

**CENTRAL ELECTRICITY REGULATORY COMMISSION  
NEW DELHI**

**Coram**

1. Dr. Pramod Deo, Chairperson
2. Shri R. Krishnamoorthy, Member
3. Shri S.Jayaraman, Member
4. Shri V.S.Verma, Member

**Petition No. 88/2006**

**In the matter of**

Determination of transmission tariff for Augmentation Scheme in North Eastern Region for the period from 1.4.2004 to 31.3.2009.

**And in the matter of**

Power Grid Corporation of India Ltd.,Gurgaon .... **Petitioner**  
Vs

1. Assam State Electricity Board, Guwahati
2. Meghalaya State Electricity Board, Shillong
3. Government of Arunachal Pradesh, Itanagar
4. Power and Electricity Department, Govt. of Mizoram, Aizawl
5. Electricity Department, Govt. of Manipur, Imphal
6. Department of Power, Govt. of Nagaland, Kohima
7. Tripura State Electricity Corporation Limited, Agartala .....**Respondents**

**Following were present:**

1. Shri M.G.Ramachandran, Advocate, PGCIL
2. Shri U.K.Tyagi, PGCIL
3. Shri M.M.Mondal, PGCIL
4. Shri R.Prasad, PGCIL
5. Ms. Sangeeta Edwards, PGCIL
6. Shri Sanjay Sen, Advocate, ASEB
7. Shri H.M.Sharma,ASEB
8. Shri R.K.Kapoor, ASEB
9. Ms. Mallika Sharma Bezbaruah, Consumer,
10. Shri A.K. Datta, representative of Ms. Mallika Sharma Bezbaruah

**ORDER  
(DATE OF HEARING: 28.5.2009)**

The petitioner, Power Grid Corporation of India Limited, had filed this petition for approval of tariff for Augmentation Scheme (the transmission scheme) in North Eastern Region for the period from 1.4.2004 to 31.3.2009, based on the Central Electricity

Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2004, (hereinafter referred to as “the 2004 regulations”) after accounting for additional capitalization of Rs. 804.30 lakh on works during 1999-2000 to 2005-06 and Rs. 172.91 lakh on account of FERV for the period ending 31.3.2004. On completion of pleadings and after hearing the parties, final tariff in respect of the transmission system was awarded vide order dated 13.2.2008 for the period 1.4.2007 to 31.3.2009. The summary of tariff awarded vide said order dated 13.2.2008 is given as under:

(Rs. in lakh)

	<b>2007-08</b>	<b>2008-09</b>
Depreciation	376.84	376.84
Interest on Loan	587.81	587.81
Return on Equity	339.04	339.04
Advance against Depreciation	0.00	0.00
Interest on Working Capital	60.07	61.43
O & M Expenses	693.13	721.33
<b>Total</b>	<b>2056.89</b>	<b>2055.69</b>

2. The petitioner filed Appeal No. 80/2008 before the Appellate Tribunal for Electricity against order dated 13.2.2008. The Appellate Tribunal vide its judgment dated 4.11.2008 set aside the said order dated 13.2.2008 and directed to re-determine the transmission tariff for the period from 1.4.2004 in accordance with the 2004 regulations.

3. In view of the decision of the Appellate Tribunal, the petition was re-heard.

4. The investment approval for Revised Cost Estimate-II for the transmission scheme was accorded by the Board of Directors of the petitioner company under its letter dated 24.4.2006 at an estimated cost of Rs. 13391 lakh, which includes IDC of Rs.1208 lakh. The transmission scheme was declared under commercial operation on 1.2.2000.

### **CAPITAL COST**

5. As per clause (1) of Regulation 52 of the 2004 regulations, subject to prudence check, the actual expenditure incurred on completion of the project shall form the basis

for determination of final tariff. The final tariff shall be determined based on the admitted capital expenditure actually incurred up to the date of commercial operation of the transmission system and shall include capitalised initial spares subject to a ceiling norm as 1.5% of original project cost. The regulation is applicable in case of the transmission system declared under commercial operation on or after 1.4.2004.

