

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Review Petition No. 13/RP/2016

**in
Petition No. 161/TT/2015**

Coram:

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

Date of Hearing : 20.05.2016

Date of Order : 30.05.2016

In the matter of:

Review of the order dated 30.12.2015 passed by the Commission in Petition No. 161/TT/2015.

And in the matter of:

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

.....**Petitioner**

Versus

1. Karnataka Power Transmission Corporation Ltd.
Kaveri Bhawan, Bangalore-560009
2. Transmission Corporation of Andhra Pradesh Ltd.
(APTRANSCO), Vidyut Soudha
Hyderabad-500082
3. Kerala State Electricity Board (KSEB)
Vaidyuthi Bhavanam, Pattom
Thiruvananthapuram-695004
4. Tamil Nadu Electricity Board
NPKRR Maaligai, 800, Anna Salai
Chennai- 600002



5. Electricity Department
Government of Goa
Vidyuti Bhawan, Panaji
Goa- 403001
6. Electricity Department
Government of Pondicherry
Pondicherry- 605001
7. Eastern Power Distribution Company of Andhra Pradesh Ltd.
P&T Colony, Seethmmadhara, Vishakhapatnam
Andhra Pradesh
8. Southern Power Distribution Company of Andhra Pradesh
Srinivasasa Kalyana Mandapam Backside
Tiruchanoor Road, Kesavayana Gunta
Tirupati- 517 501
9. Central Power Distribution Company of Andhra Pradesh
Mint Compound,
Hyderabad- 500 063
10. Northern Power Distribution Company of Andhra Pradesh
Chaitanyapuri, Kazipet
Warangal- 506 004
11. Bangalore Electricity Supply Company Ltd.
K. R. Circle
Bangalore- 560 001
12. Gulbarga Electricity Supply Company Ltd.
Station Main Road, Gulbarga
13. Hubli Electricity Supply Company Ltd.
Navanagar, P B Road
Hubli, Karnataka
14. MESCOM Corporate Office
Paradigm Plaza, AB Shetty Circle
Mangalore- 575 001
15. Chamundeswari Electricity Supply Corporation Ltd.
New Kantharaj Urs Road, Saraswatipuram,
Mysore-570 009

.....Respondents



The following were present:

For Petitioner : Shri Jasbir Singh, PGCIL
Shri Rakesh Prasad, PGCIL
Shri Anand K Ganeshan, Advocate, PGCIL

For Respondent: None

ORDER

This review petition has been filed by Power Grid Corporation of India Limited (PGCIL) seeking review of the order dated 30.12.2015 in Petition No. 161/TT/2015, wherein transmission tariff for (a) Kurnool-Raichur 2nd 765 kV S/C line, (b) Extension of Kurnool 765/400 kV Sub-station, and (c) Extension of Raichur 765/400 kV Sub-station (hereinafter referred to as "transmission assets") under "Common System associated with ISGS project in Krishnapatnam area of Andhra Pradesh in Southern Region" was allowed for the period starting from the date of commercial operation to 31.3.2019. The petitioner has requested to review and rectify the order dated 30.12.2015 to the extent of allowing additional RoE in Petition No. 161/TT/2015.

2. As per the Investment Approval dated 4.8.2011, the assets covered in the "Common System Associated with ISGS Projects in Krishnapatnam Area of Andhra Pradesh" (hereinafter referred to as "project") were scheduled to be commissioned within 36 months from the date of Investment Approval, i.e., by 4.8.2014. The actual date of commercial operation of the instant transmission



assets was 21.6.2014 (35 months), i.e., early commissioning than scheduled COD. The petitioner submitted that early commissioning of the asset is on account of requirement of downstream evacuation in lieu of the commissioning of 765 kV S/C Raichur-Sholapur line. The petitioner has further submitted that Nellore Pooling Station is interconnected by LILO of both circuits of 400 kV Simhapuri and Meenakshi-Nellore D/C Quad line. For transfer of power beyond Nellore to target beneficiaries, high capacity 765 kV AC corridor has been planned to Kurnool/Raichur. The advancement of the line was discussed in the 23rd and 24th SRPC meeting dated 26.10.2013 and 15.3.2014 respectively. The petitioner has submitted extract of Minutes of Meeting (MOM) along with the petition. In view of the above the petitioner has requested for additional RoE of 0.5% under the 2014 Tariff Regulations. The Commission in the impugned order has not allowed additional RoE of 0.5%. The review petitioner has filed the instant petition seeking review of the said order to the extent of allowing additional RoE.

