

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Petition No. 172/TT/2014

Coram:

**Shri A.S Bakshi, Member
Dr. M.K. Iyer, Member**

Date of Hearing : 16.11.2015

Date of Order : 26.11.2015

In the matter of:

Truing Up of transmission tariff for 2009-14 tariff period and determination of transmission tariff for 2014-19 tariff period for Transmission System associated with Loktak HEP in North Eastern Region under Regulation 86 of Central Electricity Regulatory Commission (Conduct of Business) Regulations, 1999, Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009, and Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014.

And in the matter of:

Power Grid Corporation of India Ltd.
'SAUDAMINI' , Plot No-2,
Sector-29, Gurgaon -122 001 (Haryana).

.....**Petitioner**

Versus

1. Assam State Electricity Board,
Bijulee Bhawan, Paltan Bazar,
Guwahai – 781001, Assam
2. Meghalaya Electricity Corporation Limited
(Formerly Meghalaya State Electricity Board),
Short Round Road,
Shillong - 793001
3. Government of Arunachal Pradesh,
Itanagar,
Arunachal Pradesh
4. Power & Electricity Department
Government of Mizoram,
Mizoram, Aizwal
5. Electricity Department,



Govt. of Manipur, Keishampat,
Imphal, Manipur

6. Department of Power,
Govt. of Nagaland,
Kohima, Nagaland
7. Tripura State Electricity Corporation Limited,
Bidyut Bhawan, North Banamalipur,
Agartala, Tripura - 700001

....Respondents

The following were present:

For Petitioner : Shri S.K. Narayan, PGCIL
Shri Jasbir Singh, PGCIL
Shri S.S. Raju, PGCIL
Shri M.M. Mondal, PGCIL
Shri S.K. Venkatesan, PGCIL
Shri Sashi Bhushan, PGCIL
Shri Ved Prakash Rastogi, PGCIL
Shri Pramod Kumar, PGCIL

For Respondent : None

ORDER

The present petition has been preferred by Power Grid Corporation of India Ltd. ('the petitioner'), a transmission licensee, for truing up of capital expenditure and tariff for Transmission System associated with Loktak HEP in North Eastern Region (hereinafter referred as "transmission asset") under Regulation 6 of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 (hereinafter referred to as "the 2009 Tariff Regulations") based on actual expenditure for the period 1.4.2009 to 31.3.2014 and for determination of tariff under Central Electricity Regulatory Commission



(Terms and Conditions of Tariff) Regulations, 2014 (hereinafter referred to as “the 2014 Tariff Regulations”) for the period from 1.4.2014 to 31.3.2019 .

2. The respondents are mainly beneficiaries of Eastern Region, who are procuring transmission service from the petitioner.

3. The petitioner has served the petition to the respondents and notice of this application has been published in the newspaper in accordance with Section 64 of Electricity Act, 2003 (“the Act”). No comments have been received from the public in response to the notices published by the petitioner under Section 64 of the Act. None of the respondents have filed any reply to the petition. The hearing in this matter was held on 16.11.2015. Having heard the representatives of the petitioner and perused the material on record, we proceed to dispose of the petition.

4. The brief facts of the case are as follows:-

- a) The transmission asset has been inherited from NHPC and the Commission’s first order dated 10.3.2008 in Petition No. 83/2006 on determination of tariff for tariff period 2004-09 approved capital cost of ₹850.65 lakh as on 1.4.2005.
- b) The tariff for 2004-09 period was approved vide order dated 8.9.2009 in Petition No. 83/2006 in accordance with Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2004.



- c) The tariff for 2009-14 period was allowed vide order dated 1.12.2010 in Petition No. 148/2010 in accordance with the 2009 Tariff Regulations. The tariff allowed for the tariff period 2009-14 is as under:-

(₹ in lakh)

Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Depreciation	19.31	19.31	19.31	19.31	19.31
Interest on Loan	0.00	0.00	0.00	0.00	0.00
Return on Equity	74.37	74.37	74.37	74.37	74.37
Interest on Working Capital	4.33	4.46	4.61	4.76	4.92
O & M Expenses	47.49	50.18	53.07	56.18	59.37
Total	145.50	148.32	151.36	154.62	157.97

- d) The Commission, in its order dated 8.9.2009 had approved capital cost of ₹850.65 lakh as on 31.03.2009.
- e) The Commission, in its order dated 1.12.2010, has determined the tariff based on admitted capital cost of ₹850.65 lakh as on 31.3.2009. No additional expenditure was claimed by the petitioner for the tariff period 2009-14.
- f) The MAT rate applicable as on 2008-09 was considered to arrive at rate of return on equity for the tariff period 2009-14, which is required to be adjusted as per the actual MAT rate applicable for the respective year at the time of truing up of tariff for 2009-14 tariff period.