6. The petitioner has considered the capital expenditure of Rs.12523.11 lakh as on 1.4.2004 after accounting for additional capitalization of Rs. 308.11 lakh on works for the period from 1.2.2000 to 31.3.2004 over the capital expenditure of Rs.12215.00 lakh as on the date of commercial operation. The petitioner has also considered capital expenditure of Rs. 220.03 lakh and Rs. 276.16 lakh from 1.4.2004 to 31.3.2005 and 1.4.2005 to 31.3.2006 respectively. The petitioner has also considered Rs. 172.91 lakh on account of FERV for the period from 2001-04.

**Additional capitalization -1999-2000 to 2005-06**

7. The details submitted by the petitioner in support of its additional capital expenditure are given hereunder:

Year	Amount (Rs. in lakh)	Head of expenditure
1999-01	(-) 101.20	Land = Rs. 2.37 lakh Buildings = Rs. 67.38 lakh Transmission line = Rs. (-) 2.74 lakh Sub-station = Rs. (-) 152.93 lakh PLCC = Rs. (-) 15.28 lakh
2001-04	409.31	Land = Rs. (-) 27.37 lakh Buildings = Rs. 210.98 lakh Transmission line = Rs. 130.88 lakh Sub-station = Rs.101.50 lakh PLCC = Rs. (-) 6.68 lakh
2004-05	220.03	Buildings = Rs. 387.82 lakh Transmission line = Rs. (-) 165.6 lakh Sub-station = Rs. (-) 2.15 lakh

2005-06	276.16	Buildings = Rs. 253.79 lakh
		Transmission line = Rs. (-) 1.66 lakh
		Sub-station = Rs. 24.03 lakh
<b>Total</b>	<b>804.30</b>	

8. The petitioner vide its affidavit dated 12.3.2007 has clarified that as per original approval dated 31.3.1995, the provision of Rs. 474 lakh (excluding IDC and IEDC) was kept against civil works (infrastructure building and colony). Subsequently, in the Revised Cost Estimate-II, the provision for the same was kept at Rs. 999 lakh. It has been stated the expenditure towards building and civil works was delayed because of slow progress of civil works of colony. All the work sites under the transmission scheme are stated to be located in remote troubled /insurgency prone and hilly areas which are not well connected by roads and the working hours were restricted requiring additional manpower. Further, according to the petitioner, long spells of rains reduce the available working days. The petitioner has further clarified that the additional capital expenditure is part of the original scope of work.

9. The claims for additional capitalization of Rs. 308.11 lakh for period up to 31.3.2004, Rs. 220.03 lakh for the year 2004-05 and Rs. 276.16 lakh for the year 2005-06 are within the original scope of work, and are found to be in order for capitalization. Accordingly, total additional expenditure of Rs. 804.30 lakh has been allowed to be capitalized.

10. Learned counsel for the ASEB submitted that the petition had not been filed as per the 2004 regulations. It was pointed out that the Commission vide its order dated 2.1.2007 had directed the petitioner to submit the Forms 5B, 5C and 5D, duly completed in all respects. He further submitted that information had not been furnished.

11. The representative of ASEB, Shri Sharma submitted that 33 kV distribution feeders were additionally included by the petitioner to claim tariff, though as per the Grid

Code specified by the Commission, such distribution feeders were not to be included for the purpose of the transmission tariff. He further submitted that certain costs capitalized, had not been actually incurred. He requested the Commission to look into the cost escalation aspects as well.

12. Contradicting the petitioner's submission that it had not actually recovered cumulative depreciation considered in the earlier order, the representative of Tripura stated that the petitioner had recovered the entire depreciation. According to him, UCPTT, which was in vogue up to 31.3.2004, resulted in increase in energy transmitted and consequently in increase in revenue, this also led to recovery of entire depreciation. He also raised the issue of inclusion of 33 kV bays for tariff computation and further submitted that the petitioner should furnish the information in Forms 5B, 5C and 5D before the process of tariff determination was undertaken by the Commission.

13. The representative of the consumer, Ms. Mallika Sharma Bezbaruah submitted that she was not made a party before the Appellate Tribunal by the petitioner. He requested to direct the petitioner to submit the information in Forms 5B, 5C and 5D.

