CENTRAL ELECTRICITY REGULATORY COMMISSION

NEW DELHI

Petition No. 235/TT/2018

Coram:

Shri P.K.Pujari, Chairperson Dr M. K. Iyer, Member Shri I.S.Jha, Member

Date of Order: 12.07.2019

In the matter of:

Approval under Regulation- 86 of CERC (Conduct of Business) Regulations, 1999 and CERC (Terms and Conditions of Tariff) Regulations, 2014 for determination of Transmission Tariff from DOCO to 31.03.2019 for 2 Nos 765 kV line Bays along with 2 nos. 330 MVAR Line reactor at Vindhyachal Pooling Station and 2 Nos 765 kV line Bays along with 2 nos. 330 MVAR Line reactor at Jabalpur Pooling Station for 765 kV D/C Vindhyachal Pooling Station-Jabalpur Pooling Station TL (TBCB) under "Substation Extensions for Transmission system associated with Vindhyachal-V Project of NTPC (Part-B)" for tariff block 2014-19 period.

Power Grid Corporation of India Limited "Saudamini", Plot No.2,
Sector-29, Gurgaon -122 001

.....Petitioner

Vs

- Madhya Pradesh Power Management Company Ltd. Shakti Bhawan, Rampur, Jabalpur - 482 008
- Madhya Pradesh Power Transmission Company Ltd. Shakti Bhawan, Rampur Jabalpur - 482 008



Madhyapradesh Audyogik Kendra Vikas Nigam (Indore) Ltd. 3/54, Press Complex, Agra-Bombay Road, Indore-452 008

 Maharashtra State Electricity Distribution Co. Ltd. Hongkong Bank Building, 3rd Floor M.G. Road, Fort, Mumbai- 400 001.

 Maharashtra State Electricity Transmission Co. Ltd. Prakashganga, 6th Floor, Plot No. C-19, E-Block, Bandra Kurla Complex, Bandra (East) Mumbai-400 051.

Gujarat Urja Vikas Nigam Ltd.
 Sardar Patel Vidyut Bhawan,
 Race Course Road, Vadodara - 390 007

 Gujarat Energy Transmission Corporation Limited Sardar Patel Vidyut Bhawan,
 Race Course Road, Vadodara - 390 007

Electricity Department
 Govt. Of Goa, Vidyut Bhawan, Panaji,
 Near Mandvi Hotel, Goa - 403 001

Electricity Department
 Administration Of Daman & Diu
 Daman - 396 210

Electricity Department
 Administration Of Dadra Nagar Haveli
 U.T., Silvassa - 396 230

Chhattisgarh State Electricity Board
 P.O.Sunder Nagar, Dangania, Raipur
 Chhattisgarh-492 013

Chhattisgarh State Power Transmission Co. Ltd.
 State Load Dispatch Building,
 Dangania, Raipur – 492 013



Chhattisgarh State Power Distribution Co. Ltd.
 P.O.Sunder Nagar, Dangania, Raipur
 Chhattisgarh-492 013

....Respondents

Parties present:

For Petitioner: Shri Zafrul Hassan, PGCIL

Shri S.K. Venkatesan, PGCIL

Shri S.S. Raju, PGCIL

Shri Pankaj Sharma, PGCIL

For Respondent: None

<u>ORDER</u>

The present petition has been filed by Power Grid Corporation of India Ltd. ("the petitioner") for determination of tariff for 2 Nos 765 kV line Bays along with 2 nos. 330 MVAR Line reactor at Vindhyachal Pooling Station and 2 Nos 765 kV line Bays along with 2 nos. 330 MVAR Line reactor at Jabalpur Pooling Station for 765 kV D/C Vindhyachal Pooling Station-Jabalpur Pooling Station TL (TBCB) under "Substation Extensions for Transmission system associated with Vindhyachal-V Project of NTPC (Part-B)" for tariff block 2014-19 period under Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014 (hereinafter referred to as "the 2014 Tariff Regulations").

- 2. The petitioner has made the following prayers:-
- i. Admit the capital cost as claimed in the Petition and approve the Additional Capitalization incurred / projected to be incurred.
- ii. Approve the Transmission Tariff for the tariff block 2014-19 block for the asset covered under this petition.



- iii. Tariff may be allowed on estimated completion cost.
- iv. Allow the petitioner to recover the shortfall or refund the excess Annual Fixed Charges, on account of Return on Equity due to change in applicable Minimum Alternate/Corporate Income Tax rate as per the Income Tax Act, 1961 (as amended from time to time) of the respective financial year directly without making any application before the Commission as provided under clause 25 of the Tariff regulations 2014
- v. Approve the reimbursement of expenditure by the beneficiaries towards petition filing fee, and expenditure on publishing of notices in newspapers in terms of Regulation 52 Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014, and other expenditure (if any) in relation to the filing of petition.
- vi. Allow the petitioner to bill and recover Licensee fee and RLDC fees and charges, separately from the respondents in terms of Regulation 52 Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014.
- vii. Allow tariff up to 90% of the Annual Fixed Charges in accordance with clause 7 (i) of Regulation 7 Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014 for purpose of inclusion in the PoC charges.
- viii. Allow the petitioner to bill tariff from actual DOCO.
- ix. Allow the petitioner to bill and recover GST on Transmission charges separately from the respondents, if GST on Transmission of electricity is withdrawn from the exempted (negative) list at any time in future. Further any taxes and duties including cess, etc. imposed by any Statutory/Govt./Municipal Authorities shall be allowed to be recovered from the beneficiaries
 - and pass such other relief as Hon'ble Commission deems fit and appropriate under the circumstances of the case and in the interest of justice.

Background

3. The Investment Approval (IA) for implementation of assets under "Substation Extensions for Transmission system associated with Vindhyachal-V Project of NTPC (Part-B)" was accorded by the Board of Directors of the petitioner in its 327th meeting held on 02.04.2016 for ₹ 28799 lakh including IDC of ₹ 1799 lakh based on October, 2015 price level vide Memorandum Ref: C/CP/IA/Vin- V Part B dated 06.04.2016.



