

ASSAM ELECTRICITY REGULATORY COMMISSION

(AERC)

TARIFF ORDER March 25, 2025

TRUE-UP for FY 2023-24, APR for FY 2024-25, ARR for FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26

FOR

Assam Power Generation Corporation Limited (APGCL)

Petition No. 22/2024

## **Table of Contents**

<u>1</u>	INTRODUCTION1
1.1	CONSTITUTION OF THE COMMISSION1
1.2	TARIFF RELATED FUNCTIONS OF THE COMMISSION1
1.3	BACKGROUND2
1.4	Multi Year Tariff Regulations, 20212
1.5	Multi Year Tariff Regulations, 20244
1.6	PROCEDURAL HISTORY
1.7	STATE ADVISORY COMMITTEE MEETING8
<u>2</u>	SUMMARY OF APGCL'S PETITION
2.1	BACKGROUND9
2.2	True-up for FY 2023-249
2.3	ANNUAL PERFORMANCE REVIEW FOR FY 2024-2510
2.4	CAPITAL INVESTMENT PLAN FOR FY 2025-26 TO FY 2029-30
2.5	ARR FOR MYT CONTROL PERIOD FY 2025-26 TO FY 2029-30 AND TARIFF FOR FY 2025-26 FOR NTPS12
2.6	ARR FOR MYT CONTROL PERIOD FY 2025-26 TO FY 2029-30 AND TARIFF FOR FY 2025-26 FOR LTPS13
2.7	ARR FOR MYT CONTROL PERIOD FY 2025-26 TO FY 2029-30 AND TARIFF FOR FY 2025-26 FOR KLHEP14
2.8	ARR FOR MYT CONTROL PERIOD FY 2025-26 TO FY 2029-30 AND TARIFF FOR FY 2025-26 FOR LRPP15
2.9	ARR FOR MYT CONTROL PERIOD FY 2025-26 TO FY 2029-30 AND TARIFF FOR FY 2025-26 FOR NRPP16
<u>3</u>	SUMMARY OF OBJECTIONS RAISED, RESPONSE OF APGCL AND COMMISSION'S COMMENTS18
<u>4</u>	TRUING UP OF ARR FOR FY 2023-24
4.1	METHODOLOGY FOR TRUING UP
4.2	
4.3	PLANT AVAILABILITY FACTOR (PAF)/CAPACITY INDEX

4.4	PLANT LOAD FACTOR (PLF)
4.5	AUXILIARY CONSUMPTION
4.6	GROSS GENERATION AND NET GENERATION
4.7	STATION HEAT RATE (SHR)
4.8	FUEL COST
4.9	INCENTIVE FOR GENERATION
4.10	O&M Expenses43
4.11	CAPITALISATION
4.12	FUNDING OF CAPITALISATION
4.13	DEPRECIATION
4.14	INTEREST ON LOAN CAPITAL
4.15	RETURN ON EQUITY (ROE)
4.16	INTEREST ON WORKING CAPITAL (IOWC)
4.17	IMPACT OF AERC (PAYMENT OF FEES ETC.) REGULATION, 202060
4.18	ACTUAL TAX CLAIM
4.19	SPECIAL R&M EXPENSES
4.20	Non-Tariff Income
4.21	Sharing of Gains and Losses
4.22	REDUCTION IN ANNUAL FIXED CHARGES70
4.23	SUMMARY OF TRUE-UP FOR FY 2023-2470
4.24	NET ARR FOR EFFECTIVE CAPACITY
4.25	REVENUE FROM SALE OF POWER
<u>5 A</u>	NNUAL PERFORMANCE REVIEW FOR FY 2024-2576
5.1	METHODOLOGY FOR ANNUAL PERFORMANCE REVIEW76
5.2	INSTALLED AND EFFECTIVE CAPACITY OF FY 2024-2577
5.3	PLANT AVAILABILITY FACTOR (PAF)/CAPACITY INDEX
5.4	PLANT LOAD FACTOR (PLF)79
5.5	AUXILIARY CONSUMPTION
5.6	GROSS GENERATION AND NET GENERATION
5.7	STATION HEAT RATE

5.8	FUEL COST	84
5.9	O&M Expenses	88
5.10	CAPITAL EXPENDITURE AND CAPITALISATION	90
5.11	DEPRECIATION	91
5.12	INTEREST ON LOAN CAPITAL	93
5.13	RETURN ON EQUITY (ROE)	95
5.14	INTEREST ON WORKING CAPITAL (IOWC)	97
5.15	IMPACT OF AERC (PAYMENT OF FEES ETC.) REGULATION, 2020	99
5 16		
5.10	SPECIAL R&M	100
	SPECIAL R&M NON-TARIFF INCOME	
5.17		101
5.17 5.18	NON-TARIFF INCOME	101 101
5.17 5.18 5.19	NON-TARIFF INCOME SUMMARY OF APR FOR FY 2024-25	101 101 104

#### 6 CAPITAL INVESTMENT PLAN FOR THE MYT CONTROL PERIOD FROM FY 2025-26 TO FY 2029-30 .106

6.1	UPCOMING PROJECTS	106
6.2	CAPITAL INVESTMENT PLAN FOR LAKWA THERMAL POWER STATION	107
6.3	CAPITAL INVESTMENT PLAN FOR KARBI LANGPI HYDRO ELECTRIC PROJECT	111
6.4	CAPITAL INVESTMENT PLAN FOR LAKWA REPLACEMENT POWER PROJECT	115
6.5	CAPITAL INVESTMENT PLAN FOR NAMRUP REPLACEMENT POWER PROJECT	116
6.6	SUMMARY OF CAPITAL INVESTMENT PLAN	118

#### 

7.1		.119
7.2	YEAR-WISE CAPACITY FOR THE CONTROL PERIOD	.119
7.3	Plant Availability Factor (PAF) (%)	.120
7.4	Plant Load Factor (%)	.120
7.5	Auxiliary Consumption	.121
7.6	GROSS GENERATION AND NET GENERATION	.122

7.7	GROSS STATION HEAT RATE
7.8	FUEL COST
7.9	O&M Expenses
7.10	CAPITALISATION AND ITS FUNDING
7.11	DEPRECIATION
7.12	INTEREST ON LOAN CAPITAL
7.13	RETURN ON EQUITY138
7.14	INTEREST ON WORKING CAPITAL (IOWC)140
7.15	SPECIAL R&M PLAN FOR EXISTING STATIONS142
7.16	SUMMARY OF SPECIAL R&M PLAN
7.17	Non-Tariff Income
7.18	SUMMARY OF ARR FOR CONTROL PERIOD
7.19	NET ARR FOR EFFECTIVE CAPACITY
<u>8</u> <u>T</u>	ARIFF FOR FY 2025-26
8.1	CUMULATIVE REVENUE GAP/(SURPLUS) AND NET ARR FOR RECOVERY
8.2	Fixed Charges and Energy Charges for FY 2025-26 for NTPS, LTPS, KLHEP, LRPP and NRPP159
8.3	CAPACITY CHARGES AND ENERGY CHARGE RATE FOR KLHEP161
8.4	GENERATION TARIFF FOR FY 2025-26162
8.5	APPLICABILITY OF TARIFF
<u>9</u>	DIRECTIVES
<u>ANN</u>	EXURE-1 MINUTES OF THE 35TH MEETING OF THE STATE ADVISORY COMMITTEE168
<u>ANN</u>	EXURE- 1A: LIST OF MEMBERS & SPECIAL INVITES PRESENT AT 35 <sup>TH</sup> MEETING OF SAC183
<u>ANN</u>	EXURE 2- STATION WISE DEPRECIATION
<u>ANN</u>	EXURE 3A- REVISED CAPITAL EXPENDITURE PLAN FY 2024-25190
<u>ANN</u>	EXURE 3B- CAPITAL INVESTMENT PLAN198

ANNEXURE 4A - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
<u>2023-24</u>
ANNEXURE 4B - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
2024-25
ANNEXURE 4C - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
<u>2025-26</u>
ANNEXURE 4D - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
2026-27
ANNEXURE 4E - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
2027-28
ANNEXURE 4F - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
<u>2028-29</u>
ANNEXURE 4G - EQUITY ADDITION AND GRANT CONVERSION APPROVED (RS. CRORE) DURING FY
2029-30

### List of Tables

Table 1: True-up ARR for FY 2023-24 as submitted by APGCL (Rs. Crore)
Table 2: ARR after APR for FY 2024-25 as submitted by APGCL (Rs. Crore)10
Table 3: Capital Investment Plan for FY 2025-26 to FY 2029-30 as submitted by APGCL(Rs. Crore)
Table 4: ARR for NTPS for MYT Control Period as projected by APGCL (Rs. Crore)12
Table 5: Tariff of NTPS for FY 2025-26 as proposed by APGCL12
Table 5: ARR for LTPS for MYT Control Period as projected by APGCL (Rs. Crore)13
Table 6: Tariff of LTPS for FY 2025-26 as proposed by APGCL14
Table 7: ARR for KLHEP for MYT Control Period as projected by APGCL (Rs. Crore)14
Table 8: Tariff of KLHEP for FY 2025-26 as proposed by APGCL15
Table 9: ARR for LRPP for MYT Control Period as projected by APGCL (Rs. Crore)15
Table 10: Tariff of LRPP for FY 2025-26 as proposed by APGCL16
Table 11: ARR for NRPP for MYT Control Period as projected by APGCL (Rs. Crore)16
Table 12: Tariff of NRPP for FY 2025-26 as proposed by APGCL17
Table 13: List of Objectors    18
Table 14: Installed and Effective Capacity for FY 2023-24 (MW)30
Table 15: PAF/Capacity Index as submitted by APGCL
Table 16 : PAF/Capacity Index as approved by the Commission for FY 2023-2432
Table 17: Actual PLF as submitted by APGCL
Table 18: Auxiliary Consumption for FY 2023-24 as submitted by APGCL
Table 19: Auxiliary Consumption (%) as approved by the Commission in the truing up forFY 2023-24
Table 20: Actual Gross and Net Generation for FY 2023-24 as submitted by APGCL (MU)
Table 21: Gross and Net Generation for FY 2023-24 as approved by the Commission .37

Table 22: Station Heat Rate (kcal/kWh) for FY 2023-24 submitted by APGCL37
Table 23: Computation of actual weighted normative submitted by APGCL for NTPS38
Table 24: Computation of actual weighted normative submitted by APGCL for NRPP38
Table 25: Station Heat Rate (kcal/kWh) for FY 2023-24 as approved by the Commission
Table 26: Fuel cost claimed by APGCL for FY 2023-2440
Table 27: Actual Weighted Average GCV and Landed Price of Gas for FY 2023-24considered by the Commission
Table 28: Normative Fuel Cost for FY 2023-24 as computed by the Commission41
Table 29: Fuel Cost approved by the Commission in truing up for FY 2023-24 (Rs. Crore)
Table 30: Incentive for Generation Approved by the Commission43
Table 31: O&M expenses for FY 2023-24 as claimed by APGCL (Rs. Crore)43
Table 32: Details of O&M expenses claimed by APGCL for FY 2023-24 (Rs. Crore)44
Table 33: Actual O&M Expenses approved for FY 2023-24 (Rs. Crore)46
Table 34: Normative O&M expenses approved for True Up FY 2023-24       46
Table 35: Capitalisation claimed for FY 2023-24 (Rs. Crore)47
Table 36: Capitalisation approved for FY 2023-24 (Rs. Crore)47
Table 37: Funding of Capitalisation claimed for FY 2023-24 (Rs. Crore)48
Table 38: Funding of Capitalisation approved for FY 2023-24 (Rs. Crore)48
Table 39: Details of Depreciation claimed by APGCL for FY 2023-24 (Rs. Crore)49
Table 40: Depreciation approved for FY 2023-24 (Rs. Crore)
Table 42: Interest on Loan Capital for FY 2023-24 as approved by the Commission (Rs.Crore)
Table 43: Return on Equity submitted by APGCL for FY 2023-24 (Rs. Crore)56
Table 44: Return on Equity approved by the Commission for FY 2023-24 (Rs. Crore)57
Table 45: IoWC as approved by the Commission for FY 2023-24 (Rs. Crore)59

Table 46: Special R&M Expenses incurred by APGCL in FY 2023-24 (Rs. Crore)61
Table 47: Non-Tariff Income as claimed by APCGL for True-up for FY 2023-24 (Rs. Crore)
Table 48: Non Tariff Income approved by Commission for FY 2023-24 (Rs. Lakhs)66
Table 49: Sharing of Gains/(Losses) for O&M Expenses submitted by APGCL for FY 2023-24 (Rs. Crore)
Table 50: Sharing of (Gains)/Losses for O&M Expenses approved by the Commission forFY 2023-24 (Rs. Crore)
Table 51: Sharing of (Gains)/Loss on account of Fuel Parameters as Submitted by theAPGCL in the True-up for FY 2023-24 (Rs. Crore)
Table 52: Sharing of (Gains)/Loss on account of Fuel Parameters as approved by theCommission in the True-up for FY 2023-24 (Rs. Crore)
Table 53: Sharing of Gain/(Loss) on account of Auxiliary Consumption as submitted in theTrue-up for FY 2023-24
Table 54: Sharing of (Gain)/Loss on account of Auxiliary Consumption as approved by theCommission in the True-up for FY 2023-24
Table 55: Total Sharing of (Gain)/Loss approved by the Commission in the True-up for FY2023-24 (Rs. Crore)
Table 56: Reduction of fixed costs as approved by the Commission for True-up for FY2023-24 (Rs. Crore)
Table 57: True-up ARR for NTPS, LTPS and KLHEP for FY 2023-24 as approved by theCommission (Rs. Crore)
Table 58: True-up ARR for LRPP and NRPP for FY 2023-24 as approved by theCommission (Rs. Crore)
Table 59: True-up ARR for Existing Generating Stations for FY 2023-24 as approved bythe Commission at Effective Capacity (Rs. Crore)
Table 60: Revenue from Sale of Power as claimed by APGCL (Rs. Crore)74
Table 61: Reconciliation of Revenue from sale of power with the approved tariff (Rs.Crores)

Table 62: Installed and Effective Capacity for FY 2024-25
Table 63: Availability as submitted by APGCL for FY 2024-2578
Table 64: Target PAF/Capacity Index for recovery of full fixed Charges79
Table 65: Plant Load Factor submitted by APGCL for FY 2024-25       80
Table 66: Auxiliary energy consumption as claimed by APGCL for FY 2024-2581
Table 67: Auxiliary Consumption considered by the Commission for FY 2024-2582
Table 68: Gross and Net Generation as submitted by APGCL for FY 2024-2582
Table 69: Gross Generation and Net Generation considered by the Commission in theAPR for FY 2024-25
Table 70: Station Heat Rate as submitted by APGCL for FY 2024-25
Table 71: Gross Station Heat Rate (kcal/kWh) considered in APR for FY 2024-2584
Table 72:Actual Plant-wise GCV and Price as submitted by APGCL for FY 2024-2585
Table 73: Total Fuel Cost for NTPS for FY 2024-25 as submitted by APGCL (Rs. Crore)
Table 74: Total Fuel Cost for LTPS for FY 2024-25 as submitted by APGCL (Rs. Crore)
Table 75: Total Fuel Cost for LRPP for FY 2024-25 as submitted by APGCL (Rs. Crore)
Table 76: Total Fuel Cost for NRPP for FY 2024-25 as submitted by APGCL (Rs. Crore)
Table 77: GCV and Landed Price of Gas for FY 2024-25 considered by the Commission
Table 78: Fuel Cost considered by the Commission in APR for FY 2024-2588
Table 79: Normative O&M Cost submitted by APGCL for FY 2024-2588
Table 80: Normative O&M expenses for FY 2024-25 considered in APR (Rs. Crore)89
Table 81: Capital Expenditure and Capitalisation as submitted by APGCL for FY 2024-25(Rs. Crore)

Table 82: Capital Expenditure and Capitalisation as considered by the Commission for FY2024-25 (Rs. Crore)
Table 83: Funding of Capitalisation as considered by the Commission for FY 2024-25 (Rs.Crore)
Table 84: Station-wise depreciation considered for APR for FY 2024-25 (Rs. Crore)92
Table 85: Interest on Loan Capital considered for APR for FY 2024-25 (Rs. Crore)94
Table 86: Return on Equity considered by the Commission for FY 2024-25 (Rs. Crore)96
Table 87: Interest on Working Capital approved by the Commission for FY 2024-25 (Rs.Crore)
Table 88: AERC (Payment of Fees) Regulation, 2020 submitted by APGCL
Table 89: Revised Special R&M Schemes for FY 2024-25 (Rs. Lakh)100
Table 90: Station-wise details of non-tariff income for FY 2024-25101
Table 91: ARR for NTPS, LTPS and KLHEP for FY 2024-25 considered by theCommission in APR (Rs. Crore)102
Table 92: ARR for LRPP and NRPP for FY 2024-25 considered by the Commission inAPR (Rs. Crore)
Table 93: APR for Existing Generating Stations for FY 2024-25 as approved by theCommission at Effective Capacity (Rs. Crore)104
Table 94: Revenue Gap/(Surplus) for FY 2024-25 approved by Commission
Table 95: Upcoming Projects details submitted by APGCL106
Table 96: Capital Investment Plan for Existing Projects as submitted by APGCL (Rs.Crore) from FY 2025-26 to FY 2029-30
Table 97: Funding Pattern for CIP for FY 2025-26 to FY2029-30 (Rs. Crore)107
Table 97: Funding Pattern for CIP for FY 2025-26 to FY 2029-30 (Rs. Crore)107Table 98: Capital Investment plan for LTPS submitted by APGCL108
Table 98: Capital Investment plan for LTPS submitted by APGCL

Table 102: Capitalisation approved by the Commission for Control Period (Rs. Crore)118
Table 103: Plant Availability Factor for Control Period as submitted by APGCL120
Table 104: Projected PLF from FY 2025-26 to FY 2029-30
Table 105: Projected Auxiliary Consumption from FY 2025-26 to FY 2029-30121
Table 106: Auxiliary Consumption for Control Period as approved by the Commission
Table 107: Gross Generation and Net Generation for Control Period as submitted by         APGCL (MU)
Table 108: Gross Generation and Net Generation for the Control Period as approved by         Commission (MU)
Table 109: Gross Station Heat Rate for the Control Period as submitted by APGCL (kcal/kWh)
Table 110: Gross Station Heat Rate for the Control Period as approved by the Commission(kcal/kWh)
Table 111: Landed Price of Gas (Rs. /1000 SCM) and GCV as submitted by APGCL.125
Table 112: Fuel Cost for Control Period as submitted by APGCL (Rs. Crore)125
Table 113: GCV and Landed Price of Gas for Control Period as approved by the126
Commission126
Table 114: Fuel Cost for NTPS for Control Period as approved by the Commission (Rs.         Crore)
Table 115: Fuel Cost for LTPS for Control Period as approved by the Commission (Rs.         Crore)
Table 116: Fuel Cost for LRPP for Control Period as approved by the Commission (Rs.         Crore)
Table 117: Fuel Cost for NRPP for Control Period as approved by the Commission (Rs.         Crore)
Table 118: O&M Expenses for Control Period as submitted by APGCL (Rs. Crore)129

Table 119: Average actual O&M Expenses for FY 2021-22 to FY 2023-24 (Rs. Crore)
Table 120: Normative O&M Expenses for FY 2025-26 to FY 2029-30 (Rs. Crore)130
Table 121: Capitalisation for Control Period as submitted by APGCL (Rs. Crore)131
Table 122: Capitalisation approved by the Commission for Control Period (Rs. Crore)132
Table 123: Funding pattern of the capitalisation approved by the Commission for Control         Period (Rs. Crore)
Table 124: Projected Depreciation of APGCL for FY 2025-26 to 2029-30133
Table 125: Depreciation for Control Period as approved by the Commission (Rs. Crore)
Table 126: Interest on Loan Capital for Control Period as submitted by APGCL (Rs. Crore)
Table 127: Interest and Finance Charge as approved for the Control Period (Rs. Crore)
Table 128: Return on Equity for Control Period as submitted by APGCL (Rs. Crore)138
Table 129: Return on Equity approved for the Control Period (Rs. Crore)139
Table 130: Interest on Working Capital for Control Period as submitted by APGCL (Rs.         Crore)
Crore)140
Crore)

Table 139: Non-Tariff Income for Control Period as approved by the Commission (Rs.         Crore)
Table 140: Summary of ARR for NTPS for Control Period approved by the Commission         (Rs. Crore)
Table 141: Summary of ARR for LTPS for Control Period as approved by the Commission(Rs. Crore)
Table 142: Summary of ARR for KLHEP for Control Period as approved by theCommission (Rs. Crore)
Table 143: Summary of ARR for LRPP for Control Period as approved by the Commission(Rs. Crore)
Table 144: Summary of ARR for NRPP for Control Period as approved by the Commission(Rs. Crore)
Table 145: ARR for NTPS for the control period as approved by the Commission atEffective Capacity (Rs. Crore)156
Table 146: ARR for LTPS for the control period as approved by the Commission atEffective Capacity (Rs. Crore)
Table 147: Revenue Gap/(Surplus) as submitted by APGCL (Rs. Crore)158
Table 148: Revenue Gap/(Surplus) for FY 2023-24 as approved by the Commission (Rs.Crore)
Table 149: Proposed Generation tariff as submitted by APGCL (Rs. Crore)159
Table 150: Fixed Charges as approved for FY 2025-26 by the Commission (Rs. Crore)
Table 151: Energy Charges for FY 2025-26 approved by the Commission (Rs. Crore)
Table 152: Proposed Generation tariff for KLHEP as submitted by APGCL161
Table 153: Capacity Charges and Energy Charges approved by the Commission forKLHEP for FY 2025-26
Table 154: Generation Tariff for FY 2025-26 approved by the Commission

### List of Abbreviations

A&G	Administrative and General
ABITA	Assam Branch of Indian Tea Association
ADB	Asian Development Bank
AEGCL	Assam Electricity Grid Corporation Limited
AERC	Assam Electricity Regulatory Commission
AFC	Annual Fixed Charges
AGCL	Assam Gas Company Limited
APC	Auxiliary Power Consumption
APDCL	Assam Power Distribution Company Limited
APGCL	Assam Power Generation Corporation Limited
APM	Administered Pricing Mechanism
APR	Annual Performance Review
ARR	Aggregate Revenue Requirement
ASEB	Assam State Electricity Board
CAG/C&AG	Comptroller and Auditor General
CC	Combined Cycle
CERC	Central Electricity Regulatory Commission
COD	Date of Commercial Operation
CPI	Consumer Price Index
DTR	Distribution Transformer
EPC	Engineering Procurement and Construction
ERP	Enterprise Resource Planning
FAR	Fixed Asset Register
FINER	Federation of Industry & Commerce of North Eastern Region
FPA	Fuel Price Adjustment
FY	Financial Year
GAIL	Gas Authority of India Limited
GCV	Gross Calorific Value
GFA	Gross Fixed Assets

GoA	Government of Assam
GSHR	Gross Station Heat Rate
GT	Gas Turbine
HRSG	Heat Recovery Steam Generator
IoWC/IWC	Interest on Working Capital
kcal	kilo calorie
KLHEP	Karbi Langpi Hydro Electric Project
kW	kilo Watt
kWh	kilo Watt Hour
LED	Light Emitting Diode
LRPP	Lakwa Replacement Power Project
LTPS	Lakwa Thermal Power Station
MCLR	Marginal Cost of Funds based Lending Rate
MMBTU	Million Metric British Thermal Unit
MMSCMD	Million Metric Standard Cubic Meter per Day
MOPNG	Ministry of Petroleum and Natural Gas
MSHEP	Myntriang Small Hydro Electric Project
MU	Million Units
MW	Mega Watt
MYT	Multi Year Tariff
NAPAF	Normative Annual Plant Availability Factor
NRPP	Namrup Replacement Power Project
NTI	Non-Tariff Income
NTPS	Namrup Thermal Power Station
O&M	Operation and Maintenance
OC	Open Cycle
OEM	Original Equipment Manufacturer
OIL	M/s Oil India Limited
PAF	Plant Availability Factor
PGCIL	Power Grid Corporation of India Limited
PLF	Plant Load Factor
PoC	Point of Connection

R&M	Repairs and Maintenance
RoE	Return on Equity
SAC	State Advisory Committee
SBI	State Bank of India
SCM	Standard Cubic Meter
SHR	Station Heat Rate
SLDC	State Load Despatch Centre
TVS	Technical Validation Session
WHRU	Waste Heat Recovery Unit
WPI	Wholesale Price Index

### ASSAM ELECTRICITY REGULATORY COMMISSION Guwahati

Present

#### Shri K.S. Krishna, Chairperson

#### Shri A. Bhattacharyya, Member

Petition No. 22/2024

Assam Power Generation Corporation Limited (APGCL) - Petitioner

### ORDER

#### (Passed on 25<sup>th</sup> March 2025)

- (1) APGCL filed Petition for approval of True-Up for FY 2023-24, Annual Performance Review of FY 2024-25, Capital Investment Plan for the MYT Control Period FY 2025-30, MYT Petition for FY 2025-30 and Determination of Tariff for FY 2025- 26 for NTPS, LTPS, KLHEP LRPP and NRPP as per the AERC (Terms and Conditions for determination of Multi-Year Tariff) Regulations, 2021 (MYT Regulations, 2021) and AERC (Terms and Conditions for determination of Multi-Year Tariff) Regulations, 2024 (MYT Regulations, 2024) as applicable on November 30, 2024. The same was registered as Petition No. 22/2024.
- (2) The Commission held an Admissibility Hearing on December 20, 2024 and admitted the Petition (Petition No. 22/2024) vide Order dated December 20, 2024, subject to submission of additional information as sought for.
- (3) The Commission observed that there were a few inconsistencies in the Petition. The Commission sought additional data and clarifications on the Petitions vide AERC letter no. 973/2024/10 dated January 21, 2025.

- (4) On admission of the Petition, in accordance with Section 64 of the Electricity Act, 2003, the Commission directed APGCL to publish a summary of the ARR and Tariff filings in local dailies to facilitate due public participation.
- (5) Accordingly, a Public Notice was issued by the APGCL inviting objections/suggestions from stakeholders to be submitted on or before January 22, 2025. The notice was published in six (6) leading newspapers of the State, as shown in the Table below:

Date	Name of Newspaper	Content Published
26.12.2024	The Assam Tribune	Public Notice in English
27.12.2024	Dainik Asom/Dainik	Public Notice in Assamese
	Janambhumi	
27.12.2024	Dainik Jugasankha (Bangla)	Public Notice in English
27.12.2024	Purbanchal Prahari (Hindi)	Public Notice in English
27.12.2024	Bodosa (Bodo)	Public Notice in English
27.12.2024	Thekar (Karbi)	Public Notice in English

(6) A short small advertisement also published in five (5) newspapers stating that copy of the Petition is made available on the website, as shown in the Table below:

Date	Name of Newspaper	Content Published	
29.12.2024	The Assam Tribune	Public Notice in English	
29.12.2024	Dainik Asom/Dainik	Public Notice in English	
	Janambhumi		
29.12.2024	Dainik Jugasankha (Bangla)	Public Notice in English	
29.12.2024	2024 Purbanchal Prahari (Hindi) Public Notice in English		
29.12.2024	Bodosa (Bodo)	Public Notice in English	

(7) A copy of the Petition and other relevant documents were also directed to be made available to the consumers and other interested Parties at the office of the Managing Director of APGCL. A copy of the Petition was also made available on the websites of the Commission and APGCL.

- (8) In response to the Commission's letter dated January 21, 2025, APGCL submitted their replies to data gaps on January 30, 2025 and February 03, 2025. After scrutinizing the first set of replies, a Technical Validation Session (TVS) was conducted on February 10, 2025 at the conference hall of AERC. The Commission sought more clarifications on the Petition from APGCL vide mail dated February 14, 2025. The replies to the second set of queries were submitted by APGCL on February 21, 2025 and on February 28, 2025.
- (9) The Petitions were also discussed in the 35<sup>th</sup> Meeting of the State Advisory Committee (SAC) (constituted under Section 87 of the Electricity Act, 2003) held on February 27, 2025 at Bidyut Niyamak Bhawan, Six Mile, Guwahati.
- (10) The Commission received suggestion/objections from three (3) stakeholders namely Federation of Industry & Commerce of North Eastern Region (FINER), Assam Branch Indian Tea Association (ABITA) and Consumer Advocacy Cell (CAC) on the Petitions filed by APGCL. The stakeholders were notified about the place, date and time of Hearing, to enable them to take part in the Hearing. A notice was also published in Newspapers inviting participation from the general public as well as the Respondents.
- (11) The Hearing was held at Bidyut Niyamak Bhawan Six Mile, Guwahati on March 12, 2025 as scheduled. All stakeholders/respondents who participated in the Hearing were given the opportunity to express their views on the Petition. The details are discussed in the Chapters attached with this Order.
- (12) The Commission, now in exercise of its powers and functions vested under Sections 61, 62, 86 and 181 of the Electricity Act, 2003 and all other powers enabling it in this behalf and taking into consideration the submissions made by the Petitioner, objections and suggestions received from stakeholders and all other relevant materials on record, has approved the True-Up for FY 2023-24, Annual Performance Review of FY 2024-25, Capital Investment Plan for the MYT Control Period FY 2025-30, MYT Petition for FY 2025-30 and determination of tariff for FY 2025- 26, as detailed in subsequent Chapters of this Order.
- (13) The Commission directs APGCL to publish a Public Notice intimating the revised Generation Tariff before the implementation of this Order, in English and Vernacular newspapers and on the website of APGCL.

- (14) The approved Generation Tariff shall be effective from April 01, 2025 and shall continue until replaced by any subsequent Order of the Commission.
- (15) Accordingly, the Petition 22 of 2024 stands disposed of.

Sd/- Sd/-

(A. Bhattacharyya)

(K. S. Krishna)

Member, AERC Chairperson, AERC

## **1 INTRODUCTION**

#### **1.1 Constitution of the Commission**

- 1.1.1 The Assam Electricity Regulatory Commission (hereinafter referred to as the AERC or the Commission) was established under the Electricity Regulatory Commissions Act, 1998 (14 of 1998) on February 28, 2001. The first proviso of Section 82(1) of the Electricity Act, 2003 (hereinafter referred as the Act or the EA, 2003) has ensured continuity of the Commission under the EA 2003.
- 1.1.2 The Commission is mandated to exercise its powers and functions vested under Sections 61, 62, 86 and 181 of the EA 2003 and all the other powers enabling it in this behalf, to determine the ARR and Tariff of Assam Power Generation Corporation Limited (APGCL).

#### 1.2 Tariff related Functions of the Commission

- 1.2.1 Under Section 86 of the Act, the Commission has the following tariff related functions:
  - a) To determine the tariff for electricity, wholesale, bulk or retail, as the case may be;
  - b) To regulate power purchase and procurement process of the distribution utilities including the price at which the power shall be procured from the generating companies, generating stations or from other sources for transmission, sale, distribution and supply in the State;
  - c) To promote competition, efficiency and economy in the activities of the electricity industry to achieve the objects and purposes of this Act.
- 1.2.2 Under Section 61 of the Act in the determination of tariffs, the Commission is guided by the following:
  - a) The principles and methodologies specified by the Central Commission for determination of the tariff applicable to generating companies and transmission licensees;
  - b) That the electricity generation, transmission, distribution and supply are conducted on commercial principles;
  - c) That factors which would encourage efficiency, economical use of the resources, good performance, optimum investments, and other matters which the State

commission considers appropriate for the purpose of this Act;

- d) The interests of the consumers are safeguarded and at the same time, the consumers pay for the use of electricity in a reasonable manner based on their customer category cost of supply;
- e) That the tariff progressively reflects the cost of supply of electricity at an adequate and improving level of efficiency and also gradually reduces cross subsidies;
- f) The National Electricity Plan formulated by the Central Government including the National Electricity Policy and Tariff Policy.

#### 1.3 Background

- 1.3.1 APGCL is the successor corporate entity of erstwhile Assam State Electricity Board (ASEB) formed pursuant to the notification of the Government of Assam, notified under sub-sections (1), (2), (5), (6) and (7) of Section 131 and Section 133 of the EA 2003 (Central Act 36 of 2003), for the purpose of transfer and vesting of functions, properties, interests, rights, obligations and liabilities, along with the transfer of personnel of the Board to successor entries. APGCL is a Company incorporated with the main object of generation of electricity in the State of Assam and is a Generating Company under the various provisions of the Act.
- 1.3.2 APGCL owns and operates the generating stations previously owned by ASEB. APGCL started functioning as s separate entity from December 10, 2004.

#### 1.4 Multi Year Tariff Regulations, 2021

- 1.4.1 The Commission, in exercise of the powers conferred under Section 61 read with Section 181(2) (zd) of the Act, notified the AERC (Terms and Conditions for determination of Multi Year Tariff) Regulations, 2021 (herein after referred as "MYT Regulations, 2021") on September 18, 2021. These Regulations are applicable for determination of Tariff for Generation, Transmission, SLDC, Wheeling and Retail Supply for the Control Period of three financial years from April 1, 2022 onwards up to March 31, 2025.
- 1.4.2 Regulation 4.2 of the MYT Regulations, 2021, specifies the MYT framework for the Control Period from FY 2022-23 to FY 2024-25, as reproduced below:

"4.2 The Multi-Year Tariff framework shall be based on the following elements, for

calculation of Aggregate Revenue Requirement and expected revenue from tariff and charges for Generating Companies, Transmission Licensee, SLDC, Distribution Wheeling Business and Retail Supply Business:

• • •

(vi) Annual Performance review vis-à-vis the approved forecast and categorization of variation in performance as those caused by factors beyond the control of the applicant (uncontrollable items) shall be undertaken by the Commission;

(vii) True up of the past years based on audited annual accounts of the licensees and the Generation companies.

(viii) The mechanism for pass-through of approved gains or losses on account of uncontrollable items as specified by the Commission in these Regulations;

(ix) The mechanism for sharing of approved gains or losses arising out of controllable items as specified by the Commission in these Regulations;

(x) Tariff determination for Generating Companies, SLDC, Transmission Licensee and Distribution Wheeling Business and Retail Supply Business, for each financial year within the Control period based on the approved forecast. The tariff shall be reviewed at the time of the true-up and annual performance review.

(xi) There will be no true-up of the controllable items except on account of Force Majeure events or on account of variations attributable to uncontrollable items. The variations in the controllable items, as defined in regulation 10, over and above the norms specified will be governed by incentive and penalty framework specified in these regulations.

(xii) The tariff determined by the Commission and the directions given in the MYT order shall be the quid pro quo and mutually inclusive. The tariff determined shall, within the time period specified in the order, be subject to the compliance of the directions by the generating company and the licensees to the satisfaction of the Commission. Non-compliance of directions given in the tariff order may also lead to invocation of the provisions of section 142 of the Act.

(xiii) The tariff determined by the Commission shall continue to operate till it is modified or revised by the Commission."

#### 1.5 Multi Year Tariff Regulations, 2024

- 1.5.1 The Commission, in exercise of the powers conferred under Section 61 read with Section 181(2) (zd) of the Act, notified the AERC (Terms and Conditions for determination of Multi Year Tariff) Regulations, 2024 (herein after referred as "MYT Regulations, 2024") on November 05, 2024. These Regulations are applicable for determination of Tariff for Generation, Transmission, SLDC, Wheeling and Retail Supply for the Control Period of three financial years from April 1, 2025 onwards up to March 31, 2030. These Regulations are applicable to all existing and future Generating Companies, Transmission Licensees and Distribution Licensees within the State of Assam.
- 1.5.2 Regulation 4.2 of the MYT Regulations, 2024, specifies the MYT framework for the Control Period from FY 2024-25 to FY 2029-30, as reproduced below:

"4.2 The Multi-Year Tariff framework shall be based on the following elements, for calculation of Aggregate Revenue Requirement and expected revenue from tariff and charges for Generating Companies, Transmission Licensee, SLDC, Distribution Wheeling Business and Retail Supply Business:

(i) Submission of Multi-Year Tariff Petition by the Applicant at the beginning of the control period, comprising forecast of Aggregate Revenue Requirement for the entire Control Period and expected revenue from existing tariff and Charges, expected revenue gap or surplus, for each year of the Control Period, and proposed tariff and charges for ensuing year, i.e. first year of the Control Period.

Provided that the Distribution Licensees shall propose the category-wise tariff for the first year of the Control Period:

*Provided also that Multi*-Year Traiff Petition shall also include truing up for FY 2023-24 and the Annual Performance Review for FY 2024-25 to be carried out under Assam Electricity Regulatory Commission (Terms & Conditions of Multi-Year Tariff) Regulations, 2021.(*ii*) A detailed Capital Investment Plan for each year of the Control Period, shall be submitted by the applicant for the Commission's approval;

(iii) The applicant shall submit operating norms and trajectories of performance parameters for each year of the Control Period, for the Commission's approval;

(iv) The applicant shall submit the forecast of Aggregate Revenue Requirement and expected revenue from existing tariff for each year of the Control Period, and the Commission shall approve the tariff for Generating Companies, SLDC, Transmission Licensee, Distribution Wheeling Business and Retail Supply Business, for each year of the Control Period. The Tariff shall be reviewed at the time of the True-Up and annual performance review;

(v) In its tariff petition, a generating company shall submit information to support the determination of tariff for each generating station

(vi) Annual Performance review vis-à-vis the approved forecast and categorization of variation in performance as those caused by factors beyond the control of the applicant (uncontrollable items) shall be undertaken by the Commission;

(vii) True up of the past years based on audited annual accounts of the licensees and the Generation companies shall also be undertaken;

(viii) The mechanism for pass-through of approved gains or losses on account of uncontrollable items as specified by the Commission in these Regulations;

(ix) The mechanism for sharing of approved gains or losses arising out of controllable items as specified by the Commission in these Regulations;

(xi) There will be no true-up of the controllable items except on account of Force Majeure events or on account of variations attributable to uncontrollable items. The variations in the controllable items, as defined in regulation 10, over and above the norms specified will be governed by incentive and penalty framework specified in these regulations.

(xii) The tariff determined by the Commission and the directions given in the MYT order shall be the quid pro quo and mutually inclusive. The tariff determined shall, within the time period specified in the order, be subject to the compliance of the directions by the generating company and the licensees to the satisfaction of the Commission. Non-compliance of directions given in the tariff order may also lead to invocation of the provisions of section 142 of the Act.

(xiii) The tariff determined by the Commission shall continue to operate till it is modified or revised by the Commission."

#### **1.6 Procedural History**

- 1.6.1 As per Regulation 4.2(i) of the MYT Regulations, 2024, APGCL is required to file an application for true-up for previous year, i.e., FY 2023-24, APR for FY 2024-25, ARR for the Control Period from FY 2025-26 to FY 2029-30, and tariff for FY 2025-26 on or before November 30, 2024.
- 1.6.2 APGCL is required to file the Petition for approval of Truing up for FY 2023-24, APR for FY 2024-25, ARR for FY 2025-26 to FY 2029-30, and determination of Tariff for FY 2025-26 as per MYT Regulations, 2021 and MYT Regulations, 2024 as applicable, by November 30, 2024. APGCL filed the Petition for approval of Truing up for FY 2023-24, APR for FY 2024-25, ARR for FY 2025-26 to FY 2029-30, and determination of Tariff for FY 2025-26 as per MYT Regulations, 2021 and MYT Regulations, 2024, on December 10, 2024 after grant of extension by the Commission vide order against the condonation of delay Petition no. 19/2024. The same was registered as Petition No. 22/2024.
- 1.6.3 The Commission held an Admissibility Hearing on December 20, 2024 and admitted the Petition (Petition No. 22/2024) vide Order dated December 20, 2024, subject to submission of additional information as sought for. The condonation of delay Petition no. 19/2024 was also disposed of vide the same order.
- 1.6.4 On admission of the Petition, in accordance with Section 64 of the Electricity Act,2003, the Commission directed APGCL to publish a summary of the ARR and Tariff filings in local dailies to facilitate due public participation.
- 1.6.5 The Commission observed that there were a few inconsistencies in the Petition. The Commission sought additional data and clarifications on the Petitions vide letter no. 973/2024/10 dated January 21, 2025.
- 1.6.6 Accordingly, a Public Notice was issued by the APGCL inviting objections/suggestions from stakeholders to be submitted on or before January 22, 2025. The notice was published in six (6) leading newspapers of the State, as shown in the Table below:

Date	Name of Newspaper	Content Published			
26.12.2024	The Assam Tribune	Public Notice in English			
27.12.2024	Dainik Asom/Dainik Janambhumi	Public Notice in Assamese			
27.12.2024	Dainik Jugasankha (Bangla)	Public Notice in English			
27.12.2024	Purbanchal Prahari (Hindi)	Public Notice in English			
27.12.2024	Bodosa (Bodo)	Public Notice in English			
27.12.2024	Thekar (Karbi)	Public Notice in English			

1.6.7 A short small advertisement also published in five (5) newspapers stating that copy of the Petition is made available on the website, as shown in the Table below:

Date	Name of Newspaper	Content Published
29.12.2024	The Assam Tribune	Public Notice in English
29.12.2024 Dainik Asom/Dainik Janambhumi		Public Notice in English
29.12.2024 Dainik Jugasankha (Bangla)		Public Notice in English
29.12.2024	Purbanchal Prahari (Hindi)	Public Notice in English
29.12.2024	Bodosa (Bodo)	Public Notice in English

- 1.6.8 A copy of the Petition and other relevant documents were also directed to be made available to the consumers and other interested Parties at the office of the Managing Director of APGCL. A copy of the Petition was also made available on the websites of the Commission and APGCL.
- 1.6.9 In response to the Commission's letter dated January 21, 2025, APGCL submitted their replies to data gaps on January 30, 2025 and February 03, 2025. After scrutinizing the first set of replies, a Technical Validation Session (TVS) was conducted on February 10, 2025. The Commission sought more clarifications on the Petition from APGCL vide email dated February 14, 2025. The replies to the second set of queries were submitted by APGCL on February 21, 2025 and 28.02.2025. The Petitions were also discussed in the 35<sup>th</sup> Meeting of the State Advisory Committee (SAC) (constituted under Section 87 of the Electricity Act, 2003) held on February 27, 2025 at Bidyut Niyamak Bhawan, Six Mile, Guwahati.

- 1.6.10 The Commission received suggestions/objections from three (3) stakeholders on the Petitions filed by APGCL. The stakeholders were notified about the place, date and time of Hearing, to enable them to take part in the Hearing. A notice was also published in Newspapers inviting participation from the general public as well as the Respondents. The Hearing was held at Bidyut Niyamak Bhawan Six Mile, Guwahati on March 12, 2025 as scheduled. All stakeholders/respondents who participated in the Hearing were given the opportunity to express their views on the Petition. The details are discussed in the Chapters attached with this Order.
- 1.6.11 All the written representations submitted to the Commission and oral submissions made before the Commission in the Hearing and the responses of APGCL have been carefully considered while issuing this Tariff Order. The major issues raised by different consumers and consumer groups along with the response of APGCL and views of the Commission are elaborated in **Chapter 3** of this Order.

#### 1.7 State Advisory Committee Meeting

1.7.1 A meeting of the SAC was convened on February 27, 2025 and members were briefed on the Tariff Petition of APGCL. The Minutes of the SAC meeting are appended to this Order as **Annexure 1**.

## 2 Summary of APGCL's Petition

#### 2.1 Background

2.1.1 APGCL submitted the Petition on November 30, seeking approval for Truing up for FY 2023-24, APR for FY 20224-25, ARR for FY 2025-26to FY 2029-30, and determination of Tariff for FY 2025-26 (Petition No. 22/2024). The Generation Tariff is to be recovered from the Assam Power Distribution Company Limited (APDCL), who is the sole buyer of power from APGCL.

#### 2.2 True-up for FY 2023-24

2.2.1 APGCL submitted the True-up for NTPS, LTPS, KLHEP, LRPP and NRPP for FY 2023-24. APGCL submitted that the True-up for FY 2023-24 is based on the audited accounts and in line with the provisions on true-up of various costs as specified under Regulation 10 of the MYT Regulations, 2021. The summary of ARR and Revenue Gap/(Surplus) claimed by APGCL for FY 2023-24 is shown in the following Table:

SI. No.	Particulars	NTPS	LTPS	KLHEP	LRPP	NRPP	TOTAL APGCL
I	Power Generation						
1	Gross Generation (MU)	132.36	367.76	329.80	478.96	699.18	2008.05
2	Net Generation (MU)	121.11	339.98	326.18	462.19	664.22	1913.68
3	Auxiliary Consumption (%)	8.50%	7.55%	1.10%	3.50%	5.00%	4.7%
II	Fixed Charges						
4	Operation & Maintenance Expenditure	12.75	48.30	36.11	32.19	48.23	177.59
5	Increase in AERC Tariff Filing Fees	0.10	0.10	0.00	0.10	0.00	0.30
6	Interest & Finance Charges	0.00	0.01	9.11	1.57	43.72	54.41
7	Interest on working Capital	3.39	11.04	2.34	10.58	11.60	38.95
8	Depreciation	1.53	15.57	22.92	12.01	42.23	94.26
9	Return on Equity	1.95	15.73	23.26	10.39	33.91	85.23
10	Income Tax	1.14	3.67	0.77	3.75	4.21	13.53
11	Special R&M	0.00	14.02	19.11	18.68	2.16	53.97

Table 1: True-up ARR for FY 2023-24 as submitted by APGCL (Rs. Crore)

SI. No.	Particulars	NTPS	LTPS	KLHEP	LRPP	NRPP	TOTAL APGCL
12	Less: Other Income	5.84	-23.93	-10.51	0.00	0.00	-40.27
13	Total Fixed Charges	15.03	84.51	103.11	89.27	186.07	477.98
II	Fuel Cost	84.95	251.34	0.00	264.31	212.48	813.08
111	Total Revenue Requirement	99.98	335.85	103.11	353.58	398.54	1291.06
IV	Incentive for generation for FY 2023-24	0.99	0.00	0.00	0.00	0.00	0.99
	Sharing of (Gains)/Losses	5.74	-12.39	-0.26	-2.25	3.04	-6.13
	Reduction in Fixed Cost on account of PAF	0.00	-5.12	-27.43	0.00	-4.12	-36.67
V	Net ARR	106.71	318.34	75.42	351.32	397.46	1249.25
VI	Revenue from Sale of Power	100.73	324.51	68.51	331.89	372.59	1198.23
VII	Revenue Gap/(Surplus)	5.98	-6.17	6.91	19.43	24.87	51.02
VIII	Per unit cost (Rs./kWh)	8.81	9.36	2.31	7.60	5.98	6.53

2.2.2 APGCL has claimed Revenue Gap of Rs. 51.02 Crore for FY 2023-24 in the true-up.

#### 2.3 Annual Performance Review for FY 2024-25

2.3.1 APGCL has claimed the ARR after APR for FY 2024-25 based on its estimations, as detailed in the table below:

SI. No.	Particulars	NTPS*	LTPS*	KLHEP	LRPP	NRPP	Total APGCL
I	Power Generation						
1	Gross Generation (MU)	112.54	446.90	377.73	480.72	768.84	2186.72
2	Net Generation (MU)	105.97	414.60	375.38	463.90	730.40	2090.26
3	Auxiliary Consumption (%)	5.84%	7.23%	0.62%	3.50%	5.0%	4.4%
II	Fixed Charges						
4	Operation & Maintenance Expenditure	13.57	51.40	32.14	34.25	25.90	163.53
	Increase in AERC Tariff Filing Fees	0.10	0.10	0.00	0.10	0.00	0.30
5	Interest & Finance Charges	0.00	0.00	7.56	0.49	39.75	47.81

Table 2: ARR after APR for FY 2024-25 as submitted by APGCL (Rs. Crore)

SI. No.	Particulars	NTPS*	LTPS*	KLHEP	LRPP	NRPP	Total APGCL
6	Interest on working Capital	2.98	13.62	2.68	11.48	10.75	41.51
7	Depreciation	1.58	16.09	23.50	12.16	42.46	95.79
8	Return on Equity	1.99	16.34	23.98	10.62	33.99	86.93
9	Income Tax	0.00	0.00	0.00	0	0	0.00
10	Special R&M	0.00	26.00	0.00	36.44	0.00	62.44
11	Less: Other Income	-1.25	-14.61	-13.86	0.00	-4.71	-34.42
12	Total Fixed Charges	18.98	108.94	82.28	105.54	148.14	463.89
II	Fuel Cost	67.60	310.40	-	266.32	226.00	870.32
111	Total Revenue Requirement	86.58	419.33	82.28	371.86	374.14	1334.21
	Total Cost	86.58	419.33	82.28	371.86	374.14	1334.21
IV	Revenue from Sale of Power	79.23	386.23	83.32	352.19	372.88	1273.86
V	Revenue Gap/(Surplus)	7.35	33.10	-1.05	19.67	1.26	60.35
VI	Per unit tariff (Rs./kWh)	8.17	10.11	2.19	8.02	5.12	6.38

2.3.2 APGCL submitted that it has not considered the Revenue Gap for FY 2024-25 in the tariff for FY 2025-26 since the figures for FY 2024-25 are estimated and subjected to True-up. APGCL further submitted that it shall consider the same at the time of True-up Petition for FY 2024-25.