14. In response to the respondents' submissions, the representative of the petitioner submitted that none of them had challenged the Commission's order dated 31.12.2007 on above grounds. Aggrieved with the Commission's orders, the petitioner had filed the appeal before the Appellate Tribunal. There was, therefore, no ground for raising these issues at this stage, he argued. The representative of the petitioner propounded that the petitioner had filed the tariff petitions as per the regulations 2004 and the information as per Forms 5B, 5C and 5D, introduced in the regulations was to be furnished for the projects commissioned on or after 1.4.2004. Therefore, these Forms were not furnished with the petitions, he explained. These Forms had been furnished for the assets declared under commercial operation on or after 1.4.2004, he informed. The representative of the petitioner further submitted that there were a number of assets on

which expenditure was incurred after the date of the commercial operation and for such assets the petitioner had submitted the auditor's certificates. It was stated that NERPC had agreed to capitalization of certain expenditure. He further submitted that the petitioner took over the transmission network from NTPC, NHPC, NLC and NEEPCO w.e.f 1.1.1992 which included 33 kV transmission lines in NER. In NER, the transmission lines were of 132 kV level and outgoing feeders were of 33 kV level with 132/33 kV ICTs. These transmission lines were being used for evacuation of Central Sector power. Thus, 33 kV transmission lines were also included for O&M purpose.

15. The representative of the petitioner further stated that the Commission had approved tariff from 1.4.2007 based on certain capital cost. At this stage, there could be no question of going back on capital cost and that what was true for 1.4.2007, is also true for 1.4.2004.

16. The tariff for the transmission system for the period from 1.4.2004 to 31.3.2009 has been recalculated as discussed in the succeeding paras, after taking into account the submission made by the parties at the hearing. We have generally accepted the submissions made by the petitioner.

**Extra Rupee Liability during the years 2001-04:**

17. Regulation 1.13 of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2001 provided as under:

“(a) Extra rupee liability towards interest payment and loan repayment actually incurred, in the relevant year shall be admissible; provided it directly arises out of foreign exchange rate variation and is not attributable to Utility or its suppliers or contractors. Every utility shall follow the method as per the Accounting Standard-11 (Eleven) as issued by the Institute of Chartered Accountants of India to calculate the impact of exchange rate variation on loan repayment

(b) Any foreign exchange rate variation to the extent of the dividend paid out on the permissible equity contributed in foreign currency, subject to the ceiling of permissible return shall be admissible. This as and when paid, may be spread over the twelve-month period in arrears.”

18. As already noted, the petitioner has claimed additional capitalization of Rs. 172.91 lakh on account of FERV for the period up to 31.3.2004. We find that the petitioner's claim in this regard is based on the terms and conditions of tariff applicable during 2001-04, reproduced above. FERV worked out by the petitioner is matching with calculations submitted and is in accordance with provisions of AS-11, applicable for the period up to 31.3.2004. The petitioner's claim on account of FERV has been admitted for tariff computation.

### **TOTAL CAPITAL COST**

19. Against the above background, the gross block of Rs. 12696.02 lakh as on 1.4.2004 has been worked out for the purpose of tariff based on the gross block of Rs. 12215 lakh as on the date of commercial operation after accounting for additional capitalization of Rs. 308.11 lakh on works and Rs. 172.91 lakh on account of FERV. The additional capital expenditure of Rs. 220.03 lakh during 2004-05 and Rs. 276.16 lakh during 2005-06 has also been considered for the purpose of tariff.

### **DEBT- EQUITY RATIO**

20. Clause (1) of Regulation 54 of the 2004 regulations *inter alia* provides that,-

“(1) In case of the existing projects, debt–equity ratio Considered by the Commission for fixation of tariff for the period ending 31.3.2004 shall be considered for determination of tariff with effect from 01.04.2004:

Provided that in cases where the tariff for the period ending 31.3.2004 has not been determined by the Commission, debt-equity ratio shall be as may be decided by the Commission:

Provided further that in case of the existing projects where additional capitalisation has been completed on or after 1.4.2004 and admitted by the Commission under Regulation 53, equity in the additional capitalisation to be considered shall be :-

- (a) 30% of the additional capital expenditure admitted by the Commission, or
- (b) equity approved by the competent authority in the financial package, for additional capitalisation, or

(c) actual equity employed,

whichever is the least:

Provided further that in case of additional expenditure admitted under the second proviso, the Commission may considered equity of more than 30% if the transmission licensee is able to satisfy the Commission that deployment of such equity of more than 30% was in the interest of general public.”