- 4. The scope of work covered under "Substation Extensions for Transmission system associated with Vindhyachal-V Project of NTPC (Part-B)" is follows:-
 - (i) Extension of 765 kV Vindhyachal Pooling substation.
 - Line bays: 2 Nos.
 - 330 MVAR Line reactor: 2 Nos.
 - Line reactor bay: 2 Nos.

(ii) Extension of 765 kV Jabalpur Pooling substation.

- Line bays: 2 Nos.
- 330 MVAR Line reactor: 2 Nos.
- Line reactor bay: 2 Nos.
- 5. The petitioner in the instant petition has claimed tariff for the following assets which covers the entire scope of the project.

	Actual COD
2 Nos 765 kV line Bays along with 2 nos. 330 MVAr Line reactor at Vindhyachal Pooling Station and 2 Nos. 765 kV line Bays along with 2 nos. 330 MVAr Line reactor at Jabalpur Pooling Station for 765 kV D/C Vindhyachal Pooling Station-Jabalpur Pooling Station TL (TBCB)	

- 6. Annual Fixed Cost was allowed for the instant transmission asset vide order dated 28.02.2019 under the proviso (i) to Regulation 7(7) of the 2014 Tariff Regulations for inclusion in the PoC charges.
- 7. The details of the Annual Fixed Cost claimed by the petitioner based on actual COD is as under:-

Particulars	2018-19(pro-rata)
Depreciation	248.02
Interest on Loan	250.50
Return on Equity	276.67
Interest on Working Capital	20.88
O & M Expenses	96.20
Total	892.27

8. The details of the interest on working capital claimed by the Petitioner are as under:-

	(tin lakh)
Particulars	2018-19
O&M expenses	32.07
Maintenance Spares	57.72
Receivables	594.84
Total	684.63
Rate of Interest	12.20%
Interest on working capital	83.52
Interest on working capital	20.88

- 9. The petitioner has served the petition on the respondents and notice of this application has been published in the newspapers in accordance with Section 64 of the Electricity Act, 2003 (hereinafter referred to as the Act). No comments or suggestions have been received from the general public in response to the notices published by the petitioner under Section 64 of the Electricity Act, 2003. Madhya Pradesh Power Management Company Ltd (MPPMCL), Respondent No. 1 has filed reply vide affidavit dated 13.08.2018. MPPMCL has raised issue of implementation schedule, add-cap, taxes and initial spares etc. The petitioner has filed rejoinder dated 02.01.2019 to the reply of MPPMCL. We have considered the submissions made by the petitioner and MPPMCL in the instant petition. Having heard the representatives of the petitioner present at the hearing and having perused the material on record, we proceed to dispose of the petition.
- 10. This order has been issued after considering the main petition and petitioner's and respondent's affidavit(s) dated 27.07.2018, 13.08.2018, 02.01.2019, 22.01.2019, 18.03.2019, 15.04.2019, 18.04.2019 and 09.05.2019.

(Pro-Rata)

Date of Commercial Operation (COD)

11. Petitioner had filed the instant petition to claim tariff based on anticipated COD i.e. 01.10.2018 for the instant asset. Petitioner vide affidavit dated 18.3.2019 has submitted the actual COD as 1.1.2019 for subject assets matching with associated transmission line (765kV D/C Vindhyachal pooling station-Jabalpur Pooling Station transmission line) which has also been charged and put to use w.e.f. 1.1.2019. In support of COD, thereof, petitioner in affidavit dated 22.1.2019 has submitted, CEA Certificate dated 6.7.2018 & 29.8.2018 under Regulation 43 of CEA (measures related to safety & electric supply) Regulations, 2010, self declaration COD letter dated 17.1.2019, and, in affidavit dated 18.3.2019 has submitted RLDC Completion certificate dated 14.1.2019 issued by WRLDC in support of the claim of commercial operation in accordance with Regulation 6.3A (5) of the Central Electricity Regulatory Commission (Indian Electricity Grid Code) Regulations, 2010 which indicates the completion of successful trial operation, and CMD certificate certifying that, asset were ready & capable of operation to their full capacity w.e.f 29.12.2018 as per Grid Standard and Grid code.

12. Taking into consideration the RLDC certificates, CEA certificates and CMD certificate submitted by the petitioner in support of trial operation, the date of commercial operation is approved as 1.1.2019 as per the 2014 Tariff Regulations and has been considered for the purpose of tariff computation from COD till 31.3.2019.

Capital Cost

- 13. Clause (1) and (2) of Regulation 9 of the 2014 Tariff Regulations provide as follows:-
- "(1) The Capital cost as determined by the Commission after prudence check in accordance with this regulation shall form the basis of determination of tariff for



existing and new projects"

- (2) The Capital Cost of a new project shall include the following:
- (a) The expenditure incurred or projected to be incurred up to the date of commercial operation of the project;
- (b) Interest during construction and financing charges, on the loans (i) being equal to 70% of the funds deployed, in the event of the actual equity in excess of 30% of the funds deployed, by treating the excess equity as normative loan, or (ii) being equal to the actual amount of loan in the event of the actual equity less than 30% of the funds deployed;
- (c) Increase in cost in contract packages as approved by the Commission;
- (d) Interest during construction and incidental expenditure during construction as computed in accordance with Regulation 11 of these regulations;
- (e) Capitalised Initial spares subject to the ceiling rates specified in Regulation 13 of these regulations;
- (f) Expenditure on account of additional capitalization and de-capitalisation determined in accordance with Regulation 14 of these regulations; 39
- (g) Adjustment of revenue due to sale of infirm power in excess of fuel cost prior to the COD as specified under Regulation 18 of these regulations; and
- (h) Adjustment of any revenue earned by the transmission licensee by using the assets before COD."
- 14. The petitioner, vide affidavit dated 18.03.2019 has submitted the Auditor Certificate dated 11.03.2019 along with revised tariff forms for the subject asset based on actual COD i.e. 01.01.2019. The details of approved apportioned cost, capital cost as on the date of commercial operation and estimated additional capital expenditure incurred or projected to be incurred during 2018-19, 2019-20 and 2020-21 are given under:-

