

**CENTRAL ELECTRICITY REGULATORY COMMISSION
NEW DELHI**

Petition No. 11/RP/2019

in

Petition No. 74/GT/2017

Coram:

Shri P. K Pujari, Chairperson

Dr. M. K. Iyer, Member

Date of Order: 27th January, 2020

In the matter of

Review of Commission's order dated 29.4.2019 in Petition No. 74/GT/2017 pertaining to approval of tariff of Muzaffarpur Thermal Power Station, Stage-II (390 MW) from COD of Unit-1 (18.3.2017) to 31.3.2019

And

In the matter of

Kanti Bijlee Utpadan Nigam Limited
NTPC Bhawan, Core-7, Scope Complex,
7, Institutional Area, Lodhi Road,
New Delhi - 110 003

.....Petitioner

Vs

1. Bihar State Power Holding Company Ltd
Vidyut Bhawan, Bailey Road,
Patna - 800 001

2. North Bihar Power Distribution Company Ltd
Vidyut Bhawan, Bailey Road, Patna 800 001

3. South Bihar Power Distribution Company Ltd
Vidyut Bhawan, Bailey Road
Patna 800 001

4. Jharkhand Bijlee Vitaran Nigam Ltd
Engineering Building, HEC Township,
Dhurwa, Ranchi - 834 004

5. GRIDCO Ltd
Janpath, Bhubaneshwar - 751 022

6. West Bengal State Electricity Distribution Company Ltd
Vidyut Bhawan, Bidhannagar, Block DJ,
Sector-II, Salt Lake City, Kolkata - 700 091



7. Power Department
Govt. of Sikkim, Kazi Road,
Gangtok, Sikkim - 737 101

8. Damodar Valley Corporation,
DVC Towers, VIP Road, Kolkata,
West Bengal - 700 054

....Respondents

Parties present:

Shri M.G. Ramachandran Senior Advocate, KBUNL
Ms. Poorva Saigal, Advocate, KBUNL
Shri Sukhjinder Singh, NTPC
Shri R.K.Mehta, Advocate, GRIDCO
Shri Madhusudan Sahoo, GRIDCO
Shri Aabhas Parimal, Advocate, JBVNL

ORDER

Petition No. 74/GT/2017 was filed by the Petitioner for approval of tariff of Muzaffarpur Thermal Power Station, Stage-II (390 MW) (hereinafter referred to as 'the generating station') from COD of Unit-1 (18.3.2017) to 31.3.2019 in terms of the provisions of the Central Electricity Regulatory Commission (Terms and Conditions for Tariff), 2014 (hereinafter called 'the 2014 Tariff Regulations'). Accordingly, the Commission had determined the tariff vide its order dated 29.4.2019. Subsequently, by corrigendum order dated 11.6.2019, the computation of IDC and IWC was corrected and tariff of the generating station was accordingly modified.

2. Aggrieved by the said order, the Petitioner has filed this review petition on the ground that there is error apparent on the face of the record, on the following issues:

- (a) Normative/Notional IDC capitalisation
- (b) Correction of the Station Heat Rate



3. Pursuant to the directions of the Commission vide ROP of the hearing dated 16.9.2019, the Petitioner has filed additional affidavit dated 25.9.2019. Thereafter, the Petition was heard on 6.11.2019 and the Commission vide its order dated 7.11.2019 admitted the same. Reply in the matter has been filed by the Respondents, BSPHCL and GRIDCO and the Petitioner has filed its rejoinder to the said replies. Thereafter, the Commission, after hearing the parties on 13.1.2020, reserved its order in the Petition. Based on the submissions of the parties and the documents available on record, we proceed to examine the issues raised in the Petition, as stated in the subsequent paragraph.

(A) Normative/Notional IDC Capitalisation

4. The Petitioner vide affidavits dated 11.6.2019 & 25.9.2019 has made the following submissions:

(i) The deployment of funds has been carried out from the owner's equity till the first drawl of the actual loan which was made in the 3rd quarter of 2011-12. As per 2014 Tariff Regulations, in case the actual equity incurred by the project developer is in excess of 30% of the funds deployed, the excess equity shall be treated as normative loan and notional IDC will be allowed accordingly.

