Final True up Petition for FY 201112, 2012-13 & 201314 of various TPS of UPRVUNL

1. Background of the Company and its Generating Capacities

Uttar Pradesh Rajya Vidyut Utpadan Nigam Limited (hereinafter referred to as the 'UPRVUNL' or the 'Petitioner'), is a company incorporated on 25th August 1980 with the principal object of generating electricity. Consequent to the implementation of power sector reforms in the State where under, amongst others, the activities of generation, transmission, distribution and retail supply of electricity carried out by Uttar Pradesh State Electricity Board (UPSEB) have been restructured and UPSEB was unbundled into Uttar Pradesh Power Corporation Limited (UPPCL), Uttar Pradesh Jal Vidyut Nigam Limited (UPJVNL) and UP Rajya Vidyut Utpadan Nigam Limited vide the Uttar Pradesh Electricity Reforms Transfer Scheme, 2000 notification No 149/P-1/2000-24, Lucknow dated January 14th, 2000. As part of the scheme all thermal generating stations as set out in Schedule A to the transfer scheme were transferred to and vested in the Petitioner.

The Transfer Scheme assigned a value of Rs. 6009.63 crs (Prov) to gross fixed assets as on March 31, 1999. The Scheme determined the equity capital as Rs. 1053.71 crs. As part of the Scheme certain liabilities (listed in Schedule 'D' to the Scheme) were retained by GoUP

The Actual Scheme was modified by GoUP vide notification no. 348/P-1/2001-24 dated 25 January 2001, which made the Transfer Scheme of the year 2000 effective from 14 January 2000. The modified Scheme provided that value of gross fixed assets as Rs. 6270.60 crs and increased the equity amount to Rs. 1511.44 Crs.

In pursuance of GOUP notification no., 2740/P-1/2003-24-14P/2003 dated 12th August 2003, UPPCL was further divided into five successor companies, with UPPCL as Transco and four successor distribution companies (hereinafter referred to as "licensees"), which are as follows:

- Paschimanchal Vidyut Vitran Nigam Limited, Meerut (Meerut DisCom)
- Dakshinanchal Vidyut Vitran Nigam Limited, Agra (Agra DisCom)
- Madhyanchal Vidyut Vitran Nigam Limited, Lucknow (Lucknow DisCom)
- Poorvanchal Vidyut Vitran Nigam Limited, Varanasi (Varanasi DisCom)

UPRVUNL is a wholly owned company of the Government of Uttar Pradesh. Pursuant to the Uttar Pradesh Electricity Reforms Act, 1999 and the statutory transfer scheme notified there under, the Petitioner was vested with the activities of generation and sale of electricity from thermal generation assets in the State of Uttar Pradesh. All the electricity generated by the Petitioner is sold to Uttar Pradesh Power Corporation Limited (hereinafter referred to as the 'UPPCL'), which under the aforementioned transfer scheme is vested with the transmission and distribution of electricity in the State of Uttar Pradesh.

UPRVUNL owns, maintains and operates the following generating stations-

TABLE – Present Installed Capacity and Derated capacity of UPRVUNL generating stations

S No	Thermal Power Station	Unit No.	Installed Capacity	Derated Capacity	Date of Commercial Operation
1		1	210 MW	210 MW	01-Jan-87
2	Anpara – A	2	210 MW	210 MW	01-Aug-87
3	•	3	210 MW	210 MW	01-Apr-89
4	A D	4	500 MW	500 MW	01-Mar-94
5	Anpara – B	5	500 MW	500 MW	01-Oct-94
6		1	50 MW	50 MW	15-Aug-67
7		2	50 MW	50 MW	11-Mar-68
8		3	50 MW	Nil	13-Oct-68
9	01 4	4	50 MW	Nil	16-Jul-69
10	Obra – A	5	50 MW	Nil	30-Jul-71
11		6	100 MW	Nil	04-Oct-73
12		7	100 MW	94 MW	14-Dec-74
13		8	100 MW	94 MW	01-Jan-76
14		9	200 MW	200 MW	15-Mar-80
15		10	200 MW	200 MW	06-Mar-79
16	Obra – B	11	200 MW	200 MW	14-Mar-78
17		12	200 MW	200 MW	29-May-81
18		13	200 MW	200 MW	29-Jul-82
19		1	32 MW	Nil	NA NA
20		2	32 MW	Nil	NA
21	Panki	3	110 MW	105 MW	29-Jan-77
22		4	110 MW	105 MW	29-May-77
23		<u> </u>	50 MW	Nil	21-Apr-68
24		2	50 MW	Nil	23-Jan-69
25		3	55 MW	Nil	Mar-72
26	Harduaganj	4	55 MW	Nil	18-Sep-72
27	. iai aaagaiij	5	60 MW	60 MW	14-May-77
28		6	60 MW	Nil	26-Oct-77
29		7	110 MW	105 MW	Aug-78
30	Harduaganj	8	250 MW	250 MW	01-Feb-12
31	Extn.	9	250 MW	250 MW	10-Oct-13
32	Parichha	1	110 MW	110 MW	01-Oct-85
33	ranichha	2	110 MW	110 MW	25-Feb-85
34	Parichha Extn	3	210 MW	210 MW	24-Nov-06
35	ranichna Exth	4	210 MW	210 MW	01-Dec-07
36	Parichha	5	250 MW	250 MW	17-Jul-12
37	Extn. Stage 2	6	250 MW	250 MW	18-Apr-13
	Total	37	5544	4933	

Obra U#6 was deleted from capacity w.e.f. 12.01.2011

[•] Harduaganj U#3 was deleted from capacity w.e.f. 20.11.10

1. Scheme of Regulations and Previous Tariff Orders

The Electricity Act, 2003 (Act 36 of 2003) (hereinafter referred to as the 'Act') came into force with effect from 10.6.2003 and the previous Acts governing the electricity supply in the country viz. The Indian Electricity Act, 1910 (9 of 1910), the Electricity (Supply) Act, 1948 (54 of 1948), and the Electricity Regulatory Commissions Act, 1998 have been repealed. The provisions of the UP Electricity Reform Act, 1999 (Uttar Pradesh Act 24 of 1999) to the extent not inconsistent with the provisions of the Electricity Act, 2003, however, continue to apply to Uttar Pradesh.

Section 61 of the Electricity Act, 2003 deals with Tariff Regulations. Section 62 (1) of the Act provides that the Appropriate Commission shall determine the tariff in accordance with the provisions of the Act, inter-alia, for supply of electricity by a generating company to a distribution licensee. Further, in accordance with Section 86 (1) (a) of the Act, Hon'ble UPERC (hereinafter referred to as the 'Hon'ble Commission') shall determine the tariff of generation of power at stations owned by the UPRVUNL. Section 86 (1) (b) further mandates UPERC to regulate electricity purchase and procurement process of distribution licensees including the price at which electricity shall be procured from the generating companies or licensees.

Accordingly, the Hon'ble Commission issued the first tariff regulations being the Uttar Pradesh Electricity Regulatory Commission (Terms and Conditions of Generation Tariff) Regulations, 2004 which were applicable for FY 2005-06 to 2007-08. Such regulations were extended for FY 2008-09 as well.

The Hon'ble Commission had approved tariff orders for the period FY 2005-06 to 2007-08 dated 26th March, 2007 and for FY 2008-09 dated 6th March, 2009 based on the framework of the aforementioned regulations.

2. Multi Year Tariff Regulations, 2009

Subsequently, the Hon'ble Commission notified the Uttar Pradesh Electricity Regulatory Commission (Terms and Conditions of Generation Tariff) Regulations, 2009 (hereinafter referred to as the 'Regulations') which came into effect from 01.04.2009 and were for the control period of FY 2009-10 to 2013-14. Such regulations recognizing the vintage of certain power stations of the Petitioner namely Obra A Thermal Power Station (TPS), Obra B TPS, Panki TPS, Harduaganj TPS and Parichha TPS, and accordingly provided relaxed operating norms in respect of such stations.

In the interim period it was expected that the plants would undergo Refurbishment and Renovation and Modernisation, so that by the end of the MYT period the machines would run at improved efficiency levels.

Further, in a departure from previous regulations, the 2009 regulations provides that the aforementioned vintage stations namely Obra A TPS, Obra B TPS, Panki TPS, Harduaganj TPS and Parichha TPS may approach the Commission for adjustment in O&M expenses on account of establishment expenses, insurance charges and repair and maintenance based on annual audited financial statements and prudence check

3. MYT Petition for FY 2009-10 to 2013-14

The Petitioner submitted its Multi Year Tariff Petition for FY 2009-10 to 2013-14 on January 20, 2010, being Petition No. 647-656 of 2010 for all its generating units. In the petition the UPRVUNL had submitted the details of the ongoing and proposed schemes towards the Renovation and Modernisation of its vintage stations and had applied for its capitalization in the MYT period and tariff consequences were to follow accordingly. The energy charges and fixed charges were claimed as per the principles stipulated in the regulations.