Apportioned	Expenditure	Pro	ojected Exp. for	FY	Estimated
Approved Cost (FR)	Up to DOCO	2018-19	2019-20	2020-21	Completion Cost
28798.68	18601.31	627.97	1584.96	185.52	20999.76



- 15. As per the Auditor Certificate, the Auditor has certified the capital cost up to 31.03.2018 based on the audited books of account of Power grid, Western Region –II, Vadodara and certified the expenditure from 01.04.2018 to 31.12.2018 after verification from the books of account and certified the projected expenditure is based on details furnished by the management.
- 16. It is difficult to reconcile the capital cost between the auditor certificate and the cost mentioned in Form- 4A and Form- 7 as the liability amount is not mentioned in auditor certificate. Therefore liability amount mentioned in tariff form 4A is relied upon to determine the allowable cost. The petitioner is directed to submit the Auditor certificate by clearly mentioning the liability amount and whether the certified cost is inclusive of liability or exclusive of liability at the time of true up for 2014-19 period.
- 17. Against the apportioned approved Cost of ₹ 28798.68 lakh, the expenditure up to COD is ₹ 18601.31 lakh and completion cost including additional capital expenditure is ₹ 20999.76 lakh. Therefore, there is no cost over-run.
- 18. From form-5 as submitted by petitioner in affidavit dated 18.3.2019, it is seen that, cost variation is mainly due to :
 - a) Site Preparation (Increase of ₹ 91.91 lakh): As per estimate, the cost was ₹ 40 lakh. However, due to high rate of bid received through competitive bidding, the actual cost incurred was ₹ 131.91 lakh and it resulted into an increase in actual cost by ₹ 91.91 lakh;
 - b) Misc. Civil works (Decrease of ₹ 2581.04 lakh): As per estimate, the cost for Misc. Civil works was ₹ 4340.31 lakh at the rate of ₹ 4340.31 lakh. However,

- due to low rate of bid at ₹ 1759.27 lakh as compared to estimate of ₹ 4340.31 lakh, it resulted into a decrease in actual cost by ₹ 2581.04 lakh.
- c) Switchgear (Decrease in cost of ₹ 790.42 lakh): As per estimate, the cost for 134 nos. of switchgear was ₹ 4101.74 lakh at the rate of ₹ 30.61 lakh per switchgear. However, due to low price received in bid at the rate of ₹ 25.08 lakh as compared to estimate rate of ₹ 30.6157 lakh, it resulted into a decrease in award rate and eventually actual cost incurred was ₹ 3311.32 lakh. This resulted into a decrease in cost of ₹ 790.42 lakh.
- d) Compensating Equipment (Decrease of ₹ 900.34 lakh): As per estimate, the cost for 14 nos. of Compensating equipment was ₹ 9707.60 lakh at the rate of ₹ 693.40 lakh per equipment. However, due to low price received in bid at the rate of ₹ 629.09 lakh per equipment as compared to estimated rate of ₹ 693.40 lakh per equipment. This resulted into a decrease in award rate and eventually actual cost incurred was ₹ 8807.26 lakh. This resulted into a decrease of ₹ 900.34 lakh.
- e) Control, relay and protection panel (increase in cost of ₹ 17.24 lakh): As per estimate, the cost for 27 nos. of control, relay and protection panel was ₹ 699.84 lakh. However, on actual, the quantity increased from 27 nos. to 28 nos. and actual cost incurred was ₹ 717.08 lakh, against estimate cost of ₹ 699.84 lakh and it resulted into an increase in actual cost by ₹17.24 lakh.
- f) PLCC (Decrease of ₹ 109.28 lakh): As per estimate, the cost was ₹ 295.92 lakh. However, on actual, due to low bid price received through competitive bidding, the cost incurred was ₹ 186.64 lakh as against the estimate of ₹ 295.92 lakh and it resulted into overall decrease in cost by ₹ 109.28 lakh.
- g) Bus bars/conductors/insulators (Increase of ₹ 34.39 lakh): As per estimate, the cost was for 1 no of Bus bar/conductor/insulator was ₹ 985.38 lakh. However, due to high rate of bid received through competitive bidding, the actual cost incurred was ₹ 1019.77 lakh and it resulted into an increase in actual cost by ₹



34.39 lakh;

- h) Outdoor lighting (Decrease of ₹ 17.37 lakh): As per estimate, the cost for outdoor lighting was ₹ 45.72 lakh. However, on actual, due to low bid price received through competitive bidding, the cost incurred was ₹ 28.35 lakh as against the estimate of ₹ 45.72 lakh and it resulted into overall decrease in cost by ₹ 17.37 lakh.
- i) Structure for switchyard (Decrease in cost of ₹ 126.87 lakh): As per estimate, the rate for 1 no of structure for switchyard was ₹ 3072.52 lakh. However, low price was received in bidding at rate of ₹ 2945.65 lakh/ switchyard, against estimated rate of ₹ 3072.52 lakh/switchyard. It resulted into an overall decrease in cost by ₹126.87 lakh.
- j) Auxiliary System (Increase in cost of ₹ 279.78 lakh): As per estimate, the rate for 1 no of auxiliary system was ₹ 445.31 lakh. However, high price received in bidding at the rate of ₹ 725.09 lakh, against estimated rate of ₹ 445.31 lakh, resulted into an overall increase in cost by ₹ 279.78 lakh.
- k) Overheads including IEDC and IDC: There is a decrease of ₹ 2951.05 lakh and ₹ 744.84 lakh respectively in Overheads including IEDC and IDC due to actual booking as compared to FR.
- 19. On perusal of Form-5 it is seen that overall reduction in the project completion cost is ₹ 7798.92 lakh out of which the main reduction in cost is due to reduction of cost of Misc. Civil works, Switchgear, Compensating Equipment, PLCC, Outdoor lighting, Structure for switchyard by about ₹ 4525.32 lakh as compared to FR estimate and increase of ₹ 423.32 lakh in items of site preparation, control and relay panel, bus bar/conductor/insulator and auxiliary system. The remaining decrease is due to reduction of ₹ 3695.89 lakh due to actual booking cost of overheads and IDC in comparison to FR estimate.



