

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Petition No. 211/2009

Coram:

- 1. Dr. Pramod Deo, Chairperson**
- 2. Shri S. Jayaraman, Member**
- 3. Shri V.S.Verma, Member**

DATE OF HEARING: 18.2.2010

DATE OF ORDER: 17.5.2010

In the matter of

Approval of two-part tariff for Ranganadi Hydro Electric Project (3 x 135 MW) for the period from 1.4.2004 to 31.3.2009 after inclusion of actual additional capital expenditure and application of actual interest rates incurred on the syndicated loan for the period 1.4.2006 to 31.3.2009.

And in the matter of

North Eastern Electric Power Corporation Ltd, Shillong

..... **Petitioner**

Vs

1. Assam State Electricity Board, Guwahati
2. Meghalaya State Electricity Board, Shillong
3. Department of Power, Govt. of Arunachal Pradesh, Itanagar
4. Electricity Deptt, Govt. of Manipur, Imphal
5. Power and Electricity Department, Govt. of Mizoram, Aizawl
6. Department of Power, Govt. of Nagaland, Kohima
7. Tripura State Electricity Corporation Ltd, Agartala
8. North Eastern Regional Power Committee, Shillong
9. North Eastern Regional Load Despatch Centre, Shillong

.....**Respondents**

The following were present:

1. Shri P. K. Borah, NEEPCO
2. Shri Rana Bose, NEEPCO
3. Shri A.K.Jain, NERPC

ORDER

The petitioner has filed this petition for revision of tariff in respect of Ranganadi Hydro Electric Project (3 x 135 MW) (hereinafter referred to as "the generating station") after inclusion of actual additional capital expenditure and

application of actual interest rates incurred on the syndicated loan for the period 1.4.2006 to 31.3.2009, in accordance with the provisions of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2004 (hereinafter referred to as "the 2004 regulations"). The petitioner has made the following specific prayers:

(a) Allow the additional capital expenditure capitalized during the period 1.4.2006 to 31.3.2009 ;

(b) Allow the actual interest rates incurred on the syndicated loan during the period 1.4.2006 to 31.3.2009;

(c) Allow the petitioner to recover from the beneficiaries the relevant components of annual fixed charges arising from such additional capital expenditure and application of actual interest rates incurred on the syndicated loan;

(d) Allow reimbursement of filing fee by the beneficiaries to the petitioner; and

(e) Pass any such order or orders as the Hon'ble Commission may deem just and proper in the circumstances of the case.

2. The tariff for the generating station for the period from 1.4.2004 to 31.3.2009 along with additional capitalization/de-capitalization during the years 2004-05 and 2005-06, based on the capital cost of Rs.145545 lakh as on 31.3.2006, was determined by the Commission vide its order dated 30.4.2008 in Petition No.89/2007. The annual fixed charges approved by the Commission by order dated 30.4.2008 is as under:

(Rs in lakh)					
Annual Fixed Charges	2004-05	2005-06	2006-07	2007-08	2008-09
Interest on Loan	5931.08	4586.82	3614.88	2823.09	2245.41
Interest on Working Capital	629.93	619.08	615.10	614.97	574.00
Depreciation	3475.60	3477.44	3477.44	3477.44	3477.44
Advance Against Depreciation	3793.97	3802.88	3802.88	3802.88	1198.11
Return on Equity	10180.62	10183.85	10183.85	10183.85	10183.85
O & M Expenses	2275.00	2366.00	2461.00	2560.00	2662.00
TOTAL	26286.20	25036.07	24155.15	23462.24	20340.81

3. None of the respondents has filed reply to the petition.

Additional capitalization

4. Clauses (2) of Regulation 34 of the 2004 regulations provides for considering the additional capital expenditure for tariff as under:

"(2) Subject to the provisions of clause (3) of this regulation, the capital expenditure of the following nature actually incurred after cut-off date may be admitted by the commission, subject to prudence check:

- (i) Deferred liabilities relating to works/services within the original scope of work;*
- (ii) Liabilities to meet award of arbitration or for compliance of the order or decree of a court;*
- (iii) On account of change in law;*
- (iv) Any additional works/services which have become necessary for efficient and successful operation of the generating station, but not included in the original project cost; and*
- (v) Deferred works relating to ash pond or ash handling system in the original scope of work.*