A significant feature of the MYT Petition was that station wise petitions were filed by the Petitioner unlike previous years filings which were filed for the company as a whole

4. MYT Order and its Broad Features

The Hon'ble Commission decided the MYT Petition No. 647 to 656 of 2010 vide its order dated January 20, 2011. The Hon'ble Commission allowed the capitalisation of the R&M programme as per the original estimates submitted by the Petitioner in the MYT Petition. However, the Hon'ble Commission reduced the allowable debt of Obra BTPS to the extent of Rs. 268.48 crore. The Hon'ble Commission further declined payment of finance and bank charges as claimed by the Petitioner stating that it shall not be allowed separately as these charges are considered as part and parcel of the acquired loans to be invested for addition of Gross Fixed Assets and therefore the same shall be claimed as Fixed Charges in the same manner as is applicable for the recovery of interest during construction.

In a significant departure from the earlier orders, the Hon'ble Commission based on petition by UPRVUNL had considered the allowance of other fuel related expenses like station supplies, lubricants, consumables and pollution cess based on actual amounts incurred.

5. Review Petition and Additional Submission dated September 22, 2011

UPRVUNL had started implementing the Renovation and modernisation programme at its vintage power stations. Bharat Heavy Electricals Limited (BHEL) being the Original Equipment Manufacturers (OEM) was contracted for Renovation and Modernisation of its vintage stations. The decision of the Petitioner to award the contract to BHEL was guided by the guidelines of the Ministry of Power. Ministry of Power (MoP) had issued guidelines for undertaking R&M works and Life Extension (LE) works in respect of thermal power stations vide Letter No. 12/6/99-Th.3 dated 8/12 – January, 2004. The guidelines, inter-alia, provided that the power stations where BHEL has been the Original Equipment Manufacturer, the R&M works may be awarded after negotiations to BHEL. Accordingly, various state utilities (other than Petitioner as well) have awarded contract for executing R&M-cum-LE works at their thermal units to BHEL.

Among the comprehensive refurbishment programme, BHEL had proposed to modernize and up-rate the existing LMZ Turbines installed at Obra TPS Units 9 to 13. In this respect BHEL indicated to the Petitioner that its sub-vendor M/s. Power Machines, Russia has expertise in modernization of LMZ type turbines. In respect of TG and auxiliaries BHEL indicated the scope of works as follows:

"Proposed modernization of 5x200MW Obra TPS includes replacement of flow parts at existing turbines as well as certain units of HPC, IPC and LPC, modernization of control system and other equipment of the turbine unit. In combination with other equipment and units the replaced and modernized components of the turbine will represent a comprehensive whole ensuring high operating ability. The modernization will result in increase of installed electric power of the turbines, increase of cost-effectiveness through decrease of heat rate of the turbine unit and increase of reliability and serviceability."

BHEL indicated that it sub-vendor M/s Power Machines, Russia had substantial experience in refurbishment and modernization of 200 MW and similar LMZ turbines across the world and depicted the following experience:

Reference list of Steam Turbines K-200-130 and K-300-240 with flow parts that has undergone modernization

No.	Turbine Types	TPP, Country	Serial Number	No of St.
1	K-240-181	TPP "Tahkoluoto" (Finland)	1042	1
2	K-200-130	Verhnetagilsk SREPS, Russia	1916	9
3	K-200-130	TPP Mintia Deva, Roumania	1076	1
4	K-200-130	Esti TPP, Estonia	1270	8
5	K-200-130	Balti TPP, Estonia	896	11
6	K-300-240	Konakovskaya SREPS, Russia	929	3
7	K-300-240	Konakovskaya SREPS, Russia	984	5
8	K-300-240	Konakovskaya SREPS, Russia	1066	8
9	K-300-240	Lukomiskaya SREPS, Belorussia	1167	3

Besides BHEL also indicated that there are some other refurbishment projects with M/s Power Machines that are under implementation namely; modernization of 200 MW turbines at TPP Maritza East 3 in Bulgaria, Bitola in Macedonia, Maryisk SREPS in Turkmenistan, etc.

Given the above facts, the Petitioner awarded BHEL the contract for refurbishment of Obra BTPS (5x200 MW) units in a strict time-bound manner.

BHEL had committed to the following time schedule for the refurbishment of Obra BTPS units:

SI	Stage/Activity		Period in months from the effective date						
No.	Stage/Activity	Unit No. 9	Unit No. 10	Unit No. 11	Unit No. 12	Unit No. 13			
1	Engineering	16	19	21	19	21			
2	Manufacturing] 10	17	21	17	21			
3	Transportation	18	21	25	21	25			
4	Dismantling *	16	21	25	21	25			
5	Erection &	22	26	30	26	30			
5	Commissioning	22	20	30	20	3U			

^{*}Except ESP

"The unit shut down allowed for R&M implementation shall be a maximum 7 months for first unit and 6 months intervals for other four units. The activity shall be so planned that the total erection and final commissioning of all the five units are completed during scheduled shut down of the units. Erection of the ESP shall be matched with the erection of the corresponding unit."

Thus as per the contract the timeline for completion of the Refurbishment of all the units were 30 months. Unit No. 9 of 200 MW has been under shut-down since 02.11.2008. However, the above timeline could not be adhered to by BHEL. Unit No. 9 was synchronized on 17.09.2010 but due to problem in R.C. feeders, coal mills and various C&I system problem in hot air / suction air gates and serious problem of high axial shift, unit could not be brought to full load. BHEL submitted an action plan to rectify the above problems and committed to bring the unit on full load by 28th Feb 2011. Such unit could be commissioned by BHEL only by 27th June 2011.

The primary reason of this has been that M/s Power Machines, Russia has terminated its contract with BHEL. As a result BHEL which was earlier heavily dependent on the technical expertise of M/s Power Machines, Russia were left in a quandary. Consequently there was immense delay in the refurbishment programme. BHEL has indicated that after the termination of their contract with M/s. Power Machines, Russia, the work on the unit 10 to 13 will be completed by manufacturing indigenous turbines by importing turbine forgings.

The Petitioner's management had taken up the issue of delay with BHEL at the highest level. In this regard BHEL in a meeting held at CEA on 18.8.2010 between BHEL and Petitioner to review the progress of R&M / Life Extension works at the power stations of UPRVUNL. BHEL had committed to the following revised schedule:

SI No.	Unit No.	Shut down date	Start of E&C work after ESP foundation readiness	Synchronisation date
1	9	02.11.2008	In progress	End of August 2010
2	10	30.11.2010 (after dismantling of Unit No.11 ESP)	28.02.2011	31.08.2011
3	11	30.09.2010	31.10.2011 (after Unit No.10 commissioning)	30.04.2012
4	12	30.09.2011	31.12.2011	30.06.2012
5	13	31.05.2012	31.08.2012	28.02.2013

During a review meeting conducted by MoP held on 18.11.2010, the Petitioner had expressed its serious concern to the MoP in the abnormal delay in commissioning of their Unit No. 9 of 200 MW which has been under shut-down since 02.11.2008

Similarly Gujarat State Electricity Corporation Limited, Punjab State Power Corporation Ltd, Kanti Bijlee Utpadan Nigam Ltd and Bihar State Electricity Board have also expressed their reservations in this regard.

It is also significant to mention that Obra Unit-9 is the first 200MW unit undertaken for refurbishment works in the country and there are such 66 nos., LMZ units in the country which would require LE intervention in due course of time. CEA has indicated that successful

implementation of LE works at Obra would provide positive signal to State/Central Power utilities for taking up LE works at their 200/210 MW units in right earnest.

In this regard the MoP has even written letters to the Department of Heavy Industry to take cognizance of this serious matter and impress upon the BHEL to streamline the R&M-cum-LE works being executed by them at various thermal power stations so that the work is completed in a time bound manner.

The Petitioner considering the developments filed a Review Petition seeking review of the MYT (2009-10 to 2013-14) order dated 21.1.2011 in Petition No. 647-656 of 2010 on the following issues:

- i. Rescheduling of additional capitalization of approved R&M schemes and relaxation of Norms of Operation due to poor contract execution.
- ii. Cascading effect on additional capitalization of R&M Schemes due to consideration of depreciation as deemed loan repayment.
- iii. Reduction of allowable debt of Obra 'B'.
- iv. Re-computation of Interest of Working Capital
- v. Finance and Bank Charges.

However considering more slippages in other stations (namely Anpara BTPS, Obra APTS and Harduaganj TPS), the Petitioner filed an additional submission on September 22, 2011 seeking relaxation in operating norms and suitable adjustment for capitalization/decapitalisation due to delay in start/completion of Renovation and Modernisation schemes in respect of Anpara BTPS, Obra APTS and Harduaganj TPS. The Petitioner in such additional submission had prayed for the transpositioning of the capitalization in respect of the Renovation and Modernisation schemes and had sought relaxation of operating norms in respect of Target Plant Availability Factor, Target Plant Load Factor, Gross Station Heat Rate, Auxiliary Energy Consumption and Specific Fuel Oil Consumption norms.

