

CENTRAL ELECTRICITY REGULATORY COMMISSION

NEW DELHI

Petition No. 243/TT/2018

Coram:

Shri. P.K.Pujari, Chairperson

Dr. M.K.Iyer, Member

Shri. I.S. Jha, Member

Date of Order: 11.04.2019

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 Expansion and Replacement of existing SCADA/EMS System at SLDC's of Northern Region (NR ULDC Phase-II)".

And in the matter of:

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

.....Petitioner

Vs

Power Development Deptt.
Govt. Of Jammu & Kashmir
Mini Secretariat, Jammu

.....Respondent

Parties present:

For Petitioner: Shri Anshul Garg, PGCIL
Shri Zafrul Hasan, PGCIL
Shri V.P. Rastogi, PGCIL
Shri S.K. Venkatesh, PGCIL
Shri S.S. Raju, PGCIL
Shri B Dash, PGCIL
Shri S.K. Niranjana



For Respondent: None

ORDER

The present petition has been filed by the Petitioner, Power Grid Corporation of India Limited for determination of Transmission Tariff from DOCO to 31.03.2019 for Expansion and Replacement of existing SCADA/EMS System at SLDCs of Northern Region (NR ULDC Phase-II) under Central Electricity Regulatory Commission (Terms and Condition of Tariff) Regulations, 2014 (herein after referred to as the “2014 Tariff Regulations”).

2. The Petitioner has made the following prayer:

- i) Approve the Transmission Tariff for the tariff block 2014-19 blocks for the asset covered under this petition.
- ii) Admit the capital cost as claimed in the Petition and approve the Additional Capitalization projected to be incurred.
- iii) Allow tariff as 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.
- iv) Condone the delay in completion of subject assets on merit of the same being out of the control of Petitioner in line with CERC Regulations, 2014 12(2)(i) “uncontrollable factors”
- v) 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 2014 Tariff Regulations.

- vi) 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 of Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014, and other expenditure (if any) in relation to the filing of petition.
- vii) Allow the Petitioner to bill and recover Licensee fee and RLDC fees and charges, separately from the Respondents in terms of Regulation 52 of Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014.
- viii) Allow the Petitioner to bill and adjust impact of Interest on Loan due to change in Interest rate on account of floating rate of interest applicable during 2014-19 period, if any, from the Respondents.
- 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.
- x) Allow the petitioner to bill tariff from actual DOCO.



Background

3. The Investment Approval (IA) for implementation of “Expansion and Replacement of Existing SCADA/EMS System at SLDCs of Northern Region (NR ULDC Phase-II) at the Estimated Cost of ₹70.90 Crore including IDC of ₹5.48 Crore (at 2nd quarter, 2011 price level)” was accorded by the Board of Directors of the Petitioner vide the Memorandum Ref: C/CP/NR-ULDC(II) dated 7.8.2012, at an estimated cost of ₹70.90 Crore including IDC of ₹5.48 Crore.

4. The scope of the scheme was discussed and agreed in 7th and 8th TCC/NRPC meeting held on 24.4.2008 and 25.4.2008. The scheme was further discussed and approved in the 24th meeting of the ULDC Scheme monitoring group held on 14.9.2009.

5. The scope of work covered under the instant petition is as follows :

Installation of:

New EMS/ SCADA platform equipped with Hardware & Software at SLDC's of UPPTCL, RRVPNL, DTL, HVPNL, BBMB, PSPTCL, HPSEBL, AND J&K PDD.

New EMS/SCADA platform equipped with Hardware & Software at Backup SLDCs of UPPTCL, RRVPNL, DTL and J&K PDD. BBMB SLDC and PSPTCL SLDC shall be backup of each other and similarly HPSEBL SLDC and HVPNL SLDC shall be backup of each other.

Auxiliary power supply (APS) system for control centers.

Remote Terminal Units (RTU's) for UPPTCL, PSTCL, HPSEBL, BBMB and HVPNL which shall also work as data concentrator.

