

**Office of Chief Engineer
Commercial Unit**



U.P. Rajya Vidyut Utpadan Nigam Ltd.
14th floor, Shakti Bhawan Extn.
Lucknow-226001
Tel. No.- 0522-2288056/2287030
CIN :U40101UP1980SGC005065
E-mail: gm.commercial@uprvunl.org
cecommercialunl@gmail.com

No.519/UNL/CE(Comml.)/MYT (2019-24)/Harduaganj Ext

Date: 30, November- 2022

The Secretary,
U.P. Electricity Regulatory Commission
Vibhuti Khand-II, Gomti Nagar
Lucknow-2260010

Subject:- Re-Submission of MYT Petition of 2x250 MW Harduaganj Extension Thermal Power Stations of UPRVUNL for FY 2019-20 to 2023-24.

Dear Sir,

Kindly find enclosed herewith MYT Petition for 2x250 MW Harduaganj Extension Thermal Power Station of UPRVUNL for FY 2019-20 to 2023-24 in 06 copies (one original + 05 photocopies + 01 soft copy) as per UPERC (Terms and Conditions of Generation Tariff) Regulations, 2019 in compliance of directive of Hon'ble Commission during hearing on dated 03.11.2021 on Petition No. 1527/2019 for MYT of various Thermal Power Stations of UPRVUNL for FY 2019-20 to 2023-24.

The MYT Petitions (2019-24) for various TPS of UPRVUNL were originally submitted to Hon'ble Commission vide this office single covering letter no. 834/UNL/CE(Comml.)/MYT (2019-24), dt. 06.11.2019 (copy attached), with station wise fees @ Rs 5000/- per MW and total Rs 2,96,50,000/- for 10 Stations in form of DD (No. 557620 dt. 05.11.2019 State Bank of India) in favour of Secretary, UPERC, payable at Lucknow as per Part-D, Sl. No. 4 (b) under "Schedule of Fees" of UPERC (Fee & Fines) Regulation-2010.

Submitted for kind consideration of the Hon'ble Commission.

Encl: As above.

Yours Sincerely,

(Ashok Kumar Seth)
Chief Engineer(Commercial)

No. /UNL/CE(Comml.)/MYT (2014-19) Harduaganj Ext
Copy to the following respondents for their kind information:-

Date: 30, November-2022

1. M.D., U.P. Power Corporation Ltd., 7th floor, Shakti Bhawan, 14 Ashok Marg, Lucknow.
2. M.D., Madhyanchal Vidyut Vitran Nigam Ltd., P.N. Road, Gokhale Marg, Lucknow.
3. M.D., Poorvanchal Vidyut Vitran Nigam Ltd., Vidyut Nagar, DLW, Varanasi.
4. M.D., Pashchimanchal Vidyut Vitran Nigam Ltd., Victoria Park, Meerut.
5. M.D., Dakshinanchal Vidyut Vitran Nigam Ltd., Urja Bhawan, Delhi Bypass Road, Agra.
6. M.D., Kanpur Electric Supply Co. Ltd., KESA House, Civil Lines, Kanpur.



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No. 519/UNL/CE(Comml.)/MYT (2019-24)/Harduaganj Ext

Date: 30, November- 2022

✓ The Secretary,
U.P. Electricity Regulatory Commission
Vibhuti Khand-II, Gomti Nagar
Lucknow-2260010

**Subject:- Re-Submission of MYT Petition of 2x250 MW Harduaganj Extension Thermal Power
Stations of UPRVUNL for FY 2019-20 to 2023-24.**

Dear Sir,

Kindly find enclosed herewith MYT Petition for 2x250 MW Harduaganj Extension Thermal Power Station of UPRVUNL for FY 2019-20 to 2023-24 in 06 copies (one original + 05 photocopies + 01 soft copy) as per UPERC (Terms and Conditions of Generation Tariff) Regulations, 2019 in compliance of directive of Hon'ble Commission during hearing on dated 03.11.2021 on Petition No. 1527/2019 for MYT of various Thermal Power Stations of UPRVUNL for FY 2019-20 to 2023-24.

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Submitted for kind consideration of the Hon'ble Commission.

Encl: As above.

