

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Petition No. 213/TT/2020

Coram:

**Shri I.S. Jha, Member
Shri Arun Goyal, Member
Shri P. K. Singh, Member**

Date of order: 23.12.2021

In the matter of

Approval under Regulation 86 of the Central Electricity Regulatory Commission (Conduct of Business) Regulations, 1999 and revision of transmission tariff of the 2001-04, 2004-09 and 2009-14 tariff periods, truing up of transmission tariff of the 2014-19 period under the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014 and determination of transmission tariff of the 2019-24 period under the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019 in respect of 400 kV Talcher Transmission System in Eastern Region.

And in the Matter of:

Power Grid Corporation of India Limited,
"Saudamini", Plot No-2,
Sector-29, Gurgaon-122001(Haryana).

.....Petitioner

Vs.

1. Bihar State Power (Holding) Company Limited
(Formerly Bihar State Electricity Board -BSEB),
Vidyut Bhavan, Bailey Road, Patna – 800001.
2. West Bengal State Electricity Distribution Company Limited,
Bidyut Bhawan, Bidhan Nagar,
Block DJ, Sector-II, Salt Lake City,
Calcutta - 700091.
3. Grid Corporation of Orissa Limited,
Shahid Nagar, Bhubaneswar - 751007.
4. Jharkhand State Electricity Board,
In Front of Main Secretariat,
Doranda, Ranchi – 834002.



5. Damodar Valley Corporation,
DVC Tower, Maniktala,
Civic Centre, VIP Road, Calcutta - 700054.

6. Power Department,
Government of Sikkim, Gangtok - 737101.

...Respondent(s)

For Petitioner : Shri S.S. Raju, PGCIL
Shri D.K. Biswal, PGCIL
Shri Ved Prakash Rastogi, PGCIL
Shri Amit Yadav, PGCIL

For Respondents : Shri Manish Kumar Choudhary, Advocate, BSPHCL

ORDER

The Petitioner, Power Grid Corporation of India Limited, has filed the instant petition for revision of transmission tariff of the 2001-04, 2004-09 and 2009-14 tariff periods; truing up of transmission tariff of the 2014-19 tariff period under the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014 (hereinafter referred to as “the 2014 Tariff Regulations”); and for determination of tariff of the 2019-24 tariff period under the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019 (hereinafter referred to as “the 2019 Tariff Regulations”) for 400 kV Talcher Transmission System (hereinafter referred to as “the transmission asset”) in Eastern Region.

2. The Petitioner has made the following prayers in this petition:

“1) Approve the revised Transmission Tariff for 2001-04, 2004-09 block and transmission tariff for 2009-14 block for the assets covered under this petition, as per para 8 above.

2) Approve the trued up Transmission Tariff for 2014-19 block and transmission tariff for 2019-24 block for the assets covered under this petition, as per para 9 and 10 above.

3) Allow the capital cost including the additional capitalization/ DE-capitalization going to be incurred during 2019-24 period as claimed by petitioner.

4) Allow the petitioner to recover the shortfall or refund the excess Annual Fixed Charges, on account of Return on Equity due to change in applicable Minimum



Alternate/Corporate Income Tax rate as per the Income Tax Act, 1961 (as amended from time to time) of the respective financial year directly without making any application before the Commission as provided in Tariff Regulation 2014 and Tariff regulations 2019 as per para 9 and 10 above for respective block.

5) Approve the reimbursement of expenditure by the beneficiaries towards petition filing fee, and expenditure on publishing of notices in newspapers in terms of Regulation 70 (1) Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019, and other expenditure (if any) in relation to the filing of petition.

6) Allow the petitioner to bill and recover Licensee fee and RLDC fees and charges, separately from the respondents in terms of Regulation 70 (3) and (4) Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019.

7) Allow the petitioner to bill and adjust impact on Interest on Loan due to change in Interest rate on account of floating rate of interest applicable during 2019-24 period, if any, from the beneficiaries.

8) Allow the petitioner to file a separate petition before Hon'ble Commission for claiming the overall security expenses and consequential IOWC on that security expenses as mentioned at para 10.5 above.

9) Allow the petitioner to claim the capital spares at the end of tariff block as per actual.

10) Allow the Petitioner to bill and recover GST on Transmission Charges separately from the respondents, if GST on transmission is levied at any rate in future. Further, any taxes including GST and duties including cess etc. imposed by any statutory/Govt./municipal authorities shall be allowed to be recovered from the beneficiaries.

and pass such other relief as Hon'ble Commission deems fit and appropriate under the circumstances of the case and in the interest of justice."

Backdrop of the case

3. The brief facts of the case are as follows:

(a) The Revised Cost Estimate (RCE) of the transmission asset was approved by Ministry of Power vide letter dated 29.8.1997 at an estimated cost of ₹14454.00 lakh, including IDC of ₹2867.00.

(b) The scope of the work covered under RCE is as follows:

- (i) 400 kV Talcher-Rengali D/C line
- (ii) 400 kV Talcher-Rourkela D/C line
- (lii) 400 kV Rourkela Substation
- (iv) 400 kV Rengali Substation



(c) The transmission asset was completed during 1995-96 and was put under commercial operation during the period from June 1995 to January 1996.

(d) The transmission tariff for the transmission asset from 1.4.2001 to 31.3.2004 was allowed vide order dated 6.8.2003 in Petition No. 17/2002. The tariff of the transmission asset was revised (on account of revision of interest on loan and Advance Against Depreciation) for 2001-04 period vide order dated 12.2.2008 in Petition No. 17/2002.

(e) The transmission tariff for the transmission asset from 1.4.2004 to 31.3.2009 was allowed vide order dated 2.2.2006 in Petition No. 125/2004. Further, the transmission tariff of 2004-09 tariff period was revised vide order dated 31.3.2008 in Petition No. 125/2004.

(f) The transmission tariff for the transmission asset from 1.4.2009 to 31.3.2014 was allowed vide order dated 14.12.2010 in Petition No. 101/2009. Further, the transmission tariff of 2009-14 tariff period was trued-up and transmission tariff for 2014-19 period was allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014.

(g) The Petitioner has sought revision of transmission tariff allowed for the 2001-04 and 2004-09 tariff periods on account of change in Interest on Loan (IoL) and Interest on Working Capital (IWC) to the extent of revision in IoL and in Maintenance Spares in terms of the judgements of the Appellate Tribunal for Electricity (APTEL) dated 22.1.2007 in Appeal No. 81 of 2005 and batch matters and dated 13.6.2007 in Appeal No. 139 of 2006 and batch matters. The Petitioner has also sought consequential revision of transmission tariff allowed for the 2009-14 tariff period, truing-up of tariff of the 2014-19 tariff period and determination of transmission tariff of the 2019-24 tariff period for the transmission asset.

(h) The APTEL vide judgment dated 22.1.2007 in Appeal No. 81 of 2005 and batch matters pertaining to generating stations of NTPC had considered 4 (four) issues. The issues considered by the APTEL and its decisions are as given in the following table:



| Sr. No. | Issue | APTEL's decisions/ directions |
|---------|---|--|
| 1 | Whether APTEL can enquire into the validity of Regulations framed by the Commission | Challenge to the validity of Regulations framed by the Commission falls outside the purview of APTEL. |
| 2 | Computation of interest on loan | In view of the order of the APTEL dated 14.11.2016 in Appeal Nos. 94 and 96 of 2005 and order dated 24.1.2007 passed in Appeal Nos. 81 to 87, 89 to 93 of 2005, computation of loan has to be based on loan repayment on normative basis. Commission is required to recalculate the loan outstanding as on 31.3.2004 based on loan repayment on normative basis. |
| 3(a) | O&M Expenses: Inadequate provision of employee costs as part of O&M Expenses due to variation in salary and wages | The Commission's view upheld. |
| 3(b) | O&M Expenses: Non-inclusion of incentives and ex-gratia payment to employees | The Commission's view upheld. |
| 4 | Cost of spares for calculation of working capital | The Commission's view upheld. |

(i) The APTEL vide judgment dated 13.6.2007 in Appeal No. 139 of 2006 and batch matters pertaining to generating stations of NTPC had considered 9 (nine) issues. The issues considered and the decisions of APTEL are given in the following table:

| Sr. No. | Issue | APTEL's decisions/ directions |
|---------|---|---|
| I | Computation of outstanding loan at the beginning of the tariff period i.e. 1.4.2004 | The Commission is required to recalculate the loan outstanding as on 31.3.2004 based on loan repayment on normative basis. |
| II | Consequence of refinance of loan | The Commission to consider the issue afresh. |
| III | Treating depreciation available as deemed repayment of loan | The Commission to make a fresh computation of outstanding loan. |
| IV | Admissibility of depreciation up to 90% | The Commission to consider the issue afresh. |
| V | Cost of Maintenance Spares | The Commission to consider the issue afresh. |
| VI | Impact of de-capitalisation of the assets on cumulative repayment of Loan | The cumulative repayment of the loan proportionate to the assets decapitalized required to be reduced. Commission to act accordingly. |
| VII | Non-consideration of normative transit loss for coal import. | The Commission to consider afresh the transit losses for coal imported from coal |



| | | |
|------|--|---|
| | | mines other than the dedicated ones. |
| VIII | Foreign Exchange rate variation (FERV) | FERV has been kept as pass through to ensure that any liability or gain, if any, arising on account of any variation in foreign exchange rates is passed on to the beneficiary as held in order dated 4.10.2006 in Appeal No.135 to 140 of 2005. The Commission to act accordingly. |
| IX | Computation of interest on loan in Singrauli Station | Net loan closing at the end of a year is reflected as net loan opening on the first day of the next year. Commission shall re-compute the interest accordingly. |

(j) The Commission and certain interested parties preferred Civil Appeals against the APTEL's judgments before the Hon'ble Supreme Court in 2007. The Appeals were admitted and initially stay was granted by the Hon'ble Supreme Court. Subsequently, on an assurance by NTPC that the issues under Appeal would not be pressed for implementation during the pendency of the Appeals, the stay was vacated by the Hon'ble Supreme Court.

(k) Based on the APTEL's judgments dated 22.1.2007 and dated 13.6.2007, the Petitioner had sought revision of tariff of its transmission assets for the tariff periods 2001-04 and 2004-09 tariff periods vide Petition No. 121/2007. The Commission after taking into consideration the pendency of Appeals before the Hon'ble Supreme Court adjourned the said petition *sine die* and directed that the same be revived after the disposal of Civil Appeals by the Hon'ble Supreme Court.

(l) The Hon'ble Supreme Court vide its order dated 10.4.2018, dismissed the said Civil Appeals filed against the APTEL's said judgments. Thus, the judgements of the APTEL have attained finality.

(m) Consequent to the Hon'ble Supreme Court's order dated 10.4.2018 in NTPC matters, Petition No. 121/2007 was listed for hearing on 8.1.2019. The Commission vide order dated 18.1.2019 in Petition No. 121/2007, directed the Petitioner to submit its claim separately for the assets at the time of filing of truing up petition for the 2014-19 tariff period in respect of concerned transmission assets.



(n) The instant petition was heard on 6.7.2021 and in view of the APTEL's judgments dated 22.1.2007 and dated 13.6.2007 and the order of Hon'ble Supreme Court dated 10.4.2018, the tariff is being revised. Period-wise transmission tariff is being re-worked based on the Tariff Regulations applicable for the respective tariff periods and suitable assumptions have been made at certain places and applied which are indicated.

4. The Respondents are distribution licensees, power departments and transmission licensees which are procuring transmission service from the Petitioner mainly beneficiaries of the Eastern Region.

5. The Petitioner has served the petition on the Respondents and notice regarding filing of this petition has been published in the newspapers in accordance with Section 64 of the Electricity Act, 2003. No comments or suggestions have been received from the general public in response to the aforesaid notice published in the newspaper by the Petitioner. Bihar State Power (Holding) Company Ltd. (BSPHCL), Respondent No. 1, has filed its reply vide affidavit dated 20.7.2021 and has raised the issues of revision of tariff, prudence check before revising the tariff, grossing up of RoE, GST and Statutory Charges, floating rate of interest and filing fee by the Petitioner. The Petitioner has submitted its rejoinder vide affidavit dated 28.7.2021 to the reply filed by BSPHCL. The issues raised by BSPHCL and the clarifications given by the Petitioner are dealt in the relevant paragraphs of this order.