TRUING UP OF ANNUAL FIXED CHARGES FOR TARIFF PERIOD 2009-14

5. The truing up of tariff for 2009-14 tariff period has been determined as discussed below:-



Capital Cost

6. The petitioner has claimed admitted capital cost of ₹850.65 lakh as on 31.03.2009 for the purpose of tariff. Further, the petitioner has submitted that no additional capitalisation has been incurred in the tariff period 2009-14.

7. Last proviso to Clause (2) of Regulation 7 of the 2009 Tariff Regulations provides that:-

“Provided also that in case of the existing projects, the capital cost admitted by the Commission prior to 1.4.2009 and the additional capital expenditure projected to be incurred for the respective year of the tariff period 2009-14, as may be admitted by the Commission, shall form the basis for determination of tariff”.

8. The capital cost admitted as on 31.03.2009 vide order dated 8.9.2009 has been considered as the opening capital cost as on 1.4.2009 for determination of tariff in accordance with Regulation 7 of the 2009 Tariff Regulations. The admitted capital cost of ₹850.65 lakh as on 1.4.2009 has been considered to work out the trued up tariff for the tariff period 2009-14.

Additional Capital Expenditure

9. The petitioner has not claimed any additional capital expenditure for 2009-14 tariff period, and accordingly, no additional capital expenditure has been considered for the 2009-14 tariff period.

Debt: Equity

10. Clause 2 of Regulation 12 of the 2009 Tariff Regulations provides that:

“In case of the generating station and the transmission system declared under commercial operation prior to 1.4.2009, debt-equity ratio allowed by the



Commission for determination of tariff for the period ending 31.3.2009 shall be considered.”

11. The petitioner has claimed trued up Annual Fixed Charge based on debt-equity ratio of 49.99:50.01 as considered by the Commission in its order dated 01.12.2010 in Petition No. 148/2010. The transmission assets covered in the instant petition are existing assets as the COD is prior to 1.4.2009. At the time of determination of tariff in Petition No. 148/2010, the Commission has considered admitted debt:equity ratio as on 31.3.2009 vide order dated 1.12.2010. The admitted debt:equity ratio of 49.99:50.01 as on 31.3.2009 has been considered as opening debt:equity ratio as on 1.4.2009 for the purpose of truing up of the approved tariff for tariff period 2009-14 as given under:-

Funding	Amount (in ₹ lakh)	(%)
Debt	425.22	49.99
Equity	425.43	50.01
Capital Cost	850.65	100.00

Interest on Loan (“IOL”)

12. The petitioner has not claimed any interest on loan for the tariff period 2009-14 as the complete loan has already been repaid before 01.04.2009. Accordingly, IOL has been considered as NIL for the purpose of truing up of tariff.

Return on Equity (“ROE”)

13. Clause (3), (4) and (5) of Regulation 15 of the 2009 Tariff Regulations provides that:-

“(3) The rate of return on equity shall be computed by grossing up the base rate with the Minimum Alternate/Corporate Income Tax Rate for the year 2008-09, as



per the Income Tax Act, 1961, as applicable to the concerned generating company or the transmission licensee, as the case may be.

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

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

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

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

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

14. The petitioner has submitted that the MAT rate considered in the tariff order approving transmission tariff for the transmission asset for tariff period 2009-14 was 11.330% as applicable for 2008-09. However, for truing up purpose, the computation of ROE for tariff period 2009-14 has been done on the basis of actual MAT rate applicable during 2009-14. The petitioner has submitted the variation in the MAT rate during 2009-14 as per the Finance Act of the relevant year for the purpose of grossing up of ROE, as shown below:

Particulars	MAT Rate	Grossed up RoE (Base rate/(1-t))
2009-10	16.995 %	18.674 %
2010-11	19.931 %	19.358 %
2011-12	20.008 %	19.377 %
2012-13	20.008 %	19.377 %
2013-14	20.961 %	19.610 %



15. Accordingly, the RoE as trued up is shown in the table below:-

(₹ in lakh)					
Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Approved vide Order dated. 01.12.2010	74.37	74.37	74.37	74.37	74.37
As claimed by the petitioner	79.44	82.35	82.44	82.44	83.43
Allowed after trued up	79.44	82.35	82.43	82.43	83.43

The return on equity has increased due to increase in the applicable MAT rate for the purpose of grossing up of base rate of return on equity.

