

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Petition No. 132/GT/2013

Coram:

Shri Gireesh B. Pradhan, Chairperson

Shri M.Deena Dayalan, Member

Shri A.K. Singhal, Member

Smt. Neerja Mathur, Member (EO)

Date of Hearing: 15.4.2014

Date of Order: 17.9.2014

In the matter of

Revision of tariff of Sipat Super Thermal Power Station, Stage-II (1000 MW) for the period from 1.4.2009 to 31.3.2014- Truing up of tariff determined by order dated 20.1.2012 in Petition No. 316/2009.

And

In the matter of

NTPC Ltd
NTPC Bhawan,
Core-7, SCOPE Complex,
7, Institutional Area, Lodhi Road,
New Delhi-110003

...Petitioner

Vs

1. Madhya Pradesh Power Management Company Limited,
Shakti Bhavan, Vidyut Nagar, Jabalpur-482 008
2. Maharashtra State Electricity Distribution Company Ltd,
'Prakashgad', Bandra (EAST), Mumbai-400 051
3. Gujarat Urja Vikas Nigam Limited,
Vidyut Bhavan, Race Course, Vadodara-390 007
4. Chhattisgarh State Power Distribution Company Ltd,
Dhagania, Raipur-492 013
5. Electricity Department, Govt. of Goa,
Vidyut Bhavan, Panaji, Goa
6. Electricity Department, Administration of Daman & Diu,
Daman-396 210
7. Electricity Department Administration of Dadra and Nagar Haveli,
Silvassa Via VAPI

...Respondents



ORDER

This petition has been filed by the petitioner, NTPC for approval of tariff for Sipat Super Thermal Power Station, Stage-II (2 x 500 MW) (hereinafter referred to as “the generating station”) for the period from 1.4.2009 to 31.3.2014, based on the proviso to Regulation 6 (1) of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 (hereinafter referred to as “the 2009 Tariff Regulations”)

2. The generating station with a capacity of 1000 MW comprises of two units of 500 MW each. The dates of commercial operation of different units of the generating station are as under:

	Date of commercial operation (COD)
Unit-I	20.6.2008
Unit-II / Generating station	1.1.2009

3. Petition No. 316/2009 was filed by the petitioner for determination of tariff of the generating station for the period from 1.4.2009 to 31.3.2014 and the Commission by its order dated 20.1.2012 determined the annual fixed charges for the generating station. The capital cost considered by the Commission for the purpose of determination of annual fixed charges for 2009-14 by order dated 20.1.2012 is as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Opening Capital cost	384882.92	408299.14	416390.62	422526.62	422526.62
Projected Additional capital expenditure	23416.22	8091.48	6136.00	0.00	0.00
Closing Capital cost	408299.14	416390.62	422526.62	422526.62	422526.62
Average Capital cost	396591.03	412344.88	419458.62	422526.62	422526.62

4. Based on the above, the annual fixed charges for the generating station for 2009-14 determined by order dated 20.1.2012 in Petition No. 316/2009 is as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Depreciation	20294.54	21100.70	21464.73	21621.72	21621.72
Interest on Loan	16984.56	16228.50	15712.34	15035.49	14085.02
Return on Equity	27937.06	29046.81	29547.92	29764.04	29764.04
Interest on Working Capital	3807.80	3873.62	3930.05	3965.73	3995.44
O&M Expenses	13000.00	13740.00	14530.00	15360.00	16240.00
Cost of Secondary fuel oil	1414.92	1414.92	1418.80	1414.92	1414.92
Total	83438.88	85404.56	86603.84	87161.91	87121.15

5. The petitioner presently seeks revision of the annual fixed charges in accordance with proviso to clause (1) of Regulation 6 of the 2009 Tariff Regulations, based on the actual additional capital expenditure incurred for the years 2009-10, 2010-11 and 2011-12 and revised projected additional capital expenditure for the years 2012-13 and 2013-14.

6. Regulation 6 of the 2009 Tariff Regulations provides as under:

"6. Truing up of Capital Expenditure and Tariff

(1) The Commission shall carry out truing up exercise along with the tariff petition filed for the next tariff period, with respect to the capital expenditure including additional capital expenditure incurred up to 31.3.2014, as admitted by the Commission after prudence check at the time of truing up.

Provided that the generating company or the transmission licensee, as the case may be, may in its discretion make an application before the Commission one more time prior to 2013-14 for revision of tariff."

7. The annual fixed charges claimed by the petitioner in this petition are as under:

	<i>(₹ in lakh)</i>				
	2009-10	2010-11	2011-12	2012-13	2013-14
Depreciation	20266	20968	21647	22335	22614
Interest on Loan	16953	17018	18809	18887	17903
Return on Equity	27897	28655	29260	30085	30461
Interest on Working Capital	3806	3879	3992	4068	4110
O&M Expenses	13000	13740	14530	15360	16240
Cost of secondary fuel oil	1415	1415	1419	1415	1415
Total	83337	85675	89658	92149	92742

8. The respondent No.2, MSEDCL has filed reply in the matter. We now consider the prayer for revision of annual fixed charges tariff for the generating station taking into consideration the documents on record as stated in the subsequent paragraphs:

Capital cost

9. The last proviso to Regulation 7 of the 2009 Tariff Regulations as amended on 21.6.2011 provides as under:

"Provided also that in case of the existing projects, the capital cost admitted by the Commission prior to 1.4.2009 duly trued up by excluding un-discharged liability, if any, as on 1.4.2009 and the additional capital expenditure projected to be incurred for the respective year of the tariff period 2009-14, as may be admitted by the Commission, shall form the basis for determination of tariff."

10. The petitioner has considered the gross capital cost of ₹ 402432.24 lakh as on 31.3.2009 as allowed by the Commission in its order dated 30.9.2011 in Petition No. 63/2009 & 140/2009 as gross capital cost as on 1.4.2009. The gross capital cost of ₹402432.24 lakh, including liabilities as on 31.3.2009 as determined by order dated 30.9.2011 in Petition No. 63/2009 and 140/2009 has been considered as the opening capital cost as on 1.4.2009. The petitioner has considered the liability of ₹18022.68 lakh as on 1.4.2009 in this petition against the liability amount of ₹17875.73 lakh determined in order dated 20.1.2012. The petitioner has also submitted vide affidavit dated 3.4.2013 that the difference is of the inadvertent error in the finalization of liability for some of the assets. Accordingly, the un-discharged liabilities as on 1.4.2009 included in the above capital cost works out to ₹18022.68 lakh which is inclusive of liability towards land compensation for ₹73.98 lakh. Accordingly, after deduction of the liability of ₹18022.68 lakh from the gross capital cost of ₹402432.24 lakh, the capital cost on cash basis considered for the purpose of tariff is ₹384409.56 lakh as on 1.4.2009. The discharge of liabilities, made during the years would be included in the capital base as additional capital expenditure, in the year of discharge.

Actual/ Projected Additional Capital Expenditure during 2009-14

11. Regulation 9 of the 2009 Tariff Regulations, as amended on 21.6.2011 and 31.12.2012, provides as under:

*“9. **Additional Capitalisation.** (1) The capital expenditure incurred or projected to be incurred, on the following counts within the original scope of work, after the date of commercial operation and up to the cut-off date may be admitted by the Commission, subject to prudence check:*

- (i) Un-discharged liabilities;*
- (ii) Works deferred for execution;*
- (iii) Procurement of initial capital spares within the original scope of work, subject to the provisions of regulation 8;*
- (iii) Liabilities to meet award of arbitration or for compliance of the order or decree of a court; and*
- (v) Change in law:*

Provided that the details of works included in the original scope of work along with estimates of expenditure, un-discharged liabilities and the works deferred for execution shall be submitted along with the application for determination of tariff.

(2) The capital expenditure incurred or projected to be incurred on the following counts after the cut-off date may, in its discretion, be admitted by the Commission, subject to prudence check:

(i) Liabilities to meet award of arbitration or for compliance of the order or decree of a court;

(ii) Change in law;

(iii) Deferred works relating to ash pond or ash handling system in the original scope of work;

(iv) In case of hydro generating stations, any expenditure which has become necessary on account of damage caused by natural calamities (but not due to flooding of power house attributable to the negligence of the generating company) including due to geological reasons after adjusting for proceeds from any insurance scheme, and expenditure incurred due to any additional work which has become necessary for successful and efficient plant operation; and

(v) In case of transmission system any additional expenditure on items such as relays, control and instrumentation, computer system, power line carrier communication, DC batteries, replacement of switchyard equipment due to increase of fault level, emergency restoration system, insulators cleaning infrastructure, replacement of damaged equipment not covered by insurance and any other expenditure which has become necessary for successful and efficient operation of transmission system:

Provided that in respect sub-clauses (iv) and (v) above, any expenditure on acquiring the minor items or the assets like tools and tackles, furniture, air-conditioners, voltage stabilizers, refrigerators, coolers, fans, washing machines, heat convectors, mattresses, carpets etc. brought after the cut-off date shall not be considered for additional capitalization for determination of tariff w.e.f. 1.4.2009.

(vi) In case of gas/liquid fuel based open/ combined cycle thermal generating stations, any expenditure which has become necessary on renovation of gas turbines after 15 year of operation from its COD and the expenditure necessary due to obsolescence or non-availability of spares for successful and efficient operation of the stations.

Provided that any expenditure included in the R&M on consumables and cost of components and spares which is generally covered in the O&M expenses during the major overhaul of gas turbine shall be suitably deducted after due prudence from the R&M expenditure to be allowed.

(vii) Any capital expenditure found justified after prudence check necessitated on account of modifications required or done in fuel receipt system arising due to non-materialisation of full coal linkage in respect of thermal generating station as result of circumstances not within the control of the generating station.

(viii) Any un-discharged liability towards final payment/withheld payment due to contractual exigencies for works executed within the cut-off date, after prudence check of the details of such deferred liability, total estimated cost of package, reason for such withholding of payment and release of such payments etc.