#### 2.4 Capital Investment Plan for FY 2025-26 to FY 2029-30.

2.4.1 APGCL has proposed the Capital Investment Plan for existing and upcoming projects for the Control Period from FY 2025-26 to FY 2029-30 as detailed in the Table below:

## Table 3: Capital Investment Plan for FY 2025-26 to FY 2029-30 as submitted by APGCL (Rs. Crore)

Station	2026-27	2027-28	2028-29	2029-30
	Projected	Projected	Projected	Projected
NTPS	-	-	-	-
LTPS	26.05	91.24	2.93	6.95
KLHEP	59.07	34.99	16.66	1.88
LRPP	24.94	19.91	0.13	0.13
NRPP	14.53	12.32	0.65	0.13
Total	124.59	158.45	20.36	9.08

\*Note: APGCL has proposed to fund all the CAPEX through Equity for the control period

# 2.5 ARR for MYT Control Period FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26 for NTPS

2.5.1 APGCL has projected the ARR for the MYT Control Period from FY 2025-26 to FY 2029-30 for NTPS as detailed in the Table below:

SI.	Particulars	FY 2025-	FY 2026-	FY 2027-	FY 2028-	FY 2029-
No		26	27	28	29	30
•		Projected	Projected	Projected	Projected	Projected
I	Power Generation					
1	Gross Generation (MU)	113.88	113.88	113.88	113.88	113.88
2	Net Generation (MU)	108.76	108.76	108.76	108.76	108.76
3	Auxiliary Consumption (%)	5.50%	5.50%	5.50%	5.50%	5.50%
II	Fixed Charges					
4	Operation &					
	Maintenance	14.66	15.55	16.50	17.51	18.57
	Expenditure					
5	Interest & Finance	0.00	0.00	0.00	0.00	0.00
	Charges*					
6	Interest on working Capital*	3.09	3.22	3.36	3.50	3.57
7	Depreciation	1.59	1.59	1.59	1.59	1.59
8	Return on Equity	2.00	2.00	2.00	2.00	2.00
9	Special R&M	0.00	0.00	0.00	0.00	0.00
11	Less: Other Income	(2.67)	(2.67)	(2.67)	(2.67)	(2.67)
	Total Fixed Charges	18.67	19.70	20.79	21.93	23.06
	Fuel Cost	69.8	72.3	74.8	77.2	77.2
IV	Total Revenue Requirement	88.44	92.01	95.63	99.10	100.24

Table 4: ARR for NTPS for MYT Control Period as projected by APGCL (Rs. Crore)

Table 5: Tariff of NTPS for FY 2025-26 as proposed by APGCL

Particulars	FY 2025-26
Annual Fixed Charges (Rs. Crore)	18.67
Monthly Fixed Charges (Rs. Crore)	1.56
Fixed Charge (Rs. / kWh)	1.72
Energy Charge Rate (Rs. /kWh)	6.42
Proposed Tariff (Rs. / kWh)	8.13

# 2.6 ARR for MYT Control Period FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26 for LTPS

2.6.1 APGCL has projected the ARR for the MYT Control Period from FY 2025-26 to FY 2029-30 for LTPS as detailed in the Table below:

SI.	Particulars	FY 2025-	FY 2026-	FY 2027-	FY 2028-	FY 2029-
No.		26	27	28	29	30
		Projected	Projected	Projected	Projected	Projected
I	Power Generation					
1	Gross Generation (MU)	425.74	425.74	425.74	425.74	425.74
2	Net Generation (MU)	402.32	402.32	402.32	402.32	402.32
3	Auxiliary Consumption (%)	5.50%	5.50%	5.50%	5.50%	5.50%
	Fixed Charges					
4	Operation &					
	Maintenance	50.54	53.62	56.88	60.35	64.02
	Expenditure					
5	Interest & Finance	_	0.03	1.60	2.50	1.31
	Charges		0.00	1.00	2.00	1.01
6	Interest on working	12.43	14.53	14.81	15.47	15.57
	Capital	_		_	10.11	
7	Depreciation	16.62	17.31	19.15	20.62	20.77
8	Return on Equity	16.86	17.56	19.43	20.92	21.08
9	Special R&M	10.00	25.60	5.80	7.50	1.00
11	Less: Other Income	(10.00)	(10.00)	(10.00)	(10.00)	(10.00)
II	Total Fixed Charges	96.45	118.65	107.66	117.36	113.76
	Fuel Cost	279.55	331.19	342.89	353.65	353.65
IV	Total Revenue	376.01	449.84	450.55	471.01	467.41
	Requirement	570.01		400.00	471.01	

Table 5: ARR for LTPS for MYT Control Period as projected by APGCL (Rs. Crore)

Particulars	FY 2025-26
Annual Fixed Charges (Rs. Crore)	96.45
Monthly Fixed Charges (Rs. Crore)	8.04
Fixed Charge (Rs. / kWh)	2.40
Energy Charge Rate (Rs. /kWh)	6.95
Proposed Tariff (Rs. / kWh)	9.35

#### Table 6: Tariff of LTPS for FY 2025-26 as proposed by APGCL

# 2.7 ARR for MYT Control Period FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26 for KLHEP

2.7.1 APGCL has projected the ARR for the MYT Control Period from FY 2025-26 to FY 2029-30 for KLHEP as detailed in the Table below:

		FY 2025-	FY 2026-	FY 2027-	FY 2028-	FY 2029-
SI.	Particulars	26	27	28	29	30
No						
_		Projected	Projected	Projected	Projected	Projected
I	Power Generation					
1	Gross Generation (MU)	390.00	390.00	390.00	390.00	390.00
2	Net Generation (MU)	386.10	386.10	386.10	386.10	386.10
3	Auxiliary Consumption (%)	1.00%	1.00%	1.00%	1.00%	1.00%
II	Fixed Charges					
4	Operation & Maintenance	41.96	44.51	47.22	50.10	53.15
4	Expenditure	41.90	44.51	41.22	50.10	55.15
5	Interest & Finance	6.47	6.72	7.29	6.21	3.88
5	Charges*	0.47	0.72	1.29	0.21	3.00
6	Interest on working Capital	3.23	3.37	3.36	4.07	3.64
7	Depreciation	24.35	26.15	28.30	29.47	29.90
8	Return on Equity	24.85	26.69	28.88	30.08	30.51
9	Special R&M	15.00	12.00	-	27.00	
11	Less: Other Income	(10.29)	(10.29)	(10.29)	(10.29)	(10.29)
II	Total Fixed Charges	105.57	109.16	104.76	136.64	110.79
	Fuel Cost	-	-	-		
IV	Total Revenue	105.57	109.16	104.76	136.64	110.79
	Requirement					

Table 7: ARR for KLHEP for MYT Control Period as projected by APGCL (Rs. Crore)

Particulars	FY 2025-26
Capacity charges (Rs crore)	52.79
Monthly Capacity charges (Rs crore)	4.40
Capacity Charge rate (Rs. / kWh)	1.37
Energy charge rate (Rs. / kWh)	1.37
Proposed Tariff (Rs. / kWh)	2.73

#### Table 8: Tariff of KLHEP for FY 2025-26 as proposed by APGCL

# 2.8 ARR for MYT Control Period FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26 for LRPP

2.8.1 APGCL has projected the ARR for the MYT Control Period from FY 2025-26 to FY 2029-30 for LRPP as detailed in the Table below:

SI.	Particulars	FY 2025- 26	FY 2026- 27	FY 2027- 28	FY 2028- 29	FY 2029- 30
No.		Projected	Projected	Projected	Projected	Projected
Ι	Power Generation					
1	Gross Generation (MU)	519.40	519.40	519.40	519.40	519.40
2	Net Generation (MU)	501.22	501.22	501.22	501.22	501.22
3	Auxiliary Consumption (%)	3.50%	3.50%	3.50%	3.50%	3.50%
II	Fixed Charges					
4	Operation & Maintenance	31.57	33.49	35.53	37.69	39.99
4	Expenditure	51.57	55.45	55.55	57.09	39.99
5	Interest & Finance Charges	0.00	0.23	0.44	0.22	0.00
6	Interest on working Capital	11.19	12.45	12.56	13.10	12.99
7	Depreciation	12.25	12.94	14.14	14.67	14.68
8	Return on Equity	10.70	11.31	12.35	12.81	12.82
9	Special R&M	2.13	41.23	21.55	25.73	12.98
11	Less: Other Income	(7.18)	(7.18)	(7.18)	(7.18)	(7.18)
II	Total Fixed Charges	60.66	104.47	89.39	97.04	86.28
	Fuel Cost*	290.40	301.03	311.67	321.46	321.46
IV	Total Revenue Requirement	351.05	405.50	401.06	418.50	407.73

Table 9: ARR for LRPP for MYT Control Period as projected by APGCL (Rs. Crore)

Particulars	FY 2025-26
Total Fixed Charges (Rs. Crore)	60.66
Monthly Fixed charges (Rs. Crores)	5.05
Fixed Charge (Rs. / kWh)	1.21
Energy charge (Rs. / kWh)	5.79
Proposed Tariff (Rs. / kWh)	7.00

#### Table 10: Tariff of LRPP for FY 2025-26 as proposed by APGCL

# 2.9 ARR for MYT Control Period FY 2025-26 to FY 2029-30 and Tariff for FY 2025-26 for NRPP

2.9.1 APGCL has projected the ARR for the MYT Control Period from FY 2025-26 to FY 2029-30 for NRPP as detailed in the Table below:

SI.		FY 2025-	FY 2026-	FY 2027-	FY 2028-	FY 2029-
No	Particulars	26	27	28	29	30
-		Projected	Projected	Projected	Projected	Projected
I	Power Generation					
1	Gross Generation (MU)	732.69	732.69	732.69	732.69	732.69
2	Net Generation (MU)	696.05	696.05	696.05	696.05	696.05
3	Auxiliary Consumption (%)	5.00%	5.00%	5.00%	5.00%	5.00%
II	Fixed Charges					
4	Operation & Maintenance	44.94	47.68	50.58	53.66	56.93
-	Expenditure	5-	47.00	50.50	00.00	00.00
5	Interest & Finance Charges	36.38	33.33	29.78	25.68	21.13
6	Interest on working Capital	11.82	13.01	15.02	13.37	13.50
7	Depreciation	43.23	44.34	45.12	45.50	45.52
8	Return on Equity	34.61	35.50	36.13	36.43	36.45
9	Special R&M	0.00	38.89	119.43	19.43	19.43
11	Less: Other Income	(10.12)	(10.12)	(10.12)	(10.12)	(10.12)
II	Total Fixed Charges	160.86	202.62	285.93	183.95	182.83
	Fuel Cost	224.55	232.72	240.88	248.40	248.40
IV	Total Revenue Requirement	385.42	435.34	526.82	432.34	431.23

#### Table 11: ARR for NRPP for MYT Control Period as projected by APGCL (Rs. Crore)

Particulars	FY 2025-26
Total Fixed Charges (Rs. Crore)	160.86
Monthly Fixed charges (Rs. Crores)	13.41
Fixed Charge (Rs. / kWh)	2.31
Energy charge (Rs. / kWh)	3.23
Proposed Tariff (Rs. / kWh)	5.54

Table 12: Tariff of NRPP for FY 2025-26 as proposed by APGCL

### 3 Summary of Objections raised, Response of APGCL and Commission's Comments

3.1.1 The Commission received objections/ suggestions from the following three (3) stakeholders on the Petitions filed by APGCL.

SI. No.	Name of objector
1	Assam Branch of India Tea Association (ABITA)*
2.	Federation of Industries and Commerce of North Eastern
۷.	Region (FINER)
3	Consumer Advocacy Cell (CAC)

Table 13: List of Objectors

- 3.1.2 APGCL submitted its responses to the objections/ suggestions received from the above objectors.
- 3.1.3 The Commission considered the objections /suggestions received and notified the objectors to take part in the Hearing process by presenting their views in person before the Commission, if they so desired.
- 3.1.4 The Commission held Hearing at the Conference Hall of Assam Bidyut Niyamak Bhawan Six Mile, Guwahati on March 12<sup>th</sup>, 2024.
- 3.1.5 The objectors attended the Hearing and submitted their views/ suggestions. All the written representations submitted to the Commission and the oral submission made before the Commission in the Hearing and the responses of APGCL have been carefully considered while issuing this Tariff Order.
- 3.1.6 The objections/ suggestions made by the objectors and responses of the petitioner are briefly dealt with in this Chapter. The major issues raised by the objectors are discussed below along with the response of the Petitioner (APGCL) and views of the Commission.
- 3.1.7 While all the objections /suggestions have been given due consideration by the Commission, only, major responses/ objections received on the Petitions and also those raised during the course of Hearing have been grouped and addressed issue wise, in order to avoid repetition.

#### Issue 1: Plant Availability Factor (PAF)

#### **Stakeholder's Comments**

FINER requests the Hon'ble Commission to acknowledge that Regulation 52 of the Tariff regulations 2021 in context of Thermal and Hydro power plant respectively mentions that the recovery of Fixed charges below the NAPAF shall be on pro- rata basis. Therefore, the allowable Fixed charges shall be on the pro-rated based on the recorded PAF for the FY 2023-24. In such context, owing to lower PAF, the allowable Fixed charges is pro-rated.

ABITA requests Hon`ble Commission to allow recovery of fixed charges pro-rata to actual PAF achieved by each generating station.

#### Response of APGCL

APGCL has submitted the True-up petition as per the Regulations only and prays to the Hon'ble Commission to approve its submission. APGCL has claimed all the operational parameter as per Regulations. APGCL has not claimed any relaxation on account of operational parameter beyond normative values.

#### Commission's View

PAF have been calculated as per provisions of the MYT Regulations, 2021. The performance of APGCL and analysis of the Commission are discussed in the subsequent Chapters of this Order.

#### Issue 2: Availability factor (PLF)

#### Stakeholder's Comments

FINER requests the Hon'ble Commission to acknowledge that the Hon'ble Commission vide MYT Order dated March 2023 has approved the norms for each of the operational parameters as per Tariff Regulations 2021. Furthermore, FINER requests the Hon'ble Commission to recognize that, in line with the Tariff Regulations 2021, the parameters which are controllable in nature shall be governed by the norms approved by the Hon'ble Commission, and the deviation on account of variation with respect to norms shall not be given effect to in the tariff.

ABITA requests the Hon'ble Commission to allow incentive in accordance with the provisions of the Tariff Regulations. For FY 2023-24, APGCL has achieved lower than the approved PLF for LTPS, KLHEP, LRPP and NRPP.

#### **Response of APGCL**

APGCL has claimed all the operational parameter as per Regulations. APGCL has not claimed any relaxation on account of operational parameter beyond normative values.

#### Commission's View

PLF has been calculated as per provisions of the MYT Regulations, 2021. The performance of APGCL and analysis of the Commission are discussed in the subsequent Chapters of this Order.

#### Issue 3: GSHR

#### Stakeholder's Comments

FINER and ABITA requests Hon`ble Commission to consider the SHR as per approved norms for FY 2023-24 or actual, whichever is lower.

CAC requests Hon`ble Commission that APGCL provide clarification regarding the high Station Heat Rate (SHR) and should find out the station heat rate in actual through proper energy auditing.

#### **Response of APGCL**

APGCL has claimed all operational parameters as per regulations, without seeking any relaxation beyond normative values. Fuel costs are claimed based on regulations, including the Station Heat Rate, with all thermal stations except NTPS meeting normative heat rates. Although NTPS's Units 2 & 3 have a higher SHR than the normative value, APGCL claims fuel costs at the normative SHR. LTPS receives OIL gas via AGCL and GAIL pipelines, with transportation agreements differing: AGCL's rate is approved by PNGRB, whereas GAIL's includes gas and transportation prices. LTPS and LRPP use different gas mixes, with LRPP using unsubsidised OIL gas, and LTPS using both unsubsidised OIL & AGCL gas plus subsidised GAIL gas. NTPS and NRPP receive subsidised OIL gas. Different stations have distinct design heat rates, approved by the Hon'ble Commission: NRPP at 1951 kcal/kWh, LRPP at 2150 kcal/kWh, and older stations, NTPS and LTPS, at 3900 kcal/kWh and 3200 kcal/kWh.

FY 2023-24's actual NTPS generation was lower than projected, causing varied ratios in unit price and fuel cost hikes. Regarding the objection that gas pricing remains government-controlled, APGCL acknowledges the concern, noting that gas pricing policy is governed by the GOI.

#### **Commission's View**

The Commission has approved GSHR as per norms specified in the MYT Regulations, 2021. The details are given in the relevant Chapters of this Order.

#### Issue 4: Auxiliary Power Consumption

#### **Stakeholder's Comments**

FINER and ABITA humbly requests Hon`ble Commission to allow the Auxiliary Power Consumption as per the norms specified in the Tariff Regulations, 2021.

CAC requests that APGCL address the matter of auxiliary consumption exceeding targets set by AERC for all three units of NTPS, as well as for LTPS and KLHEP. The relatively new units of LRPP and NRPP have maintained auxiliary consumption within the limit set. It is a matter of concern that APGCL has been missing the target set by AERC in term of auxiliary consumption for units of NTPS, LTPS and KLHEP. "

#### Response of APGCL

APGCL has claimed all operational parameters, including auxiliary power consumption, as per regulations, without seeking any relaxation due to higher auxiliary consumption. The higher auxiliary power consumption at NTPS and LTPS is inherent to their technical design, making operation at current norms unfeasible. This has been communicated to the Hon'ble Commission with supporting documents. Additionally, APGCL confirms that OIL and GAIL are supplying gas according to the Gas Supply Agreements (GSA).

#### Commission's View

For the purpose of truing up for FY 2022-23, auxiliary consumption has been approved as per norms specified in the MYT Regulations, 2021.

The sharing of efficiency gains/losses has been done in accordance with the MYT Regulations, 2021. Thus, the impact of any inefficiency is not passed on to the consumers in full. The details are available in the relevant Chapters of this Order.

#### Issue 5: Return on Equity

#### **Stakeholder's Comments**

FINER requests Hon'ble Commission that the generating stations NTPS, LTPS, KLHEP, and LRPP have surpassed their respective cut-off dates. As such, any additional capitalization to an equity for these stations may not be permitted.

ABITA request Hon'ble Commission to consider the calculation. ABITA has considered opening equity as permitted in the Tariff Regulations 2021 and recomputed ROE.

CAC requests the Hon'ble Commission to direct APGCL to clarify whether the equity infusion across all its plants was made in the form of liquid cash or as part of a financial restructuring exercise converting past grants and liabilities into equity. Additionally, a comparative statement showing the normative versus actual cost for various account heads constituting the fixed cost of the plant is necessary to ascertain its actual performance. This will aid APGCL in taking corrective measures to improve plant efficiency.

#### Response of APGCL

APGCL submits a CAPEX plan to the Hon'ble Commission for approval alongside each fiscal year's tariff petition. Following a prudence check, the Commission approves the CAPEX, which APGCL then considers for capitalization. The infused equity for such capitalization is factored into the equity base and Return on Equity (RoE) calculations, using the same methodology as outlined in the Tariff Order dated June 27, 2024, and as per AERC Regulation.

Regarding equity infusion, as shown in Table-5 of the query, it involves both liquid cash and financial restructuring, with liquid cash allocated for operational and developmental needs and conversion of past grants and loans into equity to address historical obligations. This dual approach supports APGCL's financial stability.

The grant status as of March 31, 2023, is approved by the Assam Government's cabinet. The conversion of grants into equity for FY 2023-24 is reflected in the 2024

Tariff Order, and the petition has been computed and submitted to the Hon'ble Commission for verification and prudence check.

#### Commission's View

The Commission has allowed the Return on Equity after necessary prudence check and in accordance with the MYT Regulations, 2021 as discussed in the relevant Chapters of this Order.

#### **Issue 6: Depreciation**

#### Stakeholder's Comments

FINER requests the Hon'ble Commission to disregard the Petitioner's additional capitalization claims for the True up of FY 2023-24 for NTPS, LTPS, KLHEP, and LRPP, as they lack association with specific Tariff Regulations 2021. Further, the Petitioner was noted to have received grants for Capital Costs in the March 2023 Order, per Table 32. As such, FINER submits that grants-based depreciation should be deducted from the allowable depreciation for FY 2023-24, as approved in the FY 2022-23 True up

ABITA requests Hon`ble Commission to compute the depreciation based on actual capitalization for FY 2023-24 in line with the provisions of the Tariff Regulations, 2021 and the practice adopted in previous Tariff Orders.

#### **Response of APGCL**

APGCL would like to submit that Capex plan is submitted along with the Tariff petition for each year in the month of November to Hon'ble Commission for approval. The Capex Plan is then approved by the Hon'ble commission after prudence check. The same is considered for capex for that respective year and corresponding capitalisation to it by APGCL. Hence it is added to the GFA for that particular year and accordingly Depreciation is calculated. APGCL has claimed all the additional capitalization as per norms & regulations.

APGCL has not claimed any depreciation on decommissioned/ retired units. Explanation regarding depreciation charged on assets funded by grants has been submitted in the petition in para 4.5.5. Further, Depreciation claimed is already at the effective capacity.

#### Commission's View

The Commission has allowed the Depreciation after necessary prudence check and in accordance with the MYT Regulations, 2021 as discussed in the relevant Chapters of this Order.

#### Issue 7: Interest and Finance Charges

#### **Stakeholder's Comments**

ABITA requested the Commission to allow the Interest and Finance Charges as computed by ABITA in line with the methodology adopted by the Commission in previous Tariff Orders.

#### Response of APGCL

The interest rate considered by APGCL is as per the norms of the regulations. The detailed computation is submitted in excel for verification and prudence check by the Hon'ble Commission.

#### Commission's View

The Commission has allowed the Interest and Finance charges after necessary prudence check and in accordance with the MYT Regulations, 2021 as discussed in the relevant Chapters of this Order.

#### Issue 8: O&M Expenses

#### Stakeholder's Comments

FINER requests the Hon'ble Commission to note that the net O&M expenses booked in the audited accounts for FY 2023-24 amount to Rs. 168.45 Crore. However, the Petitioner has claimed Rs. 177.58 Crore, which exceeds the audited numbers. It is respectfully submitted that O&M expenses should be allowed as the lower of the normative or audited values, ensuring prudence and cost efficiency.

ABITA requested the Commission to review the O&M expenses and actual numbers as per accounts and correspondingly allow O&M Expense in the true-up of FY2022-23.

#### **Response of APGCL**

APGCL provides actual O&M details per the Audited Accounts for the True up Year 2023-24 and Normative O&M as per AERC Regulations. According to these regulations, the difference between Actual and Normative O&M is used to compute the sharing of gains and losses, which have been submitted to the Hon'ble Commission for verification. As per Order No. 03/2022 dated 20th August 2022, the Commission allowed APGCL to claim actual O&M costs for NRPP during the control period FY 2022-23 to FY 2024-25 with proper documentation. APGCL has already submitted and received approval for the actual O&M costs for FY 2021-22 and FY 2022-23 following a prudence check. Continuing from this, APGCL has submitted the actual O&M costs of NRPP for FY 2023-24 for approval. O&M for LRPP is computed as per AERC Regulations.

#### **Commission's View**

The Commission has allowed O&M expenses after necessary prudence check and in accordance with the MYT Regulations, 2021. The details regarding computation of O&M expenses are discussed in the relevant Chapters of this Order.

#### **Issue 9: Interest on Working Capital**

#### Stakeholder's Comments

FINER requests the Hon'ble Commission to consider that, in line with the submissions made in the preceding sections, the allowable Interest on Working Capital for plants NTPS and LTPS shall be proportionate based on the effective capacity. Therefore, the allowable interest on working capital for all five plants shall be Rs. 37.11 Crore, as opposed to the Rs. 38.96 Crore claimed by the petitioner.

ABITA requests the Hon'ble Commission to consider that APGCL has proposed interest on working capital of Rs. 38.96 Cr., as against Rs. 44.16 Cr. approved in the 2024 Order. Based on the revised O&M and receivables, the interest on working capital computed by ABITA is hereby submitted for the Hon'ble Commission's review.

#### **Response of APGCL**

APGCL has claimed interest on working capital as per norms & regulation.

#### **Commission's View**

The Commission has allowed the IoWC after necessary prudence check and in accordance with the MYT Regulations, 2021 as discussed in the relevant Chapters of this Order.

#### Issue 10: Non-tariff Income

#### Stakeholder's Comments

FINER requests the Hon'ble Commission to note that the Petitioner's claim does not align with the Audited Accounts for FY 2023-24. Specifically, Note 17 shows Rs. 49.80 Crore booked as Other Income, but no explanation or reconciliation for its deviation from the Audited Accounts is provided. Additionally, the Petitioner reports a negative adjustment of Rs. 39.61 Crore under "HQ Adjustment" in Table 50, citing a provision for reduced fixed charges due to not meeting the Plant Availability Factor (PAF). This adjustment indicates operational inefficiencies, reflecting that the generating stations failed to meet PAF, resulting in a shortfall in recoverable fixed charges.

ABITA requests the Hon'ble Commission to note that APGCL reported a non-tariff income of Rs. 40.28 Cr., while the Income Statement for FY 2023-24 shows Rs. 85.69 Cr. from other sources. APGCL excluded Rs. 28.53 Cr. from delayed payment surcharges from APDCL and Rs. 16.90 Cr. for SAP ERP accounting. ABITA asks the Commission to verify these figures and the audited accounts for FY 2023-24, and to deduct this income from the total cost to determine APGCL's Annual Fixed Cost.

#### **Response of APGCL**

Regarding Non-tariff Income, the claim is made according to the commission's regulation, with details in PARAS 4.11.3 to 4.11.6 submitted for verification and prudence check by the Hon'ble commission. Due to below-normative PAF for FY 2023-24 at some stations, APGCL has deducted Rs. 39.61 crore as "HQ adjustment" from the Sale of Power on an accrual basis, in anticipation of reduced Fixed charges, as per AERC Regulation. This adjustment does not affect the APR computation and aims to align fixed charges with reduced availability, as detailed in PARA 5.5, Table 50. Detailed computations have been submitted for verification and prudence check by the Hon'ble commission.

#### **Commission's View**

The Commission has noted the views of the respondents as well as replies of the Petitioner. The Commission has discussed the same in the relevant Chapter while allowing Non-Tariff Income.

#### Issue 11: Fuel Cost

#### **Stakeholder's Comments**

FINER requests the Hon'ble Commission to uphold that the higher fuel cost due to a higher Heat Rate (compared to the norm) would not be a pass-through in the tariff.

ABITA requests the Hon'ble Commission to consider the factual numbers when approving fuel costs. APGCL claimed a fuel cost of Rs. 813.07 Cr., which is Rs. 19.25 Cr. higher than the Rs. 793.82 Cr. reported in the audited accounts for FY 2023-24. There is also an 18% reduction compared to FY 2022-23. The Commission should note the actual SHR for LTPS was 2673 kCal/kWh, and for LRPP, it was 2135 kCal/kWh. ABITA has reviewed the computations and submitted a fuel cost of Rs. 740.45 Cr.

CAC requests the Hon'ble Commission to note that in the petition of APGCL, fuel cost (Rs. /1000SCM) is projected for the period from FY 2025-26 to FY 2029-30 for all gasbased stations of NTPS, LTPS, LRPP, and NRPP. How the projected figures for gas prices have been arrived at is not clear. Hon'ble Commission is requested to direct the generator to clarify the source of such projections.

#### **Response of APGCL**

APGCL has claimed fuel cost as per Regulations and GOI notified natural gas price only.

#### **Commission's View**

The Commission has approved Fuel Cost based on approved performance parameters in this Order and GCV and fuel prices as submitted by APGCL. The details are discussed in the subsequent Chapters.

#### Issue 12: Special R&M Expenses

#### **Stakeholder's Comments**

FINER requests the Hon'ble Commission to ensure that the R&M expenses are allowed within the approved figure set by the Commission.

#### **Response of APGCL**

In the Tariff Order of March 2023, the Hon'ble commission approved special R&M for NTPS, LTPS, KLHEP, and LRPP, amounting to Rs. 36.22 crore, and further approved Rs. 100.79 crore in the APR order of June 2024. APGCL has now claimed Rs. 53.97 crore based on actual performance, against the commission-approved scheme, with detailed justifications submitted for verification.

For NRPP's Special R&M expenses related to Combustion Inspection of GT, the original estimate was Rs. 18 crore, reconciled to a final work value of Rs. 14.92 crore. Rs. 12.76 crore was approved in the true-up for FY 22-23, with the balance claimed in the true-up for FY 2023-24. APGCL conducted Special R&M for NRPP and LRPP per OEM guidelines, based on unit running hours. The commission approved these costs in the FY 2022-23 True-up, and the FY 2023-24 claims are spillover amounts reflected in APGCL's Annual Accounts due to the financial closure of specific works.

#### Commission's View

The Commission has allowed the Special R&M after necessary prudence check and in accordance with the MYT Regulations, 2021 as discussed in the relevant Chapters of this Order.

### 4 Truing up of ARR for FY 2023-24

#### 4.1 Methodology for Truing Up

- 4.1.1 The Commission approved the ARR for existing Generating Stations, viz., NTPS, LTPS, KLHEP, LRPP and NRPP for FY 2023-24 vide Order dated June 27, 2024, and Review Order dated October 28, 2024.
- 4.1.2 APGCL has submitted Truing-up Petition for FY 2023-24 based on audited Annual Accounts and provisions of MYT Regulations, 2021. APGCL has sought true-up for FY 2023-24, with the Revenue Gap/(Surplus) to be recovered from APDCL during FY 2025-26.
- 4.1.3 The Commission approves the cost parameters through approval of the ARR at the beginning of the year, keeping in view the data available at that point of time. The cost approvals for each of the items are based on projection of expenses and revenue before beginning of the year and the provisions of MYT Regulations, 2021. The projections might vary over the course of the year.
- 4.1.4 The actual cost/values for certain elements/parameters may vary as against the approved cost during the year due to various controllable and uncontrollable factors. The Generating Company may end up with higher or lower expenditure, as the case may be, at the end of the year as against the approved cost.
- 4.1.5 The Commission analyses the actual expenditure for the previous year/years based on the audited Annual Accounts of the Generating Company and allows/disallows the recovery of the actual expenditure through the ensuing year's tariff, subject to prudence check.
- 4.1.6 In the present Chapter, the Commission has carried out Truing up for FY 2023-24 for existing Generating Stations, i.e., NTPS, LTPS, KLHEP, LRPP and NRPP, based on the submissions of APGCL, audited Annual Accounts for FY 2023-24 and provisions of the MYT Regulations, 2021. Apart from the audited Accounts, APGCL, in its additional submission, submitted Station-wise reconciliation of expenses claimed in the Petition with audited Accounts for FY 2023-24 and the same has been considered for Truing up purposes.

4.1.7 In this Chapter, the Commission has analysed all the elements of actual expenditure and revenue of APGCL for FY 2023-24 and undertaken the truing-up of expenses and revenue in accordance with Regulation 9.1 of the MYT Regulations, 2021. The Commission has approved the sharing of gains and losses on account of controllable factors between APGCL and its sole beneficiary, viz., APDCL, in accordance with Regulation 12 of the MYT Regulations, 2021.

#### 4.2 Installed and Effective Capacity of FY 2023-24

4.2.1 APGCL submitted the following installed and effective capacity for FY 2023-24.

Station	Installed Capacity	No. of Units	Units Available for Generation & Capacity	Effective Capacity
NTPS	119.50	2	GTU 2 (17MW) & STU#6 (9 MW)	26.00
LTPS	142.20	4	GTU 5,6,7(20 MW Each), STU 8 (37.20 MW-WHRU)	97.20
KLHEP	100.00	2	U 1 & 2 (50 MW each)	100.00
LRPP	69.75	7	GE 1-7 (9.965 MW each)	69.76
NRPP	98.400	2	GTU 1(62.25 MW), STU 2(36.15)	98.40

Table 14: Installed and Effective Capacity for FY 2023-24 (MW)

#### Commission's Analysis

4.2.2 The Commission has considered the effective capacity for FY 2023-24 as submitted by APGCL in the above Table. The Commission has accordingly reduced the fixed cost derived after Truing-up of FY 2023-24 to the extent of effective capacity with respect to the installed capacity of each of the above Stations, in subsequent section of this Chapter.

#### 4.3 Plant Availability Factor (PAF)/Capacity Index

4.3.1 The PAF/Capacity Index for NTPS, LTPS, KLHEP, LRPP and NRPP for FY 2023-24, as submitted by APGCL are shown in the Table below:

Station	APGCL's Submission
NTPS	50.00%
LTPS	46.97%
KLHEP	62.39%
LRPP	85.00%
NRPP	83.12%

Table 15: PAF/Capacity Index as submitted by APGCL

**Plant Availability Factor for NTPS** - APGCL has claimed It has achieved actual availability higher than the normative value as approved in Regulation 48.1 of the MYT Regulations, 2021. APGCL submitted that it has claimed 50.00% PAF for NTPS.

**Plant Availability Factor for LTPS -** As per Regulation 48.1 of the MYT Regulations, 2021 the Normative Plant Availability factor for recovery of full fixed charges, is 50%. But it has achieved lower availability than the NAPAF.

**Plant Availability Factor for KLHEP** – APGCL submits that, it has achieved lower availability than the NAPAF. Regulation 50 of the MYT Regulations, 2021 specifies normative PAF for KLHEP as 85%.

**Plant Availability Factor for LRPP –** APGCL claimed that it has achieved the actual availability higher than the normative value. As per Regulation 48.1(b) of the Tariff Regulations, 2021 the Normative Plant Availability factor for recovery of full fixed charges, is 85%.

**Plant Availability Factor for NRPP** – APGCL has claimed that it has achieved lower availability than the NAPAF. As per Regulation 48.1(b) of the Tariff Regulations, 2021 the Normative Plant Availability factor for recovery of full fixed charges, is 85%.

#### **Commission's Analysis**

- 4.3.2 In accordance with Regulations 48.1 and 50.1 of the MYT Regulations, 2021, the Target PAF/Capacity Index for recovery of full Fixed Charges is 50% for NTPS and LTPS, and 85% for KLHEP. For LRPP and NRPP, the regulation specifies a normative availability of 85%.
- 4.3.3 The Commission has considered the PAF/Capacity Index as per the SLDC Certificate for the purpose of Truing up. The Commission notes the actual availability for NTPS,

LTPS, LRPP, NRPP, and KLHEP as 67.27%, 46.97%, 88.54%, 83.12%, and 62.39%, respectively. The Commission notes that the actual PAF for LTPS, KLHEP, and NRPP is less than the NAPAF as per the Regulation, 2021.

- 4.3.4 The Commission sought justification for the achievement of a lower availability factor for LTPS. In response, APGCL submitted that the 97.2 MW plant was unable to achieve its normative PAF of 50% in FY 2023-24 due to a force majeure fire incident causing an emergency plant shutdown from 06.12.2023 to 04.02.2024. It generated 367.759 MU of power in FY 2023-24 at an NAPAF of 46.97%.
- 4.3.5 The Commission also sought justification for the achievement of a lower availability factor for KLHEP. In response, APGCL submitted that the 100 MW KLHEP plant was unable to achieve its normative PAF of 85% in FY 2023-24 due to capital overhauling works of Unit-2. Due to these MO works, the plant was under shutdown from 01.04.2023 to 03.08.2023 in FY 2023-24. Again, from 01.01.2024 to 25.02.2024, both units were under shutdown for Head Race Tunnel (HRT) maintenance. It generated 329.796 MU of power at an NAPAF of 62.39%.
- 4.3.6 For NRPP, APGCL submitted that the 98.4 MW NRPP was unable to achieve its normative PAF of 85% in FY 2023-24 due to the tripping of the STG unit from 21.04.2023 to 15.07.2023 for HRSG damper operation failure. The plant generated 699.180 MU of power at an NAPAF of 83.12%.
- 4.3.7 Based on the above analysis, the Commission has considered the actual availability of all the stations as certified by SLDC for FY 2023-24. The Commission has approved the actual PAF/Capacity Index for FY 2023-24 as shown in the following table:

Station	Target Availability/Capacity Index (NAPAF) (%)	Approved (%)
NTPS	50%	67.27%
LTPS	50%	46.97%
KLHEP	85%	62.39%
LRPP	85%	88.54%
NRPP	85%	83.12%

Table 16 : PAF/Capacity Index as approved by the Commission for FY 2023-24

#### 4.4 Plant Load Factor (PLF)

4.4.1 The Actual PLF Index for NTPS, LTPS, KLHEP, LRPP and NRPP for FY 2023-24, as submitted by APGCL are shown in the Table below:

Station	Actual
NTPS	55.53%
LTPS	42.14%
KLHEP	37.32%
LRPP	78.97%
NRPP	81.28%

Table 17: Actual PLF as submitted by APGCL

**NAPLF for NTPS** – APGCL claimed that, it has achieved more than the normative value in FY 2023-24. As per Regulation 48.2 of the MYT Regulations, 2021 the Normative Plant Load factor, is 50% for NTPS.

**NAPLF for LTPS** – APGCL claimed that, it has achieved the actual PLF lower than the normative value. As per Regulation 48.2 of the MYT Regulations, 2021 the Normative Plant Load factor was 66% for LTPS.

**NAPLF for KLHEP** - APGCL has claimed actual PLF lower than the normative value. Regulation 50 of the MYT Regulations, 2021 specifies normative PLF for KLHEP as 44.5% for FY 2023-24.

**NAPLF for LRPP** – APGCL claimed that, it has achieved actual PLF lower the normative value in FY 2023-24. As per Regulation 48.2 of the Tariff Regulations, 2021 the Normative Plant Load factor, is 90% for new plants commissioned.

**NAPLF for NRPP** – APGCL claimed that, It has achieved lower PLF than normative value. As per Regulation 48.2(b) of the Tariff Regulations, 2021 the Normative Plant Load Factor is 85% for newly commissioned gas based generating station.

#### Commission's Analysis

4.4.2 The Commission has observed that the Plant Load Factor (PLF) for all stations, except NTPS, fell below the Normative Average PLF (NAPLF) as specified in the MYT Regulations 2021. In response to the Commission's ask for justification, APGCL provided explanations similar to those given for the Plant Availability Factor (PAF) in the previous section.

- 4.4.3 For LRPP, APGCL replied that it had reported a loss of 37.35 MU due to SLDC's load restrictions during FY 2023-24. Had this generation been realized, the PLF for LRPP would have been around 85%, aligning with its normative availability. APGCL also highlighted that its normative PLF is set higher at 90%, its normative PAF is 85%, in contrast to new gas turbines where both metrics are set at 85%.
- 4.4.4 The Commission has computed the actual PLF for each of the stations of APGCL considering the gross generation as certified by SLDC and the effective capacity of APGCL during FY 2023-24.
- 4.4.5 The Commission, therefore, approves the actual PLF of 55.53% for NTPS, 42.14% for LTPS, 37.32% for KLHEP, 78.97% for LRPP, and 81.28% for NRPP for FY 2023-24, after truing up.
- 4.4.6 As per Regulation 48.2(i) of the MYT Regulations 2021, the target PLF for eligibility of incentive is 50% for NTPS and 66% for LTPS. As per Regulation 48.2 (ii) of the MYT Regulations 2021, the target PLF for eligibility of incentive is 90% for LRPP and 85% or NRPP.
- 4.4.7 The Commission notes that actual PLF/design energy for LTPS, LRPP, KLHEP and NRPP for FY 2023-24 is lower than normative; hence, they are not eligible for generation incentive.
- 4.4.8 The generation of NTPS exceeds the Normative PLF; therefore, only this is eligible for an incentive.

#### 4.5 Auxiliary Consumption

4.5.1 APGCL submitted the Auxiliary Consumption for FY 2023-24 and Auxiliary Consumption approved by the Commission in the Tariff Order dated March 29, 2023 as shown in the following Table:

#### Table 18: Auxiliary Consumption for FY 2023-24 as submitted by APGCL

SI. No.	Station	Tariff Order dated March 29, 2023	Submitted by APGCL
1	NTPS	4.50%	8.50%

SI. No.	Station	Tariff Order dated March 29, 2023	Submitted by APGCL
2	LTPS	5.50%	7.55%
3	KLHEP	0.50%	1.10%
4	LRPP	3.50%	3.50%
5	NRPP	5.00%	5.00%

4.5.2 APGCL submits that even though the auxiliary consumption of NTPS, LTPS and KLHEP was higher than that of the normative values, APGCL has not sought any relaxation for this higher APC. The reason for higher auxiliary consumption of KLHEP was on account of the transformation loss.

#### Commission's Analysis

- 4.5.3 The Commission notes that actual Auxiliary Consumption for NTPS, LTPS and KLHEP are higher than the approved norms. APGCL, in its Petition, has submitted that it has lost 5.29 MU, 7.54 MU and 1.98 MU of net generation respectively due to higher auxiliary consumption than normative value.
- 4.5.4 For the purpose of truing up, the Commission has approved the Auxiliary Consumption for FY 2023-24 at the same level as approved in the Tariff Order dated March 29, 2023.
- 4.5.5 As Auxiliary Consumption is a controllable parameter, the sharing of gains/losses on account of Auxiliary Consumption has been undertaken in subsequent Section in this Chapter.
- 4.5.6 The Auxiliary Consumption approved by the Commission for the Truing Up of FY 2023-24 is shown in the Table below:

## Table 19: Auxiliary Consumption (%) as approved by the Commission in the truing up for FY2023-24

SI. No.	Station	Tariff Order dated March 29, 2023	Approved after Truing up (%)
1	NTPS	4.50%	4.50%
2	LTPS	5.50%	5.50%
3	KLHEP	0.50%	0.50%

SI. No.	Station	Tariff Order dated March 29, 2023	Approved after Truing up (%)
4	LRPP	3.50%	3.50%
5	NRPP	5.00%	5.00%

#### 4.6 Gross Generation and Net Generation

4.6.1 The actual Gross Generation and Net Generation submitted by APGCL for FY 2023-24 is shown in the following Table:

Table 20: Actual Gross and Net Generation for FY 2023-24 as submitted by APGCL (MU)

SI. No.	Station	Actual Net Generation	
1	NTPS	132.36	121.11
2	LTPS	367.76	339.98
3	LRPP	LRPP 478.96	
4	NRPP	NRPP 699.18	
	Total Thermal	1,678.26	1,587.50
5	KLHEP 329.80		326.18
	Total APGCL	2,008.06	1,913.68

#### Commission's Analysis

- 4.6.2 The Commission notes that actual Gross Generation and Net Generation submitted by APGCL for FY 2023-24 corresponds to the Gross and Net Generation as certified by SLDC.
- 4.6.3 For truing up purpose, the Commission has approved the actual Gross Generation as per SLDC Certificate. The Net Generation has been approved after applying the Auxiliary Consumption approved for truing up.
- 4.6.4 The Gross Generation and Net Generation approved by the Commission for FY 2023-24 is shown in the following Table:

SI. No.	Station	Station Gross Generation (MU)		
1	NTPS	132.36	126.40	
2	LTPS	367.76	347.53	
3	LRPP	478.96	462.19	
4	NRPP	NRPP 699.18		
	Total Thermal	1,678.26	1,600.35	
5	KLHEP 329.80		328.15	
	Total APGCL	2,008.06	1,928.50	

Table 21: Gross and Net Generation for FY 2023-24 as approved by the Commission

#### 4.7 Station Heat Rate (SHR)

4.7.1 APGCL submitted the Gross Station Heat Rate (SHR) claimed by them in comparison to the SHR as approved by the Commission in the Tariff Order dated March 29, 2023 as shown in the following Table -

SI. No.	Station	Tariff order March 29, 2023	Claim for FY 2023- 24
1	NTPS	3900 (CC) 4300(OC)	3927
2	LTPS	3200	3200
3	LRPP	2150	2150
4	NRPP	2927 (OC) 1951 (CC)	2018

Table 22: Station Heat Rate (kcal/kWh) for FY 2023-24 submitted by APGCL

**SHR for NTPS** – APGCL submitted that, the claim for FY 2023-24 is 3927 kCal/KWh while the actual SHR certified by SLDC of NTPS is 4567 kCal/KWh, which is higher than the approved SHR in FY 2023-24 due to part loading of units resulting due to lower gas supply and old nature of the plant equipment and machinery. APGCL has considered 25 days open cycle and 340 days combined cycle operation as approved by AERC in its earlier Orders, the latest of which was the Order dated 27th Jun'24 at para 4.7.5. Though the actual heat rate as per SLDC was 4567 kcal/kWh, APGCL has consider normative station heat rate for NTPS 3900 Kcal/kWh for combined cycle operation and 4300 Kcal/kwh for open cycle operation as per earlier approvals of the Commission at normative value.

FY 2023-24	GSHR	Running Hours in Open Cycle Mode	Normative weighted average SHR
Open Cycle Mode	4300	600	
Combined Cycle Mode	3900	8160.00	3927.40
Total		8760.00	

 Table 23: Computation of actual weighted normative submitted by APGCL for NTPS

**SHR for LTPS -** APGCL has claimed the normative SHR for FY 2023-24 as 3200 kCal/kWh for combined cycle mode.

**SHR for LRPP** - The Hon'ble Commission had approved the Gross Station Heat Rate for LRPP at 2,150 kCal/kWh in the Tariff Order dated March 2023 for LRPP. APGCL has claimed the normative SHR for FY 2023-24. APGCL submitted that LRPP is a gas engine based generating station operating at open cycle mode only.

**SHR for NRPP** – APGCL has submitted that the actual SHR of NRPP is 2114 kCal/kWh, which is higher than the approved SHR in FY 2023-24 due to tripping of STG unit from 21.04.2023 to 15.07.2023 for HRSG damper operation failure. APGCL has considered 25 days open cycle and 340 days combined cycle operation as approved by AERC earlier latest in their Order dated 27th June2024 at para 4.7.5. Though the actual heat rate is 2114.38 kcal/kWh, APGCL has considered normative station heat rate for NRPP at 1951 kcal/kWh for combined cycle operation and 2927 kcal/kWh for open cycle operation as approved by the Commission in their Order dated 27th Jun'24. The details are given below:-

FY 2023-24	GSHR	Running Hours in Open Cycle Mode	Normative weighted average SHR
Open Cycle Mode	2927	600	
Combined Cycle Mode	1951	8160.00	2017.85
Total		8760.00	

Table 24: Computation of actual weighted normative submitted by APGCL for NRPP

#### Commission's Analysis

- 4.7.2 The Commission notes that actual SHRs for NTPS and NRPP are higher than the approved norms for FY 2023-24. APGCL submitted that for NTPS, SHR is higher due to part loading of units resulting due to lower gas supply and old nature of the plant equipment and machinery. For NRPP, due to tripping of STG unit from 21.04.2023 to 15.07.2023 for HRSG damper operation failure.
- 4.7.3 Regulation 48.4 provides for weighted average SHR for NTPS, LTPS, LRPP and NRPP based on its operation in Open Cycle (OC) and Closed Cycle (CC) mode.
- 4.7.4 As regards major overhauling and planned shutdown, the Commission in Section4.6.3 of the MYT Order dated March 01, 2019 had ruled as under:

"The Commission is of the view that the planned shutdown for Major Overhaul should not take more than 25 days as per industry practice. APGCL has also considered outage of 25 days for Major Overhaul in its proposal for FY 2019-20. Accordingly, impact of the same is passed through, by revising the normative SHR to 3248 kcal/kwh, by considering 25 days of operation under Open Cycle and 340 days of operation under Closed Cycle"

- 4.7.5 In line with the above ruling, the Commission has considered the planned shutdown of 25 days for NTPS and NRPP during FY 2023-24 and has accordingly computed the SHR considering its operation in OC mode in line with the Regulations. The commission also notes that APGCL's submission is also as per the same methodology as discussed above.
- 4.7.6 The Commission has considered the SHR for LTPS and LRPP same as submitted by APGCL. Being a controllable factor, the sharing of gains/losses has been computed in a subsequent Section of this Chapter.
- 4.7.7 The SHR approved by the Commission for NTPS, LTPS, LRPP and NRPP in the truing up for FY 2022-23 is shown in the following Table:

SI. No.	Station	StationTariff Order dated March 29, 2023Actual certified by SLDC		Approved after Truing up	
1	NTPS	3900 (CC) 4300(OC)	4567.27	3927.40	
2	LTPS	LTPS 3200		3200	
3	LRPP	2150	2134.63	2150	
4	NRPP	2927 (OC) 1951 (CC)	2114.38	2017.85	

Table 25: Station Heat Rate (kcal/kWh) for FY 2023-24 as approved by the Commission

#### 4.8 Fuel Cost

4.8.1 APGCL has submitted the copies of month-wise fuel bills raised by APGCL's suppliers for FY 2020-21 in its quarterly FPA reports. APGCL in its petition has submitted fuel cost in comparison to the Tariff Order dated March 29, 2023 as –

Total cost of Gas (Rs. Crore)	Approved as per Tariff order of March 2023	Claim for FY 2023-24		
NTPS	45.97	84.95		
LTPS	110.51	251.34		
LRPP	120.24	264.31		
NRPP	93.83	212.48		

#### Table 26: Fuel cost claimed by APGCL for FY 2023-24

#### **Commission's Analysis**

- 4.8.2 The Commission has verified the actual fuel price and GCV of fuels from the actual fuel bills submitted by APGCL. Based on the detailed scrutiny of the fuel bills, the Commission has considered the actual price of fuel and GCV for NTPS, LTPS, NRPP and LRPP.
- 4.8.3 The Commission has computed the weighted average price of gas and weighted average GCV of gas for NTPS, LTPS, LRPP and NRPP based on actual month-wise quantity of gas received, month-wise GCV of gas received and month-wise fuel cost.
- 4.8.4 The Commission observed that there is no change in the weighted average GCV of LTPS, LRPP, NTPS and NRPP as compared to the average GCV submitted by APGCL in its Petition. The gas prices are also in line with the gas prices submitted by

APGCL for FY 2023-24 for NTPS, LTPS, LRPP and NRPP.