New Video projection System for main SLDC's of UPPTCL, PSTCL, BBMB, DTL, HVPNL, HPSEBL, J&K PDD and for backup SLDC's of RRVPNL and J&K PDD. UPPTCL has commissioned a 3x2 67” BARCO make video projection system (VPS) at existing SLDC system in July 2010. The scope



includes the shifting, transportation, insurance and integration with the new system to be commissioned at backup control Centre of UPPTCL. Similarly RRVPNL is under the process of procurement of new VPS for main SLDC. The scope includes the integration of this new VPS with SCADA/EMS system of main SLDC at RRVPNL.

Video Conferencing Units at SLDCs.

Integration of:

RTUs/ SAS to Main and backup Control Centre.

Main and Backup Control Centers (DISCOM) control Centre's with their respective main & backup SLDCs.

The details of the assets covered under the instant Petition are as follows:

State/ Constituents	Project	SCOD	Actual COD
UPPTCL	Expansion and Replacement of existing SCADA/EMS System at SLDC's of Northern Region (NR ULDC Phase-II)".	5.11.2014	30.11.2016
J&K			

6. The Petitioner has claimed the following transmission charges for the instant assets:-

(₹ in Lakh)

Particulars	2016-17	2017-18	2018-19
Depreciation	15.35	56.90	60.78
Interest on Loan	13.30	46.91	45.75
Return on Equity	14.26	52.89	56.49
Interest on Working Capital	0.94	3.42	3.55
O & M Expenses	-	-	-
Total	43.85	160.12	166.57

7. The details of the Interest on Working Capital claimed by the Petitioner for the instant assets are as under :-

(₹ in Lakh)

Particulars	2016-17	2017-18	2018-19
Maintenance Spares	-	-	-
O & M expenses	-	-	-



Particulars	2016-17	2017-18	2018-19
Receivables	21.74	26.69	27.76
Total	21.74	26.69	27.76
Rate of Interest	12.80%	12.80%	12.80%
Interest on working capital	2.78	3.42	3.55
Pro rata interest on working capital	0.94	3.42	3.55

8. The Petitioner has served the petition to the Respondent and notice of this application has been published in the newspapers in accordance with Section 64 of the Electricity Act, 2003 (the Act). No comments have been received from the public in response to the notices published by the Petitioner.

9. The hearing on the matter was held on 13.12.2018 and 19.2.2019.

10. During the hearing dated 13.12.2018, the Petitioner clarified that the Assets covered in the instant petition are the last two elements of the project and other elements have already been put under commercial operation on or before 31.12.2015. The Petitioner further submitted that the time over run of 24 months in case of the instant asset was due to UPPTCL shifting the location of the sub-station and delay in handing over of the land by Jammu & Kashmir Government.

11. During the hearing dated 19.2.2019, the Petitioner clarified that the instant assets were scheduled to be put into commercial operation on 5.11.2014 as per investment approval dated 6.8.2012 and the instant assets were put into commercial operation on 30.11.2016 after a time over-run of 24 months and 24 days. The Petitioner further submitted that reason for time overrun and cost overrun have already been submitted in the petition and requested to allow the tariff as claimed in the petition.

12. This order has been issued after considering the submissions of the petitioner in the original petition and subsequent additional information vide affidavits dated 6.8.2018, 6.12.2018 and 7.12.2018.



13. Having heard the Petitioner and having perused the material on record, we proceed to dispose of the petition.

Analysis and Decision

Commercial Operation Date (COD)

14. The Petitioner vide management certificate dated 20.4.2017 has claimed the actual COD of the Assets covered in the instant petition as 30.11.2016.

15. The Petitioner has claimed COD as 30.11.2016. In support of commissioning of COD, the Petitioner has submitted NRLDC certificate dated 12.4.2017 and self-declaration COD letter dated 20.4.2017 vide affidavit dated 23.3.2018.

16. Accordingly, taking into consideration the submissions made by the petitioner and examination of the NRLDC certificates in support of trial operation; COD of the instant assets is approved as 30.11.2016 and the same has been considered for the purpose of tariff computation from COD till 31.3.2019.