3. The Commission in its order dated 30.12.2015, while dealing with the issue of additional RoE of the assets covered in Petition No. 161/TT/2015 held as under:-

“24. Regulation 24(2)(iii) of the 2014 Tariff Regulations mandates the petitioner to submit a certificate from Regional Power Committee/National Power Committee that commissioning of the particular element will benefit the system operation in the regional/national grid. The petitioner has not submitted such certificate.

25. Therefore it is not evident from the submissions that the transmission asset will benefit the system operation in the Southern Region and therefore we have not considered the submissions made by the petitioner and have accordingly not allowed additional RoE of 0.5% in accordance with proviso (iii) to Regulation 24(2) of 2014 Tariff Regulations....”



4. The review petitioner on the above has submitted as under:-
- a. The provisos (i) of the Regulation 24 (2) of the 2014 Tariff Regulations specifies that if the entire transmission project gets commissioned within the time frames specified in Appendix I, an additional RoE of 0.5% will be admissible. However, proviso (iii) of Regulation 24 (2) deals with a specific aspect, namely when only one of the elements of the transmission asset gets commissioned within the time frames specified in Appendix I. In such case, the additional RoE gets linked to submissions of a certificate by the Regional Power Committee/National Power Committee to the effect that commissioning of such an element will benefit the system operation in the regional/national grid.
 - b. In the present case, the transmission scheme consisted of several elements and while some elements were commissioned in the 2009-14 tariff period, others got commissioned in the 2014-19 tariff period.
 - c. The entire project has been commissioned within the timelines specified in the 2009 Tariff Regulations and 2014 Tariff Regulations. Therefore, the case of the petitioner is covered under proviso (i) of Regulation 24 (2) and not under proviso (iii) of Regulation 24 (2) of 2014 Tariff Regulations. Since the entire project got commissioned within the timeframes mentioned in the respective Regulations, the necessity of submissions of the certificate was not there.



d. The Commission in order dated 23.02.2016 in respect of truing up for the period 2009-14 in Petition no. 417/TT/2014 allowing the additional ROE of 0.5% where all the assets covered under the instant transmission system was completed within the specified timeline. The details of which are as follows:-

Investment Approval Date : 4.8.2011							
Sl. No	Asset Details	Petition No.	Time line schedule in months as per the 2009 Tariff Regulations for addl RoE	Scheduled completion date as per the 2009 Tariff Regulations time line	Time line Schld in months as per the 2009 Tariff Regulations for addl RoE	Schld. completion date as per the 2014 Tariff Regulations time line	Actual COD date
1	A) LILO of Simhapuri-Nellore 400kV D/C (Quad) line at Nellore B) Associated bays and common systems at Nellore Pooling station.	417/TT/2014	32	1.5.2014	Not Applicable		1.4.2013
2	765/400 KV NELLORE POOLING NEW SUBSTATION along with associated bays and 765 kV , 240 MVAR Bus Reactor at Nellore	37/TT/2014	30	1.3.2014	Not Applicable		ICT-1: 1.2.2014, ICT-2: 1.3.2014
3	Nellore Pooling station-Kurnool 765kV D/C line along with associated bays and 765 kV 240 MVAR line reactor	245/TT/2014	Not Applicable		40	4.12.2014	1.11.2014
4	Kurnool-Raichur 2nd 765kV S/C line along with associated bays	161/TT/2014	Not Applicable		36	4.8.2014	21.6.2014

e. The Commission has also passed the order dated 29.2.2016 in Petition No. 245/TT/2014 in respect of the tariff of the Nellore Pooling station-



Kurnool 765 kV D/C line along with associated bays and 765 kV 240 MVAR line reactor wherein the Commission has held that:-

*“37. We have considered the submissions made by the petitioner. The instant asset has been commissioned within the timeline of 40 months specified in Regulation 24(2) of 2014 Tariff Regulations and hence **additional RoE of 0.5% is allowed.**”*

5. The review petition was admitted on 27.4.2016. The PGCIL was directed to serve the copy of the review petition along with the order on the respondents by 30.4.2016. The respondents were given time to file their replies by 10.5.2016, with copy to the PGCIL. However, none of the respondents have filed their reply.

6. We have heard the learned counsel for the PGCIL and the documents on record. The additional RoE of 0.5% was not allowed as PGCIL did not produce the certificate from Regional Power Committee/National Power Committee certifying that commissioning of the particular element will benefit the system operation in the regional/national grid under proviso (iii) to Regulation 24(2) of the 2014 Tariff Regulations. The petitioner has submitted that disallowing additional RoE in the present case is error apparent on the face of the record and should be rectified.