21. The Note 1 below Regulations 53 lays down that any expenditure on account of committed liabilities with the original scope of work is to be serviced in the normative debt-equity ratio specified in Regulation 54.

22. The petitioner has considered debt-equity ratio of 85:15 as per financial package as on the date of commercial operation. As the petitioner has not indicated the year-wise segregation of additional capital expenditure for the period from the date of the commercial operation to 31.3.2001, it has been considered that the additional capital expenditure has been incurred during 2000-01 and segregated in the debt-equity ratio of 85:15, as on the date of commercial operation. The additional capitalization on works for the period 2001-04 has been added to equity portion. Additional capital expenditure during 2004-09 has been segregated in the debt-equity ratio of 70:30. In view of the judgment dated 4.10.2006 in Appeals No. 135 to 140 of 2005 of the Appellate Tribunal for Electricity, the entire amount of FERV of Rs.172.91 lakh has been considered against loan. Accordingly, for the purpose of tariff, equity considered for the transmission scheme as under:

(Rs. in lakh)

Equity as on 1.4.2004	Notional equity due to additional capital expenditure during 2004-05	Average equity during 2004-05	Capital cost as on 1.4.2004	Notional equity due to additional capital expenditure during 2005-06	Average equity during 2005-06	Capital cost as on 1.4.2006	Equity considered as on 1.4.2006 and onwards
2272.89	66.01	2305.90	12696.02	82.85	2380.33	13192.21	2421.75



## **RETURN ON EQUITY**

23. As per clause (iii) of Regulation 56 of the 2004 regulations, return on equity shall be computed on the equity base determined in accordance with regulation 54 @ 14% per annum. Equity invested in foreign currency is to be allowed a return in the same currency and the payment on this account is made in Indian Rupees based on the exchange rate prevailing on the due date of billing.

24. For the reasons already recorded, equity as given the table under para 22 above has been considered. Accordingly, return on equity allowed each year is given as under:

(Rs. in lakh)

Return on equity				
2004-05	2005-06	2006-07	2007-08	2008-09
322.83	333.25	339.04	339.04	339.04

## **INTEREST ON LOAN**

25. Clause (i) of regulation 56 of the 2004 regulations *inter alia* provides that,-

“(a) Interest on loan capital shall be computed loan wise on the loans arrived at in the manner indicated in regulation 54.

(b) The loan outstanding as on 1.4.2004 shall be worked out as the gross loan in accordance with Regulation 54 minus cumulative repayment as admitted by the Commission or any other authority having power to do so, up to 31.3.2004. The repayment for the period 2004-09 shall be worked out on a normative basis.

(c) The transmission licensee shall make every effort to re-finance the loan as long as it results in net benefit to the beneficiaries. The costs associated with such re-financing shall be borne by the beneficiaries.

(d) The changes to the loan terms and conditions shall be reflected from the date of such re-financing and benefit passed on to the beneficiaries.

(e) In case of dispute, any of the parties may approach the Commission with proper application. However, the beneficiaries shall not withhold any payment ordered by the Commission to the transmission licensee during pendency of any dispute relating to re-financing of loan;

(f) In case any moratorium period is availed of by the transmission licensee, depreciation provided for in the tariff during the years of moratorium shall be treated as repayment during those years and interest on loan capital shall be calculated accordingly.

(g) The transmission licensee shall not make any profit on account of re-financing of loan and interest on loan;

(h) The transmission licensee may, at its discretion, swap loans having floating rate of interest with loans having fixed rate of interest, or vice versa, at its own cost and gains or losses as a result of such swapping shall accrue to the transmission licensee:

Provided that the beneficiaries shall be liable to pay interest for the loans initially contracted, whether on floating or fixed rate of interest.”