20. In view of the above, we are of the view that the reduction in cost is mainly because of prevailing market condition and actual booking cost of overheads and IDC which were beyond the control of the petitioner and accordingly, the reduced cost is considered for the grant of tariff.

Time over-run

- 21. As per the Investment approval, the transmission scheme was scheduled to be commissioned in 27 months from the date of investment approval. The date of Investment Approval is 02.04.2016. Hence, the SCOD comes to 01.07.2018 against which COD of the Asset is 01.01.2019. Thus, there is a time over-run of 184 days in the commissioning of instant asset.
- 22. Petitioner in main petition has made submissions that time overrun in commissioning of the subject asset is due to time overrun in the commissioning of associated transmission lines (765kV D/C Vindhyachal pooling station-Jabalpur Pooling Station transmission line (TBCB line)) which is being constructed by the Petitioner itself.

Asset	Time line	Date of Investment approval	SCOD	Actual COD	Time overrun
Asset	27 months	2.4.2016	1.7.2018	1.1.2019	6months

23. Respondent no.1, MPPMCL in affidavit dated 13.8.2018 has made submissions that petitioner is hiding its inefficiency under the cover of charging of associated TBCB transmission lines and further, asset covered under instant petition and TBCB lines asset, are both different, having different time line schedule, different approval and work force and hence date of commissioning cannot be seen in total and therefore, time

overrun should be attributable to the petitioner.

- 24. In response, petitioner, filed its rejoinder dated 2.1.2019 and made submissions that the subject assets are being installed for 765kV D/C Vindhyachal pooling station-Jabalpur Pooling Station transmission line which is being constructed under TBCB. Since, the associated transmission line is delayed due to severe RoW issues, the associated bays and line reactors being installed by the petitioner are also delayed to match with the commissioning of above mentioned transmission line.
- 25. In response to the query of the Commission regarding details of reason for time overrun, petitioner vide affidavit dated 18.3.2019 has submitted as under:
 - i. The detailed reasons for time over-run in case of the assets covered in the instant petition and chronology of activities along with documentary evidence is furnished below:

S. No.	Activity	Schedule		Actual		Remarks
		From	То	From	То	•
1	LOA	2.5.2016	•	22.4.2016		
2	Supply of structure, Equipment etc.	19.8.2016	22.3.2018	2.9.2016	19.3.2018	
3	Civil works and erection	30.9.2016	23.5.2018	11.8.2016	15.2.2018	
4	Testing and Commissioning	24.5.2018	25.6.2018	8.2.2018	1.1.2019	
5	RoW issues					
6	Any other delay, if any	Powergrid planned the commissioning schedule of the subject bays matching with the commissioning of associated TBCB line. However, implementation of 765kV D/C Vindhyachal PS Jabalpur PS (TBCB) line was effected due to severe RoV issues in Katni, Singrauli and Satna districts.			associated achal PS-	

The detailed chronology of events regarding Row issues encountered in the ii. implementation of 765kV D/C Vindhyachal - Jabalpur TL (TBCB) is furnished below:-

RoW iss	ues -Vindhyachal - Jabalpur (TBCB)	
Sr. No.	Description	Date
1	Letter to Police Station Incharge, Kaimur to take necessary action against the causes of obstruction at loc. 222/2	21.10.2016
2	Letter to ADM, Singrauli to give direction to revenue officials for timely processing of land compensation.	5.12.2016
3	Guideline of Addl. Collector, Singrauli to Sub-divisional officer (Revenue), Singrauli, Mada&Devsar regarding land compensation payment	14.12.2016
4	Request letter to the Under Secretary, Office of Chief secretary Gov. of MP for appointment of meeting with Chief Secretary on 6.1.2017	4.1.2017
5	Request letter to the Dy. Secretary, Office of Chief secretary Gov. of MP for appointment of meeting with Chief Secretary on 5.3.2017	4.3.2017
6	Letter to Subdivisional officer, Maihar, Satna for the support to move hindrance at loction 215/0	17.4.2017
7	Letter to District magistrate, Katni for the support to remove hindrance at Vill. Nanhavar, Badgaiya, Sailaiya&DurjnpurTeh- Vijayraghavgarh	20.4.2017
9	Letter to District magistrate, Satna for support to clear the RoW issue at Ramnagar	8.5.2017
10	MP Gov. Order regarding land compensation	11.5.2017
11	Letter to the Chief Secretary, Govt of MP to inform the alarming situation at loc. No. 215/0	19.5.2017
12	Letter to Add. Secretary(Home), Govt of MP to inform the alarming situation at loc. No. 215/0	19.5.2017
13	Letter to the Director Gen. of Police, Govt of MP to inform the alarming situation at loc. No. 215/0	19.5.2017
14	Letter to SDOP, Vijayraghavgarh, Katani to provide Police Force at loc 223/1 to remove the obstruction	22.5.2017
15	Letter to District magistrate, Satna to issue guideline to remove the obstruction in Satna district	22.5.2017
16	Letter to Police Incharge, Satna to file FIR against the Anti-social elements at Vil Badera	29.5.2017
17	Letter to District Magistrate, Satna regarding creation of obstacle and threat by anti-social elements at Vil Lataganv, Bihara, Sakara&Etahara The-Maihar	29.5.2017
18	Letter to subdivisional officer, Vijayraghavgarh, Katni for his support to start work at 220/0, 221/3, 223/0 & 223/1	6.6.2017
19	Letter to subdivisional officer, Vijayraghavgarh, Katni to instruct Police station in charge to take action according section-16 of Electricity act at location 223/0	10.6.2017
20	Request letter to the Staff Officer, Office of Addl. Chief Secretary(Home), Gov. of MP for appointment of meeting with Chief Secretary on 18.7.2017	17.7.2017
21	Letter to Sub-divisional officer, Satna to redressal the ROW issue in Ramanagar The.	17.8.2017