5. The petitioner has claimed additional capital expenditure for the years 2006-07, 2007-08 and 2008-09 as under:

(Rs in lakh)

Particulars	2006-07	2007-08	2008-09
Additional capital expenditure	41.43	96.32	135.71

6. The petitioner vide affidavit dated 18.9.2009, has submitted a certificate from the chartered accountant certifying that the books of accounts of the petitioner have been verified and the additional capital expenditure/ transfer of assets has been accounted for by the petitioner in respect of the generating station. The additional capital expenditure as per books vis-à-vis the additional capital expenditure claimed by the petitioner is as under:

(Rs. in lakh)

Year	2006-07	2007-08	2008-09
Closing balance as per Book of Accounts	147443.03	147539.34	147675.06
Less: Opening balance as per Books of Accounts	147401.61	147443.03	147539.34
Additional capitalization claimed	41.42	96.31	135.72

7. The year-wise and category-wise break-up of the additional capital expenditure claimed by petitioner is as under:

(Rs. in lakh)

Capitalization	2006-07	2007-08	2008-09
Deferred liabilities relating to works / services within the original scope of work - Regulation 34 (2) (i)	3.50	79.29	0.00
Additional works/services necessary for efficient and successful operation of the generating station, but not included in the original project cost- Regulation 34 (2) (iv)	39.04	17.02	135.71
Rectification-Addition	9486.29	0.00	0.00
Sub-total	9528.82	96.32	135.71
Deletion			
Deletion	1.11	0.00	0.00
Rectification-Deletion	9486.29	0.00	0.00
Sub-total	9487.40	0.00	0.00
Additional capital expenditure claimed	41.43	96.32	135.71

8. After applying prudence check on the asset-wise details and justification of additional capitalization claimed by the petitioner the admissibility of additional capitalization is discussed in the succeeding paragraphs

Deferred liabilities relating to works/services within the original scope of work- Regulation 34(2)(i)

9. The petitioner has claimed amounts of Rs.3.50 lakh and Rs.79.29 lakh during the years 2006-07 and 2007-08 respectively under this head. The expenditure pertains to capitalization of the deferred payment made towards consultancy charges to Central Electricity Authority (CEA) in respect of the main plant building, dam and main tunnel. As the deferred expenditure pertains to works/services within the original scope of work, the said amounts are allowed to be capitalized under this head.

Additional works/services necessary for efficient and successful operation of the generating station, but not included in the original project cost- Regulation 18(2)(iv):

10. The petitioner has claimed amounts of Rs.39.04 lakh, Rs.17.02 lakh and Rs.135.71 lakh during the years 2006-07, 2007-08 and 2008-09 respectively, under this head. The expenditure pertains to assets like temporary residential building, furniture and fixture, EDP equipments, office equipment, electrostatic liquid cleaner, switch gear including cable connection, kleentek ferocare machine, communications equipment, audio visual equipment, retaining wall for permanent residential building, transport equipment like ambulance, indoor hall, pumps, welding machine and some other assets. The claim for the respective years is examined as under:

2006-07

11. The claim for Rs 0.29 lakh in respect of assets like furniture and fixtures, Rs 1.64 lakh for EDP equipments and Rs 3.25 lakh for office equipments are in the nature of minor assets and hence disallowed. The petitioner has claimed an expenditure of Rs 12.48 lakh towards switch gear including cable connection, for protection of switchyard. As the justification submitted by the petitioner in respect of the said expenditure is not in order, the capitalization of Rs 12.48 lakh under this head, has not been allowed.

2007-08

12. The claim for Rs. 2.31 lakh for assets like EDP equipment, Rs 0.17 lakh for office equipments and Rs 0.25 lakh for audio-visual equipments are not allowed for capitalization as these assets are in the nature of minor assets. The petitioner has claimed an expenditure of Rs. 11.99 lakh for plant and machinery like "Kleentek

Ferrocare machine". It is observed that a similar type of machine named "electrostatic liquid cleaner" was purchased by the petitioner during 2006-07. As no justification has been provided by the petitioner for purchase of the new asset when a similar type of machine was already available, the claim for Rs 11.99 lakh has not been allowed.