6. Review Order dated March 20, 2012

The Hon'ble Commission in the Review Order of MYT dated March 20, 2012 has granted partial relief to the UPRVUNL. It has appreciated the dilemma of the Petitioner and allowed the trans-positioning of the capitalisation of the Renovation and Modernisation schemes in respect of Anpara BTPS, Obra APTS and Harduaganj TPS. Further in line with the Petition made by UPRVUNL, the capitalization in respect of Obra BTPS was wholly withdrawn during the MYT period given the uncertainty surrounding its completion. However it did not transpose the improvement trajectories in respect of operating norms namely Target Plant Availability Factor, Target Plant Load Factor, Gross Station Heat Rate, Auxiliary Energy Consumption and Specific Fuel Oil Consumption.

7. Appeal filed against the Review Order

The UPRVUNL has preferred an appeal on a few grounds against the Review Order dated March 20, 2012. The grounds of appeal are discussed in the succeeding paragraphs.

The Hon'ble Commission should have considered the relaxation in operating norms in respect of Obra ATPS, Obra BTPS and Harduaganj TPS till the completion of the renovation and modernization at these stations.

Table: Operating Norms for Obra ATPS prayed for in the Review Petition.

Operating Norm	Unit	2009-10	2010-11	2011-12	2012-13	2013-14
Target Availability	%	60.00%	60.00%	60.00%	60.00%	61.00%
Target PLF	%	55.00%	55.00%	55.00%	55.00%	56.00%
Auxiliary Energy Consumption	%	11.00%	11.00%	11.00%	11.00%	10.80%
Gross Station Heat Rate	kCal/kWh	3000	3000	3000	3000	2990
Specific Fuel Oil Consumption	ml/kWh	4.00	4.00	4.00	4.00	3.80

Table: Operating Norms for Obra BTPS prayed for in the Review Petition.

Operating Norm	Unit	2009-10	2010-11	2011-12	2012-13	2013-14
Target Availability	%	70.00%	70.00%	70.00%	70.00%	70.00%
Target PLF	%	65.00%	65.00%	65.00%	65.00%	65.00%
Auxiliary Energy Consumption	%	10.50%	10.50%	10.50%	10.50%	10.50%
Gross Station Heat Rate	kCal/kWh	2900	2900	2900	2900	2900
Specific Fuel Oil Consumption	ml/kWh	2.50	2.50	2.50	2.50	2.50

Table: Operating Norms for Harduaganj TPS prayed for in the Review Petition.

Operating Norm	Unit	2009-10	2010-11	2011-12	2012-13	2013-14
Target Availability	%	55.00%	55.00%	55.00%	55.00%	56.00%
Target PLF	%	50.00%	50.00%	50.00%	50.00%	51.00%
Auxiliary Energy Consumption	%	11.50%	11.50%	11.50%	11.50%	11.30%
Gross Station Heat Rate	kCal/kWh	3350	3350	3350	3350	3300
Specific Fuel Oil Consumption	ml/kWh	4.50	4.50	4.50	4.50	4.30

By not approving the trans-positioning of operating norms, it has led to a situation where the plants which have outlived their useful lives are expected to improve performance year on year without any renovation and modernisation.

The grounds raised in the appeal by UPRVUNL are that the improvement trajectory should not be applied unless the renovation and modernization is completed at these vintage stations. Till the interim the relaxed norms applicable at the start of the control period (2009-10) may be applicable

for such stations. (Only in case of Obra ATPS, Obra BTPS and Harduaganj. At Anpara BTPS benchmark norms are already applicable and hence it would not get any benefit)

The other ground of appeal is in respect of the allowance of bank and finance charges. The Hon'ble Commission in Para 8-A of the MYT Order has stated:

"However, the payment of finance and bank charges as claimed by the Petitioner will not be allowed separately as these charges are considered as part and parcel of the acquired loans to be invested for addition of Gross Fixed Assets and therefore the same shall be claimed as Fixed Charges in the same manner as is applicable for the recovery of interest during construction."

The Hon'ble Commission in the MYT order has construed that such charges are incurred only at the time of debt mobilization and has therefore prescribed that such charges have to be capitalized. It is submitted that the Petitioner incurs recurring finance and bank charges also. This is a deviation of philosophy from FY 2008-09 tariff order approved by the Hon'ble Commission wherein it had allowed recurring finance and bank charges to the Petitioner.

However, later on an application for withdrawal of the appeal was filed by UPRVUNL and the Hon'ble Appellate Tribunal for Electricity thereby disposed off the said appeal in its order dated 17.05.2013 stating "the Appeal is dismissed as withdrawn".

8. Amendment to Regulations

The Hon'ble Commission on March 20, 2012 notified the Uttar Pradesh Electricity Regulatory Commission (Terms and Conditions of Generation Tariff) (First Amendment) Regulations 2012 which inter-alia provided for the truing up of capital expenditure and tariff by amending Regulation 5 of the Principal Regulations.

Regulation 5 (5) has been added to the Principal Regulations as below:

"Truing up of Capital Expenditure and Tariff:

(i) 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 may in its discretion make an application before the Commission one more time prior to 2013-14 for revision of tariff.

- (ii) The generating company shall make an application, as per Appendix I to these regulations, for carrying out truing up exercise in respect of the generating station or any of its units or block of units thereof by 31-10-2014.
- (iii) The generating company shall submit for the purpose of truing up, details of capital expenditure and additional expenditure and additional capital expenditure incurred for the period from 1-4-2009 to 31-3-2014, duly audited and certified by the auditors.

- (iv) Where after the truing up the tariff recovered exceeds the tariff approved by the Commission under these regulations the generating company shall refund to the beneficiaries, the excess amount so recovered along with simple interest at the rate equal to short-term Prime Lending Rate of State Bank of India prevailing as on 1st April of the respective year.
- (v) Where after the truing up the tariff recovered is less than the tariff approved by the Commission under these regulations the generating company shall recover from the beneficiaries, the under-recovered amount along with simple interest at the rate equal to short-term Prime Lending Rate of State Bank of India prevailing as on 1st April of the respective year.
- (vi) The amount under-recovered or over-recovered, along with simple Interest at the rate equal to short-term Prime Lending Rate of State Bank of India prevailing as on 1st April of the respective year, shall be recovered or refunded by the generating company, in six equal monthly instalments starting within three months from the date of the tariff order issued by the Commission after the truing up exercise." (Emphasis supplied)

The amendment to the Regulations inter-alia provide for the following:

- Filing of an interim truing up petition in respect of capital expenditure incurred and consequential tariff before the final truing up
- Final truing up in respect of capital expenditure incurred and consequential tariff for the period upto FY 2013-14.

9. Filing of True-up Petition for FY 2009-10, FY 2010-11, Actual true-up for FY 2011-12 & Revised estimates for FY 2012-13 & FY 2013-14

The Petitioner filed an interim True-up petition for additional capitalisation based on audited accounts for FY 2009-10 & 2010-11 and Actual accounts for FY 2012-13. In its petition the UPRVUNL claimed the final Truing-up for FY 2009-10, FY 2010-11, Actual truing-up for FY 2011-12 and projection of revised estimates for FY 2012-13 & FY 2013-14. The energy charges and fixed charges for FY 2012-13 & FY 2013-14 were claimed as per the principles stipulated in the regulations. The Petitioner in the true-up petition had claimed a reduction of its Annual Revenue Requirement so as to pass on the variation to the beneficiaries by a reduction in generation tariff, on account of lower O&M expenses and transposition of the R&M milestones as approved in the MYT order dated 20th March, 2012.

10. True-up Order

The Hon'ble Commission decided the True-up Petition vide its order dated November 14, 2013. The Hon'ble Commission allowed the final True-up for FY 2009-10, FY 2010-11, Actual true-up for FY 2011-12 and approved revised estimates for FY 2012-13 & FY 2013-14 based on the submissions made by UPRVUNL. The Hon'ble Commission also allowed the capitalisation of the R&M programme as per the revised estimates submitted by the Petitioner in the True-up Petition. The Hon'ble Commission restated the Annual Revenue Requirement for FY 2009-10 to FY 2013-14 based on the revised submissions made by the Petitioner in its true-up petition.

11. Filing of Final True-up Petition for FY 2011-12, Actual true-up for FY 2012-13 and Revised estimates for FY 2013-14

The Petitioner filed an interim True-up petition for additional capitalisation based on audited accounts for FY 2011-12 and Actual accounts for FY 2012-13. In its petition the UPRVUNL claimed the final Truing-up for FY 2011-12, Actual truing-up for FY 2012-13 and projection of revised estimates for FY 2013-14. The energy charges and fixed charges for FY 2013-14 were claimed as per the principles stipulated in the regulations. The Petitioner in the true-up petition had claimed a reduction of its Annual Revenue Requirement so as to pass on the variation to the beneficiaries by a reduction in generation tariff, on account of lower O&M expenses and transposition of the R&M milestones as approved in the MYT order dated 20th March, 2012.