22	Letter to Subdivisional Officer, Maihar, Satna to provide police force to remove obstruction at loc. 221/1	24.8.2017
23	Letter to District Magistrate, Satna for the disruption of the generated obstacle at location 212/1	25.8.2017
24	Letter to SHO, Ramnagar, Satna to take action against the farmer creating obstructionat loc. 204/2	
25	Letter to Police Superintendent, Satna to inform about incident happened at loc 204/2 and request to support in matter	14.9.2017
26	Letter to Police Superintendent, Satna to provide 10+2 armed force for 1 month for execution of work in Maihar and Ramnagar	19.9.2017
27	Letter to Subdivisional officer, Satna to redressal of RoW issues in Ramnagar Tehsil	4.10.2017
28	Letter to Station Inchrage to take necessary action against land owner creating obstacle	16.10.2017
29	Letter to DM, Sahdol for provinding support in execution of work at Vill. Jhiriya, Nimiha, janakpur, Dhani no. 2 &Gopalpur	27.11.2017
30	Letter to Sub-Divisional Officer ,VyohariDistt- Shehdol to provide support in execution of work at loc. No. 133/0, 137/0 , 140/0, 141/0, 142/0, 143/2, 143/3 & 143/4	18.12.2017
31	Letter to Station Incharge, Ramnagar to take necessary action against land owner creating obstacle at loc. 199/4	19.12.2017
32	Letter to Sub-divisional Officer, Ramnagar to issue the tree cutting order for trees within RoW corridor	26.12.2017
33	Letter to Sub-divisional officer, Majhauli, Sidhi to direct the concerned official to redressalRoW issues at loc 116/0 , 117A/1 & 117A/2	
34	Letter to Shri Shiv muratVill. Budva, The-Vyohari to stop the construction of house in Transmission line corridor	
35	Letter to Police Superintendent, Katni to file FIR against Shri Mohan SvaroopDubey for creating obstruction and giving threat to the worker in The- Vijayraghavgarh	27.12.2017
36	Letter to Sub-divisional Officer, Satna to redressal the RoW issue in Ramnagar Tehsil	27.12.2017
37	Letter to DM, Sahdol for provinding support in execution of work at loc. No. 133/0, 137/0, 137/3, 140/0, 141/0 & 142/0	2.1.2018
38	Letter to DM, Sahdol to issue tree cutting order at VyohariTehshil	2.1.2018
39	Letter to District Magistrate, Sidhi to direct concerned officer to redressal the ROW issues	2.1.2018
40	Demand Letter of Police Superintendent, Singrauli to Powergrid for providing 8-2 Police force for 1 month	19.1.2018
41	Letter to Police Superintendent, Singrauli to inform the payment of the expenditure towards providing 8-2 Police Force to Powergrid	
42	Letter of Police Superintendent, Singrauli to Reserve Inspector, Singrauli for providing 8-2 Police force for 1 month to Powergrid	
43	Letter to Sub-divisional officer, Satna to redressal the RoW issue in Ramanagar tehsil at loc. 199/4	1.2.2018
44	Letter to Sub-divisional officer, Majhauli, Sidhi to direct the concerned official to redressalRoW issues at loc 112/0, 112/1 & 112/2	1.2.2018
45	Office order, Sub-divisional officer Devsar, Distt. Singrauli regarding committee formation for assesment of land compensation	5.2.2018
46	Letter to Subdivisional Officer, Maihar, Satna to redressal of obstacle caused by land owner at loc 210/0, 210/1, 210/2 & 211/0	8.2.2018

47	Letter to Police station incharge, Ramnagar to redressal the obstacle by land owner in Kandvarivill.	9.2.2018
48	Office order, Sub-divisional officer Singrauli, Distt. Singrauli regarding committee formation for assesment of land compensation	12.2.2018
49	Letter to Subdivisional Officer, Majhauli, Sidhi to redressal the RoW issues at loc. 117A/1 & 117A/2	13.2.2018
50	Office order, Sub-divisional officer Mada, Distt. Singrauli regarding committee formation for assessment of land compensation	15.2.2018
51	Letter to Subdivisional officer, Satna to take necessary action against land owner creating obstruction in stringing at loc. 155/0-157/0	16.2.2018
52	Letter to District Magistrate, Sidhi to direct concerned officer to redressal the ROW issues	21.2.2018
53	Letter to Lead Long term Transmission Customers regarding the Force Majeure - RoW issues in Mada Tehsil of Singrauli District (3 Loc.), Majhauli Tehsil of Sidhi District (3 Loc.), Beohari Tehsil of Shahdol District (5 Loc.), Maihar and Ramnagar Tehsil od Satna District (62 Loc.), Vijayraghavgarh Tehsil of Katni District (9 Loc.) in Madhya Pradesh	5.2.2018
54	Letter to Lead Long term Transmission Customers regarding the Force Majeure - RoW issues in Maihar and Ramnagar Tehsil od Satna District (29 Loc.), Vijayraghavgarh Tehsil of Katni District (5 Loc.) in Madhya Pradesh	7.4.2018
55	Letter to Lead Long term Transmission Customers regarding the Force Majeure - RoW issues encountered at Tower Loc. No. 207/2 & 207/3 of Vill-Gauriya, Maihar-Tehsil, Satna-District in Madhya Pradesh	10.8.2018
56	Letter to Lead Long term Transmission Customers regarding the Force Majeure - RoW issues still continuing in Maihar&Ramnagar Tehsil of Satna District in Madhya Pradesh	9.11.2018
57	Letter to Lead Long term Transmission Customers regarding the Cessation of Force Majeure (for Force Majeure Letter issued on 5.2.2018) - RoW issues in Mada Tehsil of Singrauli District (3 Loc.), Majhauli Tehsil of Sidhi District (3 Loc.), Beohari Tehsil of Shahdol District (5 Loc.), Maihar and Ramnagar Tehsil od Satna District (62 Loc.), Vijayraghavgarh Tehsil of Katni District (9 Loc.) in Madhya Pradesh	31.12.2018
58	Letter to Lead Long term Transmission Customers regarding the Cessation of Force Majeure (for Force Majeure Letter issued on 07.04.2018) - RoW issues in Maihar and Ramnagar Tehsil od Satna District (29 Loc.), Vijayraghavgarh Tehsil of Katni District (5 Loc.) in Madhya Pradesh	31.12.2018
59	Letter to Lead Long term Transmission Customers regarding the Cessation of Force Majeure (for Force Majeure Letter issued on 10.08.2018) - RoW issues encountered at Tower Loc. No. 207/2 & 207/3 of Vill-Gauriya, Maihar-Tehsil, Satna-District in Madhya Pradesh	31.12.2018
60	Letter to Lead Long term Transmission Customers regarding the Cessation of Force Majeure (for Force Majeure Letter issued on 09.11.2018) - RoW issues still continuing in Maihar&Ramnagar Tehsil of Satna District in Madhya Pradesh	31.12.2018