Yours Sincerely,

(Ashok Kumar Seth)
Chief Engineer(Commercial)

No. /UNL/CE(Comml.)/MYT (2014-19) Harduaganj Ext
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**COMMERCIAL
UNIT**



U.P. Rajya Vidyut Utpadan Nigam Ltd.
14th floor, Shakti Bhawan Extn.
Lucknow-226001
Telephone No.- 0522-2288056/2287030
CIN :U40101UP1980SGC005065
E-mail: gm.commercial@uprvnl.org

No. **834** /UNL/CE(Comm.)/MYT (2019-24)

Date: **06** ,November-2019

✓ Secretary,
U.P. Electricity Regulatory Commission
Vibhuti Khand-II, Gomti Nagar
Lucknow-2260010

**Subject:- Petitions for ARR & Multi Year Tariff of various Thermal Power Stations of
UPRVNL for FY 2019-20 to 2023-24.**

Dear Sir,

Kindly find enclosed herewith Petitions for determination of ARR & Multi Year Tariff of the following Thermal Power Stations including provisional Tariff of upcoming Harduaganj Extension Stage-II (1x660 MW) of UPRVNL in 06 copies (one original + 05 photocopies + 01 soft copy) for FY 2019-20 to FY 2023-24 as per UPERC (Terms & Conditions for Generation Tariff) Regulation-2019.

The details are mentioned in Table hereunder:

Sl No.	Name of Power Station	Unit	Total Capacity (MW)	Fee @ Rs 5000/- per MW. Max Rs 50 Laacs per Station (Rs)
1.	Anpara- 'A' TPS	3x210	630	31,50,000/-
2.	Anpara- 'B' TPS	2x500	1000	50,00,000/-
3.	Anpara- 'D' TPS	2x500	1000	50,00,000/-
4.	Obra- 'B' TPS	5x200	1000	50,00,000/-
5.	Harduaganj TPS (U#7)	1x110	110	5,50,000/-
6.	Harduaganj Extn TPS	2x250	500	25,00,000/-
7.	Parichha TPS (U#2)	1x110	110	5,50,000/-
8.	Parichha Extn TPS	2x210	420	21,00,000/-
9.	Parichha Extn Stage-II TPS	2x250	500	25,00,000/-
10.	Harduaganj Ext Stage-II	1x660	660	33,00,000/-
Total			5930	2,96,50,000/-

The fee amount of Rs 2,96,50,000/- (Rs Two Crore, Ninety six Laacs, Fifty thousand only) in form of Demand Draft (No. 557620, dt 05.11.2019 issued from State Bank of India) in favour of "Secretary, UPERC", payable at Lucknow [as per 'Schedule of Fees' of UPERC (Fee & Fines) Regulations-2010, Part-D Sl. No.-4(b)] is also enclosed alongwith Petitions.

Submitted for kind consideration of Hon'ble Commission.

Encl: Petitions as as above.

Yours Sincerely,



(Ramesh Chandra)
Chief Engineer(Commercial)

Office letter /CE (C)
242

**HARDUAGANJ EXTENSION 2x250 MW
THERMAL POWER STATION**

**RE-SUBMISSION OF MYT PETITION FOR THE PERIOD FY
2019-20 TO FY 2023-24**

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AE

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UPRVUNL

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मुख्य अभियन्ता (वाणिज्य)
उत्तर प्रदेश विद्युत निगम लि.
140/1, बंगला, ब्रह्म विस्तार
लखनऊ-226 001

UP RAJYA VIDYUT UTPADAN NIGAM LTD

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(Signature)

(Signature)

(Signature)

(Signature)

मुख्य अभियन्ता (वाणिज्य)
उपप्रबंधन विभाग
14वां तल, शक्ति भवन विस्तार
लखनऊ-226001

FORM-I

(See Regulation 30)

**BEFORE THE HON'BLE UTTAR PRADESH ELECTRICITY REGULATORY
COMMISSION GOMTINAGAR, LUCKNOW**

Receipt Register No.: _____

PETITION NO. _____

IN THE MATTER OF

RE-SUBMISSION OF MULTI YEAR TARIFF PETITION FOR APPROVAL OF ANNUAL
REVENUE REQUIREMENT AND DETERMINATION OF TARIFF FOR FY 2019-20 TO
FY 2023-24 IN RESPECT OF HARDUAGANJ EXTENSION 2X250 MW THERMAL POWER
STATION OF UTTAR PRADESH RAJYA VIDYUT UTPADAN NIGAM LIMITED (UPRVUNL)

AND

IN THE MATTER OF

UTTAR PRADESH RAJYA VIDYUT UTPADAN NIGAM LIMITED (UPRVUNL),
SHAKTI BHAWAN, 14-ASHOK MARG, LUCKNOW.

APPLICANT

V/s

UTTAR PRADESH POWER CORPORATION LIMITED (UPPCL),
SHAKTI BHAWAN, 14-ASHOK MARG, LUCKNOW.

MADHYANCHAL VIDYUT VITRAN NIGAM LTD.
PN ROAD, LUCKNOW.

POORVANCHAL VIDYUT VITRAN NIGAM LTD.
132 KV S/S BHIKARI VIDYUT NAGAR, VARANASI

PASCHIMANCHAL VIDYUT VITRAN NIGAM LTD.
VICTORIA PARK, MEERUT

DAKSHINACHAL VIDYUT VITRAN NIGAM LTD.
GALINA ROAD AGRA.

