



**PETITION FOR APPROVAL  
OF  
MULTI-YEAR  
AGGREGATE REVENUE REQUIREMENT  
FOR THE ENTIRE CONTROL PERIOD  
FROM 2024-25 TO 2026-27  
AND  
RETAIL TARIFF PROPOSAL FOR  
FY 2024-25  
UNDER SECTION 62 & 64  
OF  
THE ELECTRICITY ACT 2003**

Submitted by:  
Department of Power, Arunachal Pradesh



**BEFORE HON'BLE ARUNACHAL PRADESH STATE ELECTRICITY REGULATORY  
COMMISSION**

**Petition No:** \_\_\_\_\_

**IN THE MATTER OF:** **Petition for Multi-Year Aggregate Revenue Requirement (ARR) for the entire Control Period from 2024-25 to 2026-27 with year-wise details.**

**AND**

**IN THE MATTER OF:** **Petition for Revenue from the sale of power at the existing tariff and projected revenue gap/surplus for FY 2024-25 and Retail Tariff Proposal for the FY 2024-25 under Sections 62 and 64 of The Electricity Act 2003.**

**The Department of Power, Arunachal Pradesh, Vidyut Bhawan, Itanagar, Arunachal Pradesh**

**..... Petitioner**

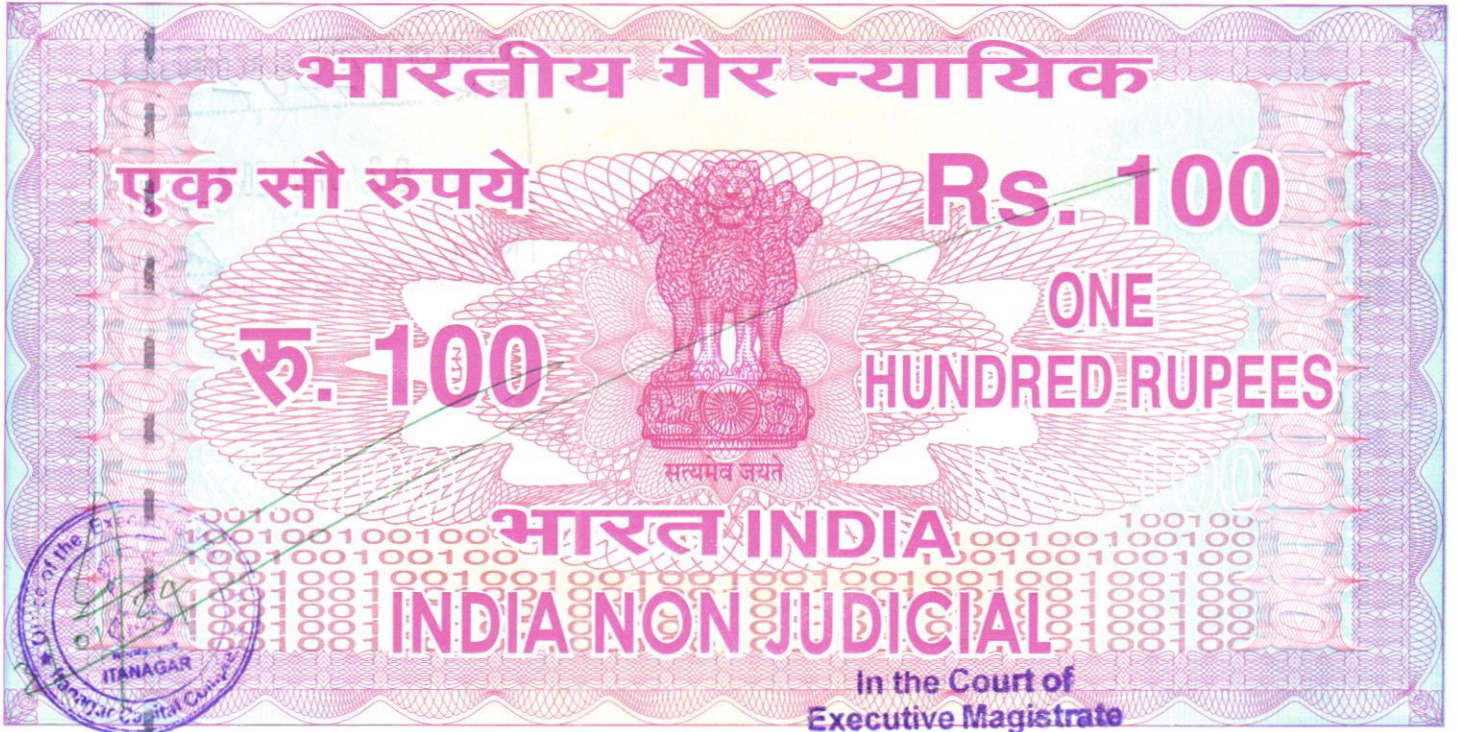
**The petitioner most respectfully submits as follows:**