4.8.5 The actual weighted average GCV and actual landed price of gas considered by the Commission for truing up of fuel cost is shown in the Table below:

Table 27: Actual Weighted Average GCV and Landed Price of Gas for FY 2023-24 consideredby the Commission

Station	-	Calorific Value of Gas al/SCM)	Wt. Avg. Landed Price of Gas (Rs. /1000 SCM)		
Station	As submitted As cons by APGCL Comr		As submitted by APGCL	As considered by Commission	
NTPS	9,212.40	9,212.40	15,054.47	15,054.47	
LTPS	9,741.24	9,741.24	20,804.94	20,804.94	
LRPP	RPP 9,209.20 9,209.20 23,6		23,637.38	23,637.38	
NRPP	9,212.40	9,212.40	13,874.22	13,874.22	

4.8.6 The Commission has trued up the Fuel Cost based on the approved performance parameters and actual fuel price and GCV for FY 2023-24. The Commission has approved the Gross Generation for NTPS, LTPS, LRPP and NRPP as discussed in earlier Section of this Chapter. The fuel cost for different thermal stations corresponding to approved generation has been computed based on the approved performance parameters as shown in the following Table:

Sr. No.	Particulars	Derivati on	Unit	NTPS	LTPS	LRPP	NRPP
1	Gross Generation	А	MU	132.36	367.76	478.96	699.18
2	Heat Rate	В	kcal/kWh	3,927.40	3,200.00	2,150.00	2,017.85
3	GCV of gas	С	kcal/SC M	9,212.40	9,741.24	9,209.20	9,212.40
4	Overall Heat	D=AxB	G. cal.	519,827.04	1,176,828.80	1,029,754.11	1,410,840.18
5	Gas consumption	E=D/C	M. SCM	56.43	120.81	111.82	153.15
6	Price of Gas	F	Rs./1000 SCM	15,054.47	20,804.94	23,637.38	13,874.22
7	Total cost of Gas	G=ExF/1 00	Rs. Crore	84.95	251.34	264.31	212.48
	Total Cost			84.95	251.34	264.31	212.48

4.8.7 On the above basis, the approved normative Fuel Cost and actual Fuel Cost for FY 2023-24 for different thermal stations corresponding to actual gross generation are given in the Table below:

Station	Actual Fuel Cost submitted by APGCL	Normative Fuel Cost approved by Commission
NTPS	84.95	84.95
LTPS	251.34	251.34
LRPP	264.31	264.31
NRPP	212.48	212.48

Table 29: Fuel Cost approved by the Commission in truing up for FY 2023-24 (Rs. Crore)

4.8.8 The sharing of efficiency gains and losses on account of fuel cost has been discussed in a subsequent Section of this Chapter.

#### 4.9 Incentive for Generation

- 4.9.1 APGCL has claimed incentive for NTPS for higher PLF achieved during FY 2023-24. APGCL submitted that, as per regulation 53 of the Tariff Regulations 2021, incentive is payable for actual energy generation in excess of ex-bus energy corresponding to target PLF. The target PLF of NTPS was 50% for claiming incentive as per the Tariff Regulations 2021. Actual PLF achieved considering effective installed capacity of 26 MW was 55.53% for FY 2023-24.
- 4.9.2 In view of the above, the Petitioner claims the incentive at a rate of 50 paise for NTPS amounting Rs. **0.99 Cr.**

#### Commission's Analysis

4.9.3 As per regulation 53 of the MYT Regulations 2021, incentive is payable for actual energy generation in excess of ex-bus energy corresponding to target PLF. The target PLF of NTPS is 50% for claiming incentive as per the MYT Regulations 2021. Actual PLF achieved considering effective installed capacity of 26 MW was 55.53% for FY 2023-24. The commission also notes that APGCL claimed an additional incentive for the generation loss due to SLDC load restriction. An incentive for the generation loss of 8.13 MU due to SLDC load restriction has been allowed after verifying the SLDC certificate and conducting a prudence check. Therefore, Commission approves Rs

0.97 Crore as incentive for overachieving w.r.t. the normative PLF detailed in the table below:

Station	PLF (%)		ion PLF (%) (MU)		Auxiliary Consumption (%)		Net Generation (MU)		Ex-bus energy eligible for incentive (MU)	Incentive (Rs. Crore)
	Target for Incentive	Actual	At target PLF Actual*		Normativ e	Actual	At target PLF	Actual		
NTPS	50.00%	55.53%	114.19	140.49	0.05	0.08	109.05	128.55	19.50	0.97

#### Table 30: Incentive for Generation Approved by the Commission

\*Actual = Gross generation as per SLDC (132.36 MU) + Generation loss (8.13 MU) = 140.49 MU

#### 4.10 O&M Expenses

- 4.10.1 APGCL has claimed normative O&M expense of NTPS, LTPS & KLHEP. Normative O&M Expenses for FY 2023-24 has been computed by escalating Base O&M Expenses of FY 2022-23 by escalation factor of 5.25 %. Base O&M Expenses for FY 2022-23 have been determined by computing average of actual O&M Expenses approved for FY 2019-20 to FY 2021-22, which has then been escalated at respective years' approved O&M Expense escalation rates for FY 2020-21 and FY 2021-22 of 6.30%, to arrive at FY 2022-23 level.
- 4.10.2 APGCL has claimed the actual O&M cost of Rs. 48.23 Crore with respect to NRPP for FY 2023-24. For LRPP, Normative O&M expense of Rs 32.19 Cr has been claimed in True-Up for FY 2023-24.

Station	Approved Tariff Order 23-24 (Full Capacity)	Approved Tariff Order 23-24 (Effective Capacity)	Normative O&M for FY 23-24 at full capacity	Normative O&M capacity for True Up at effective capacity	Claim for True up
NTPS	58.28	20.00	58.62	12.75	12.75
LTPS	66.57	45.50	70.67	48.30	48.30
KLHEP	35.54	35.54	36.11	36.11	36.11
LRPP	32.19	32.19	32.19	32.19	32.19
NRPP	24.34	24.34	24.34	48.23	48.23
Total	216.92	157.57	221.92	177.59	177.59

Table 31: O&M expenses for FY 2023-24 as claimed by APGCL (Rs. Crore)

4.10.3 The Station-wise details of head-wise actual O&M expenses (excluding O&M expense of MSHEP of Rs. 4.55 Crore, CSR/donation of 2.27 Crore and excluding special R&M of Rs. 53.97 Cr.) claimed for FY 2023-24 by APGCL are given in the Table below:

Station	Employee Cost	A&G	R&M	Total
NTPS	7.16	1.76	3.69	12.61
LTPS	27.20	9.02	10.83	47.05
KLHEP	22.81	4.96	7.32	35.09
LRPP	8.94	3.18	17.90	30.02
NRPP	30.97	9.03	8.23	48.23
Total	97.08	30.22	47.98	173.01

Table 32: Details of O&M expenses claimed by APGCL for FY 2023-24 (Rs. Crore)

#### **Commission's Analysis**

- 4.10.4 In the Tariff Order dated March 29, 2023, the Commission approved the Operations and Maintenance (O&M) expenses for the fiscal year 2023-24 on a normative basis, as specified in Regulation 51.1 of the MYT Regulations, 2021.
- 4.10.5 APGCL in its petition stated that the Hon'ble Commission vide Order No. 03/2022 dated 20th August 2022 had given their judgement for NRPP as reproduced below:

"7. After scrutinizing the Petition and related information submitted by APGCL, the Commission noted that the figures submitted by APGCL are estimated only. The Commission is of the view that in the absence of actual O & M cost (Audited), it may not be prudent to revise the norms only on the basis of submissions of APGCL. 8. However, APGCL is at liberty to place their claim at the time of true up with proper documentary evidence during the control period from FY 2022-23 to FY 2024-25 based on the audited data of O&M expenses and the Commission shall decide on the basis of the actual audited data. "APGCL has now submitted the actual O&M Cost of NRPP for true up purposes and requested the Commission to consider its actual O&M Cost as normative O&M cost for FY 2023-24, i.e., allow the actual O&M cost for NRPP without any sharing of efficiency gains/losses.

- 4.10.6 APGCL further stated that based on the above Order of the Hon'ble Commission, APGCL had already submitted the actual O&M cost in the True-up of FY 2021-22 and FY 2022-23 for NRPP for approval and accordingly the Hon'ble Commission approved the same after prudence check. APGCL is now submitting the actual O&M Cost of NRPP for approval for FY 2023-24 in the True-up and humbly prays to the Commission to approve the same in continuation above judgement.
- 4.10.7 The Commission notes that the actual O&M Cost of NRPP is considerably higher than the normative O&M Cost. However, the Commission also notes that APGCL has incurred Rs. 48.3 Crore O&M Expense in NRPP in FY 2023-24, whereas in FY 2022-23 APGCL had incurred Rs. 41.35 Crores. The Commission considers submission of APGCL and allows the entire actual O&M Cost of NRPP to be passed through to the consumer as a one-time relief granted to it for this year only. However, APGCL is directed to continue to practice thrift and minimise its O&M Cost in all its plants. Also, form next year onwards O&M expenses shall be calculated as per Regulations.
- 4.10.8 In the Petition, APGCL submitted the reconciliation statement of O&M expenses claimed in the Petition with respect to the expenses reflecting in its Audited Accounts. APGCL has claimed O&M expenses of Rs. 173.01 Crore after excluding O&M expenses of MSHEP of Rs. 4.55 Crore, CSR/donations Rs.2.27 Crore, and special R&M of Rs. 53.97 Crore, which are included in the Audited Accounts of FY 2023-24. APGCL has claimed Special R&M under separate head in the Petition.
- 4.10.9 APGCL further submitted that the O&M expenses claimed in each of the Stations is on the basis of actual expenses booked in Trial Balance of each individual station. Further, the common Employee Expenses, A&G Expenses, and R&M Expenses are allocated between stations on the basis of installed capacity.
- 4.10.10 The Commission, after scrutiny of the O&M expenses, approves the actual O&M expenses in the True-up Petition as shown in the Table below:

Station	Tariff Order dated March 09, 2023	Actual amount claimed by APGCL for True up	Actual approved by the Commission for Sharing of (Gains) /Losses on account of controllable factors
NTPS	58.28	12.61	12.61
LTPS	66.57	47.05	47.05
KLHEP	35.54	35.09	35.09
LRPP	32.19	30.02	30.02
NRPP	24.34	48.23	48.23
Total	216.92	173.01	173.01

Table 33: Actual O&M Expenses approved for FY 2023-24 (Rs. Crore)

- 4.10.11 The Commission has considered the normative O&M expenses for FY 2023-24 by escalating the base O&M Expense of FY 2021-22 with average of last 3 years CPI and WPI inflation considered in the ratio of 60:40 for existing old stations of NTPS, LTPS and KLHEP. For LRPP, O&M Norms fixed in MYT Regulations, 2021 has been used to work out Normative O&M Expense for FY 2023-24.
- 4.10.12 For NRPP, the actual O&M expenses have been considered, as explained above. The following Table shows the normative O&M expenses approved for FY 2023-24:

Station	Normative O&M Expenses approved in True-up	Normative O&M Expenses approved for effective capacity
NTPS	58.33	12.69
LTPS	67.01	45.80
KLHEP	35.57	35.57
LRPP	32.21	32.21
NRPP	48.23	48.23
Total	241.35	174.5

 Table 34: Normative O&M expenses approved for True Up FY 2023-24

4.10.13 The Commission has considered the above actual O&M expenses (excluding Special R&M) and Normative O&M expenses for effective capacity for computation of sharing of (Gains)/Losses on account of O&M expenses, which is a controllable factor as specified in the Regulations.

#### 4.11 Capitalisation

4.11.1 The following Table shows the Capitalisation as claimed by APGCL for FY 2023-24 in its True-up Petition:

Station	Capitalisation claimed by APGCL
NTPS	4.16
LTPS	5.27
KLHEP	8.55
LRPP	3.33
NRPP	0.58
Total	21.89

Table 35: Capitalisation claimed for FY 2023-24 (Rs. Crore)

#### Commission's Analysis

4.11.2 The Commission has closely examined the capitalisation amounts claimed by APGCL for each of its stations. In response to additional query from the Commission, APGCL was unable to adequately substantiate its claims. The Commission observed that APGCL included various items that were not previously approved, and were found to be of O&M nature that should be met through the separately approved normative O&M. Furthermore, APGCL failed to provide relevant supporting documents for these items. Consequently, the Commission approves the following capitalisation for FY 2023-24.

Station	Capitalisation claimed by APGCL	Capitalisation approved by Commission
NTPS	4.16	3.57
LTPS	5.27	5.06
KLHEP	8.55	8.33
LRPP	3.33	2.35
NRPP	0.58	0.12
Total	21.89	19.43

Table 36: Capitalisation approved for FY 2023-24 (Rs. Crore)

#### 4.12 Funding of Capitalisation

4.12.1 APGCL submitted that the capitalisation for FY 2023-24 of NTPS, LTPS, KLHEP, LRPP and NRPP under Loan, Equity and Grant as shown in the table below -

Station	Capitalisation claimed	Loan	Equity	Grant
NTPS	4.16	0.58	3.59	0.00
LTPS	5.27	0.48	4.79	0.00
KLHEP	8.55	3.08	4.75	0.72
LRPP	3.33	0.00	3.33	0.00
NRPP	0.58	0.44	0.14	0.00
Total	21.89	4.58	16.59	0.72

Table 37: Funding of Capitalisation claimed for FY 2023-24 (Rs. Crore)

#### **Commission's Analysis**

4.12.2 The Commission observed that APGCL has claimed the funding for 'ERP implementation and consultancy' through equity. However, the Commission has considered the funding for 'ERP implementation and consultancy' related capitalisation from grants, as outlined in the Tariff Order at the time of approval. The total additional capitalisation claimed by APGCL, excluding ERP (which the Commission considers as a grant), is approved after a prudence check, with 30% of this approved amount considered as funding through equity. The remainder of the additional capitalisation, except for these, is considered to be funded through loans. The table below shows the approved funding of capitalisation for FY 2023-24:

#### Table 38: Funding of Capitalisation approved for FY 2023-24 (Rs. Crore)

Station	Capitalisation claimed for FY 2023-24	Loan	Equity	Grant
NTPS	3.57	0.07	0.03	3.47
LTPS	5.06	0.37	0.00	4.69
KLHEP	8.33	3.08	0.23	5.02
LRPP	2.35	0.00	0.00	2.35
NRPP	0.12	0.08	0.04	0.00
Total	19.43	4.58	16.59	0.72

#### 4.13 Depreciation

4.13.1 APGCL submitted that it has computed the Depreciation as per MYT Regulations, 2021 and considering Capital Cost of the asset admitted by the Commission with 10% salvage value. The depreciation on grants has been subtracted. The Table below summarizes the plant-wise Depreciation claimed by APGCL in the True-up for FY 2023-24:

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up
	Depreciation	1.45	1.55
NTPS	Less: Depreciation on assets funded by Grants	0.02	0.02
	Net Depreciation	1.43	1.53
	Net Depreciation for Effective Capacity	0.49	1.53
	Depreciation	20.22	16.02
LTPS	Less: Depreciation on assets funded by Grants	0.58	0.45
LIFS	Net Depreciation	19.64	15.57
	Net Depreciation for Effective Capacity	13.42	15.57
	Depreciation	24.36	23.50
KLHEP	Less: Depreciation on assets funded by Grants	0.57	0.57
	Net Depreciation	23.79	22.92
	Depreciation	13.75	14.58
LRPP	Less: Depreciation on assets funded by Grants	11.08	2.57
	Net Depreciation	2.67	12.01
	Depreciation	37.50	42.23
NRPP	Less: Depreciation on assets funded by Grants	0.00	0.00
	Net Depreciation	37.50	42.23
	Total	85.03	94.26

#### Table 39: Details of Depreciation claimed by APGCL for FY 2023-24 (Rs. Crore)

#### **Commission's Analysis**

4.13.2 For the purpose of Truing up, the Commission has considered the approved Stationwise closing GFA of FY 2022-23 as the opening GFA for FY 2023-24. The Commission has considered the actual capitalisation for NTPS, LTPS, KLHEP LRPP and NRPP based on the Capitalisation approved for FY 2023-24.

- 4.13.3 The Commission has computed depreciation as per scheduled rates specified in the MYT Regulations, 2021. As per Regulation 33 of the MYT Regulations, 2021, the total depreciation during the life of the asset shall not exceed 90% of the original cost of asset. The Commission has computed the depreciation separately for assets added under each asset head in each year. The Commission has disallowed the depreciation in excess of 90% of the original cost of asset under different asset heads.
- 4.13.4 In line with the approach adopted in the previous Orders and as specified in Regulation 33 of the MYT Regulations, 2021, the Commission has not considered the depreciation on assets funded through grants or capital subsidy, for FY 2023-24.
- 4.13.5 The station-wise depreciation approved by the Commission in the True-up for FY 2023-24 is shown in the following table:

Station	Particulars	Approved as per TO of March 2023	Claim for True Up	Approved after True up
	Depreciation	1.45	1.55	1.62
NTPS	Less: Depreciation on assets funded by Grants	0.02	0.02	0.13
	Net Depreciation	1.43	1.53	1.48
	Net Depreciation for Effective Capacity	0.49	1.53	0.32
	Depreciation	20.22	16.02	19.81
LTPS	Less: Depreciation on assets funded by Grants	0.58	0.45	2.68
	Net Depreciation	19.64	15.57	17.12
	Net Depreciation for Effective Capacity	13.42	15.57	11.71
	Depreciation	24.36	23.50	23.93
KLHEP	Less: Depreciation on assets funded by Grants	0.57	0.57	1.23
	Net Depreciation	23.79	22.92	22.70
LRPP	Depreciation	13.75	14.58	14.22

Table 40: Depreciation approved for FY 2023-24 (Rs. Crore)

Station	Particulars	Approved as per TO of March 2023	Claim for True Up	Approved after True up
	Less: Depreciation on assets funded by Grants	11.08	2.57	9.43
	Net Depreciation	2.67	12.01	4.80
	Depreciation	37.50	42.23	34.01
NRPP	Less: Depreciation on assets funded by Grants	0.00	0.00	0.00
	Net Depreciation	37.50	42.23	34.01
	Total	85.03	94.26	73.53

4.13.6 The detailed Station-wise computation of depreciation for NTPS, LTPS, LRPP, KLHEP and NRPP has been provided in **Annexure 2**.

#### 4.14 Interest on Loan Capital

- 4.14.1 APGCL submitted that, it has computed the Interest on long term Loan on normative basis for FY 2023-24. The Petitioner has considered normative loan portfolio and the repayment shown is considered equal to the depreciation for FY 2023-24. The interest rate has been considered as the weighted average rate of actual interest rate applicable to APGCL at the beginning of FY 2023-24.
- 4.14.1.1 Accordingly, APGCL has claimed the interest on loan and finance charges considered for all its stations (at effective capacity for NTPS and LTPS) FY 2023-24 as shown in the table below -

Station	Particulars	Approved as per TO of March 2023	Claim for True Up
	Net Normative Opening Loan	0.84	0.00
	Addition of normative loan during the year	0.94	0.58
NTPS	Normative Repayment during the year	1.43	1.53
	Net Normative Closing Loan	0.35	0.00
	Avg. Normative Loan	0.60	0.00

Table 41: Interest Charges as submitted by APGCL for FY 2023-24 (Rs. Crore)

Station	Particulars	Approved as per TO of March 2023	Claim for True Up
	Interest Rate	11.64%	10.01%
	Interest on Loan Capital	0.07	0.00
	Add: Bank Charges		0.00
	Net Interest on Loan Capital	0.07	0.00
	Net Interest on Loan Capital for Effective Capacity	0.02	0.00
	Net Normative Opening Loan	0.00	0.00
	Addition of normative loan during the year	12.31	0.48
	Normative Repayment during the year	19.64	15.57
	Net Normative Closing Loan	0.00	0.00
LTPS	Avg. Normative Loan	0.00	0.00
	Interest Rate	11.64%	10.01%
	Interest on Loan Capital	0.00	0.00
	Add: Bank Charges	0.00	0.01
	Net Interest on Loan Capital	0.00	0.01
	Net Interest on Loan Capital for Effective Capacity	0.00	0.01
	Net Normative Opening Loan	113.94	100.78
	Addition of normative loan during the year	17.25	3.08
	Normative Repayment during the year	23.79	22.92
	Net Normative Closing Loan	107.39	80.94
KLHEP	Avg. Normative Loan	110.66	90.86
	Interest Rate	11.64%	10.01%
	Interest on Loan Capital	12.88	9.10
	Add: Bank Charges	0.00	0.01
	Net Interest on Loan Capital	12.88	9.11
	Net Normative Opening Loan	24.29	21.69
	Addition of normative loan during the year	0.70	0.00
	Normative Repayment during the year	2.67	12.01
LRPP	Net Normative Closing Loan	22.32	9.68
LKFF	Avg. Normative Loan	23.30	15.69
	Interest Rate	11.64%	10.01%
	Interest on Loan Capital	2.71	1.57
	Add: Bank Charges	0.00	0.00

Station	Particulars	Approved as per TO of March 2023	Claim for True Up
	Net Interest on Loan Capital	2.71	1.57
	Net Normative Opening Loan	454.03	457.51
	Addition of normative loan during the year	0.00	0.44
	Normative Repayment during the year	37.50	42.23
	Net Normative Closing Loan	416.53	415.72
NRPP	Avg. Normative Loan	435.28	436.61
	Interest Rate	11.64%	10.01%
	Interest on Loan Capital	50.66	43.72
	Add: Bank Charges	0.00	0.00
	Net Interest on Loan Capital	50.66	43.72
	Total	66.32	54.41
	Total for Effective Capacity	66.27	54.41

#### Commission's Analysis

- 4.14.2 In the Tariff Order dated March 29, 2023, the Commission approved the Interest on Loan Capital on normative basis as per Regulation 35 of the MYT Regulations, 2021. In the said Order, the Commission has approved the Station-wise Interest on Ioan capital by considering the Station-wise normative Ioan.
- 4.14.3 The normative loan outstanding for FY 2023-24 has been considered equal to closing normative loan approved in the true-up for FY 2022-23. The loan addition has been considered equal to debt portion of capitalized works as approved by the Commission in this Order. The loan repayment has been considered equivalent to depreciation approved in this Order.
- 4.14.4 The Commission has scrutinised the actual loan details and actual interest amount as submitted by APGCL. The Commission has considered weighted average rate of interest of 10.01% for the purpose of truing up.
- 4.14.5 The interest on loan capital approved by the Commission after true-up for FY 2023-24 is shown in the following Table:

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up	Approved after Truing up
	Net Normative Opening Loan	0.84	0.00	0.00
	Addition of normative loan during the year	0.94	0.58	0.07
	Normative Repayment during the year	1.43	1.53	0.07
	Net Normative Closing Loan	0.35	0.00	0.00
NTPS	Avg. Normative Loan	0.60	0.00	0.00
NIF3	Interest Rate	11.64%	10.01%	10.01%
	Interest on Loan Capital	0.07	0.00	0.00
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	0.07	0.00	0.00
	Net Interest on Loan Capital for Effective Capacity	0.02	0.00	0.00
	Net Normative Opening Loan	0.00	0.00	0.00
	Addition of normative loan during the year	12.31	0.48	0.37
	Normative Repayment during the year	19.64	15.57	0.37
	Net Normative Closing Loan	0.00	0.00	0.00
LTPS	Avg. Normative Loan	0.00	0.00	0.00
	Interest Rate	11.64%	10.01%	10.01%
	Interest on Loan Capital	0.00	0.00	0.00
	Add: Bank Charges	0.00	0.01	0.01
	Net Interest on Loan Capital	0.00	0.01	0.01
	Net Interest on Loan Capital for Effective Capacity	0.00	0.01	0.01
	Net Normative Opening Loan	113.94	100.78	100.78
	Addition of normative loan during the year	17.25	3.08	3.08
	Normative Repayment during the year	23.79	22.92	22.70
KLHEP	Net Normative Closing Loan	107.39	80.94	81.16
	Avg. Normative Loan	110.66	90.86	0.00
	Interest Rate	11.64%	10.01%	10.01%
	Interest on Loan Capital	12.88	9.10	9.11
	Add: Bank Charges	0.00	0.01	0.01

Table 42: Interest on Loan Capital for FY 2023-24 as approved by the Commission (Rs. Crore)

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up	Approved after Truing up
	Net Interest on Loan Capital	12.88	9.11	9.12
	Net Normative Opening Loan	24.29	21.69	21.69
	Addition of normative loan during the year	0.70	0.00	0.00
	Normative Repayment during the year	2.67	12.01	4.80
	Net Normative Closing Loan	22.32	9.68	16.89
LRPP	Avg. Normative Loan	23.30	15.69	0.00
	Interest Rate	11.64%	10.01%	10.01%
	Interest on Loan Capital	2.71	1.57	1.93
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	2.71	1.57	1.93
	Net Normative Opening Loan	454.03	457.51	457.51
	Addition of normative loan during the year	0.00	0.44	0.08
	Normative Repayment during the year	37.50	42.23	34.01
	Net Normative Closing Loan	416.53	415.72	423.58
NRPP	Avg. Normative Loan	435.28	436.61	0.00
	Interest Rate	11.64%	10.01%	10.01%
	Interest on Loan Capital	50.66	43.72	44.12
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	50.66	43.72	44.12
	Total	66.32	54.41	55.18
	Total for Effective Capacity	66.27	54.41	55.18

# 4.15 Return on Equity (RoE)

4.15.1 APGCL submitted that it has considered the pre-tax return on equity at 15.50% of equity capital. The Plant wise Return in Equity has been shown below:

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up
	Opening Equity	57.42	56.69
	Additional during Year	0.00	2.13
NTPS	Closing Equity	57.42	58.82
NIFO	Rate of Return	15.50%	15.50%
	Return on Equity	8.90	8.95
	Return on Equity for Effective Capacity	3.05	1.95
	Opening Equity	148.69	145.03
	Addition during Year	0.00	6.87
LTPS	Closing Equity	148.69	151.90
LII O	Rate of Return	15.50%	15.50%
	Return on Equity	23.05	23.01
	Return on Equity for Effective Capacity	15.75	15.73
	Opening Equity	154.42	147.97
	Addition during Year	0.00	4.16
KLHEP	Closing Equity	154.42	152.13
	Rate of Return	15.50%	15.50%
	Return on Equity	23.94	23.26
	Opening Equity	80.63	65.85
	Addition during Year	0.00	2.38
LRPP	Closing Equity	80.63	68.23
	Rate of Return	15.50%	15.50%
	Return on Equity	12.50	10.39
	Opening Equity	218.69	218.69
	Addition	0.00	0.14
NRPP	Closing Equity	218.69	218.83
	Rate of Return	15.50%	15.50%
	Return on Equity	33.90	33.91
	Total	102.28	99.52
	Total for Effective Capacity	89.14	85.23

Table 43: Return on Equity submitted by APGCL for FY 2023-24 (Rs. Crore)

#### Commission's Analysis

4.15.2 The Commission has approved the RoE in accordance with Regulation 34 of the MYT Regulations, 2021.

- 4.15.3 The Commission has considered the opening Equity for each Station equal to the closing Equity approved in the Truing-up of FY 2022-23. The addition to Equity has been considered same as the equity approved in funding of capitalisation, as elaborated in this Chapter.
- 4.15.4 The Commission notes that it has pending grant to be converted to Equity subject to the ceiling of equity being 30% of GFA of the power station. The Commission has computed the addition to equity due to conversion of Grant as provided in Annexure 4A.
- 4.15.5 The Commission has considered the rate of Return on Equity at 15.5% as specified in Regulation 34 of the MYT Regulations, 2021.

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up	Approved after Truing Up
	Opening Equity	57.42	56.69	56.69
	Additional during Year	0.00	2.13	0.91
NTPS	Closing Equity	57.42	58.82	57.60
NIP5	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	8.90	8.95	8.86
	Return on Equity for Effective Capacity	3.05	1.95	1.93
	Opening Equity	148.69	145.03	145.03
	Addition during Year	0.00	6.87	5.29
LTPS	Closing Equity	148.69	151.90	150.32
LIFS	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	23.05	23.01	22.89
	Return on Equity for Effective Capacity	15.75	15.73	15.65
	Opening Equity	154.42	147.97	147.97
	Addition during Year	0.00	4.16	2.03
KLHEP	Closing Equity	154.42	152.13	150.00
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	23.94	23.26	23.09
	Opening Equity	80.63	65.85	65.85
LRPP	Addition during Year	0.00	2.38	1.37
	Closing Equity	80.63	68.23	67.22

Table 44: Return on Equity approved by the Commission for FY 2023-24 (Rs. Crore)

Station	Particulars	Approved as per Tariff order of March 2023	Claim for True Up	Approved after Truing Up
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	12.50	10.39	10.31
	Opening Equity	218.69	218.69	218.69
	Addition	0.00	0.14	0.04
NRPP	Closing Equity	218.69	218.83	218.73
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	33.90	33.91	33.90
	Total	102.28	99.52	99.05
	Total for Effective Capacity	89.14	85.23	84.88

\*Note for KLHEP, LRPP and NRPP effective capacity is equal to installed capacity.

# 4.16 Interest on Working Capital (IoWC)

- 4.16.1 APGCL submitted that the Petitioner has claimed normative interest on working capital in accordance with the Regulation 37 of the Tariff Regulations, 2021. However, as APGCL does not have liquid fuel stock facility, it has not considered working capital on storage of liquid fuel. The rate of interest has been considered as interest rate equivalent to the normative interest rate of three hundred (300) basis points above the average State Bank of India MCLR (One Year Tenor) prevalent during the last available six months i.e., 8.80% + 3.00 % = 11.80%.
- 4.16.2 APGCL has claimed IoWC of Rs. 3.39 Crore for NTPS, Rs. 11.04 Crore for LTPS, Rs.2.34 Crore for KLHEP, Rs 10.58 Crore for LRPP, and Rs 11.60 Crore for NRPP.

# **Commission's Analysis**

- 4.16.3 The Commission has computed IoWC in accordance with Regulation 37 of the MYT Regulations, 2021. For computation of working capital requirement, the Commission has considered the normative fuel cost and normative O&M Expenses.
- 4.16.4 Regulation 37.1 (d) specifies the rate of IoWC to be considered equivalent to normative interest rate of three hundred (300) basis points above the average State Bank of India (SBI) Marginal Cost of Lending Rate (MCLR) (One-Year Tenor).
- 4.16.5 The average SBI MCLR for FY 2023-24 was 8.58%. Hence, the Commission has accordingly considered the interest rate of 11.58% (8.58% +3.00%) for computation

of IoWC. The IoWC approved by the Commission after true-up for FY 2023-24 is shown in the following Table:

Station	Particulars	Approved as per TO of March 2023	Claim for FY 2023-24	Approved after Truing up
	Fuel Cost for one month	3.83	7.08	6.11
	O&M Expenses for one month	4.86	1.06	4.86
	Maintenance Spares-30% of O&M	17.48	3.83	17.50
	Receivables for two months	18.96	16.79	16.79
NTPS	Total Working Capital Requirement	45.13	28.76	45.26
	Rate of interest	10.58%	11.80%	11.58%
	Interest on Working capital	4.77		5.24
	Interest on Working capital on effective Capacity	$ \begin{array}{c c c c c c c c c c c c c c c c c c c $		
	Fuel Cost for one month	9.21	20.95	24.31
	O&M Expenses for one month	5.55	4.03	5.58
	Maintenance Spares-30% of O&M	19.97	14.49	20.10
	Receivables for two months	37.77	54.09	54.09
LTPS	Total Working Capital Requirement	72.52	93.55	104.09
	Rate of interest	10.58%	11.80%	11.58%
	Interest on Working capital	7.67		12.05
	Interest on Working capital on effective Capacity	5.24	11.04	8.24
	O&M Expenses for one month	2.96	3.01	2.96
	Maintenance Spares-15% of O&M	5.33	5.42	5.34
KLHEP	Receivables for two months	14.46	11.42	11.42
KLIIEF	Total Working Capital Requirement	22.75	19.84	19.72
	Rate of interest	10.58%	11.80%	11.58%
	Interest on Working capital	2.41	2.34	2.28
	Fuel Cost for one month	10.02	22.03	23.95
	O&M Expenses for one month	2.68	2.68	2.68
LRPP	Maintenance Spares-30% of O&M	9.66	9.66	9.66
	Receivables for two months	30.90	55.32	55.32

Table 45: IoWC as approved by the Commission for FY 2023-24	(Rs. Crore)
---	-------------

Station	Particulars	Approved as per TO of March 2023	Claim for FY 2023-24	Approved after Truing up
	Total Working Capital Requirement	53.26	89.68	91.61
	Rate of interest	10.58%	11.80%	11.58%
	Interest on Working capital	5.63	10.58	10.61
	Fuel Cost for one month	7.82	17.71	18.61
	O&M Expenses for one month	2.03	4.02	4.02
	Maintenance Spares-30% of O&M	7.30	14.47	14.47
NRPP	Receivables for two months	41.06	62.10	62.10
	Total Working Capital Requirement	58.21	98.29	99.19
	Rate of interest	10.58%	11.80%	11.58%
	Interest on Working capital	6.16	11.60	11.48
	Total	26.65	20.05	41.66
	Total for Effective Capacity	21.08	38.95	33.75

# 4.17 Impact of AERC (Payment of Fees etc.) Regulation, 2020

- 4.17.1 APGCL submitted that, in accordance to the AERC (Payment of Fees etc.) Regulations, 2020 there is substantial increase in the Filing Fees of APGCL payable to AERC.
- 4.17.2 APGCL has claimed increase in Tariff filing fees of Rs. 0.10 Crore for NTPS, LTPS and LRPP.

# Commission's Analysis

4.17.3 The Commission allows the increase in Tariff Filing fees of Rs 0.10 Crore for NTPS, LTPS and LRPP, respectively, consequential to notification of the AERC (Payment of Fees etc.) Regulations, 2020, as approved in the MYT Order.

# 4.18 Actual Tax Claim

4.18.1 APGCL has claimed Income Tax of Rs. 13.53 Crore for FY 2023-24 as per Audited Accounts. APGCL submitted that it has determined the annual tax claim to be payable to Income Tax Department at Rs. 13.53 Crore. However, the final tax payment will be done based on the amount determined under the tax audit.

# Commission's Analysis

- 4.18.2 Regulation 36 of the MYT Regulations, 2021 provides for reimbursement of actual Income Tax paid on the basis of documentary evidence submitted at the time of truing up for each year of the Control Period.
- 4.18.3 The Commission has verified the actual Income Tax paid with Income Tax Return Acknowledgement (ITR-6) submitted by APGCL. The Commission allows the income tax of Rs 13.53 crore for FY 2023-24 as per the MYT Regulations, 2021.

# 4.19 Special R&M Expenses

4.19.1 APGCL submitted that Special R&M works were undertaken in FY 2023-24 as shown in the Table below:

SL NO	Description of Works	APGCL's claimed for True up (in Lakhs)	APGCL Remarks
	LTPS		
1	Overhauling of LTPS Unit-7	1402	Part expenditure of ₹ 0.98 Cr claimed in True-up of FY 2022-23 and approved by the Commission as well. The spillover amount is now claimed in the True-up of FY 2023-24.
	Total ( In Lakhs)	1402	
	KLHEP		
1	Capital Overhauling of 50MW Francis type Fuji make Generator Turbine Unit-II - KLHEP	1586	The work was proposed in two FYs. Procurement of spares was proposed in one FY and execution of the work was proposed in the other FY. Accordingly, work was approved in the FY 2020-21 for ₹ 15.10 Cr for procurement of spares and in the FY 2022-23 for ₹ 12.00 Cr for execution of the work. Major Overhauling of Unit-2 was delayed due to a delay in the execution of Major Overhauling of Unit-1 of KLHEP (due to Covid-19 outbreak) and the issue of replacement of the runner of Unit-2. Major Overhauling Work of Unit-2 started on 13.01.2023 and completed on 05.08.2023. Rs. 11.14 Crore (for spares) was claimed in True up 2022-23. Balance amount projected in FY 2023-24 (also approved in APR for FY

# Table 46: Special R&M Expenses incurred by APGCL in FY 2023-24 (Rs. Crore)

SL NO	Description of Works	APGCL's claimed for True up (in Lakhs)	APGCL Remarks
			2023-24) . With respect to Procurement and execution works, balance amounts is now being claimed in FY 2023-24 True Up"
2	Additional Capital Investment for Renovation work of damaged assets due to Landslide for KLHEP Plant	325	work completed.
	Total (In Lakhs)	1911	
	LRPP		
1	Overhauling of Gas Engine units and Turbocharger of LRPP	1744	Part amount claimed in True-up of FY 2022- 23 and approved by the Commission as well. The spillover amount is now claimed in the True-up of FY 2023-24.
2	48,000 Running Hours Turbocharger Maintenance	124	PO has been issued to Wartsilla on 17.08.2023. Expected time of completion is March'25. Balance amount to be claimed in next year.
	Total (In Lakhs)	1868.00	
	NRPP		
1	Combustion Inspection of the GT Unit of NRPP	216	Original estimate was Rs18 Cr. After reconciliation final work value was 14.92 Cr. Rs 12.76 Cr was approved by Hon'ble commission in true up for FY 2022-23. and the balance Rs 2.16 Cr is claimed at True up for FY 23-24.
	Total (In Lakhs)	216.00	

#### Commission's Analysis

- 4.19.2 The Commission observed that Special R&M has been claimed by APGCL in FY 2023-24 against various expenses done in all its Power stations excluding NTPS.
- 4.19.3 In LTPS, overhauling of Unit -7 of LTPS for Rs. 14.02 Crore has been incurred against approved work of Rs. 15 Crore. The Commission has considered Rs. 14.02 Crore in FY 2023-24 as the same is the balance expense against the work, which was supposed to be completed in FY 2022-23. However, as observed by the Commission in the true-up of FY 2022-23, APGCL should complete the Special R&M works in the

same year in which they were envisaged and approved by the Commission, else, the Commission may be constrained to disallow such Special R&M expenses being carried out in subsequent years.

- 4.19.4 In KLHEP, Capital Overhauling of 50MW Francis type Fuji make Generator Turbine Unit-II – KLHEP for Rs. 15.86 Crore has been claimed against the approved work of Rs 15.86 Crore. The Commission has considered Rs. 15.86 Crore in FY 2023-24 same as claimed by APGCL after prudence check. Also, Additional Capital Investment for Renovation work of damaged assets due to Landslide for KLHEP Plant for Rs. 3.25 Crore has been claimed by APGCL. The Commission has considered Rs. 3.25 Crore in FY 2023-24 same as claimed by APGCL after prudence check.
- 4.19.5 In LRPP, Special R&M works of Overhauling of Gas Engine units and Turbocharger of LRPP for Rs. 17.44 Crore has been claimed. The Commission reviewed APGCL's claim of Rs. 17.44 Crore for overhauling gas engine units and turbochargers at LRPP, originally planned for Rs. 23.82 Crore. The work, meant for FY 2022-23, extended into FY 2023-24 but was completed without cost overruns, so the Commission approved the claim, directing timely completion in the future. Also, APGCL has claimed the Special R&M work of 48,000 Running Hours Turbocharger Maintenance for Rs. 1.24 Crore against the approved amount of Rs. 7.77 Crore. The commission notes that work was already spilled over from the past years to the last FY 2022-23. Now, during the true-up FY 2023-24, APGCL is claiming a partial amount and proposing the rest for next year The Commission accepted the partial claim for the true-up but the future projections might face disallowance.
- 4.19.6 In NRPP, a special R&M work for the Combustion Inspection of the GT Unit has been claimed at Rs. 2.16 Crore against an approved amount of Rs. 5.74 Crore. APGCL submitted that the original estimate was Rs. 18 Crore. After reconciliation, the final work value was Rs. 14.92 Crore, of which Rs. 12.76 Crore was approved by the Hon'ble Commission in the true-up for FY 2022-23. The balance of Rs. 2.16 Crore is claimed in the true-up for FY 2023-24. After a prudence check, the Commission allows the amount of Rs. 2.16 Crore for the work.
- 4.19.7 The Commission notes that all other Work claimed in Special R&M has been approved in earlier years, with some of the works being claimed partially in True up of FY 2022-23 and balance to be carried out in later years. The Commission approves

the works as per the claim of APGCL for FY 2022-23. The Commission, however, directs APGCL to execute the Special R&M in time-bound manner so that no cost overrun takes place. Further, it is seen that most often, APGCL undertakes bulk of the Special R&M approved for a year in subsequent years only. APGCL has sought and received approval for the Special R&M based on the justification that the Special R&M is necessary for a particular year but does not undertake the Special R&M in that year. This is not acceptable, and the Commission may be constrained to disallow Special R&M not undertaken in the year for which it has been originally approved.

# 4.20 Non-Tariff Income

4.20.1 The Station-wise Non-Tariff Income submitted by APGCL for FY 2023-24 is shown in the following Table:

Station	Approved as per TO of March 2023	Claim for True Up
NTPS	6.58	5.84
LTPS	26.97	23.93
KLHEP	11.84	10.51
LRPP	0.00	0.00
NRPP	0.00	0.00
Total	45.39	40.26

Table 47: Non-Tariff Income as claimed by APCGL for True-up for FY 2023-24 (Rs. Crore)

# Commission's Analysis

- 4.20.2 In the audited accounts for FY 2023-24, APGCL reported total Other Income of Rs. 85.69 Crore. However, in its petition, it claimed only Rs. 40.26 Crore. APGCL explained that the audited accounts included Rs. 28.53 Crore from "delayed payment charges from APDCL" and Rs. 16.90 Crore from "excess found on physical verification of material stock."
- 4.20.3 The delayed payment surcharges relate to bills APDCL delayed in settling, and APGCL argues that these should not be reimbursed to APDCL as other income.

- 4.20.4 Regarding inventory, during the transition to SAP ERP, some items were not uploaded in the system but were present in the books. A reconciliation in December 2023 identified these discrepancies, and the items were added to inventory, crediting other income by Rs. 16.90 Crore. Since these items relate to technical adjustments during ERP migration, they are not related to ARR and are excluded from the non-tariff income claim.
- 4.20.5 APGCL was asked for clarification through an additional query on the non-inclusion of the delayed payment surcharge as Non-Tariff Income, with proper documentary evidence. However, APGCL failed to adequately substantiate their claim. The Commission notes that, as per Regulation 46 (e) of the MYT Regulations, 2021, interest on delayed or deferred payment of bills shall form part of the Non-Tariff Income. Additionally, during the drafting of the MYT Regulations, 2024, APGCL did not submit any comments on the non-inclusion of the delayed payment surcharge as Non-Tariff Income. Hence, the MYT Regulations, 2024 also include a clause considering interest on delayed or deferred payment of bills as Non-Tariff Income.
- 4.20.6 The Commission has thoroughly reviewed the submission by APGCL concerning the Rs. 16.90 Crore credited to other income as a result of inventory adjustments during the transition to the SAP ERP system. APGCL has characterized this adjustment as a rectification of prior technical errors, arguing that it merely corrects discrepancies and is not a actual income.
- 4.20.7 APGCL was asked an additional query to justify the non-inclusion of this as Non tariff income, APGCL provided supporting documentation, including the Statutory Auditor's comments and Management's explanation, to substantiate their position that this adjustment does not constitute a benefit that would lead to double recovery. The commission notes the fact that these adjustments correct previously recorded expenses that may have been inaccurately claimed in prior years. If the Rs. 16.90 Crore adjustment reflects income in the current audited accounts, it suggests that these items were accounted potentially as expense in previous fiscal years. To ensure equitable treatment and avoid any possibility of past over-recoveries by APGCL through the true-up process, the Commission, adhering to regulatory prudence, considers it appropriate to treat this adjustment as part of non-tariff income.

4.20.8 In para 4.19.3 of tariff order June 2024, the Commission had directed APGCL to

considered Rs 1.36 Crore ('Land Lease Charges' and 'Local Area Development Fund Charges) as other income in true up for FY 2023-24, but APGCL to the Commission's additional query has replied that they have not considered it. Hence it is also being considered as other income.

4.20.9 Based on the above analysis and after a prudence check, the Commission approved the Non-Tariff Income of Rs. 87.05 Crore (i.e., Rs. 85.69 Crore as per the Audited Accounts and Rs. 1.36 Crore for land lease charges). The Commission has allocated this amount to all generating stations in the proportion same as claimed by APGCL.

Particulars	For the year ended 31	APGCL Claim for	Approved for True Up	
Faiticulais	March 2024	True Up	The Op	
	Rs. In Lakh	Rs. In Lakh	Rs. In Lakh	
Rebate for timely payment	0.25	0.25	0.25	
Misc.receipts	139.13	139.13	139.13	
Delayed Payment charges from	2852.63	0.00	2852.63	
Customers	2002.00	0.00	2002.00	
Excess found on physical verification of	1690.36	0.00	1690.36	
Mat Stock	1000.00	0.00	1000.00	
Interest income for prior period	38.59	38.59	38.59	
Rentals from staff quarters	6.10	6.10	6.10	
Other Income from trading	252.99	252.99	252.99	
Sale of scrap	0.00	0.00	0.00	
NPS Contirbution of deceased employee	0.00	0.00	0.00	
Interest on Investment (Fixed Deposit)	3500.66	3500.66	3500.66	
Interest from Banks (other than interest on	0.74	0.74	0.74	
fixed deposits)	0.74	0.74	0.74	
Rebate received for timely payment of	87.55	87.55	87.55	
dues	07.55	07.55	07.55	
'Land Lease Charges' and 'Local Area			136	
Development Fund Charges			150	
Total	8569.00	4026.01	8705.00	

Table 48: Non Tariff Income approved by Commission for FY 2023-24 (Rs. Lakhs)

# 4.21 Sharing of Gains and Losses

4.21.1 Regulation 10.2 of the MYT Regulations, 2021 specifies the controllable factors for Generating Stations and Regulation 12 specifies the treatment of sharing of gain or

loss on account of such controllable factors. The Commission has discussed the treatment of each controllable factor as under:

# O&M Expenses

- 4.21.2 Regulation 10.2 of the MYT Regulations, 2021 specifies O&M Expenses as a controllable factor.
- 4.21.3 The sharing of (Gains)/Losses on account of O&M Expenses as submitted by APGCL is shown in the following Table:

# Table 49: Sharing of Gains/(Losses) for O&M Expenses submitted by APGCL for FY 2023-24(Rs. Crore)

Particulars	Revised Normative	Actual	Gains/(Losses)	Increase in Terminal	Sharing of Gains/(Losses)
				Benefits	
NTPS	12.75	12.61	0.14	0.00	0.05
LTPS	48.30	47.05	1.25	0.00	0.42
KLHEP	36.11	35.09	1.02	0.00	0.34
LRPP	32.19	30.02	2.17	0.00	0.72
NRPP	48.23	48.23	0.00	0.00	0.00
Total	177.59	173.01	4.58	0.00	1.53

4.21.4 The sharing of (Gains)/Losses approved by the Commission on account of O&M Expenses is shown in the following Table:

# Table 50: Sharing of (Gains)/Losses for O&M Expenses approved by the Commission for FY2023-24 (Rs. Crore)

Particulars	Revised Normative at Full capacity	Revised Normative at effective capacity	Actual	(Gains)/Los ses	Sharing of (Gains)/Losses
NTPS	58.33	12.69	12.61	(0.08)	(0.03)
LTPS	67.01	45.80	47.05	1.25	0.42
KLHEP	35.57	35.57	35.09	(0.48)	(0.16)
LRPP	32.21	32.21	30.02	(2.19)	(0.73)
NRPP	48.23	48.23	48.23	0.00	0.00
Total	241.35	174.51	173.01	(1.51)	(0.50)

# Fuel Cost

4.21.5 Sharing of (gains)/losses on account of performance parameters and Fuel Cost in the True-up for FY 2023-24 is shown in the Table below:

Table 51: Sharing of (Gains)/Loss on account of Fuel Parameters as Submitted by the APGCLin the True-up for FY 2023-24 (Rs. Crore)

Station	Normative Cost	Actual Cost	Gains/(Losses)	Sharing of Gains/(Losses)
NTPS	84.95	98.79	(13.84)	(4.61)
LTPS	251.34	209.97	41.37	13.79
LRPP	264.31	262.42	1.89	0.63
NRPP	212.48	222.64	(10.16)	(3.39)
Total	813.08	793.82	19.25	6.42

4.21.6 Sharing of (gains)/losses approved by the Commission on account of performance parameters and Fuel Cost in the True-up for FY 2023-24 is shown in the Table below:

# Table 52: Sharing of (Gains)/Loss on account of Fuel Parameters as approved by theCommission in the True-up for FY 2023-24 (Rs. Crore)

Station	Normative Cost	Actual Cost	(Gains)/ Losses	Sharing of (Gains)/ Losses	Net Entitlement	
NTPS	PS 84.95 98.79		13.84	4.61	89.56	
LTPS	251.34	209.97	(41.37)	(13.79)	237.55	
LRPP	264.31	264.31 262.42 (1.89) (0.63)		(0.63)	263.68	
NRPP	NRPP 212.48 222.64		10.16	3.39	215.87	
Total 813.08 793.82		793.82	(19.25)	(6.42)	806.66	

# Auxiliary Consumption

4.21.7 As per MYT Regulations, 2021, Auxiliary Consumption is considered as a controllable parameter. Sharing of (gains)/losses on account of Auxiliary Consumption in the Trueup for FY 2023-24 is shown in the Table below:

Station	Net Normative Generation (MU)	Net Actual Generation (MU)	ECR (Rs./kWh)	Gains/ (Losses) (MU)	Gains/ (Losses) (Rs. Crore)	Sharing of Gains/ (Losses)
NTPS	126.40	121.11	6.70	(5.29)	(3.55)	(1.18)
LTPS	347.53	339.98	7.22	(7.55)	(5.45)	(1.82)
LRPP	462.19	466.93 5.71		4.74	2.70	0.90
NRPP	664.22	667.43	3.30	3.21	1.06	0.35
KLHEP	328.15	326.18	1.12	(1.97)	(0.22)	(0.07)
Total	1928.50	1921.62		(6.87)	(5.46)	(1.82)

# Table 53: Sharing of Gain/(Loss) on account of Auxiliary Consumption as submitted in theTrue-up for FY 2023-24

4.21.8 The sharing of (gains)/losses on account of Auxiliary Consumption approved in the True-up for FY 2023-24 is shown in the Table below:

# Table 54: Sharing of (Gain)/Loss on account of Auxiliary Consumption as approved by theCommission in the True-up for FY 2023-24

Station	Net Normative Generation (MU)	Net Actual Generation (MU)	ECR (Rs./kWh)	(Gains)/ Losses (MU)	(Gains)/ Losses (Rs. Crore)	Sharing of (Gains)/ Losses
NTPS	126.40	121.11	6.72	5.29	3.56	1.19
LTPS	347.53	339.98	7.23	7.55	5.46	1.82
KLHEP	328.15	326.18	1.12	1.97	0.22	0.07
LRPP	462.19	466.93	5.72	(4.74)	(2.71)	(0.90)
NRPP	664.22	667.43	3.20	(3.21)	(1.03)	(0.34)
Total	1,928.50	1,921.62	23.99	6.87	5.51	1.84

4.21.9 The total sharing of Gains and Losses for FY 2023-24 has been summarised in the following Table:

Table 55: Total Sharing of (Gain)/Loss approved by the Commission in the True-up for FY
2023-24 (Rs. Crore)

Particulars	NTPS	LTPS	KLHEP	LRPP	NRPP
(Gains)/ Losses passed to beneficiary for O&M Expenses	(0.03)	0.42	(0.16)	(0.73)	0.00
(Gains)/ Losses passed to beneficiary for Fuel Cost	4.61	(13.79)	0.00	(0.63)	3.39
(Gains)/Losses passed to beneficiary for Auxiliary Consumption	1.19	1.82	0.07	(0.90)	(0.34)
Grand Total	5.77	(11.55)	(0.09)	(2.26)	3.05

# 4.22 Reduction in Annual Fixed Charges

4.22.1 As discussed earlier, the actual PAF for LTPS, KLHEP, and NRPP is lower than the normative PAF, hence, the Annual Fixed Charges have been disallowed on pro-rata basis as shown in the following Table.