Re: Interest on Loan (IoL)

6. The APTEL while dealing with the issue of computation of IoL, in judgment dated 22.1.2007, had observed that IoL for the period from 1.4.1998 to 31.3.2001 shall be computed only on normative loan repayment in terms of its judgment dated 14.11.2006 in Appeal Nos. 94 and 96 of 2005. The APTEL vide its judgment dated



14.11.2006 had set aside the Commission's methodology of computation of loan on the actual repayment basis or normative repayment whichever is higher and held that the Commission is required to adopt normative debt repayment methodology for working out IoL liability order for the period 1.4.1998 to 31.3.2001. In view of the above, the interest allowed for 2001-04 and 2004-09 tariff periods is revised on the basis of the normative debt repayment methodology.

Re: Additional Capital Expenditure (ACE)

7. The APTEL vide judgment dated 13.6.2007 in Appeal No. 139/2006 and others held that additional capitalisation after the date of commercial operation should also be considered for computation of maintenance spares. In view of the above, the maintenance spares to be considered for computation of working capital for 2001-04 and 2004-09 periods are also required to be revised taking into consideration the ACE after the date of commercial operation.

Re: Depreciation

8. As regards depreciation, the APTEL vide its judgement dated 13.6.2007 in Appeal No.139 of 2006 and batch matters observed that depreciation is an expense and it cannot be deployed for deemed repayment of loan and accordingly directed the Commission to compute the outstanding loan afresh. In view of the above directions of the APTEL, the outstanding loan allowed for the transmission asset for the 2001-04 and 2004-09 tariff periods is revised in the instant order.

9. The revision of transmission tariff allowed for the 2001-04 and 2004-09 tariff periods necessitates the revision of transmission tariff allowed for the 2009-14 tariff period, which is also allowed in the present order. The implementation of the directions of APTEL vide judgments dated 22.1.2007 in Appeal No. 81 of 2005 and



batch matters and 13.6.2007 in Appeal No. 139 of 2006 and batch cases, in case of the Petitioner was kept pending awaiting for the outcome of the Civil Appeals filed before the Hon'ble Supreme Court. Taking into consideration the facts of the case and keeping in view the interest of the consumers, we are of the view that the beneficiaries should not be burdened with the carrying cost for the difference in the tariff allowed earlier and allowed in the instant order for 2001-04, 2004-09 and 2009-14 tariff periods. Therefore, we direct that the Petitioner will neither claim nor pay any carrying cost from or to the beneficiaries for the difference, if any, in the tariff allowed earlier and the tariff being allowed in the instant order. Further, the said difference in tariff shall be recovered/ paid over a period of six months from the date of issue of this order.

10. The hearing in this matter was held on 6.7.2021 through video conference and the order was reserved.

11. This order is issued considering the submissions made by the Petitioner in the Petition, affidavit dated 30.6.2021, BSPHCL's reply vide affidavit 22,7,2921 and Petitioner's rejoinder affidavit dated 28.7.2021.

12. Having heard the representatives of the Petitioner and learned counsel for BSPHCL and having perused the materials on record, we proceed to dispose of the petition.

REVISION OF TRANSMISSION CHARGES FOR 2001-04, 2004-09 AND 2009-14 TARIFF PERIODS

13. BSPHCL has submitted that filing one consolidated petition seeking prayer for approval of revision of tariff for 2001-04, 2004-09 and 2009-14 tariff periods, along with approval for truing up of transmission tariff for 2014-19 tariff period and



determination of tariff for 2019-24 tariff period is not permissible in the eyes of law and hence the Commission may pass necessary directions to that effect.

14. In response, the Petitioner has submitted that the Petitioner has already filed various consolidated petitions seeking prayer for approval of revision of tariff, along with approval for true up of transmission tariff for 2014-19 tariff period and determination of tariff for 2019-24 tariff period and the Commission has already allowed tariff in similar petitions in Petition No. 300/TT/2019, 246/TT/2019 and 305/TT/2019 etc.

15. We have considered the submissions made by the Petitioner and BSPHCL. Regulation 92 of 1999 Regulations provides as follows:-

“92. The Commission on its own on being satisfied that there is need to review the tariff of any utility shall initiate the process of revision in accordance with the procedure as may be prescribed. The suo-motu review of the tariff shall be the same as set out in Chapter II of these Regulations.”

16. It is also noted that the Commission, vide order dated 18.1.2019 in Petition No. 121/2007, where BSPHCL was one of the Respondents, held as follows:

“5. In the light of the Hon’ble Supreme Court’s judgement in NTPC matter as quoted above, the petition was listed for hearing on 8.1.2019. During the hearing, learned counsel for PGCIL suggested that for implementation of the APTEL’s judgments as upheld by the Hon’ble Supreme Court, the Commission may consider to allow PGCIL to submit its claims alongwith the true-up petition for the period 2014-19 which will save the precious time of the Commission to reopen all the tariff orders for the period 2001-04 and 2004-09.

6. Considering the submissions of the learned counsel for the petitioner, we dispose of the present petition with the direction that the petitioner shall separately submit its claim in the light of the APTEL’s judgments dated 22.1.2007 and 13.6.2007 alongwith the true up petitions wherever applicable to be filed for the period 2014-19 in respect of concerned transmission assets.”

17. To implement the APTEL’s judgments, the Commission considers and allows tariff on a consolidated tariff petition as per the 2014 Tariff Regulations/ the 2019 Tariff Regulations (where applicable) in respect of asset(s)/ project(s) after due prudence



check of the required essential documents submitted by the Petitioner. Therefore, the contention raised by BSPHCL is devoid of merit and, hence, is rejected.

2001-04 Tariff Period

18. The Commission vide order dated 6.8.2003 in Petition No. 17/2002 had allowed transmission charges of the transmission asset for 2001-04 period at a gross block of ₹11621.00 lakh. The tariff of the transmission asset was revised vide order dated 12.2.2008 in Petition No. 17/2002.

19. The transmission charges allowed for 2001-04 period vide order dated 12.2.2008 in Petition No.17/2002 are as follows:

| Particulars | (₹ in lakh) | | |
|------------------------------|--------------------|----------------|----------------|
| | 2001-02 | 2002-03 | 2003-04 |
| Depreciation | 318.22 | 318.22 | 318.22 |
| Return on Equity | 877.04 | 877.04 | 877.04 |
| O&M Expenses | 362.01 | 383.73 | 406.75 |
| Advance against Depreciation | 130.70 | 0.00 | 0.00 |
| Interest on Loan | 423.05 | 375.32 | 237.25 |
| Interest on Working Capital | 62.04 | 60.23 | 59.30 |
| Total | 2173.06 | 2014.54 | 1898.56 |

20. The Petitioner has claimed the following revised transmission charges for the transmission asset for 2001-04 period in this petition:

| Particulars | (₹ in lakh) | | |
|------------------------------|--------------------|----------------|----------------|
| | 2001-02 | 2002-03 | 2003-04 |
| Depreciation | 318.22 | 318.22 | 318.22 |
| Return on Equity | 877.04 | 877.04 | 877.04 |
| O&M Expenses | 362.01 | 383.73 | 406.75 |
| Advance against Depreciation | 130.70 | 0.00 | 0.00 |
| Interest on Loan | 386.83 | 355.84 | 316.95 |
| Interest on Working Capital | 61.34 | 59.85 | 60.86 |
| Total | 2136.13 | 1994.68 | 1979.82 |

21. We have considered the submissions of the Petitioner. The transmission tariff is revised in respect of transmission asset on the basis of following:

- (a) Admitted capital cost of ₹11621.00 lakh as on 1.4.2001 of the transmission asset; and



(b) Weighted Average Rate of Interest on actual loan, Weighted Average Rate of Depreciation, Rate of Interest for Working Capital and O&M Expenses as per order dated 6.8.2003 and 12.2.2008 in petition no. 17/2002.

22. In view of above, the revised transmission charges approved for the transmission asset for 2001-04 tariff period are as follows:

| Particulars | (₹ in lakh) | | |
|------------------------------|----------------|----------------|----------------|
| | 2001-02 | 2002-03 | 2003-04 |
| Depreciation | 318.22 | 318.22 | 318.22 |
| Return on Equity | 877.04 | 877.04 | 877.04 |
| O&M Expenses | 362.01 | 383.73 | 406.75 |
| Advance against Depreciation | 130.70 | 0.00 | 0.00 |
| Interest on Loan | 386.83 | 355.84 | 227.63 |
| Interest on Working Capital | 61.34 | 59.85 | 59.11 |
| Total | 2136.13 | 1994.67 | 1888.75 |

23. The Annual Fixed Charges (AFC) allowed for 2001-04 tariff period vide order dated 12.2.2008 in Petition No. 17/2002, the revised AFC claimed in the instant petition and AFC approved in the instant order are as follows:

| Particulars | (₹ in lakh) | | |
|--|-------------|---------|---------|
| | 2001-02 | 2002-03 | 2003-04 |
| AFC allowed vide order dated 12.2.2008 in petition no. 17/2002 | 2173.06 | 2014.54 | 1898.56 |
| AFC claimed by the Petitioner in the instant petition | 2136.13 | 1994.68 | 1979.82 |
| AFC approved in the instant order | 2136.13 | 1994.67 | 1888.75 |

2004-09 Tariff Period

24. The Commission vide order dated 2.2.2006 in Petition No. 125/2004 had allowed transmission charges of the transmission asset for 2004-09 period based on admitted capital cost of ₹11621.00 lakh as on 31.3.2004. The tariff of the transmission asset was revised vide order dated 31.3.2008 in Petition No. 125/2004.

25. The transmission charges allowed for 2004-09 period vide order dated 31.3.2008 in Petition No. 125/2004 are as follows:



(₹ in lakh)

| Particulars | 2004-05 | 2005-06 | 2006-07 | 2007-08 | 2008-09 |
|------------------------------|----------------|----------------|----------------|----------------|----------------|
| Depreciation | 318.22 | 318.22 | 318.22 | 318.22 | 318.22 |
| Return on Equity | 813.47 | 813.47 | 813.47 | 813.47 | 813.47 |
| O&M Expenses | 229.13 | 238.29 | 248.04 | 257.60 | 268.24 |
| Advance against Depreciation | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Interest on Loan | 92.91 | 72.87 | 52.82 | 32.77 | 12.72 |
| Interest on Working Capital | 47.24 | 48.33 | 49.51 | 50.75 | 52.11 |
| Total | 1500.97 | 1491.17 | 1482.05 | 1472.81 | 1464.76 |

26. The Petitioner has claimed the following revised transmission charges in respect of the transmission asset for 2004-09 period in this petition:

(₹ in lakh)

| Particulars | 2004-05 | 2005-06 | 2006-07 | 2007-08 | 2008-09 |
|------------------------------|----------------|----------------|----------------|----------------|----------------|
| Depreciation | 318.22 | 318.22 | 318.22 | 318.22 | 318.22 |
| Return on Equity | 813.47 | 813.47 | 813.47 | 813.47 | 813.47 |
| O&M Expenses | 229.13 | 238.29 | 248.04 | 257.60 | 268.24 |
| Advance against Depreciation | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Interest on Loan | 134.51 | 120.04 | 105.58 | 91.11 | 76.65 |
| Interest on Working Capital | 46.26 | 47.34 | 48.51 | 49.74 | 51.07 |
| Total | 1541.59 | 1537.37 | 1533.82 | 1530.14 | 1527.65 |

27. We have considered the submissions of the Petitioner. The tariff is approved in respect of the transmission asset on the basis of following:

- Admitted capital cost of ₹11621.00 lakh for transmission asset as on 1.4.2004;
- No ACE during 2004-09 period; and
- Weighted Average Rate of Interest on actual loan, Weighted Average Rate of Depreciation, Rate of Interest for Working Capital and O&M Expenses as per order dated 31.3.2008 in petition no. 125/2004.