1. The Petitioner, the Department of Power, Government of Arunachal Pradesh (herein after called APDoP), is a Government Department under the Ministry of Power, Government of Arunachal Pradesh, and is the sole Electricity Distribution Utility for the entire State of Arunachal Pradesh.
2. The petitioner, being a Government Department, is a Deemed Distribution Licensee as per Section 14, proviso 3 of the Electricity Act 2003.
3. As per Section 64 of the Electricity Act 2003 read with Multi-Year Tariff Regulation 2018 notified by Arunachal Pradesh State Electricity Regulatory Commission (hereinafter called "Hon'ble Commission"), the licensee has to file a petition for determination of ARR and Retail Tariff every year.
4. The Petitioner filed a petition for approval of Multi-Year Tariff and Multi-Year Revenue Requirement in the year 2022 for the year 2022-23, 2023-24, and 2024-25, but due to the absence of the Hon'ble Commission, the petition was not considered and it got lapsed. As a result, the APDoP is still following the tariff order of **2018-19**.



5. The petitioner, being Government Department, is not in the position to function like an incorporated company in the matter of profit-making, business plans, audits, accounts, etc. However, with meagre available data/information as required by MYT regulation a tariff petition for Multi-Year Tariff for the Control Period 2024-25, 2025-26 and 2026-27 is hereby filed for necessary action of Hon'ble Commission as deemed fit.

Er. Duyu Tacho  
Chief Engineer (Commercial)  
Department of Power  
Government of Arunachal Pradesh,  
Itanagar



अरुणाचल प्रदेश ARUNACHAL PRADESH

In the Court of  
Executive Magistrate  
Itanagar (A.P)  
Sd/- 07 Date 03/01/24 831317

**BEFORE HON'BLE ARUNACHAL PRADESH STATE ELECTRICITY REGULATORY COMMISSION**

**IN THE MATTER OF:** Petition for Multi-Year Aggregate Revenue Requirement (ARR) for the entire Control Period from 2024-25 to 2026-27 with year-wise details.

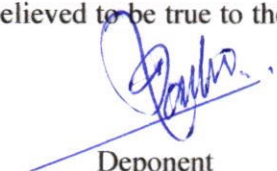
**AND**

**IN THE MATTER OF:** Petition for Revenue from the sale of power at the existing tariff and projected revenue gap/surplus for FY 2024-25 and Retail Tariff Proposal for the FY 2024-25 under Sections 62 and 64 of The Electricity Act 2003.

**AFFIDAVIT**

I, Sri Duyu Tacho, Son of Sri Duyu Tago, age about 58 years, resident of Itanagar do hereby solemnly affirm and state as follows:-


1. I am working as Chief Engineer (Commercial) cum CEI under the Department of Power, Arunachal Pradesh and I am the petitioner in the above matter and is duly authorised to make this affidavit by the competent authority of the Government of Arunachal Pradesh.
2. The statement made in the petition is based on the information received from the official records of the department maintained in the ordinary course of business and is believed to be true to the best of my knowledge.

  
Deponent

Verification:

I, Sri Duyu Tacho, do hereby verify that the facts mentioned in para 1 and 2 above are correct to the best of my knowledge and no part of it is false or no material has been concealed.

  
Deponent

  
Executive Magistrate  
Itanagar Capital Complex  
ITANAGAR 24

OFFICE OF THE TREASURY OFFICER

Sl. No. 1747

02 JAN 2024

NAME Suyu Tacho  
ITANAGAR, ARUNACHAL PRADESH

In the Office of  
Executive Engineer  
Itanagar

FOR THE DEPARTMENT OF  
MUNICIPALITY

It is hereby notified that the  
following work is to be done  
in the office of the Executive Engineer  
Itanagar on the above date.