7. We did not allow additional RoE for the instant assets in order dated 30.12.2015 in Petition No. 161/TT/2015 as the Commission had not taken a view on the COD of the other elements covered in the project. At the time of preparation of order in Petition No. 161/TT/2015, COD and tariff of some of the assets of the project covered in Petition Nos. 37/TT/2014 and 245/TT/2014 was not determined. Accordingly, PGCIL was directed to submit a certificate from



RPC/NRPC clearly stating that commissioning of a particular element will benefit the operation of the regional/national grid as provided in proviso (iii) to Regulation 24(2) of the 2014 Tariff Regulations. However it is found that the COD and tariff of all the elements covered in Petition Nos. 37/TT/2014 and 245/TT/2014 determined by order dated 22.1.2016 and 29.2.2016 have been commissioned within the timeline specified in the 2014 Tariff Regulations and allowed additional RoE of 0.5%. Accordingly, the assets covered in the instant petition which form part of the same project also qualify for additional RoE of 0.5% as provided in proviso (i) of Regulation 24(2) of 2014 Tariff Regulations as all the assets covered in the project have been commissioned within the timeline specified in the 2009 Tariff Regulations and the 2014 Tariff Regulations. Therefore, the review petition is allowed and accordingly the tariff of (a) Kurnool-Raichur 2nd 765 kV S/C line, (b) Extension of Kurnool 765/400 kV Sub-station, and (c) Extension of Raichur 765/400 kV Sub-station allowed vide order dated 30.12.2015 in Petition No. 161/TT/2015 is revised in the following paragraphs.

Return on Equity (“ROE”)

8. Clause (1) & (2) of Regulation 24 and Clause (2) of Regulation 25 of the 2014 Tariff Regulations specify as under:-

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

Provided that:

i. in case of projects commissioned on or after 1st April, 2014, an additional return of **0.50 %** shall be allowed, if such projects are completed within the timeline specified in **Appendix-I**:



ii. the additional return of 0.5% shall not be admissible if the project is not completed within the timeline specified above for reasons whatsoever:

iii. additional RoE of 0.50% may be allowed if any element of the transmission project is completed within the specified timeline and it is certified by the Regional Power Committee/National Power Committee that commissioning of the particular element will benefit the system operation in the regional/national grid.”

“25. Tax on Return on Equity:

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

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

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

9. The petitioner has computed ROE at the rate of 20.243% after grossing up the ROE with MAT rate as per the above Regulation. The petitioner has further submitted that the grossed up ROE is subject to truing up based on the actual tax paid along with any additional tax or interest, duly adjusted for any refund of tax including the interest received from IT authorities, pertaining to the tariff period 2014-19 on actual gross income of any financial year. Any under-recovery or over-recovery of grossed up ROE after truing up shall be recovered or refunded to the beneficiaries on year to year basis.

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



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

(₹ in lakh)

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Opening Equity	5327.37	5495.59	5704.68	5704.68	5704.68
Addition due to Additional Capitalisation	168.21	209.09	0.00	0.00	0.00
Closing Equity	5495.59	5704.68	5704.68	5704.68	5704.68
Average Equity	5411.48	5600.13	5704.68	5704.68	5704.68
Return on Equity (Base Rate)	16.00	16.00	16.00	16.00	16.00
MAT rate for the year	20.961	20.961	20.961	20.961	20.961
Rate of Return on Equity (Pre Tax)	20.243	20.243	20.243	20.243	20.243
Return on Equity (Pre Tax) – Revised	852.35	1133.63	1154.80	1154.80	1154.80

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
RoE allowed in Order dated 30.12.2015	825.69	1098.19	1118.69	1118.69	1118.69
Return on Equity (Pre Tax) - Revised	852.35	1133.63	1154.80	1154.80	1154.80



Interest on Working Capital (“IWC”)

12. Clause 1 (c) of Regulation 28 and Clause 5 of Regulation 3 of the 2014

Tariff Regulations specify as follows:

“28. Interest on Working Capital

(c)(i) Receivables equivalent to two months of fixed cost;

(ii) Maintenance spares @ 15% of operation and maintenance expenses specified in regulation 29; and

(iii) Operation and maintenance expenses for one month”

“(5)Bank Rate’ means the base rate of interest as specified by the State Bank of India from time to time or any replacement thereof for the time being in effect plus 350 basis points;”