A hearing on this matter was held with the Hon'ble Commission on 22.07.2014 in which the UPPCL opposed the petition stating that as per the Regulations, the Commission shall carry out the truing-up exercise along-with the tariff petition file for the next tariff period with respect to the capital expenditure including additional capital expenditure incurred upto 31.03.2014. In response to which the Hon'ble Commission directed UPRVUNL to the file a fresh true-up petition along with the MYT petition and accordingly disposed off the current petition vide its Order dated 21st August, 2014.

12. Current Petition and its need, objectives and features

This petition is being filed by the Petitioner in respect of the following:

- 1. Final True-up petition for FY 2011-12, 2012-13 and 2013-14 based on audited accounts
- 2. As the consequential true-up up to FY 2012-13 and FY 2013-14 is negative, the Petitioner is proposing a reduction of its Annual Revenue Requirement so as to pass on the variation to the beneficiaries by a reduction in generation tariff.

The current filings are being made in respect of each generating station of the Petitioner as per the directives of the Hon'ble Commission and past practice. The principles adopted for computing the true up are in accordance with the Generation Tariff Regulations and the True up Order dated November 14, 2013.

The Petitioner has enclosed the audited accounts for FY 2011-12, 2012-13 and 2013-14, on the basis which the true-up has been claimed.

13. Anpara ATPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

13.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

13.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore 2013-2012-13 2013-14 2011-12 **Particulars** 14 **Approved Actual Approved Actual** Approved Actual Opening GFA 819.22 819.22 819.70 821.03 819.70 866.07 Capitalisation 0.48 1.81 45.04 19.55 **Deletions** Closing GFA 819.70 821.03 819.70 866.07 819.70 885.62

13.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

		Figures in			
Anpara 'A' Power Station	2011-12	2012-13	2013-14		
	True up				
Opening GFA	819.22	821.03	866.07		
Additions	1.81	45.04	19.55		
Deletions	-	-	-		
Closing GFA	821.03	866.07	885.62		
Closing Net FA	237.55	252.78	242.00		
Financing:					
Opening Equity	221.47	222.01	235.52		
Additions	0.54	13.51	5.87		
Closing Equity	222.01	235.52	241.39		
Open. Accumulated Depreciation	553.88	583.48	613.29		
Depreciation during the year	29.60	29.81	30.33		
Closing Accumulated	583.48	613.29	643.62		
Depreciation	363.46	013.29	043.02		
Opening Debts	43.87	15.53	17.25		
Additions	1.27	31.53	13.69		
Less: Depreciation	29.60	29.81	30.33		
(normative repayment)	29.00	27.01	ას.აა		
Closing Debts	15.53	17.25	0.61		

13.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2011-12		2012-13		2013-14	
Pai liculai 5	Approved	Actual	Approved	Actual	Approved	Actual

13.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

				9		
Particulars	2011	2011-12		-13	2013-14	
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual
Opening Debts	43.87	43.87	14.63	15.53	-	17.25
Additions	0.34	1.27	-	31.53	-	13.69
Less: Normative repayment	29.58	29.60	14.64	29.81	-	30.33
Closing Debts	14.63	15.53	-	17.25	-	0.61
Average Debt	29.25	29.70	7.32	16.39	-	8.93
Interest on Loan	3.19	3.24	0.80	1.79	-	0.97

13.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

				3		
Particulars	2011-12		2012-13		2013-14	
Pai ticulai S	Approved	Actual	Approved	Actual	Approved	Actual
Opening Equity	221.47	221.47	221.61	222.01	221.61	235.52
Additions	0.14	0.54		13.51		19.55
Closing Equity	221.61	222.01	221.61	235.52	221.61	255.08
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%
Allowable RoE	34.35	34.41	34.35	36.51	34.35	37.42

13.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except

in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

As this thermal power station does not qualify to claim any upside variations in respect of Operation and Maintenance Expenses, hence the same has not been claimed.

However, a summary of the actual O&M expenses vis-à-vis the approved expenses are depicted in the table below for depicting purposes:

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14	
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual
O&M Expenses	114.29	115.15	135.48	159.48	143.23	162.06

13.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 4.10 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

13.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

13.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

Particulars Orco Depreciation incl AAD Interest on	der Al	2011-12 llowable	True-	Order	2012-13	T		2013-14		Total
Depreciation 29.		llowable		Ondon		T		2013-14		
incl AAD			Up (A)	Or der	Allowable	True- Up (B)	Order	Allowable	True- Up (C)	True-Up (A+B+C)
Interest on	58	29.60	0.02	29.59	29.81	0.22	29.59	30.33	0.74	0.98
Long Term 3.7 Loans	19	3.24	0.05	0.80	1.79	0.99	-	0.97	0.97	2.01
Return on 34.	35	34.41	0.06	34.35	36.51	2.16	34.35	37.42	3.07	5.28
loWC 26.	60	26.60	-	27.71	27.71	-	28.13	28.13	-	-
O&M 114	.29	115.15	-	135.48	159.48	-	143.23	162.06	-	-
Compensation 4.1	10	4.10	-	4.10	4.10	-	4.10	4.10	-	-
Total 212	.11	213.11	0.14	232.03	259.40	3.36	239.40	263.01	4.78	8.28

14. Anpara BTPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

14.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

14.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011	-12	2012	2-13	2013-14		
	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	4,762.45	4,762.45	4,789.59	4,797.28	4,789.59	4,818.71	
Capitalisation	27.14	34.83		21.43	691.97	37.10	
Deletions		-		-		-	
Closing GFA	4,789.59	4,797.28	4,789.59	4,818.71	5,481.56	4,855.82	

14.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

	Tigares III KS crore				
Anpara 'B' Power Station	2011-12	2012-13	2013-14		
		True up			
Opening GFA	4,762.45	4,797.28	4,818.71		
Additions	34.83	21.43	37.10		
Deletions	-	-	-		
Closing GFA	4,797.28	4,818.71	4,855.82		
Closing Net FA	4,797.28	4,818.71	4,855.82		
Financing:					
Opening Equity	1,289.00	1,299.45	1,305.88		
Additions	10.45	6.43	11.13		
Closing Equity	1,299.45	1,305.88	1,317.01		
Open. Accumulated Depreciation	3,452.28	3,625.66	3,800.05		
Depreciation during the year	173.38	174.39	175.45		
Closing Accumulated Depreciation	3,625.66	3,800.05	3,975.50		
Opening Debts	21.16	-	-		
Additions	24.38	15.00	25.97		
Less: Depreciation (normative repayment)	45.54	15.00	25.97		
Closing Debts	-	-	-		

14.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

	2011	·12	2012-	·13	2013-14	
Pai ticulai S	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	173.24	173.38	173.73	174.39	216.07	175.45

14.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14		
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Debts	21.16	21.16	-	-	-	=	
Additions	19.00	24.38	-	15.00	553.58	25.97	
Less: Normative repayment	40.16	45.54	-	15.00	42.34	25.97	
Closing Debts	-	-	-	-	511.24	-	
Average Debt	10.58	10.58	-	-	255.62	-	
Interest on Loan	1.41	1.41	-	-	33.95	-	

14.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011-12		2012-13		2013-14	
Pai titulai S	Approved	Actual	Approved	Actual	Approved	Actual
Opening Equity	1,289.00	1,289.00	1,297.14	1,299.45	1,297.14	1,305.88
Additions	8.14	10.45		6.43	138.39	-
Closing Equity	1,297.14	1,299.45	1,297.14	1,305.88	1,435.53	1,305.88
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%
Allowable RoE	201.06	201.41	201.06	202.41	222.51	204.14

14.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and

Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

As this thermal power station does not qualify to claim any upside variations in respect of Operation and Maintenance Expenses, hence the same has not been claimed.