KANPUR ELECTRICITY SUPPLY CO. LTD.
KESA HOUSE, KANPUR

RESPONDENTS

(Signature)

(Signature)

(Signature)

(Signature)

मुख्य अधिकारी (आवेदन)
उत्तर प्रदेश विद्युत नियामक आयोग
14वां प्लॉट, आशोक मार्ग, लखनऊ
लखनऊ-226001

FORM-2
(See Regulation 31)
**BEFORE THE HON'BLE UTTAR PRADESH ELECTRICITY REGULATORY
COMMISSION GOMTINAGAR, LUCKNOW**

Receipt Register No.: _____

PETITION NO. _____

IN THE MATTER OF

RE-SUBMISSION OF MULTI YEAR TARIFF PETITION FOR APPROVAL OF ANNUAL REVENUE REQUIREMENT AND DETERMINATION OF TARIFF FOR FY 2019-20 TO FY 2023-24 IN RESPECT OF HARDUAGANJ EXTENSION 2X250 THERMAL POWER STATION OF UTTAR PRADESH RAJYA VIDYUT UTPADAN NIGAM LIMITED (UPRVUNL).

AND

IN THE MATTER OF

UTTAR PRADESH RAJYA VIDYUT UTPADAN NIGAM LIMITED (UPRVUNL),
SHAKTI BHAWAN, 14-ASHOK MARG, LUCKNOW.

APPLICANT

VS

UTTAR PRADESH POWER CORPORATION LIMITED (UPPCL),
SHAKTI BHAWAN, 14-ASHOK MARG, LUCKNOW.

MADHYANCHAL VIDYUT VITRAN NIGAM LTD.
PN ROAD, LUCKNOW.

POORVANCHAL VIDYUT VITRAN NIGAM LTD.
132 KV S/S BHIKARI VIDYUT NAGAR, VARANASI

PASCHIMANCHAL VIDYUT VITRAN NIGAM LTD.
VICTORIA PARK, MEERUT

DAKSHINACHAL VIDYUT VITRAN NIGAM LTD.
GALINA ROAD AGRA.

KANPUR ELECTRICITY SUPPLY CO. LTD.
KESA HOUSE, KANPUR

RESPONDENTS

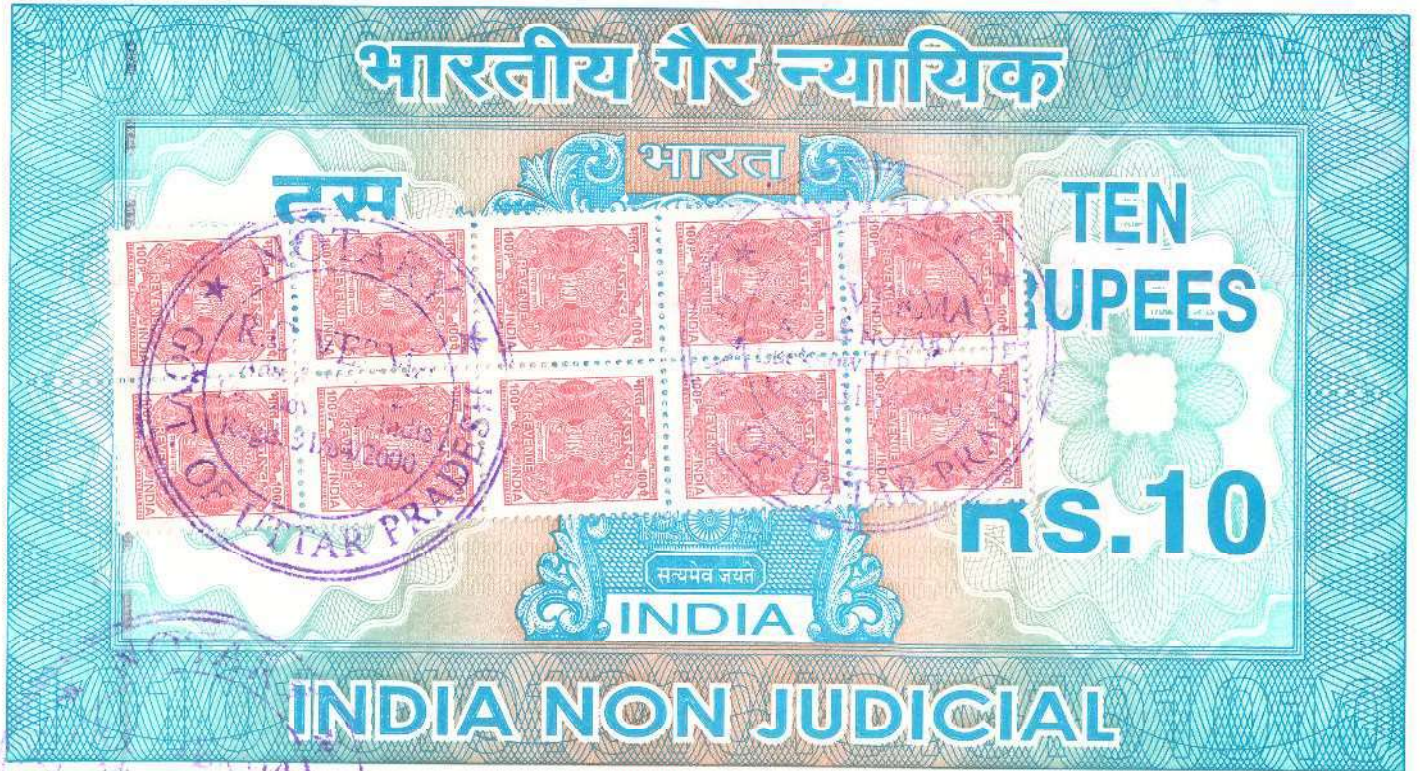
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मुख्य निदेशक (विद्युत)
उत्तर प्रदेश विद्युत नियामक आयोग
14वां एन. अशोक मार्ग, लखनऊ-226001