# Table 56: Reduction of fixed costs as approved by the Commission for True-up for FY 2023-24(Rs. Crore)

	PAF (%) -	PAF (%) -	AFC (Rs.	Allowable AFC	Disallowed AFC
Particulars	Normative	Actual	Crore)	(Rs. Crore)	(Rs. Crore)
NTPS	50.00%	67.27%	62.53	62.53	0.00
LTPS	50.00%	46.97%	85.14	79.98	(5.15)
KLHEP	85.00%	62.39%	89.93	66.01	(23.92)
LRPP	85.00%	88.54%	82.39	82.39	0.00
NRPP	85.00%	83.12%	178.11	174.17	(3.94)

# 4.23 Summary of True-up for FY 2023-24

4.23.1 The Summary of true-up for FY 2023-24 is shown in the following Table:

		NTPS				LTPS			KLHEP		
Sr. No.	Particulars	Tariff Order dated March, 2023	APGCL's Petition	Approved after Truing up	Tariff Order dated March, 2023	APGCL's Petition	Approved after Truing up	Tariff Order dated March, 2023	APGCL's Petition	Approved after Truing up	
Α	Annual Fixed Charges										
1	O&M expenses	20.00	12.75	58.33	45.50	48.30	67.01	35.54	36.11	35.57	
2	Special R&M Expenses	0.80	0.00	0.00	26.05	14.02	14.02	0.00	19.11	19.11	
3	Increase in AERC Tariff Filing Fees	0.00	0.10	0.10	0.10	0.10	0.10	0.00	0.00	0.00	
4	Depreciation	0.49	1.53	1.48	13.42	15.57	17.12	23.79	22.92	22.70	
5	Interest on Loans	0.02	0.00	0.00	0.00	0.01	0.01	12.88	9.11	9.12	
6	Return on Equity	3.05	1.95	8.86	15.75	15.73	22.89	23.94	23.26	23.09	
7	Interest on WC	1.64	3.39	5.24	5.24	11.04	12.05	2.41	2.34	2.28	
8	Income Tax	0.00	1.14	1.14	0.00	3.67	3.67	0.00	0.77	0.77	
9	Less: Non-Tariff Income	6.58	5.84	12.62	26.97	23.93	51.73	11.84	10.51	22.72	
10	Fixed Cost	19.52	15.03	62.53	79.10	84.51	85.14	86.71	103.11	89.93	
В	Fuel Cost	45.97	84.95	84.95	110.51	251.34	251.34	0.00	0.00	0.00	
С	Total ARR	65.49	99.98	147.48	189.61	335.85	336.48	86.71	103.11	89.93	
D	Incentive for Generation		0.99	0.97		0.00	0.00		0.00	0.00	
E	Sharing of (Gains)/ Losses		5.74	5.77		(12.39)	(11.55)		(0.26)	(0.09)	
F	Reduction in Fixed Cost on Account of PAF		0.00	0.00		(5.12)	(5.15)		(27.43)	(23.92)	
G	Net ARR	65.49	106.71	154.23	189.61	318.34	319.77	86.71	75.42	65.92	

#### Table 57: True-up ARR for NTPS, LTPS and KLHEP for FY 2023-24 as approved by the Commission (Rs. Crore)

		LRPP			NRPP		
Sr. No.	Particulars	Tariff Order dated March, 2023	APGCL's Petition	Approved after Truing up	Tariff Order dated March, 2023	APGCL's Petition	Approved after Truing up
Α	Annual Fixed Charges						
1	O&M expenses	32.19	32.19	32.21	24.34	48.23	48.23
2	Special R&M Expenses	9.37	18.68	18.68	0.00	2.16	2.16
3	Increase in AERC Tariff Filing Fees	0.10	0.10	0.10	0.00	0.00	0.00
4	Depreciation	2.67	12.01	4.80	37.50	42.23	34.01
5	Interest on Loans	2.71	1.57	1.93	50.66	43.72	44.12
6	Return on Equity	12.50	10.39	10.31	33.90	33.91	33.90
7	Interest on WC	5.63	10.58	10.61	6.16	11.60	11.48
8	Income Tax	0.00	3.75	3.75	0.00	4.21	4.21
9	Less: Non-Tariff Income	0.00	0.00	0.00	0.00	0.00	0.00
19	Fixed Cost	65.17	89.27	82.39	152.55	186.07	178.11
В	Fuel Cost	120.24	264.31	264.31	93.83	212.48	212.48
С	Total ARR	185.42	353.58	346.70	246.38	398.54	390.59
D	Incentive for Generation		0.00	0.00		0.00	0.00
Е	Sharing of (Gains)/ Losses		(2.25)	(2.26)		3.04	3.05
F	Reduction in Fixed Cost on Account of PAF		0.00	0.00		(4.12)	(3.94)
G	Net ARR	185.42	351.32	344.43	246.38	397.46	389.70

 Table 58: True-up ARR for LRPP and NRPP for FY 2023-24 as approved by the Commission (Rs. Crore)

# 4.24 Net ARR for Effective Capacity

Table 59: True-up ARR for Existing Generating Stations for FY 2023-24 as approved by the
Commission at Effective Capacity (Rs. Crore)

Particulars	NTPS	LTPS
Total Fixed Cost Approved on Installed Capacity	73.91	119.08
Reduction of Fixed cost due to Decommissioning	57.83	37.68
Total Fixed Cost approved at effective Capacity	16.08	81.40
Add: AERC Filing Fees	0.10	0.10
Add: Special R&M	0.00	14.02
Add: Income Tax	1.14	3.67
Less: Non-Tariff Income	12.62	51.73
Total Fixed Cost approved for effective capacity	4.70	47.45
Add: Fuel Cost	84.95	251.34
Add: Incentive for generation	0.97	0.00
Add: Sharing of (gains)/loss	5.77	(11.55)
Add: Reduction in Fixed Cost on Account of PAF	0.00	(5.15)
Net ARR approved for effective capacity	96.39	282.09

# 4.25 Revenue from Sale of Power

4.25.1 APGCL submitted the Station-wise revenue from sale of power for FY 2023-24 in reply to the additional query of the Commission as shown in the Table below, as per Audited Accounts:

		Approved as per TO of March 2023 Audited Financial Statements for FY 2023-24				Claimed			
Particulars	Fixed/ Capacity charges	Approved Energy charges (Rs./kwh)	Actual Net Generation (in MU)	Fixed/ Capacity charges	Energy Charge	FPA	Total Energy Charge	Total Revenue	in True up FY 23-24
	(Rs. In Cr)			(Rs. In Cr)	(Rs. In Cr)	(Rs. In Cr)	(Rs. In Cr)	(Rs. In Cr)	(Rs. In Cr)
	А	В	С	D	E= B*C/10	F	G = E+F	H= D+G	I
NTPS	19.52	2.68	121.11	19.56	32.46	48.71	81.17	100.73	100.73
LTPS	79.1	2.75	339.98	79.08	93.49	151.94	245.43	324.51	324.51
KLHEP	43.36	1.12	326.18	31.98	36.53	0	36.53	68.51	68.51
LRPP	65.16	2.4	466.93	65.16	112.06	154.67	266.73	331.89	331.89
NRPP	152.55	1.35	667.43	152.52	90.1	129.97	220.07	372.59	372.59
MSHEP*							8.24	8.24	0
Revenue surplus True up 2021-22**								-6	0
HQ adjustment ***								-39.61	0
Total	359.7		1921.62	348.3	364.65	485.29	858.18	1160.86	1198.23

#### Table 60: Revenue from Sale of Power as claimed by APGCL (Rs. Crore)

\* Revenue of MSHEP cannot form part of this petition, Hence, it is excluded from the claim of Revenue.

\*\* Revenue surplus of True Up 2021-22 approved in Tariff Order 29th March 2023 and Review Order dated 25th July 2023 dated was accounted in the FY 2023-24 as per the direction of the Hon'ble Commission. Hence, the same shall not form part of claim of FY 2024-25

\*\*\* During the FY 2023-24, there was reduced Plant Availability Factor of LTPS, KLHEP and NRPP. This will lead to reduced fixed charges in APGCL's claim for True Up 2023-24. Now, as per the recommendation of the Comptroller and Auditor General of India (CAG) we are to provision for such reduced fixed charges on account of PAF in the year of occurrence. Hence the same does not form part of our claim of Revenue.

# **Commission's Analysis**

4.25.2 The Commission observed that the total revenue reported in APGCL's annual audited accounts amounts to Rs. 1160.86 Crore, and the same is not getting reconciled with the claimed amount as provided above, as well as the approved tariff of APGCL for FY 23-24. However, APGCL claimed a revenue of Rs. 1198.23 Crore, excluding the MSHEP revenue of Rs. 8.24 Crore, a revenue surplus from the True Up for 2021-22 approved in the Review Order dated July 25, 2023, amounting to Rs. 6 Crore, as well

as a negative HQ adjustment of Rs. 39.61 Crore due to reduced Plant Availability Factor (PAF). Since the claimed amount does not reconcile with the audited accounts, the Commission recalculated the recoverable fixed cost based on the approved fixed costs in the Tariff Order of March 29, 2023, considering plant availability and recoverable energy charges. For the calculation of recoverable energy charges for NTPS, LTPS, LRPP, and NRPP, the normative fuel cost was used, while for KLHEP, the approved Energy Charge Rate (ECR) from the March 2023 tariff order and actual net generation were used. Detailed calculation is shown in the table below:

Particulars	Fixed Cost approved as per TO March 2023	PAF as per norms	PAF for FY 2023- 24 as per SLDC	Recoverable Fixed Cost as per PAF	Recoverable Energy charge	Total Revenue
NTPS	19.52	50.00%	67.27%	19.52	84.95	104.47
LTPS	79.1	50.00%	46.97%	74.31	251.34	325.65
KLHEP	43.36	85.00%	62.39%	31.83	36.53	68.36
LRPP	65.16	85.00%	88.54%	65.16	264.31	329.47
NRPP	152.55	85.00%	83.12%	149.18	212.48	361.65
TOTAL	359.69			339.99	849.61	1189.60
Revenue Surplus arising out of Truing up for FY 2021-22 as per review order dated 25 July 2023						6.00
Total Revenue Excluding MSHEP and revenue surplus (as per above calculation)						1183.60
Total Revenue Excluding MSHEP and revenue surplus (as per Audited Accounts)						1152.62
Тс	otal Revenue Exclu	iding MSHEP	and revenue	surplus (claimed b	y APGCL)	1198.23

Table 61: Reconciliation of Revenue from sale of power with the approved tariff (Rs. Crores)

4.25.3 The Commission has observed that there is a discrepancy between the recoverable fixed cost and the fixed cost recorded in the accounts, including negative HQ adjustment for reduced fixed cost related to PAF. As such, the Commission has asked for the clarification from APGCL, but the utility could not adequately reconcile its audited accounts with the tariff approved by the Commission for FY 2023-24. Consequently, the Commission has approved the calculated revenue from the sale of power to be Rs. 1183.60 Crore (excluding MSHEP revenue and past revenue surplus) for the purpose of calculating the gap/surplus.

# 5 Annual Performance Review for FY 2024-25

# 5.1 Methodology for Annual Performance Review

- 5.1.1 The Commission had approved the revised ARR for FY 2024-25 for existing Generating Stations in the Tariff Order dated June 27, 2024.
- 5.1.2 Regulation 9.3 of the MYT Regulations, 2021 specifies that the Commission shall undertake the APR and True-up for the respective years of the Control Period from FY 2022-23 to FY 2024-25, as reproduced below:

"9.3 The scope of **the annual review** and True up shall be a comparison of the actual performance of the Generating Company or Transmission Licensee or SLDC or Distribution Licensee with the approved forecast of Aggregate Revenue Requirement and expected revenue from tariff and charges and shall comprise the following:...

....Annual Performance Review: a comparison of the performance targets estimated to be achieved for the current financial year (based on 6 months actual data) with the approved forecast for that financial year including adjusting trajectories of uncontrollable if needed....".(Emphasis Added)

- 5.1.3 APGCL submitted the APR Petition for FY 2024-25, supported by actual information available till September 2024 and estimated values for the next six months.
- 5.1.4 From the above said Regulation, the main objective of the APR is to compare the performance targets for FY 2024-25 vis-à-vis forecast approved in the Tariff Order for FY 2024-25. The Revenue Gap/(Surplus) arising out of APR for FY 2024-25 shall not be passed on to the beneficiaries, and the same shall be considered at the time of Truing-up only.
- 5.1.5 In the present Chapter, the Commission has analysed the revised submission of all the elements of ARR vis-à-vis values approved in the Tariff Order for FY 2024-25. The Commission has computed the Revenue Gap/(Surplus) as an indication of the performance in FY 2024-25. No sharing of (gains)/losses has been undertaken at this stage and the same shall be considered at the time of Truing up for FY 2024-25.

# 5.2 Installed and Effective Capacity of FY 2024-25

5.2.1 APGCL submitted the following installed and effective capacity for FY 2024-25.

		Sta	atus of Plant for	FY 202	4-25
Station	Installed Capacity (MW)	Effective Capacity	Operational Capacity based on Gas Connectivity	No. of Units	Units Available for Generation & Capacity in MW
NTPS	119.5	26.00	26.00	2	GT U#2 (17MW)/ GT U#3 (15 MW) & WHRU U#6 (9 MW)
LTPS	142.2	97.20	97.20	4	5,6,7(20 MW Each),8 (37.20 MW-WHRU)
KLHEP	100	100.00	100.00	2	1 (50), 2(50)
LRPP	69.76	69.76	69.76	7	1-7 (9.965 each)
NRPP	98.4	98.40	98.40	2	1(62.25), 2(36.15)

# Table 62: Installed and Effective Capacity for FY 2024-25

# Commission's Analysis

5.2.2 The Commission has considered the effective capacity for FY 2024-25 as submitted by APGCL in the above Table. The Commission has accordingly reduced the fixed cost derived for APR of FY 2024-25 to the extent of effective capacity with respect to the installed capacity of each of the above Stations, in subsequent section of this Chapter.

# 5.3 Plant Availability Factor (PAF)/Capacity Index

- 5.3.1 **Normative Annual Plant Availability Factor (NAPAF) for NTPS -** APGCL submitted that as per Regulation 48.1 of the MYT Regulations, 2021 the Normative Plant Availability factor for recovery of full fixed charges is 50% for NTPS. It is expected that NTPS will achieve the normative plant availability factor based on 6 months actual number.
- 5.3.2 **Normative Annual Plant Availability Factor (NAPAF) for LTPS -** APGCL submitted that as per Regulation 48.1 of the MYT Regulations, 2021 the Normative Plant Availability factor for recovery of full fixed charges is 50% for LTPS. It is expected that LTPS will achieve the normative plant availability factor based on 6 months actual

number.

- 5.3.3 **Normative Annual Plant Availability Factor (NAPAF) for KLHEP -** APGCL submitted that as per Regulation 50 of MYT Regulations 2021 specifies normative PAF for KLHEP as 85% for recovery of full fixed charges for KLHEP. It is expected that KLHEP will be able to achieve the normative plant availability factor based on 6 months actual number.
- 5.3.4 **Normative Annual Plant Availability Factor (NAPAF) for LRPP -** APGCL submitted that The Hon'ble Commission had approved NAPAF of 85% for LRPP for 2024-25 in its order of June 2024. It is expected that LRPP will be able to achieve the normative plant availability factor based on 6 months actual number.
- 5.3.5 Normative Annual Plant Availability Factor (NAPAF) for NRPP APGCL submitted that The Hon'ble Commission had approved NAPAF of 85% for NRPP for FY 2024-25- in its order of June 2024. It is expected that NRPP will not be able to achieve the normative plant availability factor based on 6 months actual number.
- 5.3.6 APGCL requested the Commission to approve the revised estimated Availability for FY 2024-25 as shown in the Table below:

SI. No.	Station	Approved as per Order of June 2024	April - Sep (actual)	Oct - March (estimated)	Claim for FY 2024-25
1	NTPS	50.00%	58.22%	50.00%	50.00%
2	LTPS	50.00%	55.85%	50.00%	50.00%
3	KLHEP	85.00%	93.54%	85.00%	85.00%
4	LRPP	85.00%	86.95%	85.00%	85.00%
5	NRPP	85.00%	94.62%	85.00%	85.00%

Table 63: Availability as submitted by APGCL for FY 2024-25

# Commission's Analysis

5.3.7 In accordance with the MYT Regulations, 2021, APGCL shall be eligible to recover full fixed charges if NAPAF is achieved as specified in MYT Regulations, 2021.

Accordingly, the Commission approves NAPAF for FY 2023-24 as per MYT Regulations, 2021, as shown in the following Table:

Station	Target Availability/Capacity Index (%)
NTPS	50.00%
LTPS	50.00%
KLHEP	85.00%
LRPP	85.00%
NRPP	85.00%

 Table 64: Target PAF/Capacity Index for recovery of full fixed Charges

# 5.4 Plant Load Factor (PLF)

- 5.4.1 **Normative Annual Plant Load Factor (NAPLF)** for NTPS APGCL submitted that as per as per Regulation 48.2 of the Tariff Regulations, 2021 the Normative Plant Load factor for NTPS is 50%. The Hon'ble Commission had approved the same for NTPS in its order dated June 2024. It is expected that NTPS will not be able to achieve the normative plant load factor based on 6 months actual number.
- 5.4.2 **Normative Annual Plant Load Factor (NAPLF)** for LTPS APGCL submitted that as per as per Regulation 48.2 of the Tariff Regulations, 2021 the Normative Plant Load factor for LTPS is 66%. The Hon'ble Commission had approved the same of LTPS in its order dated June 2024. It is expected that LTPS will not be able to achieve the normative plant load factor based on 6 months actual number.
- 5.4.3 Normative Annual Plant Load Factor (NAPLF) for KLHEP APGCL submitted that as per Regulation 50.1 of the Tariff Regulations, 2021, normative PLF for KLHEP as 44.5%. The Hon'ble Commission had approved the same for FY 2024-25 in its order dated June 2024-25. It is expected that KLHEP will not be able to achieve the normative plant load factor based on 6 months actual number.
- 5.4.4 Normative Annual Plant Load Factor (NAPLF) for LRPP APGCL submitted that the Hon'ble Commission had approved 90% as PLF for incentive for LRPP for 2024-25 in its order dated June 2024. It is expected that LRPP will not be able to achieve

the normative plant load factor based on 6 months actual number.

- 5.4.5 **Normative Annual Plant Load Factor (NAPLF)** for NRPP APGCL submitted that as per regulation 48.2(b) of tariff regulation 2021, the normative plant load factor for incentive of gas based generating station is 85%. It is expected that NRPP will be able to achieve normative PLF based on 6 months actual number.
- 5.4.6 APGCL requested the Commission to approve the revised estimated PLF for FY 2024-25 as shown in the Table below:

SI. No.	Station	Approved as per Order of June 2024	April - Sep (actual)	Oct - March (estimated)	Estimated total
1	NTPS	50.00%	47.31%	50.00%	48.72%
2	LTPS	66.00%	52.91%	66.00%	51.53%
3	KLHEP	44.50%	62.45%	44.50%	43.07%
4	LRPP	90.00%	72.56%	90.00%	78.67%
5	NRPP	85.00%	93.32%	85.00%	89.19%

 Table 65: Plant Load Factor submitted by APGCL for FY 2024-25

# Commission's Analysis

5.4.7 APGCL shall be eligible for incentive only if actual PLF is higher than NAPLF specified in the MYT Regulations, 2021. For the purpose of APR, the Commission has considered Gross Generation and PLF for FY 2023-24 as submitted by APGCL. However, the incentive shall be allowed with respect to NAPLF specified in the MYT Regulations, 2021.

# 5.5 Auxiliary Consumption

5.5.1 Auxiliary Energy Consumption for NTPS - APGCL submitted that as per Regulation 48.3 of the Tariff Regulations, 2021 the Normative Auxiliary energy consumption is 4.50% for 2024-25 for NTPS. APGCL submit the auxiliary consumption of NTPS is estimated to be higher than the approved auxiliary consumption in FY 2024-25 due to part loading of units and old nature of plant and machinery. Auxiliary Energy Consumption for LTPS - APGCL submitted that, as per Regulation 48.3 of the Tariff Regulations, 2021 the Normative Auxiliary energy consumption is 5.50% for LTPS. The same has been approved by the Hon'ble Commission in its order dated June 2024. It is expected that LTPS will achieve the auxiliary consumption higher than normative value.

- 5.5.2 Auxiliary Energy Consumption for KLHEP APGCL submitted that, as per Regulation 50.1 of the Tariff Regulations, 2021 the Normative Auxiliary energy consumption is 0.50% for KLHEP. The same has been approved by the Hon'ble Commission in its order dated June 2024.
- 5.5.3 Auxiliary Energy Consumption for LRPP APGCL submitted that, the Hon'ble Commission had approved Auxiliary Consumption of 3.5% for LRPP for FY 2024-25 in its order dated June 2024. It is expected that LRPP will achieve the auxiliary consumption at normative value.
- 5.5.4 Auxiliary Energy Consumption for NRPP APGCL submitted that, The Hon'ble Commission had approved Auxiliary Consumption of 5% for NRPP for FY 2024- 25 in its order dated June 2024. It is expected that NRPP will achieve the auxiliary consumption at normative value.

Station	Approved as per Order of June 2024	April - Sep (actual)	Oct - March (estimated)	Claim for FY 2024-25
NTPS	4.50%	7.21%	4.50%	5.84%
LTPS	5.50%	8.80%	5.50%	7.23%
KLHEP	0.50%	0.66%	0.50%	0.60%
LRPP	3.50%	2.94%	3.50%	3.50%
NRPP	5.00%	4.81%	5.00%	5.00%

#### Table 66: Auxiliary energy consumption as claimed by APGCL for FY 2024-25

#### Commission's Analysis

5.5.5 The Commission notes that there is a variation in Auxiliary Consumption estimated by APGCL based on actual performance of H1 of FY 2024-25 vis-à-vis Auxiliary Consumption approved in the Tariff Order dated June 27, 2024 for FY 2024-25. The Commission is of the view that the availability of gas in the required quantity and at desired pressure is the responsibility of APGCL only, and no relaxation can be given on account of lower gas availability or lower gas pressure. 5.5.6 The Commission considers the Auxiliary Consumption for existing Generating Stations as per MYT Regulations, 2021, for the purpose of APR, as shown in the following Table:

SI. No.	Station	Approved as per Order of June 2024	Estimated by APGCL	Approved for APR
1	NTPS	4.50%	5.84%	4.50%
2	LTPS	5.50%	7.23%	5.50%
3	KLHEP	0.50%	0.60%	0.50%
4	LRPP	3.50%	3.50%	3.50%
5	NRPP	5.00%	5.00%	5.00%

Table 67: Auxiliary Consumption considered by the Commission for FY 2024-25

# 5.6 Gross Generation and Net Generation

5.6.1 The Gross Generation and Net Generation estimated by APGCL for FY 2024-25 is shown in the following Table:

#### Table 68: Gross and Net Generation as submitted by APGCL for FY 2024-25

SI. No.	Station	Gross Generation (MU)	Net Generation (MU)
1	NTPS	112.54	105.97
2	LTPS	446.90	414.60
3	KLHEP	377.73	375.84
4	LRPP	480.72	463.90
5	NRPP	768.84	730.40

# **Commission's Analysis**

5.6.2 For the purpose of APR, the Commission has considered the gross generation for FY 2024-25 as submitted by APGCL. The Commission has also considered the Net Generation after considering the approved auxiliary consumption of the respective plants in the APR of FY 2024-25.

5.6.3 The Commission has computed the Net Generation based on above estimated Gross Generation and approved Auxiliary Consumption for FY 2024-25. The Gross Generation and Net Generation approved by the Commission in the APR for FY 2024-25 are shown in the following Table:

Table 69: Gross Generation and Net Generation considered by the Commission in the APR for
FY 2024-25

SI. No.	Station	Gross Generation (MU)	Net Generation (MU)
1	NTPS	112.54	107.47
2	LTPS	446.90	422.32
3	LRPP	480.72	463.90
4	NRPP	768.84	730.40
	Total Thermal	1089.00	1724.09
5	KLHEP	377.73	375.84
	Total APGCL	2186.73	2099.92

# 5.7 Station Heat Rate

- 5.7.1 Gross Station Heat Rate (SHR) for NTPS APGCL submitted that, as per Regulation 48.4, of the Tariff Regulations, 2021 the Normative Station Heat Rate is 3900 kCal/kWh for NTPS in combined cycle mode of operation.
- 5.7.2 **Gross Station Heat Rate (SHR) for LTPS –** APGCL submitted that, as per Regulation 48.4, of the Tariff Regulations, 2021 the Normative Station Heat Rate is 3200 kCal/kWh for LTPS in combined cycle mode of operation. APGCL has considered the SHR at actuals for the first 6 months and normative for rest of the year.
- 5.7.3 **Gross Station Heat Rate (SHR) for LRPP –** APGCL submitted that the Hon'ble Commission had approved SHR of 2,150 kCal/kWh for LRPP for FY 2023-24 in its order dated June 2024.
- 5.7.4 **Gross Station Heat Rate (SHR) for NRPP –** APGCL submitted that as per the Tariff Order dated June 2024, the normative GSHR of NRPP is 1951 kcal/kWh to calculate fuel cost.

Station	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024- 25
NTPS	3900	4479	3900	3900
LTPS	3200	2759	3200	3200
LRPP	2150	2143	2150	2150
NRPP	1951	1946	1951	1951

#### Table 70: Station Heat Rate as submitted by APGCL for FY 2024-25

#### Commission's Analysis

- 5.7.5 The Commission observed that the SHR claimed for all the stations and normative SHR specified in the Regulations are same. For the purpose of APR, the Commission has considered the Normative SHR of all the stations.
- 5.7.6 The Commission shall compute the sharing of losses/(gains)on account of higher/lower SHR with respect to the normative at the time of Truing-up of FY 2024-25.
- 5.7.7 The following Table shows the SHR approved by the Commission for APR of FY 2024-25:

SI. No.	Station	APGCL's submission	Approved in APR
1	NTPS	3900	3900
2	LTPS	3200	3200
3	LRPP	2150	2150
4	NRPP	1951	1951

Table 71: Gross Station Heat Rate (kcal/kWh) considered in APR for FY 2024-25

# 5.8 Fuel Cost

5.8.1 APGCL submitted that as per Regulation 10.2 of the MYT Regulations, 2021, Fuel Price and GCV are uncontrollable items. The actual Fuel Price and GCV are shown in the table below:

Station	Wt. Avg. Gross Calorific Value of Gas (kcal/SCM)	Wt. Avg. Price of Gas (Rs./1000 SCM) April - Sept (Actual)	Wt. Avg. Price of Gas (Rs./1000 SCM) Oct -March (Estimated)	Wt. Avg. Price of Gas (Rs./1000 SCM)
NTPS	9213	14189	14189	14189
LTPS	9364	20325	20325	20325
LRPP	9208	23726	23726	23726
NRPP	9213	13881	13881	13881

Table 72: Actual Plant-wise GCV and Price as submitted by APGCL for FY 2024-25

5.8.2 APGCL submitted that the average price of fuel and GSHR for April to September has been considered for the month of October – March. Accordingly, APGCL estimated the fuel cost of NTPS, LTPS, LRPP and NRPP as shown in following tables:

Particulars	Unit	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024- 25
Gross Generation	MU	113.88	55.60	56.94	112.54
Heat Rate	kcal/kWh	3900	4479	3900	3900
GCV of gas	kcal/SCM	9251.93	9213.10	9213.10	9213.10
Overall Heat	G. cal.	444132.00	249038.52	222066.00	438888.70
Gas consumption	M. SCM	48.00	27.03	24.10	47.64
Price of Gas	Rs./1000 SCM	13838.27	14189.00	14189.00	14189.00
Total cost of Gas	Rs. Crore	66.43	38.36	34.20	67.60

# Table 74: Total Fuel Cost for LTPS for FY 2024-25 as submitted by APGCL (Rs. Crore)

Particulars	Unit	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024-25
Gross Generation	MU	425.74	234.03	212.87	446.90
Heat Rate	kcal/kWh	3200	2759	3200	3200
GCV of gas	kcal/SCM	9854.15	9364.00	9364.00	9364.00
Overall Heat	G. cal.	1362355.2	645750	681178	1430064

Particulars	Unit	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024-25
Gas consumption	M. SCM	138.25	68.96	72.74	152.72
Price of Gas	Rs./1000 SCM	19846.15	20325.00	20325.00	20325.00
Total cost of Gas	Rs. Crore	274.38	140.16	147.85	310.40

Table 75: Total Fuel Cost for LRPP for FY 2024-25 as submitted by APGCL (Rs. Crore)

Particulars	Unit	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024-25
Gross Generation	MU	519.40	221.03	259.70	480.72
Heat Rate	kcal/kWh	2150	2143	2150	2150
GCV of gas	kcal/SCM	9246.32	9208	9208	9208
Overall Heat	G. cal.	1116700.82	473681	558350	1033554
Gas consumption	M. SCM	120.77	51.44	60.64	112.25
Price of Gas	Rs./1000 SCM	22872.58	23726	23726	23726
Total cost of Gas	Rs. Crore	276.24	122.06	143.87	266.32

Particulars	Unit	Approved as per order of June 2024	April - Sep (actual)	Oct -March (estimated)	Claim for FY 2024-25
Gross Generation	MU	732.69	402.50	366.34	768.84
Heat Rate	kcal/kWh	1951	1946	1951	1951
GCV of gas	kcal/SCM	9251.7	9213	9213	9213
Overall Heat	G. cal.	1429471.17	783444	714736	1500016
Gas consumption	M. SCM	154.51	85.04	77.58	162.81
Price of Gas	Rs./1000 SCM	13838.27	13881	13881	13881
Total cost of Gas	Rs. Crore	213.81	118.04	107.69	226.00

# Commission's Analysis

- 5.8.3 The Commission, in the Tariff Order dated June 27, 2024, had approved the Fuel Cost for NTPS, LTPS, LRPP and NRPP for FY 2024-25 based on approved performance parameters and latest GCV and price of Fuels available at that time.
- 5.8.4 For the purpose of APR, the Commission has adopted the same approach and approves the Fuel Cost based on approved performance parameters in this Order and latest fuel price and GCV.
- 5.8.5 The Commission has verified the weighted average GCV and price of gas as per fuel bills submitted by APGCL for the period from April 2024 to September 2024. The Commission observed that the GCV and fuel price is in line with the submission of APGCL for H1 of FY 2024-25. Accordingly, the Commission has considered the GCV and fuel prices as submitted by APGCL for estimation of fuel cost in APR of FY 2024-25.
- 5.8.6 The GCV and landed price of gas considered by the Commission for projection of fuel cost is shown in the following Table:

Station	Particulars	Approved for APR
NTPS	GCV of Gas (kcal/SCM)	9,213.10
	Price of Gas (Rs. /1000SCM)	14,189.50
LTPS	GCV of Gas (kcal/SCM)	9,364.12
	Price of Gas (Rs. /1000SCM)	20,324.99
LRPP	GCV of Gas (kcal/SCM)	9,207.71
	Price of Gas (Rs. /1000SCM)	23,725.87
NRPP	GCV of Gas (kcal/SCM)	9,213.10
	Price of Gas (Rs. /1000SCM)	13,881.17

Table 77: GCV and Landed Price of Gas for FY 2024-25 considered by the Commission

5.8.7 The fuel cost provisionally approved by the Commission for NTPS, LTPS, LRPP and NRPP for FY 2024-25 for APR purposes is shown in the following Table:

SI. No	Particulars	Unit	NTPS	LTPS	LRPP	NRPP
1	Gross Generation	MU	112.54	446.895	480.72	768.84
2	Heat Rate	kcal/kWh	3900	3200	2150	1951
3	GCV of gas	kcal/SCM	9,213.10	9,364.12	9,207.71	9,213.10
4	Overall Heat	Giga cal.	438,888.70	1,430,064.00	1,033,554.16	1,500,052.23
5	Gas consumption	M. SCM	47.64	152.72	112.25	162.82
6	Price of Gas	Rs./1000 SCM	14,189.50	20,324.99	23,725.87	13,881.17
7	Total Cost of Gas	Rs. Crore	67.60	310.40	266.32	226.01

Table 78: Fuel Cost considered by the Commission in APR for FY 2024-25

#### 5.9 O&M Expenses

5.9.1 APGCL submitted that the petitioner has escalated the claimed true up normative O&M at full capacity for FY 2023-24 @ 6.4% to arrive at APR normative O&M at full capacity for FY 2024-25.

Table 79: Normative O&M Cost submitted by APGCL for FY 2024-25

Station	Approved in order of June 2024	Approved considering Effective Installed Capacity in order of June 2024	Normative O&M based on True up Claimed 2023-24 at Full Capacity	O&M calculated for APR of FY 2024-25 at Full Capacity	O&M Claimed for APR of FY 2024-25 at Effective Capacity
Α	В	С	Е	F= E *(1+6.4%)	G
NTPS	61.88	13.46	58.62	62.37	13.57
LTPS	70.68	48.31	70.67	75.19	51.40
KLHEP	37.74	37.74	36.11	38.42	38.42
LRPP	34.17	34.17	32.19	34.25	34.25
NRPP	25.85	25.85	24.34	25.90	25.90
Total	230.32	159.54	221.92	236.13	163.53

#### Commission's Analysis

- 5.9.2 The Commission in the Tariff Order dated June 27, 2024 has computed O&M expenses on normative basis as per MYT Regulations, 2021 for FY 2024-25. The Commission had considered an escalation of 6.09% approved values of FY 2023-24.
- 5.9.3 The Commission in the APR for FY 2024-25 has computed the normative O&M Expenses in accordance with Regulation 51 of the MYT Regulations, 2021. The normative O&M expenses approved in the True-up of FY 2023-24 have been escalated by 6.17% (last 3-year average of CPI and WPI in the ratio of 60:40) to compute the normative O&M expenses for FY 2024-25 as shown in the table below:

Station	Approved in order of June 2024	APGCL's Submission (Effective capacity)	Approved Normative O&M (Full capacity)
Α	В	С	E
NTPS	61.88	13.57	61.93
LTPS	70.68	51.40	71.14
KLHEP	37.74	38.42	37.77
LRPP	34.17	34.25	34.20
NRPP	25.85	25.90	25.87
Total	230.32	163.53	230.91

Table 80: Normative O&M expenses for FY 2024-25 considered in APR (Rs. Crore)

- 5.9.4 The O&M expenses for LRPP have been estimated based on the O&M norm of Rs. 49.03 Lakh/MW, which has been derived after escalating O&M norm of Rs. 46.18 Lakh/MW considered in Truing-up of FY 2023-24 by 6.17% (last 3-year average of CPI and WPI in the ratio of 60:40) as per the MYT Regulations, 2021. The total O&M expenses for LRPP works out to Rs 34.20 Crore for FY 2024-25.
- 5.9.5 The O&M expenses for NRPP have been estimated based on the O&M norm of Rs. 26.29 Lakh/MW, which has been derived after escalating O&M norm of Rs. 24.76 Lakh/MW specified for FY 2023-24 in the MYT Regulations, 2021 by 6.17% (last 3year average of CPI and WPI in the ratio of 60:40) as per the MYT Regulations, 2021. The total O&M expenses for NRPP works out to Rs 25.87 Crore for FY 2024-25.

#### 5.10 Capital Expenditure and Capitalisation

5.10.1 APGCL has submitted revised Capital Expenditure Plan for its Existing Plants for FY 2024-25 as below:

Station	Capex approved by Commission in Order June 2024	Capex claimed in this petition
NTPS	0.77	2.05
LTPS	8.78	15.25
KLHEP	26.09	17.26
LRPP	1.49	2.10
NRPP	0.00	2.96
Total	37.13	39.62

 Table 81: Capital Expenditure and Capitalisation as submitted by APGCL for FY 2024-25 (Rs.

 Crore)

#### Commission's Analysis

5.10.2 The Commission in the Tariff Order dated June 27, 2024 had approved the capital expenditure and capitalisation for the existing generating stations for FY 2024-25. The Commission has analysed the revised Capex plan submitted by APGCL in its Petition. The Work-wise approval for the revised capital expenditure plan is provided in **Annexure 3A**. For the purpose of the APR, the Commission has provisionally considered the Capital Expenditure and Capitalisation as considered in **Annexure 3A** for NTPS, LTPS, KLHEP, LRPP and NRPP. The Commission shall however, revisit the Capital Expenditure for approval at the time of Truing-up of FY 2024-25 based on actual after prudence check.

Table 82: Capital Expenditure and Capitalisation as considered by the Commission for FY2024-25 (Rs. Crore)

Particulars	NTPS	LTPS	KLHEP	LRPP	NRPP
Capital Expenditure	1.95	12.73	16.86	2.10	2.96
Capitalisation	1.95	12.73	16.86	2.10	2.96

5.10.3 As regards the funding of capitalisation for NTPS, LTPS, KLHEP, LRPP, and NRPP,

the Commission notes that APGCL has projected all the funding for capital expenditure through equity. However, the Commission has considered funding for ERP implementation and consultancy from grants, with 30% of the remaining approved capitalisation as equity and the remaining 70% as debt. The following table shows the funding of the above capitalisation as considered by the Commission:

Particulars	NTPS	LTPS	KLHEP	LRPP	NRPP
Loan	1.36	6.87	9.70	0.00	0.00
Equity	0.58	2.94	4.16	0.00	0.00
Grant	-	2.92	3.01	2.10	2.96
Total Capitalisation	1.95	12.73	16.86	2.10	2.96

Table 83: Funding of Capitalisation as considered by the Commission for FY 2024-25 (Rs.Crore)

#### 5.11 Depreciation

5.11.1 APGCL has computed the Depreciation considering Capital Cost of the asset admitted by the Commission with 10% salvage value. APGCL submitted the Depreciation of Rs. 1.58 Crore for NTPS, Rs. 16.07 Crore for LTPS, Rs. 23.50 Crore for KLHEP, Rs. 12.16 Crore for LRPP, and Rs 42.46 Crore for NRPP for FY 2024-25.

#### Commission's Analysis

- 5.11.2 The Commission has considered the opening GFA for FY 2024-25 equivalent to the closing GFA for FY 2023-24 as approved in this Order. The Commission has computed depreciation as per scheduled rates specified in the MYT Regulations, 2021.
- 5.11.3 As per Regulation 33 of the MYT Regulations, 2021, the total depreciation during the life of the asset shall not exceed 90% of the original cost of Asset. The Commission has computed the depreciation separately for assets added under each asset head in each year. The Commission has disallowed the depreciation in excess of 90% of the original cost of asset under different asset heads.
- 5.11.4 Further, in accordance with Regulation 33 of the MYT Regulations, 2021, the Commission has not considered the depreciation on assets funded through grants or

capital subsidy for FY 2024-25.

5.11.5 The depreciation provisionally approved in the APR for FY 2024-25 is given in the Table below:

Table 84: Station-wise depreciation considered for APR for FY 2024-25 (Rs. Crore)

Station	Particulars	Approved as per Order of June 2024	Claim for FY 2024- 25	Approved for APR
	Depreciation	1.68	1.61	1.82
NTPS	Less: Depreciation on assets funded by Grants	0.13	0.02	0.16
	Net Depreciation	1.54	1.58	1.66
	Net Depreciation for Effective Capacity	0.34	1.50	0.36
	Depreciation	16.62	16.55	17.06
LTPS	Less: Depreciation on assets funded by Grants	2.28	0.46	2.28
	Net Depreciation	14.34	16.09	14.78
	Net Depreciation for Effective Capacity	9.80	10.09	10.10
	Depreciation	24.29	24.09	25.22
KLHEP	Less: Depreciation on assets funded by Grants	1.26	0.59	1.36
	Net Depreciation	23.03	23.50	23.85
	Net Depreciation for Effective Capacity	23.03	25.50	23.05
	Depreciation	13.76	14.74	14.33
	Less: Depreciation on assets funded by Grants	9.07	2.58	9.48
LRPP	Net Depreciation	4.68	12.16	4.85
	Net Depreciation for Effective Capacity	4.68		
	Depreciation	34.01	42.46	34.23
NRPP	Less: Depreciation on assets funded by Grants	0	0.00	0.07
	Net Depreciation	34.01	42.46	34.17

Station	Particulars	Approved as per Order of June 2024	Claim for FY 2024- 25	Approved for APR
	Net Depreciation for Effective Capacity	34.01		
	Total	77.60	95.79	73.33
	Total for Effective Capacity	71.86	95.79	79.31

#### 5.12 Interest on Loan Capital

5.12.1 APGCL submitted that the Petitioner has computed the Interest on long term Loan on normative basis for FY 2024-25. The Petitioner has considered normative loan portfolio and the repayment shown is considered equal to the depreciation for FY 2024-25. The interest rate has been considered as the expected weighted average rate of interest for FY 2024-25. APGCL has claimed the Interest on Loan Rs. 0.00 Crore for NTPS and LTPS, Rs. 7.56 Crore for KLHEP, Rs. 0.49 Crore for LRPP, and Rs 39.76 Crore for NRPP for FY 2024-25.

#### Commission's Analysis

- 5.12.2 In the Tariff Order dated June 27, 2024, the Commission has approved Interest and finance charges on normative basis for FY 2024-25 as per MYT Regulations, 2021. For the APR, the Commission has considered the same approach and provisionally approved the Interest and finance charges on normative basis.
- 5.12.3 The closing net normative loan for FY 2023-24 as approved in this Order has been considered as opening net normative loan for FY 2024-25. The addition of loan has been considered equal to debt portion of capitalised works as approved in this Order. The loan repayment has been considered equivalent to Depreciation approved in this Order. As per MYT Regulations, 2021, weighted average rate of interest shall be computed based on actual outstanding loan as on April 1, 2023. The Commission has computed the weighted average interest rate of 10.05% for FY 2024-25.
- 5.12.4 The Interest on loan capital provisionally approved by the Commission for FY 2024-25 is shown in the following Table:

Station	Particulars	Approved as per Order of June 2024	Claim for FY 2024-25	Approved in APR
	Net Normative Opening Loan	0.63	0.00	0.00
	Addition of normative loan during the year	0.12	1.43	1.36
	Normative Repayment during the year	1.54	1.58	1.36
	Net Normative Closing Loan	0.00	0.00	0.00
NTPS	Avg. Normative Loan	0.32	0.00	0.00
	Interest Rate	10.35%	10.05%	10.05%
	Interest on Loan Capital	0.03	0.00	0.00
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	0.03	0.00	0.00
	Net Interest on Loan Capital for Effective Capacity	0.01	0.00	0.00
	Net Normative Opening Loan	0	0.00	0.00
	Addition of normative loan during the year	7.33	10.67	6.87
	Normative Repayment during the year	14.34	16.09	6.87
	Net Normative Closing Loan	0.00	0.00	0.00
LTPS	Avg. Normative Loan	0.00	0.00	0.00
	Interest Rate	10.35%	10.05%	10.05%
	Interest on Loan Capital	0.00	0.00	0.00
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	0.00	0.00	0.00
	Net Interest on Loan Capital for Effective Capacity	0.00	0.00	0.00
	Net Normative Opening Loan	84.20	80.94	81.16
	Addition of normative loan during the year	24.60	12.08	9.70
KLHEP	Normative Repayment during the year	23.03	23.50	23.85
	Net Normative Closing Loan	85.77	69.52	67.00
	Avg. Normative Loan	84.99	75.23	0.00
	Interest Rate	10.35%	10.05%	10.05%

#### Table 85: Interest on Loan Capital considered for APR for FY 2024-25 (Rs. Crore)

Station	Particulars	Approved as per Order of June 2024	Claim for FY 2024-25	Approved in APR
	Interest on Loan Capital	8.80	7.56	7.45
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	8.80	7.56	7.45
	Net Normative Opening Loan	17.01	9.68	16.89
	Addition of normative loan during the year	0.45	1.47	0.00
	Normative Repayment during the year	4.68	12.16	4.85
LRPP	Net Normative Closing Loan	12.78	0.00	12.05
	Avg. Normative Loan	14.90	4.84	0.00
	Interest Rate	10.35%	10.05%	10.05%
	Interest on Loan Capital	1.54	0.49	1.45
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	1.54	0.49	1.45
	Net Normative Opening Loan	423.51	415.72	423.58
	Addition of normative loan during the year	0.00	2.04	0.00
	Normative Repayment during the year	34.01	42.46	34.17
NRPP	Net Normative Closing Loan	389.50	375.30	389.42
	Avg. Normative Loan	406.51	395.51	0.00
	Interest Rate	10.35%	10.05%	10.05%
	Interest on Loan Capital	42.07	39.76	40.87
	Add: Bank Charges	0.00	0.00	0.00
	Net Interest on Loan Capital	42.07	39.76	40.87
	Total	52.44	47.81	49.77
	Total for Effective Capacity	52.42	47.81	49.77

#### 5.13 Return on Equity (RoE)

5.13.1 APGCL submitted it has determined the Return on Equity (RoE) at a rate of 15.5% in accordance with the AERC Regulations, 2021. The Petitioner submits that there has been normative addition in Equity (at effective capacity for NTPS and LTPS) in FY 2024-25 for NTPS, LTPS, LRPP and NRPP and KLHEP. APGCL estimated RoE of Rs. 1.99 Crore for NTPS, Rs. 16.34 Crore for LTPS, Rs. 23.98 Crore for KLHEP, Rs.

10.62 Crore for LRPP, and Rs 33.99 Crore for NRPP for FY 2024-25 for the purpose of APR.

#### Commission's Analysis

5.13.2 The Commission has approved the RoE in accordance with Regulation 34 of the MYT Regulations, 2021. The Commission has considered the addition of equity for capitalised works approved as funded through equity in this Order. However, the Commission notes there are some grants, which are yet to be converted to equity. The same have been converted subject to the normative ceiling of 30% of GFA. The detailed computation of allowable equity addition due to such conversion of grant in FY 2024-25 is provided in Annexure – 4 B. Therefore, the approved RoE at 15.50% is shown in the Table below:

Station	Particulars	Approved as per Order of June 2024	Claim for FY 2024-25	Approved for APR
	Opening Equity	57.57	58.82	57.60
	Additional during Year	1.37	0.62	1.62
NTPS	Closing Equity	58.94	59.44	59.23
INIF 3	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	9.03	9.17	9.05
	Return on Equity for Effective Capacity	1.96	1.99	1.97
	Opening Equity	147.5	151.90	150.32
	Addition during Year	4.45	4.58	4.46
LTPS	Closing Equity	151.95	156.48	154.78
LIFS	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	23.21	23.90	23.65
	Return on Equity for Effective Capacity	15.86	16.34	16.16
	Opening Equity	149.78	152.13	150.00
	Addition during Year	3.55	5.18	6.42
KLHEP	Closing Equity	153.33	157.31	156.43
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	23.49	23.98	23.75
LRPP	Opening Equity	67.23	68.23	67.22

Table 86: Return on Equity considered by the Commission for FY 2024-25 (Rs. Crore)

	Addition during Year	1.12	0.63	0.70
	Closing Equity	68.35	68.86	67.93
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	10.51	10.62	10.47
	Opening Equity	218.69	218.83	218.73
	Addition during Year	0.00	0.92	0.00
NRPP	Closing Equity	218.69	219.75	218.73
	Rate of Return	15.50%	15.50%	15.50%
	Return on Equity	33.90	33.99	33.90
	Total	100.13	101.66	100.82
	Total for Effective Capacity	85.72	86.93	86.25

#### 5.14 Interest on Working Capital (IoWC)

5.14.1 APGCL submitted that it has projected normative interest on working capital. However, as APGCL does not have liquid fuel stock facility, it has not considered working capital on storage of liquid fuel. The rate of interest has been considered equal to the normative interest rate of three hundred (300) basis points above the average State Bank of India MCLR (One Year Tenor) prevalent during the last available six months, which 8.80% + 3.00 % = 11.80%. APGCL submitted that the Commission in Tariff Order dated June 27, 2024 had approved IoWC of Rs.34.63 Crore for FY 2024-25. As against this, APGCL has estimated IoWC of Rs. 41.51 Crore for FY 2024-25 based on the revised parameters.