However, a summary of the actual O&M expenses vis-à-vis the approved expenses are depicted in the table below for depicting purposes:

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
O&M Expenses	99.71	104.71	153.60	81.15	162.39	127.24

14.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 3.50 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

14.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

14.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		0044.40			2010 10		2012 14			
		2011-12			2012-13			2013-14		Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True-Up (C)	True- Up (A+B+C)
Depreciation incl AAD	173.24	173.38	0.14	173.73	174.39	0.66	216.07	175.45	-40.62	-39.82
Interest on Long Term Loans	1.41	1.41	-0.00	-	-	-	33.95	-	-33.95	-33.95
Return on Equity	201.06	201.41	0.35	201.06	202.41	1.35	222.51	204.14	-18.37	-16.67
IoWC	41.90	41.90	-	47.20	47.20	-	49.73	49.73	-	-
O&M	99.71	104.71	-	153.60	81.15	-72.45	162.39	127.24	-35.15	-107.60
Compensation Allowance	3.50	3.50	-	3.50	3.50	-	3.50	3.50	-	-
Total	520.82	526.30	0.49	579.09	508.65	-70.44	688.15	560.05	-128.10	-198.04

15. Obra ATPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

15.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

15.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011-	·12	2012	·13	2013-14		
rai ticulai s	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	364.88	364.88	365.00	365.17	365.00	365.19	
Capitalisation	0.12	0.29		0.02	124.60	0.23	
Deletions		-		-		133.49	
Closing GFA	365.00	365.17	365.00	365.19	489.60	231.93	

15.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted

from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

	•	i igui es iii	i ks cioie	
Obra 'A' Power Station	2011-12	2012-13	2013-14	
		True up		
Opening GFA	364.88	365.17	365.19	
Additions	0.29	0.02	0.23	
Deletions	-	-	133.49	
Closing GFA	365.17	365.19	231.93	
Closing Net FA	365.17	365.19	231.93	
Financing:				
Opening Equity	120.34	120.43	120.43	
Additions	0.09	0.01	-39.98	
Closing Equity	120.43	120.43	80.46	
Open. Accumulated Depreciation	134.28	147.40	160.52	
Depreciation during the year	13.12	13.12	13.13	
Closing Accumulated Depreciation	147.40	160.52	173.65	
Opening Debts	146.50	133.59	120.48	
Additions	0.21	0.01	0.16	
Less: Depreciation (normative repayment)	13.12	13.12	13.13	
Closing Debts	133.59	120.48	107.51	

15.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

				• • •	gar os mino or	0.0
Particulars	2011-12		2012-	-13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	13.11	13.12	13.12	13.12	20.37	13.13

15.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	9						
Particulars	2011	-12	2012	-13	2013-14		
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Debts	146.50	146.50	133.47	133.59	120.35	120.48	
Additions	0.08	0.21	-	0.01	99.68	0.16	
Less: Normative repayment	13.11	13.12	13.12	13.12	20.37	13.13	
Closing Debts	133.47	133.59	120.35	120.48	199.66	107.51	
Average Debt	139.99	140.04	126.91	127.04	160.01	114.00	
Interest on Loan	15.41	15.42	13.97	13.99	17.62	12.55	

15.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011-12		2012	-13	2013-14		
Pai ticulai 3	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Equity	120.34	120.34	120.38	120.43	120.38	120.43	
Additions	0.04	0.09		0.01	24.92	-	
Closing Equity	120.38	120.43	120.38	120.43	145.30	120.43	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	16.97	16.98	16.97	16.98	22.52	10.78	

15.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and

Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

Accordingly the variations in respect of Operation and Maintenance Expenses has been claimed for this thermal power station, Wherever the actual O&M Expenses are lower than the approved O&M expenses the total True-up is shown as '-ve' and wherever the actual O&M expense are higher than approved O&M expenses, the total True-up is shown as '+ve'. The variation in O&M expenses has been detailed in the table given below.

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
O&M Expenses	107.14	117.01	61.93	125.54	65.48	128.11

15.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 1.87 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

15.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

15.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14		Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True- Up (C)	True- Up (A+B+C)
Depreciation incl AAD	13.11	13.12	0.01	13.12	13.12	0.00	20.37	13.13	-7.24	-7.23
Interest on Long Term Loans	15.41	15.42	0.01	13.97	13.99	0.02	17.62	12.55	-5.07	-5.04
Return on Equity	16.97	16.98	0.01	16.97	16.98	0.01	22.52	10.78	-11.74	-11.71
IoWC	15.10	15.10	-	14.09	14.09	-	15.18	15.18	-	-
O&M	107.14	117.01	9.87	61.93	125.54	63.61	65.48	128.11	62.63	136.11
Compensation Allowance	1.87	1.87	-	1.87	1.87	-	1.87	1.87	-	-
Total	169.61	179.50	9.90	121.96	185.59	63.64	143.05	181.62	38.58	112.12

16. Obra BTPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

16.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

16.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

	2011-12		2012-	·13	2013-14		
Particulars	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	484.35	484.35	768.78	769.47	768.78	849.81	
Capitalisation	284.43	285.11		80.34		0.09	
Deletions		-		-		-	
Closing GFA	768.78	769.47	768.78	849.81	768.78	849.89	

16.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

Ol IDI D (4-4'	2011 12	1194163111		
Obra 'B' Power Station	2011-12	2012-13	2013-14	
		True up		
Opening GFA	484.35	769.47	849.81	
Additions	285.11	80.34	0.09	
Deletions	-	-	-	
Closing GFA	769.47	849.81	849.89	
Closing Net FA	423.77	474.93	444.39	
Financing:				
Opening Equity	124.95	210.48	234.59	
Additions	85.53	24.10	0.03	
Closing Equity	210.48	234.59	234.61	
Open. Accumulated Depreciation	323.09	345.69	374.87	
Depreciation during the year	22.60	29.18	30.63	
Closing Accumulated	345.69	374.87	405.50	
Depreciation	343.09	3/4.0/	405.50	
Opening Debts	36.74	213.72	240.78	
Additions	199.58	56.24	0.06	
Less: Depreciation	22.60	29.18	30.63	
(normative repayment)	22.00	27.10	30.03	
Closing Debts	213.72	240.78	210.21	

16.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

				9		-
Particulars	2011-	-12	2012-	13	2013-14	
Pai liculai s	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	22.59	22.60	27.71	29.18	27.71	30.63

16.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	· · · · · · · · · · · · · · · · · · ·						
Particulars	2011	-12	2012	-13	2013-14		
Pai titulai 3	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Debts	36.74	36.74	213.26	213.72	185.55	240.78	
Additions	199.10	199.58	-	56.24	=	0.06	
Less: Normative repayment	22.58	22.60	27.71	29.18	27.71	30.63	
Closing Debts	213.26	213.72	185.55	240.78	157.84	210.21	
Average Debt	125.00	125.23	199.41	227.25	171.70	225.49	
Interest on Loan	14.33	14.35	22.85	26.04	19.68	25.84	

16.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011-12		2012	-13	2013-14		
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Equity	124.95	124.95	210.28	210.48	210.28	234.59	
Additions	85.33	85.53		24.10		-	
Closing Equity	210.28	210.48	210.28	234.59	210.28	234.59	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	32.59	32.63	32.59	36.36	32.59	36.36	

16.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and

Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

Accordingly the variations in respect of Operation and Maintenance Expenses has been claimed for this thermal power station, Wherever the actual O&M Expenses are lower than the approved O&M expenses the total True-up is shown as '-ve' and wherever the actual O&M expense are higher than approved O&M expenses, the total True-up is shown as '+ve'. The variation in O&M expenses has been detailed in the table given below.

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
O&M Expenses	164.01	176.75	215.05	157.24	227.35	176.77

16.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 6.50 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

16.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

16.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14		Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True- Up (C)	True- Up (A+B+C)
Depreciation incl AAD	22.59	22.60	0.01	27.71	29.18	1.47	27.71	30.63	2.92	4.40
Interest on Long Term Loans	14.33	14.35	0.02	22.85	26.04	3.19	19.68	25.84	6.16	9.38
Return on Equity	32.59	32.63	0.04	32.59	36.36	3.77	32.59	36.36	3.77	7.58
IoWC	45.73	45.73	-	50.50	50.50	-	52.96	52.96	-	-
O&M	164.01	176.75	12.74	215.05	157.24	-57.81	227.35	176.77	-50.58	-95.65
Compensation Allowance	6.50	6.50	-	6.50	6.50	-	6.50	6.50	-	-
Total	285.75	298.56	12.81	355.21	305.82	-49.38	366.79	329.07	-37.72	-74.29

17. Panki TPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

17.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

17.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011-12		2012-	·13	2013-14		
- rai ticulai s	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	168.28	168.28	175.04	175.28	175.04	175.39	
Capitalisation	6.75	6.99		0.11	-	6.62	
Deletions		-		-		22.01	
Closing GFA	175.04	175.28	175.04	175.39	175.04	160.00	

17.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

		Figures in	
Panki Power Station	2011-12	2012-13	2013-14
		True up	
Opening GFA	168.28	175.28	175.39
Additions	6.99	0.11	6.62
Deletions	-	-	22.01
Closing GFA	175.28	175.39	160.00
Closing Net FA	74.47	68.24	46.39
Financing:			
Opening Equity	39.12	41.22	41.25
Additions	2.10	0.03	-4.62
Closing Equity	41.22	41.25	36.64
Open. Accumulated Depreciation	94.60	100.81	107.15
Depreciation during the year	6.21	6.34	6.46
Closing Accumulated Depreciation	100.81	107.15	113.61
Opening Debts	34.56	33.25	26.99
Additions	4.90	0.08	4.64
Less: Depreciation (normative repayment)	6.21	6.34	6.46
Closing Debts	33.25	26.99	25.16