Capital Cost

17. The Petitioner has claimed capital cost as per Clause (1) and (2) of Regulation 9 of the 2014 Tariff Regulations.

18. Auditor certificate for the instant Assets and tariff forms were filed with petition itself. The details of apportioned approved cost, capital cost as on COD and additional capital expenditure incurred or projected to be incurred during 2017-18 and 2018-19 along with estimated completion cost for the assets covered in the petition are as under:



(₹ in lakh)

Asset Name	Apportioned Approved Cost as per FR	Cost as on COD	Add Cap 2016-17	Add Cap 2017-18	Estimated Completion Cost
UPPTCL	1188.18	338.47	79.96	88.66	507.09
J&K		276.52	152.62	23.98	453.12
Total	1188.18	614.99	232.58	112.64	960.21

Cost Over-Run/Cost Variation

19. The apportioned approved cost of the assets covered in the instant Petition is ₹1188.18 against the estimated completion cost as on 31.03.2019 is ₹ 960.21 lakh. Hence, there is no cost overrun in case of the assets covered in the instant Petition. We have considered the submissions of the petitioner. The capital cost claimed by the petitioner is within the approved apportioned cost.

Time Over-Run

20. As per the investment approval dated 7.8.2012, the instant assets were scheduled to be commissioned within 27 months from the date of investment approval. Accordingly, the scheduled date of commercial operation was 5.11.2014 against which instant assets (UPPTCL Portion and J&K Portion) were put under commercial operation on 30.11.2016. Hence, there is time over-run 24 months and 25 days in commissioning of the instant assets (UPPTCL Portion and J&K Portion) and the same is summarized as under:

State	Project	Time line	Investment approval date	Scheduled COD	Actual COD	Delay
UPPTCL	Expansion and Replacement of existing SCADA/EMS System at SLDC's of Northern Region (NR ULDC Phase-II)".	27 months	7.8.2012	5.11.2014	30.11.2016	24 months 25 days (756 days)
J&K						24 months 25 days (756 days)

21. The Petitioner has submitted the details of factors leading to the time over-run in the petition , which is as under:-



- a) **UPPTCL Portion:** - Petitioner has made submission that UPPTCL requested the Petitioner to install up-graded SCADA/EMS system at new SLDC building at Gomti Nagar, Lucknow which was under construction in 2013-14 and in every TeST sub-committee meeting of NRPC, UPPTCL was continuously changing/extending schedule dates for readiness of civil works in new SLDC building (Extract of various MoMs for meeting held on 17.4.2014, 12.8.2014, 21.11.2014, 10.9.2015, 26.7.2016 has been submitted by petitioner). Based on progress of civil works, it was finalized that new SCADA/EMS system shall be installed in existing control center where space constraint was an issue and it was decided that supply and installation of VPS system shall be done in new building. UPPTCL vide letter dated 10.3.2016 increase Quantity of Video Projection System (VPS) modules from 8 nos. (4x2) to 32 Nos. (8x4). Amendment to original contract was issued on 31.3.2016 incorporating required changes by UPPTCL. Shifting activities were targeted for completion within 3 months of issuance of Amendment i.e. by 30.6.2016; however construction of new SLDC building was completed in September, 2016. Thereafter complete system was shifted from Shakti Bhawan to new control center building at Gomti Nagar in Lucknow and was finally commissioned on 30.11.2016 (Letter dated 14.12.2015, 16.5.2016, 19.5.2016, 24.5.2016 and MoMs dated 3.8.2016 has been submitted by Petitioner).
- b) **J&K Portion:** Petitioner has made submissions that delay in commissioning of the instant asset is due to severe flood during September, 2014. Rainfall started from 1st September, 2014 and continued till 6th September, 2014



with most stations reporting heavy rainfall on consecutive 3 days (4th September, 2014 to 6th September, 2014). This coupled with snow-melt water led to surge in water level of the main Kashmir's river Jhelum leading to flood. The monthly on rainfall on September, 2014 broke all previous record of 114 years as per available data of IMD (India meteorological department). Extract of monsoon report, 2014 and various e-paper cutting indicating the severity of flood is enclosed by petitioner. Control center at Srinagar was severely damages due to flood in Srinagar in September, 2014. Complete Building renovation was required for installation of SCADA/EMS system in Srinagar backup SLDC building. Further, Video Projection system, Video conferencing system, DG set and UPS, furniture and several RTUs which were installed in Srinagar were damaged due to flood. Survey/inspection was carried out by executing/manufacturing agency to assess the actual damage. Subsequently, all materials were procured by the agency and the materials were received at site but the work could only be resumed after Renovation work at Bemina control room work which was completed in February, 2016 by J&K as this work was responsibility of J&K (Letter from J&K PDD is submitted by petitioner) , hereafter the installation activity work were completed in April 2016 but commissioning of system could not take place due to insurgency , law and order issues and curfew in Srinagar from June, 2016 to October, 2016. The work was resumed again in November, 2016 after normalization of the law and order situation in Srinagar and System was finally commissioned on 30.11.2016.