(ii) The petitioner is entitled for a normative IDC for an equity infused in excess of 30% of funds deployed in terms of clause (2) of Regulation 9 of the 2014 Tariff Regulations. Further, the petitioner had outstanding loan during the above said period pertaining to Stage-I of the same generating station with interest rate @12.45% (based on the loan agreement executed with SBI in Sept'2011 with Interest rate at Base rate +245 points which works out to 10%+2.45% i.e 12.45%. Thus, as per the last provision of Regulation 26(5), the Commission may be pleased to allow the Notional IDC as per the interest rate of outstanding loan of Stage-I pertaining to generating company, which is weighted average rate of interest of the generating company.

(iii) Unlike the case of Aravali Power Corporation, which was a greenfield project, the present proceedings relate to Stage II, which is an expansion of the Stage-I of this generating station, which had been taken under R&M, pursuant to take-over by the Petitioner. In the present case, the Petitioner, as a generating company had an outstanding loan during the period from the first quarter of 2010-11 to the second quarter of 2011-12 pertaining to the same generating company in respect of Stage I

(iv) The above drawl of loan was in terms of the loan agreements dated 2.8.2007 & 31.12.2008 entered into between the Petitioner and NTPC in respect of Stage I. The rate of interest, as provided in the loan agreement is State Bank advance rate which works out to 14.410% as on 12.5.2011 and 14.680% as on 11.6.2011 and are



applicable for the generating company as a whole. Accordingly, in terms of Regulation 25(5) of the 2014 Tariff Regulations, the applicable interest rate for the purposes of computing the average rate of interest is 13.808% for the period from the first quarter of 2010-11 to the second quarter of 2011-12.

(v) With effect from September, 2011, the Petitioner had started drawing loan in respect of the Common Loan Agreement dated 27.9.2011 relating to Stage II and has been granted the Weighted Average Rate of Interest, as applicable in terms of Regulation 25(5) of the 2014 Tariff Regulations.

(vi) For the period from the first quarter of 2010-11 to the second quarter of 2011-12, the principle relating to grant of IDC on notional loan arising out of repayments made out of internal resources till the capitalization of the assets, has been decided by this Commission in its order dated 14.10.2013 in Petition No. 6/RP/2013 in Petition No. 184 of 2009 relating to the determination of tariff for the Talcher Thermal Power Station for the control period 2004-09. This order was based on the judgment dated 10.12.2008 of the Appellate Tribunal for Electricity in Appeal No. 151 and 152 of 2008 (NTPC v CERC & ors)

(vii) In terms of the above decision, the Petitioner is entitled to Notional IDC at the rate of 13.808% for the period from the first quarter of 2010-11 to the second quarter of 2011-12.

5. The Respondents have made the following submissions:

(i) The Respondent No.1 BSPHCL in its reply has submitted that Regulation 9 and 26 of the 2014 Tariff Regulations are applicable after COD of the unit for determination of tariff and not during the construction period. It has also submitted that the applicability of IDC and its calculation during the construction period is determined in accordance with Regulation 11(A) of the 2014 Tariff Regulations and the same has been allowed on the basis of this regulation in the order dated 29.4.2019. Referring to the judgment of the Appellate Tribunal for Electricity (in short, 'the Tribunal') dated 12.7.2018 in Appeal No. 175/2015 (PPCL V CERC & ors), the Respondent has stated that the contention which applies to operation period cannot be applied to the construction period. Accordingly, the Respondent has prayed that there is no error apparent in the face of record or otherwise no sufficient reason exists for review of the order on this issue.



(ii) The Respondent No.5 GRIDCO in its reply affidavit dated 27.12.2019 has submitted that in terms of Section 94 of the Electricity Act, 2003 read with Order 47 Rule 1 CPC, review lies only on the ground of error apparent on the face of record. Accordingly, the order dated 29.4.2019 does not suffer from any apparent error and therefore the same is liable to be rejected. It has also submitted that as per the Statement of Reasons to the 2014 Tariff Regulations on the issue of allowing IDC for equity infusion above the desired level read with the decision of the Commission in paras 57 to 59 of the order dated 29.4.2019, the reasoning of the Commission is fully justified.