(ix) Expenditure on account of creation of infrastructure for supply of reliable power to rural households within a radius of five kilometers of the power station if, the generating company does not intend to meet such expenditure as part of its Corporate Social Responsibility.”

12. The additional capital expenditure claimed by the petitioner for 2009-14 in Petition No. 316/2009 and those allowed by order dated 20.1.2012 is summarized as under:

(₹ in lakh)

	2009-10 Actual	2010-11 Projected	2011-12 Projected	2012-13 Projected	2013-14 Projected
Additional Capital Expenditure claimed	14641.00	6359.00	6136.00	0.00	0.00
Additional Capital Expenditure allowed	14641.00	6359.00	6136.00	0.00	0.00

13. The details of the additional capital expenditure allowed by the Commission in its order dated 20.1.2012 in Petition No.316/2009 is summarized as under:

(₹ in lakh)

Package Name	Actual	Projected Capitalization				Total
	2009-10	2010-11	2011-12	2012-13	2013-14	
Capital Works						
Merry Go Round (Incl. rolling stock)	244.00	0.00	0.00	0.00	0.00	244.00
Steam Generator –Civil works	474.00	0.00	17.00	0.00	0.00	491.00
Turbine Generator – Civil works	252.00	0.00	10.00	0.00	0.00	262.00
Off-site Civil & Mechanical	463.00	1188.00	1238.00	0.00	0.00	2889.00
Chimney	22.00	0.00	0.00	0.00	0.00	22.00
Steam Generator	1212.00	329.00	0.00	0.00	0.00	1541.00
Turbine Generator	422.00	181.00	0.00	0.00	0.00	603.00
Station C&I	101.00	209.00	5.00	0.00	0.00	315.00
Coal Handling Plant	69.00	50.00	0.00	0.00	0.00	119.00
Fuel Oil Handling Plant	47.00	0.00	0.00	0.00	0.00	47.00
Cooling water – Civil works	38.00	0.00	0.00	0.00	0.00	38.00
Cooling water – Mech. works	0.00	60.00	2.00	0.00	0.00	62.00
Raw Water Reservoir	0.00	0.00	35.00	0.00	0.00	35.00
Water Treatment Plant	10.00	123.00	103.00	0.00	0.00	236.00
De Mineralization Plant	2.00	2.00	0.00	0.00	0.00	4.00
Cooling Tower – Civil works	9.00	0.00	0.00	0.00	0.00	9.00
Cooling Tower – Mechanical works	0.00	0.00	153.00	0.00	0.00	153.00
Condensate Polishing Unit	74.00	0.00	0.00	0.00	0.00	74.00
Fire Detection Protection System	123.00	210.00	34.00	0.00	0.00	367.00
Air Conditioning	0.00	106.00	0.00	0.00	0.00	106.00
Ventilation	9.00	45.00	0.00	0.00	0.00	54.00
Generator Bus duct	8.00	0.00	0.00	0.00	0.00	8.00
LT Control cables	28.00	0.00	0.00	0.00	0.00	28.00
Cabling	165.00	186.00	0.00	0.00	0.00	351.00
Power Transformer	0.00	35.00	0.00	0.00	0.00	35.00
Construction of maintenance/ storage facilities in Stage-II	20.00	0.00	0.00	0.00	0.00	20.00
Other deposit works	3682.00	0.00	0.00	0.00	0.00	3682.00
Tools & Plant	728.00	0.00	0.00	0.00	0.00	728.00
Township Construction	4752.00	330.00	0.00	0.00	0.00	5082.00
Capital Spares	721.00	2626.00	4539.00	0.00	0.00	7886.00
Total	13675.00	5680.00	6136.00	0.00	0.00	25491.00

Works relating to Ash Dyke and Ash Handling System						
Ash Handling Plant	638.00	619.00	0.00	0.00	0.00	1257.00
Ash Dyke	91.00	60.00	0.00	0.00	0.00	151.00
Ash Water Recirculation System	235.00	0.00	0.00	0.00	0.00	235.00
Sub-Total (Ash)	964.00	679.00	0.00	0.00	0.00	1643.00
Total Additional Capitalization	14641.00*	6359.00	6136.00	0.00	0.00	27136.00

*actual figure is ₹146390.00 lakh

14. The petitioner vide Form-9 of has submitted the break-up of additional capital expenditure for 2009-14 in this petition, as under:

Sl. No.	Package Name	Actual					Projected Capital Expenditure		Total
		2009-10	2010-11	2011-12	2012-13	2013-14			
A	Capital Works								
1	Merry Go Round (incl. rolling stock)	244.00	905.60	188.00	0.00	0.00	1337.60		
2	Steam Generator –Civil works	474.40	239.70	125.30	0.00	0.00	839.34		
3	Turbine Generator – Civil works	252.00	106.80	0.00	0.00	0.00	358.84		
4	Off-site Civil & Mechanical	284.30	307.90	452.40	21.90	0.00	1066.60		
5	Chimney	22.15	49.32	0.00	0.00	0.00	71.47		
6	Steam Generator	1310.10	141.80	23.41	0.00	0.00	1475.30		
7	Turbine Generator	462.70	87.93	2.42	0.00	0.00	553.01		
8	Station C&I	101.20	33.74	0.00	0.00	0.00	134.90		
9	Coal Handling Plant	69.30	0.00	0.00	0.00	0.00	69.30		
10	Fuel Oil Handling Plant	46.63	0.00	0.00	0.00	0.00	46.63		
11	Cooling water – Civil works	48.90	8.98	0.00	0.00	0.00	57.88		
12	Cooling water – Mech. works	37.62	0.00	2.39	0.00	0.00	40.01		
13	Raw Water Reservoir	0.00	0.00	0.00	0.00	0.00	0.00		
14	Water Treatment Plant	10.12	2.11	2.16	0.00	0.00	14.39		
15	De-Mineralization Plant	2.05	0.00	0.00	0.00	0.00	2.05		
16	Cooling Tower – Civil works	9.10	5.11	15.79	0.00	0.00	30.00		
17	Cooling Tower – Mechanical works	0.00	0.00	0.00	0.00	0.00	0.00		
18	Condensate Polishing Unit	24.62	6.80	0.98	0.00	0.00	32.40		
19	Fire Detection Protection System	130.68	11.08	78.63	26.81	0.00	247.20		
20	Air Conditioning	0.00	9.29	4.85	0.00	0.00	14.14		
21	Ventilation	9.06	6.20	0.48	0.00	0.00	15.74		
22	Generator Bus duct	8.18	0.00	2.51	0.00	0.00	10.69		
23	LT Control cables	28.40	0.00	0.00	0.00	0.00	28.40		
24	Cabling	165.21	4.09	31.51	0.00	0.00	200.81		
25	Power Transformer	49.01	99.74	0.00	0.00	0.00	148.75		
26	Construction of maintenance/ storage facilities in Stage-II	116.56	475.47	45.62	0.00	0.00	637.65		
27	Other deposit works	3728.93	490.90	426.59	0.00	0.00	4646.40		
28	Tools & Plant	724.68	882.29	321.33	0.00	0.00	1928.30		
29	Township Construction	4747.35	655.16	1674.32	0.00	0.00	7076.83		
30	Capital Spares	721.05	1312.40	6365.80	2130.00	0.00	10529.22		
	Total	13828.15	5842.40	9764.50	2178.71	0.00	31613.78		
B	Works relating to Ash Dyke and Ash Handling System								
31	Ash Handling Plant	638.29	96.28	123.13	167.00	0.00	1024.70		

33	Ash Dyke	98.36	71.16	32.13	490.00	500.00	1191.65
34	Ash Water Recirculation System	235.12	27.49	0.00	0.00	0.00	262.61
	Sub-Total	971.77	194.93	155.26	657.00	500.00	2478.96
	Total Additional Capital Expenditure	14799.90	6037.40	9919.70	2835.70	500.00	34092.75
C	New Claims						
35	Land Compensation	97.19	124.40	149.60	0.00	0.00	371.25
36	11 kV/33 kV Switch Gear/Switch yard	5.01	0.64	7.55	0.00	0.00	13.20
37	Make-Up Water Pump House	0.00	0.00	8865.10	0.00	0.00	8865.10
38	Expenditure on 5 KM GOI Electrification scheme	0.00	0.00	0.00	0.00	1687.20	1687.18
	Sub-Total	102.20	125.20	9022.30	0.00	1687.20	10936.74
	Grand Total	14902.20	6162.40	18942.00	2835.70	2187.20	45029.50

15. It is noticed from the above that the actual/ projected capital expenditure claimed for the period 1.4.2009 to 31.3.2014 is now indicated as ₹34092.75 lakh against the admitted additional capital expenditure of ₹27136.00 lakh vide order dated 20.1.2012 in Petition No.316/2009. The petitioner has further claimed expenditure of ₹10936.74 lakh towards new assets as mentioned in Sl.Nos 35 to 37 of the table above. Thus, the total expenditure claimed by the petitioner is ₹45029.50 lakh, excluding the discharge of un-discharged liabilities of ₹8322.24 lakh during 2009-10, ₹1630.60 lakh during 2010-11 and ₹398.99 lakh during 2011-12. Since the actual additional capital expenditure during 2009-10 was revised, the petitioner was directed vide letter dated 31.1.2013 to provide justification for the revision of the actual expenditure figures for 2009-10 under different heads. However, the petitioner vide its affidavit dated 20.3.2013 has stated that the claim for ₹463.00 lakh was inadvertently made in place of ₹284.307 being the actual expenditure incurred for Off-site (Civil/Mech) during 2009-10 and prayed that the same may be taken on record. The submissions of the petitioner have been considered. We are of the view that huge variations in the claim for actual additional capital expenditure would not only create confusion but also lead to difficulties during prudence check of the claims at the time of truing up. Hence, the petitioner is directed to ensure that the projected expenditure is claimed on a prudent and realistic manner so that such huge variations in capitalization are avoided. The petitioner is also directed to exercise greater caution at the time of filing the relevant particulars on affidavit and it shall be ensured that the information filed is based on records. With regard to the variations in the claim for projected expenditure for the different years and under

various heads in this petition against those allowed in order dated 20.1.2012 in Petition No. 316/2009, the petitioner has clarified as under:

"..The expenditure projected in the original Petition No. 316/2009 was based on tentative estimates based on budgetary offers from vendors without considering taxes & duties, escalation and deviation and on past data & experience available to NTPC, whereas, the actual expenditure is actual cash flow showing expenditure incurred based on the audited figures."

