointly with US experts.

CenPEEP is actively involved in the training and development of power professionals from your Company and other utilities in the power sector. It conducts domain specific workshops in areas of Boiler & Auxiliaries, Turbine & Auxiliaries, Cooling Towers, RCM and PdM technologies etc.

18. NETRA – R&D Mission in Power Sector

Your Company, as the leading power utility of the country, has assigned 1% of PAT for R&D activities. Its research efforts are focused to address the major concerns of the sector as well as the futuristic technology requirements of the sector. In this effort, company has established NTPC Energy Technology Research Alliance (NETRA) as state-of-the-art centre for research, technology development and scientific services in the domain of electric power to enable seamless work flow right from concept to commissioning. The focus areas of NETRA are - Efficiency Improvement & Cost Reduction; New & Renewable Energy; Climate Change & Environmental protection and Advanced Scientific Services.

Research Advisory Council (RAC) of NETRA comprising of eminent scientists and experts from India and abroad is in place to steer research direction.

In order to provide maximum possible benefit to the stations while developing green technologies, many projects/activities have been undertaken for implementation.

NETRA continued to provide scientific support to all stations as well as many other utilities stations in the area of oil/water chemistry, environment, electrical, rotor dynamics etc for efficient performances.

NETRA laboratories are accredited as per ISO 17025 and its NDT laboratory has also been recognized as "Well known Remnant Life

Assessment Organization” under the Boiler Regulations, 1950. Phase-II NETRA infrastructure is under construction with approx 21000 sq m floor area and is expected to be completed by Dec’2015. Phase II will have 30 laboratories, workshop, pilot plant bay and an auditorium with seating capacity of 400 persons.

19. IMPLEMENTATION OF OFFICIAL LANGUAGE

Several steps were taken for the proper propagation and implementation of Official Language Policy of Government of India in the Company.

Meetings of Official Language Implementation Committee were held on 20th June, 30th September, 30th December, 2014 & 24th March, 2015 in which the implementation of Hindi in the Organization was reviewed thoroughly. Various Hindi competitions were organized during Hindi fortnight from 1st to 14th September, 2014 in the corporate office as well as in all projects of NTPC Limited. Corporate Hindi Magazine “Vidyut Swar” was awarded All India first prize by Hon’ble President of India. Hindi workshops were conducted for the various departments of the Company. Renowned Hindi scholars inspired the participants of Hindi workshops to use Hindi in day-to-day official work.

Most of the office orders, formats and circulars were issued in Hindi as well. Important advertisements and house journals were released in bilingual form- in Hindi and in English.

Your Company’s website also has a facility of operating in bilingual form- in Hindi as well as in English.

20. VIGILANCE

20.1 Vigilance Mechanism:

Your Company ensures transparency, objectivity and quality of decision making in its operations, and to monitor the same, the Company has a Vigilance Department headed by Chief Vigilance Officer, a nominee of Central Vigilance Commission. The four units of Vigilance Department namely Corporate Vigilance Cell, Departmental Proceeding Cell (DPC), MIS Cell and Technical Cell (TC) deal with various facets of vigilance mechanism.

333 surprise checks were conducted in various departments and recovery was made against discrepancies.

Various guidelines were issued during 2014-15 to improve systems in the Company pertaining to procurement, accounting, payments, agreements, enlistment of vendors etc.

20.2 Implementation of Integrity Pact

Your Company is committed to have total transparency to its business processes and as a step in this direction; it signed a Memorandum of Understanding with Transparency International India in December, 2008. The Integrity Pact is being implemented for all contracts having value exceeding ₹ 10 crore. Three Independent External Monitors have been nominated by the Central Vigilance Commission for all contracts with value exceeding ₹ 100 crore. New format of Integrity Pact as per the Company’s requirement and the suggestions given by IEMs were implemented.

20.3 Implementation of various policies/ circulars

Complaint Handling Policy, Fraud Prevention Policy and Whistle Blower Policy have been implemented in the Company to build and strengthen a culture of transparency. A uniform policy for banning of business dealings with the contractors/ vendors has been formulated and implemented.