Suyu Tacho

For the Executive Engineer,  
Itanagar

Itanagar, Arunachal Pradesh

Itanagar, Arunachal Pradesh



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**List of Abbreviations used**

AGBPP	Assam Gas Based Power Plant
AGTCCPP	Agartala Gas Thermal Combine Cycle Power Plant
APDoP	Arunachal Pradesh Department of Power
APSERC	Arunachal Pradesh State Electricity Regulatory Commission
ARR	Aggregate Revenue Requirement
AT&C	Aggregate Technical and Commercial
BPL	Below Poverty Line
CAGR	Compound Annual Growth Rate
DG	Diesel Generating
DHPD	Department of Hydro Power Development
FY	Financial Year
HEP	Hydro Electric Project
HT	High Tension
KJP	Kutir Jyoti Program
KV	Kilo Volt
KW	Kilo Watt
LT	Low Tension
MU	Million Unit
MW	Mega Watt
NLDC	National Load Dispatch Centre
NHPC	National Hydro Power Corporation
NTPC	National Thermal Power Corporation
NEEPCO	North Eastern Electric Power Corporation
NERLDC	North Eastern Regional Load Dispatch Centre
NERPC	North Eastern Regional Power Committee
O&M	Operation and Maintenance
OTPC	ONGC Tripura Power Company
PGCIL	Power Grid Corporation of India Ltd
RLDC	Regional Load Dispatch Centre
R&M	Repair and Maintenance
SHEP	Small Hydro Electric Project
SLDC	State Load Dispatch Centre
SPSU	State Public Sector Undertaking
T&D	Transmission and Distribution





## **CHAPTER-I:: INTRODUCTION**

### **1.1 About Arunachal Pradesh Department of Power**

The Arunachal Pradesh Department of Power (APDoP) was created in 1992 by separating from the Arunachal Pradesh Public Works Department (APPWD). At that time, the entire power management including generations, transmissions, and distributions was the responsibility of the APDoP. In the year 2004, a Department of Hydro Power Development (DHPD) was created by bifurcating from the APDoP and thereby separating the generation from the purview of the APDoP. The APDoP, a Government Department, functioning under the Ministry of Power, Government of Arunachal Pradesh, is responsible for the supply of electricity in the entire state of Arunachal Pradesh and is the only distribution utility in Arunachal Pradesh. And hence APDoP is a Deemed Distribution Licensee as per Section 14 of The Electricity Act, 2003. The APDoP has 298447 consumers and annual energy consumption was about 582.10 MUs in the FY 2022-23. In addition to the supply of electricity, the APDoP undertakes the transmission and trading of electricity.

### **1.2 Number of Consumers**

The APDoP has at present 298447 consumers in different categories. Table 1.2(A) shows the trends of consumer growth in the last 4 years, and based on this growth the number of consumers for the entire control period has been projected using the average annual growth rate of the last 4 years and is shown in table 1.2(B).

**Table1.2(A):: Number of consumers in last 5 years**

Consumer Category	FY 2018-19	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23	Average Growth*
	I	II	III	IV	V	
<b><u>HT &amp; EHT Category</u></b>						
<b>Non Commercial Consumers (Domestic)</b>						
AC 50Hz,3-Phase, 11KV	89	88	96	109	121	8
AC 50Hz,3-Phase, 33KV	3	4	4	4	4	0
<b>Commercial Consumers (Non-Industrial)</b>						
AC 50Hz,3-Phase, 11KV	166	209	244	276	372	52
AC 50Hz,3-Phase, 33KV	0	6	6	11	13	3
<b>Public Lighting and Water Supply Consumers</b>						
AC 50Hz,3-Phase, 11KV	21	19	20	21	9	0
AC 50Hz,3-Phase, 33KV	3	0	0	0	0	0
<b>Agricultural Consumers</b>						
AC 50Hz,3-Phase, 11KV	3	0	0	0	5	1
AC 50Hz,3-Phase, 33KV	0	0	1	0	0	0
<b>Industrial Consumers</b>						
AC 50Hz,3-Phase, 11KV	26	59	62	65	76	13
AC 50Hz,3-Phase, 33KV	22	27	27	26	31	2
AC 50Hz,3-Phase, 132 KV	3	3	3	3	3	0
<b>Bulk Mixed Consumers</b>						



Consumer Category	FY 2018-19	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23	Average Growth*
	I	II	III	IV	V	
AC 50Hz,3-Phase, 11KV	139	156	159	138	173	9
AC 50Hz,3-Phase, 33KV	16	15	13	32	15	0
AC 50Hz,3-Phase, 132 KV	1	1	1	1	1	0
<b>Low Voltage Category</b>						
<b>Non Commercial Consumers (Domestic)</b>						
AC 50Hz,1-Phase, 230 Volt	161265	178813	188148	195620	197129	8966
AC 50Hz,3-Phase, 400 Volt	2511	2706	2844	3197	3538	257
KJP & BPL connection	58248	64273	66058	64369	63085	1209
<b>Commercial Consumers (Non-Industrial)</b>						
AC 50Hz,1-Phase, 230 Volt	23710	25098	26034	27594	29675	1491
AC 50Hz,3-Phase, 400 Volt	1951	1914	2073	2344	2486	134
<b>Public Lighting and Water Supply Consumers</b>						
AC 50Hz,1-Phase, 230 Volt	1149	1202	1118	1198	948	0
AC 50Hz,3-Phase, 400 Volt	163	190	185	235	239	19
<b>Agricultural Consumers</b>						
AC 50Hz,1-Phase, 230 Volt	11	4	4	6	8	0
AC 50Hz,3-Phase, 400 Volt	6	16	13	13	7	0
<b>Industrial Consumers</b>						
AC 50Hz,1-Phase, 230 Volt	74	44	48	80	75	0
AC 50Hz,3-Phase, 400 Volt	192	163	173	162	169	0
<b>Temporary Consumer</b>						
LT/HT	87	90	194	240	265	45
<b>Total</b>	<b>249859</b>	<b>275100</b>	<b>287528</b>	<b>295744</b>	<b>298447</b>	