उत्तर प्रदेश UTTAR PRADESH

65AE 473623

AFFIDAVIT

I, Ashok Kumar Seth, Son of Late Shakal Narain Ram Seth aged about 53 Years, resident of D-201, Celebrity Greens, Sushant Golf City, Lucknow 226030 do hereby solemnly affirm and state as under:

1. I say that I am Chief Engineer, Commercial UPRVUNL, the Applicant in the above matter and am duly authorized by the said Applicant to swear the present affidavit.
2. I say that I have read the contents of the Re-submission of ARR and MYT Petition filed by the Petitioner (applicant) and I have understood the contents of the same.
3. That the contents of the Re-submission of ARR and MYT Petition filed by the Applicant are based on the information available with the Applicant in the normal course of business and believed by me to be true.
4. I say that the Text, Appendixes and Annexure to the Petition are the true and correct copies of their original.

[Signature]

DEPONENT

VERIFICATION

Sworn and Verified
Before me

I, the deponent above named, do hereby verify the contents of the above affidavit to be true to the best of my knowledge, no part of it is false and nothing material has been concealed therefrom.

Verified at Lucknow on the _____, 2022

R.C. VERMA
Adv. & NOTARY
Lucknow U.P. INDIA
Regd No 31/64/2000

[Signature]

DEPONENT

मुख्य अभियन्ता (वाणिज्य)
उत्तर प्रदेश विद्युत निगम लि.
14वां तल, गणेश गहन विस्तार

The projections breakup for the period FY 2022-23 and FY 2023-24 is reproduced below:

Particulars	2022-23 (Projections)	2023-24 (Projections)	
NOX	3.74	-	<i>Supporting Documents are attached with the Petition and marked as Annexure-B</i>
FGD	-	100	
HQ Allocation	9.17	1.82	
Total	12.91	101.82	

Accordingly, the following table depicts the proposed Gross Fixed Asset balances along with the yearly capitalizations (if any) for the Control period FY 2019-20 to FY 2023-24:

Table: - Gross Fixed Assets Summary - FY 2019-20 to FY 2023-24

(All figures in Rs Crs)

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Opening GFA	3,137.08	3,129.92	3,135.39	3,139.99	3,152.89
Capitalization	0.02	5.47	4.60	12.91	101.82
Deletions	7.18	-	-	-	-
Closing GFA	3,129.92	3,135.39	3,139.99	3,152.89	3,254.72

1.2 MEANS OF FINANCE

The Hon'ble Commission in its order dated 5th September 2022 and 3rd October 2022 had prescribed a normative approach of financing of the capital expenditure in the ratio of 70% debt and 30% equity in line with the Tariff Regulations. Further the allowable depreciation had been considered as normative loan repayment.

In order to maintain consistency in approach, the Petitioner has considered the aforementioned philosophy and calculated the normative debt and normative equity. The opening values of accumulated depreciation, normative loan and normative equity as on 1.4.2019 has been adopted from the true-up order for FY 2014-15 to FY 2018-19. Accordingly, the gross fixed asset balance, the net fixed asset balance and its financing is presented in the table below:

Table: Calculation of GFA, NFA and its financing

Figures in Rs Crore

MoA	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Opening GFA	3,137.08	3,129.92	3,135.39	3,139.99	3,152.89
Additions	0.02	5.47	4.60	12.91	101.82
Deletions	7.18	-	-	-	-
Closing GFA	3,129.92	3,135.39	3,139.99	3,152.89	3,254.72
Closing Net FA	1,999.77	1,841.32	1,681.70	1,529.99	1,464.00