During 2014-15, 159 complaints were received, out of which 84 complaints were carried to a logical conclusion and the remaining 75 complaints are under various stages of investigation. Appropriate disciplinary action has also been initiated wherever necessary.

20.4 Vigilance Awareness Week and Workshops

During 2014-15, 41 preventive vigilance workshops were conducted at various projects/ places in which 1,230 employees participated.

Vigilance awareness week was observed from October 27, 2014 to November 2, 2014 in all NTPC projects and stations/ establishments.

21. REDRESSAL OF PUBLIC GRIEVANCES

Your Company is committed for resolution of public grievance in efficient and time bound manner. Company Secretary has been designated as Director (Grievance) to facilitate earliest resolution of public grievances received from President Secretariat, Prime Minister’s Office, Ministry of Power etc.

In order to facilitate resolution of grievances in transparent and time bound manner, Department of Administrative Reforms & Public Grievances, Department of Personnel & Training, Government of India has initiated web-based monitoring system at www.pgportal.in.

As per directions of GOI, public grievances are to be resolved within two months time. If it is not possible to resolve the same within two months period, an interim reply is to be given. Your company is making all efforts to resolve grievances in above time frame.

22. RIGHT TO INFORMATION

Your Company has implemented Right to Information Act, 2005 in order to provide information to citizens and to maintain accountability and transparency. The Company has put RTI manual on website for access to all citizens of India and has designated a Central Public Information Officer (CPIO), an Appellate Authority and APIOs at all sites and offices of the Company.

During 2014-15, 1,288 applications were received under the RTI Act, out of which 1,242 applications were replied to till 31.03.2015.

23. USING INFORMATION AND COMMUNICATION TECHNOLOGY FOR PRODUCTIVITY ENHANCEMENT

Your Company has implemented an Enterprise Resource Planning (ERP) package covering maximum possible processes across the organization including subsidiaries. In addition to the core business processes and Employee Self Service (ESS) functionality, the ERP solution also includes e-procurement, Knowledge Management, Business Intelligence, Document Management, and Workflow etc. The ERP system is fully managed through in-house expertise from process groups and technical groups. Parallely, in-house solutions have been developed to take care of the non-ERP areas

A state of the art data centre with centralized server facility for ERP to cater to the entire Company is in Operation at NOIDA. A 100% disaster recovery centre is also operational at Hyderabad for change over in case of any emergency.

24. NTPC GROUP: SUBSIDIARIES AND JOINT VENTURES

Your Company has currently 4 subsidiary companies and 21 joint venture companies for undertaking specific business activities.

A statement containing the salient feature of the financial statement of your Company's Subsidiaries, Associate Companies and Joint Ventures as per first proviso of section 129(3) of the Companies Act, 2013 is included in the consolidated financial statement.

The financial statements of subsidiary companies along with the respective Directors' Report are placed elsewhere in this Annual Report.

25. INFORMATION PURSUANT TO STATUTORY AND OTHER REQUIREMENTS

Information required to be furnished as per the

Companies Act, 2013 and Listing Agreement with Stock Exchanges are as under:

25.1 Statutory Auditors

The Statutory Auditors of your Company are appointed by the Comptroller & Auditor General of India. M/s O.P. Bagla & Co., M/s PSD & Associates, M/s PKF Sridhar & Santhanam, M/s V. Sankar Aiyar & Co., M/s Ramesh C. Agrawal & Co. and M/s A.R. & Co. were Joint Statutory Auditors for the financial year 2014-15.

The Comptroller & Auditor General of India has appointed (i) M/s T R Chadha & Co., Chartered Accountants, New Delhi, (ii) M/s PSD Associates, Chartered Accountants, New Delhi, (iii) M/s Sagar & Associates, Chartered Accountants, Hyderabad, (iv) M/s Kalani & Co., Chartered Accountants, Jaipur, (v) M/s P A & Associates, Chartered Accountants, Bhubaneshwar, (vi) M/s S K Kapoor & Co., Chartered Accountants, Kanpur and (vii) M/s B M Chatrath & Co., Chartered Accountants, Kolkata as the Joint Statutory Auditors of the Company for the year 2015-16.