Based on above, petitioner has made submissions that the delay in the 26. commissioning of subject asset is due to delay in the commissioning of associated



transmission line i.e. 765kV D/C Vindhyachal-Jabalpur TL (TBCB) which was delayed due to severe RoW issues in Katni, Singrauli and Satna districts. Since, the reason of delay in the commissioning of associated transmission line was beyond the control of the petitioner, the Petitioner has requested to condone the time over-run and allow the entire cost and tariff as claimed under subject petition.

27. We have considered the submissions made by petitioner and MPPMCL. Against the 27 months' timeline for completion of project, the schedule (SCOD) was 1.7.2018, against which the COD of subject asset has been approved as 1.1.2019 with a time overrun of 184 days. Petitioner has made submissions that the subject assets are being installed for 765kV D/C Vindhyachal pooling station-Jabalpur Pooling Station transmission line which is being constructed under TBCB. Since the associated transmission line is delayed due to severe RoW issues, the Petitioner has submitted that associated bays and line reactors being installed by the petitioner are also delayed to match with the commissioning of above mentioned transmission line. Further, petitioner has submitted chronology of events of RoW (from 21.10.2016 to 31.12.2018=26 months 11 days)

28. From the activities (schedule Vs actual) as at table in paragraph 25, it is seen that out of total 27 months' time line, 1 month was kept for LOA (letter of award) and remaining 26 months was kept for completion of other activities like: Supply of structure/equipment, Civil works & erection and Testing and Commissioning. Against, which petitioner placed letter of award on 22.4.2016 i.e. after investment approval dated 2.4.2016 (i.e. after 20 days of investment approval dated 2.4.2016) i.e. within time line as decided of 1 month. Further, it is seen that for activities like Supply of

structure/equipment and Civil works and erection, the timeline was of 21 months 05 days, against which these activities have been completed in 17 months 14 days. Therefore, before the SCOD date of 1.7.2018, petitioner had completed the work of LOA, Supply of structure, equipments, civil works and erection. After completion of activities like: Supply of structure/Equipments, Civil works & erection between 22.4.2016 to 15.2.2018 (time taken: 21 months 25 days), petitioner started the work of testing and commissioning on 8.2.2018, i.e. before SCOD date of 1.7.2018, and work was in progress. However, Petitioner couldn't complete subject assets as associated transmission lines (765kV D/C Vindhyachal pooling station-Jabalpur Pooling Station transmission line (TBCB line)) was not commissioned due to ROW issues and finally, matching with associated above TBCB line, subject assets got commissioned on 1.1.2019.

- 29. The Investment Approval dated 6.4.2016 stipulates the scheduled completion of instant asset as June 2018, matching with the commissioning schedule of Vindhyachal Pooling Station Jabalpur Pooling Station 765 kV line being implemented through TBCB route. Hence, there was a mandate to complete the instant project matching with the TBCB line.
- 30. The Instant project comprises of providing 765 kV line bays and 330 MVAR line reactors at both ends of the TBCB line. Therefore, the instant project is an integrated part of the TBCB line. Accordingly, the instant assets could not have been completed in isolation as its completion is interdependent on the TBCB line. The testing and commissioning of the line bays including various equipments, line reactors, communication system on rated voltage could be done once the TBCB line was made

available and both substation ends were connected to it. Although, the petitioner started the testing and commissioning activities on 8.2.2018 before the SCOD of 1.7.2018 but could complete the testing and commissioning activities on 1.1.2019 matching with the TBCB line. As already brought out above, the TBCB line was delayed due to severe ROW issues between 21.10.2016 to 31.12.2018.

31. In view of the above, we find merit in the submissions of the petitioner that the time over -run in the instant asset was caused because of delay in implementation of TBCB line due to ROW problems. Therefore, the time over-run of 184 days is condoned

Interest During Construction (IDC)

32. The petitioner has claimed IDC for instant asset and has submitted the Auditor's certificate dated 11.03.2019 in support of the same. The petitioner has submitted IDC computation statement which also shows the discharge details of IDC given below:-

			(₹ in lakn)
Asset	IDC As per	IDC Discharged	IDC
	Auditor certificate	up to COD	Discharged in 2019-20
Asset	1054.55	950.98	103.57

33. The statement showing IDC consist of the name of the loan, drawl date, loan amount, interest rate and Interest claimed. It is observed that the loan drawn after the actual COD is forming part of the loan portfolio as on COD. The petitioner has not provided the rate of interest for the loan bearing the floating rate of interest. Commission vide RoP dated, has directed the petitioner to submit documentary proof for rate of interest and repayment schedule for SBI, HDFC and ICICI loans. Petitioner vide affidavit

dated 09.05.2019 has submitted copy of letters from SBI as proof for rate of interest which is incomplete and does not correlate with the loan given in IDC statement. The petitioner has submitted facility agreement dated 21.03.2012, 19.04.2014 and 24.03.2017 entered with SBI as documentary proof for repayment of SBI loans, which shows that repayment of SBI loans starts from 31.08.2016, 15.06.2019 and 27.09.2022 respectively. However, the petitioner has not shown any repayment of SBI loan in Form 9C which is used for computation of Weighted average rate of interest for actual loan portfolio. Moreover, the loan portfolio as mentioned in IDC statement for the instant asset is ₹ 13020.92 lakh which is higher than the loan amount as on COD as shown in Form 9C and Form 6 (i.e. ₹ 12948.42 lakh), which leads to consideration of higher loan amount for IDC and lesser loan amount to determine the Debt Equity Ratio. Therefore, the petitioner is directed to clarify the deviation and submit the IDC statement by reconciling all the deviations at the time of true up.