28. In view of the above, the revised transmission charges allowed in respect of the transmission asset for 2004-09 tariff period are as follows:

(₹ in lakh)

| Particulars | 2004-05 | 2005-06 | 2006-07 | 2007-08 | 2008-09 |
|------------------------------|----------------|----------------|----------------|----------------|----------------|
| Depreciation | 318.22 | 318.22 | 318.22 | 318.22 | 318.22 |
| Return on Equity | 813.47 | 813.47 | 813.47 | 813.47 | 813.47 |
| O&M Expenses | 229.13 | 238.29 | 248.04 | 257.60 | 268.24 |
| Advance against Depreciation | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Interest on Loan | 134.51 | 120.04 | 105.58 | 91.11 | 76.65 |
| Interest on Working Capital | 46.26 | 47.34 | 48.51 | 49.74 | 51.07 |
| Total | 1541.59 | 1537.36 | 1533.81 | 1530.14 | 1527.64 |



29. The Annual Fixed Charges (AFC) allowed for 2004-09 tariff period vide order dated 31.3.2008 in Petition No. 125/2004, the revised AFC claimed in the instant petition and AFC approved in the instant order are as follows:

| Particulars | (₹ in lakh) | | | | |
|---|-------------|---------|---------|---------|---------|
| | 2004-05 | 2005-06 | 2006-07 | 2007-08 | 2008-09 |
| AFC allowed vide order dated 31.3.2008 in petition no. 125/2004 | 1500.97 | 1491.17 | 1482.05 | 1472.81 | 1464.76 |
| AFC claimed by the Petitioner in the instant petition | 1541.59 | 1537.37 | 1533.82 | 1530.14 | 1527.65 |
| AFC approved in the instant order | 1541.59 | 1537.36 | 1533.81 | 1530.14 | 1527.64 |

2009-14 Tariff Period

30. The Commission vide order dated 14.12.2010 in Petition No. 101/2009 allowed the tariff of the transmission asset for 2009-14 period and vide order dated 26.11.2015 in Petition No. 214/TT/2014 trued-up the tariff allowed for 2009-14 period and the same is as follows:

| Particulars | (₹ in lakh) | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| | 2009-10 | 2010-11 | 2011-12 | 2012-13 | 2013-14 |
| Depreciation | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Return on Equity | 1085.05 | 1124.80 | 1125.90 | 1125.90 | 1139.44 |
| O&M Expenses | 384.27 | 406.29 | 429.55 | 454.10 | 479.99 |
| Interest on Loan | 1.35 | 0.00 | 0.00 | 0.00 | 0.00 |
| Interest on Working Capital | 46.78 | 48.69 | 49.87 | 51.10 | 52.68 |
| Total | 1753.46 | 1815.78 | 1841.33 | 1867.10 | 1908.11 |

31. The Petitioner has claimed the following revised transmission charges in respect of the transmission asset for 2009-14 period in the instant petition:

| Particulars | (₹ in lakh) | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| | 2009-10 | 2010-11 | 2011-12 | 2012-13 | 2013-14 |
| Depreciation | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Interest on Loan | 63.44 | 48.57 | 33.70 | 18.84 | 5.70 |
| Return on equity | 1085.05 | 1124.80 | 1125.90 | 1125.90 | 1139.44 |
| Interest on Working Capital | 53.10 | 54.89 | 55.85 | 56.87 | 58.31 |
| O & M Expenses | 384.27 | 406.29 | 429.55 | 454.10 | 479.99 |
| Total | 1821.87 | 1870.56 | 1881.02 | 1891.71 | 1919.45 |



32. We have considered the Petitioner's claim. The tariff is approved in respect of the transmission asset on the basis of following:

- a) Admitted capital cost of ₹11621.00 lakh for transmission asset as on 1.4.2009;
- b) No Additional capitalisation during 2009-14 tariff period;
- c) Weighted Average Rate of Interest on actual loan derived/adopted from order dated 26.11.2015 in Petition No. 214/TT/2014; and
- d) Weighted Average Rate of Depreciation as per order 26.11.2015 in Petition No. 214/TT/2014

33. In view of above, the revised transmission charges allowed in respect of the transmission asset for 2009-14 tariff period are as follows:

| (₹ in lakh) | | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2009-10 | 2010-11 | 2011-12 | 2012-13 | 2013-14 |
| Depreciation | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Interest on Loan | 61.98 | 47.11 | 32.24 | 17.37 | 4.97 |
| Return on equity | 1085.05 | 1124.80 | 1125.90 | 1125.90 | 1139.44 |
| Interest on Working Capital | 48.05 | 49.67 | 50.54 | 51.46 | 52.78 |
| O & M Expenses | 384.27 | 406.29 | 429.55 | 454.10 | 479.99 |
| Total | 1815.36 | 1863.87 | 1874.25 | 1884.84 | 1913.19 |

34. AFC allowed for 2009-14 tariff period vide order dated 26.11.2015 in Petition No. 214/TT/2014, revised AFC claimed in the instant petition and AFC approved in the instant order are as follows:

| (₹ in lakh) | | | | | |
|---|---------|---------|---------|---------|---------|
| Particulars | 2009-10 | 2010-11 | 2011-12 | 2012-13 | 2013-14 |
| AFC allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 1753.46 | 1815.78 | 1841.33 | 1867.10 | 1908.11 |
| AFC claimed by the Petitioner in the instant petition | 1821.87 | 1870.56 | 1881.02 | 1891.71 | 1919.45 |
| AFC approved in the instant order | 1815.36 | 1863.87 | 1874.25 | 1884.84 | 1913.19 |

TRUING UP OF ANNUAL FIXED CHARGES FOR THE 2014-19 TARIFF PERIOD

35. The details of the trued-up transmission charges claimed by the Petitioner in respect of the transmission asset are as follows:



| (₹ in lakh) | | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Depreciation | 236.01 | 236.00 | 236.01 | 235.99 | 236.02 |
| Interest on Loan | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Return on equity | 1140.31 | 1145.54 | 1144.96 | 1144.96 | 1148.04 |
| Interest on Working Capital | 55.95 | 56.88 | 57.70 | 58.56 | 59.52 |
| O & M Expenses | 439.37 | 454.04 | 469.08 | 484.65 | 500.72 |
| Total | 1871.64 | 1892.46 | 1907.75 | 1924.16 | 1944.30 |

36. The details of the trued-up Interest on Working Capital (IWC) claimed by the Petitioner in respect of the transmission asset are as follows:

| (₹ in lakh) | | | | | |
|-------------------------|---------------|---------------|---------------|---------------|---------------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| O&M expenses | 36.61 | 37.84 | 39.09 | 40.39 | 41.73 |
| Maintenance Spares | 65.91 | 68.11 | 70.36 | 72.70 | 75.11 |
| Receivables | 311.94 | 315.41 | 317.96 | 320.69 | 324.05 |
| Total | 414.46 | 421.36 | 427.41 | 433.78 | 440.89 |
| Rate of Interest (in %) | 13.50 | 13.50 | 13.50 | 13.50 | 13.50 |
| Interest | 55.95 | 56.88 | 57.70 | 58.56 | 59.52 |

Capital Cost as on 1.4.2014

37. The capital cost of the transmission asset has been calculated in accordance with Regulations 9(3) and 9(6) of the 2014 Tariff Regulations.

38. The Commission vide order dated 26.11.2015 in Petition No. 214/TT/2014 allowed the transmission tariff in respect of the transmission asset for 2014-19 period based on admitted capital cost of ₹11621.00 lakh as on 31.3.2014. Therefore, the admitted capital cost of ₹11621.00 lakh as on 31.3.2014 has been considered for working out the trued-up tariff for 2014-19 tariff period.

Additional Capital Expenditure (ACE)

39. The Petitioner has not claimed any ACE during the 2014-19 period.

Capital Cost considered for truing-up of tariff for 2014-19 period

40. The capital cost considered for truing-up of tariff for 2014-19 tariff period is as follows:



| (₹ in lakh) | | |
|----------------------------------|------------------|-----------------------------------|
| Capital Cost (as on 1.4.2014) | ACE (2014-19) | Capital Cost (as on 31.3.2019) |
| 11621.00 | 0.00 | 11621.00 |

Debt-Equity Ratio

41. As per Regulation 19(3) of the 2014 Tariff Regulations, the debt-equity ratio allowed by the Commission for determination of tariff for the period ending on 31.3.2014 shall be considered. Accordingly, the admitted debt-equity ratio of 50:50 for the period ending on 31.3.2014 has been considered as opening debt-equity ratio as on 1.4.2014 for the purpose of truing-up of tariff of 2014-19 tariff period in respect of the transmission asset. The details of the debt-equity ratio in respect of the transmission asset as on 1.4.2014 and 31.3.2019 are as follows:

| Funding | Capital Cost (as on 1.4.2014) (₹ in lakh) | (in %) | Total Cost (as on 31.3.2019) (₹ in lakh) | (in %) |
|--------------|---|---------------|---|---------------|
| Debt | 5810.50 | 50.00 | 5810.50 | 50.00 |
| Equity | 5810.50 | 50.00 | 5810.50 | 50.00 |
| Total | 11621.00 | 100.00 | 11621.00 | 100.00 |

Depreciation

42. Depreciation has been allowed as per the methodology provided in Regulation 27 of the 2014 Tariff Regulations after considering capital expenditure as on 1.4.2014 and approved ACE during the 2014-19 tariff period. The transmission asset has completed 12 years of life before 31.3.2014 and, therefore, the remaining depreciable value has been spread across the balance useful life of the asset. The trued-up depreciation allowed in respect of the transmission asset during the 2014-19 period is as follows:

| (₹ in lakh) | | | | | |
|---------------------|----------|----------|----------|----------|----------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Opening Gross Block | 11621.00 | 11621.00 | 11621.00 | 11621.00 | 11621.00 |
| ACE | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Closing Gross Block | 11621.00 | 11621.00 | 11621.00 | 11621.00 | 11621.00 |



| | | | | | |
|--|---------------|---------------|---------------|---------------|---------------|
| Average Gross Block | 11621.00 | 11621.00 | 11621.00 | 11621.00 | 11621.00 |
| Weighted average Rate of Depreciation (in %) | 2.03 | 2.03 | 2.03 | 2.03 | 2.03 |
| Balance useful life (at the beginning of the year) (Year) | 14.00 | 13.00 | 12.00 | 11.00 | 10.00 |
| Elapsed useful life (at the beginning of the year) (Year) | 19.00 | 20.00 | 21.00 | 22.00 | 23.00 |
| Aggregate Depreciable Value at the beginning of the year | 10458.90 | 10458.90 | 10458.90 | 10458.90 | 10458.90 |
| Depreciation during the year | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Cumulative depreciation at the end of the year | 7390.77 | 7626.78 | 7862.79 | 8098.80 | 8334.81 |
| Remaining Depreciable Value at the end of the year | 3068.13 | 2832.12 | 2596.11 | 2360.10 | 2124.09 |

43. The details of depreciation allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014, depreciation claimed in the instant petition and trued-up depreciation approved in the instant order in respect of the transmission asset are as follows:

| Particulars | (₹ in lakh) | | | | |
|---|-------------|---------|---------|---------|---------|
| | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Claimed by the Petitioner in the instant petition | 236.01 | 236.00 | 236.01 | 235.99 | 236.02 |
| Approved after true-up in this order | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |

Interest on Loan (“IoL”)

44. As the entire loan has been repaid prior to 1.4.2014, no IoL has been claimed by the Petitioner for 2014-19 tariff period.

Return on Equity (“RoE”)

45. The Petitioner has claimed RoE in respect of the transmission asset in terms of Regulations 24 and 25 of the 2014 Tariff Regulations. The Petitioner has submitted that it is liable to pay income tax at MAT rates and has claimed following effective tax rates for 2014-19 tariff period:



| Year | Claimed effective tax rate (in %) | Grossed-up RoE [(Base Rate)/(1-t)] (in %) |
|-------------|--|--|
| 2014-15 | 21.018 | 19.624 |
| 2015-16 | 21.382 | 19.716 |
| 2016-17 | 21.338 | 19.705 |
| 2017-18 | 21.337 | 19.704 |
| 2018-19 | 21.549 | 19.758 |

46. BSPHCL has submitted that the Petitioner has failed to provide details of ITR (income tax return) of relevant years for calculating the grossed-up RoE. As per Clause 25(3) of the 2014 Tariff Regulations, a transmission licensee shall true up the grossed-up rate of RoE at the end of every financial year based on actual tax paid together with any additional tax demand including interest thereon, duly adjusted for any refund of tax including interest received from the income tax authorities pertaining to the tariff period 2014-15 to 2018-19 on actual gross income of any financial year. The said Regulation further provides that penalty shall not be claimed by the transmission licensee and any under recovery or over recovery of grossed-up rate of return on equity after true up, shall be recorded or refunded to beneficiaries or the long term transmission customers on year to year basis. Therefore, it is the statutory duty of the Petitioner to carry out the true up exercise on year to year basis strictly in accordance with the said provision and it has to then mandatorily provide all the details while filing the petition for true up. However, no such exercise has been carried out by the Petitioner. Further, the Petitioner has failed to provide Profit and Loss Account duly certified by its Chartered Accountant. Also, there is no specific averment in the petition to the effect that actual tax has been paid only on the income from all business/ sources. Thus, tariff for each year of the tariff period 2014-19 has not been trued-up in accordance with mandate of Regulation 25(3) of the 2014 Tariff Regulations. Paragraph 8.1.3 of the petition contains averments of the Petitioner that



income tax assessment for the year 2017-18 and 2018-19 has not yet been completed and this submission needs to be verified.