26. In our calculation, the interest on loan has been worked out as detailed below:

(i) Gross amount of loan, repayment of instalments and rate of interest has been considered as per the petition. In case of PNB –I, Corporation Bank and ADB-I loans having floating rate of interest, applicable rate of interest as on 1.4.2004 have been considered. These inputs have been used to work out weighted average rate of interest on actual loan.

(ii) Notional loan corresponding to additional capitalisation from date of commercial operation to 31.3.2004 has been added to the loan amount as on the date of commercial operation to arrive at total notional loan. This adjusted gross loan has been considered as normative loan for tariff calculation.

(iii) Tariff has been worked out considering normative loan and normative repayments. Normative repayments are worked out by the following formula :

$$\frac{\text{Actual repayment of actual loan during the year}}{\text{Opening balance of actual loan during the year}} \times \text{Opening balance of normative loan during the year}$$

(iv) Weighted average rate of interest on actual loan worked out as per (i) above has been applied on the average loan during the year to arrive at the interest on loan.

- (v) In case of ADB-I loan, the repayment instalments as per the revised amortization schedule of the ADB-I loan agreement has been referred to.

27. Based on above, revised year-wise interest on loan has been worked out as under:

Details	(Rs. in lakh)				
	2004-05	2005-06	2006-07	2007-08	2008-09
Opening Normative Gross Loan	10423.13	10577.15	10770.46	10770.46	10770.46
Cumulative Repayment up to Previous Year	1535.13	2098.85	2718.10	3403.50	4145.04
Net Loan-Opening	8888.00	8478.29	8052.36	7366.96	6625.42
Addition due to additional capitalization	154.02	193.31	-	-	-
Repayment during the year	563.73	619.24	685.40	741.54	746.02
Net Loan-Closing	8478.29	8052.36	7366.96	6625.42	5879.40
Average Loan	8683.15	8265.33	7709.66	6996.19	6252.41
Weighted Average Rate of Interest on Loan	7.71%	7.67%	7.63%	7.58%	7.55%
Interest	<b>669.34</b>	<b>634.17</b>	<b>588.39</b>	<b>530.60</b>	<b>472.29</b>

28. The detailed calculations in support of the weighted revised average rate of interest are contained in Annexure attached.

### **DEPRECIATION**

29. Sub-clause (a) of clause (ii) of Regulation 56 of the 2004 regulations provides for computation of depreciation in the following manner, namely:

(a) The value base for the purpose of depreciation shall be the historical cost of the asset.

(b) Depreciation shall be calculated annually based on straight line method over the useful life of the asset and at the rates prescribed in Appendix II to these regulations. The residual value of the asset shall be considered as 10% and depreciation shall be allowed up to maximum of 90% of the historical capital cost of the asset. Land is not a depreciable asset and its cost shall be excluded from the capital cost while computing 90% of the historical cost of the asset. The historical capital cost of the asset shall include additional capitalisation on

account of Foreign Exchange Rate Variation up to 31.3.2004 already allowed by the Central Government/Commission.

(c) On repayment of entire loan, the remaining depreciable value shall be spread over the balance useful life of the asset.

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

30. In our calculations, the depreciation has been considered as under:

(a) Cumulative depreciation from the date of commercial operation to 31.3.2004 has been worked out with applicable depreciation rates.

(b) The petitioner has claimed FERV amounting to Rs. 172.91 lakh for the period from the date of commercial operation to 31.3.2004. This has been added to the capital cost to arrive at the cost as on 1.4.2004 for the purpose of tariff and depreciation.

(c) Depreciation for the period 2004-05 onwards has been considered on the capital expenditure as per para 1 above.

31. Depreciation allowed has been worked out as below:

	(Rs. in lakh)				
	2004-05	2005-06	2006-07	2007-08	2008-09
Gross block as on 31 <sup>st</sup> March of the year	12916.05	13192.21	13192.21	13192.21	13192.21
Rate of Depreciation	2.89%	2.87%	2.86%	2.86%	2.86%
Depreciable Value	11461.96	11685.25	11809.52	11809.52	11809.52
Balance Useful life of the asset	-	-	-	-	-
Remaining Depreciable Value	9507.60	9360.76	9091.42	8406.02	7664.48
Depreciation	370.12	374.14	376.84	376.84	376.84
Cumulative Depreciation	<b>2324.49</b>	<b>2718.10</b>	<b>3403.50</b>	<b>4145.04</b>	<b>4891.06</b>