- 34. The IDC claimied in Auditor certificate has been considered for determination of tariff in the isntat petition which will be reviewed at the time of true up on receipt of the revised IDC statement as stated above.
- 35. Based on the above, allowable IDC has been worked out as summarized below:-

	IDC claimed as	IDC on cash basis as	Un-discharged
Asset	per Auditor	on COD as per IDC	IDC liability as
	certificate	statement	on COD
	1	2	3=1-2
Asset	1054.55	950.98	103.57
1			

Incidental Expenditure During Construction (IEDC)

36. The petitioner vide Auditor's Certificate dated 11.03.2019 has claimed IEDC of ₹ 312.95 lakh for the instant asset. In the instant petition, 10.75% of hard cost is indicated as IEDC in the abstract cost estimate. The claimed IEDC as on COD is within the percentage on hard cost as indicated in the abstract cost estimate. Accordingly, entire IEDC of ₹ 312.95 lakh is being considered for determination of tariff in respect of instant Asset.

Initial spares

37. This has been dealt in line with Regulation 13 of the 2014 Tariff Regulations. The petitioner has claimed ₹ 296.61 lakh as initial spares pertaining to substation for the instant asset. The ceiling limit of initial spare as per 2014 Tariff Regulation for brown filed substation is 6%. The spares claimed are within the ceiling limit. Thus, no initial spares have been reduced from the capital cost as on COD.

Capital cost as on COD

38. Based on the above, the capital cost allowed as on COD under Regulation 9(2) of the 2014 Tariff Regulations is summarized as under:-

Asset	Capital Cost	Un discharged	Capital Cost as on COD
	claimed as on	IDC liability	considered for tariff
	COD	(B)	calculation
	(A)	, ,	(C)=A-B
Asset	18601.31	103.57	18497.74

Additional Capital Expenditure (ACE)

39. The cut-off date for the instant asset is 31.3.2022, as per Clause (13) of Regulation 3 of the 2014 Tariff Regulations. The claim of additional capital expenditure has been dealt in accordance with Regulation 14. The ACE claimed as per Auditor certificates on projected basis is given below:-

(₹ in lakh)

Accet	Estima	ted Expenditure in	Total Additional capital expenditure claimed by		
Asset	2018-19	2019-20	2020-21	petitioner up to cut-off date	
Asset	627.97	1548.96	185.52	2362.45	

40. The petitioner in Form 4 has mentioned that ₹ 886.77 lakh is the un-discharged liability as on COD which includes the IDC liability of ₹ 103.57 lakh. The IDC liability as on COD has been estimated to be discharged during 2019-20 (i.e. during the next tariff period). As discussed in IDC paragraph, the entitled IDC liability shall be reviewed at the time of true up. The petitioner has claimed estimated discharge of liability amounting ₹ 627.97 lakh for the year 2018-19 which has been allowed under Regulation 14(1)(i). There is no addition into Gross block during the period from DOCO to 31.03.2019. Based on the above, the Additional Capital expenditure allowed for the instant asset is shown below which is subject to true up:-

Particulars	Regulation	2018-19
Discharge of Liability on Hard Cost	14(1)(i)	627.97
Add cap to the extent of unexecuted work	14(1)(ii)	0.00
Discharge of un discharge liabilities-IDC.	14(1)(i)	0.00
Total allowed add-cap	627.97	

Capital cost as on 31.3.2019

41. The capital cost considered for the purpose of computation of tariff is as follows:-

(₹ in lakh)

Asset	Capital Cost Allowed as on COD	Projected ACE Allowed for FY 2018-19	Total Estimated Completion Cost as on 31.3.2019
Asset	18497.74	627.97	19125.71

Debt-Equity Ratio

42. Debt: Equity Ratio is considered as per Regulation 19 of the 2014 tariff Regulations. The financial package up to COD as submitted in form 6 has been considered to determine the debt equity Ratio. The capital cost allowed as on the date of commercial operation arrived at as above and additional capitalization allowed have been considered in the debt-equity ratio of 70:30. The debt-equity as on dates of commercial operation and as on 31.3.2019 considered on normative basis are as under:-

(₹ in lakh)

Particular	Capital cost as on COD		Capital cost as on 31.3.2019	
	Amount	%	Amount	%
Debt	12948.42	70.00	13388.00	70.00
Equity	5549.32	30.00	5737.71	30.00
Total	18497.74	100.00	19125.71	100.00

Return on Equity

43. The petitioner has submitted that RoE has been calculated at the rate of 19.610% after grossing up the RoE with MAT rate of 20.961% as per the above Regulations. The petitioner has further submitted that the grossed up RoE is subject to truing up based on the effective tax rate of respective financial year applicable to the petitioner company.

44. We have considered the submissions made by the petitioner and 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. 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.

45. Accordingly, the RoE allowed is as follows:-

(₹ in lakh)

Particulars	2018-19 (pro-rata)
Opening Equity	5549.32
Addition due to Additional Capitalization	188.39
Closing Equity	5737.71
Average Equity	5643.52
Return on Equity (Base Rate)	15.50%
MAT rate for the Financial year 2013-14	20.961%
Rate of Return on Equity (Pre-tax)	19.610%
Return on Equity (Pre-tax)	272.88

Interest on loan (IOL)

- 46. The IoL has been calculated as per the provisions of Regulation 26 of the 2014 Tariff Regulations as detailed below:
 - a) The Gross Normative loan has been considered as per the Loan amount determined based on the debt equity ratio applied on the allowed capital cost.
 - b) The depreciation of every year has been considered as Normative repayment of loan of concerned year;
 - c) The weighted average rate of interest on actual loan portfolio has been worked



out by considering the Gross amount of loan, repayment & rate of interest as mentioned in the petition, which has been applied on the normative average loan during the year to arrive at the interest on loan.