47. In response, the Petitioner has submitted that it has submitted all the necessary documents based on which, it has been granted trued-up tariff of 2014-19 period by the Commission vide various orders viz. Petition No. 247/TT/2019 dated 18.4.2020, 274/TT/2019 dated 27.4.2020, Petition No. 245/TT/2019 dated 23.4.2020 and Petition No. 307/TT/2019 dated 16.4.2020. The Petitioner has further produced a table of notified MAT rates based on which effective tax rate has been considered for grossing up of RoE and submitted that these are the MAT rates considered by the Commission for arriving at the grossed-up RoE. The Petitioner further prayed to allow the Petitioner to claim the differential tariff on account of the trued-up RoE based on effective tax rate calculated as above and Income-tax assessment/ re-assessment for the 2014-15, 2015-16, 2016-17, 2017-18 and 2018-19 on receipt of the respective assessment orders, directly from the beneficiaries, on year to year basis as provided in the Regulations. It also submitted that the Income tax assessment for the year 2017-18 and 2018-19 has not yet been completed.

48. We have considered the submissions of the Petitioner and BSPHCL. In view of the clarification given by the Petitioner, we are of the view that there is no merit in the contention of BSPHCL and therefore the same is rejected. The Commission in order dated 27.4.2020 in Petition No. 274/TT/2019 has arrived at the effective tax rate based on the notified MAT rates and the same is as follows:

| Year | Notified MAT rates (inclusive of surcharge & cess) | Effective tax (in %) |
|-------------|---|-----------------------------|
| 2014-15 | 20.961 | 20.961 |
| 2015-16 | 21.342 | 21.342 |
| 2016-17 | 21.342 | 21.342 |



| | | |
|---------|--------|--------|
| 2017-18 | 21.342 | 21.342 |
| 2018-19 | 21.549 | 21.549 |

49. The MAT rates as allowed vide order dated 27.4.2020 in Petition No. 274/TT/2019 are considered for the purpose of grossing up of rate of RoE for true-up of the tariff of 2014-19 tariff period in terms of the provisions of the 2014 Tariff Regulations and the same are as follows:

| Year | Notified MAT rates (inclusive of surcharge & cess) (in %) | Base rate of RoE (in %) | Grossed-up RoE [(Base Rate)/(1-t)] (in %) |
|---------|---|-------------------------|---|
| 2014-15 | 20.961 | 15.50 | 19.610 |
| 2015-16 | 21.342 | 15.50 | 19.705 |
| 2016-17 | 21.342 | 15.50 | 19.705 |
| 2017-18 | 21.342 | 15.50 | 19.705 |
| 2018-19 | 21.549 | 15.50 | 19.758 |

50. Accordingly, RoE allowed in respect of the transmission asset is as follows:

| Particulars | (₹ in lakh) | | | | |
|--------------------------------------|----------------|----------------|----------------|----------------|----------------|
| | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Opening Equity | 5810.50 | 5810.50 | 5810.50 | 5810.50 | 5810.50 |
| Addition due to ACE | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Closing Equity | 5810.50 | 5810.50 | 5810.50 | 5810.50 | 5810.50 |
| Average Equity | 5810.50 | 5810.50 | 5810.50 | 5810.50 | 5810.50 |
| Return on Equity (Base Rate) (in %) | 15.500 | 15.500 | 15.500 | 15.500 | 15.500 |
| Tax Rate applicable (in %) | 20.961 | 21.342 | 21.342 | 21.342 | 21.549 |
| Applicable ROE Rate (in %) | 19.610 | 19.705 | 19.705 | 19.705 | 19.758 |
| Return on Equity for the year | 1139.44 | 1144.96 | 1144.96 | 1144.96 | 1148.04 |

51. The details of RoE allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014, RoE claimed in the instant petition and true-up RoE approved in the instant order in respect of the transmission asset are as follows:

| Particulars | (₹ in lakh) | | | | |
|---|-------------|---------|---------|---------|---------|
| | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 1139.44 | 1139.44 | 1139.44 | 1139.44 | 1139.44 |
| Claimed by the Petitioner in the instant petition | 1140.31 | 1145.54 | 1144.96 | 1144.96 | 1148.04 |
| Approved after true-up in this order | 1139.44 | 1144.96 | 1144.96 | 1144.96 | 1148.04 |



Operation & Maintenance Expenses (O&M Expenses)

52. The O&M Expenses as claimed by the Petitioner are within the norms specified under the 2014 Tariff Regulations. The O&M Expenses approved in respect of the transmission asset for 2014-19 tariff period are as follows:

| (₹ in lakh) | | | | | |
|--|---------------|---------------|---------------|---------------|---------------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Transmission Line (in km) | | | | | |
| 400 KV Talcher-Rengali I | 24.00 | 24.00 | 24.00 | 24.00 | 24.00 |
| 400 KV Talcher-Rourkela I | 171.00 | 171.00 | 171.00 | 171.00 | 171.00 |
| Norms (₹ lakh/km) | 0.707 | 0.731 | 0.755 | 0.780 | 0.806 |
| O&M Transmission Line (₹ in lakh) | 137.87 | 142.55 | 147.23 | 152.10 | 157.17 |
| Sub-station Bays (Number) | | | | | |
| 400 kV Sub-station bays | 5 | 5 | 5 | 5 | 5 |
| Norms (₹ lakh/bay) | 60.30 | 62.30 | 64.37 | 66.51 | 68.71 |
| O&M Substation (₹ in lakh) | 301.50 | 311.50 | 321.85 | 332.55 | 343.55 |
| Total O&M (₹ in lakh) | 439.37 | 454.05 | 469.08 | 484.65 | 500.72 |

53. The details of O&M Expenses allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014, O&M Expenses claimed in the instant petition and true-up O&M Expenses approved in the instant order in respect of the transmission asset are as follows:

| (₹ in lakh) | | | | | |
|---|---------|---------|---------|---------|---------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 439.37 | 454.05 | 469.08 | 484.65 | 500.72 |
| Claimed by the Petitioner in the instant petition | 439.37 | 454.04 | 469.08 | 484.65 | 500.72 |
| Approved after true-up in this order | 439.37 | 454.05 | 469.08 | 484.65 | 500.72 |

Interest on Working Capital (IWC)

54. The Petitioner is entitled to IWC as per Regulation 28 of the 2014 Tariff Regulations. The components of the working capital and the Petitioner's entitlement to interest thereon are discussed as follows:



(i) Receivables

Receivables as a component of working capital will be equivalent to two months fixed cost. The Petitioner has claimed the receivables on the basis of 2 months annual transmission charges. In the tariff being allowed, receivables have been worked out on the basis of 2 months transmission charges.

(ii) Maintenance spares

Regulation 28 of the 2014 Tariff Regulations provides for maintenance spares @15% per annum of the O&M expenses. The value of maintenance spares has accordingly been worked out.

(iii) O & M expenses

Operation and maintenance expenses have been considered for one month as a component of working capital. The Petitioner has claimed O&M expenses for 1 month of the respective year as claimed in the petition. This has been considered in the working capital.

(iv) Rate of interest on working capital

As per Proviso 3 of Regulation 28 of the 2014 Tariff Regulation, SBI Base rate 10.00% as on 1.4.2014 plus 350 basis points i.e. 13.50% has been considered for the asset as the rate of interest on working capital.

55. The trued-up IWC allowed in respect of the transmission asset for 2014-19 tariff period is as follows:

| | (₹ in lakh) | | | | |
|--|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Working Capital for O&M Expenses (O&M Expenses for One Month) | 36.61 | 37.84 | 39.09 | 40.39 | 41.73 |
| Working Capital for Maintenance Spares (15% of O&M) | 65.90 | 68.11 | 70.36 | 72.70 | 75.11 |
| Working Capital for Receivables (Equivalent to two months of annual transmission charges) | 311.79 | 315.31 | 317.96 | 320.70 | 324.05 |
| Total Working Capital | 414.31 | 421.26 | 427.41 | 433.78 | 440.88 |
| Rate of Interest of Working Capital (in %) | 13.50 | 13.50 | 13.50 | 13.50 | 13.50 |
| Interest of working capital | 55.93 | 56.87 | 57.70 | 58.56 | 59.52 |



56. The details of IWC allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014, IWC claimed in the instant petition and trued-up IWC approved in the instant order in respect of the transmission asset is as follows:

| (₹ in lakh) | | | | | |
|---|---------|---------|---------|---------|---------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 55.93 | 56.74 | 57.57 | 58.43 | 59.32 |
| Claimed by the Petitioner in the instant petition | 55.95 | 56.88 | 57.70 | 58.56 | 59.52 |
| Approved after true-up in this order | 55.93 | 56.87 | 57.70 | 58.56 | 59.52 |

Approved Annual Fixed Charges for 2014-19 Tariff Period

57. Accordingly, the annual fixed charges after truing-up in respect of the transmission asset for the 2014-19 tariff period are as follows:

| (₹ in lakh) | | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Depreciation | 236.01 | 236.01 | 236.01 | 236.01 | 236.01 |
| Interest on Loan | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Return on Equity | 1139.44 | 1144.96 | 1144.96 | 1144.96 | 1148.04 |
| O&M Expenses | 439.37 | 454.05 | 469.08 | 484.65 | 500.72 |
| Interest on Working Capital | 55.93 | 56.87 | 57.70 | 58.56 | 59.52 |
| Total | 1870.75 | 1891.88 | 1907.74 | 1924.18 | 1944.29 |

58. The details of annual transmission charges allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014, annual transmission charges claimed in the instant petition and trued-up annual transmission charges approved in the instant order in respect of the transmission asset are as follows:

| (₹ in lakh) | | | | | |
|---|---------|---------|---------|---------|---------|
| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
| Allowed vide order dated 26.11.2015 in Petition No. 214/TT/2014 | 1870.74 | 1886.24 | 1902.10 | 1918.53 | 1935.49 |
| Claimed by the Petitioner in the instant petition | 1871.64 | 1892.46 | 1907.75 | 1924.16 | 1944.30 |
| Approved after true-up in this order | 1870.75 | 1891.88 | 1907.74 | 1924.18 | 1944.29 |



DETERMINATION OF ANNUAL FIXED CHARGES FOR THE 2019-24 TARIFF PERIOD

59. The Petitioner has claimed the following transmission charges for 2019-24 tariff period:

| | (₹ in lakh) | | | | |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Depreciation | 237.17 | 242.70 | 251.04 | 252.44 | 253.58 |
| Interest on Loan | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Return on equity | 1091.99 | 1094.75 | 1096.51 | 1096.55 | 1096.92 |
| Interest on Working Capital | 34.54 | 35.25 | 35.93 | 36.49 | 37.01 |
| O & M Expenses | 334.00 | 345.70 | 357.79 | 370.28 | 383.15 |
| Total | 1697.70 | 1718.40 | 1741.27 | 1755.76 | 1770.66 |

60. The details of IWC claimed by the Petitioner is as follows:

| | (₹ in lakh) | | | | |
|-------------------------|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| O&M Expenses | 27.83 | 28.81 | 29.82 | 30.86 | 31.93 |
| Maintenance Spares | 50.10 | 51.86 | 53.67 | 55.54 | 57.47 |
| Receivables | 208.73 | 211.86 | 214.68 | 216.46 | 217.70 |
| Total | 286.66 | 292.53 | 298.17 | 302.86 | 307.10 |
| Rate of Interest (in %) | 12.05 | 12.05 | 12.05 | 12.05 | 12.05 |
| Interest | 34.54 | 35.25 | 35.93 | 36.49 | 37.01 |

Capital Cost

61. Regulation 19 of the 2019 Tariff Regulations provides as follows:

“(1) The Capital cost of the generating station or the transmission system, as the case may be, as determined by the Commission after prudence check in accordance with these regulations shall form the basis for determination of tariff for existing and new projects.