Depreciation

16. Regulation 17 of the 2009 Tariff Regulations provides for the methodology to work out the depreciation. The Commission, in its order dated 01.12.2010 in Petition No. 148/2010, has worked out the depreciation in accordance with Regulation 17 of the 2009 Tariff Regulations based on actual capital expenditure. As there is no variation in actual capital expenditure, the petitioner has submitted that the depreciation for the purpose of Truing up for the tariff period 2009-14 has been considered same as that approved by the Commission in its tariff order in Petition No. 148/2010.

17. The depreciation for the tariff period 2009-14 has been worked out in accordance with Regulation 17 of the 2009 Tariff Regulations based on actual capital expenditure as under:-



(₹ in lakh)

Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Approved in order dated 01.12.2010	19.31	19.31	19.31	19.31	19.31
As claimed by the petitioner	19.31	19.31	19.31	19.31	19.32
Allowed after tried up	19.31	19.31	19.31	19.31	19.31

Operation & Maintenance Expenses (“O&M Expenses”)

18. The petitioner has computed O&M expense for the assets mentioned in the Petition, in accordance with the O&M norms for Single Circuit (Single Conductor) line and 132 kV and below Sub-station, as specified in Regulation 19(g) of the 2009 Tariff Regulations. The petitioner has claimed O&M expenses for 132 kV S/C line of total 118.94 km line length and 1 bay of 132 kV level as given below:

Particulars		2009-10	2010-11	2011-12	2012-13	2013-14
Actual line length (km)	132 kV S/C (Single conductor)	118.94	118.94	118.94	118.94	118.94
Actual (No. of bays)	132 kV & below	1	1	1	1	1
Norms as per Regulation	132 kV S/C (Single conductor) Transmission lines (₹ lakh/km)	0.179	0.189	0.200	0.212	0.224
	132 kV & below (₹ lakh/bay)	26.20	27.70	29.28	30.96	32.73
Total (₹ in lakh)		47.49	50.18	53.07	56.18	59.37

19. The O&M expenses claimed by the petitioner for tariff period 2009-14 is same as that approved by the tariff order dated 1.12.2010 in Petition No.



148/2010. Accordingly, the O&M expenses claimed by the petitioner, allowed and trued up are the same, and they are as follows:-

(₹ in lakh)					
Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Approved in tariff order dtd 01.12.2010	47.49	50.18	53.07	56.18	59.37
As claimed by the petitioner	47.49	50.18	53.07	56.18	59.37
Allowed after trued up	47.49	50.18	53.07	56.18	59.37

Interest on working capital (“IWC”)

20. Sub-clause (c) of clause (1) of Regulation 18 of the 2009 Tariff Regulations provides the components of the working capital for the transmission system and clause (3) of Regulation 18 of the 2009 Tariff Regulations provides for the rate of interest of working capital.

21. The petitioner has submitted that the rate of interest on working capital has been considered as 12.25% as per Clause (3) of Regulation 18 of the 2009 Tariff Regulations and the components of working capital are also considered in accordance with Sub-clause (c) of clause (1) of Regulation 18 of the 2009 Tariff Regulations.

22. The Commission in its order dated 1.12.2010 in Petition No. 148/2010 had approved rate of interest on working capital as 12.25% as applicable for 2008-09. In accordance with clause (3) of Regulation 18 of the 2009 Tariff Regulations, as amended, rate of interest on working capital shall be on normative basis and in case of transmission assets declared under commercial operation prior to 1.4.2009 shall be equal to short-term Prime Lending Rate as applicable as on



1.4.2009. State Bank of India short-term Prime Lending Rate on 1.4.2009 was 12.25%. Therefore, interest rate of 12.25% has been considered to work out the interest on working capital in the instant case.