## **ADVANCE AGAINST DEPRECIATION**

32. As per sub-clause (b) of clause (ii) of Regulation 56 of the 2004 regulations, in addition to allowable depreciation, the transmission licensee is entitled to Advance Against Depreciation, computed in the manner given hereunder:

AAD = Loan repayment amount as per regulation 56 (i) subject to a ceiling of 1/10th of loan amount as per regulation 54 minus depreciation as per schedule

33. It is provided that Advance Against Depreciation shall be permitted only if the cumulative repayment up to a particular year exceeds the cumulative depreciation up to that year. It is further provided that Advance Against Depreciation in a year shall be restricted to the extent of difference between cumulative repayment and cumulative depreciation up to that year.

34. Accordingly, in our calculation the Advance Against Depreciation has been worked as detailed below:

(a) 1/10th of gross loan is worked out from the Gross Notional Loan as per para 27 above.

(b) Repayment of notional loan during the year is considered as per para 27 above.

(c) Depreciation is worked out as per para 31 above.

(d) In the calculation of Advance Against Depreciation, cumulative depreciation/Advance Against Depreciation up to the preceding year along with the depreciation of the current year have been considered.

35. Details of Advance Against Depreciation allowed are given hereunder:

(Rs. in lakh)

	2004-05	2005-06	2006-07	2007-08	2008-09
1/10th of Gross Loan(s)	1042.31	1057.71	1077.05	1077.05	1077.05
Repayment of the Loan	563.73	619.24	685.40	741.54	746.02
Minimum of the above	563.73	619.24	685.40	741.54	746.02
Depreciation during the year	370.12	374.14	376.84	376.84	376.84
(A) Difference	193.60	245.10	308.56	364.71	369.19
Cumulative Repayment of the Loan	2098.85	2718.10	3403.50	4145.04	4891.06
Cumulative Depreciation/ Advance against Depreciation	2324.49	2698.63	3094.93	3780.33	4521.87
(B) Difference	-225.63	19.47	308.56	364.71	369.19
Advance against Depreciation Minimum of (A) and (B)	<b>0.00</b>	<b>19.47</b>	<b>308.56</b>	<b>364.71</b>	<b>369.19</b>

### **OPERATION & MAINTENANCE EXPENSES**

36. In accordance with clause (iv) of Regulation 56 the 2004 regulations, the following norms are prescribed for O & M expenses

	Year				
	2004-05	2005-06	2006-07	2007-08	2008-09
O&M expenses (Rs in lakh per ckt-km)	0.227	0.236	0.246	0.255	0.266
O&M expenses (Rs in lakh per bay)	28.12	29.25	30.42	31.63	32.90

37. The petitioner has claimed O & M expenses for 485.45 ckt km and 18 bays which has been allowed. Accordingly, the petitioner's entitlement to O & M expenses has been worked out as given hereunder:

	Year				
	2004-05	2005-06	2006-07	2007-08	2008-09
O&M expenses for 485.45 ckt kms line length	110.20	114.57	119.42	123.79	129.13
O&M expenses for 18 bays	506.16	526.50	547.56	569.34	592.20
<b>Total</b>	<b>616.36</b>	<b>641.07</b>	<b>666.98</b>	<b>693.13</b>	<b>721.33</b>

### **INTEREST ON WORKING CAPITAL**

38. The components of the working capital and the interest thereon are discussed hereunder:

**(i) Maintenance spares**

Regulation 56(v)(1)(b) of the 2004 regulations provides for maintenance spares @ 1% of the historical cost escalated @ 6% per annum from the date of commercial operation. In the present case, the capital expenditure on the date of commercial operation is Rs. 12215.00 lakh, which has been considered as the

historical cost for the purpose of the present petition and maintenance spares have been worked out accordingly by escalating 1% of the historical cost @ 6% per annum. In this manner, the value of maintenance spares works out to Rs. 155.75 lakh as on 1.4.2004.