(2) The Capital Cost of a new project shall include the following:

(a) The expenditure incurred or projected to be incurred up to the date of commercial operation of the project;

(b) Interest during construction and financing charges, on the loans (i) being equal to 70% of the funds deployed, in the event of the actual equity in excess of 30% of the funds deployed, by treating the excess equity as normative loan, or (ii) being equal to the actual amount of loan in the event of the actual equity less than 30% of the funds deployed;

(c) Any gain or loss on account of foreign exchange risk variation pertaining to the loan amount availed during the construction period;

(d) Interest during construction and incidental expenditure during construction as computed in accordance with these regulations;

(e) Capitalised initial spares subject to the ceiling rates in accordance with these regulations;

(f) Expenditure on account of additional capitalization and de-capitalisation determined in accordance with these regulations;



- (g) Adjustment of revenue due to sale of infirm power in excess of fuel cost prior to the date of commercial operation as specified under Regulation 7 of these regulations;*
- (h) Adjustment of revenue earned by the transmission licensee by using the asset before the date of commercial operation;*
- (i) Capital expenditure on account of ash disposal and utilization including handling and transportation facility;*
- (j) Capital expenditure incurred towards railway infrastructure and its augmentation for transportation of coal up to the receiving end of the generating station but does not include the transportation cost and any other appurtenant cost paid to the railway;*
- (k) Capital expenditure on account of biomass handling equipment and facilities, for co-firing;*
- (l) Capital expenditure on account of emission control system necessary to meet the revised emission standards and sewage treatment plant;*
- (m) Expenditure on account of fulfilment of any conditions for obtaining environment clearance for the project;*
- (n) Expenditure on account of change in law and force majeure events; and*
- (o) Capital cost incurred or projected to be incurred by a thermal generating station, on account of implementation of the norms under Perform, Achieve and Trade (PAT) scheme of Government of India shall be considered by the Commission subject to sharing of benefits accrued under the PAT scheme with the beneficiaries.*

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

- (a) Capital cost admitted by the Commission prior to 1.4.2019 duly tried up by excluding liability, if any, as on 1.4.2019;*
- (b) Additional capitalization and de-capitalization for the respective year of tariff as determined in accordance with these regulations;*
- (c) Capital expenditure on account of ash disposal and utilization including handling and transportation facility;*
- (d) Capital expenditure on account of ash disposal and utilization including handling and transportation facility;*
- (e) Capital expenditure incurred towards railway infrastructure and its augmentation for transportation of coal up to the receiving end of generating station but does not include the transportation cost and any other appurtenant cost paid to the railway; and*
- (f) Capital cost incurred or projected to be incurred by a thermal generating station, on account of implementation of the norms under Perform, Achieve and Trade (PAT) scheme of Government of India shall be considered by the Commission subject to sharing of benefits accrued under the PAT scheme with the beneficiaries.”*

(4) The capital cost in case of existing or new hydro generating station shall also include:

- (a) cost of approved rehabilitation and resettlement (R&R) plan of the project in conformity with National R&R Policy and R&R package as approved; and*
- (b) cost of the developer's 10% contribution towards Rajiv Gandhi Grameen Vidyutikaran Yojana (RGGVY) and Deendayal Upadhyaya Gram Jyoti Yojana (DDUGJY) project in the affected area.*

(5) The following shall be excluded from the capital cost of the existing and new projects:

- (a) The asset forming part of the project, but not in use, as declared in the tariff petition;*



(b) De-capitalised Asset after the date of commercial operation on account of replacement or removal on account of obsolescence or shifting from one project to another project:

Provided that in case replacement of transmission asset is recommended by Regional Power Committee, such asset shall be decapitalised only after its redeployment;

Provided further that unless shifting of an asset from one project to another is of permanent nature, there shall be no de-capitalization of the concerned asset.

(c) In case of hydro generating stations, any expenditure incurred or committed to be incurred by a project developer for getting the project site allotted by the State Government by following a transparent process;

(d) Proportionate cost of land of the existing project which is being used for generating power from generating station based on renewable energy; and

(e) Any grant received from the Central or State Government or any statutory body or authority for the execution of the project which does not carry any liability of repayment. “

62. The Petitioner has claimed capital cost of ₹ 11621.00 lakh for the transmission assets as on 31.3.2019, which is the same as worked out by the Commission in earlier part of this order. Accordingly, the capital cost of ₹ 11621.00 lakh for the transmission asset has been considered as on 1.4.2019 for determination of tariff in accordance with Regulation 19 of the 2019 Tariff Regulations.

Additional Capital Expenditure (ACE)

63. Regulation 24 and Regulation 25 of the 2019 Tariff Regulations provide as follows:

“24. Additional Capitalization within the original scope and up to the cut-off date:

(1) The Additional Capital Expenditure in respect of a new project or an existing project incurred or projected to be incurred, on the following counts within the original scope of work, after the date of commercial operation and up to the cut-off date may be admitted by the Commission, subject to prudence check:

(a) Undischarged liabilities recognized to be payable at a future date;

(b) Works deferred for execution;

(c) Procurement of initial capital spares within the original scope of work, in accordance with the provisions of Regulation 23 of these regulations;

(d) Liabilities to meet award of arbitration or for compliance of the directions or order of any statutory authority or order or decree of any court of law;

(e) Change in law or compliance of any existing law; and

(f) Force Majeure events:



Provided that in case of any replacement of the Asset, the additional capitalization shall be worked out after adjusting the gross fixed Asset and cumulative depreciation of the Asset replaced on account of de-capitalization.

(2) The generating company or the transmission licensee, as the case may be shall submit the details of works asset wise/work wise included in the original scope of work along with estimates of expenditure, liabilities recognized to be payable at a future date and the works deferred for execution.”

25. Additional Capitalisation within the original scope and after the cut-off date:

(1) The additional capital expenditure incurred or projected to be incurred in respect of an existing project or a new project on the following counts within the original scope of work and after the cut-off date may be admitted by the Commission, subject to prudence check:

- (a) Liabilities to meet award of arbitration or for compliance of the directions or order of any statutory authority, or order or decree of any court of law;*
- (b) Change in law or compliance of any existing law;*
- (c) Deferred works relating to ash pond or ash handling system in the original scope of work;*
- (d) Liability for works executed prior to the cut-off date;*
- (e) Force Majeure events;*
- (f) Liability for works admitted by the Commission after the cut-off date to the extent of discharge of such liabilities by actual payments; and*
- (g) Raising of ash dyke as a part of ash disposal system.*

(2) In case of replacement of Asset deployed under the original scope of the existing project after cut-off date, the additional capitalization may be admitted by the Commission, after making necessary adjustments in the gross fixed Asset and the cumulative depreciation, subject to prudence check on the following grounds:

- (a) The useful life of the Asset is not commensurate with the useful life of the project and such Asset have been fully depreciated in accordance with the provisions of these regulations;*
- (b) The replacement of the asset or equipment is necessary on account of change in law or Force Majeure conditions;*
- (c) The replacement of such asset or equipment is necessary on account of obsolescence of technology; and*
- (d) The replacement of such asset or equipment has otherwise been allowed by the Commission.*

64. The Petitioner vide Auditor's Certificate dated 11.11.2019 has projected net ACE of ₹116.08 lakh for transmission asset after adjusting for de-capitalisation during the 2019-24 tariff period. The Petitioner has submitted that the proposed ACE is on account of expenditure towards Supply, Installation & Commissioning of tertiary auxiliary transformer for auxiliary supply to Rourkela sub-station and for replacement



of old and obsolete equipment. The Petitioner has claimed the proposed ACE under Regulation 25(2) of the 2019 Tariff Regulations. The Petitioner vide Auditor Certificate dated 11.11.2019 has submitted the cost details for ACE/ de-capitalization proposed during 2019-24 as follows:

| Particulars | (₹ in lakh) | |
|---------------------------------------|---------------|-------------|
| | Amount | Sub-station |
| Proposed ACE in 2019-20 | 23.51 | |
| Proposed ACE in 2020-21 | 74.31 | |
| Proposed ACE in 2021-22 | 30.49 | |
| Proposed ACE in 2022-23 | 13.08 | |
| Proposed De-capitalisation in 2021-22 | (25.31) | |
| NET ACE | 116.08 | |

65. The Petitioner vide affidavit dated 30.6.2021 has submitted the following justification/ reasons with respect to the proposed ACE for 2019-24:

(a) **Replacement of 400 kV “BHEL” make Pneumatically operated circuit breakers at Rourkela.**

The circuit breakers at Rourkela are of hydraulic-operated type. This type of technology has become obsolete and OEM has stopped production of such types of circuit breakers. The spares and service support from OEM is very poor and cost of spares are exorbitantly high and also consume lot of time. Circuit breakers are giving frequent maintenance problems such as magnetic ventil failures, air leakages from the various parts of the mechanisms, SF6 gas leakages etc. leading to prolonged outages causing unstable grid operation. Where controlled switching device is installed, issue has also been observed for CSD tuning due to large variation in operating time of CBs resulting in adverse effect on associated transformer/ reactor.

(b) **Installation of Tertiary Auxiliary transformer and associated bay equipment in ICT-II at Rourkela**

As per the CEA grid connectivity guidelines 2007, redundant auxiliary supply is to be made available. In the LT system scheme provided at Rourkela, the provision for redundant supply is not envisaged. Presently, the auxiliary supply to Rourkela Substation is being fed through DISCOM only, whose reliability is



very less. In case of fault in DISCOM supply auxiliary depends totally on DG set. Consumption of diesel due to operation of DG on failure of auxiliary supply is high at Rourkela. To get more reliable auxiliary supply, LT transformer is required to be installed with tertiary of ICT at Rourkela sub-station.

66. The petitioner has further submitted that in addition to equipment proposed to be replaced, there are many other equipment/materials like other CT, CB, CVT, earthing system, tower and gantry structures, cables, which plays a very important role in operation of any sub-station. The equipment are replaced based on their condition. However, balance of the system still remains under service, for which replacement may be required in near future. The Petitioner further submitted that the gross block of old equipment, being proposed to be replaced in the instant petition is hardly 2.01% of the total gross block of the transmission asset. As only some of the equipment are proposed to be replaced, it is difficult to determine the life extension of transmission asset including old equipment. The new equipment can definitely run for more than five years but considering the combination of equipment, in which majority of items are old, and may require replacement in future, useful life of the transmission asset after installation of new equipment cannot be assessed at this stage.

67. We have considered the submissions of the Petitioner. ACE claimed is towards replacement of 400 KV "BHEL" make pneumatically operated circuit breakers (CBs) at Rourkela sub-station and installation of tertiary auxiliary transformer and associated bay equipment in ICT-II at Rourkela sub-station. In our view, these items are of critical nature and their failure may affect the stability and reliability of the grid. As such, the replacement of these equipment and consequential ACE is approved, subject to true-up on actual basis.



68. The Petitioner is directed to submit the details of the actual cost of the replaced equipment sub-station wise at the time of truing up. In future, if the Petitioner proposes to install tertiary auxiliary transformer at any sub-station, it shall seek approval from RPC for the said proposal.