MoA	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Financing:					
Opening Equity	941.15	941.16	942.80	944.18	948.05
Additions	0.01	1.64	1.38	3.87	30.55
Less: Deletions	2.15	-	-	-	-
Closing Equity	941.16	942.80	944.18	948.05	978.60
Open. Accumulated Depreciation	966.18	1,130.15	1,294.07	1,458.28	1,622.90
Depreciation during the year	163.97	163.92	164.21	164.61	167.82
Closing Accumulated Depreciation	1,130.15	1,294.07	1,458.28	1,622.90	1,790.72
Opening Debts	1,209.90	1,040.92	880.83	719.83	564.25
Additions	0.02	3.83	3.22	9.03	71.28
Less: Depreciation (normative repayment)	163.97	163.92	164.21	164.61	167.82
Less: Deletions	5.03	-	-	-	-
Closing Debts	1,040.92	880.83	719.83	564.25	467.71

1.3 INTEREST ON LOAN CAPITAL

Regulation 24(ii) of the UPERC Generation Regulations, 2019 provide the basis for computation of Interest on loan capital. It states that the Interest on loan capital shall be computed on the loans arrived at in the manner indicated in these Regulation i.e in the approved Debt: Equity ratio. The loan outstanding as on 1st April 2019 shall be worked out as the gross loan as per Regulation minus cumulative repayment as admitted by the Commission up to 31st March 2019. The repayment for any year during the Tariff Period shall be deemed to be equal to the depreciation allowed for that Year. In case of decapitalization of assets, the repayment shall be adjusted by taking into account cumulative repayment on a pro rata basis and the adjustment should not exceed cumulative depreciation recovered up to the date of decapitalization of such asset.

Further, the rate of the interest shall be the weighted average rate of interest considered from the True-up order as approved by the Hon'ble Commission.

Further, it is reiterated that the Petitioner has considered a normative tariff approach with a gearing of 70:30 as considered by the Hon'ble Commission in its True-up Order dated 5th September 2022 and 3rd October 2022. In this approach, 70% of the capital expenditure undertaken in any year has been considered to be financed through loan and balance 30% has been considered to be funded through equity contributions.

Harduaganj Extn. TPS- MYT Petition for the control period FY 2019-20 to FY 2023-24

मुख्य अभियन्ता (वाणिज्य)
उपग्रह विभाग
14वां तल, 7वें विभाग विस्तार
लखनऊ-226001

Allowable depreciation for the year has been considered as normative loan repayment. The weighted average rate of interest of overall long term loan portfolio for FY 2018-19 has been considered for FY 2019-20 to FY 2023-24, as it seems to be fair and equitable.

Considering the debt worked out as above, the interest on loan capital has been worked out in the table below:

Table: Summary of Interest on Loan for the Control Period

(All figures in Rs Crs)

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Opening Debts	1,209.90	1,040.92	880.83	719.83	564.25
Additions	0.02	3.83	3.22	9.03	71.28
Less: Normative repayment	163.97	163.92	164.21	164.61	167.82
Less: Decapitalisation	5.03	-	-	-	-
Closing Debts	1,040.92	880.83	719.83	564.25	467.71
Average Debt	1,125.41	960.87	800.33	642.04	515.98
Rate of Interest	12.58%	12.58%	12.58%	12.58%	12.58%
Interest on Loan	141.58	120.88	100.68	80.77	64.91

1.4 DEPRECIATION

The Petitioner submits that the depreciation as per accounts is calculated as per the prescription of New Companies Act, 2013 which is depicted in the accounting policies annexed with the audited accounts. However, the Tariff Regulations prescribe that the eligible depreciation shall be calculated annually, based on straight line method over the useful life of the asset and the rates prescribed in Appendix III of such regulations. It is noteworthy of mentioning that the Appendix III prescribes distinct depreciation rates for each class of assets.

The Petitioner has provided the asset class wise list of gross fixed assets in Form 11 of the tariff formats submitted along with this petition. Accordingly, the Petitioner has calculated the eligible depreciation based on the rates prescribed in the tariff regulations.

The rates of depreciation prescribed by the Hon'ble Commission in Appendix 3 of the Generation Tariff Regulations prescribe different depreciation rates for different assets. In such circumstances it would only be fit to consider station wise depreciation calculated at the rates prescribed in Appendix 3 for different asset classes and not at the average rate.

While calculating the allowable depreciation, the petitioner has considered the residual life of the asset as 10% and depreciation has been considered up to maximum of 90% of the historical capital cost of the asset being in line with the provisions of the Generation Regulations, 2019.