23. The IWC trued up is as under:-

(₹ in lakh)					
Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Maintenance Spares	7.12	7.53	7.96	8.43	8.91
O & M expenses	3.96	4.18	4.42	4.68	4.95
Receivables	25.11	26.08	26.60	27.14	27.87
Total	36.19	37.79	38.98	40.25	41.72
Rate of Interest	12.25%	12.25%	12.25%	12.25%	12.25%
Interest on Working Capital	4.43	4.63	4.78	4.93	5.11

(₹ in lakh)					
Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Approved vide order dated 1.12.2010	4.33	4.46	4.61	4.76	4.92
As claimed by the petitioner	4.43	4.63	4.78	4.93	5.11
Allowed after trued up	4.43	4.63	4.78	4.93	5.11

The IWC has increased on account of increase in receivables due to variation in ROE on account of applicable MAT rate during 2009-14 tariff period.

ANNUAL FIXED CHARGES FOR 2009-14 TARIFF PERIOD

24. The detailed computation of the various components of the trued up annual fixed charges for the transmission asset for the tariff period 2009-14 is summarised overleaf:-

(₹ in lakh)

Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Gross Block					
Opening Gross block	850.65	850.65	850.65	850.65	850.65
Additional Capitalization	0.00	0.00	0.00	0.00	0.00
Closing Gross block	850.65	850.65	850.65	850.65	850.65
Average Gross block	850.65	850.65	850.65	850.65	850.65
Depreciation					
Rate of Depreciation	2.27%	2.27%	2.27%	2.27%	2.27%
Depreciable Value	765.58	765.58	765.58	765.58	765.58
Weighted Balance Useful life of the assets	14	13	12	11	10
Remaining Depreciable Value	270.33	251.02	231.71	212.40	193.09
Depreciation	19.31	19.31	19.31	19.31	19.31
Cumulative Depreciation	495.26	514.57	533.88	553.19	572.50
Interest on Loan					
Gross Normative Loan	425.22	425.22	425.22	425.22	425.22
Cumulative Repayment upto Previous Year	425.22	425.22	425.22	425.22	425.22
Net Loan-Opening	-	-	-	-	-
Additions	-	-	-	-	-
Repayment during the year	-	-	-	-	-
Net Loan-Closing	-	-	-	-	-
Average Loan	-	-	-	-	-
Weighted Average Rate of Interest on Loan	-	-	-	-	-
Interest	-	-	-	-	-
Return on Equity					
Opening Equity	425.43	425.43	425.43	425.43	425.43
Additions	0.00	0.00	0.00	0.00	0.00
Closing Equity	425.43	425.43	425.43	425.43	425.43
Average Equity	425.43	425.43	425.43	425.43	425.43
Return on Equity (Base Rate) (%)	15.50	15.50	15.50	15.50	15.50
MAT rate for the respective year (%)	16.995	19.931	20.008	20.008	20.961



Particulars	2009-10	2010-11	2011-12	2012-13	2013-14
Rate of Return on Equity (Pre Tax)(%)	18.674	19.358	19.377	19.377	19.610
Return on Equity (Pre Tax)	79.44	82.35	82.43	82.43	83.43
Interest on Working Capital					
Maintenance Spares	7.12	7.53	7.96	8.43	8.91
O & M Expenses	3.96	4.18	4.42	4.68	4.95
Receivables	25.11	26.08	26.60	27.14	27.87
Total	36.19	37.79	38.98	40.25	41.72
Interest	4.43	4.63	4.78	4.93	5.11
Annual Transmission Charges					
Depreciation	19.31	19.31	19.31	19.31	19.31
Interest on Loan	0.00	0.00	0.00	0.00	0.00
Return on Equity	79.44	82.35	82.43	82.43	83.43
Interest on Working Capital	4.43	4.63	4.78	4.93	5.11
O & M Expenses	47.49	50.18	53.07	56.18	59.37
Total	150.68	156.47	159.59	162.85	167.22

DETERMINATION OF ANNUAL TRANSMISSION CHARGES FOR 2014-19

25. The petitioner has claimed the transmission charges as under:-

(₹ in lakh)					
Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Depreciation	19.31	19.31	19.30	19.32	19.30
Interest on Loan	0.00	0.00	0.00	0.00	0.00
Return on Equity	83.43	83.43	83.43	83.43	83.43
Interest on Working Capital	5.36	5.46	5.56	5.67	5.77
O & M Expenses	54.18	56.01	57.87	59.77	61.72
Total	162.28	164.21	166.16	168.19	170.22