25.2 Management comments on Statutory Auditors' Report

The Statutory Auditors of the Company have given an unqualified report on the accounts of the Company for the financial year 2014-15. However, they have drawn attention under 'Emphasis of Matter' to Note-22 (b) to the financial statements relating to accounting of sales on provisional basis and Note 34 in respect of a project where the matter is pending before the Hon'ble Supreme Court of India.

The issues have been adequately explained in the respective Notes referred to by the Auditors.

25.3 Review of accounts by Comptroller & Auditor General of India (C&AG)

As advised by the Office of the C&AG, the comments of C&AG on the accounts for the year 2014-15 alongwith management replies thereto are placed with the report of Statutory Auditors of your Company elsewhere in this Annual Report.

25.4 COST AUDIT

As prescribed under the Companies (Cost Records and Audit) Rules, 2014, the Cost Accounting records are being maintained by all stations of the Company.

The firms of Cost Accountants appointed under Section 148(3) of the Companies Act, 2013 for the financial year 2013-14 and 2014-15 were (i) M/s Narasimha Murthy & Co., Hyderabad, (ii) M/s Musib & Co., Mumbai, (iii) M/s Sanjay Gupta & Associates, Delhi, (iv) M/s Bandopadhyay Bhaumik & Co., Mumbai, (v) M/s S. Dhal & Co., Bhubhaneshwar and (vi) M/s R.J. Goel & Co., Delhi.

The due date for filing consolidated Cost Audit Report in XBRL format for the financial year ended March 31, 2014 was September 27, 2014 and the consolidated Cost Audit Report for your Company was filed with the Central Government on September 10, 2014.

The Cost Audit Report for the financial year ended March 31, 2015 shall be filed within the prescribed time period under the Companies (Cost Records & Audit) Rules, 2014.

25.4 Performance Evaluation of the Directors and the Board

As required under the Companies Act, 2013 and the Listing Agreement, evaluation of performance of directors including that of the Independent Directors and of the Board is to be carried out either by the Board or by the Nomination and Remuneration Committee or by the Independent Directors. It also requires disclosure of formulated criteria for performance evaluation in this Report.

In this regard, the Ministry of Corporate Affairs, through Notification dated 05.06.2015, has exempted the Government Companies from these provisions. The appointment of the Functional Directors, Government Nominee Directors and Independent Directors of your Company is made by the Government of India. Their terms & conditions of appointment as well as tenure of all directors are also decided by GOI and there is a well laid down procedure for evaluation of Functional Directors & CMD as well as of Government Directors by Administrative/ respective Ministry. Also, the performance of the Board of the Government Companies is evaluated during the performance evaluation of the MOU signed with the Government of India.

25.5 Secretarial Audit

The Board has appointed M/s Agarwal S. & Associates, Company Secretaries, to conduct Secretarial Audit for the financial year 2014-15. The Secretarial Audit Report for the financial year ended March 31, 2015 is annexed herewith marked as Annexure 'X' to this Report.

The Managements' Comments on Secretarial Audit Report are as under:

Observations	Management's Comments
Composition of the Board of Directors of the Company is not in compliance with Second Proviso to Section 149(1) and Section 149(4) of the Companies Act, 2013, Clause 49(II)(A) of the Listing Agreement and Para 3.1.2 and 3.1.4 of the DPE Guidelines on Corporate Governance for CPSEs issued by the Department of Public Enterprises	As per the Listing Agreements executed with the Stock Exchanges, the Company should have nine Independent Directors since Company has seven functional Directors including the Chairman & Managing Director and two Government Nominee Directors on its Board as against two Independent Directors in position at present. Further, the Company does not have any woman Director on the Board. Being a Government Company the power to appoint the Directors on the Board of the Company vests with the President of India and accordingly, the Company is, from time to time, requesting Ministry of Power to appoint woman director and the requisite number of Independent Directors on its Board.