22. The Petitioner vide affidavit dated 6.12.2018 has furnished the following activity-wise details for delay:



UPPTCL portion

S.N.	Activity	Schedule		Actual		Reasons
		From	To	From	To	
1	LoA	4.9.12	1.9.12	21.9.12	21.9.12	LoA & Supply started approximately within schedule. However there is delay on account of quantity variation and non-readiness of the control center building at Gomti Nagar in Lucknow by UPPTCL due to which start of installation has been delayed and consequently there is delay in commissioning and handing over.
2	Supply (Including Engineering, database display work and FAT)	3.10.12	8.7.14	6.10.12	15.7.16	
3	Installation	20.3.13	22.9.14	15.9.16	10.10.16	
4	Commissioning/ Integration (including RTU)	15.5.13	20.10.14	10.10.16	24.10.16	
5	SAT and Handing Over	12.6.13	5.11.14	28.10.16	28.10.16	

J&K portion

S.N.	Activity	Schedule		Actual		Reasons
		From	To	From	To	
1	LoA	4.9.12	1.9.12	21.9.12	21.9.12	LoA, Supply & installation started approximately within schedule. However, there is delay on account of flood, non-readiness of Bemina control room by J&K PDD, insurgency, law and order issues and curfew in Srinagar due to which start of commissioning and handing over has been delayed.
2	Supply (Including Engineering, database display work and FAT)	3.10.12	8.7.14	6.10.12	15.2.16	
3	Installation	20.3.13	22.9.14	25.3.13	22.4.16	
4	Commissioning/ Integration (including RTU)	15.5.13	20.10.14	1.11.16	7.11.16	
5	SAT and Handing Over	12.6.13	5.11.14	8.11.16	29.11.16	

23. We have considered the submissions made by the petitioner. As per the Investment Approval dated 7.8.2012, there was 27 months timeline for completion of the project. The petitioner has submitted that time over-run is mainly caused due delay in handing over of the work site, law and order situations and natural calamities. The asset-wise analysis of the time overrun is as follows.

UPPTCL portion

24. From the submissions and documents placed by the Petitioner, it is observed that the LOA was issued on 21.9.2012. It is also noticed that, during 1st, 2nd, 3rd, 6th & 8th meeting of TeST (Telecommunication, SCADA & Telemetry) Sub-committee dated 17.4.2014, 12.8.2014, 21.11.2014, 10.9.2015 & 26.7.2016 respectively, the UPPTCL was continuously changing/extending schedule dates for readiness of civil works in new SLDC building. The construction of new SLDC building was completed in



September, 2016 and thereafter, complete system was shifted from Shakti Bhawan to new control centre building at Gomti Nagar in Lucknow which was finally commissioned on 30.11.2016. Thus, after the investment approval dated 7.8.2012, the Petitioner was doing regular follow-up with UPPTCL for completion of work and handling of building on time, however, UPPTCL failed to provide the same on time which resulted in delay of commissioning of the instant asset pertains to UPPTCL portion. The Petitioner has submitted the documents in support of time overrun up to 30.8.2016 and has not submitted proper justification in respect of time over-run of 93 days i.e. from 31.8.2016 to the COD. We have considered the submissions made by the Petitioner. The delay of 21 months and 26 days is due to failure on the part of UPPTCL. Accordingly, the time over-run of 21 months 26 days from the scheduled COD of 5.11.2014 to 30.8.2016 is condoned. As the Petitioner has not submitted proper justification in respect of time overrun of 93 days, the same is not condoned. The petitioner is granted liberty to file documents to show when the additional work sought by the SLDCs was completed to verify time over-run of these 93 days at the time of truing-up. The chronology of events available on records with respect to UPPTCL Portion are as under:

S. no	Events	Time Period /date	No. of days/ months	Remarks
1	7th meeting of TCC	24.4.2008	1	Expansion of NR Unified Load Despatch and Communication scheme
2	8th NRPC meeting	25.4.2008	1	
3	24th meeting of USMG	24.8.2009	1	Discussion about Expansion of NR Unified Load Despatch and Communication scheme
4	1st meeting of Test sub committee	17.4.2014	1	Installation of VPS at UPPTCL was hold on as it was to be installed at new SLDC building at Gomati nagar, which was under construction. Further, Hardware& Software for SCADA for Srinagar was not delivered.



S. no	Events	Time Period /date	No. of days/ months	Remarks
5	2nd meeting of Test sub committee	12.8.2014	1	UPPTCL informed that building readiness in all aspects would take at least 6 more months and was expected to be completed by Mar'2015 (Building construction at Gomati nagar was still incomplete.
6	3rd meeting of Test sub committee	21.11.2014	1	a) UPPTCL confirmed that at present pace of work, building shall be completed by April, 2015. b) UPPTCL informed that DG set foundation at Gomti nagar, lucknow has been completed.
7	6th meeting of Test sub committee	10.9.2015	1	Representative of UPPTCL informed that SLDC Building construction at Gomati nagar was yet to be completed and was expected to be completed by March'16.
8	Letters regarding Shifting of SCADA/EMS system to new SLDC building	14.12.2015 to 24.5.2016	5 months 11 days(163 days)	Letter date 14.12.2015, 16.5.2016,19.5.2016, 24.5.2016 exchanged b/w UPPTCL & PGCIL regarding shifting of SCADA/EMS system to new SLDC building
9	8th meeting of Test sub committee	26.7.2016	1	a) Representative of PDD, J&K was not present in this meeting. b) Control Room at Gomati nagar was still not completed and UPPTCL informed that same will be completed within next 15-20 days.
10	UPPTCL SLDC officials along with Chief Engg.(Civil), Powergrid & Siemens team jointly visit the new centre building at Gomati Nagar on 4.8.2016	4.8.2016	1	a) UPPTCL confirmed that main control room will be ready by 15.8.2016. b) Chief Engg.(Civil) Confirmed that Communication room and server room will be ready and handed over to SCADA wing by 10.8.2016, accordingly, Siemens may deploy their team accordingly and he also confirmed that Battery room and UPS room will be ready by 10.8.2016 for shifting of UPS and Battery bank. c) Siemens agreed to deploy the teams from 11.8.2016 subject to all clearance given by UPPTCL for readiness of building.
11	Other pending issues	4.8.2016 to 30.8.2016	27 days	The other issues like printer shown in NMS system, Edna Backup, RT dump demonstration, Web server at Backup CC were pending and it was agreed that same will be resolved b/w 4.8.2016 to 30.8.2016



J&K portion

25. From the submissions and documents placed by the Petitioner, it is observed that, the LOA was issued on 21.9.2012. Rainfall was started from 1.9.2014 and continued till 6.9.2014 with most stations reporting heavy rainfall on consecutive 3 days (4.9.2014 to 6.9.2014). This coupled with snow-melt water led to surge in water level of the main Kashmir's river Jhelum leading to flood. Control center at Srinagar was severely damaged due to flood in Srinagar in September, 2014. Complete renovation of building was required for installation of SCADA/EMS system in Srinagar backup SLDC building. Further, Video Projection system, Video conferencing system, DG set and UPS, furniture and several RTUs which were installed in Srinagar were damaged due to flood. Survey/inspection was carried out by executing/manufacturing agency to assess the actual damage. Subsequently, all the materials were procured by the agency and the materials were received at site but the work could only be resumed after renovation work at Bemina control room work which was completed in February, 2016 by J&K. Thereafter the installation activity work was completed in April, 2016 but commissioning of system could not take place due to insurgency, law and order issues and curfew in Srinagar from June, 2016 to October, 2016. The work was resumed again in November, 2016 after normalization of the law and order situation in Srinagar and System was finally commissioned on 30.11.2016. The Petitioner has submitted the documents in support of the flood in Srinagar in September, 2014 and its effect on the sub-SLDC at Srinagar and the correspondence with J&K PDD. Further, due to flood, Bemina sub-SLDC was damaged and repair work could not be completed due to law and order problem at Srinagar. It is observed that the Bemina control room was completed by February, 2016, however, due to law & order situations in Srinagar, the