26. The details submitted by the petitioner in support of its claim for interest on working capital are given hereunder:-



(₹ in lakh)

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Maintenance Spares	8.13	8.40	8.68	8.97	9.26
O & M Expenses	4.52	4.67	4.82	4.98	5.14
Receivables	27.05	27.37	27.69	28.03	28.37
Total	39.69	40.44	41.20	41.98	42.77
Rate of Interest	13.50%	13.50%	13.50%	13.50%	13.50%
Interest	5.36	5.46	5.56	5.67	5.77

Capital Cost

27. Clause (1) and (3) of Regulation 9 of the 2014 Tariff Regulations provides as follows:-

“(1) The Capital cost as determined by the Commission after prudence check in accordance with this regulation shall form the basis of determination of tariff for existing and new projects.

...

(3) The Capital cost of an existing project shall include the following:

(a) the capital cost admitted by the Commission prior to 1.4.2014 duly trued up by excluding liability, if any, as on 1.4.2014;

(b) additional capitalization and de-capitalization for the respective year of tariff as determined in accordance with Regulation 14; and

(c) expenditure on account of renovation and modernisation as admitted by this Commission in accordance with Regulation 15.”

28. The petitioner has claimed the capital expenditure of ₹850.65 lakh as on 31.3.2009 in accordance with order dated 1.12.2010 in Petition No. 148/2010. Further, the petitioner has not projected any additional capital expenditure during the tariff period 2014-19.

29. The trued up capital cost of ₹850.65 lakh as on 31.3.2014 is considered as opening capital cost as on 1.4.2014 for the purpose of tariff for tariff period 2014-19.



Additional Capital Expenditure

30. The petitioner has not claimed any additional expenditure for the tariff period 2014-19. No additional capital expenditure has been considered for the tariff period 2014-19.

Debt- Equity Ratio

31. Clause 3 of Regulation 19 of the 2014 Tariff Regulations provides as under:-

“(3) In case of the generating station and the transmission system declared under commercial operation prior to 1.4.2014, debt-equity ratio allowed by the Commission for determination of tariff for the period ending 31.3.2014 shall be considered.”

32. The petitioner has considered Debt-Equity ratio as 49.99:50.01, which was approved vide order dated 1.12.2010 in Petition No. 148/2010 and the same was allowed for determination of tariff for the period ending 31.3.2014. The admitted debt equity ratio of 49.99:50.01 for the tariff period ending 31.3.2014 has been considered as opening debt:equity ratio as on 1.4.2014. The details of the debt:equity considered for the purpose of tariff for 2014-19 tariff period is as follows:-

	Amount (in ₹ lakh)	(%)
Debt	425.22	49.99
Equity	425.43	50.01
Total	850.65	100.00



Interest on Loan (“IOL”)

33. The petitioner has not claimed any interest on loan for the tariff period 2009-14 as the entire loan has already been repaid before 1.4.2009. Accordingly, Interest on Loan has been considered as NIL for the purpose of tariff.

Return on Equity (“ROE”)

34. Clause (1) and (2) of Regulation 24 and Clause (2) of Regulation 25 of the 2014 Tariff Regulations specifies as under:-

“24. Return on Equity: (1) Return on equity shall be computed in rupee terms, on the equity base determined in accordance with regulation 19.
(2) Return on equity shall be computed at the base rate of 15.50% for thermal generating stations, transmission system including communication system....
.....”

“25. Tax on Return on Equity:

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

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

Where “t” is the effective tax rate in accordance with Clause (1) of this regulation and shall be calculated at the beginning of every financial year based on the estimated profit and tax to be paid estimated in line with the provisions of the relevant Finance Act applicable for that financial year to the company on pro-rata basis by excluding the income of non-generation or non-transmission business, as the case may be, and the corresponding tax thereon. In case of generating company or transmission licensee paying Minimum Alternate Tax (MAT), “t” shall be considered as MAT rate including surcharge and cess.”