**(ii) O & M expenses**

Regulation 56(v)(1)(a) of the 2004 regulations provides for operation and maintenance expenses for one month as a component of working capital. The petitioner has claimed O&M expenses for 1 month of the respective year in the petition. This has been considered in the working capital.

**(iii) Receivables**

As per Regulation 56(v)(1)(c) of the 2004 regulations, receivables will be equivalent to two months average billing calculated on target availability level. The petitioner has claimed the receivables on the basis of 2 months' transmission charges. In the tariff being allowed, receivables have been worked out on the basis 2 months' transmission charges.

**(iv) Rate of interest on working capital**

As per Regulation 56(v)(2) of the 2004 regulations, rate of interest on working capital shall be on normative basis and shall be equal to the short-term Prime Lending Rate of State Bank of India as on 1.4.2004 or on 1st April of the year in which the project or part thereof (as the case may be) is declared under commercial operation, whichever is later. The interest on working capital is payable on normative basis notwithstanding that the transmission licensee has not taken working capital loan from any outside agency. The petitioner has claimed interest on working capital @ 10.25% based on SBI PLR as on 1.4.2004, which is in accordance with the 2004 regulations and has been allowed.

39. The necessary computations in support of interest on working capital are appended hereinbelow.

(Rs. in lakh)

	2004-05	2005-06	2006-07	2007-08	2008-09
Maintenance Spares	155.75	165.10	175.00	185.51	196.64
O & M expenses	51.36	53.42	55.58	57.76	60.11
Receivables	339.10	343.28	390.58	394.96	390.84
Total	546.22	561.80	621.17	638.22	647.59
Rate of Interest	10.25%	10.25%	10.25%	10.25%	10.25%
<b>Interest</b>	<b>55.99</b>	<b>57.58</b>	<b>63.67</b>	<b>65.42</b>	<b>66.38</b>

### **TRANSMISSION CHARGES**

40. The transmission charges being allowed for the transmission scheme are summarised below:

(Rs. In lakh)

	2004-05	2005-06	2006-07	2007-08	2008-09
Depreciation	370.12	374.14	376.84	376.84	376.84
Interest on Loan	669.34	634.17	588.39	530.60	472.29
Return on Equity	322.83	333.25	339.04	339.04	339.04
Advance against Depreciation	0.00	19.47	308.56	364.71	369.19
Interest on Working Capital	55.99	57.58	63.67	65.42	66.38
O & M Expenses	616.36	641.07	666.98	693.13	721.33
<b>Total</b>	<b>2034.63</b>	<b>2059.67</b>	<b>2343.49</b>	<b>2369.73</b>	<b>2345.06</b>

41. The petitioner has been paid UCPTT for the period up to 31.3.2007 based on various order of the Commission, and thereafter the transmission charges in accordance with the order dated 13.2.2008. The petitioner shall recover from the beneficiaries the additional transmission charges in three monthly instalments. The petitioner has also sought reimbursement of filing fee paid. The Commission by its separate general order dated 11.9.2008 in Petition No. 129/2005 has decided that the petitioner shall not be allowed reimbursement of the petition filing fee.



42. In addition to the transmission charges, the petitioner shall be entitled to other charges like income-tax, incentive, surcharge and other cess and taxes in accordance with the 2004 regulations.

43. This order disposes of Petition No.88/2006.

Sd/-	sd/-	sd/-	sd/-
<b>(V.S.VERMA)</b>	<b>(S.JAYARAMAN)</b>	<b>(R.KRISHNAMOORTHY)</b>	<b>(DR.PRAMOD DEO)</b>
<b>MEMBER</b>	<b>MEMBER</b>	<b>MEMBER</b>	<b>CHAIRPERSON</b>

New Delhi dated the 21<sup>st</sup> August 2009

## Annexure

Details of calculations in support of the weighted revised average rate of interest.