Harduaganj Extn. TPS- MYT Petition for the control period FY 2019-20 to FY 2023-24

मुख्य अभियन्ता (वाणिज्य)
उपप्रसाविडोनिडिलि
14वां तल, 8वित्त भवन विस्तार
लखनऊ-226001

The value of Gross Fixed Assets has been discussed in foregoing sections. The Petitioner has calculated station wise depreciation, on the Gross Fixed Asset (GFA) value of all the plants owned by it, at the rates specified in the Appendix 3 of Generation Tariff Regulations 2019.

The allowable depreciation is depicted in the table below:

Table: Depreciation Summary for the Control Period

(All figures in Rs Crs)

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Capital Cost including additional capitalization	3122.55	3121.70	3126.73	3135.49	3192.85
Depreciable value=90% of capital cost (excluding Land cost)	2807.07	2811.99	2816.13	2827.74	2919.39
Cumulative depreciation approved upto respective financial year	966.18	1130.15	1294.07	1458.28	1622.90
Depreciation approved in the instant Petition	163.97	163.92	164.21	164.61	167.82
Cumulative depreciation approved upto respective financial year	1130.15	1294.07	1458.28	1622.90	1790.72

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Depreciation as per Annexure III of the Regulations	163.97	163.92	164.21	164.61	167.82
Allowable Depreciation subject to maximum of 90% of the Capital Cost	163.97	163.92	164.21	164.61	167.82

1.5 RETURN ON EQUITY

Regulation 24(i) of the UPERC Generation Regulations, 2019 provides the base for determination of Return on Equity for the purpose of computation of fixed charges. The said regulations state that the Return on equity shall be computed in rupee terms on the equity base determined in accordance with this Regulation @15.0% per annum.

The equity base for the thermal power station as on 01.04.2019 has been considered as the closing equity balance for FY 2018-19 as approved by Commission in its final true-up order for FY 2018-19. Thereafter 30% of the total capitalization has been considered to be funded from equity infusion in each year of the control period.

Harduaganj Extn. TPS- MYT Petition for the control period FY 2019-20 to FY 2023-24

मुख्य अभियन्ता (वाणिज्य)
उपप्रबंधन विभाग
14वां तल, शक्ति भवन विस्तार
लखनऊ-226001

As per the Generation Tariff Regulations, equity would be eligible for return when the asset is commissioned. Accordingly, the table below provides the summary of equity base eligible for return and the Return on Equity claimed by the petitioner for the control period:

Table: Return on Equity for the Control Period (FY 2019-20 to FY 2023-24)

(All figures in Rs Crs)

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Opening Equity	941.15	939.00	940.64	942.02	945.90
Additions	0.01	1.64	1.38	3.87	30.55
Less: Decapitalisation	2.15	-	-	-	-
Closing Equity	939.00	940.64	942.02	945.90	976.44
Rate of Return on Equity (%)	15.0%	15.0%	15.0%	15.0%	15.0%
Allowable RoE	141.01	140.97	141.20	141.59	144.18

It is to humbly to bring to the attention of the Hon'ble Commission that based on the Government Order dated 31st July 2017 and subsequent adoption of the same by Board of Directors on 9th April 2018 of the Petitioner, the Petitioner would continue to bill the beneficiary considering the RoE at 2% Or at rate as decided by the BoD from time to time but within the ceiling of 15%.

1.6 OPERATION & MAINTENANCE EXPENSES

Regulation 24(iv) of the UPERC Generation Regulations, 2019 deals with the allowance of O&M expenses. The Hon'ble Commission in the generation tariff regulations – Para 25 (iv)(a) (a) have prescribed the yearly O&M expenses for the control period FY 2019-20 to FY 2023-24 based upon the Installed Capacity for the thermal power stations other than plant for Harduaganj (U#7)&Parichha (U#2) TPS. The Hon'ble Commission has provided special dispensation in the O&M norms for the Thermal power plants namely Harduaganj (U#7) & Parichha (U#2) TPS, the same have been provided in the Para 24(iv)(b) of the Generation Regulation.

Accordingly, based on the above stated norms the O&M expenses allowed for the power station for the Control period is depicted in the table below:

Table: O&M expense for the Control Period

Particulars	2019-20	2020-21	2021-22	2022-23	2023-24
Capacity (MW)	500	500	500	500	500
Norms (Lakh/MW)	32.96	34.12	35.31	36.56	37.84
O&M Expenses (Rs Cr)	164.80	170.60	176.55	182.80	189.20

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Further the Hon'ble Commission in its Para 25(iv) Note (c) has stated that the expenses on account of water charges shall be paid additionally at actuals subject to prudence check.

Provided that the generating station shall submit the details of year wise actual capital spares consumed at the time of truing up with appropriate justification for incurring the same and substantiating that the same is not funded through compensatory allowance or special allowance or claimed as a part of additional capitalization or consumption of stores and spares and renovation and modernization.