#### **Commission's Analysis**

- 5.14.2 The Commission has computed IoWC in accordance with Regulation 37 of the MYT Regulations, 2021. For computation of working capital requirement, the Commission has considered the fuel cost and O&M Expenses on normative basis.
- 5.14.3 The rate of Interest has been considered equivalent to normative interest rate of three hundred (300) basis points above the average SBI MCLR (One-year tenor) prevalent during the last available six months for the determination of tariffs, i.e, interest rate has been considered as 11.85%.
- 5.14.4 For the purpose of APR, IoWC provisionally approved by the Commission for FY 2024-25 is shown in the following Table:

Station	Particulars	Approved as per TO of June 2024	Claim for FY 2024-25	Approved for APR
	Fuel Cost for one month	5.54	5.63	5.70
	O&M Expenses for one month	5.16	1.13	5.16
	Maintenance Spares-30% of O&M	18.56	4.07	18.58
	Receivables for two months	23.46	14.43	24.38
NTPS	Total Working Capital Requirement	52.71	25.26	53.81
	Rate of interest	11.53%	11.80%	11.85%
	Interest on Working capital	6.08		6.38
	Interest on Working capital on effective Capacity	1.32	2.98	1.39
	Fuel Cost for one month	22.86	25.87	24.64
	O&M Expenses for one month	5.89	4.28	5.93
	Maintenance Spares-30% of O&M	21.20	15.42	21.34
	Receivables for two months	67.95	69.89	71.89
LTPS	Total Working Capital Requirement	117.91	115.46	123.81
	Rate of interest	11.53%	11.80%	11.85%
	Interest on Working capital	13.60		14.67
	Interest on Working capital on effective Capacity	9.29	13.62	10.03
	O&M Expenses for one month	3.14	3.20	3.15
	Maintenance Spares-15% of O&M	5.66	5.76	5.67
KLHEP	Receivables for two months	13.63	13.71	13.60
<b>NLI IL</b> F	Total Working Capital Requirement	22.43	22.68	22.41
	Rate of interest	11.53%	11.80%	11.85%
	Interest on Working capital	2.59	2.68	2.66
	Fuel Cost for one month	23.02	22.19	23.98
	O&M Expenses for one month	2.85	2.85	2.85
LRPP	Maintenance Spares-30% of O&M	10.25	10.28	10.26
	Receivables for two months	62.05	61.98	64.08
	Total Working Capital Requirement	98.17	97.30	101.17
	Rate of interest	11.53%	11.80%	11.85%

Table 87: Interest on Working Capital approved by the Commission for FY 2024-25 (Rs. Crore)

Station	Particulars	Approved as per TO of June 2024	Claim for FY 2024-25	Approved for APR
	Interest on Working capital	11.32	11.48	11.99
	Fuel Cost for one month	17.82	18.83	17.95
	O&M Expenses for one month	2.15	2.16	2.16
	Maintenance Spares-30% of O&M	7.75	7.77	7.76
NRPP	Receivables for two months	59.96	62.36	59.29
	Total Working Capital Requirement	87.68	91.12	87.16
	Rate of interest	11.53%	11.80%	11.85%
	Interest on Working capital	10.11	10.75	10.33
	Total	37.61	44.00	46.02
	Total for Effective Capacity	34.63	41.00	36.39

#### 5.15 Impact of AERC (Payment of Fees etc.) Regulation, 2020

5.15.1 APGCL has claimed tentative impact of the increase in the filing fees has been shown below:

Station	Approved in Tariff Order dated March 2024	Actual claim for FY 2024-25
NTPS	0.10	0.10
LTPS	0.10	0.10
KLHEP	0.0	0.0
LRPP	0.10	0.10
NRPP	0.0	0.0
Total	0.30	0.30

#### Commission's Analysis

5.15.2 The Commission has approved amount of Rs. 0.10 Crore each for NTPS, LTPS and LRPP towards increase in AERC Tariff Filing Fees as submitted by APGCL (shown separately in ARR Tables in subsequent sections).

#### 5.16 Special R&M

5.16.1 APGCL has claimed the status of the approved and actual special R&M being conducted in FY 2024-25 has been shown in the table below:

SL NO	Description of Works	Approved by Commission (In Lakhs)	Revised Proposed (In Lakhs)	Remarks
	NTPS			
1	Overhauling of Steam Turbine Unit 6 (Execution Part) excluding procurement of spares.	80	0	Spares procured. Material is in inventory. APGCL will claim the amount in True-up of the FY as and when the work is complete.
2	Overhauling of Gas turbine Unit 2 (Execution Part) excluding procurement of spares.	80	0	Dropped due to technical issue
	Total (In Lakhs)	160	0	
	LTPS			
1	Procurement of spares for Major inspection of Gas Turbine unit # 6	2600	2600	Under process. PO will be placed shortly.
	Total (In Lakhs)	2600	2600	
	LRPP			
1	16,000 and 48,000 Running Hours Maintenance	3375	3644	Under process. PO will be placed shortly. Earlier currency exchange rate was considered INR 87.09 /Euro. At present current estimated is considered as INR95/Euro.
	Total (In Lakhs)	3375	3644	
	Grand Total	6135	6244	

#### Table 89: Revised Special R&M Schemes for FY 2024-25 (Rs. Lakh)

#### Commission's Analysis

- 5.16.2 Regarding LTPS, the Commission notes that APGCL has claimed Rs. 26 Crore for the "procurement of spares for the major inspection of Gas Turbine Unit #6," and the Commission, in its order of June 2024, has allowed the same Rs. 26 Crore. Hence, the Commission provisionally allows the amount claimed by APGCL. The Commission also notes that APGCL has not submitted any specific board approval and directs APGCL to submit the same during the true-up process.
- 5.16.3 Additionally, for LRPP, the Commission notes that APGCL has claimed Rs. 36.44 Crore for the work "16,000 and 48,000 Running Hours Maintenance," which is against

the approved amount of Rs. 33.75 Crore in the Tariff Order of June 2024, without providing any relevant supporting documents. The Commission approves Rs. 33.75 Crore, directing APGCL to justify its claim with relevant supporting documents at the time of the true-up.

5.16.4 The Commission is of the view that the Special R&M schemes can be considered by the Commission only after the Board approval. Also, only the expense that is essential for efficient operation of the plant may be allowed under this expense head.

#### 5.17 Non-Tariff Income

5.17.1 APGCL submitted that the non-tariff income has been estimated at normatively approved numbers by Hon'ble Commission in its order dated June 2024. The details of non-tariff income for FY 2024-25 are shown in the table below:

Station	Approved as per Order of June 2024	Claim for FY 2024-25
NTPS	5.96	1.25
LTPS	14.61	14.61
KLHEP	13.86	13.86
LRPP	0.00	0.00
NRPP	0.00	4.71
Total	34.42	34.42

#### Table 90: Station-wise details of non-tariff income for FY 2024-25

#### Commission's Analysis

5.17.2 For the purpose of APR, the Commission provisionally approves the non-tariff income for FY 2024-25 same as claimed by APGCL.

#### 5.18 Summary of APR for FY 2024-25

5.18.1 The summary of station-wise ARR after APR for FY 2024-25 is shown in the following Table:

	NTPS				LTPS			KLHEP		
Sr. No.	Particulars	Tariff Order dated June 2024	APGCL's Petition	Approved for APR	Tariff Order dated June 2024	APGCL's Petition	Approved for APR	Tariff Order dated June 2024	APGCL's Petition	Approved for APR
Α	Annual Fixed Charges									
1	O&M expenses	61.88	13.57	61.93	70.68	51.40	71.14	37.74	38.42	37.77
2	Special R&M Expenses	1.60	0.00	0.00	0.00	26.00	26.00	0.00	0.00	0.00
3	Increase in AERC Tariff Filing Fees	0.10	0.10	0.10	0.10	0.10	0.10	0.00	0.00	0.00
4	Depreciation	1.54	1.58	1.66	14.34	16.09	14.78	23.03	23.50	23.85
5	Interest & Finance Charges	0.03	0.00	0.00	0.00	0.00	0.00	8.80	7.56	7.45
6	Return on Equity	9.03	1.99	9.05	23.21	16.34	23.65	23.49	23.98	23.75
7	Interest on WC	6.08	2.98	6.38	13.60	13.62	14.67	2.59	2.68	2.66
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	5.96	1.25	1.25	14.61	14.61	14.61	13.86	13.86	13.86
10	Fixed Cost	74.31	18.98	77.88	133.32	108.94	135.73	81.78	82.28	81.61
В	Fuel Cost	66.43	67.60	67.60	274.38	310.40	310.40	0.00	0.00	0.00
С	Total ARR	140.74	86.58	145.47	407.69	419.33	446.12	81.78	82.28	81.61

Table 91: ARR for NTPS, LTPS and KLHEP for FY 2024-25 considered by the Commission in APR (Rs. Crore)

			LRPP			NRPP	
Sr. No.	Particulars	Tariff Order dated June, 2024	APGCL's Petition	Approved for APR	Tariff Order dated June, 2024	APGCL's Petition	Approved for APR
Α	Annual Fixed Charges						
1	O&M expenses	34.17	34.25	34.20	25.85	25.90	25.87
2	Special R&M Expenses	33.75	36.44	33.75	0.00	0.00	0.00
3	Increase in AERC Tariff Filing Fees	0.10	0.10	0.10	0.00	0.00	0.00
4	Depreciation	4.68	12.16	4.85	34.01	42.46	34.17
5	Interest & Finance Charges	1.54	0.49	1.45	42.07	39.76	40.87
6	Return on Equity	10.51	10.62	10.47	33.90	33.99	33.90
7	Interest on WC	11.32	11.48	11.99	10.11	10.75	10.33
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	0.00	0.00	0.00	0.00	4.71	4.71
10	Fixed Cost	96.07	105.54	96.81	145.94	148.14	140.41
В	Fuel Cost	276.24	266.32	266.32	213.81	226.00	226.01
С	Total ARR	372.31	371.86	363.13	359.75	374.15	366.42

Table 92: ARR for LRPP and NRPP for FY 2024-25 considered by the Commission in APR (Rs. Crore)

#### 5.19 Net ARR for Effective Capacity

Table 93: APR for Existing Generating Stations for FY 2024-25 as approved by the Commission
at Effective Capacity (Rs. Crore)

Particulars	NTPS	LTPS
Total Fixed Cost approved on installed capacity	79.02	124.24
Reduction in fixed cost due to Decommissioning	61.83	39.32
Total Fixed Cost approved at effective Capacity	17.19	84.92
Add: Capacity Building Charges	0.00	0.00
Add: AERC Filing Fees	0.10	0.10
Add: Special R&M	0.00	26.00
Add: Income Tax	0.00	0.00
Less: Non-Tariff Income	1.25	14.61
Total Fixed Cost approved for effective capacity	16.05	96.41
Add: Fuel Cost	67.60	310.40
Net ARR approved for effective capacity	83.64	406.81

#### 5.20 Revenue from Sale of Power

5.20.1 APGCL has estimated total Revenue from Sale of Power in the APR of FY 2024-25 as Rs. 1273.86 Crore for NTPS, LTPS, KLHEP, LRPP and NRPP, respectively. The revenue projected by APGCL is based on the actual revenue earned during H1 of FY 2024-25 and revenue estimated in H2 of FY 2024-25.

#### Commission's Analysis

5.20.2 For the purpose of APR for FY 2024-25, the Commission has considered the revenue from the sale of power as submitted by APGCL. The Commission notes the discrepancy in the revenue recorded in the audited accounts for FY 2023-24, as discussed in the previous chapter. The Commission directs APGCL to submit the audited accounts reconciled with the approved tariff for FY 2024-25 at the time of Truing up of FY 2024-25.

#### 5.21 Revenue Gap/(Surplus) for FY 2024-25

5.21.1 APGCL has estimated Revenue Gap of Rs. 60.35 Crore for FY 2024-25. APGCL submitted that since the figures for FY 2024-25 are estimated and are subject to True-

up, it has not considered the Revenue Gap/(Surplus) for recovery during FY 2025-26, as the same shall be considered at the time of True-up of FY 2024-25.

#### **Commission's Analysis**

- 5.21.2 For computation of Revenue Gap/(Surplus), the Commission has considered the ARR at effective capacity for NTPS and LTPS as derived in the previous Section of this Chapter. For KLHEP, LRPP and NRPP entire fixed costs have been considered for computation of Revenue Gap/(Surplus).
- 5.21.3 Accordingly, the Commission has computed the Revenue Gap/(Surplus) for FY 2024-25 as shown in the following Table:

Particulars	APGCL's	Approved
	Submission	
ARR for NTPS	86.58	83.64
ARR for LTPS	419.33	406.81
ARR for KHEP	82.28	81.61
ARR for LRPP	371.86	363.13
ARR for NRPP	374.14	366.42
Combined ARR	1334.21	1301.62
Less: Revenue Billed	1273.86	1273.86
Revenue Gap/(surplus)	60.35	27.77

Table 94: Revenue Gap/(Surplus) for FY 2024-25 approved by Commission

5.21.4 The APR reveals a Revenue Gap of Rs. 27.77 Crore for FY 2024-25. It is only indicative in the absence of Audited Annual Accounts for FY 2024-25. Hence, this is not carried forward. It will be considered only after Truing up process for FY 2024-25, after the Audited Annual Accounts are made available.

### 6 CAPITAL INVESTMENT PLAN FOR THE MYT CONTROL PERIOD FROM FY 2025-26 to FY 2029-30

#### 6.1 Upcoming Projects

- 6.1.1 APGCL has submitted with the objective of increasing its generation capacity, APGCL is planning to construct a few power projects, out of which two are ongoing projects, and others are new projects and projects in pipeline.
- 6.1.2 The major aim of the investment planned by APGCL during the Control Period FY 2025-26 to FY 2029-30 is to prolong the life of its existing stations and expand its generation capacity by installing new units.

SI. NO.	Project Name	Capacity (MW)	Energy Source	Expected Commissioning
Ongoing				
1	Lower Kopili Hydro Electric Project (LKHEP)	120	Hydro	110 MW (Main PH): Jan'26 10 MW (Aux PH): Jun'26
2	Karbi Langpi Middle-II (KLM-II)	24	Small Hydro	Oct'27
New Proj	ects	I	•	
3	Karbi Langpi Middle-I (KLM-I)	22.5	Small Hydro	Apr'28
Projects	n Pipeline	1		
	rage Projects (PSP)- APGCL has short listed a by EAP (JICA). Proposal sent to GoA. Response		. DPR for t	he same is planned to be
New Sola	r Projects			
Initiation f	or development of new Solar Projects has been	undertaken h		Oll Green Power Limited a

#### Table 95: Upcoming Projects details submitted by APGCL

Initiation for development of new Solar Projects has been undertaken by APGCL-OIL Green Power Limited, a newly formed JV between APGCL and OIL.

## 6.1.3 APGCL submitted that, it will submit separate Provisional & Final Petitions for the upcoming projects from the above table to be commissioned within the FY 2025-26 to 2029-30 as and when applicable as per relevant Regulations.

6.1.4 Capital Investment Plan for Existing Projects are briefed in the table below:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
Station	Projected	Projected	Projected	Projected	Projected
NTPS	-	-	-	-	-
LTPS	17.90	26.05	91.24	2.93	6.95
KLHEP	20.14	59.07	34.99	16.66	1.88
LRPP	1.15	24.94	19.91	0.13	0.13
NRPP	23.75	14.53	12.32	0.65	0.13
Total	62.95	124.59	158.45	20.36	9.08

Table 96: Capital Investment Plan for Existing Projects as submitted by APGCL (Rs. Crore)from FY 2025-26 to FY 2029-30

6.1.5 The Funding Pattern of the existing projects for the Control Period from FY 2024-25 to FY 2029-30 is given in the Table below:

Existing	FY2025-26		FY2026-27		FY2027-28		FY2028-29			FY2029-30					
Projects	Loan	Equity	Grant	Loan	Equity	Grant	Loan	Equity	Grant	Loan	Equity	Grant	Loan	Equity	Grant
NTPS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LTPS	0.00	17.90	0.00	0.00	26.05	0.00	0.00	91.24	0.00	0.00	2.93	0.00	0.00	6.95	0.00
KLHEP	0.00	20.14	0.00	0.00	59.07	0.00	0.00	34.99	0.00	0.00	16.66	0.00	0.00	1.88	0.00
LRPP	0.00	1.15	0.00	0.00	24.94	0.00	0.00	19.91	0.00	0.00	0.13	0.00	0.00	0.13	0.00
NRPP	0.00	23.75	0.00	0.00	14.54	0.00	0.00	12.32	0.00	0.00	0.65	0.00	0.00	0.13	0.00
Total	0.00	62.95	0.00	0.00	124.59	0.00	0.00	158.45	0.00	0.00	20.36	0.00	0.00	9.08	0.00

Table 97: Funding Pattern for CIP for FY 2025-26 to FY 2029-30 (Rs. Crore)

#### **Commission's Analysis**

6.1.6 Commission has dealt with the proposed capital expenditure plan in the existing for each generating plant in the subsequent section. Accordingly, the funding pattern is also approved for the control period. For all future Generation Projects, APGCL is required to approach the Commission at the appropriate time, for obtaining approval for the Capital Cost and Tariff, in accordance with the applicable MYT Regulations, for sale of power within the State.

#### 6.2 Capital Investment Plan for Lakwa Thermal Power Station

6.2.1 The Capital Investment Plan for LTPS is claimed by the APGCL as below -

SL			Estimate	ed Cost Rs	. in Lakh	
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30
Α	Electromechanical					
1	2 MW Solar PV Plant at Lakwa Thermal Power Station to reduce auxiliary consumption at LTPS	970.00				
2	Control Room integration of Phase-II Powerhouse and Waste Heat Recovery Project, LTPS		800.00			
3	Revamping and Upgradation of the existing Fire Fighting system of LTPS		115.00			
4	Revamping of the cooling system of gas compressors by replacement of the existing coolers with new Air Cooled Heat Exchangers for GC #6 and # 8.		196.00			
5	Enhancement of system reliability, safety and operational flexibility through replacement of 11 sets of old existing 132KV isolators of Phase-II power house switchyard.		90.00			
6	Improvement of system reliability and flexibility through upgradation of Desang Intake Pump MCC Panel and UPS & Stabilizer Panel for WHRP.		91.00			
7	Procurement of Capital spares for Gas Compressors # 6,7,8 & 9		200.00			300.00
8	Procurement of field instrument for Gas Compressor Units # 6 ,7,8 & 9 and aux motors of GC # 9 of LTPS.		150.00		90.00	
9	Procurement of LP & HP cylinder for 4RDS2 Gas Compressor		160.00			
10	Improvement of system reliability and safety through replacement of old DCDB Panels for GT unit #5, #6 and #7.		120.00			
11	Conversion of LTPS Colony existing OH 11kV network to 11kV Underground cable network of distance in various phases at, Lakwa Thermal Power Station, Maibella		133.50	65.17	70.00	94.75

#### Table 98: Capital Investment plan for LTPS submitted by APGCL

SL	Description of Works		Estimate	d Cost Rs	. in Lakh	
NO	Description of works	2025-26	2026-27	2027-28	2028-29	2029-30
	(LTPS), Suffry-785689, Dist. Sivasagar, Assam"					
12	Efficiency improvement through energy saving by procurement, installtion and commissioning of Stepless Capacity Control system in the Gas Compressors of Ph-II powerhouse of LTPS.			499.00		
13	Up-gradation of Generator Control & Protection Panels of GT Unit # 5 of 3 X 20MW, Ph-II powerhouse (1 unit in first phase) for improvement of system reliability and safety.			150.00		
14	Upgradation of the existing old 220V DC relay-based control system to new PLC-based control system (with HMI) of 24V DC configuration for all the three Dresser-Rand make gas compressors of LTPS for enhancing operational flexibility and reliability.			278.00		
15	Procurement of spares for Gas Compressors # 6,7&8			150.00		
16	Procurement of new starting Diesel engine of Gas Turbine unit of Ph-II powerhouse.			82.00		
17	Installation of four (4) nos. of High Mast Tower Systems within LTPS premises for enhanced security and illumination.			64.00		
18	Supply, Fabrication, Erection, Testing and Commissioning of 2 nos 12" gas Pipe Line along with Valves, Flanges and all accessories including laying of 10 KM Pipe Line from Lakwa Terminal to LTPS.			7800.00		
19	Improvement of efficiency through reduction in auxiliary power consumption by replacement of various old auxiliary motors by energy efficient motors for Ph-II powerhouse				25.00	25.00
20	Procurement of field instruments for Gas Turbine Unit#7 of LTPS.				70.00	

SL			Estimate	ed Cost Rs	. in Lakh	
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30
21	Procurement of field instruments for Gas Turbine Unit#5 of LTPS.					70.00
22	Procurement of LP cylinder for 4 RDS2 Gas Compressor					150.00
23	Procurement of establishment items	12.50	12.50	12.50	12.50	12.50
	Electromechanical Subtotal	982.50	2068.00	9100.67	267.50	652.25
В	Civil					
24	Construction of Two storied school building for upgradation of classes upto 12th standard at LTPS, APGCL	807.63				
25	Renovation of Playground of Lakwa Thermal Power Station, Maibella.		537.00			
26	Laying of new water pipeline with pipe support and construction of pump house for water supply to upper colony area at LTPS, Maibella.			22.90		
27	Construction of car parking at Multi Storied Building.				25.30	
28	Construction of footpath around boundary wall of industrial area inside LTPS, Maibella					43.00
	Civil Subtotal	807.63	537.00	22.90	25.30	43.00
	Total	1790.13	2605.00	9123.57	292.80	695.25

#### Commission Analysis:

- 6.2.2 Commission notes that, these CAPEX schemes have been claimed in order to improvement in the system, enhancement in reliability, safety and operation feasibility and to ensure maximum reliability and availability of the existing old units of LTPS to maximize generation.
- 6.2.3 The Commission sought detailed justification and purpose of the proposed investment along with the cost benefit analysis, DPR and approval of the cost of each investment from the authority.
- 6.2.4 In response to that, APGCL has submitted that, CAPEX plan has been claimed to maintain reliability and availability of the plant.
- 6.2.5 The Commission analysed the information submitted by APGCL in its replies for the

individual schemes in detail and has accordingly approved Renovation & Modernisation Schemes. The Commission has not allowed some of the proposed Renovation & Modernisation works for LTPS, which are not necessary at this stage for these old Units, which have outlived their useful life, like upgradation of Chemical Laboratory building. The Commission has also disallowed some Renovation & Modernisation expenditure where APGCL has not submitted any justification and where documentary evidence from OEM regarding non-availability of spare parts is not submitted. Commission has disallowed expense for installation of 2 MW Solar PV Plant..

6.2.6 The Commission has only allowed minimum Renovation & Modernisation expenses, which are necessary for efficient operation of the LTPS. The Commission has approved Renovation & Modernisation expenses for LTPS Rs. 5.90 Cr. for FY 2026-27 and Rs. 1.69 Cr. for FY 2027-28 respectively, as detailed in Annexure 3B.

#### 6.3 Capital Investment Plan for Karbi Langpi Hydro Electric Project

		Estimated Cost Rs. in Lakh						
S. No.	Description of Works	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30		
А	Electromechanical							
1	Replacement of existing FCB Panel of Unit#2	98.53						
2	Supply, installation and commissioning of OPU oil pump along with unloader valves and other associated necessary equipments of OPU system for Unit:1 at 2*50 MW KLHEP	200						
3	Procurement of 15 ton crane for 2X50 MW KLHEP	118						
4	Supply,installation and commissioning of new SF6 breakers for SRT	26						

#### Table 99: Capital Investment plan for KLHEP submitted by APGCL

5	Supply,installation and commissioning of new CTs for Station Reserve Transformer(SRT) KLHEP	23				
6	Procurement of Testing Equipments for T&C APGCL	250				
7	Remote Monitoring System for LTPS, LRPP, KLHEP and NRPP		1200	1200		
8	Installation of High Mast Towers at Valve House		16			
9	Installation of High Mast Towers at Dam Site(2 nos)		32			
10	Installation of High Mast Towers at KLHEP colony(4nos)		64			
11	Supply installation and commissioning of 4 nos. Of , 220/11 KV, 21 MVA, 1 Phase Generator Transformer for KLHEP		2100			
12	Supply, Installation and Commissioning of 30W Solar Street light at KLHEP Colony and Damsite( 90 nos)		29			
13	Supply ,installation and commissioning of 1 MW Solar Plant at KLHEP Colony.		500			
14	Upgradation of existing overhead conductor & poles with new 11KV overhead Bare conductor & steel poles from 33/11KV Suparec Sub- station to Hatidubi Dam		700			
15	Upgradation of Digital Governing System, Control System (SCADA), Excitation System and Micro- Processor Based Protection System for two units of Karbi Langpi Hydro Electric Project, Assam.			1300	1300	

16	Supply ,installation and commissioning of new Current Transformers used for Generator protection measuring at 2*50 MW KLHEP (14 nos)			110		
17	Mandatory Spares required for Generation of the KLHEP units.			300		
18	Supply, installation and commissioning of OPU oil pump along with unloader valves and other associated necessary equipments of OPU system for Unit:2 at 2*50 MW KLHEP				200	
19	Procurement of Forklift					20
20	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5
	Electromechanical Subtotal	728.03	4653.5	2922.5	1512.5	32.5
В	Civil					
21	Renovation works at Hatidubi Dam, KLHEP	141.22				
22	River protection works & Landslide protection works to be carried out at downstreem of Karbi Langpi Hydro Electric Project(2X50) Dam for the damaged caused by Cyclone Remal in KLHEP	758				
23	Preventive measures for slope protection at left bank above the dam deck of Hatidubi Dam, Karbi Langpi Hydro Electric Project	133.33	133.33			
24	Installation of Early Warning System at upstream of Hatidubi dam of KLHEP.	100				
25	Construction of pre-cast boundary wall of length 4781.00 m for KLHEP colony.	139.13	139.13	139.13	139.13	139.13

	Total	2014.3	5907.2	3498.9	1665.8	188.11
	Civil Subtotal	1286.3	1253.7	576.39	153.29	155.61
32	Construction of indoor badminton court at Lengery colony, KLHEP					16.48
31	Construction of lawn tennis court at KLHEP, Lengery.				14.16	
30	Construction and improvement of colony road (total length = 2.587 Km) at KLHEP			35.87		
29	Construction of Type II (G+2) Officers quarter at KLHEP colony, Lengery, West Karbi Anglong			401.39		
28	Ultrasonic test of wels of Radial Gates, Intake gate, Gantry Crane along with strengthening of weld at Hatidubi Dam, KLHEP		35.77			
27	Construction of Road from KLHEP Office, Lengery gate to KLHEP, Powerhouse, at KLHEP, West Karbi Anglong, Assam for improvement of power availability in 100 MW KLHEP		945.45			
26	Improvement of Road near Quarry no.1to Dam deck by providing granular sub-base on left bank upstream side of Hatidubi Dam at KLHEP from Ch: 3106.00 m to Ch: 4201.00 m	14.62				

#### Commission's Analysis

6.3.1 APGCL has claimed capital expenditure for KLHEP for the control period for supply and installation of maintenance and testing equipment, remote monitoring system, procurement of crane, procurement of SRT Transformer, Generator Transformer, Installation of Mast Towers, Installation of solar streetlight, Commissioning of solar plant at colony and upgradation of overhead conductor, upgradation of SCADA system. 6.3.2 The Commission analysed the individual schemes in detail and sought justification and additional details from APGCL on proposed expenses. The Commission also analysed the information submitted by APGCL in its replies for the individual schemes in detail and has accordingly approved Capital expenditure expenses for the control period. The Commission has approved Rs. 11.55 Cr. for FY 2025-26, Rs. 2.29 Cr. for FY 2026-27, Rs. 5.11 Cr. for FY 2027-28, Rs. 2.00 Cr. for FY 2028-29 as capital expenditure for KLHEP, as detailed in **Annexure 3B**.

#### 6.4 Capital Investment Plan for Lakwa Replacement Power Project

			Estimate	ed Cost Rs	in Lakh	
SL NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30
Α	Electromechanical					
1	Indigenization of Starting & Instrument Air Compressor	102.6				
2	Remote Monitoring System for LTPS, LRPP, KLHEP and NRPP		1200	1200		
3	Proposal for upgrade of Electrical and Automation System consisting HMI system upgradation with sWOIS system at LRPP.		1281			
4	Modification of connection between exhaust system and turbocharger			778		
5	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5
	Electromechanical Subtotal	115.1	2493.5	1990.5	12.5	12.5
	Total	115.1	2493.5	1990.5	12.5	12.5

#### Table 100: Capital Investment plan for LRPP submitted by APGCL

#### **Commission's Analysis**

- 6.4.1 Commission notes that, APGCL has proposed capital expenditure for procurement of spare parts, implementation of a centralised monitoring system and upgradation of electrical and automation system.
- 6.4.2 The Commission analysed the individual schemes in detail and sought justification and additional details from APGCL on proposed expenses.

- 6.4.3 Commission has observed that, APGCL has claimed Rs. 1.02 Cr. for Indigenization of Starting & Instrument Air Compressor. Commission understands that, APGCL has already incurred cost on installation of imported air compressor and has already incurred more than 1 Cr. in procurement of spare part of the air compressor. Now how it is justified to again make expenditure on new air compressor. APGCL should have done proper due diligence before procuring the imported air conditioner. Commission understands there is lag in effort from the petitioner side. Also, OEM approval shows total price of Rs. 5,405,000 only. Hence, considering the importance of procurement of IAC spares, Commission allows, Rs. 0.54 Cr. for indigenization of Starting & instrument Air Compressor.
- 6.4.4 After detailed assessment of the expenses as proposed by the petitioner, the Commission approves Rs. 0.54 Cr. for FY 2025-26, Rs. 12.81 Cr. for FY 2026-27, Rs. 7.78 Cr. for FY 2027-28 for the control period for LRPP. The details are attached in the Annexure 3B.

#### 6.5 Capital Investment Plan for Namrup Replacement Power Project

			Estimat	ed Cost R	s. in Lakh	
SL NO	Description of Works	2025- 26	2026- 27	2027- 28	2028-29	2029-30
Α	Electromechanical					
1	Replacement of 350Ah, 125V Battery Bank of main plant NRPP APGCL Dibrugarh Assam	27.5				
2	Upgradation of Switchyard Automation System (SAS) of 220 KV Switchyard , NRPP APGCL Dibrugarh Assam	60				
3	Installation and commissioning of Rod Drop and Vibration sensors at Gas Booster Compressor of NRPP	62.95				
4	Modification of Cooling Tower Fans of NRPP as the supplier of existing CT-Fans is no longer exist.	37.48				
5	Upgradation of the existing Gas Turbine Control System from Mark VI to Mark Vie at NRPP	1924.5				

#### Table 101: Capital Investment plan for NRPP submitted by APGCL

	Total	2375.4	1453.5	1232.3	64.82	12.5
	Civil Subtotal	250.5	163.38	19.82	52.32	0
16	Construction of boundary wall at South side of Colony				52.32	
15	Construction of new ICBP road connection exit gate of VVIP Guest House to main road (Bhogdoi path)			19.82		
14	Development of Children park cum walking zone at NRPP		163.38			
13	Development, installation and commissioning of 2 nos. of deep tube well including storage tank and filtration unit	64				
12	River Bank protection work at the side of artificial Pond and Booster Pump House Dillighat Intake, NRPP, Namrup	44.53				
11	Construction of Smart Boundary Wall at Namrup	141.97				
В	Civil					
	Electromechanical Subtotal	2124.9	1290.1	1212.5	12.5	12.5
10	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5
9	Upgradation of 01 no. of Large Video Screen (LVS) at NRPP Central Control Room from Lamp Based to Laser Based System		11.38			
8	Procurement of CEP Cartridge Assembly- WKT 150/5 at NRPP.		45			
7	Upgradation 6.6kV Bus Transfer System (BTS) of NRPP		21.24			
6	Remote Monitoring System for LTPS, LRPP, KLHEP and NRPP		1200	1200		

#### Commission's Analysis

6.5.1 Commission noted that, APGCL has proposed capital expenditure for NRPP for the control period for replacement of equipment and upgradation of the existing system and civil work as well.

- 6.5.2 The Commission analysed the individual schemes in detail and sought justification and additional details from APGCL on proposed expenses. After detailed scrutiny and prudency check, Commission has allowed and disallowed some expenses considering the availability of the sought documents from the petitioner and nature of importance of the proposed expenses.
- 6.5.3 The Commission has approved Rs. 3.11 Cr. in FY 2025-26, Rs. 0.21 Cr. in FY 2026-27 and Rs. 0.52 Cr. in FY 2028-29 for NRPP for the control period. The details are attached in the Annexure 3B.

#### 6.6 Summary of Capital Investment Plan

6.6.1 Based on the scheme-wise analysis of Capital Investment proposed by APGCL for existing stations for the Control Period, the summary of Station-wise Capital Investment approved by the Commission for the Control Period is given in the Table below:

Station	FY 2025-26		FY 20	026-27 FY 2027-28		FY 2027-28 FY 2028-29 FY 2029-30		FY 2028-29		29-30
	Proposed	Approved	Proposed	Approved	Proposed	Approved	Proposed	Approved	Proposed	Approved
NTPS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LTPS	17.90	0.00	26.05	5.90	91.24	1.69	2.93	0.00	6.95	0.00
KLHEP	20.14	11.55	59.07	2.29	34.99	5.11	16.66	2.00	1.88	0.00
LRPP	1.15	0.54	24.94	12.81	19.91	7.78	0.13	0.00	0.13	0.00
NRPP	23.75	3.11	14.53	0.21	12.32	0.00	0.65	0.52	0.13	0.00
Total	62.94	15.2	124.59	21.21	158.46	14.58	20.37	2.52	9.09	0.00

Table 102: Capitalisation approved by the Commission for Control Period (Rs. Crore)

6.6.2 It is to be noted that the Commission has approved the Renovation & Modernisation expenses for individual schemes for LTPS, KLHEP, LRPP and NRPP during the Control Period. Therefore, at the time of true up of respective years, APGCL should submit the actual R&M expenses incurred for such individual schemes approved by the Commission for existing stations.

# 7 ARR for MYT Control Period from FY 2025-26 to FY 2029-30

#### 7.1 Introduction

- 7.1.1 This Chapter deals with the determination of ARR for existing Stations of APGCL for the MYT Control Period from FY 2025-26 to FY 2029-30 in accordance with the provisions of MYT Regulations, 2024 based on analysis of submissions made by APGCL.
- 7.1.2 APGCL has a Petition for approval of ARR for the Control Period for existing stations, i.e., NTPS, LTPS, KLHEP LRPP and NRPP. The Commission has determined the Station-wise ARR for NTPS, LTPS, KLHEP, LRPP and NRPP for the Control Period in line with MYT Regulations, 2024 as discussed in subsequent sections of this Chapter.

#### 7.2 Year-Wise Capacity for the Control Period

7.2.1 APGCL submits the following Installed and Effective Capacity from FY 2025-26 to FY 2029-30 -

## Table 127: Installed & Effective Capacity of APGCL from FY 2025-26 to FY 2029-30

Installed Capacity (MW)	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	26.00	26.00	26.00	26.00	26.00
LTPS	97.20	97.20	97.20	97.20	97.20
KLHEP	100.00	100.00	100.00	100.00	100.00
LRPP	69.76	69.76	69.76	69.76	69.76
NRPP	98.40	98.40	98.40	98.40	98.40

#### Commission's Analysis

7.2.2 Commission has considered the installed capacity of NTPS, LTPS, LRPP and NRPP as submitted by the petitioner. Accordingly gross generation has been computed based on installed capacity of generating stations.

#### 7.3 Plant Availability Factor (PAF) (%)

7.3.1 APGCL claimed that, as per Regulation 48.1 of the MYT Regulations 2024, the Normative Plant Availability factor for recovery of full fixed charges is- 50% for NTPS & LTPS and 85% for LRPP & NRPP. For KLHEP, as per Regulation 50.1 of the MYT Regulations 2024, the Normative Plant Availability factor for recovery of full fixed charges is 85%. The normative and projected numbers are shown in the table below.

Availability (%)	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	50.00%	50.00%	50.00%	50.00%	50.00%
LTPS	50.00%	50.00%	50.00%	50.00%	50.00%
KLHEP	85.00%	85.00%	85.00%	85.00%	85.00%
LRPP	85.00%	85.00%	85.00%	85.00%	85.00%
NRPP	85.00%	85.00%	85.00%	85.00%	85.00%

Table 103: Plant Availability Factor for Control Period as submitted by APGCL

#### Commission's Analysis

- 7.3.2 Regulation 48.1 of the MYT Regulations 2024, the Normative Plant Availability factor for recovery of full fixed charges is- 50% for NTPS & LTPS and 85% for LRPP & NRPP. As per Regulation 50.1 of the MYT Regulations 2024, the Normative Plant Availability factor for KLHEP, recovery of full fixed charges is 85%. Commission has noted that, APGCL has projected the normative plant availability factor in accordance with the MYT Regulation 2024.
- 7.3.3 In accordance with the MYT Regulations, 2024, APGCL shall be eligible to recover full fixed charges if actual availability is higher or equal to the NAPAF specified in MYT Regulations, 2024.

#### 7.4 Plant Load Factor (%)

7.4.1 APGCL submitted that, as per Regulation 48.2 of the MYT Regulations 2024, the Normative Plant Load Factor to claim incentive is- 50% for NTPS, 66% for LTPS, 90% for LRPP and 85% for NRPP. For KLHEP, as per Regulation 50.1 of the MYT Regulations 2024, the Normative Plant Load Factor is 44.5%. The normative and projected numbers are shown in the table below -

Plant Load Factor	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	50.00%	50.00%	50.00%	50.00%	50.00%
LTPS	66.00%	66.00%	66.00%	66.00%	66.00%
KLHEP	44.50%	44.50%	44.50%	44.50%	44.50%
LRPP	90.00%	90.00%	90.00%	90.00%	90.00%
NRPP	90.00%	90.00%	90.00%	90.00%	90.00%

Table 104: Projected PLF from FY 2025-26 to FY 2029-30

#### Commission's Analysis

- 7.4.2 As per, Regulation 48.2 of the MYT Regulations 2024, the Normative Plant Load Factor to claim incentive is 50% for NTPS, 66% for LTPS, 90% for LRPP and 85% for NRPP. For KLHEP, as per Regulation 50.1 of the MYT Regulations 2024, the Normative Plant Load Factor is 44.5%.
- 7.4.3 Hence, the Commission approves PLF for Incentive for NTPS, LTPS, LRPP and KLHEP, as specified in MYT Regulations, 2024.

#### 7.5 Auxiliary Consumption

7.5.1 APGCL submitted that, as per Regulation 48.3 of the MYT Regulations 2024, the Normative Auxiliary Consumption is- 4.5% for NTPS, 5.5% for LTPS, 3.5% for LRPP and 5% for NRPP. As per Regulation 50.1 of the MYT Regulations 2024, the Normative Auxiliary Consumption for KLHEP is 1%. The normative and projected numbers are shown in the table below.

Auxiliary Consumption	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	4.50%	4.50%	4.50%	4.50%	4.50%
LTPS	5.50%	5.50%	5.50%	5.50%	5.50%
KLHEP	1.00%	1.00%	1.00%	1.00%	1.00%
LRPP	3.50%	3.50%	3.50%	3.50%	3.50%
NRPP	5.0%	5.0%	5.0%	5.0%	5.0%

Table 105: Projected Auxiliary Consumption from FY 2025-26 to FY 2029-30

#### Commission's Analysis

7.5.2 As per Regulation 48.3 of the MYT Regulations 2024, the Normative Auxiliary Consumption is- 4.5% for NTPS, 5.5% for LTPS, 3.5% for LRPP and 5% for NRPP. As per Regulation 50.1 of the MYT Regulations 2024, the Normative Auxiliary Consumption for KLHEP is 1%.

7.5.3 Commission notes that, petitioner has claimed auxiliary consumption as per the MYT Regulation 2024. Hence, the Commission approves the Auxiliary Consumption for the Control Period as specified in the MYT Regulations, 2024as shown in the following Table:

Auxiliary Consumption	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	4.50%	4.50%	4.50%	4.50%	4.50%
LTPS	5.50%	5.50%	5.50%	5.50%	5.50%
KLHEP	1.00%	1.00%	1.00%	1.00%	1.00%
LRPP	3.50%	3.50%	3.50%	3.50%	3.50%
NRPP	5.0%	5.0%	5.0%	5.0%	5.0%

Table 106: Auxiliary Consumption for Control Period as approved by the Commission

#### 7.6 Gross Generation and Net Generation

7.6.1 APGCL submitted the Gross Generation and Net Generation for existing Stations for the Control Period as shown in the following Table:

## Table 107: Gross Generation and Net Generation for Control Period as submitted by APGCL (MU)

Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	Gross Generation	113.88	113.88	113.88	113.88	113.88
NIFS	Net Generation	108.76	108.76	108.76	108.76	108.76
LTPS	Gross Generation	425.74	425.74	425.74	425.74	425.74
	Net Generation	402.32	402.32	402.32	402.32	402.32
KLHEP	Gross Generation	390.00	390.00	390.00	390.00	390.00
	Net Generation	386.10	386.10	386.10	386.10	386.10
LRPP	Gross Generation	519.40	519.40	519.40	519.40	519.40
	Net Generation	501.22	501.22	501.22	501.22	501.22
NRPP	Gross Generation	732.69	732.69	732.69	732.69	732.69
INKFF	Net Generation	696.05	696.05	696.05	696.05	696.05

#### Commission's Analysis

7.6.2 Commission has computed Gross generation for control period based on approved Installed Capacity for the control period and Normative Plant Availability Factor of NTPS, LTPS, LRPP and NRPP as per MYT regulation 2024.

- 7.6.3 Commission has computed Gross generation for KLHEP for the control period based on approved Installed Capacity and Normative Plant Load Factor as per MYT regulation 2024.
- 7.6.4 The Net Generation has been computed considering the normative auxiliary consumption as per the MYT regulation 2024. The station wise approved Gross Generation and Net generation has been shown in table below -

Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
	Gross Generation	113.88	113.88	114.19	113.88	113.88
NTPS	Net Generation	108.76	108.76	109.05	108.76	108.76
LTPS	Gross Generation	425.74	425.74	426.90	425.74	425.74
	Net Generation	402.32	402.32	403.42	402.32	402.32
KLHEP	Gross Generation	389.82	389.82	390.89	389.82	389.82
	Net Generation	385.92	385.92	386.98	385.92	385.92
LRPP	Gross Generation	519.40	519.40	520.82	519.40	519.40
	Net Generation	501.22	501.22	502.59	501.22	501.22
NRPP	Gross Generation	732.69	732.69	734.69	732.69	732.69
	Net Generation	696.05	696.05	697.96	696.05	696.05

## Table 108: Gross Generation and Net Generation for the Control Period as approved by Commission (MU)

#### 7.7 Gross Station Heat Rate

7.7.1 APGCL, in its Petition, has submitted GSHR for existing Stations for the Control Period as shown in the following Table:

Table 109: Gross Station Heat	Rate for the Control Period as	s submitted by APGCL (kcal/kWh)
		· · · · · · · · · · · · · · · · · · ·

Gross Station Heat	2025-26	2026-27	2027-28	2028-29	2029-30
Rate on GCV (kcal/ kWh)	Projected	Projected	Projected	Projected	Projected
NTPS	3,900	3,900	3,900	3,900	3,900
LTPS	2,800	3,200	3,200	3,200	3,200
LRPP	2150	2150	2150	2150	2150
NRPP	1951	1951	1951	1951	1951

#### Commission's Analysis

- 7.7.2 As per Regulation 48.4 of MYT Regulation 2024, the Gross Station Heat Rate for NTPS is 3900 kcal/kWh, for LTPS is 3200 kcal/kWh, for LRPP is 2150 kcal/kWh and for NRPP is 1951 kcal/kWh in Combined cycle mode.
- 7.7.3 APGCL in its reply to additional data gap has submitted that, it has considered only combined cycle mode of operation for its thermal generating stations for the MYT control period.
- 7.7.4 Further, APGCL in its reply to query of Assam Branch Indian Tea Association (ABITA) on high fuel cost, has said that, "it has claimed fuel cost as per Regulations, GOI notified natural gas price for nominated & nonnominated fields and APGCL's Gas Supply Agreements with its suppliers only. Further, to give relief to the consumers from high fuel cost on account of exorbitant rise in gas price, APGCL has submitted fuel cost considering average SHR of 2800 kcal/kWh of LTPS for FY 2025-26 as a onetime measure instead of the normative value, thereby forgoing the incentive for the station on account of its efficient operation."
- 7.7.5 Commission has considered the claim of the petitioner and reply submitted by the petitioner to the stakeholder. Commission has also observed that, APGCL has claimed Gross Station Heat Rate in accordance with the MYT Regulation 2024.
- 7.7.6 Hence, Commission hereby approved the gross station heat rate for NTPS, LRPP and NRPP as per Regulation 48.4 of MYT Regulation 2024 for the control period and SHR of 2800 kcal/kWh of LTPS for FY 2025-26 and 3200 kcal/kWh of LTPS from FY 2026-27 to FY 2029-30 as shown in the table below -

Table 110: Gross Station Heat Rate for the Control Period as approved by the Commission
(kcal/kWh)

Gross Station Heat Rate on GCV (kcal/ kWh)	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	3,900	3,900	3,900	3,900	3,900
LTPS	2800	3,200	3,200	3,200	3,200
LRPP	2150	2150	2150	2150	2150
NRPP	1951	1951	1951	1951	1951

# 7.8 Fuel Cost

7.8.1 APGCL submitted that the table below shows the revised projected fuel cost for FY 2025-26 to FY 2029-30.

Statio			2025-26	2026-27	2027-28	2028-29	2029-30
n	Particulars	Unit	Projecte d	Projecte d	Projecte d	Projecte d	Projecte d
NTPS	GCV of gas	kcal/SCM	9,213	9,213	9,213	9,213	9,213
	Price of Gas	Rs./1000 SCM	14,473	14,999	15,525	16,009	16,009
LTPS	GCV of gas	kcal/SCM	9,364	9,364	9,364	9,364	9,364
	Price of Gas	Rs./1000 SCM	21,960	22,764	23,568	24,308	24,308
LRPP	GCV of gas	kcal/SCM	9,208	9,208	9,208	9,208	9,208
	Price of Gas	Rs./1000 SCM	23,945	24,822	25,699	26,506	26,506
NRPP	GCV of gas	kcal/SCM	9,213	9,213	9,213	9,213	9,213
	Price of Gas	Rs./1000 SCM	14,473	14,999	15,525	16,009	16,009

Table 111: Landed Price of Gas (Rs. /1000 SCM) and GCV as submitted by APGCL

7.8.2 The fuel cost projected by APGCL for the Control Period is shown in the following Table:

Table 112: Fuel Cost for	<b>Control Period as submitted I</b>	ov APGCL (Rs. Crore)

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	69.77	72.31	74.84	77.18	77.18
LTPS	279.55	331.19	342.89	353.65	353.65
LRPP	290.40	301.03	311.67	321.46	321.46
NRPP	224.55	232.72	240.88	248.40	248.40

## Commission's Analysis

7.8.3 Commission had sought details from the petitioner basis of station wise projected GCV and price of gas considered for each financial year of the control period. APGCL in its additional data gap submits that GCV of gas is calculated from average of GCV of gas from April 24 to Sep 24. APGCL also submitted that, Gas price is calculated as per notification from Ministry of Petroleum and Natural Gas dated 07 April 2023 considering 0.25 USD/MMBTU in escalation in ceiling price.