2008-09

13. The claim for Rs. 5.06 lakh in respect of assets like office equipments, Rs 37.59 lakh for furniture and fixtures and Rs 5.87 lakh for EDP equipment (except server) are in the nature of minor assets and hence the capitalization of the said amounts are not allowed.

14. Based on the above discussions, amounts of Rs. 21.37 lakh for 2006-07, Rs. 2.30 lakh for 2007-08 and Rs. 87.19 lakh for 2008-09, has been allowed.

Rectification of Account Head

15. An amount of Rs.9486.29 lakh has been claimed by the petitioner during 2006-07 under the 'Rectification of Account Head'. The said amount has also been de-capitalized during 2006-07 under the 'Rectification of Account Head'. Hence, the same is allowed.

Deletion

16. In addition to the capitalization under above category, the petitioner has de-capitalized an amount of Rs.1.11 lakh during 2006-07 in respect of a Photostat machine. The deletion is in order and allowed.

17. Based on the above discussions, the additional capital expenditure (before adjustment of un-discharged liabilities) is approved as under:

(Rs in lakh)

Capitalization	2006-07	2007-08	2008-09
Deferred liabilities relating to works / services within the original scope of work - Regulation 34 (2) (i)	3.50	79.29	0.00
Additional works/services necessary for efficient and successful operation of the generating station, but not included in the original project cost- Regulation 34 (2) (iv)	21.37	2.30	87.19
Rectification of Account Head (Addition)	9486.29	0.00	0.00
Sub-total	9511.17	81.60	87.19
Deletion			
Deletion	1.11	0.00	0.00
Rectification of Account Head (Deletion)	9486.29	0.00	0.00
Sub-total	9487.40	0.00	0.00
Additional capital expenditure claimed	23.77	81.60	87.19

Un-discharged liabilities

18. As on 31.03.2006: The petitioner, vide affidavits dated 18.9.2009 and 27.11.2009 has submitted the details of un-discharged liabilities in its claim of additional capital expenditure, as under:

(Rs. in lakh)

Particulars	2006-07	2007-08	2008-09
Un-discharged liability as on 1 st April of the financial year	1155.74	1146.07	1124.89
Discharge of liabilities during the period	9.67	21.18	81.32
Un-discharged liability as on 31 st March of the financial year (1-2)	1146.07	1124.89	1043.57

19. Out of the un-discharged liability of Rs.1155.74 lakh as on 31. 3.2006, as per order dated 30.4.2008 in Petition No. 89/2007, the petitioner has discharged Rs.9.67 lakh, Rs.21.18 lakh and Rs. 81.32 lakh during the years 2006-07, 2007-08 and 2008-09 respectively. The balance un-discharged liabilities as on 31.3.2009, is Rs.1043.57 lakh, which would be considered as and when the same is discharged.

20. Un-discharged liabilities in respect of additional capital expenditure during 2006-09: The petitioner has not claimed any un-discharged liabilities relating to additional capital expenditure during the period 2006-09.

21. Accordingly, the amounts of un-discharged liabilities have been deducted during the year in which the liabilities have been charged and adjusted during the year in which the liabilities have been discharged.

Additional capital expenditure after adjustment of un-discharged liabilities:

22. The additional capital expenditure allowed for the period 2006-09, after adjustment of un-discharged liabilities is as under:

	<i>(Rs. in lakh)</i>		
	2006-07	2007-08	2008-09
Additional capitalization allowed prior to adjustment on account of un-discharged liabilities	23.77	81.60	87.19
Discharge of liabilities during the period 2006-09	9.67	21.18	81.32
Additional capitalization allowed	33.44	102.77	168.51

Capital Cost

23. As stated earlier, the Commission had considered the capital cost of Rs.145545 lakh as on 31.3.2006, for the purpose of tariff for the period 2004-09 in Petition No. 89/2007. The same is considered as the capital cost as on 1.4.2006.