16. We now proceed to consider the claims of the petitioner for capitalization based on the available records and submissions of the parties as stated in the subsequent paragraphs.

17. The Commission in its order dated 20.1.2012 had allowed additional capital expenditure of ₹27136.00 lakh on the basis of actual expenditure incurred by the petitioner. Most of the admitted works were within the original scope of work and had been taken up for execution prior to cut-off date and were at an advanced stage of completion. Moreover, in some of the cases, payments have been deferred by the petitioner for rectification of defects. Accordingly, the Commission by its order dated 20.1.2012 had allowed the capitalization of additional expenditure after relaxation of the cut-off date of the generating station for a period of 2 years i.e. from 31.3.2010 to 31.3.2012 in exercise of its 'Power to relax' in terms of Regulation 44 of the 2009 Tariff Regulations. The petitioner, in the present petition has claimed capitalization for ₹34092.75 lakh during 2009-14 which include assets/works viz. Merry Go Round (Incl. rolling stock), Steam Generator -Civil works, Turbine Generator –Civil works, Construction of maintenance/ storage facilities in Stage-II, other deposit works, Tools & Plant, Township Construction, Ash Handling System etc. The claim for capitalization of ₹34092.75 lakh includes the actual expenditure of ₹ 30757.04 lakh during 2009-12 and projected expenditure of ₹3335.71 lakh during 2012-14.

18. The petitioner has submitted that there is decrease in the additional capital expenditure in respect of the works approved by the Commission on account of non-incurring of the expenditure in some of the assets/works. It has also submitted that In respect of other heads, there is a minor increase in expenditure as against the estimated expenditure. We now examine the variation in the additional capital expenditure in respect of the works allowed by the Commission in the subsequent paragraphs:

Merry Go Round system (including rolling stock i.e. Wagons)

19. The Commission had allowed actual additional capital expenditure of ₹244.00 lakh for Merry Go Round (MGR) system during 2009-10 in its order dated 20.1.2012. The petitioner in the present petition has claimed actual expenditure for ₹1337.61 lakh during 2009-12 for MGR system (including rolling stock i.e. Wagons) which include expenditure for ₹244.02 lakh in 2009-10, ₹905.59 lakh in 2010-11 and ₹188.00 lakh in 2011-12. In justification of the increased claim of ₹1093.61 lakh, the petitioner has submitted that it had inadvertently missed claiming the balance work towards signaling system and finishing works of the MGR system which were part of the original scope of work. Further, the actual expenditure of ₹ 244.02 lakh and the present claim for ₹905.59 lakh and ₹188.00 lakh for the period 2009-10 to 2011-12 have been capitalized in the books of accounts. We have examined the submissions of the petitioner. The revised expenditure of ₹1337.61 lakh towards MGR system is based on the actual expenditure incurred for ₹244.00 lakh in 2009-10, ₹905.59 lakh in 2010-11 and ₹188.00 lakh in 2011-12 which has been capitalized in the books of accounts and duly certified by auditor. Even though the expenditure was not projected for capitalization by the petitioner in Petition No. 316/2009, we are of the view that the disallowance of actual additional capital expenditure incurred during 2010-11 and 2011-12 towards MGR system would result in the non-inclusion of costs actually incurred by the petitioner despite the fact that the beneficiaries have derived the benefit of the said system in the form of better coal handling system. Considering this, we allow the actual additional capital expenditure of ₹244.02 lakh in 2009-10, ₹905.59 lakh in 2010-11 and ₹188.00 lakh in 2011-12 towards MGR system. The petitioner is however directed to exercise greater caution at the time of filing the relevant particulars on affidavit and it shall be ensured that the information filed is based on records.

SG and TG Civil works

20. The Commission in its order dated 20.1.2012 had allowed actual expenditure of ₹753.00 lakh (₹491.00 lakh for SG and ₹252.00 lakh for TG) for SG and TG Civil works during 2009-10. The petitioner in

this petition has claimed further actual additional capital expenditure of ₹239.70 lakh in 2010-11 and ₹125.30 lakh in 2011-12 for Civil Works for Steam Generator as against the projected expenditure of ₹170.00 lakh in 2011-12 and ₹106.80 lakh in 2010-11 for Civil Works of Turbine Generator as against the projected expenditure of ₹10.00 lakh in 2011-12. Thus, the petitioner has claimed a total expenditure of ₹1198.193 lakh during 2009-12 which include ₹839.34 lakh in 2009-12 for SG system and ₹358.84 lakh in 2009-12 for TG system. In justification of the said claim, the petitioner has stated that the deviation in the present claim of actual expenditure incurred as against the projected expenditure allowed by the Commission in order dated 20.1.2012 towards SG and TG Civil works is mainly on account of capitalization of balance structural steel works and consideration of actual weight against the theoretical weight of structural steel for the works capitalized earlier, which has resulted in the capitalization of differential amount under the head of SG and TG Civil works after reconciliation and adjustment of wastage. In view of the above submissions, the actual additional capital expenditure for SG and TG system during 2009-10, 2010-11 and 2011-12 has been allowed.

Off-Site Works (Civil & Mechanical)

21. The Commission in its order dated 20.1.2012 had allowed expenditure for ₹ 2889.00 lakh for Off-Site (Civil & Mechanical) works during 2009-12. The petitioner in this petition has claimed expenditure of ₹1066.58 lakh during 2009-12 for Off-site (Civil & Mechanical) works. The petitioner has submitted that these are balance works in the Plant area like roads, drains, buildings (viz. Workshop, Canteen, Fire station, Gate complex) etc. It has also submitted that the above work was awarded to M/s HSCL. However, the work could not be completed by them and M/s HSCL had left the site, as a result of which the work was offloaded to other agencies. This according to the petitioner resulted in the delay in execution of work thereby reducing the actual capitalization of expenditure in comparison to the projected expenditure allowed by the Commission for the years 2010-11 and 2011-12. The petitioner has further submitted that the delay in the completion of balance works due to off-loading of work shall be completed after the cut-off

date of the generating station. Accordingly, the petitioner has prayed that the actual capital expenditure for the 2010-11 and 2011-12 may be allowed and the projected capital expenditure for the period 2012-14 may be allowed in exercise of 'Power to relax' under Regulation 44 of the 2009 Tariff Regulations. We have considered the submissions of the petitioner. It is observed that the petitioner in Petition No. 316/2009 had raised the plea of non-completion of the work by M/s HSCL and offloading of the balance works to other agencies on account of M/s HSCL leaving the site in support of its justification for the delay in completion of the balance works and the claim for capitalization of the work. Considering this, the Commission by its order dated had extended the cut-off date of the generating station for a period of two years from 31.3.2010 to 31.3.2012 for completion of the balance works to be executed by other agencies. Despite this, the balance works appears to have not been completed by the petitioner. The petitioner has now sought the capitalization of these balance works during 2012-13 with the same plea that the contractor M/s HSCL had abandoned the works and the delay in the completion of balance works is due to off-loading of work to other agencies. The effort made by the petitioner for completion of the balance works within the extended cut-off date (31.3.2012) has not been indicated by the petitioner. The Commission having granted extension of time upto 31.3.2012 for completion of balance works, the petitioner was expected to be diligent to get the works executed within the said period and seek capitalization of the expenditure incurred on this count. Having not done so, the petitioner cannot absolve itself from the responsibility for the delay in the execution of the balance works and the respondents cannot be made to suffer on this count. However, considering the fact that the off-site works are an integral part of the generating station and is covered under the scope of the project and that the expenditure has already been incurred by the petitioner for major portion of the works, we are of the view that disallowance of capitalization of the balance works would not be prudent at this stage. Accordingly, we allow the capitalization of the expenditure of ₹21.90 lakh on balance works for 2012-13 by extending the cut-off date for a further period of one more year i.e upto 31.3.2013, as a special case. However, the IDC on account of delay in the execution of the balance off-site civil works after 31.3.2012 shall not be made admissible to the petitioner. This according to us will

balance the interest of the petitioner and the beneficiaries. However, as the additional capital expenditure on these works have been claimed by the petitioner on projected basis for 2012-13, the petitioner is directed to furnish the year-wise, asset-wise computation of IDC at the time of truing-up of tariff of the generating station. In addition, the petitioner has submitted that there is an inadvertent error in claiming the actual expenditure of ₹463.00 lakh in place of ₹284.30 lakh during 2009-10 and the same may be taken on record. The submissions have been considered. The inadvertent error in the actual expenditure for 2009-10 is corrected as ₹284.30 lakh and the same is allowed along with the actual capital expenditure claimed for the years 2010-11 and 2011-12 respectively.

22. The Commission in its order dated 20.1.2012 had allowed expenditure of ₹22.00 lakh for Chimney during 2009-10. The petitioner in this petition has claimed expenditure for ₹22.15 lakh in 2009-10 and ₹49.32 lakh in 2010-11. Since this work has already admitted by the Commission by order dated 20.1.2012, the expenditure is allowed.

Cooling Water (Civil & Mechanical)

23. The petitioner has claimed expenditure for ₹97.88 lakh for Cooling Water (Civil & Mechanical) works which include ₹57.88 lakh in 2009-11 for Cooling Water Civil works and ₹40.01 lakh in 2009-10 and 2011-12 for Cooling Water Mechanical works. The petitioner has also submitted that the Commission in its order dated 20.1.2012 has allowed expenditure for ₹100.00 lakh for Cooling Water (Civil & Mechanical) for the period 2009-14. It has also submitted that Cooling Water Package (Civil & Mechanical) is a turnkey package, awarded as a single contract. Presently, the total expenditure capitalized for Civil and Mechanical packages is ₹97.88 lakh (Civil for ₹57.87 lakh and Mechanical for ₹40.01 lakh) as against the expenditure of ₹100 lakh (Civil- ₹38.00 lakh and Mechanical- ₹62.00 lakh) allowed for the period 2009-12. In view of the above submissions, the additional capital expenditure for Cooling Water (Civil & Mechanical) works has been allowed.