69. The proposed ACE allowed is subject to truing up. ACE and de-capitalisation allowed for the 2019-24 tariff period is as follows:

| (₹ in lakh) | | | | | |
|-------------|------------------------|--------------|--------------|-------------|--------------|
| S. No. | Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 |
| (1) | ACE | 23.51 | 74.31 | 30.49 | 13.08 |
| (2) | Decapitalization | 0.00 | 0.00 | (25.31) | 0.00 |
| (3) | Net ACE (1)-(2) | 23.51 | 74.31 | 5.18 | 13.08 |

70. Accordingly, capital cost of the transmission asset as on 31.3.2024 is allowed as follows:

| (₹ in lakh) | | | | | |
|---------------------------------------|---------|---------|---------|---------|--------------------------------|
| Capital Cost allowed (as on 1.4.2019) | ACE | | | | Capital Cost (as on 31.3.2024) |
| | 2019-20 | 2020-21 | 2021-22 | 2022-23 | |
| 11621.00 | 23.51 | 74.31 | 5.18 | 13.08 | 11737.08 |

Debt-Equity Ratio

71. Regulation 18 of the 2019 Tariff Regulations provides as follows:

“18. Debt-Equity Ratio: (1) For new projects, the debt: equity ratio of 70:30 as on date of commercial operation shall be considered. If the equity actually deployed is more than 30% of the capital cost, equity in excess of 30% shall be treated as normative loan:

Provided that:

- i. where equity actually deployed is less than 30% of the capital cost, actual equity shall be considered for determination of tariff:
- ii. the equity invested in foreign currency shall be designated in Indian rupees on the date of each investment:
- iii. any grant obtained for the execution of the project shall not be considered as a part of capital structure for the purpose of debt: equity ratio.

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



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

(2) The generating company or the transmission licensee, as the case may be, shall submit the resolution of the Board of the company or approval of the competent authority in other cases regarding infusion of funds from internal resources in support of the utilization made or proposed to be made to meet the capital expenditure of the generating station or the transmission system including communication system, as the case may be.

(3) In case of the generating station and the transmission system including communication system declared under commercial operation prior to 1.4.2019, debt: equity ratio allowed by the Commission for determination of tariff for the period ending 31.3.2019 shall be considered:

Provided that in case of a generating station or a transmission system including communication system which has completed its useful life as on or after 1.4.2019, if the equity actually deployed as on 1.4.2019 is more than 30% of the capital cost, equity in excess of 30% shall not be taken into account for tariff computation;

Provided further that in case of projects owned by Damodar Valley Corporation, the debt: equity ratio shall be governed as per sub-clause (ii) of clause (2) of Regulation 72 of these regulations.

(4) In case of the generating station and the transmission system including communication system declared under commercial operation prior to 1.4.2019, but where debt: equity ratio has not been determined by the Commission for determination of tariff for the period ending 31.3.2019, the Commission shall approve the debt: equity ratio in accordance with clause (1) of this Regulation.

(5) Any expenditure incurred or projected to be incurred on or after 1.4.2019 as may be admitted by the Commission as additional capital expenditure for determination of tariff, and renovation and modernisation expenditure for life extension shall be serviced in the manner specified in clause (1) of this Regulation.”

72. The debt-equity ratio for the 2019-24 period is allowed as per Regulation 18(3) of the 2019 Tariff Regulations. The details of the debt-equity ratio considered for the purpose of tariff for 2019-24 tariff period are as follows:

| Funding | Capital Cost (as on 1.4.2019) (₹ in lakh) | (in %) | Total Cost (as on 31.3.2024) (₹ in lakh) | (in %) |
|----------------|--|---------------|---|---------------|
| Debt | 5810.50 | 50.00 | 5896.84 | 50.24 |
| Equity | 5810.50 | 50.00 | 5840.24 | 49.76 |
| Total | 11621.00 | 100.00 | 11737.08 | 100.00 |

Depreciation

73. Regulation 33 of the 2019 Tariff Regulations provides as follows:



"33. Depreciation: (1) Depreciation shall be computed from the date of commercial operation of a generating station or unit thereof or a transmission system or element thereof including communication system. In case of the tariff of all the units of a generating station or all elements of a transmission system including communication system for which a single tariff needs to be determined, the depreciation shall be computed from the effective date of commercial operation of the generating station or the transmission system taking into consideration the depreciation of individual units:

Provided that effective date of commercial operation shall be worked out by considering the actual date of commercial operation and installed capacity of all the units of the generating station or capital cost of all elements of the transmission system, for which single tariff needs to be determined.

(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 a 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.

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

Provided that the salvage value for IT equipment and software shall be considered as NIL and 100% value of the asset shall be considered depreciable;

Provided further that in case of hydro generating stations, the salvage value shall be as provided in the agreement, if any, signed by the developers with the State Government for development of the generating station:

Provided also that the capital cost of the asset of the hydro generating station for the purpose of computation of depreciated value shall correspond to the percentage of sale of electricity under long-term power purchase agreement at regulated tariff:

Provided also that any depreciation disallowed on account of lower availability of the generating station or unit or transmission system as the case may be, shall not be allowed to be recovered at a later stage during the useful life or the extended life.

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

(5) Depreciation shall be calculated annually based on Straight Line Method and at rates specified in Appendix-I to these regulations for the asset 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 asset.



(6) In case of the existing projects, the balance depreciable value as on 1.4.2019 shall be worked out by deducting the cumulative depreciation as admitted by the Commission up to 31.3.2019 from the gross depreciable value of the asset.

(7) The generating company or the transmission licensee, as the case may be, shall submit the details of proposed capital expenditure five years before the completion of useful life of the project along with justification and proposed life extension. The Commission based on prudence check of such submissions shall approve the depreciation on capital expenditure.

(8) In case of de-capitalization of asset in respect of generating station or unit thereof or transmission system or element thereof, the cumulative depreciation shall be adjusted by taking into account the depreciation recovered in tariff by the de-capitalized asset during its useful services.”

74. We have considered the submissions of the Petitioner. The transmission asset has completed 12 years before 31.3.2014. Consequently, depreciation has been calculated based on the remaining depreciable value (up to 90% of existing gross block of assets) to be recovered over the balance useful life. Depreciation corresponding to ACE (new additions) claimed for 2019-24 period is allowed at normative rate of depreciation as specified in the 2019 Tariff Regulations. The depreciation allowed in respect of the transmission asset for 2019-24 tariff period is as follows:

| | (₹ in lakh) | | | | |
|--|----------------|----------------|----------------|----------------|----------------|
| Existing Assets | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Opening Gross Block | 11621.00 | 11621.00 | 11621.00 | 11595.69 | 11595.69 |
| De-capitalisation | 0.00 | 0.00 | 25.31 | 0.00 | 0.00 |
| Closing Gross Block | 11621.00 | 11621.00 | 11595.69 | 11595.69 | 11595.69 |
| Average Gross Block | 11621.00 | 11621.00 | 11608.35 | 11595.69 | 11595.69 |
| Depreciable Value | 10458.90 | 10458.90 | 10447.51 | 10436.12 | 10436.12 |
| Weighted average rate of Depreciation (WAROD) (in %) | 2.03 | 2.03 | 2.02 | 2.04 | 2.04 |
| Cumulative Depreciation at the beginning of the year | 8334.81 | 8570.82 | 8806.83 | 9018.43 | 9254.72 |
| Remaining depreciable value at the beginning of the year | 2124.09 | 1888.08 | 1640.68 | 1417.69 | 1181.41 |
| Balance useful life at the beginning of the year (Year) | 9.00 | 8.00 | 7.00 | 6.00 | 5.00 |
| Lapsed life at the beginning of the year (Year) | 24.00 | 25.00 | 26.00 | 27.00 | 28.00 |
| Depreciation during the year | 236.01 | 236.01 | 234.38 | 236.28 | 236.28 |
| Depreciation adjustment on account of de-capitalisation | 0.00 | 0.00 | 22.78 | 0.00 | 0.00 |



| | | | | | |
|--|---------|---------|---------|---------|---------|
| Cumulative depreciation at the end of the year | 8570.82 | 8806.83 | 9018.43 | 9254.72 | 9491.00 |
| Remaining depreciable value at the end of the year | 1888.08 | 1652.07 | 1429.08 | 1181.41 | 945.12 |

(₹ in lakh)

| New Additions | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
|--|----------------|----------------|----------------|----------------|----------------|
| Opening Gross Block | 0.00 | 23.51 | 97.82 | 128.31 | 141.39 |
| ACE during the year | 23.51 | 74.31 | 30.49 | 13.08 | 0.00 |
| Closing Gross Block | 23.51 | 97.82 | 128.31 | 141.39 | 141.39 |
| Average Gross Block | 11.76 | 60.67 | 113.07 | 134.85 | 141.39 |
| Weighted average rate of Depreciation (WAROD) (in %) | 5.28 | 5.28 | 5.28 | 5.28 | 5.28 |
| Depreciable Value | 10.58 | 54.60 | 101.76 | 121.37 | 127.25 |
| Cumulative Depreciation at the beginning of the year | 0.00 | 0.62 | 3.82 | 9.79 | 16.91 |
| Depreciation during the year | 0.62 | 3.20 | 5.97 | 7.12 | 7.47 |
| Cumulative Depreciation at the end of the year | 0.62 | 3.82 | 9.79 | 16.91 | 24.38 |
| Remaining Depreciation at the end of the year | 9.96 | 50.77 | 91.96 | 104.45 | 102.87 |

Interest on Loan (“IoL”)

75. As the entire loan has been repaid prior to 1.4.2014, no IoL has been claimed by the Petitioner for 2019-24 tariff period. Accordingly, no IoL has been allowed for 2019-24 tariff period.

Return on Equity (RoE)

76. Regulations 30 and 31 of the 2019 Tariff Regulations specify as follows:

“30. Return on Equity: (1) Return on equity shall be computed in rupee terms, on the equity base determined in accordance with Regulation 18 of these regulations.

(2) Return on equity shall be computed at the base rate of 15.50% for thermal generating station, transmission system including communication system and run-of river hydro generating station, and at the base rate of 16.50% for the storage type hydro generating stations including pumped storage hydro generating stations and run-of river generating station with pondage:

Provided that return on equity in respect of additional capitalization after cut-off date beyond the original scope excluding additional capitalization due to Change in Law, shall be computed at the weighted average rate of interest on actual loan portfolio of the generating station or the transmission system;

Provided further that:

i. In case of a new project, the rate of return on equity shall be reduced by 1.00% for such period as may be decided by the Commission, if the generating station or transmission system is found to be declared under commercial operation without



commissioning of any of the Restricted Governor Mode Operation (RGMO) or Free Governor Mode Operation (FGMO), data telemetry, communication system up to load dispatch centre or protection system based on the report submitted by the respective RLDC;

ii. in case of existing generating station, as and when any of the requirements under (i) above of this Regulation are found lacking based on the report submitted by the concerned RLDC, rate of return on equity shall be reduced by 1.00% for the period for which the deficiency continues;

iii. in case of a thermal generating station, with effect from 1.4.2020:

a) rate of return on equity shall be reduced by 0.25% in case of failure to achieve the ramp rate of 1% per minute;

b) an additional rate of return on equity of 0.25% shall be allowed for every incremental ramp rate of 1% per minute achieved over and above the ramp rate of 1% per minute, subject to ceiling of additional rate of return on equity of 1.00%:

Provided that the detailed guidelines in this regard shall be issued by National Load Dispatch Centre by 30.6.2019.”

“31. Tax on Return on Equity: (1) The base rate of return on equity as allowed by the Commission under Regulation 30 of these regulations shall be grossed up with the effective tax rate of the respective financial year. For this purpose, the effective tax rate shall be considered on the basis of actual tax paid in respect of the financial year in line with the provisions of the relevant Finance Acts by the concerned generating company or the transmission licensee, as the case may be. The actual tax paid on income from other businesses including deferred tax liability (i.e. income from business other than business of generation or transmission, as the case may be) shall be excluded for the calculation of effective tax rate.

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

$$\text{Rate of pre-tax return on equity} = \text{Base rate} / (1-t)$$

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.

Illustration-

(i) In case of a generating company or a transmission licensee paying Minimum Alternate Tax (MAT) @ 21.55% including surcharge and cess:

$$\text{Rate of return on equity} = 15.50 / (1-0.2155) = 19.758\%$$

(ii) In case of a generating company or a transmission licensee paying normal corporate tax including surcharge and cess:



- (a) *Estimated Gross Income from generation or transmission business for FY 2019-20 is Rs 1,000 crore;*
(b) *Estimated Advance Tax for the year on above is Rs 240 crore;*
(c) *Effective Tax Rate for the year 2019-20 = Rs 240 Crore/Rs 1000 Crore = 24%;*
(d) *Rate of return on equity = $15.50 / (1 - 0.24) = 20.395\%$*

(3) The generating company or the transmission licensee, as the case may be, shall true up the grossed up rate of return on equity at the end of every financial year based on actual tax paid together with any additional tax demand including interest thereon, duly adjusted for any refund of tax including interest received from the income tax authorities pertaining to the tariff period 2019-24 on actual gross income of any financial year. However, penalty, if any, arising on account of delay in deposit or short deposit of tax amount shall not be claimed by the generating company or the transmission licensee, as the case may be. Any under-recovery or over-recovery of grossed up rate on return on equity after truing up, shall be recovered or refunded to beneficiaries or the long term customers, as the case may be, on year to year basis.”