	Details of Loan	2004-05	2005-06	2006-07	2007-08	2008-09
1	<b>Bond-VII</b>					
	Gross Loan- Opening	275.00	275.00	275.00	275.00	275.00
	Cum Repayment up to DOCO/Previous year	55.00	110.00	165.00	220.00	275.00
	Net Loan-Opening	220.00	165.00	110.00	55.00	0.00
	Repayment during the year	55.00	55.00	55.00	55.00	0.00
	Net Loan-Closing	165.00	110.00	55.00	0.00	0.00
	Average Loan	192.50	137.50	82.50	27.50	0.00
	Rate of Interest	13.64%	13.64%	13.64%	13.64%	13.64%
	Interest	26.26	18.76	11.25	3.75	0.00
	Rep Schedule	Annual instalments from 4. 8.2003				
2	<b>PNB-I</b>					
	Gross Loan- Opening	275.00	275.00	275.00	275.00	275.00
	Cum Repayment up to DOCO/Previous year	27.50	55.00	82.50	110.00	137.50
	Net Loan-Opening	247.50	220.00	192.50	165.00	137.50
	Repayment during the year	27.50	27.50	27.50	27.50	27.50
	Net Loan-Closing	220.00	192.50	165.00	137.50	110.00
	Average Loan	233.75	206.25	178.75	151.25	123.75
	Rate of Interest	8.66%	8.66%	8.66%	8.66%	8.66%
	Interest	20.24	17.86	15.48	13.10	10.72
	Rep Schedule	Annual instalments from 30. 3.2004				
3	<b>Bond- XIII- II</b>					
	Gross Loan- Opening	213.00	213.00	213.00	213.00	213.00
	Cum Repayment up to DOCO/Previous year	35.50	71.00	106.50	142.00	177.50
	Net Loan-Opening	177.50	142.00	106.50	71.00	35.50
	Repayment during the year	35.50	35.50	35.50	35.50	35.50
	Net Loan-Closing	142.00	106.50	71.00	35.50	0.00
	Average Loan	159.75	124.25	88.75	53.25	17.75
	Rate of Interest	7.85%	7.85%	7.85%	7.85%	7.85%
	Interest	12.54	9.75	6.97	4.18	1.39
	Rep Schedule	Annual instalments from 31. 7.2003				
4	<b>Corporation Bank</b>					
	Gross Loan- Opening	138.00	138.00	138.00	138.00	138.00
	Cum Repayment up to DOCO/Previous year	6.90	20.70	34.50	48.30	62.10
	Net Loan-Opening	131.10	117.30	103.50	89.70	75.90
	Repayment during the year	13.80	13.80	13.80	13.80	13.80
	Net Loan-Closing	117.30	103.50	89.70	75.90	62.10
	Average Loan	124.20	110.40	96.60	82.80	69.00
	Rate of Interest	9.15%	9.15%	9.15%	9.15%	9.15%
	Interest	11.36	10.10	8.84	7.58	6.31
	Rep Schedule	Annual instalments from 10. 3.2004				
5	<b>ADB-I</b>					
	Gross Loan- Opening	9434.85	9434.85	9434.85	9434.85	9434.85
	Cum Repayment up to DOCO/Previous year	1397.37	1828.99	2304.85	2829.48	3407.88

Net Loan-Opening	8107.00	7675.38	7199.52	6674.89	6096.49
Repayment during the year	431.61	475.86	524.63	578.40	637.69
Net Loan-Closing	7675.38	7199.52	6674.89	6096.49	5458.80
Average Loan	7891.19	7437.45	6937.21	6385.69	5777.65
Rate of Interest	7.51%	7.51%	7.51%	7.51%	7.51%
Interest	592.63	558.55	520.98	479.57	433.90
Rep Schedule	Half yearly instalments from 1. 6.2000				
<b>Total Loan</b>					
Gross Loan- Opening	10335.85	10335.85	10335.85	10335.85	10335.85
Cum Repayment up to DOCO/Previous year	1522.27	2085.69	2693.35	3349.78	4059.98
Net Loan-Opening	8883.10	8319.68	7712.02	7055.59	6345.39
Repayment during the year	563.41	607.66	656.43	710.20	714.49
Net Loan-Closing	8319.68	7712.02	7055.59	6345.39	5630.90
Average Loan	8601.39	8015.85	7383.81	6700.49	5988.15
Rate of Interest	7.71%	7.67%	7.63%	7.58%	7.55%
<b>Interest</b>	<b>663.03</b>	<b>615.02</b>	<b>563.52</b>	<b>508.17</b>	<b>452.32</b>