- 47. The petitioner has submitted that the loL has been claimed on the basis of rate prevailing as on COD and the change in interest due to floating rate of interest applicable, if any, needs to be claimed/ adjusted over the tariff block 2014-19. We have calculated loL on the basis of rate prevailing as on the date of commercial operation. Any change in rate of interest subsequent to the date of commercial operation will be considered at the time of truing-up. The loL is allowed considering all the loans submitted in Form-9C. The petitioner is directed to reconcile the total Gross Loan for the calculation of Weighted Average Rate of Interest and for the calculation of IDC, which would be reviewed at the time of truing-up.
- 48. Based on above, details of IoL calculated are as follows:-

(₹ in lakh) Particulars 2018-19 (pro-rata) **Gross Normative Loan** 12948.42 Cumulative Repayment up to previous Year 0.00 **Net Loan-Opening** 12948.42 Addition due to Additional Capitalization 439.58 Repayment during the year 244.62 Net Loan-Closing 13143.38 13045.90 Average Loan Weighted Average Rate of Interest on Loan 7.6816% Interest on Loan 247.10

Depreciation

49. Depreciation has been dealt with in line of Regulation 27 of 2014 Tariff Regulations. The instant transmission Asset was put under commercial operation during 2018-19. Accordingly, it will complete 12 years after 2018-19. As such, depreciation has



been calculated annually based on Straight Line Method at the rates specified in Appendix-II to the 2014 Tariff Regulations. Details of the depreciation allowed are as under:-

(₹ in lakh)

Particulars	2018-19
	(pro-rata)
Opening Gross Block	18497.74
Additional Capital expenditure	627.97
Closing Gross Block	19125.71
Average Gross Block	18811.73
Rate of Depreciation	5.2737%
Depreciable Value	16884.54
Remaining Depreciable Value	16884.54
Depreciation	244.62

Operation and Maintenance Expenses (O&M Expenses)

- 50. The petitioner has claimed O&M expenses of ₹ 96.20 lakh for 2018-19 in the instant petition.
- 51. The petitioner has submitted that norms for O&M Expenses for the tariff period 2014-19 have been arrived on the basis of normalized actual O&M Expenses during the period 2008-13. The petitioner has further submitted that the wage revision of the employees of the petitioner is due during the 2014-19 tariff period and actual impact of wage hike, which will be effective at a future date, has not been factored in fixation of the normative O&M rate specified for the tariff period 2014-19. The petitioner has submitted that it would approach the Commission for suitable revision in norms for O&M Expenses for claiming the impact of wage hike during 2014-19, if any.
- 52. Regulation 29(4)(a) of the 2014 Tariff Regulations the normative O&M Expenses specified for the instant transmission assets are as under

(₹ in lakh)

	(\ 111 1\(\alpha\)
Element	2018-19
765 kV bays (in ₹ lakh/bays)	96.20

53. We have considered the submissions of petitioner and respondents. The O&M Expenses have been worked out as per the norms of O&M Expenses specified in the 2014 Tariff Regulations. As regards impact of wage revision, we would like to clarify that any application filed by the petitioner in this regard will be dealt with in accordance with the appropriate provisions of the 2014 Tariff Regulations. Accordingly, the O&M Expenses have been allowed as under:

(₹ in lakh)

Element	2018-19 (pro-rata)
4 nos. of 765 kV line bays	94.88

Interest on Working Capital (IWC)

54. As per the 2014 Tariff Regulations the components of the working capital and the interest thereon are discussed hereinafter:-

a) Maintenance spares:

Maintenance spares @ 15 % of Operation and Maintenance expenses specified in Regulation 28.

b) O & M expenses:

O&M expenses have been considered for one month of the O&M expenses.

c) Receivables:

The receivables have been worked out on the basis of 2 months' of annual fixed cost as worked out above.

d) Rate of interest on working capital:

As per Clause 28 (3) of the 2014 Tariff Regulations, SBI Base Rate (8.70%) as on 01.04.2018 Plus 350 Bps i.e. 12.20% have been considered as the rate of interest on working capital for the asset.



55. Accordingly, the interest on working capital is summarized as under:-

(₹ in lakh)

Particulars	2018-19 (pro-rata)
Maintenance Spares	57.72
O & M expenses	32.07
Receivables	594.87
Total	684.65
Rate of Interest on working capital	12.20%
Interest in Working Capital	20.60

Annual Fixed Cost

56. In view of the above, the annual transmission charges being allowed for the instant asset is summarized hereunder:-

₹ in lakh)

Particulars	2018-19 (pro-rata)
Depreciation	244.62
Interest on Loan	247.10
Return on Equity	272.88
Interest on Working Capital	20.60
O&MExpenses	94.88
Total	880.08

Filing Fee and Publication Expenses

57. The petitioner has sought reimbursement of fee paid by it for filing the petition and publication expenses, in terms of Regulation 52 of the 2014 Tariff Regulations. The petitioner is entitled for reimbursement of the filing fees and publication expenses in connection with the present petition, directly from the beneficiaries on pro-rata basis in accordance with clause (1) of Regulation 52 of the 2014 Tariff Regulations.

License Fee and RLDC Fees and Charges

58. The petitioner has requested to allow the petitioner to bill and recover License fee and RLDC fees and charges, separately from the respondents. The petitioner shall be entitled for reimbursement of license fee and RLDC fees and charges in accordance with Clause (2) (b) and (2) (a), respectively, of Regulation 52 of the 2014 Tariff Regulations.

Goods and Services Tax

59. The petitioner has prayed for reimbursement of tax, if any, on account of proposed implementation of GST. GST is not levied on transmission service at present and we are of the view that petitioner's prayer is premature.

Sharing of Transmission Charges

- 60. Transmission charges for all the assets allowed in this order shall be recovered on monthly basis in accordance with Regulation 43 of the 2014 Tariff Regulations. The billing, collection and disbursement of the transmission charges approved shall be governed by the provisions of Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, as amended from time to time.
- 61. This order disposes of Petition No. 235/TT/2018.

Sd/- Sd/- Sd/
(I.S.Jha) (Dr. M. K. Iyer) (P. K. Pujari)

Member Member Chairperson