Condensate Polishing Unit

24. The Commission in its order dated 20.1.2012 had allowed actual additional capital expenditure of ₹ 74.00 lakh for Condensate Polishing unit during 2009-10. The petitioner in this petition has claimed actual expenditure of ₹24.62 lakh in 2009-10, ₹6.80 lakh in 2010-11 and ₹0.98 lakh in 2011-12, on the ground of inadvertent error. Since there is reduction in the actual expenditure (₹32.40 lakh) as capitalized in the books of accounts and duly certified by Auditor, the same has been allowed.

Fire Detection & Protection system

25. The Commission in its order dated 20.1.2012 had allowed actual additional capital expenditure of ₹123.00 lakh in 2009-10, the projected additional capital expenditure ₹210.00 lakh in 2010-11 and ₹34.00 lakh in 2011-12 for Fire Detection & Protection system. The petitioner in this petition has claimed actual expenditure ₹130.68 lakh in 2009-10, ₹11.08 lakh in 2010-11, ₹78.63 lakh in 2011-12 and projected expenditure of ₹26.81 lakh 2012-13. The actual expenditure incurred for the period 2009-12 has been allowed. As regards the claim for the year 2012-13, the petitioner has not indicated the efforts taken by it for completion of the balance works within the extended cut-off date of 31.3.2012. However, since the cut-off date of the generating station has been extended upto 31.3.2013 for the reasons stated in paragraph 21 of this order and since major portion of work has been completed prior to the cut-off date and only a small portion of pipeline laying for firefighting is pending for completion during 2012-13, we allow the additional capital expenditure of ₹26.81 lakh in 2012-13 with a direction that IDC included in the expenditure incurred on these items after the cut-off date of 31.3.2012 shall not be made admissible to the petitioner. The petitioner is directed to furnish the year-wise, asset-wise computation of IDC at the time of truing-up of tariff of the generating station.

Power Transformer work

26. The Commission in its order dated 20.1.2012 had allowed projected expenditure of ₹35.00 lakh for Power Transformer work during 2010-11. The petitioner in this petition has claimed actual expenditure

₹49.01 lakh in 2009-10 and ₹99.74 lakh in 2010-11. The petitioner has submitted that it had inadvertently not claimed the expenditure of ₹49.01 lakh for Power Transformer work during 2009-10 in Petition No. 316/2009 and the same has now been claimed in this petition. It has also submitted that the increase in actual expenditure against the earlier projected expenditure for the year 2010-11 has been incurred on account of balance erection and PVC payments. It has further stated that the payment towards PVC has not been envisaged in the earlier projections as the concerned agency had not submitted the required documents and since these documents have now been produced, the amount is being capitalized, thereby increasing the actual expenditure. As the actual expenditure of ₹49.01 lakh in 2009-10 and ₹99.74 lakh in 2010-11 has been capitalized in the books of accounts and duly certified by Auditor, the said expenditure has been allowed.

Maintenance/Storage facility

27. The Commission in order dated 20.1.2012 had allowed ₹20.00 lakh towards the construction of maintenance/storage facility at Stage-II of the generating station during 2009-10. The petitioner in this petition has claimed expenditure for ₹37.65 lakh during 2009-12 for construction of maintenance/storage facility which include expenditure of ₹116.56 lakh in 2009-10, ₹475.47 lakh in 2010-11 and ₹45.62 lakh in 2011-12. The petitioner has submitted that during the construction period temporary stores have been made and used as a facility for receiving and storing the material meant for construction activities. It has also submitted that the above stores being temporary in nature, the construction of main stores was required and was envisaged in the original scope of work and accordingly, the work was originally awarded to M/s HSCL. However, M/s HSCL abandoned the work and the same had to be offloaded to other agencies. In view of the default by contracting agency the petitioner was not able to arrive at estimated figures for claiming as projected additional capitalization for the period 2009-14 in Petition No.316/2009. Further with the completion of balance work, the petitioner has now claimed the expenditure of ₹475.47 lakh and ₹45.62 lakh as actual capital expenditure which has been capitalized in the books of account for the years 2010-11 and 2011-12 respectively, thereby revising the projected expenditure allowed by the

Commission. We have examined the submission of the petitioner. The revised expenditure of ₹637.65 lakh for construction of maintenance/storage facility at Stage-II is based on the actual expenditure of ₹116.56 lakh in 2009-10, ₹475.47 lakh in 2010-11 and ₹45.62 lakh in 2011-12 which have been capitalized in the books of accounts and duly certified by Auditor. In view of this, the additional capital expenditure has been allowed.

Other Deposit works

28. The Commission in order dated 20.1.2012 had allowed expenditure of ₹3682.00 lakh in 2009-10 for other deposit works including MBOA and IT equipments during 2009-14. The petitioner in this petition has claimed expenditure of ₹4646.42 lakh during 2009-14 for Other deposit works. The petitioner has submitted that this includes actual expenditure of ₹3728.93 lakh in 2009-10, ₹490.90 lakh in 2010-11 and ₹426.59 in 2011-12 lakh. It has further submitted that the deviation in the expenditure claimed in the present petition against the expenditure allowed for other deposit works is on account of the inclusion of MBOA items amounting to ₹ 46.46 lakh along with expenditure of ₹3682.00 lakh claimed for Other deposit works allowed by the Commission. It has further submitted that the actual expenditure of ₹490.90 lakh claimed towards Other deposit works, Information technology (IT) equipments and MBOAs in 2010-11 and ₹426.59 lakh incurred in 2011-12 towards the procurement of Information technology (IT) equipments and MBOAs are part of the original scope of work. It is observed that the actual expenditure incurred is based on the amounts of ₹3728.93 lakh in 2009-10, ₹490.90 lakh in 2010-11 and ₹426.59 lakh in 2011-12 which have been capitalized in the books of accounts and duly certified by Auditor. In view of this, the additional capital expenditure has been allowed.

Tools & Plants procurement

29. The Commission in order dated 20.1.2012 had allowed expenditure ₹728.00 lakh for procurement of Tools & Plants (T&P) for plant operation in 2009-10. The petitioner in this petition has claimed actual expenditure of ₹1928.30 lakh which includes actual expenditure of ₹724.68 lakh in 2009-10, ₹882.29 lakh

in 2010-11 and ₹321.33 lakh in 2010-11 for procurement of T&P. The petitioner has submitted that the said claim for ₹882.29 lakh and ₹321.33 lakh was inadvertently not made for the years 2010-11 and 2011-12 in Petition No. 316/2009 , The petitioner has further submitted that Tools & Plants are essential requirements for the smooth and efficient running of the generating station and form part of the original scope of work. Since these are one time expenditure as per industry practice and are procured and capitalized under the original scope of work within the cut-off date of the generating station, the actual additional capital expenditure of ₹724.68 lakh in 2009-10, ₹882.29 lakh in 2010-11 and ₹1674.32 lakh in 2011-12 which have been capitalized in the books of accounts and duly certified by auditor, has been allowed.

Township Construction

30. The Commission in order dated 20.1.2012 had allowed expenditure of ₹4752.00 lakh in 2009-10 and ₹330 lakh in 2010-11 for township construction. The petitioner in this petition has claimed actual expenditure of ₹7076.83 lakh which includes actual expenditure of ₹4747.35 lakh in 2009-10, ₹656.16 lakh in 2010-11 and ₹1674.32 lakh in 2012-13 for township construction. The petitioner has submitted that based on the audited Annual accounts, the actual expenditure incurred is ₹4747.35 lakh. The petitioner has also submitted that the projection of additional capitalization for the years 2010-11 and 2011-12 is due to the capitalization of some of the balance work which was inadvertently not taken into account in the projected capitalization allowed by the Commission. The submissions of the petitioner has been examined and since the actual expenditure of ₹7076.83 lakh for township construction is based on the amount of ₹4747.35 lakh in 2009-10, ₹656.16 lakh in 2010-11 and ₹1674.32 lakh in 2011-12 which have been capitalized in the books of accounts and duly certified by auditor, the expenditure for Township construction is allowed.

Capital Spares

31. The Commission in order dated 20.1.2012 had allowed expenditure of ₹7886.00 lakh towards the procurement of capital spares. The petitioner in this petition has claimed actual expenditure of ₹8399.22

lakh during the years 2009-10, 2010-11 and 2011-12 and projected expenditure of ₹2130.00 lakh in 2012-13 for procurement of capital spares. This works out to 2.42% of the capital cost of ₹434768.00 lakh as on the relaxed cut-off date (30.3.2012). The petitioner has submitted that it had projected the capitalization of capital spares based on the tentative date of delivery as committed by the vendor during the placement of award and the present claim is based on the actual receipt of the capital spares at the generating station for the years 2010-11 and 2011-12. It has also submitted that the projections made for the year 2012-13 (i.e after the cut-off date) is based on the delivery date as provided by M/s BHEL and other vendors for which the order was placed during the years 2008-09 and 2009-10. In line with our decision in paragraph 21 of this order extending the cut-off date of the generating station till 31.3.2013 and since capital spares for which orders were placed prior to the cut-off date are within the scope of original work and is within the limit specified under Regulation 8 of the 2009 Tariff Regulations, the additional capital expenditure of ₹2130.00 lakh during 2012-13 has been allowed. However, IDC included in the expenditure incurred on these items after the cut-off date of 31.3.2012 shall not be made admissible to the petitioner. The petitioner is directed to furnish the year-wise, asset-wise computation of IDC at the time of truing-up of tariff of the generating station.