35. The petitioner has computed ROE at the rate of 19.610% after grossing up the ROE with MAT rate as per the above Regulation. The petitioner has further submitted that the grossed up ROE is subject to truing up based on the actual tax paid along with any additional tax or interest, duly adjusted for any refund of tax including the interest received from IT authorities, pertaining to the tariff period 2014-19 on actual gross income of any financial year. Any under-recovery or



over-recovery of grossed up ROE after truing up shall be recovered or refunded to the beneficiaries on year to year basis.

36. The petitioner has further submitted that adjustment due to any additional tax demand including interest duly adjusted for any refund of the tax including interest received from IT authorities shall be recoverable/adjustable after completion of income tax assessment of the financial year.

37. We have considered the submissions made by the petitioner. Regulation 24 read with Regulation 25 of the 2014 Tariff Regulations provides for grossing up of return on equity with the effective tax rate for the purpose of return on equity. It further provides that in case the generating company or transmission licensee is paying Minimum Alternative Tax (MAT), the MAT rate including surcharge and cess will be considered for the grossing up of return on equity. The petitioner has submitted that MAT rate is applicable to the petitioner's company. Accordingly, the MAT rate applicable during 2013-14 has been considered for the purpose of return on equity, which shall be trued up with actual tax rate in accordance with Regulation 25 (3) of the 2014 Tariff Regulations. Accordingly, the ROE determined by the Commission is shown in the Table below:-

(₹ in lakh)					
Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Opening Equity	425.43	425.43	425.43	425.43	425.43
Addition due to Additional Capitalisation	0.00	0.00	0.00	0.00	0.00
Closing Equity	425.43	425.43	425.43	425.43	425.43
Average Equity	425.43	425.43	425.43	425.43	425.43



Return on Equity (Base Rate) (%)	15.50	15.50	15.50	15.50	15.50
MAT rate for the year (%)	20.961	20.961	20.961	20.961	20.961
Rate of Return on Equity (Pre Tax) (%)	19.610	19.610	19.610	19.610	19.610
Return on Equity (Pre Tax)	83.43	83.43	83.43	83.43	83.43

Depreciation

38. Clause (2), (5) and (6) of Regulation 27 of the 2014 Tariff Regulations provides as follows:-

"27. Depreciation:

...(2) The value base for the purpose of depreciation shall be the capital cost of the asset admitted by the Commission. In case of multiple units of a generating station or multiple elements of transmission system, weighted average life for the generating station of the transmission system shall be applied. Depreciation shall be chargeable from the first year of commercial operation. In case of commercial operation of the asset for part of the year, depreciation shall be charged on pro rata basis"

"(5) Depreciation shall be calculated annually based on Straight Line Method and at rates specified in **Appendix-II** to these regulations for the assets of the generating station and transmission system:

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

"(6) In case of the existing projects, the balance depreciable value as on 1.4.2014 shall be worked out by deducting the cumulative depreciation as admitted by the Commission upto 31.3.2014 from the gross depreciable value of the assets."

39. The petitioner has submitted that the assets have completed 12 years on 31.1.2012. Accordingly, the remaining depreciable value is spread over equally over its balance useful life in accordance with Regulation 27 of the 2014 Tariff Regulations.

40. We have considered the submission made by the petitioner with reference to depreciation. Depreciation is allowed as provided under Regulation 27 of the 2014 Tariff Regulations. The details of the depreciation allowed are given hereunder:-

	(₹ in lakh)				
Details of Depreciation	2014-15	2015-16	2016-17	2017-18	2018-19
Opening Gross Block	850.65	850.65	850.65	850.65	850.65
Addition during the year due to projected additional capitalization	0.00	0.00	0.00	0.00	0.00
Closing Gross block	850.65	850.65	850.65	850.65	850.65
Rate of Depreciation	2.27%	2.27%	2.27%	2.27%	2.27%
Depreciable Value	765.585	765.585	765.585	765.585	765.585
Remaining Depreciable Value	173.78	154.47	135.16	115.85	96.54
Depreciation	19.31	19.31	19.31	19.31	19.31

Operation & Maintenance Expenses (“O&M Expenses”)

41. The petitioner has computed normative O&M Expenses as per sub clause (a) of clause (3) of Regulation 29 of the 2014 Tariff Regulations. The petitioner has claimed O&M expenses for 132 kV S/C line of total 118.94 km length and 1 bay of 132 kV level. Accordingly, O&M expenses have been worked out as given hereunder:-