17.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2011-12		2012-13		2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	6.20	6.21	6.33	6.34	6.33	6.46

17.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	· · · · · · · · · · · · · · · · · · ·						
Particulars	2011	2011-12		-13	2013-14		
Pai liculai 3	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Debts	34.56	34.56	33.09	33.25	26.76	26.99	
Additions	4.73	4.90	-	0.08	=	4.64	
Less: Normative repayment	6.20	6.21	6.33	6.34	6.33	6.46	
Closing Debts	33.09	33.25	26.76	26.99	20.43	25.16	
Average Debt	33.83	33.90	29.93	30.12	23.60	26.07	
Interest on Loan	3.91	3.92	3.46	3.48	2.73	3.01	

17.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011	2011-12		-13	2013-14		
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Equity	39.12	39.12	41.15	41.22	41.15	=	
Additions	2.03	2.10		0.03		6.62	
Closing Equity	41.15	41.22	41.15	41.25	41.15	6.62	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	6.38	6.39	6.38	6.39	6.38	5.68	

17.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and

Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

Accordingly the variations in respect of Operation and Maintenance Expenses has been claimed for this thermal power station, Wherever the actual O&M Expenses are lower than the approved O&M expenses the total True-up is shown as '-ve' and wherever the actual O&M expense are higher than approved O&M expenses, the total True-up is shown as '+ve'. The variation in O&M expenses has been detailed in the table given below.

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14		
	Approved	Actual	Approved Actual		Approved	Actual	
O&M Expenses	95.99	111.95	78.98	118.08	83.50	127.92	

17.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 1.37 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

17.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

17.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011 10		1	0040 40		1	rigares in i	10 01 01 0	Total
	2011-12				2012-13			2013-14		
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True- Up (C)	True- Up (A+B+C)
Depreciation incl AAD	6.20	6.21	0.01	6.33	6.34	0.01	6.33	6.46	0.13	0.15
Interest on Long Term Loans	3.91	3.92	0.01	3.46	3.48	0.02	2.73	3.01	0.28	0.31
Return on Equity	6.38	6.39	0.01	6.38	6.39	0.01	6.38	5.68	-0.70	-0.68
IoWC	17.05	17.05	-	17.72	17.72	-	18.22	18.22	-	-
O&M	95.99	111.95	15.96	78.98	118.08	39.10	83.50	127.92	44.42	99.47
Compensation Allowance	1.37	1.37	-	1.37	1.37	-	1.37	1.37	-	-
Total	130.90	146.89	15.99	114.23	153.38	39.14	118.52	162.66	44.13	99.25

18. Harduaganj TPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

18.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

18.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars -	2011-	·12	2012	·13	2013-14		
Particulars	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	270.49	270.49	263.87	264.29	263.87	264.30	
Capitalisation	0.03	-6.20		0.01	531.12	0.03	
Deletions	6.65	-		-		118.92	
Closing GFA	263.87	264.29	263.87	264.30	794.99	145.42	

18.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

		r igui es iri	II KS CI UI E	
Harduaganj Power Station	2011-12	2012-13	2013-14	
		True up		
Opening GFA	270.49	264.29	264.30	
Additions	-6.20	0.01	0.03	
Deletions	-	-	118.92	
Closing GFA	264.29	264.30	145.42	
Closing Net FA	264.29	264.30	145.42	
Financing:				
Opening Equity	82.15	80.29	80.29	
Additions	-1.86	0.00	-35.66	
Closing Equity	80.29	80.29	44.63	
Open. Accumulated Depreciation	184.22	194.08	203.82	
Depreciation during the year	9.86	9.74	9.74	
Closing Accumulated Depreciation	194.08	203.82	213.56	
Opening Debts	22.85	8.65	-	
Additions	-4.34	0.01	0.02	
Less: Depreciation (normative repayment)	9.86	8.66	0.02	
Closing Debts	8.65	•	-	

18.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2011-	·12	2012-	·13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	9.97	9.86	9.73	9.74	49.67	9.74

18.5. Interest on Loan

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

		9						
Particulars	2011	2011-12		-13	2013-14			
Pai titulai S	Approved	Actual	Approved	Actual	Approved	Actual		
Opening Debts	22.85 22.85		12.90	8.65	3.17	-		
Additions	0.02	-4.34	=	0.01	399.39	0.02		
Less: Normative repayment	9.97	9.86	9.73	8.66	49.67	0.02		
Closing Debts	12.90	8.65	3.17	-	352.89	-		
Average Debt	17.88	15.75	8.04	4.33	178.03	-		
Interest on Loan	2.16	1.91	0.97	0.52	21.56	-		

18.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011	2011-12		-13	2013-14	
Pai ticulai 3	Approved	Actual	Approved	Actual	Approved	Actual
Opening Equity	82.15	82.15	82.16	80.29	82.16	80.29
Additions	0.01	-1.86		0.00	131.74	-
Closing Equity	82.16	80.29	82.16	80.29	213.89	80.29
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%
Allowable RoE	12.27	12.29	12.27	12.29	33.15	6.76

18.7. Operation and Maintenance Expenses

The tariff regulations prescribe that only capital expenditure would be eligible for truing up. The regulations do not provide for truing up in respect of O&M expenses and other variable costs except in certain cases in respect of vintage generating stations of Obra A, Obra B, Panki, Harduaganj and

Parichha where such stations can claim the adjustment in respect of employee expenses, repair and maintenance expenses and insurance charges.

Accordingly the variations in respect of Operation and Maintenance Expenses has been claimed for this thermal power station, Wherever the actual O&M Expenses are lower than the approved O&M expenses the total True-up is shown as '-ve' and wherever the actual O&M expense are higher than approved O&M expenses, the total True-up is shown as '+ve'. The variation in O&M expenses has been detailed in the table given below.

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013-14	
	Approved	Actual	Approved Actual		Approved	Actual
O&M Expenses	83.00	95.16	46.01	70.45	53.07	72.33

18.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 1.07 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

18.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

18.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14	7 117 118 01 01	Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True-Up (C)	True- Up (A+B+C)
Depreciation incl AAD	9.97	9.86	-0.11	9.73	9.74	0.01	49.67	9.74	-39.93	-40.03
Interest on Long Term Loans	2.16	1.91	-0.25	0.97	0.52	-0.45	21.56	-	-21.56	-22.26
Return on Equity	12.27	12.29	0.02	12.27	12.29	0.02	33.15	6.76	-26.39	-26.35
IoWC	10.67	10.67	-	11.81	11.81	-	14.36	14.36	-	-
O&M	83.00	95.16	12.16	46.01	70.45	24.44	53.07	72.33	19.26	55.87
Compensation Allowance	1.07	1.07	-	1.07	1.07	-	1.17	1.17	-	-
Total	119.14	130.95	11.81	81.87	105.89	24.03	172.98	104.37	-68.61	-32.76

19. Parichha TPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

19.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

19.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011-12		2012-	-13	2013-14	
	Approved	Actual	Approved	Actual	Approved	Actual
Opening GFA	224.05	224.05	224.08	224.39	283.75	224.39
Capitalisation	0.02	0.34	59.68	0.01		80.87
Deletions		-		-		-
Closing GFA	224.08	224.39	283.75	224.39	283.75	305.26

19.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

		Figures in	RS Crore	
Parichha Power Station	2011-12	2012-13	2013-14	
		True up		
Opening GFA	224.05	224.39	224.39	
Additions	0.34	0.01	80.87	
Deletions	-	-	-	
Closing GFA	224.39	224.39	305.26	
Closing Net FA	224.39	224.39	305.26	
Financing:				
Opening Equity	54.66	54.76	54.76	
Additions	0.10	0.00	24.26	
Closing Equity	54.76	54.76	79.02	
Open. Accumulated Depreciation	146.55	154.61	162.68	
Depreciation during the year	8.06	8.07	9.52	
AAD	=	-	-	
Closing Accumulated Depreciation	154.61	162.68	172.20	
Opening Debts	22.91	15.08	7.02	
Additions	0.23	0.01	56.61	
Less: Depreciation (normative repayment)	8.06	8.07	9.52	
Closing Debts	15.08	7.02	54.10	

19.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2011-	-12	2012-	·13	2013-14	
Pai ticulai s	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	8.06	8.06	14.02	8.07	12.23	9.52

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	· · · · · · · · · · · · · · · · · · ·					
Particulars	2011-12		2012	2012-13		-14
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual
Opening Debts	22.91	22.91	14.87	15.08	42.62	7.02
Additions	0.02	0.23	41.77	0.01	=	56.61
Less: Normative repayment	8.06	8.06	14.02	8.07	12.23	9.52
Closing Debts	14.87	15.08	42.62	7.02	30.39	54.10
Average Debt	18.89	19.00	28.75	11.05	36.51	30.56
Interest on Loan	2.37	2.38	3.60	1.38	4.57	3.83

19.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

			1.9				
Particulars	2011-12		2012-13		2013-14		
Particulars	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Equity	54.66	54.66	54.66	54.76	72.57	54.76	
Additions	0.01	0.10	17.90	0.00		-	
Closing Equity	54.66	54.76	72.57	54.76	72.57	54.76	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	8.47	8.49	11.25	8.49	11.25	12.25	

19.7. Operation and Maintenance Expenses

Accordingly the variations in respect of Operation and Maintenance Expenses has been claimed for this thermal power station, Wherever the actual O&M Expenses are lower than the approved O&M expenses the total True-up is shown as '-ve' and wherever the actual O&M expense are higher than approved O&M expenses, the total True-up is shown as '+ve'. The variation in O&M expenses has been detailed in the table given below.