7.8.4 Therefore, the Commission has considered the submission provided by the petitioner and the approved GCV and Fuel price is mentioned in the table below -

Station	Particulars	Unit	2025-26	2026-27	2027-28	2028-29	2029-30
	GCV of gas	kcal/SCM	9,213	9,213	9,213	9,213	9,213
NTPS	Price of Gas	Rs./1000 SCM	14,473	14,999	15,525	16,009	16,009
	GCV of gas	kcal/SCM	9,364	9,364	9,364	9,364	9,364
LTPS	Price of Gas	Rs./1000 SCM	21,960	22,764	23,568	24,308	24,308
	GCV of gas	kcal/SCM	9,208	9,208	9,208	9,208	9,208
LRPP	Price of Gas	Rs./1000 SCM	23,945	24,822	25,699	26,506	26,506
	GCV of gas	kcal/SCM	9,213	9,213	9,213	9,213	9,213
NRPP	Price of Gas	Rs./1000 SCM	14,473	14,999	15,525	16,009	16,009

 Table 113: GCV and Landed Price of Gas for Control Period as approved by the

Commission

7.8.5 Accordingly, the Commission has approved the fuel cost for NTPS, LTPS and LRPP for the Control Period as shown in the Tables below:

SI. No.	Particulars	Derivation	Unit	2025-26	2026-27	2027-28	2028-29	2029-30
1	Gross Generation	А	MU	113.88	113.88	114.19	113.88	113.88
2	Heat Rate	В	kcal/kWh	3,900	3,900	3,900	3,900	3,900
3	GCV of gas	С	kcal/SCM	9,213	9,213	9,213	9,213	9,213
4	Overall Heat	D=AxB	G. cal.	444,132.00	444,132.00	445,348.80	444,132.00	444,132.00
5	Gas consumption	E=D/C	M. SCM	48.21	48.21	48.34	48.21	48.21
6	Price of Gas	F	Rs./1000 SCM	14,472.60	14,998.85	15,525.10	16,009.25	16,009.25
7	Total cost of Gas	G=ExF/100	Rs. Crore	69.77	72.31	75.05	77.18	77.18

Table 114: Fuel Cost for NTPS for Control Period as approved by the Commission (Rs. Crore)

Table 115: Fuel Cost for LTPS for Control Period as approved by the Commission (Rs. Crore)

SI. No.	Particulars	Derivation	Unit	2025-26	2026-27	2027-28	2028-29	2029-30
1	Gross Generation	А	MU	425.74	425.74	426.90	425.74	425.74
2	Heat Rate	В	kcal/kWh	2,800	3,200	3,200	3,200	3,200
3	GCV of gas	С	kcal/SCM	9,364	9,364	9,364	9,364	9,364
4	Overall Heat	D=AxB	G. cal.	1,192,060.80	1,362,355.20	1,366,087.68	1,362,355.20	1,362,355.20
5	Gas consumption	E=D/C	M. SCM	127.30	145.49	145.89	145.49	145.49
6	Price of Gas	F	Rs./1000 SCM	21,959.86	22,763.89	23,567.93	24,307.67	24,307.89
7	Total cost of Gas	G=ExF/100	Rs. Crore	279.55	331.19	343.83	353.65	353.65

SI. No.	Particulars	Derivation	Unit	2025-26	2026-27	2027-28	2028-29	2029-30
1	Gross Generation	А	MU	519.40	519.40	520.82	519.40	519.40
2	Heat Rate	В	kcal/kWh	2,150	2,150	2,150	2,150	2,150
3	GCV of gas	С	kcal/SCM	9,208	9,208	9,208	9,208	9,208
4	Overall Heat	D=AxB	G. cal.	1,116,700.82	1,116,700.82	1,119,760.27	1,116,700.82	1,116,700.82
5	Gas consumption	E=D/C	M. SCM	121.28	121.28	121.61	121.28	121.28
6	Price of Gas	F	Rs./1000 SCM	23,945.12	24,822.21	25,699.29	26,506.21	26,506.21
7	Total cost of Gas	G=ExF/100	Rs. Crore	290.39	301.03	312.52	321.45	321.45

Table 116: Fuel Cost for LRPP for Control Period as approved by the Commission (Rs. Crore)

Table 117: Fuel Cost for NRPP for Control Period as approved by the Commission (Rs. Crore)

SI. No.	Particulars	Derivation	Unit	2025-26	2026-27	2027-28	2028-29	2029-30
1	Gross Generation	А	MU	732.69	732.69	734.69	732.69	732.69
2	Heat Rate	В	kcal/kWh	1,951	1,951	1,951	1,951	1,951
3	GCV of gas	С	kcal/SCM	9,213	9,213	9,213	9,213	9,213
4	Overall Heat	D=AxB	G. cal.	1,429,471.17	1,429,471.17	1,433,387.53	1,429,471.17	1,429,471.17
5	Gas consumption	E=D/C	M. SCM	155.16	155.16	155.58	155.16	155.16
6	Price of Gas	F	Rs./1000 SCM	14,472.60	14,998.85	15,525.10	16,009.25	16,009.25
7	Total cost of Gas	G=ExF/100	Rs. Crore	224.55	232.72	241.54	248.40	248.40

## 7.9 O&M Expenses

- 7.9.1 APGCL submitted that the petitioner has considered the average of the actual O&M expenses for the last three years ending March'2024 (i.e. 2021-22, 2022-23 and 2023-24 at full capacity) based on the audited financial statements excluding special R&M, approved at the time of true up (2021-22 and 2022-23) and claimed in true up (2023-24). The average of such O&M expenses is considered as O&M expenses for March 31st, 2024, and is now escalated @ 6.09% in line with the last escalation factor approved by the Hon'ble Commission in Tariff Order June 2024 (for FY 2024-25). The Hon'ble AERC has given the details of escalation factor in Review Order dated 28th October 2024.
- 7.9.2 The O&M expenses projected by APGCL for FY 2025-26 to FY 2029-30 is shown in the table below:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	14.66	15.55	16.50	17.51	18.57
LTPS	50.54	53.62	56.88	60.35	64.02
KLHEP	41.96	44.51	47.22	50.10	53.15
LRPP	31.57	33.49	35.53	37.69	39.99
NRPP	44.94	47.68	50.58	53.66	56.93
Total	183.66	194.85	206.71	219.30	232.66

#### Table 118: O&M Expenses for Control Period as submitted by APGCL (Rs. Crore)

## Commission's Analysis

- 7.9.3 The Commission has computed the normative O&M Expenses for NTPS, LTPS, KLHEP, NRPP and LRPP for the Control Period in accordance with Regulation 51.1 of the MYT Regulations, 2024, in the following manner:
- 7.9.4 The average of actual O&M expenses including insurance for the 3 years (FY 2021-22, FY 2022-23, FY 2023-24) based on the audited accounts, excluding Special O&M expenses, has been derived as shown below:

Dertieulere	Actual O&M Expenses					
Particulars	FY 2021-22	3 Years Avg (FY 2023-24)				
NTPS	60.01	61.64	57.96	59.87		
LTPS	65.34	62.91	68.84	65.69		
KLHEP	32.74	32.86	35.09	33.56		
LRPP	25.70	28.42	30.02	28.05		
NRPP	30.20	41.35	48.23	39.93		
Total	213.99	227.18	240.14	227.10		

Table 119: Average actual O&M Expenses for FY 2021-22 to FY 2023-24 (Rs. Crore)

- 7.9.5 The average of such O&M expenses is considered as O&M expenses for FY 2023-24 and has been escalated based on the escalation factor as approved by the Commission in this order (i.e., 6.17% for FY 2024-25) to arrive at the O&M expenses for the base year of FY 2024-25.
- 7.9.6 The O&M expenses for each subsequent year has been determined by escalating the base expenses determined above for previous FY at escalation factor equal to average of last three years CPI and WPI inflation considered in the ratio of 60:40 (i.e., 6.17%) to compute the normative O&M expenses for each subsequent year of the Control Period as shown in the table below:

Particulars	Normative O&M Expenses								
	FY 2024- 25 (Base Year)	FY 2025- 26	FY 2026- 27	FY 2027- 28	FY 2028- 29	FY 2029- 30			
NTPS	63.56	67.48	71.64	76.06	80.75	85.73			
LTPS	69.74	74.05	78.61	83.46	88.61	94.07			
KLHEP	35.63	37.83	40.16	42.64	45.27	48.06			
LRPP	29.78	31.61	33.56	35.63	37.83	40.16			
NRPP	42.39	45.00	47.78	50.73	53.85	57.17			
Total	241.11	255.98	271.76	288.52	306.31	325.20			

Table 120: Normative O&M Expenses for FY 2025-26 to FY 2029-30 (Rs. Crore)

# 7.10 Capitalisation and its Funding

7.10.1 APGCL has proposed the CAPEX schemes for the control period from FY 2025-26 to FY 2029-30. APGCL has submitted that, the proposed capital expenditure has been necessitated to ensure maximum reliability and availability of the existing old units of LTPS, KLHEP, LRPP and NRPP to maximize generation. These schemes are aimed at reducing auxiliary power consumption and improving generation & availability of generating units, resulting in fuel cost reduction by sustaining an efficient and smooth operation of plants. The summary of Station-wise capitalisation proposed by APGCL for the Control Period is given in the Table below:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	-	-	-	-	-
LTPS	17.90	26.05	91.24	2.93	6.95
KLHEP	20.14	59.07	34.99	16.66	1.88
LRPP	1.15	24.94	19.91	0.13	0.13
NRPP	23.75	14.53	12.32	0.65	0.13
Total	62.95	124.59	158.45	20.36	9.08

Table 121: Capitalisation for Control Period as submitted by APGCL (Rs. Crore)

7.10.2 APGCL has proposed funding of above capitalisation entirely through equity for the Control Period.

## **Commission Analysis**

7.10.3 The scheme-wise analysis of Capital Investment proposed by APGCL for the Control Period and their approval have been discussed in detail in the previous Chapter. The summary of Station-wise capitalisation approved by the Commission for the Control Period is given in the Table below:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS		-	-	-	-
LTPS	-	5.90	1.69	-	-
KLHEP	11.55	2.29	5.11	2.00	-
LRPP	0.54	12.81	7.78	-	-
NRPP	3.11	0.21	-	0.52	-
Total	15.2	21.21	14.58	2.52	0.00

Table 122: Capitalisation approved by the Commission for Control Period (Rs. Crore)

7.10.4 As regards the funding of these works, the Commission has approved funding pattern in accordance with the Regulation 32.1 of MYT Regulation 2024. The said regulation is as :-

"

For a project declared under commercial operation on or after April 1<sup>st</sup>, 2025, if the equity actually deployed is more than 30% of the capital cost, equity in excess of 30% shall be treated as normative loan for the Generating Company, Transmission Licensee and Distribution Licensee.

Provided that where equity actually deployed is less than 30% of the capital cost of the capitalised asset, the actual equity deployed is less than 30% of the capital cost of the capitalised asset, the actual equity shall be considered for determination of tariff:

....."

7.10.5 The funding pattern approved by the Commission is mentioned in the table below -

 Table 123: Funding pattern of the capitalisation approved by the Commission for Control

 Period (Rs. Crore)

	Grant	0.00	0.00	0.00	0.00	0.00
NTPS	Equity	0.00	0.00	0.00	0.00	0.00
	Debt	0.00	0.00	0.00	0.00	0.00
	Grant	0.00	0.00	0.00	0.00	0.00
LTPS	Equity	0.00	1.77	0.51	0.00	0.00
	Debt	0.00	4.13	1.18	0.00	0.00

	Grant	0.00	0.00	0.00	0.00	0.00
KLHEP	Equity	0.00	3.46	0.69	1.53	0.60
	Debt	0.00	8.08	1.61	3.58	1.40
	Grant	0.00	0.00	0.00	0.00	0.00
LRPP	Equity	0.16	3.84	2.33	0.00	0.00
	Debt	0.38	8.97	5.45	0.00	0.00
	Grant	0.00	0.00	0.00	0.00	0.00
NRPP	Equity	0.93	0.06	0.00	0.16	0.00
	Debt	2.18	0.15	0.00	0.37	0.00

## 7.11 Depreciation

7.11.1 APGCL has submitted that, the Petitioner has computed the Depreciation considering the Capital Cost of the asset admitted by the Commission along with projected asset addition with 10% salvage value. The table below summarizes the Depreciation projected for FY 2025-30.

Table 124: Projected Depreciation of APGCL for FY 2025-26 to 2029-30

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	1.59	1.59	1.59	1.59	1.59
LTPS	16.62	17.31	19.15	20.62	20.77
KLHEP	24.35	26.15	28.30	29.47	29.90
LRPP	12.25	12.94	14.14	14.67	14.68
NRPP	43.23	44.34	45.12	45.50	45.52

#### **Commission's Analysis**

- 7.11.2 For computation of depreciation, the Commission has considered the Station-wise closing GFA for FY 2024-25 as approved in this Order, as the Opening GFA for FY 2025-26. The capitalisation approved for the respective years of the Control Period has been considered as asset addition during the year.
- 7.11.3 The Commission has considered the scheduled depreciation rates as specified in MYT Regulations, 2024. The depreciation has been limited to 90% of the asset value. The Commission has not considered depreciation on assets funded through grants in

accordance with Regulation 33 of MYT Regulations, 2024.

7.11.4 In view of the above, the Commission has approved depreciation for the period from FY 2025-26 to FY 2029-30 as per MYT Regulations, 2024, as given in the Table below:

Table 125: Depreciation for Control	Period as approved by the	Commission (Rs. Crore)
Table 125. Depreciation for Control	renou as approved by the	

Station	Particulars	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
	Depreciation	1.87	1.87	1.87	1.85	1.70
NTPS	Less: Depreciation on assets funded by Grants	0.15	0.15	0.15	0.15	0.14
	Net Depreciation	1.71	1.71	1.71	1.70	1.56
	Net Depreciation for Effective Capacity	0.37	0.37	0.37	0.37	0.34
	Depreciation	6.60	6.72	6.88	6.91	6.60
LTPS	Less: Depreciation on assets funded by Grants	0.88	0.88	0.90	0.90	0.86
	Net Depreciation	5.72	5.84	5.98	6.02	5.74
	Net Depreciation for Effective Capacity	3.91	3.99	4.09	4.11	3.92
	Depreciation	26.00	26.25	26.38	22.80	7.07
KLHEP	Less: Depreciation on assets funded by Grants	1.36	1.34	1.34	1.15	0.36
	Net Depreciation	24.64	24.91	25.05	21.66	6.72
	Depreciation	14.50	14.78	15.21	15.38	15.38
LRPP	Less: Depreciation on assets funded by Grants	9.57	9.51	9.45	9.42	9.42
	Net Depreciation	4.93	5.27	5.77	5.96	5.96
	Depreciation	34.51	34.58	34.58	34.59	34.60
NRPP	Less: Depreciation on assets funded by Grants	0.14	0.14	0.14	0.14	0.14
	Net Depreciation	34.38	34.44	34.44	34.45	34.46
	Total	71.38	72.17	72.95	69.79	54.44
	Total for Effective Capacity	68.23	68.98	69.72	66.55	51.4

7.11.5 The Station-wise computation of Depreciation is provided in **Annexure 2** to this Order.

# 7.12 Interest on loan capital

- 7.12.1 APGCL has projected the Interest on long term Loan on normative basis for FY 2025-30. The Petitioner has considered normative loan portfolio and the repayment shown is considered equal to the depreciation for FY 2025-30. The interest rate considered is at the same rate considered as the weighted average rate of interest for APR FY 2024-25.
- 7.12.2 The table below summarizes the interest on loan and finance charges considered for FY 2025-30.

Station	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
NTPS					
LTPS	-	0.05	2.34	3.65	1.92
KLHEP	6.47	6.72	7.29	6.21	3.88
LRPP	-	0.23	0.44	0.22	-
NRPP	36.38	33.33	29.78	25.68	21.13

#### Table 126: Interest on Loan Capital for Control Period as submitted by APGCL (Rs. Crore)

## Commission's Analysis

- 7.12.3 The closing net normative loan for FY 2024-25 as approved in this Order has been considered as opening net normative loan for FY 2025-26. The addition of loan has been considered equal to debt portion of capitalised works as approved in this Order. The loan repayment has been considered equivalent to Depreciation approved in this Order. As per MYT Regulations, 2024, the rate of interest shall be the weighted average rate of interest computed on the basis of the actual loan portfolio at the beginning of each year. The Commission has computed the weighted average interest rate of 10.05% for FY 2025-26, FY 2026-27, FY 2027-28, FY 2028-29 and FY 2029-30.
- 7.12.4 The Interest on loan capital approved by the Commission for the Control Period is shown in the following Table:

01-11-11	Deutleuleus	FY	FY	FY	FY	FY
Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
	Net Normative Opening	0.00	0.00	0.00	0.00	0.00
	Loan	0.00	0.00	0.00	0.00	0.00
	Addition of Normative	0.00	0.00	0.00	0.00	0.00
	Loan during the Year					
	Normative Repayment	0.00	0.00	0.00	0.00	0.00
NTPS	during the year					
	Net Normative Closing	0.00	0.00	0.00	0.00	0.00
	Loan					
	Interest Rate (%)	10.05%	10.05%	10.05%	10.05%	10.05%
	Interest on Loan	0.00	0.00	0.00	0.00	0.00
	capital					
_	Net Normative Opening	0.00	0.00	0.00	0.00	0.00
	Loan					
	Addition of Normative	0.00	4.13	1.18	0.00	0.00
	Loan during the Year					
	Normative Repayment	0.00	4.13	1.18	0.00	0.00
LTPS	during the year					
	Net Normative Closing	0.00	0.00	0.00	0.00	0.00
	Loan	40.0-04	40.070/			40.050/
	Interest Rate (%)	10.05%	10.05%	10.05%	10.05%	10.05%
	Interest on Loan	0.00	0.00	0.00	0.00	0.00
	capital					
	Net Normative Opening	67.00	50.45	27.14	5.68	0.00
	Loan					
KLHEP	Addition of Normative	8.08	1.61	3.58	1.40	0.00
	Loan during the Year					
	Normative Repayment	24.64	24.91	25.05	7.08	0.00
	during the year					

Table 127: Interest and Finance Charge as approved for the Control Period (Rs. Crore)

Ctation	Dentieulene	FY	FY	FY	FY	FY
Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
	Net Normative Closing Loan	50.45	27.14	5.68	0.00	0.00
	Interest Rate (%)	10.05%	10.05%	10.05%	10.05%	10.05%
	Interest on Loan capital	5.90	3.90	1.65	0.29	0.00
	Net Normative Opening Loan	12.05	7.50	11.19	10.87	4.91
	Addition of Normative Loan during the Year	0.38	8.97	5.45	0.00	0.00
LRPP	Normative Repayment during the year	4.93	5.27	5.77	5.96	4.91
	Net Normative Closing Loan	7.50	11.19	10.87	4.91	0.00
	Interest Rate (%)	10.05%	10.05%	10.05%	10.05%	10.05%
	Interest on Loan capital	0.98	0.94	1.11	0.79	0.25
	Net Normative Opening Loan	389.42	357.22	322.94	288.49	254.41
	Addition of Normative Loan during the Year	2.18	0.15	0.00	0.37	0.00
NRPP	Normative Repayment during the year	34.38	34.44	34.44	34.45	34.46
	Net Normative Closing Loan	357.22	322.94	288.49	254.41	219.95
	Interest Rate (%)	10.05%	10.05%	10.05%	10.05%	10.05%
	Interest on Loan capital	37.53	34.19	30.73	27.29	23.84

# 7.13 Return on Equity

- 7.13.1 APGCL submitted that APGCL has projected the Return on Equity (RoE) at a rate of 15.5% in accordance with the MYT Regulations 2024. The petitioner has claimed RoE at effective capacity for NTPS and LTPS.
- 7.13.2 APGCL has considered the Equity base for its stations on the same methodology adopted by Hon'ble AERC in the Tariff Order June 2024.

		2025-26	2026-27	2027-28	2028-29	2029-30
Station	Particulars	Project ed	Project ed	Project ed	Project ed	Project ed
	Opening Equity	59.44	59.44	59.44	59.44	59.44
	Closing Equity	59.44	59.44	59.44	59.44	59.44
NTPS	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	9.21	9.21	9.21	9.21	9.21
	Return on Equity on effective capacity	2.00	2.00	2.00	2.00	2.00
	Opening Equity	156.48	161.85	169.66	197.03	197.91
	Closing Equity	161.85	169.66	197.03	197.91	200.00
LTPS	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	24.67	25.69	28.42	30.61	30.84
	Return on Equity on effective capacity	16.86	17.56	19.43	20.92	21.08
	Opening Equity	157.31	163.35	181.07	191.57	196.56
KLHEP	Closing Equity	163.35	181.07	191.57	196.56	197.13
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	24.85	26.69	28.88	30.08	30.51
	Opening Equity	68.86	69.20	76.68	82.65	82.69
LRPP	Closing Equity	69.20	76.68	82.65	82.69	82.73
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	10.70	11.31	12.35	12.81	12.82
	Opening Equity	219.75	226.88	231.24	234.93	235.13
NRPP	Closing Equity	226.88	231.24	234.93	235.13	235.16
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	34.61	35.50	36.13	36.43	36.45

Table 128: Return on Equity for Control Period as submitted by APGCL (Rs. Crore)

**Commission's Analysis** 

- 7.13.3 The Commission has approved the Return on Equity in accordance with Regulation 34.2 of the MYT Regulations, 2024. The Commission has considered the addition of equity for capitalised works as approved in this Order. The Commission notes there has been some grants, which are yet to be converted to equity. The same would be converted subject to the normative ceiling of 30% of GFA. The detailed computation of allowable equity addition due to such conversion of grant in FY 2024-25 is provided in Annexure- 4 C to Annexure- 4G.
- 7.13.4 Accordingly, the approved Return on Equity at 15.50% same as proposed by APGCL, is shown in the Table below:

Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
	Opening Equity	59.23	59.23	59.23	59.23	59.23
	Addition during the year	0.00	0.00	0.00	0.00	0.00
	Closing Equity	59.23	59.23	59.23	59.23	59.23
NTPS	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	9.18	9.18	9.18	9.18	9.18
	Return on Equity on effective capacity	2.00	2.00	2.00	2.00	2.00
	Opening Equity	154.78	155.66	157.42	157.93	157.93
	Addition during the year	0.88	1.77	0.51	0.00	0.00
	Closing Equity	155.66	157.42	157.93	157.93	157.93
LTPS	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	24.06	24.26	24.44	24.48	24.48
	Return on Equity on effective capacity	16.45	16.59	16.71	16.73	16.73
	Opening Equity	156.43	160.77	161.46	162.99	163.59
	Addition during the year	4.34	0.69	1.53	0.60	0.00
KLHEP	Closing Equity	160.77	161.46	162.99	163.59	163.59
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	24.58	24.97	25.14	25.31	25.36
	Opening Equity	67.93	68.72	72.56	74.90	74.90
	Addition during the year	0.79	3.84	2.33	0.00	0.00
LRPP	Closing Equity	68.72	72.56	74.90	74.90	74.90
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	10.59	10.95	11.43	11.61	11.61

Table 129: Return on Equity approved for the Control Period (Rs. Crore)

Station	Particulars	2025-26	2026-27	2027-28	2028-29	2029-30
	Opening Equity	218.73	219.66	219.72	219.72	219.88
	Addition during the year	0.93	0.06	0.00	0.16	0.00
NRPP	Closing Equity	219.66	219.72	219.72	219.88	219.88
	Rate of Return	15.50%	15.50%	15.50%	15.50%	15.50%
	Return on Equity	33.97	34.05	34.06	34.07	34.08

# 7.14 Interest on Working Capital (IoWC)

- 7.14.1 APGCL has projected normative interest on working capital. However, as APGCL does not have liquid fuel stock facility, it has not considered working capital on storage of liquid fuel. The rate of interest has been considered equal to the normative interest rate of three hundred (300) basis points above the average State Bank of India MCLR (One Year Tenor) prevalent during the last available six months, which 8.80% + 3.00 % = 11.80%.
- 7.14.2 The interest on working capital considered is shown in the table below:

Station	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
NTPS	3.09	3.22	3.36	3.50	3.57
LTPS	12.43	14.53	14.81	15.47	15.57
KLHEP	3.23	3.37	3.36	4.07	3.64
LRPP	11.19	12.45	12.56	13.10	12.99
NRPP	11.82	13.01	15.02	13.37	13.50

Table 130: Interest on Working Capital for Control Period as submitted by APGCL (Rs. Crore)

## **Commission's Analysis**

7.14.3 The Commission has computed IoWC in accordance with Regulation 37 of the MYT Regulations, 2024. Rate of interest has been considered equal to the normative interest rate of three hundred (300) basis points above the average State Bank of India MCLR (One Year Tenor) prevalent during the last available six months for the determination of tariff, which works out to 11.85%. Interest on working capital approved by the Commission for the Control Period is shown in the following Table:

Station	Particulars	FY 2025-	FY 2026-	FY 2027-	FY 2028-	FY 2029-
Station	Faiticulais	26	27	28	29	30
	Fuel Cost for 15 days	2.87	2.96	3.08	3.17	3.17
	O&M Expenses for one month	5.62	5.97	6.34	6.73	7.14
NTDE	Maintenance Spares- 30% of O&M	20.24	21.49	22.82	24.23	25.72
NTPS	Receivables for 45 days	18.63	19.44	20.41	21.29	21.93
	Total Working Capital Requirement	47.36	49.86	52.65	55.42	57.96
	Rate of Interest (%)	11.85%	11.85%	11.85%	11.85%	11.85%
	loWC	5.61	5.91	6.24	6.57	6.87
	Fuel Cost for 15 days	11.49	13.57	14.13	14.53	14.53
	O&M Expenses for one month	6.17	6.55	6.95	7.38	7.84
LTPS	Maintenance Spares- 30% of O&M	22.21	23.58	25.04	26.58	28.22
LIPS	Receivables for 45 days	47.31	55.48	57.42	59.55	59.42
	Total Working Capital Requirement	87.18	99.19	103.55	108.05	110.02
	Rate of Interest (%)	11.85%	11.85%	11.85%	11.85%	11.85%
	IoWC	10.33	11.75	12.27	12.80	13.04
	O&M Expenses for one month	3.15	3.35	3.55	3.77	4.01
	Maintenance Spares- 15% of O&M	5.67	6.02	6.40	6.79	7.21
KLHEP	Receivables for 45 days	12.35	12.07	10.68	13.82	8.91
	Total Working Capital Requirement	21.18	21.45	20.63	24.39	20.12
	Rate of Interest (%)	11.85%	11.85%	11.85%	11.85%	11.85%
	loWC	2.51	2.54	2.44	2.89	2.38
	Fuel Cost for 15 days	11.93	12.34	12.84	13.21	13.21
LRPP	O&M Expenses for one month	2.63	2.80	2.97	3.15	3.35
	Maintenance Spares- 30% of O&M	9.48	10.07	10.69	11.35	12.05
	Receivables for 45 days	42.08	48.51	48.04	49.98	48.62

Table 131: Interest on Working Capital approved for the Control Period (Rs. Crore)

Station	Particulars	FY 2025- 26	FY 2026- 27	FY 2027- 28	FY 2028- 29	FY 2029- 30
	Total Working Capital Requirement	66.13	73.71	74.54	77.69	77.23
	Rate of Interest (%)	11.85%	11.85%	11.85%	11.85%	11.85%
	loWC	7.84	8.73	8.83	9.21	9.15
	Fuel Cost for 15 days	9.23	9.54	9.93	10.21	10.21
	O&M Expenses for one month	3.75	3.98	4.23	4.49	4.76
	Maintenance Spares- 30% of O&M	13.50	14.33	15.22	16.16	17.15
NRPP	Receivables for 45 days	46.10	46.96	48.15	48.99	49.00
	Total Working Capital Requirement	72.58	74.81	77.52	79.85	81.13
	Rate of Interest (%)	11.85%	11.85%	11.85%	11.85%	11.85%
	loWC	8.60	8.87	9.19	9.46	9.61

# 7.15 Special R&M Plan for Existing Stations

7.15.1 APGCL submitted the following Special R&M Plan is proposed for LTPS, KLHEP, LRPP and NRPP for the period from FY 2025-26 to FY 2029-30: -

## Special R&M Plan for LTPS

## Table 132: Special R&M claimed by APGCL for LTPS for the control period

			Proposed	d amount (	In Lakhs)	
SL NO	Description of Works	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
1	Major Overhauling of Gas Turbine Unit No.5 (Gas Turbine, Generator & Exciter) including supply of efficiency improvement spares	1000	1,600			
2	Major Overhauling of Steam Turbine Generator along with the Governing System, Lube Oil system (with accumulator), and Steam Jet Air Ejector System and servicing of Generator Transformer & Station Transformer, and different types of Control valves of WHRP along		900			

			Proposed	d amount (	In Lakhs)	
SL NO	Description of Works	FY	FY	FY	FY	FY
		2025-26	2026-27	2027-28	2028-29	2029-30
	with procurement of efficiency					
	improvement spares.					
	Major overhauling of Gas					
3	Compressor #8 along with supply			500		
	of spares					
	Major Overhauling of Gas					
4	Compressor unit#9 including				600	
	supply of overhauling spares.					
	Procurement of efficiency					
5	improvement spares for Gas				150	
	Compressors# 9.					
	Procurement of efficiency					400
6	improvement spares for		60			100
	combustion inspection of GT # 6					
7	Procurement of Combustion					
/	Inspection efficiency improvement Spares for Gas turbine #5			80		
	•	1 000	2 560	580	750	100
	Total (In Lakhs)	1,000	2,560	580	750	100

## Special R&M Plan for KLHEP

Table 133: Special R&M claimed by APGCL for KLHEP for the control period

		Proposed amount (In Lakhs)						
SL NO	Description of Works	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30		
1	Major overhauling of Unit-1	1500	1,200					
2	Major overhauling of Unit-2				2700			
	Total (In Lakhs)	1,500	1,200	-	2,700	-		

#### Special R&M Plan for LRPP

			Proposed	d amount (	In Lakhs)	
SL NO	Description of Works	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
1	12/24/36/48,000 Running Hours Turbocharger Maintenance for Unit no GEG#1,2,3,4,5,6,7	213	939	-	263	1,298
2 16,000 and 32,000 Running Hours Maintenance for GEG#1,2,3,4,5,6,7					2,310	
3	16,000 and 32,000 Running Hours Maintenance for GEG#4,5,1,7		2,745			
4	16,000 and 32,000 Running Hours Maintenance for GEG#6,2,3			2,155		
5	Alternator Maintenance for GEG#1,2,3,4,5,6,7		439			
	Total (In Lakhs)	213	4,123	2,155	2,573	1,298

#### Table 134: Special R&M claimed by APGCL for LRPP for the control period

## Special R&M Plan for NRPP

#### Table 135: Special R&M claimed by APGCL for NRPP for the control period

		Proposed amount (In Lakhs)						
SL NO	SL NO Description of Works		FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30		
1	Long Term service agreement for NRPP	-	3,889	11,943	1,943	1,943		
	Total (In Lakhs)	-	3,889	11,943	1,943	1,943		

#### **Commission Analysis**

- 7.15.2 The Commission analysed the individual works in detail and sought justification/additional details from APGCL on proposed expenses for Special R&M. The Commission also analysed the information submitted by APGCL in its replies for the individual schemes in detail and accordingly approved Special R&M expenses.
- 7.15.3 The Commission sought justifications along with board approval and OEM recommendation letters/supportive documents through an additional query. However,

APGCL has not submitted any relevant documents as requested by the Commission.

7.15.4 For LTPS, APGCL submitted costs for the major overhauling work of Gas Turbine Unit No. 5, including the supply of efficiency improvement spares for FY 2025-26 and FY 2026-27. Commission noted that, the special R&M has been claimed as approved in its previous MYT Order for FY 2024-25. The allowed cost was not utilised in FY 2024-25 and again being claimed in FY 2025-26. Further, as already stated in the Tariff Order dated 27th June 2024, the Commission may be constrained to disallow Special R&M not undertaken in the year for which it has been originally approved. The relevant extract of the Tariff Order dated 27th June 2024 is reproduced below:

"...APGCL has sought and received approval for the Special R&M based on the justification that the Special R&M is necessary for a particular year, but does not undertake the Special R&M in that year. This is not acceptable, and the Commission may be constrained to disallow Special R&M not undertaken in the year for which it has been originally approved."

- 7.15.5 Hence, Commission disallowed the cost claimed in overhauling of Gas Turbine Unit NO. 5. APGCL at the time of APR may come with proper justification for this spillover along with the Board approval/other relevant supporting document. The Commission provisionally allowed the others scheme as claimed by APGCL for LTPS.
- 7.15.6 For KLHEP, APGCL claimed expenses for the major overhauling work of Unit I and Unit II. The Commission approved the cost for Unit I, acknowledging the mandatory maintenance activity every five years. Similarly, for Unit II, the Commission considered the necessity of an overhaul and allowed the cost claimed by the petitioner. For KLHEP, all the special R&M claimed by APGCL has been allowed provisionally. For LRPP, the Commission reviewed the maintenance costs for Running Hours of Units 1 through 7. Recognizing the mandatory maintenance requirement, the Commission approved the expenses as claimed by APGCL.
- 7.15.7 For, NRPP, APGCL in its petition has submitted that, "As per the OEM guidelines, the NRPP GT requires HGPI, MI etc at the end of certain running hours for safety, reliability and availability of the machine. As the cost of these special R&M activities are very high, APGCL is exploring the possibility of signing a LTSA with the OEM to reduce the cost. For the time being APGCL has prepared the estimated cost of LTSA

for the Control Period based on an offer submitted by the OEM. However, APGCL also floated a Tender for the same which is being evaluated now. This estimate cost may change later based on the actual price bid received in the Tender."

- 7.15.8 APGCL humbly submitted to the Hon'ble Commission, that it will submit the final estimate for LTSA/any other changes special R&M proposal for NRPP in a separate petition after finalization of the matter.
- 7.15.9 In View of the above APGCL claimed that has not considered the impact of this Special R&M in the tariff year 2025-26
- 7.15.10 The Commission noted that, the cost proposed by the petitioner is quite high and can not be allowed without submission of supportive documents as sought by the Commission.
- 7.15.11 In view of that, Commission disallowed the cost proposed by the petitioner for Long Term Service Agreement of NRPP and directs the petitioner to file a separate petition with proper analysis and Board approval once the cost has been finalized.
- 7.15.12 The Commission has observed that APGCL has not submitted Board approvals or other relevant documents for the proposed Special R&M activities during the control period. Recognizing the importance of Special R&M for plant operations, the Commission has provisionally allowed expenses for some schemes. However, APGCL is instructed to provide the necessary supporting documents for FY 2025-26 during their Annual Performance Review (APR) and for FY 2026-27 and subsequent years during the revised Aggregate Revenue Requirement (ARR) submissions.
- 7.15.13 Additionally, the Commission mandates that APGCL execute the Special R&M activities in a timely manner to prevent cost overruns. It has been noted that APGCL frequently conducts the majority of approved Special R&M in years following the approval year. This practice, where APGCL seeks approval by justifying the necessity of Special R&M for a particular year but fails to execute it within that year, is deemed unacceptable. The Commission warns that it may have to disallow Special R&M expenses that are not undertaken in the originally approved year.
- 7.15.14 A detailed scheme-wise table of Special R&M expenses allowed by the Commission for the control period is provided below.

## Table 136: Special R&M approved by the Commission for the control period

i							
	Name of Project	FY 2025- 26	FY 2026- 27	FY 2027- 28	FY 2028- 29	FY 2029- 30	Remarks
	LTPS						
1	Major Overhauling of Gas Turbine Unit No.5 (Gas Turbine, Generator & Exciter) including supply of efficiency improvement spares	0.00	0.00	0.00	0.00	0.00	The special R&M has been claimed as approved in its previous MYT Order for FY 2024-25. The allowed cost was not utilised in FY 2024-25 and again being claimed in FY 2025-26.
2	Major Overhauling of Steam Turbine Generator along with the Governing System, Lube Oil system (with accumulator), and Steam Jet Air Ejector System and servicing of Generator Transformer & Station Transformer, and different types of Control valves of WHRP along with procurement of efficiency improvement spares.	0.00	900.00	0.00	0.00	0.00	Any OEM recommendation or board approval has not been submitted. Although, generators and STG are very old and no overhauling work has been done since long time.
3	Major overhauling of Gas Compressor #8 along with supply of spares	0.00	0.00	500.00	0.00	0.00	Any Board approval or approval of cost has not been submitted.
4	Major Overhauling of Gas Compressor unit#9 including supply of overhauling spares.	0.00	0.00	0.00	600.00	0.00	Any Board approval or approval of cost has not been submitted.
5	Procurement of efficiency improvement spares for Gas Compressors# 9.	0.00	0.00	0.00	150.00	0.00	Any Board approval or approval of cost has not been submitted.
6	Procurement of efficiency improvement spares for combustion inspection of GT # 6	0.00	60.00	0.00	0.00	100.00	Any Board approval or approval of cost has not been submitted.
7	Procurement of Combustion Inspection efficiency improvement Spares for Gas turbine #5	0.00	0.00	80.00	0.00	0.00	Any Board approval or approval of cost has not been submitted.
	Total (In Lakhs)	0.00	960.00	580.00	750.00	100.00	
	KLHEP						
1	Major overhauling of Unit-1	1500	1200	0.00	0.00	0.00	Any OEM
2	Major overhauling of Unit-2	0.00	0.00	0.00	2700	0.00	recommendation and board approval has not been submitted. Considering the mandatory maintenance activity in every 5 years, Commission considers the cost claimed by petitioner.

	Name of Project	FY 2025- 26	FY 2026- 27	FY 2027- 28	FY 2028- 29	FY 2029- 30	Remarks
	Total (In Lakhs)	1500	1200	0.00	2700	0.00	
	LRPP						
1	12/24/36/48,000 Running Hours Turbocharger Maintenance for Unit no GEG#1,2,3,4,5,6,7	213	939	-	263	1,298	
2	16,000 and 32,000 Running Hours Maintenance for GEG#1,2,3,4,5,6,7				2,310		
3	16,000 and 32,000 Running Hours Maintenance for GEG#4,5,1,7		2,745				
4	16,000 and 32,000 Running Hours Maintenance for GEG#6,2,3			2,155			
5	Alternator Maintenance for GEG#1,2,3,4,5,6,7		439				
	Total (In Lakhs)	213	4,123	2,155	2,573	1,298	
	NRPP						
1	Long Term service agreement for NRPP	-	-	-	-	-	
	Total (In Lakhs)	-	-	-	-	-	

## 7.16 Summary of Special R&M Plan

7.16.1 Based on the scheme-wise analysis of Special R&M proposed by APGCL for existing stations for the Control Period, as elaborated above, the summary of Station-wise Special R&M approved by the Commission for the Control Period is given in the Table below:

Table 137: Special R&M approved by the Commission for Control Period (Rs. Lakhs)

	FY 2025-26		FY 2026-27		FY 2027-28		FY 2028-29		FY 2029-30	
Station	Propo	Appro	Propo	Appro	Propo	Appro	Propo	Appro	Propo	Appro
	sed	ved	sed	ved	sed	ved	sed	ved	sed	ved
NTPS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LTPS	1000	0.00	2560	960	580	580.00	750	750	100	100
KLHEP	1500	1500	1200	1200	0.00	0.00	2700	2700	0.00	0.00
LRPP	213	213	4123	4123	2155	2155	2573	2573	1298	1298
NRPP	0.00	0.00	3889	0.00	11943	0.00	1943	0.00	1943	0.00
Total	2713	1713	11772	6283	14678	2735	7966	6023	3341	1398

7.16.2 It is to be noted that the Commission has approved the Special R&M expenses for individual schemes for NTPS, LTPS, KLHEP and LRPP during the Control Period. Therefore, at the time of true up of respective years, APGCL should submit the actual Special R&M expenses incurred for such individual schemes approved by the Commission for existing stations.

## 7.17 Non-Tariff Income

7.17.1 APGCL has submitted that, the non-tariff income for FY 2025-30 has been projected as same as claimed for True up petition for FY 2023-24 above. The same is as shown in the table below:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	2.67	2.67	2.67	2.67	2.67
LTPS	10.00	10.00	10.00	10.00	10.00
KLHEP	10.29	10.29	10.29	10.29	10.29
LRPP	7.18	7.18	7.18	7.18	7.18
NRPP	10.12	10.12	10.12	10.12	10.12
Total	40.26	40.26	40.26	40.26	40.26

#### Table 138: Non-Tariff Income for Control Period as submitted by APGCL (Rs. Crore)

## **Commission's Analysis**

- 7.17.2 Commission has observed the claim of petitioner in Non-Tariff Income for the Control period. Commission had sought the head wise details of the NTI for each station in accordance with the Clause 46 of the MYT Regulation 2024. APGCL in its reply submitted that, It has claimed a NTI of Rs. 40.26 Crore in True up for FY 2023-24. APGCL has estimated the same consolidated amount of Rs. 40.26 Crore as NTI for the MYT period. It is assumed to be within this estimate. Hence, the NTI has been estimated as a whole instead of head wise break up.
- 7.17.3 Accordingly, the Commission has considered the NTI as projected by APGCL for existing Stations, as shown in the following Table:

Station	2025-26	2026-27	2027-28	2028-29	2029-30
NTPS	2.67	2.67	2.67	2.67	2.67
LTPS	10.00	10.00	10.00	10.00	10.00
KLHEP	10.29	10.29	10.29	10.29	10.29
LRPP	7.18	7.18	7.18	7.18	7.18
NRPP	10.12	10.12	10.12	10.12	10.12
Total	40.26	40.26	40.26	40.26	40.26

 Table 139: Non-Tariff Income for Control Period as approved by the Commission (Rs. Crore)

# 7.18 Summary of ARR for Control Period

7.18.1 Based on the above analysis, the station-wise ARR approved for the control period FY 2025-26 to FY 2029-30 for existing Stations is summarised in the Table below:

Sr.		FY 20	25-26	FY 20	26-27	FY 20	27-28	FY 20	28-29	FY 20	29-30
No.	Particulars	APGCL's Petition	Approved								
Α	Annual Fixed Charges										
1	O&M expenses	14.66	67.48	15.55	71.64	16.50	76.06	17.51	80.75	18.57	85.73
2	Special R&M Expenses	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3	Increase in AERC Tariff Filing Fees	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	Depreciation	1.59	1.71	1.59	1.71	1.59	1.71	1.59	1.70	1.59	1.56
5	Interest & Finance Charges	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
6	Return on Equity	2.00	9.18	2.00	9.18	2.00	9.18	2.00	9.18	2.00	9.18
7	Interest on WC	3.09	5.61	3.22	5.91	3.36	6.24	3.50	6.57	3.57	6.87
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	2.67	2.67	2.67	2.67	2.67	2.67	2.67	2.67	2.67	2.67
10	Fixed Cost	18.67	81.31	19.70	85.77	20.79	90.52	21.93	95.52	23.06	100.67
В	Fuel Cost	69.77	69.77	72.31	72.31	74.84	75.05	77.18	77.18	77.18	77.18
С	Total ARR	88.44	151.08	92.01	158.08	95.63	165.57	99.10	172.70	100.24	177.85

Table 140: Summary of ARR for NTPS for Control Period approved by the Commission (Rs. Crore)

Sr.		FY 20	25-26	FY 20	26-27	FY 20	27-28	FY 20	28-29	FY 20	29-30
No.	Particulars	APGCL's Petition	Approved								
Α	Annual Fixed Charges										
1	O&M expenses	50.54	74.05	53.62	78.61	56.88	83.46	60.35	88.61	64.02	94.07
2	Special R&M Expenses	10.00	0.00	25.60	9.60	5.80	5.80	7.50	7.50	1.00	1.00
3	Increase in AERC Tariff Filing Fees	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	Depreciation	16.62	5.72	17.31	5.84	19.15	5.98	20.62	6.02	20.77	5.74
5	Interest & Finance Charges	0.00	0.00	0.03	0.00	1.60	0.00	2.50	0.00	1.31	0.00
6	Return on Equity	16.86	24.06	17.56	24.26	19.43	24.44	20.92	24.48	21.08	24.48
7	Interest on WC	12.43	10.33	14.53	11.75	14.81	12.27	15.47	12.80	15.57	13.04
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	10.00	10.00	10.00	10.00	10.00	10.00	10.00	10.00	10.00	10.00
10	Fixed Cost	96.45	104.16	118.65	120.07	107.66	121.95	117.36	129.41	113.76	128.33
В	Fuel Cost	279.55	279.55	331.19	331.19	342.89	343.83	353.65	353.65	353.65	353.65
С	Total ARR	376.01	383.71	449.84	451.26	450.55	465.78	471.01	483.06	467.41	481.98

Table 141: Summary of ARR for LTPS for Control Period as approved by the Commission (Rs. Crore)

Sr.		FY 20	25-26	FY 20	26-27	FY 20	27-28	FY 20	28-29	FY 20	29-30
No.	Particulars	APGCL's Petition	Approved								
Α	Annual Fixed Charges										
1	O&M expenses	41.96	37.83	44.51	40.16	47.22	42.64	50.10	45.27	53.15	48.06
2	Special R&M Expenses	15.00	15.00	12.00	12.00	0.00	0.00	27.00	27.00	0.00	0.00
3	Increase in AERC Tariff Filing Fees	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	Depreciation	24.35	24.64	26.15	24.91	28.30	25.05	29.47	21.66	29.90	6.72
5	Interest & Finance Charges	6.47	5.90	6.72	3.90	7.29	1.65	6.21	0.29	3.88	0.00
6	Return on Equity	24.85	24.58	26.69	24.97	28.88	25.14	30.08	25.31	30.51	25.36
7	Interest on WC	3.23	2.51	3.37	2.54	3.36	2.44	4.07	2.89	3.64	2.38
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	10.29	10.29	10.29	10.29	10.29	10.29	10.29	10.29	10.29	10.29
10	Fixed Cost	105.57	100.18	109.16	98.20	104.76	86.64	136.64	112.13	110.79	72.24
В	Fuel Cost	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
С	Total ARR	105.57	100.18	109.16	98.20	104.76	86.64	136.64	112.13	110.79	72.24

#### Table 142: Summary of ARR for KLHEP for Control Period as approved by the Commission (Rs. Crore)

Sr.		FY 20	25-26	FY 20	26-27	FY 20	27-28	FY 20	28-29	FY 20	29-30
No.	Particulars	APGCL's Petition	Approved								
Α	Annual Fixed Charges										
1	O&M expenses	31.57	31.61	33.49	33.56	35.53	35.63	37.69	37.83	39.99	40.16
2	Special R&M Expenses	2.13	2.13	41.23	41.23	21.55	21.55	25.73	25.73	12.98	12.98
3	Increase in AERC Tariff Filing Fees	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	Depreciation	12.25	4.93	12.94	5.27	14.14	5.77	14.67	5.96	14.68	5.96
5	Interest & Finance Charges	0.00	0.98	0.23	0.94	0.44	1.11	0.22	0.79	0.00	0.25
6	Return on Equity	10.70	10.59	11.31	10.95	12.35	11.43	12.81	11.61	12.82	11.61
7	Interest on WC	11.19	7.84	12.45	8.73	12.56	8.83	13.10	9.21	12.99	9.15
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	7.18	7.18	7.18	7.18	7.18	7.18	7.18	7.18	7.18	7.18
10	Fixed Cost	60.66	50.91	104.47	93.51	89.39	77.14	97.04	83.95	86.28	72.93
В	Fuel Cost	290.40	290.39	301.03	301.03	311.67	312.52	321.46	321.45	321.46	321.45
С	Total ARR	351.05	341.30	405.50	394.54	401.06	389.67	418.50	405.40	407.73	394.38

Table 143: Summary of ARR for LRPP for Control Period as approved by the Commission (Rs. Crore)

Sr.		FY 20	25-26	FY 20	26-27	FY 20	27-28	FY 20	28-29	FY 20	29-30
No.	Particulars	APGCL's Petition	Approved								
Α	Annual Fixed Charges										
1	O&M expenses	44.94	45.00	47.68	47.78	50.58	50.73	53.66	53.85	56.93	57.17
2	Special R&M Expenses	0.00	0.00	38.89	0.00	119.43	0.00	19.43	0.00	19.43	0.00
3	Increase in AERC Tariff Filing Fees	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	Depreciation	43.23	34.38	44.34	34.44	45.12	34.44	45.50	34.45	45.52	34.46
5	Interest & Finance Charges	36.38	37.53	33.33	34.19	29.78	30.73	25.68	27.29	21.13	23.84
6	Return on Equity	34.61	33.97	35.50	34.05	36.13	34.06	36.43	34.07	36.45	34.08
7	Interest on WC	11.82	8.60	13.01	8.87	15.02	9.19	13.37	9.46	13.50	9.61
8	Income Tax	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	Less: Non-Tariff Income	10.12	10.12	10.12	10.12	10.12	10.12	10.12	10.12	10.12	10.12
10	Fixed Cost	160.86	149.36	202.62	149.20	285.93	149.02	183.95	149.00	182.83	149.05
В	Fuel Cost	224.55	224.55	232.72	232.72	240.88	241.54	248.40	248.40	248.40	248.40
С	Total ARR	385.42	373.92	435.34	381.92	526.82	390.57	432.34	397.40	431.23	397.45

Table 144: Summary of ARR for NRPP for Control Period as approved by the Commission (Rs. Crore)

# 7.19 Net ARR for Effective Capacity

- 7.19.1 The Commission has considered the Net ARR computed on the effective capacity of NTPS and LTPS as stated earlier. The Commission has considered the effective capacity of 26 MW for NTPS on account of Unit 2 (or Unit 3) and Unit 6 being operational due to commissioning of NRPP. Further, the effective capacity of LTPS has been considered as 97.20 MW.
- 7.19.2 Accordingly, the Commission has computed the Net ARR for NTPS and LTPS at effective capacity, as shown in the Table below:

 Table 145: ARR for NTPS for the control period as approved by the Commission at Effective

 Capacity (Rs. Crore)

Particulars	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
Total Fixed Cost Approved on Installed Capacity	83.99	88.45	93.20	98.20	103.34
Reduction of Fixed cost due to Decommissioning	65.72	69.20	72.92	76.83	80.86
Total Fixed Cost approved at effective Capacity	18.27	19.24	20.28	21.37	22.49
Add: AERC Filing Fees	0.00	0.00	0.00	0.00	0.00
Add: Special R&M	0.00	0.00	0.00	0.00	0.00
Add: Income Tax	0.00	0.00	0.00	0.00	0.00
Less: Non-Tariff Income	2.67	2.67	2.67	2.67	2.67
Total Fixed Cost approved for effective capacity	15.60	16.57	17.60	18.69	19.81
Add: Fuel Cost	69.77	72.31	75.05	77.18	77.18
Net ARR approved for effective capacity	85.37	88.87	92.65	95.87	96.99

Particulars	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY 2029-30
Total Fixed Cost Approved on Installed Capacity	114.16	120.47	126.15	131.91	137.33
Reduction of Fixed cost due to Decommissioning	36.13	38.12	39.92	41.74	43.46
Total Fixed Cost approved at effective Capacity	78.03	82.35	86.23	90.16	93.87
Add: AERC Filing Fees	0.00	0.00	0.00	0.00	0.00
Add: Special R&M	0.00	9.60	5.80	7.50	1.00
Add: Income Tax	0.00	0.00	0.00	0.00	0.00
Less: Non-Tariff Income	10.00	10.00	10.00	10.00	10.00
Total Fixed Cost approved for effective capacity	68.03	81.95	82.03	87.66	84.87
Add: Fuel Cost	279.55	331.19	343.83	353.65	353.65
Net ARR approved for effective capacity	347.59	413.13	425.86	441.31	438.52

Table 146: ARR for LTPS for the control period as approved by the Commission at EffectiveCapacity (Rs. Crore)

## 8.1 Cumulative Revenue Gap/(Surplus) and Net ARR for recovery

8.1.1 APGCL has computed the cumulative Revenue Gap/(Surplus) after True-up of FY 2023-24, without carrying cost, as shown in the following Table:

Sr. No.	Particulars	Rs. Crore
1	Stand-alone Revenue Gap/(Surplus) for FY 2023-24	51.02
2	Carrying /(holding) cost for FY 2023-24 @ 11.53% (half Year)	2.94
3	Carrying /(holding) cost for FY 2024-25 @ 11.53% (Full Year)	5.88
4	Carrying /(holding) cost for FY 2025-26 @ 11.53% (half Year)	2.94
5	Total True up claim	62.78

Table 147: Revenue Gap/(Surplus) as submitted by APGCL (Rs. Crore)

## Commission's Analysis

- 8.1.2 For computation of cumulative past Revenue Gap/(Surplus) for recovery, the Commission has considered the Revenue Gap/(Surplus) after truing up of FY 2023-24 approved in this Order along with carrying/holding cost.
- 8.1.3 The Commission has computed the cumulative Revenue Gap/(Surplus) as shown in the following Table:

Table 148: Revenue Gap/(Surplus) for FY 2023-24 as approved by the Commission (Rs. Crore)

Particulars	Submitted by APGCL	Approved after Truing up
Truing up for FY 2023-24		
ARR for NTPS*	106.71	96.39
ARR for LTPS*	318.34	282.09
ARR for KLHEP	75.42	65.92
ARR for LRPP	351.32	344.43

Particulars	Submitted by APGCL	Approved after Truing up
ARR for NRPP	397.46	389.70
Combined ARR	1249.26	1178.53
Revenue from Sale of Power	1198.23	1183.60
Revenue Gap/(Surplus)	51.02	(5.07)
Computation of carrying/(holding) cost on		
Revenue Gap/(Surplus) of FY 2020-21		
Carrying /(holding) cost for FY 2023-24 @ 11.58 % (half Year)	2.94	(0.29)
Carrying /(holding) cost for FY 2024-25 @ 11.80 % (full Year)	5.88	(0.60)
Carrying /(holding) cost for FY 2025-26 @ 11.80 % (half Year)	2.94	(0.30)
Total	11.76	(1.19)
Cumulative Revenue Gap/(Surplus) along with Carrying/(Holding) Cost	62.78	(6.26)

**Note**: \*Considering effective capacity

8.1.4 The Commission approves the Revenue Surplus of Rs. 6.26 Crore arising out of Truing up for FY 2023-24, including the holding cost. This amount is to be refunded to APDCL in 12 equal monthly instalments, viz., Rs 0.52 Crore per month during FY 2025-26, as adjustments in the monthly bill.