commissioning of system could not take place. After normalization of the law and order situation in Srinagar, the system was commissioned on 30.11.2016. The petitioner has submitted the documents in support of time overrun upto 17.10.2016 and has not submitted proper justification in respect of time overrun of 45 days i.e. from 18.10.2016 to the COD. Accordingly, the time over-run of 23 months and 13 days from the scheduled COD of 5.11.2014 to 17.10.2016 is condoned. As the Petitioner has not submitted proper justification in respect of time overrun of 45 days i.e. from 18.10.2016 to the COD, the said period of 45 days is not condoned. The petitioner is granted liberty to file documents to show when the additional work sought by the SLDCs was completed to verify time over-run of these 45 days at the time of truing-up. The chronology of events available on records with respect to J&K Portion are as under

S.no	Events	Time Period /date	No. of days	Remarks
1	Rain fall	1.9.2014 to 6.9.2014	6 days	daily rainfall from 1st to 6th Sept, 2014
2	Site inspection	12.11.2014	1 day	It was observed that due to flood in J&K during sept'14, Battery which was kept under charged condition got soaked in flood water and covered with mud and UPS was not working
3	Site inspection	29.12.2014	1 day	It was observed that due to flood in J&K few items were damaged and these system need to be monitored for one month after installation to check, if any further part needs to be replaced.
4	Meeting at Bemina, Srinagar	23.4.2015	1 day	It was discussed that, due to flood, VCS, UPS,RTU,VPS,DG Set , Furniture were found damage and Siemens was requested to submit the report of OEM after suggested over hauling repairs by OEM to take up insurance claim and further, during the visit, it was observed that, OEM recommendations were near to the reality.
5	Letter dated 4.2.2016	4.2.2016	1 day	Chief Executive Engineer of Bemina, PDD Srinagar wrote letter to AGM,ULDC and informed that, civil works related to SLDC Bemina are nearing to completion and the control room is likely to be completed by 10.2.2016 and also informed that, DG set foundation and server room were also likely to be ready for installation.



6	Newspaper cutting date	9.7.2016,10.7.2016, 14.7.2016,22.7.2016, 28.7.2016,29.7.2016, 30.7.2016,31.7.2016, 1.8.2016, 3.8.2016, 5.8.2016,6.8.2016, 28.8.2016,31.8.2016, 2.9.2016,18.9.2016, 19.9.2016,20.9.2016, 21.9.2016,22.9.2016, 23.9.2016,27.9.2016, 28.9.2016,29.9.2016, 30.9.2016,4.10.2016, 7.10.2016,8.10.2016, 9.10.2016,10.10.2016, 11.10.2016,12.10.2016, 15.10.2016,16.10.2016, 17.10.2016	35 days	Newspaper cutting of events has been submitted by petitioner.
---	------------------------	---	---------	---

Interest During Construction (IDC)

26. The Petitioner has claimed IDC of ₹18.29 lakh. Further, the Petitioner has submitted the statement showing discharge of IDC liability as on COD.

27. The IDC on cash basis up to the COD has been worked out on the basis of the loan details given in the Statement showing discharge of IDC and Form-9C for the asset. Petitioner has submitted that it has not made any default in the payment of interest. The IDC claimed and considered as on COD and summary of discharge of IDC liability up to COD and thereafter for the purpose of tariff determination subject to revision at the time of truing up is as below:

(₹ in lakh)				
IDC claimed as per certificate	IDC considered as on COD	IDC Discharged up to COD	IDC discharged in 2016-17	IDC discharged in 2017-18
18.29	12.89	8.29	0.15	4.45

Incidental Expenditure During Construction (IEDC)

28. The Petitioner has claimed IEDC of ₹67.87 lakh. The Petitioner has claimed IEDC as on COD, which is within the percentage of hard cost as indicated in the



abstract cost estimate. Further, the Petitioner has submitted that the entire IEDC claimed in Auditor Certificate is on cash basis and is paid up to COD of the assets. Hence, the entire amount of IEDC has been allowed.