Ash Handling System

32. The Commission in order dated 20.1.2012 had allowed expenditure of ₹1643.00 lakh for Ash handling system during 2009-14 which includes expenditure of ₹1257.00 lakh for Ash handling plant, ₹151.00 lakh for Ash dyke raising works and ₹235.00 lakh for Ash Water Recirculation System. The petitioner in this petition has claimed expenditure for ₹2478.96 lakh during 2009-14 for works relating to Ash dyke and Ash handling system. This includes actual expenditure of ₹857.70 lakh in 2009-12 and projected expenditure of ₹167.00 lakh in 2012-13 for Ash handling plant, actual expenditure of ₹201.65 lakh during 2009-12 and projected expenditure of ₹990.00 lakh during 2012-14 for Ash dyke raising works and actual expenditure of ₹262.61 lakh during 2009-11 for Ash Water Recirculation System works. As

regards Ash handling plant, the petitioner has submitted that the payment in 2012-13 mainly relates to erection/commissioning of dry ash extraction system and PG Test/ trial operation of the same and the balance miscellaneous works including erection and commissioning of EOT cranes at various location of Ash handling system. It has also submitted that since most of the work has already been completed up to 2011-12, the expenditure on balance work after the cut-off date may be allowed by the Commission in exercise of the 'Power to relax' vested under the 2009 Tariff Regulations. As regards Ash dyke and Water Recirculation System, the petitioner has pointed out that these works have already been allowed by the Commission in order dated 20.1.2012 in Petition No. 316/2009 and that the deferred works related to ash dyke and ash handling system within the original scope of contract after the cut-off date are allowed by the Commission. By affidavit dated 20.3.2013, the petitioner has submitted that the expenditure incurred during 2010-11 and 2011-12 is towards completion of the balance works of Stage-II Ash dyke and the total amount capitalized is well within the revised cost estimate for ash dyke. The petitioner has clarified that the total expenditure for ₹990.00 lakh for 2012-14 is towards first raising of Starter ash dyke and the work is in progress. The matter has been examined. The expenditure in respect of works related to Ash Water Recirculation System (AWRS) and Ash dykes relate to payment for the balance left over works which are within the scope of original contract and which are in an advanced stage of completion. Moreover, the claims of the petitioner for the years 2009-10 and 2010-11 are within the original cut-off date of the generating station (31.3.2012). In view of this, the expenditure for deferred works relating to Ash handling system within the original scope of work has been considered in terms of Regulation 9(1)(ii) of the 2009 Tariff Regulations. However, the expenditure for ₹167.00 lakh in 2012-13 towards Ash handling plant and ₹990.00 lakh during 2012-14 towards Ash dyke works are deferred works relating to ash handling system within the original scope of works and hence allowed to be capitalized in terms of Regulation 9(2)(iii) of the 2009 Tariff Regulations. Based on the above discussions, the total expenditure of ₹2478.96 lakh during 2009-14, in respect of works relating to Ash dyke and Ash handling system has been allowed.

33. Other additional capital expenditure on works/ assets like Steam generator, turbine generator, Station C&I, Coal Handling plant, Water treatment plant, Cooling tower (Civil and Mechanical works), Cooling water (Civil and Mechanical works), Ventilation, Air conditioning, LT control cables, Raw water reservoir, de-mineralization plant, Fuel oil handling plant, Generator bus conduct etc as claimed in the table under para 15 above, appear to be lesser or marginally higher than the expenditure allowed by the Commission in order dated 20.1.2012. Since these works have been found justified and has been allowed as projected additional capital expenditure in the order dated 20.1.2012 in Petition No.316/2009, the same is allowed.

New Claims

Land compensation

34. The petitioner has claimed actual expenditure of ₹371.25 lakh (₹97.19 for 2009-10, ₹124.43 lakh for 2010-11 and ₹149.63 for 2011-12) towards land compensation for 2009-12. The petitioner has submitted that the said expenditure has been incurred towards compensation for land acquired for (i) construction of road over bridge at MGR (ii) making discharge drain of Ash dyke and (iii) the Rehabilitation & Resettlement (R&R) activities of project affected people. The petitioner has also submitted that out of the total amount claimed for land compensation, a payment of ₹61.20 lakh during 2011-12 had been incurred for additional land acquired as per the orders issued by the State Govt. of Chhattisgarh and the balance amount of ₹310.00 lakh was incurred for construction of roads (Sampark marg), schools, community centers, weekly market, deepening of ponds etc. in the villages affected by the project and accordingly the same has been capitalized under R&R works for the period 2009-14. We have examined the submissions of the petitioner. It is observed from the documents submitted by the petitioner that the said expenditure has been incurred for reasons mentioned therein and is found justified. In view of this, the additional capital expenditure of ₹371.254 lakh has been allowed.

Make-up Water Pump House

35. The petitioner in Form-9 of this petition has claimed actual additional capital expenditure of ₹8865.10 lakh during 2011-12 towards Make-Up Water (MUW) pump house. In justification of its claim, the petitioner has submitted that this is part of original scope of work of MUW Pump House and major work pertaining to this generating station was completed and capitalized along with COD. It has also submitted that the expenditure claimed relates to payment for works of the balance systems which have been made ready after COD of the generating station and have been capitalized in 2011-12. The petitioner in its affidavits dated 20.3.2013 and 10.9.2013 has submitted that the MUW system is a common facility for both stages (Stage- I and Stage-II) of the project. It has also submitted that work of both the stages were started simultaneously with a plan to develop common facilities like MGR, Township, Make up water system etc. with a view to optimize the cost of the project. It has further submitted that with the declaration of commercial operation (COD) of the first unit of 500 MW of this generating station prior to the COD of the units of Stage-I, the part of the expenditure incurred towards MUW system for supply of raw water to Sipat project, like other common facilities, was capitalized with first unit of this generating station and was allowed by the Commission. The petitioner has also submitted that the present capitalization pertains to balance works which has been completed in the year 2011-12 and has been capitalized in the books of account. Accordingly, the petitioner has claimed the expenditure of ₹8865.10 lakh for 2011-12 as the work form part of the original scope of work for the generating station. The petitioner has also clarified that no expenditure towards MUW system has been considered in the capital cost of Sipat, Stage-I against the Board approved expenditure of ₹14411.00 lakh (Form 5B, Sl no. 2.3.1) in Petition No. 28/2011(tariff of Sipat STPS, Stage-I). The submissions of the petitioner have been examined. It is observed that in Petition No. 63/2009 & 140/2009 filed by the petitioner pertaining to determination of tariff of this generating station from COD of Unit-IV (20.6.2008) to 31.3.2009, the petitioner had not indicated any balance work relating to MUW system in the list of balance works and the amount capitalized for MUW system in the capital cost of the units of this generating station as on the date of COD. For the purpose of tariff, the cost of any common

facility between the two stages of the project should have been apportioned in order to maintain equilibrium in the tariff of both the stages. Since the petitioner was allowed to capitalize an expenditure of ₹8665.00 lakh towards MUW system in the capital cost of this generating station by order dated 10.12.2009 and the tariff was approved accordingly, we do not intend to carry out any *pro rata* adjustment of the expenditure of ₹8665.00 lakh for the two stages of this generating station specially considering the fact that the same would involve retrospective adjustment of the approved tariff. In this background, there is no justification to allow the balance amount of ₹8865.10 lakh pertaining to balance work of MUW system to this generating station. However, the same would be considered in the capital cost of Stage-I units. Accordingly, expenditure of ₹8865.10 lakh has not been allowed to be capitalized for this generating station.

Expenditure for Supply of electricity within 5 km radius

36. The petitioner has claimed projected expenditure of ₹1687.18 lakh during 2013-14 towards additional cost incurred for provision of supply of electricity in 5km area around the generating station in terms of the scheme notified by the Ministry of Power, Govt. of India on 27.4.2010. It is noticed that the said scheme had been withdrawn by MOP, GOI by its notification dated 25.3.2013. However, by notification dated 5.3.2014 the MOP, GOI has granted exemption from withdrawal of the said scheme in respect of eight generating station of the petitioner and has observed that capitalization of the said expenditure shall be made through the Commission as per provisions of the scheme. Since this generating station has not been included in the notification dated 5.3.2014 granting exemption as stated above, the claim of the petitioner has not been considered.

37. The reconciliation of the actual capital expenditure with that of the books of accounts for the years 2009-10, 2010-11 and 2011-12 as submitted by the petitioner is as under:

	(₹ in lakh)		
	2009-10	2010-11	2011-12
Opening Gross Block	408300.14	411189.45	416797.17
Closing Gross Block	411189.45	416797.17	445008.93
Additional capitalization as per Books of Accounts (2 - 1) (A)	2889.31	5607.715	28211.77

Exclusion for additional capitalization viz -a-viz Books of Accounts (B)	(-) 12033.61	(-) 667.05	8635.78
Additional Capital Expenditure including Exclusions C=(A-B)	14922.92	6274.76	19575.99
Un-discharged liability (D)	20.76	112.36	633.97
Additional Capital Expenditure claimed on cash basis (E)=(D-C)	14902.15	6162.40	18942.02
Discharge of Un-discharged Liability (D)	8322.24	1630.60	398.99
Total Additional Capital Expenditure claimed	23224.39	7793.01	19341.01

Exclusions

38. The summary of exclusions claimed as per books of accounts is as under:

(₹ in lakh)

	2009-10	2010-11	2011-12	Total
Inter-Unit transfer	393.47	134.35	966.26	1494.08
Loan-FERV	(-) 12180.82	(-) 641.63	8198.86	(-) 4623.60
De-capitalization of MBOA	(-) 52.52	(-) 29.73	(-) 93.89	(-) 176.14
Liability Reversal	(-) 193.74	(-) 6.55	(-) 259.72	(-) 460.00
Other Deposit works	0.00	(-) 41.98	0.00	(-) 41.98
De- capitalized capital spares	0.00	(-) 78.78	(-) 51.60	(-) 130.38
De- capitalization of Wagons, Titagarh	0.00	0.00	(-) 124.14	(-) 124.14
Total	(-) 12033.61	(-) 667.05	8635.78	4064.88

39. We consider the exclusions for the years 2009-10, 2010-11 and 2011-12 as under:

Inter-unit transfers

40. An amount of ₹393.47 lakh in the year 2009-10, ₹134.349 lakh in the year 2010-11, and ₹966.26 lakh in the year 2011-12 has been excluded under this head on account of transfer of certain assets like one Loco from Vindhyachal STPS, Stage-III, 17 Wagons to Talcher I/U, Other office equipment I/U GM/AGM office, Transformer and distribution transformer from Mauda STPS in 2009-10. Capital spares from Vindhyachal STPS, Stage-III, Furniture & Fixtures from Korba STPS and Other office equipments from Barh STPS & Gandhar Gas Power Station in 2010-11 and Furniture, Lap-Top from Kawas GPS and Ramagundam STPS, LCD TV from Southern Region HQ, Electrical installation from Solapur STPP and Loco from Mauda STPS. These are temporary inter-unit transfers. The Commission while dealing with petitions for additional capitalization in respect of other generating stations of the petitioner, had decided that both positive and negative entries arising out of inter unit-transfers of temporary nature shall be ignored for the purpose of tariff. In consideration of the same, the exclusion of the amount of (-) ₹1494.08 lakh

during 2009-12 on account of inter-unit transfer of equipment on temporary basis is in order and has been allowed.