6. The Petitioner in its rejoinder to the aforesaid replies, vide affidavit dated 2.1.2020 has submitted the following:

(i) The principle relating to grant of IDC on notional loan arising out of the repayments made out of internal resources till the capitalisation of the assets has been settled by the Tribunal in its judgment dated 151 & 152 of 2008 and by this Commission in Petition No.6/RP/2013.

(ii) In so far as the IDC & IEDC applicable during the construction period is concerned, the applicable regulation is Regulation 9 dealing with the capital cost. Regulation 9(2)(b) provides that if the equity is in excess of 30%, the same will be eligible for IDC and the manner of calculation is provided under Regulation 11. The IDC is therefore admissible even for normative debt and not merely for the actual borrowed debt.

(iii) Regulation 26 is only relevant in regard to the rate of interest to be applied. Regulation 11 does not speak about any particular rate during construction. This rate would be rate applicable for borrowing for investing in the capital asset of the project.

(iv) If IDC is not given on the excess equity deployed, the whole objective of allowing IDC on excess equity as contemplated under Regulation 9 is rendered redundant. The IDC is therefore always applicable during the construction period. The issue whether IDC is applicable on equity fund deployed in excess of the prescribed percentage eligible for ROE is now settled with the recent judgment dated 3.10.2019 of the Tribunal in Appeal No. 231/2017 (Power links Transmission Ltd V CERC & ors)

(v) The decision of the Tribunal in PPCL case is not applicable to the present case, in view of the Statement of Reasons for the 2014 Tariff Regulations as regards IDC on Notional loan.



7. During the hearing of the Petition on 13.1.2020, the learned counsel for the Petitioner and the Respondent GRDICO filed written submissions and mainly argued on the lines of their submissions in reply and rejoinder. The learned counsel for the Respondent however added that an error which is not self-evident and has to be detected by a process of reasoning can hardly be said to be an error apparent on the face of the record. He also contended that the orders/judgments referred to by the Petitioner are not applicable since the actual date of infusion of loan capital was not decided in those cases.

Analysis & decision

8. We have examined the matter. As regards IDC on Notional loan, the Commission in its order dated 29.4.2019 held as under:

“57. The petitioner has claimed normative IDC of ₹9054.02 lakh and ₹9606.57 lakh as on COD of Unit-I and Unit-II respectively towards equity of more than 30% of the cash expenditure deployed for the period till COD. The calculations for the same have been furnished by the petitioner vide Form-14A of the Petition. The petitioner has claimed normative IDC from the first quarter of 2010-11 and the first drawl of actual loan was made in the third quarter of 2011-12. For the period pertaining to which the actual loan was yet to be deployed, the petitioner has applied the rate of 12.45% p.a, the basis of which has not been explained by the petitioner. However, it is noted that this rate is same as the rate of interest applicable to the first drawl of loan.

58. It is noticed that the rate of interest claimed by the petitioner for calculation of normative IDC for the period prior to the drawl of actual loan is not in accordance with the above regulations. In a similar case, the Commission vide its order dated 6.5.2015 in petition No. 229/GT/2010 has decided as under:-

“45. (a) The petitioner has claimed notional IDC from the first quarter of 2007-08 and the first drawl of the actual loan was made in the fourth quarter (14.2.2008) of 2007-08. The petitioner has worked out the notional IDC for first three quarters of 2007-08 by considering the rate of interest @10.75% per annum, applicable to the first drawl of loan. But, there was no drawl of actual loan for the generating station as well as the petitioner company as a whole before 14.2.2008. Hence, there was no weighted average rate of interest available to work out the normative IDC before actual drawl of the loan (14.2.2008). Therefore, no IDC has been allowed before the actual drawl of the loan.”