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011-12		2012-13		2013-14	
Particulars	Approved		Approved	Actual	Approved	Actual
O&M Expenses	46.96	52.37	69.02	54.49	72.97	46.43

19.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 1.43 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

19.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

19.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14		Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True-Up (C)	True- Up (A+B+C)
Depreciation incl AAD	8.06	8.06	0.00	14.02	8.07	-5.95	12.23	9.52	-2.71	-8.66
Interest on Long Term Loans	2.37	2.38	0.01	3.60	1.38	-2.22	4.57	3.83	-0.74	-2.95
Return on Equity	8.47	8.49	0.02	11.25	8.49	-2.76	11.25	12.25	1.00	-1.75
IoWC	15.47	15.47	-	16.85	16.85	-	17.66	17.66	-	-
O&M	46.96	52.37	5.41	69.02	54.49	-14.53	72.97	46.43	-26.54	-35.65
Compensation Allowance	1.43	1.43	-	1.43	1.43	-	1.43	1.43	=	-
Total	82.75	88.20	5.44	116.17	90.71	-25.46	120.10	91.12	-28.99	-49.00

20. Parichha Extn. TPS

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

20.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

20.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011	-12	2012	2-13	2013-14		
	Approved	Actual	Approved	Actual	Approved	Actual	
Opening GFA	1,740.88	1,740.88	1,751.51	1,751.51	1,751.51	1,751.99	
Capitalisation	10.63	10.63		0.47		6.37	
Deletions		=		-		=	
Closing GFA	1,751.51	1,751.51	1,751.51	1,751.99	1,751.51	1,758.35	

20.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

	Figures in Rs Crore			
Parichha Extn. Power Station	2011-12	2012-13	2013-14	
		True up		
Opening GFA	1,740.88	1,751.51	1,751.99	
Additions	10.63	0.47	6.37	
Deletions	-	-	=	
Closing GFA	1,751.51	1,751.99	1,758.35	
Closing Net FA	1,428.41	1,365.73	1,308.82	
Financing:				
Opening Equity	352.53	355.71	355.86	
Additions	3.19	0.14	1.91	
Closing Equity	355.71	355.86	357.77	
Open. Accumulated Depreciation	260.15	323.11	386.26	
Depreciation during the year	62.96	63.15	63.28	
Closing Accumulated	323.11	386.26	449.54	
Depreciation				
Opening Debts	1,128.22	1,072.71	1,009.88	
Additions	7.44	0.33	4.46	
Less: Depreciation (normative repayment)	62.96	63.15	63.28	
Closing Debts	1,072.71	1,009.88	951.06	

20.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2011-	12	·13	2013-14		
	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	62.96	62.96	63.15	63.15	63.15	63.28

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	ŭ					
Particulars	2011-12		2012	2-13	2013-14	
Particulars	Approved	Actual	Approved	Actual	Approved	Actual
Opening Debts	1,128.22	1,128.22	1,072.70	1,072.71	1,009.56	1,009.88
Additions	7.44	7.44	-	0.33	-	4.46
Less: Normative repayment	62.96	62.96	63.15	63.15	63.15	63.28
Closing Debts	1,072.70	1,072.71	1,009.56	1,009.88	946.41	951.06
Average Debt	1,100.46	1,100.46	1,041.13	1,041.29	977.99	980.47
Interest on Loan	99.70	99.70	94.33	94.34	88.60	88.83

20.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011-12		2012	-13	2013-14	
Pai ticulai s	Approved	Actual	Approved	Actual	Approved	Actual
Opening Equity	352.52	352.52	355.71	355.71	355.71	355.85
Additions	3.19	3.19		0.14		-
Closing Equity	355.71	355.71	355.71	355.85	355.71	355.85
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%
Allowable RoE	55.14	55.14	55.14	55.16	55.14	55.45

20.7. Operation and Maintenance Expenses

As this thermal power station does not qualify to claim any upside variations in respect of Operation and Maintenance Expenses, hence the same has not been claimed.

However, a summary of the actual O&M expenses vis-à-vis the approved expenses are depicted in the table below for depicting purposes:

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013	I Actual	
Pai ticulai S	Approved	Actual	Approved	Actual	Approved	Actual	
O&M Expenses	77.93	71.09	90.32	77.89	95.49	84.50	

20.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 0.00 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

20.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

20.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14		Total
Particulars	Order	Allowable	True- Up (A)	Order	Allowable	True- Up (B)	Order	Allowable	True- Up (C)	True- Up (A+B+C)
Depreciation incl AAD	62.96	62.96	-0.00	63.15	63.15	0.00	63.15	63.28	0.13	0.13
Interest on Long Term Loans	99.70	99.70	0.00	94.33	94.34	0.01	88.61	88.83	0.22	0.23
Return on Equity	55.14	55.14	-0.00	55.14	55.16	0.02	55.14	55.45	0.31	0.33
IoWC	33.94	33.94	-	33.06	33.06	-	33.23	33.23	-	-
O&M	77.93	71.09	-6.84	90.32	77.89	-12.43	95.49	84.50	-10.99	-30.25
Compensation Allowance	-	=	-	-	-	-	-	=	-	-
Total	329.66	322.83	-6.84	335.99	323.60	-12.40	335.60	325.30	-10.32	-29.56

21. Harduaganj Extn.

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

21.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

21.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	2011	-12	2012	2-13	2013	3-14
rai ticulai s	Approved	Actual	Approved	Actual	Approved	Actual
Opening GFA	-	-	1,518.88	1,518.88	2,956.00	1,537.93
Capitalisation	1,518.88	1,518.88	1,437.12	19.05		1,579.75
Deletions		-		-		-
Closing GFA	1,518.88	1,518.88	2,956.00	1,537.93	2,956.00	3,117.68

21.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted

from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

		rigures iri				
Harduaganj Extn. Power Station	2011-12	2012-13	2013-14			
		True up				
Opening GFA	=	1,518.88	1,537.93			
Additions	1,518.88	19.05	1,579.75			
Deletions	-	-	-			
Closing GFA	1,518.88	1,537.93	3,117.68			
Closing Net FA	1,518.88	1,537.93	3,117.68			
Financing:						
Opening Equity	-	455.66	461.38			
Additions	455.66	5.71	473.93			
Closing Equity	455.66	461.38	935.30			
Open. Accumulated Depreciation	-	27.35	82.40			
Depreciation during the year	27.35	55.05	83.83			
AAD	-	-	-			
Closing Accumulated Depreciation	27.35	82.40	166.23			
Opening Debts	-	1,035.86	994.15			
Additions	1,063.22	13.33	1,105.83			
Less: Depreciation (normative repayment)	27.35	55.05	83.83			
Closing Debts	1,035.86	994.15	2,016.15			

21.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

					0	
Particulars	2011-	·12	2012	-13	2013-	14
	Approved	Actual	Approved	Actual	Approved	Actual
Depreciation including AAD	54.70	27.35	147.69	55.05	160.39	83.83

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	· · · · · · · · · · · · · · · · · · ·					
Particulars	2011	-12	2012	2-13	2013	B-14
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual
Opening Debts	-	-	1,008.52	1,035.86	1,866.82	994.15
Additions	1,063.22	1,063.22	1,005.98	13.33	-	1,105.83
Less: Normative repayment	54.70	27.35	147.68	55.05	160.39	83.83
Closing Debts	1,008.52	1,035.86	1,866.82	994.15	1,706.43	2,016.15
Average Debt	504.26	517.93	1,437.67	1,015.01	1,786.63	1,505.15
Interest on Loan	52.95	54.38	150.96	106.58	187.60	158.04

21.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2011	-12	2012	-13	2013	2013-14 Approved Actual 886.80 461.38	
Pai liculai S	Approved	Actual	Approved	Actual	Approved	Actual	
Opening Equity	-	-	455.66	455.66	886.80	461.38	
Additions	455.66	455.66	431.14	5.71		-	
Closing Equity	455.66	455.66	886.80	461.38	886.80	461.38	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	70.63	70.63	137.45	71.51	137.45	144.97	

21.7. Operation and Maintenance Expenses

As this thermal power station does not qualify to claim any upside variations in respect of Operation and Maintenance Expenses, hence the same has not been claimed.