# 8.2 Fixed Charges and Energy Charges for FY 2025-26 for NTPS, LTPS, KLHEP, LRPP and NRPP

8.2.1 APGCL has proposed the Generation Tariff for NTPS, LTPS, LRPP and NRPP as shown in the following Table:

Table 149: Proposed	<b>Generation tariff</b>	as submitted by	APGCL (Rs. 0	Crore)
				/

Station	Particulars	FY 2025-26
	Annual Fixed Charges (Rs. Crore)	18.67
NTPS	Monthly Fixed Charges (Rs. Crore)	1.56
	Energy Charges (Rs. /kWh)	6.42
LTPS	Annual Fixed Charges (Rs. Crore)	96.45

Station	Particulars	FY 2025-26
	Monthly Fixed Charges (Rs. Crore)	8.04
	Energy Charges (Rs. /kWh)	6.95
	Annual Fixed Charges (Rs. Crore)	52.79
KLHEP	Monthly Fixed Charges (Rs. Crore)	4.40
	Energy Charges (Rs. /kWh)	1.37
	Annual Fixed Charges (Rs. Crore)	60.66
LRPP	Monthly Fixed Charges (Rs. Crore)	5.05
	Energy Charges (Rs. /kWh)	5.79
	Annual Fixed Charges (Rs. Crore)	160.86
NRPP	Monthly Fixed Charges (Rs. Crore)	13.41
	Energy Charges (Rs. /kWh)	3.23

### **Commission's Analysis**

8.2.2 The Commission has determined the Tariff for FY 2025-26 for NTPS, LTPS, KLHEP, LRPP and NRPP as under:

#### Annual Fixed Charges

- 8.2.3 In earlier Chapter, the Commission has determined the Annual Fixed Charges for NTPS, LTPS, KLHEP, LRPP and NRPP.
- 8.2.4 Regulation 48.1 of the MYT Regulations, 2024 specifies that the NAPAF for full recovery of Annual Fixed Charges shall be 50% for NTPS and LTPS and 85% for LRPP and NRPP.
- 8.2.5 The Fixed Charges for NTPS, LTPS, LRPP and NRPP as approved by the Commission for FY 2025-26 is shown in the following Table:

### Table 150: Fixed Charges as approved for FY 2025-26 by the Commission (Rs. Crore)

Generating Station	Annual Fixed Charges	Monthly Fixed Charges
NTPS	15.60	1.30
LTPS	68.03	5.67
LRPP	50.91	4.24
NRPP	149.36	12.45

8.2.6 However, in the event of actual Availability for the year, computed in accordance with the Regulation 48.1 of the MYT Regulations, 2024, being less than the Normative Availability, the Fixed Charges shall be proportionately adjusted as per the MYT Regulations, 2024.

### Energy Charges

Station	Particulars	FY 2025-26
	Fuel Cost (Rs. Crore)	69.77
NTPS	Net Generation (MU)	108.76
	Energy Charges (Rs. /kWh)	6.42
	Fuel Cost (Rs. Crore)	279.55
LTPS	Net Generation (MU)	402.32
	Energy Charges (Rs. /kWh)	6.95
	Fuel Cost (Rs. Crore)	290.39
LRPP	Net Generation (MU)	501.22
	Energy Charges (Rs. /kWh)	5.79
	Fuel Cost (Rs. Crore)	224.55
NRPP	Net Generation (MU)	696.05
	Energy Charges (Rs. /kWh)	3.23

Table 151: Energy Charges for FY 2025-26 approved by the Commission (Rs. Crore)

### 8.3 Capacity Charges and Energy Charge Rate for KLHEP

8.3.1 APGCL has proposed the tariff for KLHEP as shown in the following Table:

#### Table 152: Proposed Generation tariff for KLHEP as submitted by APGCL

Station	Particulars	FY 2025-26			
	Capacity Charges (Rs. Crore)	52.79			
	Monthly Fixed Charges (Rs.	4.40			
KLHEP	Crore)				
	Energy Charges (Rs. /kWh)	1.37			

### Commission's Analysis

8.3.2 Regulation 50.1 of the MYT Regulations 2024 specifies the computation of Capacity Charges and Energy Charges for Hydro Generating Stations. The Commission has determined the Capacity Charges and Energy Charges for KLHEP for FY 2025-26 based on the applicable AFC and projected Availability as under:

## Table 153: Capacity Charges and Energy Charges approved by the Commission for KLHEP forFY 2025-26

Particulars	FY 2025-26
Annual Fixed Charge (Rs. Crore)	100.18
Capacity Charges (Rs. Crore)	50.09
Design Energy (MU)	390.00
Auxiliary Consumption (%)	1.00%
Net Design Energy (MU)	386.10
Energy Charge Rate (Rs. /kWh)	1.30

8.3.3 The Capacity Charges shall be charged for calendar month on monthly basis as per Regulation 52.1 and 52.2 of MYT Regulations, 2024.

### 8.4 Generation Tariff for FY 2025-26

8.4.1 The Commission approves the Generation Tariff for FY 2025-26 as shown in the following Table:

Particulars	Particulars	FY 2025-26
	Annual Fixed Charges (Rs. Crore)	15.60
NTPS	Monthly Fixed Charges (Rs. Crore)	1.30
	Energy Charges (Rs. /kWh)	6.42
	Annual Fixed Charges (Rs. Crore)	68.03
LTPS	Monthly Fixed Charges (Rs. Crore)	5.67
	Energy Charges (Rs. /kWh)	6.95
LRPP	Annual Fixed Charges (Rs. Crore)	50.91
	Monthly Fixed Charges (Rs. Crore)	4.24

### Table 154: Generation Tariff for FY 2025-26 approved by the Commission

Particulars	Particulars	FY 2025-26
	Energy Charges (Rs. /kWh)	5.79
	Annual Fixed Charges (Rs. Crore)	149.36
NRPP	Monthly Fixed Charges (Rs. Crore)	12.45
	Energy Charges (Rs. /kWh)	3.23
	Capacity Charges (Rs. Crore)	50.09
KLHEP	Monthly Fixed Charges (Rs. Crore)	4.17
	Energy Charges (Rs. /kWh)	1.30

8.4.2 Since, the Commission has determined Station-wise Generation Tariff for FY 2025-26, the billing shall be done for each station separately on monthly basis in accordance with the provisions of MYT Regulations, 2024.

### 8.5 Applicability of Tariff

8.5.1 The approved Generation tariff for FY 2025-26 shall be effective from April 1, 2025, and shall continue until replaced/modified by an Order of the Commission.

Sd/- Sd/-

(A. Bhattacharyya)(K. S. Krishna)Member, AERCChairperson, AERC

## 9 Directives

The Commission issued certain directives to APGCL in the past Tariff Orders, with an objective of attaining operational efficiency and streamlining the flow of information, which would be beneficial to the sector and the Petitioner, both in the short-term and long-term.

As regards the directives issued by the Commission, APGCL has submitted the report to the Commission on compliance of directives issued in the Tariff Order dated 27<sup>th</sup>. June 2024. The Commission has reviewed the compliance of directives submitted by APGCL and the status is as follows:

### Status of Directives issued in the Tariff Order dated 27<sup>th</sup>. June 2024

### **Directive 1: Completion of Projects**

The Commission directs APGCL to complete the new and ongoing projects on time. The Commission also directs APGCL to set up their ongoing Solar Plants on Time.

### Status:

Noted. APGCL has submitted the status of ongoing projects.

### Directive 2: Procurement of Gas

APGCL should continue to pursue with its gas suppliers/ transporter to obtain the contracted quantum of gas on a regular basis. The issue of gas should be pursued with the concerned ministry of GOI in consultation with the state Government.

### Status:

Noted. Communication has been made with MoPNG requesting for allocation of additional gas. Details are attached at Sub-Annexure-II of Annexure-12. Moreover, APGCL has entered an agreement with AGCL for a quantum of gas 0.1 MMSCMD gas (on Fall back basis) on dated 30th August'2024.

### Directive 3: Fixed Asset Register

The Commission directs APGCL that Fixed Asset Register should be updated every year, and these should be duly certified by Chartered Accountant. APGCL is directed to maintain Fixed Asset Register at their end and submit to the Commission as and when asked during tariff proceedings.

### Status:

APGCL maintains its FAR in SAP-ERP system, which is auto system updated and is ready to submit to the Hon'ble Commission whenever asked for.

### Directive 4: Undertaking Special R&M in timebound manner

The Commission observes that APGCL undertakes bulk of the Special R&M approved for a year in subsequent years only. APGCL has sought and received approval for the Special R&M based on the justification that the Special R&M is necessary for a particular year but does not undertake the Special R&M in that year.

APGCL is directed to execute the Special R&M in time-bound manner so that no cost overrun takes place.

### Status:

Noted. APGCL is putting all-out effort to complete the special R&M works within the stipulated time. However, the overhauling depends on factors like running hours, commercial availability of parts of machine etc., so sometimes it may differ from stipulated time frame.

### Directive 5: Special R&M linked to the operational running hours

The Commission notes that APGCL is praying for routine maintenance expenses that are linked to running hours of the plant in the APR or True up of the plant for that year. APGCL is directed to ensure that all such Special R&M linked to operational running hours based on OEM recommendations are prayed for the original Tariff Petition for that year, rather than being submitted at the time of APR or true-up.

### Status:

Noted.

# Directives 6: Unit-wise detailed breakup of Capex and Special R&M in new control period

APGCL is directed to submit Unit wise detailed breakup of Capex and Special R&M envisaged in the MYT Petition for the next Control Period in its Capital Investment Plan (CIP) and Special R&M plan. APGCL is further directed to submit its CIP and Special R&M Plan with Board approval of individual scheme envisaged, detailed justification, and cost benefit analysis of the scheme.

### Status:

Noted. APGCL will submit the details in the next MYT petition.

### Directives 7: Solar Storage/ Pump Storage

The Commission directs APGCL to initiate action for installation of solar/pump storage facilities to suit the demand.

### Status:

APGCL has a few short-listed locations. DPR for the same is planned to be financed by EAP (JICA). Proposal sent to GoA. Response awaited.

### New Directives:

The Commission hereby issues the following directives to APGCL:

### **Directive 1: Completion of Projects**

The Commission directs APGCL to complete the new and ongoing projects on time. The Commission also directs APGCL to set up their ongoing Solar Plants on time.

### Directive 2: Procurement of gas

APGCL should continue to pursue with its gas suppliers/ transporter to obtain the contracted quantum of gas on a regular basis. The issue of gas should be pursued with the concerned ministry of GOI in consultation with the State Government.

### Directive 3: Fixed Asset Register

The Commission directs APGCL that Fixed Asset Register should be updated every year, and these should be duly certified by Chartered Accountant. APGCL is directed to maintain Fixed Asset Register at their end and submit to the Commission as and when asked during tariff proceedings.

### Directive 4: Undertaking Special R&M in time-bound manner

The Commission observes that APGCL undertakes bulk of the Special R&M approved for a year in subsequent years only. APGCL has sought and received approval for the Special R&M based on the justification that the Special R&M is necessary for a particular year but does not

undertake the Special R&M in that year. APGCL is directed to execute the Special R&M in time-bound manner so that no cost overrun takes place.

### Directive 7: Board approval of Special R&M/Capital Projects/Schemes/Works

The Commission directs APGCL to submit approval of the board or any other competent authority for all Special R&M/ Capital Projects/Schemes/ Works proposed to be undertaken by the Petitioner. The Commission also directs APGCL to approach the Commission separately for its projects, which were not included in the capital investment plan approved in the MYT Order.

### Directive 7: Generation of green power

The commission directs the petitioner to submit a plan for generating clean power from waste by the fiscal year 2024-25.

Further, APGCL is directed to submit the status of compliance of above Directives to the Commission at the end of each quarter. The Commission will review the status in the month following the end of the quarter.

> Sd/-(A. Bhattacharyya) Member, AERC

Sd/-(K. S. Krishna) Chairperson, AERC

# Annexure-1 Minutes of the 35th Meeting of the State Advisory Committee

### 35th Meeting of the State Advisory Committee

Venue: AERC Conference Hall.
Day/Dated: Thursday, 27<sup>th</sup> February 2025
List of members/special invitees: At Annexure- 1A

The 35<sup>th</sup> Meeting of the State Advisory Committee (SAC) was chaired by the Hon'ble Chairperson, AERC, Kumar Sanjay Krishna, IAS, (Retd.).

At the onset, Hon'ble Chairperson, AERC welcomed all members and invitees and introduced the new members who could not attend the last SAC meeting. The Hon'ble Chairperson stated that the main purpose of this meeting was to discuss the Multi Year Tariff petitions filed by the State Power Utilities. He informed that in their tariff Petitions, the Generation Company, APGCL has requested for approval of ARR for FY 2025-26 of Rs 1306.49 Cr, Transmission (AEGCL) an ARR of Rs 722.28 Cr, and SLDC an ARR of Rs 16.73 Cr.

He further informed that the cumulative revenue requirement claimed by APDCL to be recovered in tariff for FY 2025-26 works out to Rs. 11,652.49 Cr against proposed retail sale of 12,015 MU. Thus, the average cost of supply to recover entire cumulative ARR is Rs. 9.70 per unit. APDCL, in their petition, proposed to continue with the prevalent tariff structure approved in the last tariff order without any hike for all categories of consumers for FY 2025-26 although there is a gap of Rs 357 Crore with the existing tariff.

The Hon'ble Chairperson stated that in the last tariff Order, APDCL claimed an ARR of Rs 10,121.92 Cr for FY 2024-25 along with a gap of Rs 1904.17 Cr in the true up of FY 2022-23. The Commission after prudent check, reduced the claim by Rs 999 Cr and finally approved an ARR of Rs 9,519.44 Cr along with a true up gap of Rs 1507.68 Cr. The Commission had not considered any subsidy for the FY 2024-25 from the State Government while deciding the tariff.

The Hon'ble Chairperson further informed that in their petition, APDCL has introduced a Time-of-Day (ToD) tariff for all consumer categories with a connected load exceeding 10 kW, where smart meters have been installed. Further, APDCL has incorporated "solar hours" along with other ToD time slots and corresponding tariffs, ensuring conformity with Rule 8A of the Rights of Consumers Rules, 2020 and its subsequent amendments. For Commercial and Industrial consumers, during peak periods the normal tariff is increased by 20%, and for other consumers, it is increased by 10%. The TOD tariff for solar hours, is kept at twenty percent less than the normal tariff. The time slot for peak hours has been changed from evening 5 pm to 10 pm to 5 pm to 12 pm, considering the trend in peak demand.

The Commission would be required to approve TOD tariff for next year (as envisaged in the Rules) and the distribution loss trajectory for the next MYT period of 5 years. It may be brought to the notice of the members that although a distribution loss of 14.75 % was approved for FY 2023-24, APDCL could achieve only 15.5% which led to an excess power purchase of 131.53 MU and Rs 71.02 Cr. Also, it is observed that APDCL could achieve only 25-30% of the capitalization that was approved by the Commission. It has also been observed that during FY 2023-24, APDCL procures short term power at an average rate of Rs 6.06/unit while exporting the same at much lower price of Rs 4.86/ unit.

Concluding his address, the Hon'ble Chairperson mentioned that only a brief outline of the tariff proposals has been stated before the SAC members, and the power Companies would make detailed presentations on the same. He requested the SAC members to put forward their suggestions and concerns during the discussions.

The important points discussed by the members during the course of the meeting are briefly recorded below.

### Agenda Item No.2: Brief presentation by APDCL on the Tariff Petition.

A Power Point Presentation was made by Shri. Rakesh Kumar, IAS, MD, APDCL on the Tariff Petitions. MD, APDCL mentioned that the peak demand in Assam has been growing at a Compound Annual Growth Rate (CAGR) of 8%. The average daily consumption has shown a steady increase from FY 2016-17 to FY 2024-25, with peak demand expected to reach 2942 MW in FY 2025-26 and 3836 MW in FY 2029-30. However, the total availability in FY 2025-26 against the peak demand is expected to be 2900 MW and 3640 MW in FY 202930. He informed that the demand profile varies between summer and winter, with higher demand during the summer months. APDCL has long-term PPAs with various generators, including hydro, gas, coal, and solar power plants. The total entitlement share from all sources presently is 2502 MW and to meet the future demand, additional capacity will be added through various projects, including Subansiri, Ghatampur, Lower Kopili, and SECI Solar Hybrid. Further, any shortfall in power availability will be met through the power exchange. MD, APDCL mentioned that in the consumer mix, domestic consumers account for 91% of the total consumer base, followed by commercial (6%) and others (3%). However, domestic consumers contribute only 43% of the revenue despite accounting for 49% of energy sales, indicating cross-subsidization, and commercial consumers contribute 19%, and industrial consumers contribute 23% of the total revenue mix.

MD, APDCL also highlighted that APDCL has significantly expanded its infrastructure, including 33/11 kV substations, 33 kV lines, and 11 kV lines, which will lead to gradual improvement in LT:HT ratio as well as distribution losses.

Shri Kumar also mentioned that the ACS-ARR gap improved from -0.52 Rs/kWh in FY 2021-22 to -0.24 Rs/kWh in FY 2023-24. Also, there has been an improvement in number of days receivable, which indicates efficiency in collection initiatives after the implementation of Smart Meters. Further, there is a year-on-year achievement of AT&C loss reduction targets fixed by the Ministry of Power under RDSS.

MD, APDCL stated that in the True up of FY 2023-24, there was a 32% increase in power purchase costs, primarily due to higher costs from gas-based stations. And, distribution Losses were 15.50% in actual, slightly higher than the approved 14.75%. A net revenue gap of Rs. 440 Cr was claimed after considering the State Government support of Rs. 287.30 Cr, and a special allowance of Rs. 457.09 Cr regarding FPPPA recovery. Shri Kumar also mentioned that the total proposed CAPEX. is Rs. 18,296 Cr over next five years, which includes Universal Service Obligation (5%), Standard upkeep of the network (21%), Decarbonization & Clean Energy (30%) and System Modernization (44%) under scheme-wise projects such as RDSS and Assam Distribution System Enhancement and Loss Reduction (ADSELR) etc.

Shri Kumar informed that the projected standalone ARR for FY 2025-26 is Rs 11,109.16 Cr, and Energy sales projected to be increased at a CAGR of 8%. The Power

Purchase cost is the major contributor to the ARR with levelized share of 87% over the MYT period. However, the share of Power Purchase cost is projected to be reduced over the years with prudent planning and optimization. MD, APDCL also mentioned that the recovery of OPEX costs in smart metering has not been claimed in the ARR petition in line with the Hon'ble Commission's order. However, APDCL shall reflect the actual cost at the time of truing up for the year.

MD, APDCL mentioned that the gross revenue at the existing tariff with projected retail sale quantum during FY 2025-26 is estimated at Rs. 11295.14 Cr., leaving a shortfall of Rs. 357.35 Cr. over the cumulative requirement. He informed that the revenue gap on cumulative requirement is proposed to be recovered through an added revenue stream with various policy interventions like green tariff, green energy open access, etc. MD, APDCL also mentioned that for the FY 2025-26, APDCL proposed no hike in tariffs for any consumer category, and also, a Time of Day (TOD) Tariff has been introduced for consumers with a connected load exceeding 10 kW, with three time slots: Solar, Peak, and Night. For Commercial and Industrial consumers, the proposed TOD tariff during the peak period of the day is kept at 1.20 times the normal tariff, and for other consumers, it is at 1.10 times the normal tariff for that category of consumers.

### Presentation by AEGCL

A PowerPoint presentation was made by the CGM, AEGCL on behalf of the MD, AEGCL on the salient features of Tariff petition submitted by AEGCL and SLDC. Important points of the discussion are noted below

In True-up for FY 2023-24, AEGCL has shown ARR of Rs.682.17 Crore and a gap of Rs. 23.30 Crore. For SLDC, in True-Up, ARR of Rs. 8.93 Crore and surplus of Rs. 1.13 Crore is shown.

In APR for FY 2024-25, AEGCL has shown ARR of Rs.669.29 Crore and a marginal gap of Rs. 1.01 Crore. For SLDC, in APR for FY 2024-25, ARR of Rs. 14.28 Crore and surplus of Rs. 0.27 Crore is shown.

In MYT for FY 2025-26 to 2029-30, the following have been proposed for AEGCL and SLDC:

AEGCL	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY2029-30
ARR	719.86	823.44	818.86	897.95	985.51
Transmission Loss (%)	3.21%	3.19%	3.17%	3.15%	3.13%

SLDC	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY2029-30
ARR	16.73	18.83	20.80	23.21	26.49

AEGCL has submitted a transmission loss of 3.28% for True-up against the approved loss of 3.30%. AEGCL has projected a loss of 3.24% in APR for FY 2024-25. AEGCL has a projected transmission charge of Rs.0.54 Rs/kwh and SLDC charge of Rs. 141.80/MW/Day for FY 2025-26.

### **Presentation by APGCL**

A Power Point Presentation by Shri. Bibhu Bhuyan, MD, APGCL on approval of True up for FY 2023-24, Annual Performance Review for FY 2024-25, CAPEX plan for FY 2025-26 to 2029-30, ARR for FY 2025-26 to FY 2029-30 and determination of tariff for FY 2025-26.

MD, APGCL brought to the notice of SAC that APGCL has been rated in A++ category and can be considered equivalent to a Mini Ratna Company. Provided there is government support, the company has the capability to raise funds from the market for its expansion and survivability. Shri Bhuyan stated that the generating plants of APGCL are mostly gas based and due to the exorbitant hike in natural gas prices the cost of power in each generating station of APGCL increased significantly and this has an impact in consumer retail Tariff. MD, APGCL also appraised the Committee that the old unit of NTPS has to be closed down as there are no spare parts, service support, etc. on account of it being very old. A member recommended that APGCL may take initiatives for upgrading the station rather than closing down, if viable.

MD, APGCL mentionedthat with execution of more and more renewable projects grid stabilitily might be disturbed because of the intermittent nature of renewable energy. Shri Bhuyan also pointed out thatincrease in solar, small hydro, etc will not be sufficient to meet the peak demand. As such Gas based station will be an assest for the state as such stations are easy to ramp up and ramp down to adjust the demand.. Besides, Gas based stations can be used to provide the base load.

MD, APGCL mentioned that in the True Up for the FY 2023-24, APGCL has shown a Net Revenue of Rs. 1198.23 Cr and actual revenue gap of Rs. 51.02 Cr. The revenue gap with carrying cost is Rs. 62.78 Cr. The actual claimed Gross generation is 2008.05 MU.

In the APR for the FY 2024-25, APGCL has shown a ARR of Rs. 86.58 Cr and gap of Rs. 7.39 Cr for NTPS, ARR of Rs. 419.33 Cr and gap of Rs. 33.10 Cr for LTPS, ARR of Rs. 371.86 Cr and gap of Rs. 19.67 Cr for LRPP, ARR of Rs. 374.14 Cr and gap of Rs. 1.26 Cr for NRPP, ARR of Rs. 82.28 Cr and surplus of Rs. 1.05 Cr for KLHEP, overall ARR of Rs. 1334.21 Cr with Rs. 60.35 Cr gap and estimated gross generation of 2186.72 MU for APGCL.

In MYT for FY 2025-26 to 2029-30, the following have been proposed for APGCL:

	FY 2025-26	FY 2026-27	FY 2027-28	FY 2028-29	FY2029-30
Total Revenue Requirement	1,306.49	1,491.85	1,578.82	1,557.59	1,517.40

APGCL has proposed a tariff of Rs. 6.24/kWh for the FY 2025-26 (fixed charge of Rs. 2.11/kWh and energy charge of Rs. 4.13/kWh).

### Agenda No-3 Discussions by the SAC Members on the Tariff Petitions:

SAC Member Shri Amarendra Goswami submitted a list of infirmities observed in the MYT Petitions of APDCL some of which are briefly noted hereunder:

### a) True-up petition for FY 2023-24

- i) The new item- 'Unrecovered FPPPA for 2022-23' is shown under item-8 with a value of Rs 457.09 Cr. FPPPA cannot appear in the ARR for the simple reason that in that case, FPPPA shall be included in the tariff determination process and no FPPPA could be levied additionally under the FPPPA Regulations.
- ii) By adding of un-recovered FPPPA in the true up, surplus has been converted to shortfall which would impact the process of tariff determination.
- iii) There seems to be a calculation error in summation from item-17 to item18 in the column-b (Actual) which may be verified and rectified.

 There is lack of clarity, regarding adjustment of cumulative shortfall and surplus in the true-up processes under the respective tariff orders. It is suggested that one sheet may be submitted showing the shortfall/ surplus due for adjustment till FY 2023-24 showing adjustments already made in the previous FYs.

### b) On APR for 2024-25:

- Increase in revenue in % has always been found to be higher that the corresponding % increase in sale of power. However, the percentage increase in revenue from sale of power is abnormally high in 2023-24. Therefore, careful analysis is necessary before approving the projected the value of revenue from sale of power.
- ii) It is observed that no actual data for 6 months has been presented in the APR in respect to financial performances including revenue from sale of power. Without these vital inputs, it would be a constraint for the Hon'ble Commission to approve the projected value in the APR for 2024-25 and the corresponding targeted values for the year 2025-26 for determination of tariff. APDCL may be requested to submit all relevant data in the form of revised APR.

### c) On proposed Tariff:

all

Shri Goswami made the following comments in respect to the proposed TOD tariff for categories above 10KW.

- Duration of solar hours has been fixed from 6.00 hrs to 17.00 hrs (11 hours). This is against the stipulation under Rule 8(A) of the Electricity (Rights of Consumers) Amendment Rules 2023 which states that *"solar hours" means the duration of eight hours in a day.*
- ii) Introduction of TOD tariff for domestic (and also bulk consumers like educational institutes) will cause big impact on students and children as usually their study hours are from 18.00hrs to 22.00hrs. This is a societal issue which needs to be taken into consideration by the Commission while considering the proposal.
- iii) We need to deliberate thoroughly whether TOD is an opportunity or burden for the domestic consumers. It is apprehended that actual tariff burden will be more than the normal tariff rate because of the consumption pattern. TOD tariff should not be implemented for domestic as well as commercial consumers until proper analysis of consumption patterns. Unlike industries, domestic consumers have

APGCL MYT Order for FY 2025-26 to FY 2029-30

little opportunity to reduce consumption without compromising on essential needs, which may defeat the very objective.

- iv) Since TOD tariff can be applied only to consumers having smart meters, there would be different categories of consumers with smart meters and without smart meters. This will go against Section 62(3) of the Act. APDCL need to submit the smart meter installation data for above 10KW load consumers against total consumers in such group.
- v) APDCL need to show the justification for extending peak load hours to 24.00hrs with actual load curves.
- vi) Introduction of TOD tariff will create problem for the bulk single point bulk consumers like Universities, IIT, AIIMS, NIPER and many similar institutions for collecting revenue from their quarters. They will also have to install smart meters and have proper billing infrastructure of their own or through other agencies.

Shri Goswami also enquired about the status of rebate to be provided to the consumers covered under prepayment mode. He further enquired regarding the observations made by the independent auditors about not booking of income from deposit works by APDCL of Rs. 472.09 Cr and Rs. 464.28 Cr for FY 2023-24 & FY 2022-23 respectively amounting to total of Rs. 936.37 Cr. He requested the Commission to look into the matter.

MD, APDCL replied that the Company follows all the procedures as per the accounting and regulatory norms. He assured the Committee that the queries raised by the member shall be replied to in writing. He further stated that TOD is optional as of now, as smart meters are still not installed completely. Also, TOD is applicable to those consumers whose connected load exceed 10 kW and it is observed that only 3 to 4 Lakhs consumers which are high end consumers shall actually be come under this new regime. Further, Shri Kumar stated that inconsistencies observed by the Independent auditors have already been taken up and replies submitted to the auditors as per the accounting procedure followed by the Company. However, he assured that the same will be forwarded to the Commission.

On the aforesaid points, one learned SAC member highlighted that the evaluation of tariff is on basis of the Regulatory Accounts which is different from the normal accounts of a Company which seems to be the crux of the issue. Thus, although audited balance sheet may show surplus but that may not be the surplus from regulatory/ commercial angle. The EA 2003 aims at mainly two objectives: 24x7 quality power and commercial turnaround of all utilities. Hence,

the government needs to look into the issues being faced by the State utilities, without which the future looks very bleak. The main issue observed in the context of APDCL is that 87% of their budget is spent on power purchase and only 13% is left with them to run the distribution business. The Committee acknowledged that the company is making best efforts to carry out the distribution business properly but the Company may not be able to sustain their operations if this continues for very long and the Government may have to provide significant financial support for the same. He observed that unless the power purchase cost is optimized, the two trajectories of growth of APDCL namely the real and the normative, will always be divergent. Also, the approach adopted for depiction of capital grants and subsidies as income of the Company should be revisited by the Government. The member further added that some stateof-the-art software is required for monitoring and planning of the power purchase, which the Committee has recommended at several earlier instances. The committee members also stated that APDCL should carry out a pragmatic manpower planning and the recruitment (which is currently being done by the State Government), should be taken up as per the planning. Regarding safety, CAC has formulated a safety management policy which has already been placed by APDCL before the APDCL Board for approval. The member also observed that APDCL has been taking steps for reduction of distribution loss, but it will take some time and requires further investment.

Regarding AEGCL, the SAC member pointed out that the 54 paise transmission charge claimed in Tariff petition, if calculated as per actual balance sheet, will be much lower and observed that 54 paisa itself is on the higher side as a hike of 17 paisa in transmission charge has been claimed in two years. The members enquired whether proper load flow study is being done while planning for new substations. This matter has already been raised in earlier meetings and the evacuation planning needs to be done in co-ordination with APDCL and should not only be based on theoretical studies. The matter was raised in the context of 400 KV substation being constructed by AEGCL at Rangia (Tamulpur), which is a huge investment. Another issue to be dealt with by AEGCL is voltage management at grid substations. AEGCL should refer to the list of substations submitted in earlier meeting which registered low voltage and submit a substation-wise report on what action has been taken to resolve the issues at those substations along with the expected timeline of completion. Reference was made to BCPL, which is connected to the grid but have been facing grid disturbances which causes their system to collapse and face huge losses. The issue observed is that the Behiating substation of AEGCL has two transformers running in parallel with unequal impedances, which

causes the system to trip. BCPL has offered to pay for the technical equipments required to be installed at the AEGCL substation so as to run the transformers in isolation for the time being and the member commented that AEGCL must accept the fund. Hon'ble Chairperson intervened and requested the members to confine the discussions to tariff matters only. He assured that a separate meeting will be held to discuss regarding matters of infrastructure and projects.

With regards to APGCL, the SAC member pointed out that the cost of power is highest as compared to other sources of power for APDCL because of which they also cannot afford to buy all power from APGCL. Therefore, the government as well as APGCL should devise some strategy, without which the company might suffer in future. APGCL should aim to reduce the auxiliary power consumption and station heat rate to bring down their cost of generation. Further, APGCL's balance sheet shows a surplus, considering which, they should endeavour to reduce the tariff.

SAC member enquired as to why the solar consumers should opt for TOD tariff and how will they be benefited. MD, APDCL replied that they can take benefit of the solar TOD tariff by shifting their load to off-peak period when tariff is lower. MD, APDCL also informed that whoever opts for TOD, the company will install smart meters free of cost.

SAC members enquired regarding the rebate to the smart meters consumers, a point already raised earlier in the discussion, to encourage consumers to go for smart meters. APDCL stated that since smart meter installation is only around 50%, the full picture is not yet clear. However, the Honb'le Commission or the government may allow rebate, in which case, the consumers will be benefited. The members commended APDCL for their achievement in being one of the top Discoms in installation of smart meters in the country.

Another point raised by a learned member was that APDCL has projected the power purchase is going to go up by 8% whereas the revenue is going to go up by only 4%. MD, APDCL clarified that the demand is projected to go up by 8% and they are arranging low cost power to achieve the 4% increase in revenue. One of the members enquired regarding the means how APDCL proposes to bridge the gap of Rs 357 Cr shown by APDCL. MD, APDCL stated that they are hoping to bridge the gap from green premiums, efficiency gain, etc and hence has not proposed any hike in tariff. The member stated that any increase in losses on part of AEGCL and increase in cost of generation of APGCL is eventually loaded on APDCL

and hence the consumers, and this vicious cycle continues. Hence, AEGCL and APGCL should also be mindful of this fact and make best efforts to reduce their cost.

SAC member raised a query regarding levy of FPPPA the last year. MD, APDCL informed that the sudden rise in fuel prices in FY 2023-24 has been recovered through tariff and additional subsidy given by the government to the domestic consumers. He further stated that last year no FPPPA was levied. One of the members suggested that whenever APDCL recovers FPPPA, the FPPPA should be shown as a separate tariff item in the respective petition. APDCL clarified that since there was no FPPPA, therefore, it has not been shown in the petition. Also, since FPPPA was merged with the tariffs earlier, hence these could not be shown separately.

Regarding extension of the peak hours from 5-10 pm to 5-12 pm, the Committee enquired whether the decision was backed by statistics. Further concern was also raised on the impact it will create on the student community and their households, owing to TOD tariff and the extended peak period. The member also suggested that domestic consumers should be given relief and the TOD rates should be graded instead of being flat. MD, APDCL clarified that the peak hours has been proposed considering the last 2-3 years of consumption pattern where peak in summers has gone up to 2 am. However, the Commission and the Committee may discuss and recommend on the matter. He also added that TOD tariff is optional in nature and the consumers may or may not opt for the same. Also, its applicable to consumers having load >10 kW, which leaves out most of the domestic consumers. One of the members added that if the peak hours are increased, then industries' operations will shift from 10 pm to 2 am and that impact should also be studied. Another member enquired as to whether an industry such as tea, Coffee, etc will also be given the option to choose between new TOD and normal tariff. MD, APDCL remarked that the shift may be possible from this new TOD to the earlier scheme.

A SAC member enquired if APDCL has adopted all existing methods for loss reduction, taking examples from other peer states who succeeded to contain their losses. MD, APDCL informed the SAC that they are adopting best practices followed by other discoms of which some have already been implemented and some are in implementation stage like smart meters which have been installed to reduce the commercial losses, the upgradation of lines for the technical losses, etc. But to reach the ideal scenario of 1:1, massive investment shall be required as they are currently at 2.8:1. So, the steps are being gradually taken up. To

another query as to whether APDCL has the technology to determine the losses feeder-wise. MD, APDCL replied that they are doing it at present and especially when smart meters will be completely installed, they will be able to pin-point the energy drainage. One of the members observed that AEGCL plays a vital role in reducing the technical losses and such efforts have been made through installation of capacitors. However, he expressed concern as to whether these have been done after technical studies. He remarked that if AEGCL takes steps to maintain the voltage to APDCL, around 33-36 kV, further loss reduction will be possible. The member also enquired if AEGCL has benchmarked their losses with their peers. The Committee also expressed concern regarding the viability of investment has been checked since it is a public investment. AEGCL mentioned that the losses can be reduced by increasing the number of injection points (with PGCIL, etc.) and by reducing the length of transmission lines, which is the main reason for voltage drop. Example was cited of BTPS which is getting power from NTPC and PGCIL, but it is transmitted to Rangia through a 160km long line. 400 kV Rangia (Tamulpur) GSS which is coming up will be directly fed from PGCIL, which will improve the voltage profile manifold. The members suggested that load flow study should be carried out for better assessment. AEGCL informed the SAC that the load flow study has already been carried out by AEGCL and they are doing it regularly. The results are forwarded to CEA which are then verified by the central agency. It is only after approval was granted, the projects are implemented. AEGCL further informed that the current load is around 2600 MW and this is projected to increase to almost 5000 MW in 2030. A major share of this comes from the refineries connecting with the grid, as mandated by the central government policy and without the 400 kV substations being constructed at Rangia (for lower Assam), Sonapur (for central Assam) and Khumtai (for upper Assam), AEGCL will not be able to cater to such demand. The Committee also asked regarding installation of reactors at such substations to which, AEGCL responded in the affirmative to maintain the stability of the entire grid.

SAC Member appreciated APDCL for introducing the TOD mode of determining tariff basically for the industrial consumers. He stated that it is a win win situation for both the Discom and the consumer. He also mentioned that industries can take advantage of the night charge of tariff which is lower than normal tariff. The member added that the TOD mode of tariff determination will be beneficial for the upcoming industries to be established after Advantage Assam 2.0 initiative and the solar power consumption will increase even further with such industries. Hence, APDCL may look into increasing the TOD relief from 20% to 30% in order to encourage more participation. Further, he enquired regarding the plan for

absorption of the peak solar generation during the day time in the upcoming future, which will be quite significant.

MD, APDCL replied that as the things will unfold in future, the strategy would change and there may be a separate tariff slab for the peak solar during day hour which may be even more subsidised.

SAC member enquired that since massive industrialization is upcoming in the next 5 years, will increase the consumption of electricity and whether in that situation the tariff rate will go down. In reply to this MD, APDCL stated that it will depend upon the costs of the power at that time. The member also enquired regarding commissioning of Lower Kopili Hydro Electric Project (LKHEP). MD, APGCL replied that it will be commissioned in June, 2025 and generation will start from the month of August-September.

In reply to the query of a SAC member regarding estimated load consumption of Jal Jeevan Mission and Agricultural sector, MD, APDCL stated that exact load consumption of Jal Jeevan Mission cannot be determined at this stage but agricultural connections are almost 20,000 as they might be using power from the domestic connection for agricultural purposes. The Committee suggested that for more connections from departments such as irrigation, public health etc. would help increase the revenue of APDCL and the discom should pursue the matter with these departments.

A SAC member enquired regarding the Capex plan for SLDC for modernization of infrastructure. SLDC replied that a proposal for backup SLDC building which is mandated under national critical infrastructure, upgradation of existing and cyber security related infrastructure and several others have been included in the petition. The member raised a query if APGCL has completely written off NTPS, as no capex plan has been observed. MD, APGCL replied that as soon as the Lower Kopili Hydro Electric Project starts generation, then the old unit of NTPS will be shut down. SAC member suggested that gas based generating stations must be operated simultaneously along with solar generation. SAC members also discussed about feasibility of wind and other renewable powers in Assam in future.

### Agenda Item No- 4: Future RE trajectory for the state-

Thereafter, MD, APDCL gave a presentation of RE trajectory in the state of Assam. The presentation focused on the 5-Year Renewable Energy (RE) Trajectory of Assam Power

Distribution Company Ltd. (APDCL), aligning with the Assam Renewable Energy Policy (AREP)-2022 and the Assam Integrated Clean Energy Policy-2025. The key emphasis was on achieving renewable energy generation targets by 2027 and beyond i.e upto 2030. As per **Assam Renewable Energy Policy (AREP)-2022** the State shall strive to achieve 1200 MW by 2027. In addition to that, Govt. of Assam declared an ambitious project of "Mukhya Mantri Souro Shakti Prokolpo" for installation of 1000 MW in free Govt. lands. At present, the total Installed Capacity (On-Grid & Off-Grid) of APDCL is 308 MW. The presentation also highlighted the status of ongoing and projects in pipeline of renewable projects in Assam.

SAC Member recommended that the release of subsidy to the consumers who have installed solar panels under PM Suryaghar scheme must be expedited which would attract more consumers to fall in line as presently there are only around 7000 consumers. He also pointed out that some key questions need to be addressed considering the expansion of renewables, also envisaged during the Advantage Assam 2.0, in the State which include whether we have skilled manpower, energy absorption capacity and land release policy. He stated that in conjunction with the Global Environment Facility (GEF), he urged that the State must take the opportunity to increase the green energy footprint, which is the future. Further, regarding the T&D Losses, Member recommended that adoption of UG cables instead of overhead lines will help reduction in unauthorized connections and pilferage and need to be explored.

SAC Member also enquired about the participation of private players in Small Hydro Electric Plants in the State. MD, APDCL mentioned that the standard policy guidelines of Government are there which has to be followed for any private players to construct a SHP.

SAC member queried as to the process or prescribed guidelines for disposal of the solar panels to address the pollution issue after the end of useful life of the huge number of Solar Panels installed under various schemes. In this regard MD, APDCL stated that there are some standard guidelines of Government which are evolving over time. SAC member from FINER added that Central Pollution Control Board (CPCB) has already formulated policy for the seven (7) categories of e-waste covering 132 items where solar panels are also included as per E-waste Management Rules, 2024.

SAC Member from FINER enquired about the recent announcement in Advantage Assam 2.0 regarding 3000 MW solar panels .MD, APDCL clarified that it the step taken by the GoA to manufacture solar panel upto 3000 MW capacity in Assam.

SAC Member from AEDA stated that in green energy policy and renewable energy policy the role of AEDA is not specified, however they are the nodal agency for small and Off-Grid power plants under MNRE. They added that they could help develop skilled manpower in the State. Hon'ble Chairperson, AERC suggested that AEDA may bring out a policy paper regarding the matter.

There was no other matter discussed.

The meeting ended with the vote of thanks from the Chair.