Particulars		2014-15	2015-16	2016-17	2017-18	2018-19
Actual line length (km)	132 kV S/C (Single conductor)	118.94	118.94	118.94	118.94	118.94
Actual (No of bays)	132 kV & below	1	1	1	1	1
Norms as per Regulation	132 kV S/C (Single conductor) Transmission lines (₹ lakh/km)	0.202	0.209	0.216	0.223	0.230
	132 kV & below (₹ lakh/bay)	30.15	31.15	32.18	33.25	34.36
Total (₹ in lakh)		54.18	56.01	57.87	59.77	61.72

42. The petitioner has submitted that O&M Expenses for the tariff period 2014-19 have been worked out on the basis of normalized actual O&M Expenses during the period 2008-13. The petitioner has further submitted that the wage revision of the employees of the petitioner company is due during 2014-19 and actual impact of wage hike, which will be effective at a future date, has not been factored in fixation of the normative O&M rate specified for the tariff period 2014-19. The petitioner has prayed to be allowed to approach the Commission for suitable revision in the norms of O&M Expenses for claiming the impact of such increase.

43. The O&M Expenses have been worked out as per the norms of O&M Expenses specified in the 2014 Tariff Regulations. As regards impact of wage revision, we would like to clarify that any application filed by the petitioner in this

regard will be dealt with in accordance with the appropriate provisions of the 2014 Tariff Regulations.

44. The details of O&M Expenses allowed are given hereunder:-

Particulars	Year				
	2014-15	2015-16	2016-17	2017-18	2018-19
Allowed	54.18	56.01	57.87	59.77	61.72

Interest on Working Capital ("IWC")

45. Clause 1 (c) of Regulation 28 and Clause 5 of Regulation 3 of the 2014 Tariff Regulations specifies as follows:

"28. Interest on Working Capital

- 1(c)(i) Receivables equivalent to two months of fixed cost;
(ii) Maintenance spares @ 15% of operation and maintenance expenses specified in regulation 29; and
(iii) Operation and maintenance expenses for one month"

"'Bank Rate' means the base rate of interest as specified by the State Bank of India from time to time or any replacement thereof for the time being in effect plus 350 basis points;"

46. The petitioner has submitted that it has computed interest on working capital for the tariff period 2014-19 considering the SBI Base Rate plus 350 basis points as on 1.4.2014. The rate of interest on working capital considered is 13.50%.

47. The interest on working capital is worked out in accordance with Regulation 28 of the 2014 Tariff Regulations. The rate of interest on working capital considered is 13.50% (SBI Base Rate of 10% plus 350 basis points). The

interest on working capital as determined by the Commission is shown in the table below:-

	(₹ in lakh)				
Interest on Working Capital	2014-15	2015-16	2016-17	2017-18	2018-19
Maintenance Spares	8.13	8.40	8.68	8.97	9.26
O & M expenses	4.51	4.67	4.82	4.98	5.14
Receivables	27.05	27.37	27.69	28.03	28.37
Total	39.69	40.44	41.20	41.98	42.77
Rate of Interest	13.50%	13.50%	13.50%	13.50%	13.50%
Interest	5.36	5.46	5.56	5.67	5.77

Annual Transmission charges

48. The Annual transmission charges allowed for the transmission asset is given hereunder:-

	(₹ in lakh)				
Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Depreciation	19.31	19.31	19.31	19.31	19.31
Interest on Loan	0.00	0.00	0.00	0.00	0.00
Return on Equity	83.43	83.43	83.43	83.43	83.43
Interest on WC	5.36	5.46	5.56	5.67	5.77
O&M Expenses	54.18	56.01	57.87	59.77	61.72
Total	162.27	164.20	166.17	168.18	170.23

49. The detailed computation of the various components of annual fixed charges for the tariff period 2014-19 is summarised below:-

	(₹ in lakh)				
Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Gross Block					
Opening Gross Block	850.65	850.65	850.65	850.65	850.65
Additional Capitalisation	0.00	0.00	0.00	0.00	0.00
Closing Gross Block	850.65	850.65	850.65	850.65	850.65
Average Gross Block	850.65	850.65	850.65	850.65	850.65



Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Depreciation					
Rate of Depreciation	2.27%	2.27%	2.27%	2.27%	2.27%
Depreciable Value	765.585	765.585	765.585	765.585	765.585
Weighted Balance Useful life of the assets	9	8	7	6	5
Remaining Depreciable Value	173.78	154.47	135.16	115.85	96.54
Depreciation	19.31	19.31	19.31	19.31	19.31
Cumulative Depreciation	591.80	611.11	630.42	649.73	669.04
Interest on Loan					
Gross Normative Loan	425.22	425.22	425.22	425.22	425.22
Cumulative Repayment upto Previous Year	425.22	425.22	425.22	425.22	425.22
Net Loan-Opening	-	-	-	-	-
Additions	-	-	-	-	-
Repayment during the year	-	-	-	-	-
Net Loan-Closing	-	-	-	-	-
Average Loan	-	-	-	-	-
Weighted Average Rate of Interest on Loan	-	-	-	-	-
Interest	-	-	-	-	-
Return on Equity					
Opening Equity	425.43	425.43	425.43	425.43	425.43
Additions	0.00	0.00	0.00	0.00	0.00
Closing Equity	425.43	425.43	425.43	425.43	425.43
Average Equity	425.43	425.43	425.43	425.43	425.43
Return on Equity (Base Rate) (%)	15.50	15.50	15.50	15.50	15.50
MAT rate for the year (%)	20.961	20.961	20.961	20.961	20.961
Rate of Return on Equity (Pre Tax) (%)	19.610	19.610	19.610	19.610	19.610
Return on Equity (Pre Tax)	83.43	83.43	83.43	83.43	83.43
Interest on Working Capital					
Maintenance Spares	8.13	8.40	8.68	8.97	9.26
O & M expenses	4.51	4.67	4.82	4.98	5.14
Receivables	27.05	27.37	27.69	28.03	28.37



Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Total	39.69	40.44	41.20	41.98	42.77
Interest	5.36	5.46	5.56	5.67	5.77
Annual Transmission Charges					
Depreciation	19.31	19.31	19.31	19.31	19.31
Interest on Loan	0.00	0.00	0.00	0.00	0.00
Return on Equity	83.43	83.43	83.43	83.43	83.43
Interest on Working Capital	5.36	5.46	5.56	5.67	5.77
O & M Expenses	54.18	56.01	57.87	59.77	61.72
Total	162.27	164.20	166.17	168.18	170.23

Filing Fee and the Publication Expenses

50. The petitioner has sought reimbursement of fee paid by it for filing the petition and publication expenses, in terms of Regulation 52 of the 2014 Tariff Regulations. The petitioner shall be entitled for reimbursement of the filing fees and publication expenses in connection with the present petition, directly from the beneficiaries on pro-rata basis in accordance with clause (1) of Regulation 52 of the 2014 Tariff Regulations.

Licence Fee and RLDC Fees and Charges

51. The petitioner has requested to allow the petitioner to bill and recover License fee and RLDC fees and charges, separately from the respondents. The petitioner shall be entitled for reimbursement of licence fee and RLDC fees and charges in accordance with Clause (2)(b) and (2)(a) of Regulation 52 of the 2014 Tariff Regulations respectively.

Service Tax

52. The petitioner has sought to recover service tax on Transmission Charges separately from the Respondents, if at any time service tax on transmission is withdrawn from negative list in future. We are of the view that the petitioner's prayer is premature.

Deferred Tax Liability

53. The petitioner has sought recovery of deferred tax liability before 1.4.2009 from the beneficiaries or long term consumers/ DICs as and when materialized, under Regulation 49 of the 2014 Tariff Regulations. The deferred tax liability shall be dealt as per Regulation 49 of the 2014 Tariff Regulations, as amended. Accordingly, the petitioner is entitled to recover the deferred tax liability upto 31.3.2009 whenever the same materializes, directly from the beneficiaries or long term transmission customers /DICs.

Sharing of Transmission Charges

54. The billing, collection and disbursement of the transmission charges approved shall be governed by the provisions of Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, as amended from time to time, as provided in Regulation 43 of the 2014 Regulations.

55. This order disposes of Petition No. 172/TT/2014.

Sd/-
(Dr. M. K. Iyer)
Member

Sd/-
(A.S. Bakshi)
Member