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

14. The interest on working capital is worked out in accordance with Regulation 28 of the 2014 Tariff Regulations. The rate of interest on working capital considered is 13.50% (SBI Base Rate of 10% plus 350 basis points). The interest on working capital as determined by the Commission is shown in the table below:-



(₹ in lakh)

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Maintenance Spares	28.08	37.31	38.53	39.82	41.14
O & M expenses	15.60	20.73	21.41	22.12	22.86
Receivables	426.50	556.98	555.26	543.27	530.68
Total	470.19	615.01	615.20	605.21	594.67
Rate of Interest (%)	13.50	13.50	13.50	13.50	13.50
Interest - Revised	63.48	83.03	83.05	81.70	80.28

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Interest allowed in Order dated 30.12.2015	62.86	82.21	82.22	80.87	79.45
Interest - Revised	63.48	83.03	83.05	81.70	80.28

Annual Transmission Charges

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

(₹ in lakh)

Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Gross Block					
Opening Gross Block	17757.91	18318.64	19015.61	19015.61	19015.61
Additional Capitalisation	560.73	696.97	0.00	0.00	0.00
Closing Gross Block	18318.64	19015.61	19015.61	19015.61	19015.61
Average Gross Block	18038.28	18667.13	19015.61	19015.61	19015.61
Depreciation					
Rate of Depreciation	5.251	5.252	5.252	5.252	5.252
Depreciable Value	16433.82	16800.41	17114.05	17114.05	17114.05
Elapsed Life (Beginning of the year)	0	1	2	3	4
Weighted Balance Useful life of the assets	34	33	32	31	30
Remaining Depreciable Value	16433.82	16063.48	15396.81	14398.09	13399.38
Depreciation	736.93	980.31	998.71	998.71	998.71
Interest on Loan					
Gross Normative Loan	12430.54	12823.06	13310.94	13310.94	13310.94
Cumulative Repayment upto Previous Year	0.00	736.93	1717.24	2715.96	3714.67
Net Loan-Opening	12430.54	12086.13	11593.69	10594.98	9596.27



Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Additional Capitalisation	392.52	487.88	0.00	0.00	0.00
Repayment during the year	736.93	980.31	998.71	998.71	998.71
Net Loan-Closing	12086.13	11593.69	10594.98	9596.27	8597.56
Average Loan	12258.33	11839.91	11094.34	10095.62	9096.91
Weighted Average Rate of Interest on Loan	7.5386	7.5689	7.5545	7.5171	7.4313
Interest	719.03	896.15	838.13	758.90	676.02
Return on Equity					
Opening Equity	5327.37	5495.59	5704.68	5704.68	5704.68
Additions	168.21	209.09	0.00	0.00	0.00
Closing Equity	5495.59	5704.68	5704.68	5704.68	5704.68
Average Equity	5411.48	5600.13	5704.68	5704.68	5704.68
Return on Equity (Base Rate)	16.00	16.00	16.00	16.00	16.00
MAT Rate for the year 2013-14	20.961	20.961	20.961	20.961	20.961
Rate of Return on Equity (Pre Tax)	20.243	20.243	20.243	20.243	20.243
Return on Equity (Pre Tax)	852.35	1133.63	1154.80	1154.80	1154.80
Interest on Working Capital					
Maintenance Spares	28.08	37.31	38.53	39.82	41.14
O & M expenses	15.60	20.73	21.41	22.12	22.86
Receivables	426.50	556.98	555.26	543.27	530.68
Total	470.19	615.01	615.20	605.21	594.67
Interest	63.48	83.03	83.05	81.70	80.28
Annual Transmission Charges					
Depreciation	736.93	980.31	998.71	998.71	998.71
Interest on Loan	719.03	896.15	838.13	758.90	676.02
Return on Equity	852.35	1133.63	1154.80	1154.80	1154.80
Interest on Working Capital	63.48	83.03	83.05	81.70	80.28
O & M Expenses	187.23	248.72	256.89	265.48	274.26
Total	2559.01	3341.85	3331.58	3259.59	3184.08



Particulars	2014-15	2015-16	2016-17	2017-18	2018-19
Allowed in Order dated 30.12.2015	2531.75	3305.59	3294.64	3222.65	3147.14
Total – Revised AFC	2559.01	3341.85	3331.58	3259.59	3184.08

16. This order disposes of Petition No.13/RP/2016 in Petition No. 161/TT/2015.

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

Sd/-
(A.S. Bakshi)
Member