FERV

41. The petitioner has excluded an amount of (-) ₹12180.82 lakh during 2009-10, (-) ₹641.63 lakh during 2010-11 and ₹8198.86 lakh during 2011-12 on account of impact of FERV. As the petitioner has billed the said amount directly to the beneficiaries in accordance with the 2004 Tariff Regulations, the exclusion of FERV is in order and has been allowed.

De-capitalization of Miscellaneous Bought Out Assets (MBOA)

42. The petitioner has de-capitalized MBOA and assets in the nature of minor items amounting to (-) ₹52.52 lakh during 2009-10, (-) ₹29.73 lakh during 2010-11 and (-) ₹93.89 lakh during 2011-12 in books of accounts on these assets being rendered unserviceable. The petitioner has sought exclusion of these de-capitalized MBOA on the ground that the capitalization of such assets after cut-off date is not permissible and as such reduced from the capital cost as these assets need to be serviced over the life of the generating station. The arguments of the petitioner are not acceptable. These assets form part of the capital cost allowed in tariff and on these assets becoming unserviceable are required to be taken out from the capital cost. Hence, exclusion sought for de-capitalization of MBOA for (-) ₹52.51 lakh in 2009-10, (-) ₹29.73 lakh during 2010-11 and (-) ₹93.89 lakh during 2011-12 has not been allowed

De-capitalized capital spares

43. The petitioner has de-capitalized capital spares amounting to (-) ₹78.78 lakh during 2010-11 and (-) ₹51.60 lakh during 2011-12 in books of accounts on these spares becoming unserviceable. The petitioner has sought exclusion of these de-capitalized spares on the ground the capitalization of such assets after cut-off date is not permissible and as such reduced from the capital cost as these assets need to be serviced over the life of the generating station. The arguments of the petitioner are not acceptable. These assets were part of capital cost allowed in tariff and on these spares becoming unserviceable, these assets need to be taken

out from the capital cost. Hence, exclusion sought for de-capitalization of spares for (-) ₹78.78 lakh in 2010-11 and (-) ₹51.60 lakh in 2010-11 has not been allowed.

Liability Reversal

44. The petitioner has excluded an amount of (-)₹193.738 lakh (includes assets/ works 11kv/3.3kV switchgear package Unit-V for (-) ₹27.65 lakh and works ERV of (-)₹166.09 lakh) during 2009-10, (-)₹9.273 lakh during 2010-11 and (-)₹259.72 lakh during 2011-12 (includes Generator Transformer of (-)₹230.90 lakh, LT Power of ₹3.21 lakh and off-site Civil work of (-)₹2.21 lakh) on account of reversal of liabilities. The petitioner in its justification has stated the amount pertains to reversal of liabilities from the un-discharged liability as on 1.4.2009. The admitted capital base as on 31.3.2009 is already been reduced by excluding the un-discharged liabilities as on 1.4.2009. Since the effect of the reversal of liabilities has been considered in the opening capital cost, the exclusion claimed has not been allowed.

Other Deposit works

45. The petitioner has excluded an amount of (-)₹41.98 lakh during 2010-11 which had been spent on works for project affected people (PAP) and capitalized during 2009-10. The petitioner has submitted that (-)₹41.98 lakh was de-capitalized in 2010-11 to meet the requirements of books of accounts and since the expenditure pertains to PAP due to acquisition of land, the same was retained in the capital cost by considering this entry under exclusion. It is observed the petitioner has been allowed expenditure of ₹371.26 lakh for land compensation which includes different works for Project Affected People. Further, from the submissions of petitioner, it is evident that the expenditure of (-)₹41.98 lakh was included in the capital cost. Since the reasons/justification for exclusion has not been properly justified by the petitioner, the exclusion sought has been disallowed.

De-capitalization of wagons Titagarh

46. The petitioner has excluded an amount of (-)₹124.14 lakh during 2011-12 on account of de-capitalization of wagons as these wagons got damaged in an accident and being rendered unserviceable.

Since these items have become unserviceable and are beyond repair, the petitioner has accordingly de-capitalized an amount of (-)₹124.14 lakh during 2011-12 in the books of accounts. The petitioner has stated that these wagons shall be replaced in coming years and hence these assets may be kept as a part of capital cost till the replacement. The submission of the petitioner is not acceptable as these de-capitalized wagons were part of capital cost which was allowed in the tariff. Since, these assets have now become un-serviceable and not rendering any useful service, the same cannot remain part of capital cost and should be taken out for purpose of tariff. Hence, exclusion of (-) ₹124.14 lakh during 2011-12 has not been allowed.

47. Based on the above, the summary of exclusions allowed and not admissible for the purpose of tariff is summarized as under:

(₹ in lakh)				
	2009-10	2010-11	2011-12	Total
Exclusions allowed under different heads				
Inter-Unit transfer	393.47	134.35	966.26	1494.08
Loan FERV	(-) 12180.82	(-) 641.63	8198.86	(-) 4623.60
Liability Reversal	(-) 193.74	(-) 9.27	(-) 259.72	(-) 460.00
Total allowed (A)	(-) 11981.00	(-) 516.56	8905.40	(-) 3590.00
(B) Exclusions not allowed under different heads				
De-capitalization of MBOA	(-) 52.52	(-) 29.73	(-) 93.89	(-) 176.14
De-capitalized Capital Spares	0.00	(-) 78.78	(-) 51.60	(-) 130.38
Other Deposit works	0.00	(-) 41.98	0.00	(-) 41.98
De-capitalization of wagons Titagarh	0.00	0.00	(-) 124.14	(-) 124.14
Exclusion not allowed (B)	(-) 52.52	(-) 150.49	(-) 269.60	(-) 472.60
Total	(-) 12033.61	(-) 667.05	8635.78	4064.88

48. Based on the above deliberations, the additional capital expenditure allowed for the period 2009-14 is as under:

(₹ in lakh)							
Sl.No	Head of Work/Equipment	2009-10 (Actual)	2010-11 (Actual)	2011-12 (Actual)	2012-13 (Proj)	2013-14 (Proj)	Total
A	Capital Works						
1	Merry Go Round (Incl. rolling stock)	244.00	905.60	188.00	0.00	0.00	1337.60
2	Steam Generator –Civil works	474.40	239.70	125.30	0.00	0.00	839.34
3	Turbine Generator – Civil works	252.00	106.80	0.00	0.00	0.00	358.84
4	Off-site Civil & Mechanical	284.30	307.90	452.40	21.90	0.00	1066.60
5	Chimney	22.15	49.32	0.00	0.00	0.00	71.47
6	Steam Generator	1310.10	141.80	23.41	0.00	0.00	1475.30

7	Turbine Generator	462.70	87.93	2.42	0.00	0.00	553.01
8	Station C & I	101.20	33.74	0.00	0.00	0.00	134.90
9	Coal Handling Plant	69.30	0.00	0.00	0.00	0.00	69.30
10	Fuel Oil Handling Plant	46.63	0.00	0.00	0.00	0.00	46.63
11	Cooling water –Civil works	48.90	8.98	0.00	0.00	0.00	57.88
12	Cooling water –Mechanical works	37.62	0.00	2.39	0.00	0.00	40.01
13	Raw Water Reservoir	0.00	0.00	0.00	0.00	0.00	0.00
14	Water Treatment Plant	10.12	2.11	2.16	0.00	0.00	14.39
15	De-Mineralization Plant	2.05	0.00	0.00	0.00	0.00	2.05
16	Cooling Tower –Civil works	9.10	5.11	15.79	0.00	0.00	30.00
17	Cooling Tower –Mechanical works	0.00	0.00	0.00	0.00	0.00	0.00
18	Condensate Polishing Unit	24.62	6.80	0.98	0.00	0.00	32.40
19	Fire Detection Protection System	130.68	11.08	78.63	26.81	0.00	247.20
20	Air Conditioning	0.00	9.29	4.85	0.00	0.00	14.14
21	Ventilation	9.06	6.20	0.48	0.00	0.00	15.74
22	Generator Bus duct	8.18	0.00	2.51	0.00	0.00	10.69
23	LT Control cables	28.40	0.00	0.00	0.00	0.00	28.40
24	Cabling	165.21	4.09	31.51	0.00	0.00	200.81
25	Power Transformer	49.01	99.74	0.00	0.00	0.00	148.75
26	Construction of maintenance/ storage facilities in Stage-II	116.56	475.47	45.62	0.00	0.00	637.65
27	Other deposit works	3728.93	490.90	426.59	0.00	0.00	4646.40
28	Tools & Plant	724.68	882.29	321.33	0.00	0.00	1928.30
29	Township Construction	4747.35	655.16	1674.32	0.00	0.00	7076.83
	Total	13107.10	4530.00	3398.70	48.71	0.00	21084.56
B	Works Relating to Ash Dyke and Ash Handling Plant						
30	Ash Handling Plant	638.29	96.28	123.13	167.00	0.00	1024.70
31	Ash Dyke	98.36	71.16	32.13	490.00	500.00	1191.65
32	Ash Water Recirculation System	235.12	27.49	0.00	0.00	0.00	262.61
	Ash Total	971.77	194.93	155.26	657.00	500.00	2478.96
33	Capital Spares	721.05	1312.40	6365.80	2130.00	0.00	10529.22
	Total Additional Capital Expenditure	14799.90	6037.40	9919.70	2835.70	500.00	34092.75
C	New Claim						
34	Land Compensation	97.19	124.40	149.60	0.00	0.00	371.25
35	11 kV/33 kV Switch Gear/Switch Yard	5.01	0.64	7.55	0.00	0.00	13.20
36	Make-Up Water Pump House	0.00	0.00	0.00	0.00	0.00	0.00
37	Expenditure on 5 KM scheme	0.00	0.00	0.00	0.00	0.00	0.00
	Sub-Total	102.20	125.20	9022.30	0.00	0.00	9249.55
	Grand Total	14902.20	6162.40	10076.90	2835.70	500.00	34477.14
	Add : Exclusions not allowed	(-) 52.52	(-) 150.49	(-) 269.60	-	-	(-) 472.61
	Total Additional Capital Expenditure allowed	14849.68	6011.91	9807.29	2835.70	500.00	34004.53