24. Taking into account the capital cost as on 1.4.2006 and the additional capital expenditure as approved at para 22 above, the capital cost considered for the purpose of tariff is as under:

	<i>(Rs. in lakh)</i>		
Year	2006-07	2007-08	2008-09
Opening capital cost as on 1 st April of the financial year	145545.00	145578.44	145681.21
Additional Capitalization approved for the purpose of tariff	33.44	102.77	168.51
Capital Cost as on 31 st March of the financial year	145578.44	145681.21	145849.72

Debt-Equity ratio

25. Regulation 36 of the 2004 Regulations provides that:

“(1) In case of the existing project, debt–equity ratio Considered by the Commission for the period ending 31.3.2004 shall be considered for determination of tariff with effect from 1.4.2004_

Provided that in cases where the tariff for the period ending 31.03.2004 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 generating stations where additional capitalization has been completed on or after 1.4.2004 and admitted by the Commission under regulation 34, equity in the additional capitalization 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 capitalization; or*
- (c) Actual equity employed,*

Whichever is the least:

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

(2) In case of the generating stations for which investment approval was accorded prior to 1.4.2004 and which are likely to be declared under commercial operation during the period 1.4.2004 to 31.3.2009, debt and equity in the ratio of 70:30 shall be considered:

Provided that where equity actually employed to finance the project is less than 30%, the actual debt and equity shall be considered for determination of tariff:

Provided further that the Commission may in appropriate cases consider equity higher than 30% for determination of tariff, where the generating company is able to establish to the satisfaction of the Commission that deployment of equity higher than 30% was in the interest of general public”.

(3) In case of the generating stations for which investment approval is accorded on or after 1.4.2004, debt and equity in the ratio of 70:30 shall be considered for determination of tariff:

Provided that where equity actually employed is more than 30%, equity in excess of 30% shall be treated as notional loan;

Provided further that where deployment of equity is less than 30%, the actual debt and equity shall be considered for determination of tariff.

(4) The debt and equity amount arrived at in accordance with above clause (1), (2) or (3), as the case may be, shall be used for calculation of interest on loan,

return on equity, advance against depreciation and foreign exchange rate variation.”

26. The petitioner has stated that the additional capital expenditure has been financed through internal resources. Debt-equity ratio of 70:30 has been considered for additional capitalization in terms of the above regulations after adjustment of undischarged liability. Accordingly, additional notional equity for the generating station on account of capitalization approved, works out as under:

	(Rs in lakh)		
	2006-07	2007-08	2008-09
Additional Notional equity	10.03	30.83	50.55

Return on Equity

27. Return on equity has been worked out @14% per annum on the normative average equity, as under:

	(Rs in lakh)		
Return on Equity	2006-07	2007-08	2008-09
Opening Balance	72741.77	72751.81	72782.64
Increase/ decrease due to additional capitalization	10.03	30.83	50.55
Closing Equity	72751.81	72782.64	72833.19
Average Equity	72746.79	72767.22	72807.91
Rate of Return on Equity	14.00%	14.00%	14.00%
Return on Equity	10184.55	10187.41	10193.11

Interest on loan

28. The petitioner has provided a statement of actual interest rate incurred on the syndicate loan carrying floating rate of interest, for the period 2004-09. The petitioner has claimed simple average interest rates for syndicate loan as 8.967%, 9.119% and 8.813% for the years 2006-07, 2007-08 and 2008-09 respectively. However, as regards syndicate loan, instead of simple interest rate, the weighted average rate of interest of 8.967%, 9.119% and 8.817% for

the years 2006-07, 2007-08 and 2008-09 respectively has been considered. Accordingly, the weighted average rate of Interest has been re-calculated as 8.93%, 8.64% and 8.40% for the years 2006-07, 2007-08 and 2008-09 respectively. Based on the weighted average rate of Interest as calculated above and as contained in order dated 30.4.2008 in Petition No. 89/2007, the Interest on loan has been computed as under:

<i>(Rs in lakh)</i>			
Interest on Loan	2006-07	2007-08	2008-09
Gross loan-Opening	72803.23	72826.64	72898.58
Cumulative repayments of loans up to previous year	28446.66	36186.48	43851.60
Opening balance	44356.57	36640.16	29046.98
Additions due to additional capitalization	23.41	71.94	117.95
Repayments of loans during the year	7739.82	7665.12	4690.16
Closing balance	36640.16	29046.98	24474.77
Average loan	40498.36	32843.57	26760.87
Weighted average rate of interest	8.93%	8.64%	8.40%
Interest on loan	3615.67	2838.85	2247.81