1.7 INTEREST ON WORKING CAPITAL

The Petitioner has worked out the working capital requirement based on the normative parameters prescribed in Para 24 (v) of the UPERC Generation Tariff Regulations 2019. The rate of interest on working capital has been considered on normative basis as the Bank Rate as on 1.4.2019 or as on 1st April of the year during the tariff period 2019-20 to 2023-24 in which the generating station or a unit thereof is declared under commercial operation, whichever is later.

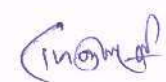
Further the Hon'ble Commission has provided the following norms for the purpose of calculating of the normative working capital for coal based generating stations:

- Cost of coal for 10 days for pit-head generating stations and 20 days for non-pit-head generating stations for generation corresponding to the normative annual plant availability factor or the maximum coal stock storage capacity whichever is lower
- Cost of secondary fuel oil for two months corresponding to the target availability and in case of use of more than one secondary fuel oil, cost of fuel oil stock for the main secondary fuel oil;
- Operation and Maintenance expenses including water charges for one month;
- Maintenance spares @ 20% of operation and maintenance expenses; and
- Receivables equivalent to 45days of capacity charges and energy charges for sale of electricity calculated on the target availability.

Based on the above premise, the computation of interest on working capital for the control period for kind consideration and approval of the Hon'ble Commission are as per table below:

(All figures in Rs Crs)

Harduaganj Extn	2019-20	2020-21	2021-22	2022-23	23023-24
Coal Cost	917.94	773.32	433.77	1,398.89	1,398.89
Oil Cost	9.14	11.16	10.61	14.12	14.12
Total Fuel Cost	927.08	784.49	444.38	1,413.01	1,413.01
Annual Fixed Charges	649.68	628.77	605.42	613.77	610.25
Total Receivables	1,576.76	1,413.26	1,049.80	2,026.78	2,023.26







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Table: Interest on Working Capital for the Control Period*(All figures in Rs Crs)*

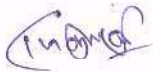
Obra B	2019-20	2020-21	2021-22	2022-23	2023-24
Cost of Coal	75.45	63.56	35.65	114.98	114.98
Cost of Main Secondary Fuel Oil	1.52	1.86	1.77	2.35	2.35
O & M Expenses	13.73	14.22	14.71	15.23	15.77
Maintenance Spares	32.96	34.12	35.31	36.56	37.84
Receivables	194.40	174.24	129.43	249.88	249.44
Total Working Capital	318.06	288.00	216.87	419.00	420.38
Rate of Interest	12.05%	11.25%	10.50%	10.50%	10.50%
Interest on Working Capital	38.33	32.40	22.77	44.00	44.14

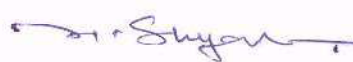
1.8 SUMMARY OF ANNUAL CAPACITY (FIXED) CHARGES

In view of the above submissions, the fixed cost of the Petitioner's Harduaganj Extension TPS for the control period under consideration works out at as under:

Table: Summary of Annual Capacity (Fixed) Charges for the Control Period*(All figures in Rs Crs)*

Particulars	2019-20 (Audited)	2020-21 (Audited)	2021-22 (Provisional)	2022-23 (Projected)	2023-24 (Projected)
Depreciation	163.97	163.92	164.21	164.61	167.82
Interest on Loan Capital	141.58	120.88	100.68	80.77	64.91
Return on Equity	141.01	140.97	141.20	141.59	144.18
O&M Expenses	164.80	170.60	176.55	182.80	189.20
Interest on Working Capital	38.33	32.40	22.77	44.00	44.14
Total Capacity Charges	649.68	628.77	605.42	613.77	610.25
Energy ex bus	3388	3388	3388	3388	3388
FC per unit	1.92	1.86	1.79	1.81	1.80






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2. ENERGY CHARGES

The following table highlights the normative parameters which the Hon'ble Commission has prescribed for the control period of FY 2019-20 to FY 2023-24:

Table Normative Operating Parameters for the Control Period

As per Tariff Generation Regulations for MYT FY 2020 to FY 2023

Normative Parameters	Unit	2019-20	2020-21	2021-22	2022-23	2023-24
Target Availability	%	85%	85%	85%	85%	85%
Target PLF	%	85%	85%	85%	85%	85%
Aux Energy Consumption	%	9.00%	9.00%	9.00%	9.00%	9.00%
Gross Heat Rate	Kcal/kWh	2430	2430	2430	2430	2430
Specific Fuel Oil Cons	ml/kWh	0.50	0.50	0.50	0.50	0.50

For the purpose of calculations of energy charges for FY 2019-20 to FY 2020-21, the average of the actual GCV of coal and oil and actual cost thereof for the particular Financial year has been taken for the purpose of calculations of energy charges. For FY 2022-23 and FY 2023-24, the average of the actual GCV of coal and oil and actual cost thereof of the ending three months (July to September 2022) has been taken for the purpose of calculations.