77. The Petitioner has submitted that MAT rate is applicable to the Petitioner's Company.

78. BSPHCL has reiterated its submissions made for the 2014-19 tariff period with regard to RoE. It has further added that since the procedure is flawed, there can't be any rationale in Petitioner to take the MAT rate at 21.54887 and ROE @19.758% (being rate of 2018-19) while proposing the tariff for 2019-24 tariff period. Hence, the Petitioner may be directed to furnish the complete details, calculations, paper and also show transparency in order to decide and adjudicate in accordance with the provisions of Tariff Regulations and relevant laws.

79. In response, the Petitioner has submitted that the Petitioner being liable to pay income tax at MAT rate, RoE has been calculated @19.758% after grossing up the RoE with MAT rate of 21.5488% based on the rate prescribed by the Commission as per illustration under regulation 31(2)(ii) of the 2019 Tariff Regulations during the 2019-24 tariff period. As per Regulation 31(3) of the 2019 Tariff Regulations, the grossed-up rate of RoE at the end of every financial year shall be trued up based on actual tax paid together with any additional tax demand including interest thereon duly adjusted for any refund of tax including interest received from the IT authorities



pertaining to the tariff period 2019-24 on actual gross income of any financial year. However, penalty, if any, arising on account of delay in deposit or short deposit of tax amount shall not be claimed by it. Any under-recovery or over-recovery of grossed-up rate of RoE after truing up shall be recovered or refunded to the long-term customers on year to year basis. It is further submitted that adjustment due to any additional tax demand including interest duly adjusted for any refund of tax including interest received from IT authorities shall be recoverable/ adjustable during the 2019-24 tariff period on the basis of receipt of Income Tax assessment order.

80. We have considered the submissions of the Petitioner and BSPHCL. The MAT rate applicable in 2019-20 has been considered for the purpose of RoE which shall be trued-up with actual tax rate in accordance with Regulation 31(3) of the 2019 Tariff Regulations. RoE allowed in respect of the transmission asset under Regulation 30 of the 2019 Tariff Regulations is as follows:

| (₹ in lakh) | | | | | |
|--|----------------|----------------|----------------|----------------|----------------|
| Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Opening Equity | 5810.50 | 5817.55 | 5839.84 | 5836.32 | 5840.24 |
| Net Addition due to ACE/Decapitalization | 7.05 | 22.29 | (3.52) | 3.92 | 0.00 |
| Closing Equity | 5817.55 | 5839.84 | 5836.32 | 5840.24 | 5840.24 |
| Average Equity | 5814.03 | 5828.70 | 5838.08 | 5838.28 | 5840.24 |
| Return on Equity (Base Rate) (in %) | 15.500 | 15.500 | 15.500 | 15.500 | 15.500 |
| MAT Rate for respective year (in %) | 17.472 | 17.472 | 17.472 | 17.472 | 17.472 |
| Rate of Return on Equity (in %) | 18.782 | 18.782 | 18.782 | 18.782 | 18.782 |
| Return on Equity | 1091.99 | 1094.75 | 1096.51 | 1096.55 | 1096.91 |

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

81. Regulations 35(3)(a) and 35(4) of the 2019 Tariff Regulations specify the norms for O&M Expenses for the transmission system and the same is as follows:

“(3) Transmission system: (a) The following normative operation and maintenance expenses shall be admissible for the transmission system:



| Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
|---|----------------|----------------|----------------|----------------|----------------|
| Norms for sub-station Bays (₹ Lakh per bay) | | | | | |
| 765 kv | 45.01 | 46.60 | 48.23 | 49.93 | 51.68 |
| 400 kv | 32.15 | 33.28 | 34.45 | 35.66 | 36.91 |
| 220 kv | 22.51 | 23.30 | 24.12 | 24.96 | 25.84 |
| 132 kv and below | 16.08 | 16.64 | 17.23 | 17.83 | 18.46 |
| Norms for Transformers (₹ Lakh per MVA) | | | | | |
| 765 kv | 0.491 | 0.508 | 0.526 | 0.545 | 0.564 |
| 400 kv | 0.358 | 0.371 | 0.384 | 0.398 | 0.411 |
| 220 kv | 0.245 | 0.254 | 0.263 | 0.272 | 0.282 |
| 132 kv and below | 0.245 | 0.254 | 0.263 | 0.272 | 0.282 |
| Norms for AC and HVDC lines (₹ lakh per km) | | | | | |
| Single Circuit (Bundled Conductor with six or more sub-conductors) | 0.881 | 0.912 | 0.944 | 0.977 | 1.011 |
| Single Circuit (Bundled conductor with four sub-conductors) | 0.755 | 0.781 | 0.809 | 0.837 | 0.867 |
| Single Circuit (Twin & Triple Conductor) | 0.503 | 0.521 | 0.539 | 0.558 | 0.578 |
| Single Circuit (Single Conductor) | 0.252 | 0.260 | 0.270 | 0.279 | 0.289 |
| Double Circuit (Bundled conductor with four or more sub-conductors) | 1.322 | 1.368 | 1.416 | 1.466 | 1.517 |
| Double Circuit (Twin & Triple Conductor) | 0.881 | 0.912 | 0.944 | 0.977 | 1.011 |
| Double Circuit (Single Conductor) | 0.377 | 0.391 | 0.404 | 0.419 | 0.433 |
| Multi Circuit (Bundled Conductor with four or more sub-conductor) | 2.319 | 2.401 | 2.485 | 2.572 | 2.662 |
| Multi Circuit (Twin & Triple Conductor) | 1.544 | 1.598 | 1.654 | 1.713 | 1.773 |
| Norms for HVDC stations | | | | | |
| HVDC Back-to-Back stations (Rs Lakh per 500 MW) (Except Gazuwaka BTB) | 834 | 864 | 894 | 925 | 958 |
| Gazuwaka HVDC Back-to-Back station (₹ Lakh per 500 MW) | 1,666 | 1,725 | 1,785 | 1,848 | 1,913 |
| 500 kV Rihand-Dadri HVDC bipole scheme (Rs Lakh) (1500 MW) | 2,252 | 2,331 | 2,413 | 2,498 | 2,586 |
| ±500 kV Talcher- Kolar HVDC bipole scheme (Rs Lakh) (2000 MW) | 2,468 | 2,555 | 2,645 | 2,738 | 2,834 |
| ±500 kV Bhiwadi-Balia HVDC bipole scheme (Rs Lakh) (2500 MW) | 1,696 | 1,756 | 1,817 | 1,881 | 1,947 |
| ±800 kV, Bishwanath-Agra HVDC bipole scheme (Rs Lakh) (3000 MW) | 2,563 | 2,653 | 2,746 | 2,842 | 2,942 |

Provided that the O&M expenses for the GIS bays shall be allowed as worked out by multiplying 0.70 of the O&M expenses of the normative O&M expenses for bays;



Provided further that:

- i. the operation and maintenance expenses for new HVDC bi-pole schemes commissioned after 1.4.2019 for a particular year shall be allowed pro-rata on the basis of normative rate of operation and maintenance expenses of similar HVDC bi-pole scheme for the corresponding year of the tariff period;
 - ii. the O&M expenses norms for HVDC bi-pole line shall be considered as Double Circuit quad AC line;
 - iii. the O&M expenses of ± 500 kV Mundra-Mohindergarh HVDC bipole scheme (2000 MW) shall be allowed as worked out by multiplying 0.80 of the normative O&M expenses for ± 500 kV Talchar-Kolar HVDC bi-pole scheme (2000 MW);
 - iv. the O&M expenses of ± 800 kV Champa-Kurukshetra HVDC bi-pole scheme (3000 MW) shall be on the basis of the normative O&M expenses for ± 800 kV, Bishwanath-Agra HVDC bi-pole scheme;
 - v. the O&M expenses of ± 800 kV, Alipurduar-Agra HVDC bi-pole scheme (3000 MW) shall be allowed as worked out by multiplying 0.80 of the normative O&M expenses for ± 800 kV, Bishwanath-Agra HVDC bi-pole scheme; and
 - vi. the O&M expenses of Static Synchronous Compensator and Static Var Compensator shall be worked at 1.5% of original project cost as on commercial operation which shall be escalated at the rate of 3.51% to work out the O&M expenses during the tariff period. The O&M expenses of Static Synchronous Compensator and Static Var Compensator, if required, may be reviewed after three years.
- (b) The total allowable operation and maintenance expenses for the transmission system shall be calculated by multiplying the number of sub-station bays, transformer capacity of the transformer (in MVA) and km of line length with the applicable norms for the operation and maintenance expenses per bay, per MVA and per km respectively.
- (c) The Security Expenses and Capital Spares for transmission system shall be allowed separately after prudence check:

Provided that the transmission licensee shall submit the assessment of the security requirement and estimated security expenses, the details of year-wise actual capital spares consumed at the time of truing up with appropriate justification.

(4) Communication system: The operation and maintenance expenses for the communication system shall be worked out at 2.0% of the original project cost related to such communication system. The transmission licensee shall submit the actual operation and maintenance expenses for truing up.”

82. The O&M Expenses claimed by the Petitioner in respect of the transmission asset are as follows:

| Particulars | (₹ in lakh) | | | | |
|----------------------------------|-------------|---------|---------|---------|---------|
| | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Transmission Line (in km) | | | | | |
| 400KV Talcher-Rengali I(KM) | 24.00 | 24.00 | 24.00 | 24.00 | 24.00 |



| | | | | | |
|---|---------------|---------------|---------------|---------------|---------------|
| 400KV Talcher-Rourkela I (KM) | 171.00 | 171.00 | 171.00 | 171.00 | 171.00 |
| Norms (₹ lakh/km) | 0.881 | 0.912 | 0.944 | 0.977 | 1.011 |
| O&M Transmission Line (₹ in lakh) | 160.75 | 166.40 | 172.25 | 178.30 | 184.55 |
| Sub-station Bays (Number) | | | | | |
| 400 kV Sub-station bays | 5 | 5 | 5 | 5 | 5 |
| Norms (₹ lakh/bay) | 32.15 | 33.28 | 34.45 | 35.66 | 36.91 |
| O&M Substation (₹ in lakh) | 171.80 | 177.84 | 184.08 | 190.52 | 197.15 |
| Communication system | | | | | |
| PLCC(₹ in lakh) | 73 | 73 | 73 | 73 | 73 |
| Norms (in %) | 2 | 2 | 2 | 2 | 2 |
| O&M communication system (₹ in lakh) | 1.46 | 1.46 | 1.46 | 1.46 | 1.46 |
| Total O&M (₹ in lakh) | 334.01 | 345.70 | 357.79 | 370.28 | 383.16 |

83. The Petitioner has claimed O&M Expenses separately for PLCC under Regulation 35(4) of the 2019 Tariff Regulations @2% of its original project cost in the instant petition. The Petitioner has made similar claim in other petitions as well. Though PLCC is a communication system, it has been considered as part of the sub-station in the 2014 Tariff Regulations and the 2019 Tariff Regulations and the norms for sub-station have been specified accordingly. Accordingly, the Commission vide order dated 24.1.2021 in Petition No.126/TT/2020 has already concluded that no separate O&M Expenses can be allowed for PLCC under Regulation 35(4) of the 2019 Tariff Regulations even though PLCC is a communication system. Therefore, the Petitioner's claim for separate O&M Expenses for PLCC @2% is not allowed.