Sd/-

Secretary,

Assam Electricity Regulatory Commission

# ANNEXURE- 1A: List of Members & Special Invites present at 35<sup>th</sup> Meeting of SAC

### LIST OF MEMBERS & SPECIAL INVITEES PRESENT

### Members

- 1. Kumar Sanjay Krishna, IAS (Retd), Chairperson, AERC
- 2. Shri Alokeswar Bhattacharyya, Member (Law), AERC
- 3. Shri Syed M.D Zahid Chistie, Addl. Secretary, Power (E) Department, GoA
- 4. Shri Dipak Kr. Bora, Jt. Secretary, Department of Finance, Assam Sachivalaya, GoA
- 5. Shri Subodh Sharma, Consumer Activist
- 6. Shri Abhijit Sharma, Secretary. ABITA
- 7. Shri Amarendra Goswami, Electrical Consultant, Retd SE
- 8. Shri Champak Barua, Ex-Member, Technical, APDCL
- 9. Dr. Chitralekha Mahanta, Professor, IIT Guwahati, E & E Eng. Department
- 10. Dr. Satyajit Bhuyan, Professor, AEC
- 11. Dr. Aditya Bihari Kandali, Principal (I/C), Department of Electrical Engineering, JIST
- 12. Shri Jojneswar Sharma, Ex DG Ministry of Defense
- 13. Dr. Jaideep Baruah, Director, AEDA
- 14. Shri Dilip Kr. Sarma, Retd. ED, PGCIL
- 15. Dr. Bhupati Das, Ex MD, NRL
- 16. Shri Nikunja Borthakur, Sr. CGM, NRL
- 17. Shri Saurabh Agarwal, Chairman Power, FINER

### SPECIAL INVITEES

- 1. Shri Rakesh Kumar, IAS, Managing Director, APDCL
- 2. Shri Biswajit Pegu, Managing Director, AEGCL
- 3. Shri Bibhu Bhuyan, Managing Director, APGCL

### **OFFICERS FROM APDCL. AEGCL & APGCL**

### APDCL

- 1. Shri Jagadish Baishya, CGM (Com), APDCL
- 2. Shri Rajiv Kr. Gogoi, GM(PP), APDCL
- 3. Shri Rupranjan Kalita, GM, APDCL
- 4. Shri Indrajit Tahbildar, DGM, APDCL
- 5. Shri Rupjyoti Borah, DGM, APDCL
- 6. Mrs Ronkita Baruah, AGM, APDCL
- 7. Shri Paragjyoti Kalita, AGM, APDCL
- 8. Shri Udayan Dutta, DM, APDCL
- 9. Shri Adity Bora, AM, APDCL

### AEGCL and SLDC

- 1. Shri Balabanta Basumatary, CGM, AEGCL
- 2. Mrs Jayashree Devi, CGM (PP&D) AEGCL
- 3. Mrs Toushita Jigdung, DGM, SLDC, AEGCL
- 4. Shri Debasish Paul, AGM, AEGCL
- 5. Mrs Dipmani Nath, AM, AEGCL

### <u>APGCL</u>

- 1. Md. Zakir, CGM, APGCL
- 2. Mrs Aklantika Saikia, DGM, APGCL
- 3. Mrs Pinky Deb, DGM, APGCL
- 4. Shri Pankaj B Sarmah, AGM, APGCL

### **OFFICERS FROM AERC**

- 1. Shri Ashok Kumar Barman, IAS (Retd), Secretary.
- 2. Ms. Panchamrita Sharma, Joint Director (T & RA),
- 3. Shri Nipen Kr. Deka, Joint Director (Engg.)
- 4. Shri Jayjeet Bezbaruah, Deputy Director (Gen, PPA, P&P)
- 5. Mrs Jharna Devi, Deputy Director (Engg.)
- 6. Shri Kishore RajKumar, Assistant Director (IT)
- 7. Mrs Punam Rabha, Assistant Director (Tariff)
- 8. Shri Dibbyajyoti Sarma, PS to Member, (Technical)
- 9. Shri Bikash Deep Baruah, PS to Member, (Law)

### **Annexure 2- Station Wise Depreciation**

### Depreciation for NTPS (Rs. Crore)

		FY 2	2023-24		FY 2	2024-25		FY	2025-26		FY 2	2026-27		FY	2027-28		FY	2028-29		FY	2029-30	
Sr. No.	Particulars	Opening GFA	Add. of GFA	Dep.																		
1	Land	9.71	-	-	9.71	-	-	9.71	-	-	9.71	-	-	9.71	-	-	9.71	-	-	9.71	-	0.00
2	Building	11.18	0.10	0.00	11.28	-	0.00	11.28	-	0.00	11.28	-	0.00	11.28	-	0.00	11.28	-	0.00	11.28	-	0.00
3	Hydraulic works	0.04	-	0.00	0.04	-	0.00	0.04	-	0.00	0.04	-	0.00	0.04	-	0.00	0.04	-	0.00	0.04	-	0.00
4	Other civil works	26.35	-	0.95	26.35	-	0.95	26.35	-	0.95	26.35	-	0.95	26.35	-	0.95	26.35	-	0.95	26.35	-	0.95
5	Plant & machinery- Gas	97.85	-	0.18	97.85	1.95	0.23	99.79	-	0.28	99.79	-	0.28	99.79	-	0.28	99.79	-	0.28	99.79	-	0.28
6	Plant & machinery- Hydel	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
7	Lines & cables	1.95	-	0.10	1.95	-	0.10	1.95	-	0.10	1.95	-	0.10	1.95	-	0.10	1.95	-	0.09	1.95	-	0.00
8	Vehicle	0.45	-	-	0.45	-	-	0.45	-	-	0.45	-	-	0.45	-	-	0.45	-	-	0.45	-	0.00
9	Furniture	1.66	0.11	0.04	1.77	-	0.05	1.77	-	0.05	1.77	-	0.05	1.77	-	0.05	1.77	-	0.05	1.77	-	0.05
10	Other office equipment	4.22	2.53	0.28	6.75	-	0.36	6.75	-	0.36	6.75	-	0.36	6.75	-	0.36	6.75	-	0.36	6.75	-	0.36
11	Roads on land belonging to others	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
12	Capital spares at Generating Stations	41.46	-	-	41.46	-	-	41.46	-	-	41.46	-	-	41.46	-	-	41.46	-	-	41.46	-	0.00
13	Intangible Assets	-	0.83	0.06	0.83	-	0.12	0.83	-	0.12	0.83	-	0.12	0.83	-	0.12	0.83	-	0.12	0.83	-	0.06
14	Total	194.86	3.57	1.62	198.43	1.95	1.82	200.37	-	1.87	200.37	-	1.87	200.37	-	1.87	200.37	-	1.85	200.37	-	1.70

### Depreciation for LTPS (Rs. Crore)

		FY :	2023-24		FY	2024-25		FY	2025-26		FY	2026-27	,	FY	2027-28		FY 2028-29			FY	2029-30	,
Sr. No.	Particulars	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.
1	Land	4.75	-	-	4.75	-	-	4.75	-	-	4.75	-	-	4.75	-	-	4.75	-	-	4.75	-	0.00
2	Building	32.21	-	1.08	32.21	-	1.08	32.21	-	1.08	32.21	-	1.08	32.21	-	1.08	32.21	-	1.08	32.21	-	1.08
3	Hydraulic works	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
4	Other civil works	41.53	0.04	1.46	41.58	1.63	1.49	43.21	-	1.52	43.21	-	1.52	43.21	0.23	1.52	43.44	-	1.53	43.44	-	1.53
5	Plant & machinery- Gas	306.48	0.33	16.19	306.80	8.18	12.97	314.98	-	2.26	314.98	5.90	2.42	320.88	1.46	2.61	322.34	-	2.65	322.34	-	2.65
6	Plant & machinery- Hydel	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
7	Lines & cables	9.29	-	0.49	9.29	-	0.49	9.29	-	0.49	9.29	-	0.49	9.29	-	0.49	9.29	-	0.49	9.29	-	0.31
8	Vehicle	0.24	-	-	0.24	-	-	0.24	-	-	0.24	-	-	0.24	-	-	0.24	-	-	0.24	-	0.00
9	Furniture	0.64	0.12	0.02	0.76	-	0.02	0.76	-	0.02	0.76	-	0.02	0.76	-	0.02	0.76	-	0.02	0.76	-	0.02
10	Other office equipment	5.67	2.77	0.43	8.44	-	0.52	8.44	-	0.52	8.44	-	0.52	8.44	-	0.52	8.44	-	0.52	8.44	-	0.52
11	Roads on land belonging to others	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
12	Capital spares at Generating Stations	114.93	-	-	114.93	-	-	114.93	-	-	114.93	-	-	114.93	-	-	114.93	-	-	114.93	-	0.00
13	Intangible Assets	-	1.80	0.13	1.80	2.92	0.49	4.72	-	0.71	4.72	-	0.71	4.72	-	0.71	4.72	-	0.71	4.72	-	0.57
14	Total	515.74	5.06	19.81	520.80	12.73	17.06	533.53	-	6.60	533.53	5.90	6.75	539.43	1.69	6.95	541.11	-	6.99	541.11	-	6.67

		FY 2	2023-24		FY	2024-25		FY	2025-26		FY 2	2026-27		FY	2027-28		FY	2028-29		FY	2029-30	
Sr. No.	Particulars	Opening GFA	Add. of GFA	Dep.	Opening GFA	Add. of GFA	Dep.															
1	Land	4.40	-	-	4.40	-	-	4.40	-	-	4.40	-	-	4.40	-	-	4.40	-	-	4.40	-	0.00
2	Building	16.72	-	0.58	16.72	-	0.58	16.72	-	0.58	16.72	-	0.58	16.72	-	0.58	16.72	-	0.58	16.72	-	0.58
3	Hydraulic works	161.15	-	8.58	161.15	-	8.58	161.15	-	8.58	161.15	-	8.58	161.15	-	8.58	161.15	-	6.39	161.15	-	0.00
4	Other civil works	99.42	-	3.43	99.42	0.90	3.45	100.32	9.06	3.61	109.38	1.33	3.79	110.71	4.01	3.88	114.73	-	3.94	114.73	-	3.94
5	Plant & machinery- Gas	-	-	-	-	12.95	0.34	12.95	-	0.68	12.95	-	0.68	12.95	-	0.68	12.95	-	0.68	12.95	-	0.68
6	Plant & machinery- Hydel	172.49	4.03	9.38	176.52	-	9.49	176.52	2.49	9.55	179.01	0.96	9.64	179.97	1.10	9.70	181.07	2.00	9.78	183.07	-	0.78
7	Lines & cables	31.71	-	1.72	31.71	-	1.72	31.71	-	1.72	31.71	-	1.72	31.71	-	1.72	31.71	-	0.19	31.71	-	0.00
8	Vehicle	0.29	-	-	0.29	-	-	0.29	-	-	0.29	-	-	0.29	-	-	0.29	-	-	0.29	-	0.00
9	Furniture	0.13	0.10	0.01	0.23	-	0.01	0.23	-	0.01	0.23	-	0.01	0.23	-	0.01	0.23	-	0.01	0.23	-	0.01
10	Other office equipment	6.15	2.36	0.08	8.51	-	0.54	8.51	-	0.54	8.51	-	0.54	8.51	-	0.54	8.51	-	0.54	8.51	-	0.54
11	Roads on land belonging to others	0.28	-	0.01	0.28	-	0.01	0.28	-	0.01	0.28	-	0.01	0.28	-	0.01	0.28	-	0.01	0.28	-	0.01
12	Capital spares at Generating Stations	18.76	-	-	18.76	-	-	18.76	-	-	18.76	-	-	18.76	-	-	18.76	-	-	18.76	-	0.00
13	Intangible Assets	-	1.83	0.14	1.83	3.01	0.50	4.84	-	0.73	4.84	-	0.73	4.84	-	0.73	4.84	-	0.73	4.84	-	0.59
14	Total	511.49	8.33	23.93	519.82	16.86	25.22	536.68	11.55	26.02	548.23	2.29	26.28	550.52	5.11	26.42	555.64	2.00	22.86	557.64	-	7.14

### Depreciation for KLHEP (Rs. Crore)

		FY :	2023-24		FY	2024-25		FY	2025-26		FY	2026-27		FY :	2027-28		FY :	2028-29		FY :	2029-30	
Sr. No.	Particulars	Opening GFA	Add. of GFA	Dep.																		
1	Land	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
2	Building	1.07	-	0.04	1.07	-	0.04	1.07	-	0.04	1.07	-	0.04	1.07	-	0.04	1.07	-	0.04	1.07	-	0.04
3	Hydraulic works	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
4	Other civil works	24.44	-	0.82	24.44	-	0.82	24.44	-	0.82	24.44	-	0.82	24.44	-	0.82	24.44	-	0.82	24.44	-	0.82
5	Plant & machinery- Gas	243.55	-	13.03	243.55	-	13.03	243.55	0.54	13.04	244.09	12.81	13.40	256.90	7.78	13.94	264.68	-	14.14	264.68	-	14.14
6	Plant & machinery- Hydel	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
7	Lines & cables	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
8	Vehicle	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
9	Furniture	0.04	0.02	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00
10	Other office equipment	3.40	1.13	0.25	4.54	-	0.29	4.54	-	0.29	4.54	-	0.29	4.54	-	0.29	4.54	-	0.29	4.54	-	0.29
11	Roads on land belonging to others	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
12	Capital spares at Generating Stations	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
13	Intangible Assets	-	1.19	0.09	1.19	2.10	0.16	3.29	-	0.32	3.29	-	0.32	3.29	-	0.32	3.29	-	0.32	3.29	-	0.32
14	Total	272.50	2.35	14.22	274.84	2.10	14.33	276.94	0.54	14.50	277.48	12.81	14.85	290.29	7.78	15.40	298.07	-	15.60	298.07	-	15.60

### Depreciation for LRPP (Rs. Crore)

		FY :	2023-24		FY :	2024-25		FY	2025-26		FY :	2026-27		FY	2027-28		FY	2028-29		FY :	2029-30	
Sr. No.	Particulars	Opening GFA	Add. of GFA	Dep.																		
1	Land	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
2	Building	149.83	-	5.00	149.83	-	5.00	149.83	-	5.00	149.83	-	5.00	149.83	-	5.00	149.83	-	5.00	149.83	-	5.00
3	Hydraulic works	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
4	Other civil works	81.31	-	2.72	81.31	-	2.72	81.31	1.87	2.75	83.17	-	2.78	83.17	-	2.78	83.17	0.52	2.79	83.69	-	2.80
5	Plant & machinery- Gas	478.87	0.12	25.29	478.99	-	25.29	478.99	1.25	25.32	480.24	0.21	25.36	480.46	-	25.37	480.46	-	25.37	480.46	-	25.37
6	Plant & machinery- Hydel	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
7	Lines & cables	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
8	Vehicle	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
9	Furniture	0.08	-	0.00	0.08	-	0.00	0.08	-	0.00	0.08	-	0.00	0.08	-	0.00	0.08	-	0.00	0.08	-	0.00
10	Other office equipment	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00	0.06	-	0.00
11	Roads on land belonging to others	-	-	-	-	-	-	-	-	-	0.00	-	-	-	-	-	-	-	-	-	-	0.00
12	Capital spares at Generating Stations	18.81	-	0.99	18.81	-	0.99	18.81	-	0.99	18.81	-	0.99	18.81	-	0.99	18.81	-	0.99	18.81	-	0.99
13	Intangible Assets	-	-	-	-	2.96	0.22	2.96	-	0.44	2.96	-	0.44	2.96	-	0.44	2.96	-	0.44	2.96	-	0.44
14	Total	728.96	0.12	34.01	729.08	2.96	34.23	732.04	3.11	34.52	735.15	0.21	34.59	735.37	-	34.60	735.37	0.52	34.60	735.89	-	34.61

### Depreciation for NRPP (Rs. Crore)

### Annexure 3A- Revised Capital Expenditure plan FY 2024-25

### Revised Capital Expenditure plan approved for NTPS for FY 2024-25

SI. No.	Description of Works	Claimed for APR Amount (Lakhs)	Approved for APR Amount (Lakhs)	Remarks
1	30 M high Mast Lighting System (complete set)	17.00	12.00	As no relevant supporting documents have been provided by APGCL, it is provisionally allowed as per last approval. During the time of true-up, the reason for escalation must be submitted along with board approval and relevant supporting documents.
2	Renovation of damaged sludge removing system of water clariflocculation system at Dillighat water Intake for the purpose of better water treatment	16.15	16.15	No cost overrun hence allowed
3	Renovation of damaged drinking water supply pipeline from DM Plant to WHP residential colony & officers colony at Pahar line	12.00	12.00	No cost overrun hence allowed
4	Construction of dedicated 2 (two) nos. of 33 KV APGCL Bay at 220 KV GSS, AEGCL, Namrup	160.00	154.61	Allowed as per board approval submitted
	TOTAL	205.15	194.76	

### Revised Capital Expenditure plan approved for LTPS for FY 2024-25

SI. No.	Description of Works	Claimed for APR	Approved for APR	Remarks
		Amount (Lakhs)	Amount (Lakhs)	
1	Overhauling of HPBFP with mandatory spares	240.00	140.00	Allowed as per last approval, however petitioner is directed to provide relevant documentary evidence to support its claim at the time of True Up.
2	Procurement and installation and commissioning of 132 KV SF6 Breaker(05 nos),spring charge mechanism along with upgradation of Control Panel.	350.00	350.00	No cost escalation proposed hence allowed. APGCL is directed to submit the board approval at the time of True Up.
3	Major overhauling of Generator transformer ,7.5 MVA 132/3.3 KV station transformer 1&2	79.00	20.00	As no relevant supporting documents have been provided by APGCL, it is provisionally allowed as per last approval. The Commission directs the submission of reasons for escalation, accompanied by board approval and relevant supporting documents. As this work was initially approved for the fiscal year 2023-24 but has extended into the fiscal year 2024-25, the Commission may be constrained to disallow the cost overrun if there is a lack of proper justification and supporting documents at the time of the true-up.
4	Procurement of Intake Pump	80.00	25.00	Provisionally allowed as per last approved. During the time of true- up, the reason for cost escalation must be submitted along with relevant supporting documents.
5	Up-gradation of illumination system of WHRP.	10.00	10.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.

SI. No.	Description of Works	Claimed for APR Amount (Lakhs)	Approved for APR Amount (Lakhs)	Remarks
6	Procurement, erection, testing and commissioning of High Mast Tower for illumination in the entire Ph-II Power House and Switchyard area. 4 (Four) No.s	60.00	60.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.
7	Procurement of upgraded lubricating system for gas compressor (Xperlube system)	125.00	125.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.
8	Revamping of existing natural gas & water coolers of GC-6,7,8	88.00	88.00	Allowed as per board approval submitted by APGCL
9	Deep tube well water supply system inside th epower plant at LTPS, Maibella (Including boring, supplying, and fitting of pump set up with all pipeline and fittings, construction of filter chamber and supply of all filter materials.)	30.00	30.00	Allowed as per board approval submitted by APGCL
10	Renovation of children park and construction of surrounding drain along with cover slabs at LTPS, Maibella	20.00	16.83	Board has approved Rs. 16.83 lakhs for this work against the estimated price of Rs.20.97 lakhs and the same is being allowed.

SI. No.	Description of Works	Claimed for APR	Approved for APR	Remarks
		Amount (Lakhs)	Amount (Lakhs)	
11	Renovation of water supply pipelines and all fittings at LTPS residential colony and Power Plant	30.00	10.00	<ul> <li>As per the board approval submitted by APGCL, Rs. 16.83 lakhs was approved by the board for the following works:</li> <li>1. Renovation of water supply pipelines and all fittings at the LTPS residential colony and Power Plant.</li> <li>2. Repair of the water pump house building and development of the</li> </ul>
12	Repairing of water pump house building, development of surrounding areas of water supply system of LTPS	7.00	7.00	surrounding areas of the water supply system of LTPS. Additionally, Rs. 17 lakhs was approved by the Commission for these two works, whereas APFCL in this petition is proposing Rs. 30 lakhs and Rs. 7 lakhs for the two heads, respectively. As per the supporting documents submitted by APGCL, the previously approved amount is being allowed. During the time of true-up, the reason for escalation must be submitted along with revised board approval and relevant supporting documents.
13	Development of boundary walls around LTPS Colony	20.00	20.00	This was initially approved for FY 2023-24 in the TO of June 2024. APGCL was supposed to complete it within the stipulated time but failed to do so, and has proposed this work for FY 2024-25. It is provisionally allowed as per approval, but the Commission may be constrained to disallow any cost overrun during the true-up for FY 2024-25.
14	Repairing of Adminstrative office building of LTPS	15.00	15.00	Allowed as per last approval.

SI. No.	Description of Works	Claimed for APR	Approved for APR	Remarks					
SI. NO.	Description of works	Amount (Lakhs)	Amount (Lakhs)						
15	Construction of paver block road from main road infront of army canteen to newly constructed multi storied building inside LTPS residential colony.	35.00	20.71	In the TO dated March 21, 2022, Rs. 25 lakhs was approved for FY 2022-23 under this head. During the True Up for FY 2022-23, APGCL proposed Rs. 35 lakhs against this head with cost escalation for FY 2023-24, but only Rs. 25 lakhs was approved. Now, during the True Up for FY 2023-24, APGCL has claimed Rs. 4.29 lakhs against the approved amount, which is being allowed. APGCL is again proposing Rs. 35 lakhs for FY 2024-25 for the same work. The board approval submitted by APGCL is for multiple civil works and exact cost approved for construction of pavor bolck can not be verified. The approved amount in the past order, excluding the Rs. 4.29 lakhs (allowed for True up FY 2023-24) is being allowed. APGCL is directed to submit proper justification with supporting documents which clearly indicate the cost approved by Board against this work at the time of the true-up.					
16	Layout of LTPS Plant with supply of all proper drawings	6.00	6.00	This was initially approved for FY 2023-24 in the TO of June 2024. APGCL was supposed to complete it within the stipulated time but failed to do so and has proposed this work for FY 2024-25. It is provisionally allowed as per approval, but the Commission may be constrained to disallow any cost overrun during the true-up for FY 2024-25.					
17	Providing of boundary fancing for the residential quarters of LTPS	37.88	37.88	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					
18	ERP Implementation	292.00	292.00						
	TOTAL	1524.88	1273.42						

### Revised Capital Expenditure plan approved for KLHEP for FY 2024-25

SI. No.	Description of Works	Claimed for APR	Approved for APR	Remarks					
		Amount (Lakhs)	Amount (Lakhs)						
1	Spare for Inspection & Reparing of KLHEP units	40.00	40.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					
2	Replacement of Broken Cable Tray in 220 KV Switchyard area.	60.00	20.00	As no relevant supporting documents have been provided by APGCL, it is provisionally allowed as per approval. During the time of true-up, the reason for cost escalation must be submitted along with revised board approval and relevant supporting documents.					
3	Renovation and Refurbishment of 130T EOT Crane with redesigned control system.	60.00	60.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					
4	Design, Supply and installation & Commissioning Bay Extension in the existing 220KV KLHEP Switchyard for ideal Charging of 16 MVA Bharat Bijlee make 220/33KV transformer.	100.00	100.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					
5	Upgradation of Transformer capacity and substation at KLHEP Lengery	75.00	75.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					
6	Procurement of 3 nos of generator transformer	1000.00	1000.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.					

7	Roof leakage treatment, Boundary wall and fencing, painting of penstock pipes, checking of penstock welding joints etc	40.00	40.00	This was initially approved for FY 2023-24 in the TO of June 2024. APGCL was supposed to complete it within the stipulated time but failed to do so, and has proposed this work for FY 2024-25. It is provisionally allowed as per approval, but the Commission may be constrained to disallow any cost overrun during the true-up for FY 2024-25.
8	Boundary wall around the premises, repairing of old electromechanical store etc	50.00	50.00	No cost overrun hence allowed. APGCL is directed to submit the board approval at the time of True Up.
9	ERP Implementation	301.00	301.00	
	TOTAL	1726.00	1686.00	

### Revised Capital Expenditure plan approved for LRPP for FY 2024-25

SI. No.	Description of Works	Claimed for APR Amount (Lakhs)	Approved for APR Amount (Lakhs)	Remarks
1	ERP Implementation	210.00	210.00	
	TOTAL	210.00	210.00	

### Revised Capital Expenditure plan approved for NRPP for FY 2024-25

SI. No.	Description of Works	Claimed for APR Amount (Lakhs)	Approved for APR Amount (Lakhs)	Remarks
1	ERP Implementation	296.00	296.00	
	TOTAL	296.00	296.00	

### Annexure 3B- Capital Investment Plan

#### **Capital Investment Plan Approved for LTPS**

SL	Description of Works	Estimated Cost ₹ in Lakh Approved Cost ₹ in Lakh								n Lakh		
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
Α	Electromechanical											
1	2 MW Solar PV Plant at Lakwa Thermal Power Station to reduce auxiliary consumption at LTPS	970					0					Expense to improve the efficiency of the plant. Justification provided to reduce the auxiliary consumption. Although, Rs. 9 cr is already approved in SOPD. Approval document is not provided.
2	Control Room integration of Phase-II Powerhouse and Waste Heat Recovery Project, LTPS		800					0				Petitioner in its reply to TVS has mentioned that, Board approval is attached in Annexure K. But in the same, approval for control room integration of Phase-II powerhouse and waste heat recovery project could not placed.
3	Revamping and Upgradation of the existing Fire Fighting system of LTPS		115					115				Any document related to the approval of the cost has not been provided. Although the cost is necessary for safety measures. Thus, it may be approved. Subject to presenting the document at the time of true up.
4	Revamping of the cooling system of gas compressors by replacement of the existing coolers with new Air Cooled Heat Exchangers for GC #6 and # 8.		196					0				Any document related to approval of cost is not submitted.
5	Enhancement of system reliability, safety and operational flexibility through replacement of 11 sets of old existing 132KV isolators of Phase-II power house switchyard.		90					90				Any document related to approval of cost is not submitted. Although considering the operational safety Commission has allowed the cost as claimed by the petitioner.
6	Improvement of system reliability and flexibility through upgradation of Desang		91					91				Any document related to approval of cost is not submitted.

SL	Description of Works	Estimated Cost ₹ in Lakh Approved Cost ₹ in Lakh										
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
	Intake Pump MCC Panel and UPS & Stabilizer Panel for WHRP.											
7	Procurement of Capital spares for Gas Compressors # 6,7,8 & 9		200			300		0			0	Spare material is required for servicing and repair and maintenance of compressor. Although compressor is very old and any document related to approval of cost is not provided.
8	Procurement of field instrument for Gas Compressor Units # 6 ,7,8 & 9 and aux motors of GC # 9 of LTPS.		150		90			0				cost is required to inventory management. However, any document related to approval of cost has not been submitted.
9	Procurement of LP & HP cylinder for 4RDS2 Gas Compressor		160					160				Although replacement of compressor is required for smooth operation, but any document related to approval of cost has not been submitted. Thus, it is difficult to estimate the cost of compressor.
10	Improvement of system reliability and safety through replacement of old DCDB Panels for GT unit #5, #6 and #7.		120					0				Any document related to approval of cost is not submitted.
11	Conversion of LTPS Colony existing OH 11kV network to 11kV Underground cable network of distance in various phases at, Lakwa Thermal Power Station, Maibella (LTPS), Suffry-785689, Dist. Sivasagar, Assam"		133.5	65.17	70	94.75		133.5	0	0	0	This cost does not seems very important and to be passed on to consumers. Also, very high cost has been estimated. Any document related to esimation of the cost and approval of the cost has also been not submitted.
12	Efficiency improvement through energy saving by procurement, installtion and commissioning of Stepless Capacity Control system in the Gas Compressors of Ph-II powerhouse of LTPS.			499					0			Cost cost has been proposed to reduce the auxiliary consumption. Although the compressor is also very old and technical feasibility has also been not assesed for installation of stepless capacity control system. Any document related to approval of cost has also been not submitted.
13	Up-gradation of Generator Control & Protection Panels of GT Unit # 5 of 3 X 20MW, Ph-II powerhouse (1 unit in first phase) for improvement of system reliability and safety.			150					0			Any document related to approval of cost is not submitted.

SL			Estima	<mark>ited Cost ₹</mark> i	n Lakh			Approv	ved Cost ₹ i	n Lakh		
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
14	Upgradation of the existing old 220V DC relay-based control system to new PLC- based control system (with HMI) of 24V DC configuration for all the three Dresser-Rand make gas compressors of LTPS for enhancing operational flexibility and reliability.			278					0			Any document related to approval of cost has not been submitted.
15	Procurement of spares for Gas Compressors # 6,7&8			150					0			Any document related to approval of cost has not been submitted.
16	Procurement of new starting Diesel engine of Gas Turbine unit of Ph-II powerhouse.			82					82			How it is justified to procure new diesel engine after major overhauling in the engine. However, considering the important maintenance activity, Commission has allowed the expense as claimed by the petitioner.
17	Installation of four (4) nos. of High Mast Tower Systems within LTPS premises for enhanced security and illumination.			64					64			Commission observes that, the mast should have been included in the original scope of work only. Also, petitioner has not provided any relevant document for the approval of cost. However, considering mast as an important part of power house, Commission approved the cost as claimed by the petitioner.
18	Supply, Fabrication, Erection, Testing and Commissioning of 2 nos 12" gas Pipe Line along with Valves, Flanges and all accessories including laying of 10 KM Pipe Line from Lakwa Terminal to LTPS.			7800					0			It is difficult to do prudency check of the cost proposed herewith. Also any document related to approval of cost is not attcahed. Seeing the safety concern, this cost may be approved subject to decapitalisation of old asset.
19	Improvement of efficiency through reduction in auxiliary power consumption by replacement of various old auxiliary motors by energy efficient motors for Ph-II powerhouse				25	25			0	0		Cost to reduce the aauxiliary consumption can not be burdened on consumers.
20	Procurement of field instruments for Gas Turbine Unit#7 of LTPS.				70				0			overhauling of Unit #7 of LTPS has already been done in previous year. Thus, how the replacement of spare

SL	Description of Works											
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
												parts are justified in such short span of time? Also, any plan for the repacement of old faulty spares have not been provided. Any document related to approval of cost has also not been provided.
21	Procurement of field instruments for Gas Turbine Unit#5 of LTPS.					70				0		overhauling of Unit #5 of LTPS has already been done in previous year. Thus, how the replacement of spare parts are justified in such short span of time? Also, any plan for the repacement of old faulty spares have not been provided. Any document related to approval of cost has also not been provided.
22	Procurement of LP cylinder for 4 RDS2 Gas Compressor					150				0		Any document related to approval of cost has not been provided.
23	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5	0	0	0	0	0	The office expenses are already included in O&M expenses. Then what is the requirement of additional capex to be passed on to consumers.
	Electromechanical Subtotal	982.5	2068	9100.67	267.5	652.25	0	589.5	146	0	0	
В	Civil											
24	Construction of Two storied school building for upgradation of classes upto 12th standard at LTPS, APGCL	807.63					0					How it is justified to claim such a huge amount in construction work. Not a mandate cost to be passed on to the consumers. Any document related to approval of cost has not been provided.
25	Renovation of Playground of Lakwa Thermal Power Station, Maibella.		537					0				How it is justified to claim such a huge amount in construction work. Not a mandate cost to be passed on to the consumers. Any document related to approval of cost has not been provided.
26	Laying of new water pipeline with pipe support and construction of pump house for water supply to upper colony area at LTPS, Maibella.			22.9					22.9			Essentially of O&M nature. Any document related to approval of cost has not been provided.

SL	Description of Works	Estimated Cost ₹ in Lakh						Appro	ved Cost ₹ i			
NO	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
27	Construction of car parking at Multi Storied Building.				25.3					0		Essentially of O&M nature. Any document related to approval of cost has not been provided.
28	Construction of footpath around boundary wall of industrial area inside LTPS, Maibella					43					0	Essentially of O&M nature. Any document related to approval of cost has not been provided.
	Civil Subtotal	807.63	537	22.9	25.3	43	0	0	22.9	0	0	
	Total	1790.13	2605	9123.57	292.8	695.25	0	589.5	168.9	0	0	

### Capital Investment Plan approved for KLHEP

SL NO	Description of Works	Estimated	d Cost ₹ i	n Lakh			Approved	d Cost ₹ in	Lakh			
SL NU	Description of works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
A	Electromechanical											
1	Replacement of existing FCB Panel of Unit#2	98.53					0					The MOM between APGCL and VHN has been attached of dtd 20.10.2022 for overhauling work. Why this has not been included in special R&M.
2	Supply, installation and commissioning of OPU oil pump along with unloader valves and other associated necessary equipments of OPU system for Unit:1 at 2*50 MW KLHEP	200					200					BOQ and approval of cost has not been submitted. The submitted MOM by petitioner is of overhauling work of Unit 2.
3	Procurement of 15 ton crane for 2X50 MW KLHEP	118										Nature of O&M expenses.
4	Supply,installation and commissioning of new SF6 breakers for SRT	26					26					MRT report attached. Nature of O&M expenses.
5	Supply,installation and commissioning of new CTs for Station Reserve Transformer(SRT) KLHEP	23					23					MRT report attached. Nature of O&M expenses.
6	Procurement of Testing Equipments for T&C APGCL	250					0					Cost approval has not been submitted.
7	Remote Monitoring System for LTPS, LRPP, KLHEP and NRPP		1200	1200				0	0			Cost approval has not been submitted.
8	Installation of High Mast Towers at Valve House		16					0				Mast tower should have been included in the original scope.

SL NO	Department of Works	Estimate	d Cost ₹ iı	n Lakh			Approved	<mark>d Cost</mark> ₹ in	Lakh			
SLINU	Description of Works	2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
												Mast tower should have been included
												in the original scope. However,
9	Installation of High Mast Towers at Dam Site(2 nos)		32					32				considering the importance of
3			52					52				installation of mast, Commission has
												allowed the expense as claimed by
												the petitioner.
												Mast tower should have been included
												in the original scope. However,
10	Installation of High Mast Towers at KLHEP		64					64				considering the importance of
	colony(4nos)											installation of mast, Commission has
												allowed the expense as claimed by
												the petitioner.
	Supply installation and commissioning of 4 nos. Of ,											BOQ and approval of cost for 4 Xmer
11	220/11 KV, 21 MVA, 1 Phase Generator Transformer		2100					0				has not been submitted. Xmer
	for KLHEP											specification attached.
												Approval of cost has not been
	Supply, Installation and Commissioning of 30W Solar											submitted.
12	Street light at KLHEP Colony and Damsite( 90 nos)		29					0				Assam Renewable Energy Policy
												2022, Government of Assam has
												been submitted.
												Approval of cost is also not submitted.
13	Supply ,installation and commissioning of 1 MW Solar		500					0				Assam Renewable Energy Policy
13	Plant at KLHEP Colony.		500					0				2022, Government of Assam is
												submitted.
14	Upgradation of existing overhead conductor & poles		700					0				Upgradation of overhead line is
14	opyradation of existing overhead conductor & poles		700					0				opgradation of overhead line is

SL NO	Description of Works	Estimate	<mark>d Cost ₹ i</mark> i	n Lakh			Approved	d Cost ₹ in	Lakh			
SL NO		2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
	with new 11KV overhead Bare conductor & steel poles											subject to submission of approval of
	from 33/11KV Suparec Sub-station to Hatidubi Dam											cost and BOQ.
												Guidline of MOP is attached.
15	Upgradation of Digital Governing System, Control System (SCADA), Excitation System and Micro- Processor Based Protection System for two units of Karbi Langpi Hydro Electric Project, Assam.			1300	1300				0	0		BOQ and approval of cost has not been submitted.
16	Supply ,installation and commissioning of new Current Transformers used for Generator protection measuring at 2*50 MW KLHEP (14 nos)			110					110			BOQ and approval of cost has not been submitted. However, considering the safety and relibility measures, Commisison has allowed the expense as claimed by the petitioner.
17	Mandatory Spares required for Generation of the KLHEP units.			300					0			BOQ and approval of cost has not been submitted.
18	Supply, installation and commissioning of OPU oil pump along with unloader valves and other associated necessary equipments of OPU system for Unit:2 at 2*50 MW KLHEP				200					200		BOQ and approval of cost has not been submitted. MoM of after Major Overhauling of Unit between APGCL and OEM VHFK/VHN Dated 08/08/2023 attched. However, considering the urgency of the work, Commission has allowed the expense as claimed by the petitioner.
19	Procurement of Forklift					20					0	Nature of O&M expenses.
20	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5	0	0	0	0		Nature of O&M expenses.
	Electromechanical Subtotal	728.03	4653.5	2922.5	1512.5	32.5	249	96	110	200	0	

SL NO	Description of Works	Estimated	d Cost ₹ ir	n Lakh			Approved	d Cost ₹ ir	Lakh			
SL NU		2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
В	Civil											
21	Renovation works at Hatidubi Dam, KLHEP	141.22					0					Nature of O&M expense.
22	River protection works & Landslide protection works to be carried out at downstreem of Karbi Langpi Hydro Electric Project(2X50) Dam for the damaged caused by Cyclone Remal in KLHEP	758					758					BOQ and Board approval has not been provided. But considering the safety of dam the cost may be approved at the time of true up subject to submission of cost approval and BOQ.
23	Preventive measures for slope protection at left bank above the dam deck of Hatidubi Dam, Karbi Langpi Hydro Electric Project	133.33	133.33				133.33	133.33				Commission observes that, the land slide happened in year 2020 so the neccesary action should have been taken in last 4 years. BOQ and Board approval has not been provided. However, considering the force major event, commission allowes the expense as claimed by the petitioner.
24	Installation of Early Warning System at upstream of Hatidubi dam of KLHEP .	100					0					Why it was not part of original scope of work?
25	Construction of pre-cast boundary wall of length 4781.00 m for KLHEP colony.	139.13	139.13	139.13	139.13	139.13	0	0	0	0	0	Why it was not part of original scope of work?
26	Improvement of Road near Quarry no.1to Dam deck by providing granular sub-base on left bank upstream side of Hatidubi Dam at KLHEP from Ch: 3106.00 m to Ch: 4201.00 m	14.62					14.62					Nature of O&M expense. However, considering the necessity of the work, Commission allowed the expense as proposed by the petitioner.
27	Construction of Road from KLHEP Office, Lengery gate to KLHEP, Powerhouse, at KLHEP, West Karbi		945.45					0				BOQ and cost approval has not been submitted.

SL NO	Description of Works	Estimate	d Cost ₹ i	n Lakh			Approve	d Cost ₹ ir	Lakh			
SL NO		2025-26	2026-27	2027-28	2028-29	2029-30	2025-26	2026-27	2027-28	2028-29	2029-30	Remarks
	Anglong, Assam for improvement of power availability in 100 MW KLHEP											
28	Ultrasonic test of wels of Radial Gates, Intake gate, Gantry Crane along with strengthening of weld at Hatidubi Dam, KLHEP		35.77					0				Nature of O&M expense.
29	Construction of Type II (G+2) Officers quarter at KLHEP colony, Lengery, West Karbi Anglong			401.39					401.39			BOQ and cost approval has not been submitted.
30	Construction and improvement of colony road (total length = 2.587 Km) at KLHEP			35.87					0			Nature of O&M expense.
31	Construction of lawn tennis court at KLHEP, Lengery.				14.16					0		Not the part of generating station expense.
32	Construction of indoor badminton court at Lengery colony, KLHEP					16.48					0	Petitioner mentions that, the project already started and remained uncompleted. Although no justification provided for non completion of work. Also, had the petitioner taken approval for the expenses?
	Civil Subtotal	1286.3	1253.7	576.39	153.29	155.61	906	133.3	401.4	0.00	0	
	Total	2014.3	5907.2	3498.9	1665.8	188.11	1155	229.3	511.4	200	0	

### Capital Investment Plan approved for LRPP

SL	Description of Works	Estimated	Cost ₹ in	Lakh			Approv	ved Cost	t ₹ in Lak	ch		
NO		2025-26	2026-	2027-	2028-	2029-	2025-	2026-	2027-	2028-	2029-30	Remarks
			27	28	29	30	26	27	28	29		
Α	Electromechanical											
1	Indigenization of Starting &	102.6					54					APGCL has already incurred cost on installation of imported air compressor and
	Instrument Air Compressor											has already incurred more than 1 Cr. in procurement of spare part of the air compressor.
												Now how it is justified to again make expenditure on new air compressor.
												APGCL should have done proper due diligence before procuring the imported air
												conditioner.
												Commission understands there is lag in effort from the pettioner side. Hence this
												cost can not be passed on to the consumers.
												Also, OEM approval shows total proce of 5,405,000 Laks only.
2	Remote Monitoring System for		1200	1200				0	0			Any document related to approval of cost has not been submitted.
	LTPS, LRPP, KLHEP and NRPP											
3	Proposal for upgrade of		1281					1281				No justification has been provided for climing such a huge cost for upgradation
	Electrical and Automation											system.
	System consisting HMI system											The OEM recommendation has been attached. Although the cost claimed in the
	upgradation with sWOIS system at LRPP.											petition is much higher than the cost proposed in OEM recommendation.
	System at Err T.											The actual cost incurred shall be approved at the time of True Up on submission
												of relevant documents.
4	Modification of connection			778					778			OEM proposal attached.
	between exhaust system and											
	turbocharger											Any document related to approval of cost has not been submitted.
5	Procurement of establishment	12.5	12.5	12.5	12.5	12.5	0	0	0	0		Why these cost can not be covered in O&M expenses. Also, any document related
	items											to approval of cost has not been provided.
	Electromechanical Subtotal	115.1	2493.5	1990.5	12.5	12.5	54.05	1281	778	0	0	
	Total	115.1	2493.5	1990.5	12.5	12.5	54.05	1281	778	0	0	

			Estimat	ed Cost ₹	in Lakh			Approv	ed Cost ₹	in Lakh		
SL NO	Description of Works	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	Remarks
Α	Electromechanical											
1	Replacement of 350Ah, 125V Battery Bank of main plant NRPP APGCL Dibrugarh Assam	27.5					27.5					OEM recommendation attached. Although cost is not mentioned in OEM recommendation.
2	Upgradation of Switchyard Automation System (SAS) of 220 KV Switchyard , NRPP APGCL Dibrugarh Assam	60					60					Why the proper inspection was not doen at the time of installation. Commission understands there is lag from the pettioner's side. However, considering the operational challenges, commisison allows the expenses as proposed by the petitioner. E Mail communication with OEM is attached.
3	Installation and commissioning of Rod Drop and Vibration sensors at Gas Booster Compressor of NRPP	63										Nature of O&M Cost.
4	Modification of Cooling Tower Fans of NRPP as the supplier of existing CT- Fans is no longer exist.	37.5					37.5					Nature of O&M Cost. Howerver, considering the impact on the operational efficieny, Commission allows the expense as proposed by the petitioner.

### Capital Investment Plan for NRPP

			Estimat	ed Cost ₹	in Lakh			Approv	ed Cost ₹	in Lakh		
SL NO	Description of Works	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	Remarks
												E mail communication with OEM is attached.
5	Upgradation of the existing Gas Turbine Control System from Mark VI to Mark Vie at NRPP	1925										BOQ and any document related to approval of cost is not provided.
6	Remote Monitoring System for LTPS, LRPP, KLHEP and NRPP		1200	1200								BOQ and any document related to approval of cost is not provided.
7	Upgradation 6.6kV Bus Transfer System (BTS) of NRPP		21.2					21.2				Nature of O&M Cost. However, considering the important upgradation in the system, Commission allows the expense as proposed by the petitioner. : Certificate of Obsolescence is attached.
8	Procurement of CEP Cartridge Assembly- WKT 150/5 at NRPP.		45									Nature of O&M Cost.
9	Upgradation of 01 no. of Large Video Screen (LVS) at NRPP Central Control Room from Lamp Based to Laser Based System		11.4									Nature of O&M Cost. Mail communication regarding Certificate for end of life is attached.
10	Procurement of establishment items	12.5	12.5	12.5	12.5	12.5						Nature of O&M Cost.

			Estimat	ed Cost ₹	in Lakh			Approv	ed Cost ₹	in Lakh		
SL NO	Description of Works	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	Remarks
	Electromechanical Subtotal	2125	1290	1213	12.5	12.5	125	21.2	0	0	0	
В	Civil											
11	Construction of Smart Boundary Wall at Namrup	142					142					Commission observes that, this cost should have been part of the original scope of work. However, considering the security concern, Commission has allowed the cost as proposed by the petitioner.
12	River Bank protection work at the side of artificial Pond and Booster Pump House Dillighat Intake, NRPP, Namrup	44.5					44.5					Nature of O&M expense. However, considering the imporance of the expense, Commission allows the proposed expenditure of the petitioner.
13	Development, installation and commissioning of 2 nos. of deep tube well including storage tank and filtration unit	64										Nature of O&M expense.
14	Development of Children park cum walking zone at NRPP		163									Seems to be of CSR activities.

			Estimat	ed Cost ₹	in Lakh			Approv	ed Cost ₹	in Lakh		
SL NO	Description of Works	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	2025- 26	2026- 27	2027- 28	2028- 29	2029- 30	Remarks
15	Construction of new ICBP road connection exit gate of VVIP Guest House to main road (Bhogdoi path)			19.8								Can be covered in O&M expense.
16	Construction of boundary wall at South side of Colony				52.3					52.3		Commission obseves that, this should have been part of the actual scope of work. However, considering the imporance of construction of boundary wall, Commission approves the proposed expense of the petitioner.
	Civil Subtotal	251	163	19.8	52.3	0	187	0	0	52.3	0	
	Total	2375	1454	1232	64.8	12.5	311	21.2	0	52.3	0	

## Annexure 4A - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2023-24

	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
A	Grant conversion considered for FY 2023-24	3.47	4.69	5.02	2.35	15.52
В	Total grant conversion accepted by Commission in previous years	10.59	51.49	6.02	117.72	185.82
С	Approved grant conversion in FY 23	-0.73	-3.66	-6.45	-14.78	-25.61
D	Total grant conversion remaining (B- C)	11.32	55.15	12.47	132.49	211.43
Е	Balance grant conversion to be considered in FY 23 (A+D)	14.79	59.84	17.48	134.84	226.95
	Normative Equity:					
F	Approved opening GFA for FY 2023- 24	194.86	515.74	511.49	272.50	1494.59
F1	Grant remaining in GFA for FY 2023- 24	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2023-24 excluding Grant (F-F1)	191.91	501.08	499.26	224.08	1416.33
G	Normative Equity (F2 x 30%)	57.57	150.32	149.78	67.23	448.38
Н	Earlier Equity	56.69	145.03	147.97	65.85	415.55
Ι	Actual equity after conversion (E+H)	71.48	204.87	165.46	200.69	642.49
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	57.57	150.32	149.78	67.23	424.90
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.88	5.29	1.81	1.37	9.35
М	Normative Equity addition during the year	0.03	0.00	0.23	0.00	0.26
Ν	Closing Equity Approved for the year	57.60	150.32	150.01	67.23	425.16

# Annexure 4B - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2024-25

	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
A	Grant conversion considered for FY 2024-25	0.00	2.92	3.01	2.10	8.03
в	Total grant conversion accepted by Commission in previous years	14.79	59.84	17.48	134.84	226.95
С	Approved grant conversion in FY 24	0.88	5.29	1.81	1.37	9.35
D	Total grant conversion remaining (B-C)	13.91	54.55	15.68	133.47	217.59
Е	Balance grant conversion to be considered in FY 25 (A+D)	13.91	57.47	18.69	135.57	225.62
	Normative Equity:					
F	Approved Opening GFA for FY 2024- 25	198.43	520.80	519.82	274.84	1513.89
F1	Grant remaining in GFA for FY 2024- 25	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2024-25 excluding Grant	195.48	506.14	507.59	226.43	1435.63
G	Normative Equity (F2 x 30%)	58.64	151.84	152.28	67.93	454.17
Н	Earlier Equity	57.60	150.32	150.01	67.23	425.16
I	Actual equity after conversion (E+H)	71.51	207.79	168.69	202.79	650.78
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	58.64	151.84	152.28	67.93	430.69
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	1.04	1.52	2.27	0.70	5.53
М	Normative Equity addition during the year	0.58	2.94	4.16	0.00	7.68
Ν	Closing Equity Approved for the year	59.23	154.78	156.43	67.93	438.37

# Annexure 4C - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2025-26

	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
A	Grant conversion considered for FY 2025-26	0.00	0.00	0.00	0.00	0.00
В	Total grant conversion accepted by Commission in previous years	13.91	57.47	18.69	135.57	225.62
С	Approved grant conversion in FY 25	1.04	1.52	2.27	0.70	5.53
D	Total grant conversion remaining (B-C)	12.87	55.95	16.42	134.86	220.09
Е	Balance grant conversion to be considered in FY 26 (A+D)	12.87	55.95	16.42	134.86	220.09
	Normative Equity:					
F	Approved Opening GFA for FY 2025- 26	200.37	533.53	536.68	276.94	1547.53
F1	Grant remaining in GFA for FY 2025- 26	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2025-26 excluding Grant	197.43	518.87	524.45	228.53	1469.27
G	Normative Equity (F2 x 30%)	59.23	155.66	157.33	68.56	464.26
Н	Earlier Equity	59.23	154.78	156.43	67.93	438.37
Ι	Actual equity after conversion (E+H)	72.09	210.73	172.85	202.79	658.47
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	59.23	155.66	157.33	68.56	440.78
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.00	0.88	0.90	0.63	2.41
М	Normative Equity addition during the year	0.00	0.00	3.46	0.16	3.63
Ν	Closing Equity Approved for the year	59.23	155.66	160.80	68.72	444.41

# Annexure 4D - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2026-27

	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
A	Grant conversion considered for FY 2026-27	0.00	0.00	0.00	0.00	0.00
В	Total grant conversion accepted by Commission in previous years	12.87	55.95	16.42	134.86	220.09
С	Approved grant conversion in FY 26	0.00	0.88	0.90	0.63	2.41
D	Total grant conversion remaining (B-C)	12.87	55.07	15.52	134.23	217.69
Е	Balance grant conversion to be considered in FY 27 (A+D)	12.87	55.07	15.52	134.23	217.69
	Normative Equity:					
F	Approved Opening GFA for FY 2026- 27	200.37	533.53	548.23	277.48	1559.62
F1	Grant remaining in GFA for FY 2026- 27	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2026-27 excluding Grant	197.43	518.87	536.00	229.07	1481.36
G	Normative Equity (F2 x 30%)	59.23	155.66	160.80	68.72	467.89
Н	Earlier Equity	59.23	155.66	160.80	68.72	444.41
Ι	Actual equity after conversion (E+H)	72.09	210.73	176.31	202.95	662.10
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	59.23	155.66	160.80	68.72	444.41
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.00	0.00	0.00	0.00	0.00
М	Normative Equity addition during the year	0.00	1.77	0.69	3.84	6.30
Ν	Closing Equity Approved for the year	59.23	157.43	161.49	72.56	450.71

# Annexure 4E - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2027-28

	Derticularo	NTDO				Total
	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
А	Grant conversion considered for FY 2027-28	0.00	0.00	0.00	0.00	0.00
В	Total grant conversion accepted by Commission in previous years	12.87	55.07	15.52	134.23	217.69
С	Approved grant conversion in FY 27	0.00	0.00	0.00	0.00	0.00
D	Total grant conversion remaining (B-C)	12.87	55.07	15.52	134.23	217.69
Е	Balance grant conversion to be considered in FY 28 (A+D)	12.87	55.07	15.52	134.23	217.69
	Normative Equity:					
F	Approved Opening GFA for FY 2027- 28	200.37	539.43	550.52	290.29	1580.62
F1	Grant remaining in GFA for FY 2027- 28	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2027-28 excluding Grant	197.43	524.76	538.29	241.88	1502.36
G	Normative Equity (F2 x 30%)	59.23	157.43	161.49	72.56	474.19
Н	Earlier Equity	59.23	157.43	161.49	72.56	450.71
I	Actual equity after conversion (E+H)	72.09	212.50	177.00	206.80	668.39
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	59.23	157.43	161.49	72.56	450.71
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.00	0.00	0.00	0.00	0.00
М	Normative Equity addition during the year	0.00	0.51	1.53	2.33	4.37
Ν	Closing Equity Approved for the year	59.23	157.94	163.02	74.90	455.08

# Annexure 4F - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2028-29

	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
А	Grant conversion considered for FY 2028-29	0.00	0.00	0.00	0.00	0.00
В	Total grant conversion accepted by Commission in previous years	12.87	55.07	15.52	134.23	217.69
С	Approved grant conversion in FY 28	0.00	0.00	0.00	0.00	0.00
D	Total grant conversion remaining (B-C)	12.87	55.07	15.52	134.23	217.69
Е	Balance grant conversion to be considered in FY 29 (A+D)	12.87	55.07	15.52	134.23	217.69
	Normative Equity:					
F	Approved Opening GFA for FY 2028- 29	200.37	541.11	555.64	298.07	1595.20
F1	Grant remaining in GFA for FY 2028- 29	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2028-29 excluding Grant	197.43	526.45	543.40	249.66	1516.95
G	Normative Equity (F2 x 30%)	59.23	157.94	163.02	74.90	478.56
Н	Earlier Equity	59.23	157.94	163.02	74.90	455.08
I	Actual equity after conversion (E+H)	72.09	213.01	178.54	209.13	672.77
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	59.23	157.94	163.02	74.90	455.08
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.00	0.00	0.00	0.00	0.00
М	Normative Equity addition during the year	0.00	0.00	0.60	0.00	0.60
Ν	Closing Equity Approved for the year	59.23	157.94	163.62	74.90	455.68

# Annexure 4G - Equity Addition and Grant Conversion approved (Rs. Crore) during FY 2029-30

		NEDO				
	Particulars	NTPS	LTPS	KLHEP	LRPP	Total
А	Grant conversion considered for FY 2029-30	0.00	0.00	0.00	0.00	0.00
В	Total grant conversion accepted by Commission in previous years	12.87	55.07	15.52	134.23	217.69
С	Approved grant conversion in FY 29	0.00	0.00	0.00	0.00	0.00
D	Total grant conversion remaining (B-C)	12.87	55.07	15.52	134.23	217.69
Е	Balance grant conversion to be considered in FY 30 (A+D)	12.87	55.07	15.52	134.23	217.69
	Normative Equity:					
F	Approved Opening GFA for FY 2029- 30	200.37	541.11	557.64	298.07	1597.20
F1	Grant remaining in GFA for FY 2029- 30	2.95	14.66	12.23	48.41	78.26
F2	Opening GFA of FY 2029-30 excluding Grant	197.43	526.45	545.40	249.66	1518.95
G	Normative Equity (F2 x 30%)	59.23	157.94	163.62	74.90	479.16
Н	Earlier Equity	59.23	157.94	163.62	74.90	455.68
I	Actual equity after conversion (E+H)	72.09	213.01	179.14	209.13	673.37
J	Recomputed Equity after converting grant to Equity subject to normative cap (Min of G and I)	59.23	157.94	163.62	74.90	455.68
L	Equity Addition due to grant converted to equity approved in opening equity (J-H)	0.00	0.00	0.00	0.00	0.00
М	Normative Equity addition during the year	0.00	0.00	0.00	0.00	0.00
Ν	Closing Equity Approved for the year	59.23	157.94	163.62	74.90	455.68