Depreciation

29. Cumulative depreciation recovered up to 31.3.2006 has been considered as Rs.21805.50 lakh, as per order dated 30.4.2008 in Petition No.89/2007. The amount of cumulative depreciation allowed against the de-capitalized assets has been calculated on pro-rata basis. Depreciation has been worked out as under:

<i>(Rs in lakh)</i>			
	2006-07	2007-08	2008-09
Opening Balance	145545.00	145578.44	145681.22
Increase/ decrease due to additional capitalization	33.44	102.77	168.51
Closing Balance	145578.44	145681.22	145849.72
Average Capital Cost	145561.72	145629.83	145765.47
Rate of depreciation	2.39%	2.39%	2.39%
Depreciation	3477.84	3479.47	3482.72

Advance against depreciation

30. As considered in order dated 30.4.2008 in Petition No.89/2007, Advance against depreciation has been computed as under:

(Rs in lakh)			
Advance against Depreciation	2006-07	2007-08	2008-09
1/10th of Gross Loan(s)	7280.32	7282.66	7289.86
Repayment of the Loan	7739.82	7665.12	4690.16
Minimum of the above	7280.32	7282.66	4690.16
Depreciation during the year	3477.84	3479.47	3482.72
(A) Difference	3802.48	3803.19	1207.44
Cumulative Repayment of the Loan	36186.48	43851.60	48541.76
Cumulative Depreciation/AAD	25283.35	32565.08	39850.99
(B) Difference	10903.13	11286.53	8690.77
Advance against Depreciation	3802.48	3803.19	1207.44

O&M Expenses

31. O&M Expenses as considered in order dated 30.4.2008 in Petition No.89/2007 have been considered.

Interest on Working Capital

32. For the purpose of calculation of working capital, the operating parameters as considered in the order dated 30.4.2008 in Petition No. 89/2007 have been kept unchanged. The "receivables" component of the working capital in the order dated 30.4.2008 in Petition No. 89/2007 have been revised for the reason of revision of return on equity, interest on loan, etc.

33. The SBI PLR of 10.25% as on 1.4.2004 as considered in order dated 30.4.2008 in Petition No. 89/2007 has been considered. The necessary details in support of calculation of interest on working capital are as under:

(Rs in lakh)			
Particulars	2006-07	2007-08	2008-09
Maintenance Spares	1770.00	1876.00	1988.00
O & M expenses	205.08	213.33	221.83
Receivables	4026.11	3914.05	3394.59
Total	6001.19	6003.38	5604.42
Interest	615.12	615.35	574.45

Annual Fixed Charges

34. The revised annual fixed charges for the period from 1.4.2006 to 31.3.2009 are summarized as under:

(Rs in lakh)

Particulars	2006-07	2007-08	2008-09
Depreciation	3477.84	3479.47	3482.72
Interest on Loan	3615.67	2838.85	2247.81
Return on Equity	10184.55	10187.41	10193.11
Advance Against Depreciation	3802.48	3803.19	1207.44
Interest on Working Capital	615.12	615.35	574.45
O & M Expenses	2461.00	2560.00	2662.00
TOTAL	24156.67	23484.27	20367.53

35. The petitioner's prayer for reimbursement of the filing fee is not allowed in view of the Commission's order dated 11.9.2008 in Petition No.129/2005, wherein it was directed that filing fee during the period 2004-09 would not be reimbursed, as the same has been factored in the normalized O&M expenses under the 2004 regulations.

36. The petitioner shall be reimbursed the difference between the fixed charges approved vide order dated 30.4.2008 in Petition No. 89/2007 and those approved now, from the beneficiaries in three equal monthly installments.

37. Petition No.211/2009 stands disposed of in terms of the above.

Sd/-
(V.S.VERMA)
MEMBER

Sd/-
(S. JAYARAMAN)
MEMBER

Sd/-
(DR.PRAMOD DEO)
CHAIRPERSON