59. In line with the above decision, the normative IDC for the period prior to 1st drawl of actual loan has not been allowed in the present case of the petitioner. For the period after 1st drawl of the actual loan till the reset SCOD of the units, the normative IDC has been calculated and allowed based on the rate of interest on the actual loan and equity of more than 30% of the actual cash expenditure deployed. However, the same is subject to revision at the time of truing-up exercise based on



the audited balance sheets with all schedules/ notes for every financial year since first fund infusion etc, to be furnished by the petitioner. Accordingly, the normative IDC of ₹4083.07 lakh for Unit-I and ₹4126.95 lakh for Unit-II is allowed.”

9. It is evident from the above that in the order dated 29.4.2019, the Commission had disallowed the normative IDC claimed by the Petitioner for the period prior to drawl of actual loan (from first quarter of 2010-11 to third quarter of 2011-12), as no basis for the rate of interest claimed for the said period was furnished by the Petitioner. Since the issue was decided based on the documents available on record, it cannot be contended by the Petitioner that the said order suffers from an error apparent on the face of record. The Petitioner has now submitted that before drawl of loan for Stage I, the Petitioner had outstanding loan from NTPC in terms of the loan agreements dated 22.8.2007 and 31.12.2008 and loan from SBI since September, 2011 in respect of the Common Loan Agreement dated 27.9.2011 (both loans relating to MTPS, Stage II) and hence Weighted Average Rates of Interest for the Company as a whole were available. The Petitioner has accordingly prayed that the same may be considered for the calculation of the normative IDC, prior to the drawl of actual loan. In our view, these submissions cannot be considered on review, since the same was never raised or argued by the Petitioner during the proceedings in the main petition. Therefore, the Petitioner cannot be permitted to raise new or additional grounds in review, and seek revision of tariff. It is however noticed that the Petitioner has relied upon a judgment of the Tribunal dated 3.10.2019 in ‘Power links case’ in Appeal No. 231/2017 and has contended that the issue of allowing notional IDC for equity infusion in excess of 30%, has been settled by the Tribunal and has also furnished a copy of the same on record. We notice that in para 59 of the order, the Commission had observed that the normative IDC allowed is subject to revision



based on the additional documents to be furnished by the Petitioner. In this background and in order to examine the Petitioner's entitlement to notional IDC in terms of the judgment of the Tribunal in 'Powerlinks links' case, we deem it fit to grant liberty to the parties to raise this issue, at the time of truing-up of tariff of this generating station for the period 2014-19. The issue is disposed of accordingly.

(B) Station Heat Rate

10. The Petitioner has submitted that the Station Heat Rate (SHR) as calculated by the Commission is 2375.55 kcal/kWh ($1.045 \times 1955/0.86$), but the same has been restricted to a round figure of 2375 kcal/kWh in the order dated 29.4.2019. The Petitioner has stated that since the 2014 Tariff Regulations provide that the Energy Charge Rate (ECR) shall be determined in three decimal places, the SHR may be corrected upto two decimal places and allowed by the Commission.

11. The Respondent GRIDCO has submitted that SHR has been computed in line with Regulation 36(C)(b) of the 2014 Tariff Regulations and any deviation from the said regulation would amount to violation of the regulation which is not permissible. The Respondent has argued that the said regulation does not provide for SHR to be determined upto two or three decimal places. The Petitioner has, however, reiterated its submissions in the petition and has accordingly sought the correction of the SHR allowed in order dated 29.4.2019.

Analysis & Decision

12. The matter has been considered. The Commission vide its order dated 29.4.2019 had allowed the Gross Station Heat Rate of 2375 kCal/kWh as under:

“96. Regulation 36(C) of Tariff Regulations, 2014 provides as follows:-

(C) Gross Station Heat Rate:-

(b) New Thermal Generating Station achieving COD on or after 1.4.2014

(i) Coal-based and lignite-fired Thermal Generating Stations



= 1.045 x Design Heat Rate (kCal/kWh)

Where the Design Heat Rate of a generating unit means the unit heat rate guaranteed by the supplier at conditions of 100% MCR, zero percent make up, design coal and design cooling water temperature/back pressure:

Provided that the design heat rate shall not exceed the following maximum design unit heat rates depending upon the pressure and temperature ratings of the units:

Pressure Rating (Kg/cm ²)	150	170	170	247
SHT/RHT (deg.C)	535/535	537/537	535/565	565/593
Type of BFP	Electrical Driven	Turbine Driven	Turbine Driven	Turbine Driven
Max Turbine Heat Rate (kCal/kWh)	1955	1950	1935	1850
Min. Boiler Efficiency				
Sub-Bituminous Indian Coal	0.86	0.86	0.86	0.86
Bituminous Imported Coal	0.89	0.89	0.89	0.89
Max Design Unit Heat Rate (kCal/kWh)				
Sub-Bituminous Indian Coal	2273	2267	2250	2151
Bituminous Imported Coal	2197	2191	2174	2078

Provided also that where unit heat rate has not been guaranteed but turbine cycle heat rate and boiler efficiency are guaranteed separately by the same supplier or different suppliers, the unit design heat rate shall be arrived at by using guaranteed turbine cycle heat rate and boiler efficiency:

Provided also that where the boiler efficiency is below 86% for Sub-bituminous Indian coal and 89% for bituminous imported coal, the same shall be considered as 86% and 89% respectively for Sub-bituminous Indian coal and bituminous imported coal for computation of station heat rate:

97. The petitioner vide affidavit dated 20.2.2018 in Form-2 has furnished the Turbine Cycle Heat Rate of 1971 kCal/ kWh and Boiler Efficiency of 82.36%. Considering the ceiling limits of 86% and 1955 (kCal/kWh) for boiler efficiency and Max. Turbine Heat Rate respectively, as provided in column 1 of the above, the Gross Station Heat Rate for the period 2016-19 for the generating station is computed as 2375 kcal/kWh (1.045 x 1955/0.86). Accordingly, the Station Heat Rate of 2375 kcal/ kWh for the period 2016-19 is considered.”

13. The Petitioner vide its affidavit dated 20.2.2018 in Form-2 has furnished the Turbine Cycle heat rate of 1971 kCal/kWh and Boiler Efficiency of 82.36%. Considering the Turbine Cycle heat rate of 1971 kCal/kWh and the boiler efficiency of 82.36%, the Design Unit Heat Rate works out as 2393.15 kCal/kWh (1971/0.8236). However, corresponding to the temperature & pressure of the generating station, as provided in the above regulation, the maximum Design Unit



Heat Rate allowed is 2273 kCal/kWh for Sub-bituminous Indian coal, based on capping of maximum Turbine Heat Rate of 1955 kCal/kWh and Boiler efficiency of 86%. Accordingly, Gross Station Heat Rate based on the formula is worked out as 2375.29 kCal/kWh ($1.045 \times 2273 = 2375.285$ kCal/kWh). It is therefore evident that the Commission in the said order had rounded off the SHR to 2375 kCal/kWh, instead of considering the SHR figures to two decimal places. It is pertinent to mention that in Order dated 6.2.2017 in Petition No. 372/GT/2014 (NTPC v UPPCL & ors), Order dated 8/1/2020 in Petition No. 199/GT/2017 (NTPC V APEPDCL & ors) and Order dated 6/1/2020 in Petition No. 178/GT/2017 (NTPC V MPPMCL & ors), the Commission had worked out and allowed the SHR upto two decimal places. Thus, it has been the consistent methodology of the Commission to work out and allow SHR to two decimal places in its orders determining tariff of thermal generating stations for the period 2014-19. In this background, we allow the review. The Commission's Order dated 29.4.2019 pertaining to SHR for the generating station for 2014-19 is corrected upto two decimal places as 2375.29 kCal/kWh. The revision of tariff on this count will be undertaken at the time of truing-up of tariff, in terms of Regulation 8 of the 2014 Tariff Regulations.

14. Petition No. 11/RP/2019 in Petition No. 74/GT/2017 is disposed of as above.

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

Sd/-
(P.K.Pujari)
Chairperson