25.6 Particulars of contracts or arrangements with related parties

During the period under review, the Company had not entered into any material transaction with any of its related parties. The Company's major related party transactions are generally with its subsidiaries and associates. All related party transactions were in the ordinary course of business and were negotiated on an arm's length basis. They were intended to further the Company's interests.

Accordingly, the disclosure of Related Party Transactions as required under Section 134(3)(h) of the Companies Act, 2013 in Form AOC-2 is not applicable.

Web-link for Policy on Materiality of Related Party Transactions & also on Dealing with Related Party Transactions has been provided in the Report on Corporate Governance, which forms part of the Annual Report.

25.7 Significant and material orders passed by the regulators or courts or tribunals impacting the going concern status and company's operations in future: NIL

25.8 Adequacy of internal financial controls with reference to the financial statements: The Company has in place adequate internal financial controls with reference to financial statements. During the year, such controls were tested and no reportable material weakness in the design or operation was observed.

25.9 Loans and Investments

Details of Loans and Investments covered under the provisions of Section 186 of the Companies Act, 2013 forms part of financial statement, attached as a separate section in the Annual Report FY 2014-15.

25.10 Sexual Harassment of Women at Workplace

The Company has in place a Policy on Prevention, Prohibition and Redressal of Sexual Harassment of Women at Workplace in line with the requirements of the Sexual Harassment of Women at the Workplace (Prevention, Prohibition & Redressal) Act, 2013. Internal Complaints Committee (ICC) has been set up to redress complaints received regarding sexual harassment. All employees (permanent, contractual, temporary, trainees) are covered under this policy.

In association with the National Commission for Women, PMI has taken the initiative to conduct Gender Sensitization workshops for building a Collaborative Work Culture across your Company. In these workshops, the employees, both male and female, are sensitized and made aware about issues and laws pertaining to sexual harassment as well as appropriate behavior at the workplace. During 2014-15, PMI has conducted 8 such workshops across the organization covering 260 employees.

One complaint of sexual harassment was received during the year 2014-15, which was resolved.

25.11 Procurement from MSEs

The Government of India has notified a Public Procurement Policy for Micro and Small Enterprises (MSEs), Order 2012. In terms of the said policy, the total eligible value of annual procurement of goods produced and services rendered by MSEs (including MSEs owned by SC/ST entrepreneurs) during the year 2014-2015 was ₹ 140 crore. The total procurement made from MSEs (including SC/ST entrepreneurs) was ₹ 317.12 crore.

25.12 Particulars of Employees

As per provisions of section 197(12) of the Companies Act, 2013 read with the Rule 5 of the Companies (Appointment and Remuneration of Managerial Personnel) Rules, 2014, every listed company is required to disclose the ratio of the remuneration

of each director to the median employee's remuneration and details of employees receiving remuneration exceeding limits as prescribed from time to time in the Directors' Report.

However, as per notification dated 5th June, 2015 issued by the Ministry of Corporate Affairs, Government Companies are exempted from complying with provisions of Section 197 of the Companies Act, 2013. Therefore, such particulars have not been included as part of Directors' Report.

25.13 Extract of Annual Return:

Extract of Annual Return of the Company is annexed herewith as Annexure 'VI' to this Report.

25.14 Information on Number of Meetings of the Board held during the year, composition of committees of the Board and their meetings held during the year, establishment of vigil mechanism/ whistle blower policy and web-links for familiarization/ training policy of directors and Policy for determining 'Material' Subsidiaries have been provided in the Report on Corporate Governance, which forms part of the Annual Report.

24.15 Para on development of risk management policy including therein the elements of risks are given elsewhere in the Annual Report.

25.16 No disclosure or reporting is required in respect of the following items as there were no transactions on these items during the year under review:

1. Issue of equity shares with differential rights as to dividend, voting or otherwise.
2. Issue of shares (including sweat equity shares) to employees of the Company under any scheme.