However, a summary of the actual O&M expenses vis-à-vis the approved expenses are depicted in the table below for depicting purposes:

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2011-12		2012	-13	2013-14		
Pai ticulai S	Approved	Actual	Approved	Actual	Approved	Actual	
O&M Expenses	3.26	3.02	107.53	33.26	113.68	82.19	

21.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 0.00 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

21.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

21.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

		2011-12			2012-13			2013-14	3 0/0/0	Total
Particulars	Order	Allowable	True-Up (A)	Order	Allowable	True-Up (B)	Order	Allowable	True-Up (C)	True- Up (A+B+C)
Depreciation incl AAD	54.70	27.35	-27.35	147.69	55.05	-92.64	160.39	83.83	-76.56	-196.55
Interest on Long Term Loans	52.95	54.38	1.43	150.96	106.58	-44.38	187.60	158.04	-29.56	-72.51
Return on Equity	70.63	70.63	-0.00	137.45	71.51	-65.94	137.45	144.97	7.52	-58.42
IoWC	20.35	20.35	-	49.39	49.39	-	50.76	50.76	-	-
O&M	3.26	3.02	-0.24	107.53	33.26	-74.27	113.68	82.19	-31.49	-106.00
Compensation Allowance	-	-	-	-	-	-	-	-	-	-
Total	201.88	175.73	-26.16	593.01	315.79	-277.23	649.89	519.79	-130.09	-433.48

22. Parichha Extn. Stage 2

This section presents the final true-up for FY 2011-12, 2012-13 and 2013-14 in respect of this Thermal Power Station.

22.1. Annual Capacity Charges

As per tariff regulations the annual capacity (fixed) charges consist of

- a) Interest on Loan Capital
- b) Depreciation including Advance against Depreciation
- c) Return on Equity
- d) Operation and maintenance expenses including insurance
- e) Interest on Working Capital
- f) Compensation Allowance

This section provides the description of the approved capacity charges Vs allowable capacity charges for FY 2011-12, FY 2012-13 and FY 2013-14 based on financial statements of the UPRVUNL. On the basis of which the Petitioner has proposed the revised Annual Revenue Requirement and consequentially applied for reduction of its tariff to be charged from beneficiaries.

22.2. Gross Fixed Assets

The Petitioner submits that it has considered the opening balance of gross fixed assets for the financial year 2011-12 from the True-up Order issued by the Hon'ble Commission on 14th November, 2013. The details of such capitalization have been shown in the specific formats annexed to this petition.

Accordingly the following table depicts the approved gross fixed asset balance vis-à-vis actual gross fixed asset balance for FY 2011-12, FY 2012-13 and FY 2013-14:

Table: Gross Fixed Asset Balance

Figures in Rs Crore

Particulars	201	2-13	201	3-14
rai liculai 3	Approved	Actual	Approved	Actual
Opening GFA	-	-	1,411.41	1,261.23
Capitalisation	1,411.41	1,261.23	1,411.41	1,412.32
Deletions		-		-
Closing GFA	1,411.41	1,261.23	2,822.82	2,673.54

22.3. Means of Finance

The Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of

accumulated depreciation, normative loan and normative equity as on 1.4.2011 has been adopted from the approved values in the order dated 14th November, 2013. Accordingly the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

	riguics in its crore			
Parichha Extn. Stage 2 Power Station	2012-13	2013-14		
	Tru	e up		
Opening GFA	-	1,261.23		
Additions	1,261.23	1,412.32		
Deletions	-	-		
Closing GFA	1,261.23	2,673.54		
Closing Net FA	1,261.23	2,673.54		
Financing:				
Opening Equity	-	378.37		
Additions	378.37	423.70		
Closing Equity	378.37	802.06		
Open. Accumulated Depreciation	-	22.70		
Depreciation during the year	22.70	70.83		
Closing Accumulated Depreciation	22.70	93.53		
Opening Debts	-	860.15		
Additions	882.86	988.62		
Less: Depreciation (normative repayment)	22.70	70.83		
Closing Debts	860.15	1,777.95		

22.4. Depreciation

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of Schedule XIV of the Companies Act, 1956 which is depicted in the accounting policies annexed with the audited accounts. However the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix II of such regulations. It is noteworthy of mentioning that the Appendix II prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 12 of the tariff formats submitted along with this petition. Accordingly the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The allowable depreciation is depicted in the table below:

Table: Allowable Depreciation

Particulars	2012-	-13	2013-14		
Pai ticulai S	Approved	Actual	Approved	Actual	
Depreciation including AAD	73.03	22.70	164.67	70.83	

As discussed above, the Hon'ble Commission in its order dated 20th March 2012 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation has been considered as normative loan repayment. The weighted average interest on loan capital was worked out at 10.91% in the order dated 20th March 2012.

70% of the total capitalisation has been considered to be funded through debt. Considering the debt worked out as above and applying the rate of 10.91%, the interest on loan capital has been worked out in the table below:

Table: Allowable Interest on Loan

Figures in Rs Crore

	o						
Particulars	2012	-13	2013-14				
Particulars	Approved	Actual	Approved	Actual			
Opening Debts	-	-	914.96	860.15			
Additions	987.99	882.86	987.99	988.62			
Less: Normative repayment	73.03	22.70	164.67	70.83			
Closing Debts	914.96	860.15	1,738.28	1,777.95			
Average Debt	457.48	430.08	1,326.62	1,319.05			
Interest on Loan	48.04	45.16	139.30	138.50			

22.6. Return on Equity

The opening equity base as on 1.4.2011 has been adopted from the order dated 14th November, 2013. 30% of the total capitalisation has been considered to be funded from equity infusion. The Tariff Regulations prescribe that return on equity would be allowed at the rate of 15.50%. Accordingly, the allowable return on equity has been computed in the table below:

Table: Allowable Return on Equity

Figures in Rs Crore

Particulars	2012	-13	2013-14		
	Approved	Actual	Approved	Actual	
Opening Equity	-	-	423.42	378.37	
Additions	423.42	378.37	423.42	-	
Closing Equity	423.42	378.37	846.84	378.37	
Rate of Return on Equity (%)	15.50%	15.50%	15.50%	15.50%	
Allowable RoE	owable RoE 65.63		131.26	124.32	

22.7. Operation and Maintenance Expenses

As this thermal power station does not qualify to claim any upside variations in respect of Operation and Maintenance Expenses, hence the same has not been claimed.

However, a summary of the actual O&M expenses vis-à-vis the approved expenses are depicted in the table below for depicting purposes:

Table: Allowable Operation and Maintenance Expenses

Figures in Rs Crore

Particulars	2012	-13	2013-14		
Pai liculai S	Approved	Actual	Approved	Actual	
O&M Expenses	53.76	21.80	113.68	43.36	

22.8. Compensation Allowance

The Hon'ble Commission had allowed Rs. 0.00 crore per year in respect of compensation allowance in the MYT order. As no variation is to be allowed in respect of compensation allowance, no adjustment is being sought in true-up petition.

22.9. Interest on Working Capital

The tariff regulations do not prescribe any variation to be allowed in true-up in respect of interest on working capital.

22.10. Summary of the true-up claimed for FY 2011-12, 2012-13 and FY 2013-14

Based on the foregoing discussions, the following table summarizes the truing-up computations for the financial years 2011-12, 2012-13 and FY 2013-14 for approval by the Hon'ble Commission.

Table: True-up Summary for FY 2011-12, 2012-13 and FY 2013-14

Particulars	2012-13		2013-14			Total Trus	
	Order	Allowable	True- Up (A)	Order	Allowable	True-Up (B)	Total True- Up (A+B)
Depreciation incl AAD	73.03	22.70	-50.33	164.67	70.83	-93.84	-144.17
Interest on Long Term Loans	48.04	45.16	-2.88	139.29	138.50	-0.79	-3.67
Return on Equity	65.63	58.65	-6.98	131.26	124.32	-6.94	-13.92
IoWC	25.85	25.85	-	53.34	53.34	-	-
O&M	53.76	21.80	-31.96	113.68	43.36	-70.32	-102.28
Compensation Allowance	-	-	-	-	-	-	-
Total	266.31	174.16	-92.15	602.25	430.35	-171.89	-264.04

23. Prayers

The Petitioner respectfully prays that the Hon'ble Commission may

- 1. Accept this Petition for final truing-up of additional capitalization and associated tariff components for the financial year 2011-12, 2012-13 and 2013-14
- 2. Permit recovery of expenses understated/ not considered in this Petition subsequent to the submission of this petition.
- 3. Condone any inadvertent omissions / errors / short comings and permit the applicant to add /change /modify / alter this Petition and make further submissions as may be required at later stages
- 4. Pass such orders as Hon'ble Commission may deem fit and proper and necessary in the facts and circumstances of the case, to grant relief to the petitioner.