Discharge of liabilities

49. The discharge of liabilities out of the un-discharged liabilities deducted from the capital cost of assets allowed during the years 2009-10, 2010-11 and 2011-12 has been considered as additional capital expenditure on actual basis. However, the petitioner has claimed discharge of liabilities for the year 2012-

13 and 2013-14 on projection basis. The same has been allowed on projection basis which is subject to truing-up in terms of Regulation 6(1) of the 2009 Tariff Regulations. Accordingly, the discharge of liabilities for the period 2009-14 considered as additional capitalization is summarized as under:

(₹ in lakh)				
2009-10	2010-11	2011-12	2012-13	2013-14
8322.24	1630.60	398.99	1787.21	4101.00

50. Accordingly, the total additional capital expenditure allowed for tariff during 2009-14 is summarized as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
	Actual			Projected	
Additional Capital Expenditure allowed after adjustment of de-capitalization	14849.68	6011.91	9807.29	2835.71	500.00
Discharges of liabilities	8322.24	1630.60	398.99	1787.21	4101.00
Total Additional Capital Expenditure allowed for tariff	23171.92	7642.52	10206.29	4622.92	4601.00

51. Accordingly, the capital cost considered for the purpose of tariff for the period 2009-14 is as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Opening Capital cost	384409.56	407581.48	415224.00	425430.29	430053.21
Additional capital expenditure allowed	23171.92	7642.52	10206.29	4622.92	4601.00
Closing Capital cost	407581.48	415224.00	425430.29	430053.21	434654.21
Average Capital cost	395995.52	411402.74	420327.14	427741.75	432353.71

Debt-Equity Ratio

52. Regulation 12 of the 2009 Tariff Regulations provides that:

(a) For a project declared under commercial operation on or after 1.4.2009, if the equity actually deployed is more than 30% of the capital cost, equity in excess of 30% shall be treated as normative loan.

Provided that where equity actually deployed is less than 30% of the capital cost, the actual equity shall be considered for determination of tariff.

Provided further that the equity invested in foreign currency shall be designated in Indian rupees on the date of each investment.

Explanation.- The premium, if any, raised by the generating company or the transmission licensee, as the case may be, while issuing share capital and investment of internal resources created out of its free reserve, for the funding of the project, shall be reckoned as paid up capital for the purpose of computing return on equity, provided such premium amount and internal resources

are actually utilised for meeting the capital expenditure of the generating station or the transmission system.

(2) In case of the generating station and the transmission system declared under commercial operation prior to 1.4.2009, debt-equity ratio allowed by the Commission for determination of tariff for the period ending 31.3.2009 shall be considered.

(3) Any expenditure incurred or projected to be incurred on or after 1.4.2009 as may be admitted by the Commission as additional capital expenditure for determination of tariff, and renovation and modernisation expenditure for life extension shall be serviced in the manner specified in clause (1) of this regulation.

53. The normative Debt equity ratio of 70:30 has been considered for the period 2009-14 as claimed by the petitioner. This is subject to truing-up in terms of Regulation 6 (1) of the 2009 Tariff Regulations.

Return on Equity

54. Regulation 15 of the 2009 Tariff Regulations, as amended on 21.6.2011, provides that:

“(1) Return on equity shall be computed in rupee terms, on the equity base determined in accordance with regulation 12.

(2) Return on equity shall be computed on pre-tax basis at the base rate of 15.5% to be grossed up as per clause (3) of this regulation.

Provided that in case of projects commissioned on or after 1st April, 2009, an additional return of 0.5% shall be allowed if such projects are completed within the timeline specified in Appendix-II.

Provided further that the additional return of 0.5% shall not be admissible if the project is not completed within the timeline specified above for reasons whatsoever.

(3) The rate of return on equity shall be computed by grossing up the base rate with the Minimum Alternate/Corporate Income Tax Rate for the year 2008-09, as per the Income Tax Act, 1961, as applicable to the concerned generating company or the transmission licensee, as the case may be.

(4) Rate of return on equity shall be rounded off to three decimal points and be computed as per the formula given below:

Rate of pre-tax return on equity = Base rate / (1-t)

Where t is the applicable tax rate in accordance with clause (3) of this regulation.

(5) The generating company or the transmission licensee, as the case may be, shall recover the shortfall or refund the excess Annual Fixed charges on account of Return on Equity due to change in applicable Minimum Alternate/Corporate Income Tax Rate as per the Income Tax Act, 1961 (as amended from time to time) of the respective financial year directly without making any application before the Commission:

Provided further that Annual Fixed Charge with respect to tax rate applicable to the generating company or the transmission licensee, as the case may be, in line with the provisions of the relevant Finance Acts of the respective year during the tariff period shall be trued up in accordance with Regulation 6 of these regulations.”

55. The rate for computation of Return on Equity has been computed as per the tax rate applicable to the petitioner generating company in line with the provisions of the relevant Finance Acts of the respective year during the tariff period 2009-10, 2010-11, 2011-12 and 2012-13. However, for the period 2013-14, the rate applicable for the year 2012-13 has been considered which is subject to truing-up. Accordingly the Return on Equity has been computed as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Normative Equity –Opening	115322.87	122274.44	124567.20	127629.09	129015.96
Add: Addition to equity on account of Additional Capital Expenditure	6951.58	2292.75	3061.89	1386.88	1380.30
Normative Equity – Closing	122274.44	124567.20	127629.09	129015.96	130396.26
Average Equity	118798.66	123420.82	126098.14	128322.52	129706.11
Return on Equity (Base Rate)	15.500%	15.500%	15.500%	15.500%	15.500%
Tax Rate applicable to the concerned period.	33.990%	33.218%	32.445%	32.445%	32.445%
Rate of Return on Equity (Pre-Tax)	23.481%	23.210%	22.944%	22.944%	22.944%
Return on Equity (Pre-Tax) (annualized)	27895.11	28645.97	28931.96	29442.32	29759.77

Interest on loan

56. Regulation 16 of the 2009 Tariff Regulations provides that:

“(1) The loans arrived at in the manner indicated in regulation 12 shall be considered as gross normative loan for calculation of interest on loan.

(2) The normative loan outstanding as on 1.4.2009 shall be worked out by deducting the cumulative repayment as admitted by the Commission up to 31.3.2009 from the gross normative loan.

(3) The repayment for the year of the tariff period 2009-14 shall be deemed to be equal to the depreciation allowed for that year.

(4) Notwithstanding any moratorium period availed by the generating company or the transmission licensee, as the case may be the repayment of loan shall be considered from the first year of commercial operation of the project and shall be equal to the annual depreciation allowed.

(5) The rate of interest shall be the weighted average rate of interest calculated on the basis of the actual loan portfolio at the beginning of each year applicable to the project.

Provided that if there is no actual loan for a particular year but normative loan is still outstanding, the last available weighted average rate of interest shall be considered.

Provided further that if the generating station or the transmission system, as the case may be, does not have actual loan, then the weighted average rate of interest of the generating company or the transmission licensee as a whole shall be considered.

(6) The interest on loan shall be calculated on the normative average loan of the year by applying the weighted average rate of interest.

(7) The generating company or the transmission licensee, as the case may be, shall make every effort to re-finance the loan as long as it results in net savings on interest and in that event the costs associated with such re-financing shall be borne by the beneficiaries and the net savings shall be shared between the beneficiaries and the generating company or the transmission licensee, as the case may be, in the ratio of 2:1.

(8) The changes to the terms and conditions of the loans shall be reflected from the date of such re-financing.

(9) In case of dispute, any of the parties may make an application in accordance with the Central Electricity Regulatory Commission (Conduct of Business) Regulations, 1999, as amended from time to time, including statutory re-enactment thereof for settlement of the dispute.

Provided that the beneficiary or the transmission customers shall not withhold any payment on account of the interest claimed by the generating company or the transmission licensee during the pendency of any dispute arising out of re-financing of loan.

57. The interest on loan has been worked out as under:

- (a) The gross loan as determined in order dated 30.9.2011 in Petition No. 63/2009 and 140/2009 amounting ₹ 281702.56 has been considered as balance as on 1.4.2009. This balance has been further reduced to ₹ 269086.69 lakh after an adjustment towards the un-discharged liabilities as on 1.4.2009.
- (b) The Cumulative repayment of loan as on 31.3.2009 as determined in order dated 30.9.2011 in Petition No. 63/2009 and 140/2009 amounting ₹11687.38 has been considered as balance as on 1.4.2009. This balance has been further reduced to ₹11163.96 after an adjustment towards the un-discharged liabilities as on 1.4.2009.
- (c) Accordingly the net normative opening loan as on 1.4.2009 works out to ₹257922.73 lakh.
- (d) Addition to normative loan on account of additional capital expenditure approved above has been considered
- (e) Depreciation allowed for the period under consideration has been considered as repayment of loan during that period. However, these repayments are further adjusted towards the following
 - (i) Adjustment on account of de-capitalization and
 - (ii) Adjustment on account of discharges corresponding to un-discharged liabilities deducted as on 1.4.2009.
- (f) Average net loan is calculated as average of opening and closing of the concerned period.
- (a) Weighted average rate of interest has been calculated as shown below:
 - i) Rate of interest considered in calculation in case of all loans is on annual rate basis.
 - ii) Actual rate of interest corresponding to each loan as furnished by the petitioner has been considered as actual rate of interest.