The particulars of annexures forming part of this report are as under:

Particulars	Annexure
Management Discussion & Analysis	I
Report on Corporate Governance	II
Information on conservation of energy, technology absorption and foreign exchange earnings and outgo	III
Statistical information on persons belonging to Scheduled Caste / Scheduled Tribe categories	IV
Information on Physically Challenged persons	V
Extract of Annual Return	VI
Annual Report on CSR Activities	VII
Project Wise Ash Utilisation	VIII
Business Responsibility Report for the year 2014-15	IX
Secretarial Audit Report in Form MR-3	X

26. BOARD OF DIRECTORS

Shri Anil Kumar Singh, JS (Thermal), Ministry of Power has joined as Government Nominee Director of the Company with effect from October 31, 2014.

Consequent upon superannuation of Shri N.N. Misra on October 31, 2014, Shri K.K. Sharma has taken over as Director (Operations) with effect from November 1, 2014.

Consequent upon completion of three years' tenure, Shri S.B. Ghosh Dastidar and Shri R.S. Sahoo have ceased to be the Independent Director w.e.f. August 25, 2014 and Shri Ajit M. Nimbalkar and Shri S.R. Upadhyay have ceased to be the Independent Director w.e.f. January 19, 2015.

Further, upon completion of three years' tenure, Ms. H.A. Daruwalla, Shri A.N. Chatterji and Prof. Sushil Khanna have ceased to be the Independent Director w.e.f. February 27, 2015.

The Board wishes to place on record its deep appreciation for the valuable services rendered by Shri S.B. Ghosh Dastidar, Shri R.S. Sahoo, Shri N.N. Misra, Shri Ajit M. Nimbalkar, Shri S.R. Upadhyay, Ms. H.A. Daruwalla, Shri A.N. Chatterji and Prof. Sushil Khanna during their association with the Company.

In accordance with Section 152 of the Companies Act, 2013 and the provisions of the Articles of Association of the Company – Shri A.K. Jha and Shri U.P. Pani shall retire by rotation at the Annual General Meeting of your Company and, being eligible, offers themselves for re-appointment.

27. DIRECTORS' RESPONSIBILITY STATEMENT

As required under Section 134 (5) of the Companies Act, 2013, your Directors confirm that:

1. in the preparation of the annual accounts, the applicable accounting standards had been followed along with proper explanation relating to material departures;
2. the Directors had selected such accounting policies and applied them consistently and made judgments and estimates that are reasonable and prudent so as to give a true and fair view of the state of affairs of the company at the end of the financial year 2014-15 and of the profit of the company for that period;
3. the Directors had taken proper and sufficient care for the maintenance of adequate accounting records in accordance with the provisions of the Companies Act, 2013 for safeguarding the assets of the company and for preventing and detecting fraud and other irregularities;
4. the Directors had prepared the Annual Accounts on a going concern basis;
5. the Directors, had laid down internal financial

controls to be followed by the company and that such internal financial controls are adequate and were operating effectively; and

6. the Directors had devised proper systems to ensure compliance with the provisions of all applicable laws and that such systems were adequate and operating effectively.

28. ACKNOWLEDGEMENT

The Directors of your Company acknowledge with deep sense of appreciation, the co-operation received from the Government of India, particularly the Prime Minister's Office, Ministry of Power, Ministry of Finance, Ministry of Environment, Forests & Climate Change, Ministry of Coal, Ministry of Petroleum & Natural Gas, Ministry of Railways, Department of Public Enterprises, Central Electricity Authority, Central Electricity Regulatory Commission, Comptroller & Auditor General of India, Appellate Tribunal for Electricity, State Governments, Regional Power Committees, State Utilities and Office of the Attorney General of India.

The Directors of your Company also convey their gratitude to the shareholders, various international and Indian Banks and Financial Institutions for the confidence reposed by them in the Company.

The Board also appreciates the contribution of contractors, vendors and consultants in the implementation of various projects of the Company. We also acknowledge the constructive suggestions received from Government and Statutory Auditors.

We wish to place on record our appreciation for the untiring efforts and contributions made by the employees at all levels to ensure that the company continues to grow and excel.

For and on behalf of the Board of Directors



(Dr. Arup Roy Choudhury)
Chairman & Managing Director
(DIN: 00659908)

Place: New Delhi

Date: 30th July, 2015