Initial spares

29. Petitioner has not claimed any initial spares for subject petition.

Capital Cost allowed as on COD

30. Based on the above, the following capital cost allowed as on COD, after taking into account allowable IDC and IEDC, is considered for the computation of tariff for the assets:

(₹ in lakh)			
Capital Cost claimed as on COD (a)	Un-discharged IDC as on COD (b)	Un-discharged IEDC (c)	Capital Cost allowed as on COD [d=[a-(b+c)]]
614.99	10.00	0.00	604.99

Additional Capital Expenditure (ACE)

31. The cut-off date for the instant assets is 31.3.2019.

32. The Petitioner has claimed ACE as per as per Clause (1) of Regulation 14 of the 2014 Tariff Regulations. The Petitioner, vide Auditor Certificate dated 09.02.2018, has claimed Additional Capital Expenditure (ACE) of ₹232.58 lakhs and ₹112.64 lakh for year 2016-17 and 2017-18 respectively. In addition, the Petitioner has also claimed the ACE towards discharge of IDC liability for 2016-17 and 2017-18. The additional capital expenditure claimed by the Petitioner for the instant assets for the period 2016-17 and 2017-18 is within the cut- off date and is on account of balance and retention payments. Accordingly, the same has been allowed under



Regulation 14(1) (i) of the 2014 Tariff Regulations. The ACE claimed by the Petitioner and allowed is summarized in the table below:-

(₹ in lakh)

	2016-17	2017-18
Claimed	232.58	112.64
Allowed**	232.73	117.09

** Discharged IDC added in the respective year add cap.

33. The capital cost considered for the purpose of computation of tariff in the instant petition is as follows:-

(₹ in lakh)

Capital cost allowed as on COD	ACE for 2016-17	ACE for 2017-18	ACE for 2018-19	Total Estimated Completion Cost up to 31.3.2019
604.99	232.73	117.09	0.00	954.81

Debt-Equity Ratio

34. The Petitioner has claimed Debt : Equity ratio of 70:30 as on the date of commercial operation. Debt : Equity ratio of 70:30 is considered as provided in Regulation 19 of the 2014 Tariff Regulations. The details of Debt : Equity ratio in respect of the instant assets as on the date of commercial operation and as on 31.3.2019 are as under :-

(₹ in lakh)

Particulars	Capital Cost as on COD		Capital Cost as on 31.3.2019	
	Amount	%	Amount	%
Debt	423.49	70.00	668.37	70.00
Equity	181.50	30.00	286.44	30.00
Total	604.99	100.00	954.81	100.00

Return on Equity

35. This has been dealt with in line of Clause (1) and (2) of Regulation 24 and



Clause (2) of Regulation 25 of the 2014 Tariff Regulations.

36. The Petitioner has submitted that it is liable to pay income tax at MAT rate, the RoE has been calculated @ 19.610% after grossing up the RoE with MAT rate of 20.961% as provided under Regulation 25(2) (i) of the 2014 Tariff Regulations. As per Regulation 25(3) of the 2014 Tariff Regulations, the grossed up rate of RoE at the end of the financial year shall be trued up based on actual tax paid together with any additional tax demand including interest thereon duly adjusted for any refund of tax including interest received from the IT authorities pertaining to the 2014-19 period on actual gross income of any financial year.

37. We have considered the submission made by the Petitioner. Regulation 24 read with Regulation 25 of the 2014 Tariff Regulations provides for grossing up of RoE with the effective tax rate for the purpose of RoE.