- iii) Actual draws and repayments, as furnished by the petitioner has been considered. However, the average repayment method has been considered in place of FIFO method wherever, it has been adopted by the petitioner.

58. The computation interest on loan capital is as shown below:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Gross Opening Loan	269086.69	285307.04	290656.80	297801.20	301037.25
Cumulative Repayment of Loan up to previous year	11163.96	31639.03	52542.90	73776.24	95633.10
Net Loan Opening	257922.73	253668.01	238113.90	224024.96	205404.14
Addition of loan due to Additional Capital Expenditure	16220.35	5349.76	7144.41	3236.04	3220.70
Repayment of Loan during the period	20264.50	20961.59	21403.83	21856.86	22092.52
Less: Repayment adjustment on account of de-capitalization	36.76	105.34	188.73	-	-
Add: Repayment adjustment on account of discharges of liabilities.	247.32	47.63	18.25	0.00	0.00
Repayment of Loan during the period (Net)	20475.06	20903.87	21233.35	21856.86	22092.52
Net Loan Closing	253668.01	238113.90	224024.96	205404.14	186532.32
Average Loan	255795.37	245890.96	231069.43	214714.55	195968.23
Weighted Average Rate of Interest on Loan	6.6303%	6.8214%	7.6378%	8.1242%	8.4951%
Interest on Loan	16959.89	16773.29	17648.66	17443.86	16647.70

Depreciation

59. Regulation 17 of the 2009 Tariff Regulations provides that:

“(1) The value base for the purpose of depreciation shall be the capital cost of the asset admitted by the Commission.

(2) The salvage value of the asset shall be considered as 10% and depreciation shall be allowed up to maximum of 90% of the capital cost of the asset.

Provided that in case of hydro generating stations, the salvage value shall be as provided in the agreement signed by the developers with the State Government for creation of the site.

Provided further that the capital cost of the assets of the hydro generating station for the purpose of computation of depreciable value shall correspond to the percentage of sale of electricity under long-term power purchase agreement at regulated tariff.

(3) Land other than the land held under lease and the land for reservoir in case of hydro generating station shall not be a depreciable asset and its cost shall be excluded from the capital cost while computing depreciable value of the asset.

(4) Depreciation shall be calculated annually based on Straight Line Method and at rates specified in Appendix-III to these regulations for the assets of the generating station and transmission system.

Provided that, the remaining depreciable value as on 31st March of the year closing after a period of 12 years from date of commercial operation shall be spread over the balance useful life of the assets.

(5) In case of the existing projects, the balance depreciable value as on 1.4.2009 shall be worked out by deducting 3[the cumulative depreciation including Advance against Depreciation] as admitted by the Commission upto 31.3.2009 from the gross depreciable value of the assets.

(6) Depreciation shall be chargeable from the first year of commercial operation. In case of commercial operation of the asset for part of the year, depreciation shall be charged on pro rata basis.”

60. The cumulative depreciation as on 31.03.2009 as determined in order dated 30.9.2011 in Petition No. 63/2009 and 140/2009 amounting ₹12110.84 lakh has been considered as the balance as on 1.4.2009.

This balance has been further reduced to ₹11568.46 lakh after the adjustment on account of un-discharge liabilities as on 1.4.2009. Depreciation has been calculated based on Straight Line Method and at the rates specified in Appendix to the regulations. Further, proportionate adjustment has been made to the cumulative depreciation corresponding to discharges of liabilities considered during the respective years on account of cumulative depreciation adjusted as on 1.4.2009. Also, the cumulative depreciation has been adjusted on account of de-capitalization considered during the period 2009-14 for the purpose of tariff. Accordingly, the weighted average rate of depreciation for the period 2009-10, 2010-11, 2011-12 and 2012-13 has been worked out based on the actual data provided by the petitioner. For the year 2013-14, the rate applicable for the year 2012-13 has been considered. Accordingly, depreciation has been calculated as shown below:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Average capital cost	395995.52	411402.74	420327.14	427741.75	432353.71
Value of Freehold Land	4896.22	5020.65	5170.28	5170.28	5170.28
Depreciable value @ 90%	351989.37	365743.88	373641.18	380314.32	384465.09
Balance depreciable value	340420.91	333661.84	320567.54	305868.40	288162.30
Rate of Depreciation	5.1174%	5.0952%	5.0922%	5.1098%	5.1098%
Depreciation (for the period)	20264.50	20961.59	21403.83	21856.86	22092.52
Depreciation (Annualized)	20264.50	20961.59	21403.83	21856.86	22092.52
Cumulative depreciation at the end of the period (Before adjustment)	31832.97	53043.63	74477.47	96302.78	118395.31
Add: Cumulative depreciation adjustment on account of discharges of liabilities	256.28	49.35	18.91	-	-

Less: Cumulative depreciation adjustment on account of de-cap	7.20	19.34	50.46	-	-
Cumulative depreciation After adjustment (at the end of the period)	32082.04	53073.64	74445.92	96302.78	118395.31

O&M Expenses

61. O&M expenses as considered in order dated 20.1.2012 in Petition No. 316/2009 as stated below has been considered.

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
O&M expenses	13000	13740	14530	15360	16240

Interest on Working Capital

62. Cost of coal for 1.5 months and cost of secondary fuel for two months as considered in order dated 20.1.2012 in Petition No. 316/2009 as stated below, has been considered.

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Cost of coal for 1.1/2 months	5682.21	5682.21	5697.77	5682.21	5682.21
Cost of secondary fuel oil – 2 month	235.82	235.82	236.47	235.82	235.82

63. Maintenance spares as considered in order dated 20.1.2012 in Petition No. 316/2009 as stated below, has been considered.

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Maintenance Spares	2600	2748	2906	3072	3248

64. Receivables have been worked out on the basis of two months of fixed and energy charges as under:

	(₹ in lakh)				
	2009-10	2010-11	2011-12	2012-13	2013-14
Variable Charges -2 months	7576.27	7576.27	7597.03	7576.27	7576.27
Fixed Charges - 2 months	13890.04	14234.92	14648.26	14922.01	15035.58
Total	21466.31	21811.19	22245.29	22498.29	22611.86

65. O&M expenses for 1 month for the purpose of working capital as allowed in order dated 20.1.2012 in Petition No. 316/2009 has been considered as under.

(₹ in lakh)

	2009-10	2010-11	2011-12	2012-13	2013-14
O & M for 1 month	1083.33	1145.00	1210.83	1280.00	1353.33

66. SBI PLR of 12.25% has been considered in the computation of the interest on working capital.

Necessary computations in support of calculation of interest on working capital are given as under:

(₹ in lakh)

	2009-10	2010-11	2011-12	2012-13	2013-14
Coal Stock- 1.5 months	5682.21	5682.21	5697.77	5682.21	5682.21
Oil stock -2 months	235.82	235.82	236.47	235.82	235.82
O & M expenses	1083.33	1145.00	1210.83	1280.00	1353.33
Spares	2600.00	2748.00	2906.00	3072.00	3248.00
Receivables	21466.31	21811.19	22245.29	22498.29	22611.86
Total Working Capital	31067.67	31622.22	32296.36	32768.31	33131.22
Rate of Interest	12.2500%	12.2500%	12.2500%	12.2500%	12.2500%
Total Interest on Working capital	3805.79	3873.72	3956.30	4014.12	4058.57

Cost of Secondary Fuel

67. The cost of secondary Fuel as allowed in order dated 20.1.2012 in Petition No. 316/2009 as stated below has been considered.

(₹ in lakh)

	2009-10	2010-11	2011-12	2012-13	2013-14
Cost of secondary fuel oil	1414.92	1414.92	1418.80	1414.92	1414.92

Normative Plant Factor Availability (NAPAF)

68. The NAPAF of the generating station is considered as 85% for the period 1.4.2009 to 31.3.2014.

Annual Fixed Charges for 2009-14

69. The annual fixed charges for the period 2009-14 in respect of the generating station are summarized as under:

(₹ in lakh)

	2009-10	2010-11	2011-12	2012-13	2013-14
Depreciation	20264.50	20961.59	21403.83	21856.86	22092.52
Interest on Loan	16959.89	16773.29	17648.66	17443.86	16647.70
Return on Equity	27895.11	28645.97	28931.96	29442.32	29759.77
Interest on Working Capital	3805.79	3873.72	3956.30	4014.12	4058.57
O&M Expenses	13000.00	13740.00	14530.00	15360.00	16240.00
Cost of secondary fuel	1414.92	1414.92	1418.80	1414.92	1414.92
Total	83340.22	85409.49	87889.55	89532.08	90213.49

Note: (i) All figures are on annualized basis. (ii) All the figures under each head have been rounded. (iii) The figure in total column in each year is also rounded. Because of rounding of each figure the total may not be arithmetic sum of individual items in columns

70. The annual fixed charges allowed as above are subject to truing up as per Regulation 6(1) of the 2009 Tariff Regulations.

71. The difference in the annual fixed charges determined by order dated 20.1.2012 and those determined by this order shall be adjusted in accordance with Regulation 6(6) of the 2009 Tariff Regulations.

72. Petition No. 132/GT/2013 is disposed of in terms of the above.

Sd/-
[Neerja Mathur]
Member [EO]

Sd/-
[A.K.Singhal]
Member

Sd/-
[M. Deena Dayalan]
Member

Sd/-
[Gireesh B.Pradhan]
Chairperson