84. The O&M Expenses allowed in respect of the transmission asset for 2019-24 tariff period are as follows:

| Particulars | (₹ in lakh) | | | | |
|--|---------------|---------------|---------------|---------------|---------------|
| | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Transmission Line (in km) | | | | | |
| 400KV Talcher-Rengali I | 24.00 | 24.00 | 24.00 | 24.00 | 24.00 |
| 400KV Talcher-Rourkela I | 171.00 | 171.00 | 171.00 | 171.00 | 171.00 |
| Norms (₹ lakh/km) | 0.881 | 0.912 | 0.944 | 0.977 | 1.011 |
| O&M Transmission Line (₹ in lakh) | 160.75 | 166.40 | 172.25 | 178.30 | 184.55 |



| Sub-station Bays (Number) | | | | | |
|---------------------------------------|---------------|---------------|---------------|---------------|---------------|
| 400 kV Sub-station bays | 5 | 5 | 5 | 5 | 5 |
| Norms (₹ lakh/bay) | 32.15 | 33.28 | 34.45 | 35.66 | 36.91 |
| O&M Substation (₹ in lakh) | 171.80 | 177.84 | 184.08 | 190.52 | 197.15 |
| | | | | | |
| Total O&M (₹ in lakh) | 332.55 | 344.24 | 356.33 | 368.82 | 381.70 |

Interest on Working Capital (“IWC”)

85. Regulations 34(1)(c), 34(3), 34(4) and 3(7) of the 2019 Tariff Regulations specify as follows:

“34. Interest on Working Capital

(1)...

(c) For Hydro Generating Station (including Pumped Storage Hydro Generating Station) and Transmission System:

- i. Receivables equivalent to 45 days of fixed cost;
- ii. Maintenance spares @ 15% of operation and maintenance expenses including security expenses; and
- iii. Operation and maintenance expenses, including security expenses for one month”

“(3)Rate of interest on working capital shall be on normative basis and shall be considered as the bank rate as on 1.4.2019 or as on 1st April of the year during the tariff period 2019-24 in which the generating station or a unit thereof or the transmission system including communication system or element thereof, as the case may be, is declared under commercial operation, whichever is later:

Provided that in case of truing-up, the rate of interest on working capital shall be considered at bank rate as on 1st April of each of the financial year during the tariff period 2019-24.

(4) Interest on working capital shall be payable on normative basis notwithstanding that the generating company or the transmission licensee has not taken loan for working capital from any outside agency.”

“3.Definitions ...

(7) ‘**Bank Rate**’ means the one year marginal cost of lending rate (MCLR) of the State Bank of India issued from time to time plus 350 basis points;”

86. The Petitioner has submitted that it has computed IWC for 2019-24 period considering the SBI Base Rate plus 350 basis points as on 1.4.2019. The Petitioner has considered the rate of interest on working capital as 12.05%. IWC is worked out in accordance with Regulation 34 of the 2019 Tariff Regulations. The Rate of Interest



(RoI) on working capital considered is 12.05% (SBI 1 year MCLR applicable as on 1.4.2019 of 8.55% plus 350 basis points) for 2019-20, 11.25% (SBI 1 year MCLR applicable as on 1.4.2020 of 7.75% plus 350 basis points) for 2020-21 and 10.50% (SBI 1 year MCLR applicable as on 1.4.2021 of 7.00% plus 350 basis points) for 2021-24. The components of the working capital and interest thereon allowed for the instant asset is as follows:

| Particulars | (₹ in lakh) | | | | |
|---|---------------|---------------|---------------|---------------|---------------|
| | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Working Capital for O&M Expenses (O&M Expenses for one Month) | 27.71 | 28.69 | 29.69 | 30.73 | 31.81 |
| Working Capital for Maintenance Spares (15% of O&M) | 49.88 | 51.64 | 53.45 | 55.32 | 57.25 |
| Working Capital for Receivables (Equivalent to 45 days of annual fixed cost/annual transmission charges) | 208.48 | 210.94 | 212.58 | 214.56 | 215.70 |
| Total Working Capital | 286.07 | 291.26 | 295.72 | 300.62 | 304.76 |
| Rate of Interest (in %) | 12.05 | 11.25 | 10.50 | 10.50 | 10.50 |
| Interest of working capital | 34.47 | 32.77 | 31.05 | 31.56 | 32.00 |

Annual Fixed Charges for the 2019-24 Tariff Period

87. The transmission charges allowed in respect of the transmission asset for the 2019-24 period are as follows:

| Particulars | (₹ in lakh) | | | | |
|-------------------------|----------------|----------------|----------------|----------------|----------------|
| | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
| Depreciation | 236.63 | 239.21 | 240.35 | 243.40 | 243.75 |
| Interest on Loan | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Return on Equity | 1091.99 | 1094.75 | 1096.51 | 1096.55 | 1096.91 |
| O & M Expenses | 332.55 | 344.24 | 356.33 | 368.82 | 381.70 |
| Int. on Working Capital | 34.47 | 32.77 | 31.05 | 31.56 | 32.00 |
| Total | 1695.64 | 1710.97 | 1724.24 | 1740.33 | 1754.36 |



Filing Fee and Publication Expenses

88. The Petitioner has sought reimbursement of fee paid by it for filing the petition and publication expenses. Regulation 70(1) of the 2019 Tariff Regulations provides for reimbursement of filing fees and publication fee paid by the Petitioner.

89. BSPHCL has submitted that grant of filing fee is the discretion of the Commission and the present case is not a fit case for grant of filing fee.

90. In response, the Petitioner has submitted that the Commission vide order dated 28.3.2016 in Petition No. 137/TT/2015 for determination of tariff for the 2014-19 tariff period allowed the recovery of petition filing fee and publication of notices from the beneficiaries on pro rata basis.

91. We have considered the submissions of the Petitioner and BSPHCL. The Petitioner is entitled to 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 Regulation 70(1) of the 2019 Tariff Regulations.

Licence Fee & RLDC Fees and Charges

92. The Petitioner has sought reimbursement of licence fee in accordance with Regulation 70(4) of the 2019 Tariff Regulations for 2019-24 period. The Petitioner has also sought reimbursement of RLDC fee and charges in accordance with Regulation 70(3) of the 2019 Tariff Regulations for 2019-24 tariff period. The Petitioner shall be entitled to Licence Fee and RLDC Fees and Charges in terms of 2019 Tariff Regulations.

Goods and Services Tax

93. The Petitioner has submitted that if GST is levied at any rate and at any point of time in future on charges of transmission of electricity, the same shall be borne and



additionally paid by the Respondent(s) to the Petitioner and the same shall be charged and billed separately by the Petitioner. Further additional taxes, if any, paid by the Petitioner on account of demand from Government/Statutory authorities, may be allowed to be recovered from the beneficiaries.

94. BSPHCL has submitted that the prayer for GST is premature.

95. In response, the Petitioner has reiterated its submissions. Further, if GST is levied at any rate and at any point of time in future on Charges of Transmission of Electricity, the same shall be borne and additionally paid by the respondent(s) to the petitioner and the same shall be charged & billed separately by the petitioner. Further additional taxes, if any, are to be paid by the petitioner on account of demand from Govt. / Statutory authorities, the same may be allowed to be recovered from the beneficiaries.

96. We have considered the submissions of the Petitioner and BSPHCL. Since GST is not levied on transmission service at present, we are of the view that Petitioner's prayer is premature.

Security Expenses

97. The Petitioner has submitted that security expenses in respect of the transmission asset are not claimed in the instant petition and it would file a separate petition for claiming the overall security expenses and the consequential IWC. The Petitioner has requested to consider the actual security expenses incurred during 2018-19 for claiming estimated security expenses for 2019-20 which shall be subject to true up at the end of the year based on the actuals. The Petitioner has submitted that similar petition for security expenses for 2020-21, 2021-22, 2022-23 and 2023-24



shall be filed on a yearly basis on the basis of the actual expenses of previous year subject to true up at the end of the year on actual expenses. The Petitioner has submitted that the difference, if any, between the estimated security expenses and actual security expenses as per the audited accounts may be allowed to be recovered from the beneficiaries on yearly basis.

98. We have considered the submissions of the Petitioner. The Petitioner has claimed consolidated security expenses on projected basis for 2019-24 tariff period on the basis of actual security expenses incurred in 2018-19 in Petition No. 260/MP/2020. The said petition has already been disposed of by the Commission vide order dated 3.8.2021. Therefore, the Petitioner's prayer in the instant petition for allowing it to file a separate petition for claiming the overall security expenses and consequential IWC has become infructuous.

Capital Spares

99. The Petitioner has sought reimbursement of capital spares at the end of tariff period. The Petitioner's claim, if any, shall be dealt with in accordance with the provisions of the 2019 Tariff Regulations.

Sharing of Transmission Charges

100. BSPHCL submitted that present consumers of the beneficiaries cannot be burdened with past charges. In response, the Petitioner has Submitted that transmission tariff for 2001-04 tariff period shall be recovered as per orders dated 06.08.2003 and 12.02.2008 in Petition No.17/2002; transmission tariff for 2004-09 tariff period shall be recovered as per orders dated 02.02.2006 and 31.03.2008 in Petition No.125/2004; and transmission tariff for 2009-14 tariff period shall be recovered as per order dated 26.11.2015 in Petition No.214/TT/2014.



101. We have considered the submissions of the Petitioner and BSPHCL. During the tariff periods 2001-04, 2004-09 and 2009-14 (up to 30.6.2011), the transmission charges for inter-State transmission systems were being shared in accordance with the Tariff Regulations for the respective tariff periods. With effect from 1.7.2011, sharing of transmission charges for inter-State transmission systems is governed by Central Electricity Regulatory Commission (Sharing of Transmission Charges and Losses) Regulations, 2010 and with effect from 1.11.2020, sharing is governed by Central Electricity Regulatory Commission (Sharing of Transmission Charges and Losses) Regulations, 2020 (the 2020 Sharing Regulations). Accordingly, the liabilities of the DICs for arrears of transmission charges determined through this order shall be computed DIC-wise in accordance with the provisions of respective Tariff Regulations and Sharing Regulations and shall be recovered from the concerned DICs through Bill 2 under Regulation 15(2)(b) of the 2020 Sharing Regulations. Billing, collection and disbursement of transmission charges for subsequent period shall be recovered in terms of the provisions of the 2020 Sharing Regulations as provided in Regulation 57 of the 2019 Tariff Regulations.

102. To summarise:

- a. The revised transmission charges approved for the transmission asset for 2001-04 tariff period in terms of the APTEL's judgments are as follows:

(₹ in lakh)

| Particulars | 2001-02 | 2002-03 | 2003-04 |
|----------------------|---------|---------|---------|
| Annual Fixed Charges | 2136.13 | 1994.67 | 1888.75 |

- b. The revised annual fixed charges approved in respect of the transmission asset for 2004-09 tariff period in terms of the APTEL's judgments are as follows:



(₹ in lakh)

| Particulars | 2004-05 | 2005-06 | 2006-07 | 2007-08 | 2008-09 |
|----------------------|---------|---------|---------|---------|---------|
| Annual Fixed Charges | 1541.59 | 1537.36 | 1533.81 | 1530.14 | 1527.64 |

c. The consequential revision of annual fixed charges approved in respect of the transmission asset for 2009-14 tariff period are as follows:

(₹ in lakh)

| Particulars | 2009-10 | 2010-11 | 2011-12 | 2012-13 | 2013-14 |
|----------------------|---------|---------|---------|---------|---------|
| Annual Fixed Charges | 1815.36 | 1863.87 | 1874.25 | 1884.84 | 1913.19 |

d. The trued-up annual fixed charges approved in respect of the transmission asset for 2014-19 tariff period are as follows:

(₹ in lakh)

| Particulars | 2014-15 | 2015-16 | 2016-17 | 2017-18 | 2018-19 |
|----------------------|---------|---------|---------|---------|---------|
| Annual Fixed Charges | 1870.75 | 1891.88 | 1907.74 | 1924.18 | 1944.29 |

e. The Annual Fixed Charges allowed in respect of the transmission asset for 2019-24 tariff period in this order are as follows:

(₹ in lakh)

| Particulars | 2019-20 | 2020-21 | 2021-22 | 2022-23 | 2023-24 |
|----------------------|---------|---------|---------|---------|---------|
| Annual Fixed Charges | 1695.64 | 1710.97 | 1724.24 | 1740.33 | 1754.36 |

103. This order disposes of Petition No. 213/TT/2020 in terms of the above discussions and findings.

sd/-
(P. K. Singh)
Member

sd/-
(Arun Goyal)
Member

sd/-
(I.S. Jha)
Member