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

Particulars	(₹ in lakh)		
	2016-17 (pro-rata)	2017-18	2018-19
Opening Equity	181.50	251.32	286.44
Addition due to Additional Capitalization	69.82	35.13	0.00
Closing Equity	251.32	286.44	286.44
Average Equity	216.41	268.88	286.44



Particulars	2016-17 (pro-rata)	2017-18	2018-19
Return on Equity (Base Rate)	15.50%	15.50%	15.50%
MAT rate for the Financial year 2013-14	20.961%	20.961%	20.961%
Rate of Return on Equity (Pre-tax)	19.610%	19.610%	19.610%
Return on Equity (Pre-tax)	14.18	52.73	56.17

Interest on loan (IOL)

39. Interest on loan has been dealt with in line of Regulation 26 of 2014 Tariff Regulations.

40. IOL has been worked out as under:-

(i) Gross amount of loan, repayment of instalments and rate of interest on actual average loan have been considered as per the petition;

(ii) The yearly repayment for the tariff period 2014-19 has been considered to be equal to the depreciation allowed for that year; and

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

41. Based on above, details of Interest on Loan calculated are as follows:-

(₹ in lakh)

Particulars	2016-17 (pro-rata)	2017-18	2018-19
Gross Normative Loan	423.49	586.40	668.37
Cumulative Repayment up to previous Year	0.00	15.26	72.00
Net Loan-Opening	423.49	571.14	596.37
Addition due to Additional Capitalization	162.91	81.96	0.00
Repayment during the year	15.26	56.73	60.44
Net Loan-Closing	571.14	596.37	535.93
Average Loan	497.32	583.76	566.15
Weighted Average Rate of Interest on Loan	7.9551%	8.0125%	8.0331%
Interest on loan	13.22	46.77	45.48



Depreciation

42. Depreciation has been dealt with in line of Regulation 27 of 2014 Tariff Regulations.

43. The instant transmission assets were put under commercial operation during 2017-18 and 2018-19. Accordingly, they 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.

44. Details of the depreciation allowed are as under:-

Particulars	(₹ in lakh)		
	2016-17 (pro-rata)	2017-18	2018-19
Opening Gross Block	604.99	837.72	954.81
Additional Capital expenditure	232.73	117.09	0.00
Closing Gross Block	837.72	954.81	954.81
Average Gross Block	721.36	896.26	954.81
Rate of Depreciation	6.33%	6.33%	6.33%
Depreciable Value	597.18	649.87	366.88
Remaining Depreciable Value	597.18	634.61	294.88
Depreciation	15.26	56.73	60.44

Operation and Maintenance Expenses (O&M Expenses)

45. The Petitioner has not claimed the O&M Expenses for 2014-19 period as per Regulation 29(4) (a) of the 2014 Tariff Regulations.

Interest on Working Capital (IWC)

46. As per 2014 Tariff Regulations the components of the working capital and the interest thereon are as follows:-



- 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 Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2014, SBI Base Rate 9.30% as on 01.04.2016 Plus 350 BPS i.e. 12.80% have been considered as the rate of interest on working capital for all the assets.

47. As the O&M expenses have not been claimed by the Petitioner, therefore, while computing IWC, the value of Maintenance Spares and O&M expenses have been considered as nil. Accordingly, the interest on working capital is summarized as under:-

(₹ in lakh)			
Particulars	2016-17 (Pro-Rata)	2017-18	2018-19
Maintenance Spares	0.00	0.00	0.00
O & M expenses	0.00	0.00	0.00
Receivables	21.74	26.61	27.60
Total	21.74	26.61	27.60
Interest	0.93	3.41	3.53

Annual Transmission Charges

48. Accordingly, the annual transmission charges allowed for the instant assets are summarized hereunder:-



(₹ in lakh)

Particulars	2016-17 (Pro-Rata)	2017-18	2018-19
Depreciation	15.26	56.73	60.44
Interest on Loan	13.22	46.77	45.48
Return on Equity	14.18	52.73	56.17
Interest on Working Capital	0.93	3.41	3.53
O & M Expenses	0.00	0.00	0.00
Total	43.60	159.64	165.62

Filing Fee and the publication expenses

49. 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 shall be 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, RLDC Fees and Charges

50. The Petitioner has requested to allow the Petitioner to bill and recover License fee and RLDC fees and charges, separately from the Respondents. We are of the view that 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

51. The Petitioner has prayed for reimbursement of tax, if any, on account of 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

52. The transmission charges allowed in this order shall be recovered from respective beneficiaries (UPPTCL and J&K) under the proviso to clause (2) of Regulation 43 of the 2014 Tariff Regulations.

53. This order disposes of Petition No. 243/TT/2018.

Sd/-
(I.S. Jha)
Member

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

Sd/-
(P.K. Pujari)
Chairperson