Energy charges for the control period have been projected based on the operating parameters prescribed in the Generation Tariff Regulations. A summarized position of energy charges proposed for the control period is given in Table below: (The details are available in tariff filing formats prescribed by the Hon'ble Commission)

Table: Calculation of Energy Charges for the Control Period

Description	Unit	2019-20	2020-21	2021-22	2022-23	2023-24
Capacity	MW	500	500	500	500	500
PLF	%	85%	85%	85%	85%	85%
Gross Station Heat Rate	Kcal/kWh	2430	2430	2430	2430	2430
Auxiliary Energy Consumption	%	9.00%	9.00%	9.00%	9.00%	9.00%
Energy Generation - Gross	MU	3,723	3,723	3,723	3,723	3,723
Auxiliary Energy Consumption	MU	335	335	335	335	335
Ex-bus Energy Sent Out	MU	3,388	3,388	3,388	3,388	3,388
Specific Oil Consumption	ml/kWh	0.50	0.50	0.50	0.50	0.50
Wt. Avg. GCV of Oil	KCal/Lt	9,482	9,482	10,570	10,570	10,570
Price of Oil	Rs./KL	52,721	52,721	53,503	75,834	75,834
Wt. Avg. GCV of Coal	kCal/kg	3603	3599	3339	3579	3579
GCV of Primary Fuel (Coal) less 85 Kcal/Kg on account of variation during storage	kCal/kg	3518	3514	3254	3494	3494
Price of Coal	Rs./MT	4454	4575	4553	5414	5414
Heat Contribution from SFO	Kcal/kWh	4.74	4.74	5.29	5.29	5.29

Description	Unit	2019-20	2020-21	2021-22	2022-23	2023-24
Oil Consumption	KL	1862	1862	1862	1862	1862
Heat Contribution from Coal	Kcal/kWh	2425	2425	2425	2425	2425
Specific Coal Consumption	kg/kWh	0.69	0.69	0.75	0.69	0.69
Coal Consumption	MMT	2.57	2.57	2.77	2.58	2.58
Total Cost of Oil	Rs Cr	9.81	9.81	9.96	14.12	14.12
Total Cost of Coal	Rs Cr	1,142.93	1,175.56	1,263.22	1,398.89	1,398.89
Total Fuel Cost	Rs Cr	1,152.74	1,185.37	1,273.18	1,413.01	1,413.01
Rate of Energy Charge from Secondary Fuel Oil ex-bus	Paise/kWh	2.90	2.90	2.94	4.17	4.17
Rate of Energy Charge from Coal ex-bus	Paise/kWh	337.35	346.98	372.86	412.91	412.91
Rate of Energy Charge ex-bus per kWh	Paise/kWh	340.25	349.88	375.80	417.07	417.07

2.1 FUEL COST ADJUSTMENT

Regulation 28 (ii) of the Generation Tariff Regulations 2019, provides the mechanism for claiming the adjustment of rate of energy charges on account of variation in price and heat values of fuels.

“(a) Initially, Gross Calorific Value of coal shall be taken (on as received basis) of the preceding three months. Any variation shall be adjusted on month to month basis on the basis of Gross Calorific Value of coal received and landed cost incurred by the generating company for procurement of coal or oil, as the case may be. No separate petition need to be filed with the Commission for fuel price adjustment. In case of any dispute, an appropriate application in accordance with Uttar Pradesh Electricity Regulatory Commission (Conduct of Business) Regulations 2004, as amended from time to time or any statutory reenactment thereof, shall be made before the Commission.”

Accordingly, the Petitioner would raise bills for recovery of Fuel Cost Adjustment.

(Signature)

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3. PRAYER

The Petitioner respectfully prays followings to the Hon'ble Commission:

1. The Hon'ble Commission is requested to Accept this Re-submission of Multi Year Tariff of Harduaganj Extension 2x250 MW TPS for the control period comprising FY 2019-20 to FY 2023-24
2. The Hon'ble Commission is requested to approve Annual Revenue Requirement for Harduaganj Extension for each of the Financial years for the period 2019-20 to 2023-24.
3. Permit recovery of expenses understated/ not considered in this Petition subsequent to the submission of this petition.
4. The Hon'ble Commission is requested to Condone any inadvertent omissions / errors / short comings and permit the applicant to add /change /modify / alter this Petition and make further submissions as may be required at later stages.
5. The Hon'ble Commission is requested to Pass such orders as Hon'ble Commission may deem fit and proper and necessary in the facts and circumstances of the case, to grant relief to the Petitioner.

(Signature)

(Signature)

(Signature)

(Signature)

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