Table1.2(B):: Projected number of consumers control period using an annual average growth rate

Consumer Category	Average Growth*	Estimated	MYT Control Period (Projected)		
		Current Year 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
		VI	VII	VIII	IX
<b>HT &amp; EHT Category</b>					
<b>Non Commercial Consumers (Domestic)</b>					
AC 50Hz,3-Phase, 11KV	8	129	137	145	153
AC 50Hz,3-Phase, 33KV	0	4	5	5	5
<b>Commercial Consumers (Non-Industrial)</b>					
AC 50Hz,3-Phase, 11KV	52	424	475	527	578
AC 50Hz,3-Phase, 33KV	3	16	20	23	26
<b>Public Lighting and Water Supply Consumers</b>					
AC 50Hz,3-Phase, 11KV	0	9	9	9	9
AC 50Hz,3-Phase, 33KV	0	0	0	0	0



Consumer Category	Average Growth*	Estimated	MYT Control Period (Projected)		
		Current Year 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
		VI	VII	VIII	IX
<b>Agricultural Consumers</b>					
AC 50Hz,3-Phase, 11KV	1	6	6	7	7
AC 50Hz,3-Phase, 33KV	0	0	0	0	0
<b>Industrial Consumers</b>					
AC 50Hz,3-Phase, 11KV	13	89	101	114	126
AC 50Hz,3-Phase, 33KV	2	33	36	38	40
AC 50Hz,3-Phase, 132 KV	0	3	3	3	3
<b>Bulk Mixed Consumers</b>					
AC 50Hz,3-Phase, 11KV	9	182	190	199	207
AC 50Hz,3-Phase, 33KV	0	15	15	15	15
AC 50Hz,3-Phase, 132 KV	0	1	1	1	1
<b><u>Low Voltage Category</u></b>					
<b>Non Commercial Consumers (Domestic)</b>					
AC 50Hz,1-Phase, 230 Volt	8966	206095	215061	224027	232993
AC 50Hz,3-Phase, 400 Volt	257	3795	4052	4308	4565
KJP & BPL connection	1209	64294	65504	66713	67922
<b>Commercial Consumers (Non-Industrial)</b>					
AC 50Hz,1-Phase, 230 Volt	1491	31166	32658	34149	35640
AC 50Hz,3-Phase, 400 Volt	134	2620	2754	2887	3021
<b>Public Lighting and Water Supply Consumers</b>					
AC 50Hz,1-Phase, 230 Volt	0	948	948	948	948
AC 50Hz,3-Phase, 400 Volt	19	258	277	296	315
<b>Agricultural Consumers</b>					
AC 50Hz,1-Phase, 230 Volt	0	8	8	8	8
AC 50Hz,3-Phase, 400 Volt	0	7	8	8	8
<b>Industrial Consumers</b>					
AC 50Hz,1-Phase, 230 Volt	0	75	76	76	76
AC 50Hz,3-Phase, 400 Volt	0	169	169	169	169
<b>Temporary Consumer</b>					
LT/HT	45	310	354	399	443
<b>Total</b>		<b>310655</b>	<b>322863</b>	<b>335070</b>	<b>347278</b>

### 1.3 Source of Power

The APDoP acquires Power from different sources for distribution within the State as well as to sell the surplus power outside the state as mentioned below:



### 1.3.1 Diesel Generating (DG) Sets: -

APDoP has DG sets of different capacities installed at different locations with a total installed capacity of about 20.45 MW. These DG sets are kept on standby and used as and when required. Further, APDoP is on the way to phasing out the DG Sets slowly due to its high generation cost. Since these sets are owned by APDoP, the power generated from it will not be included in the power purchase cost. The Expenditure on DG sets shall be included in Operation and Maintenance Costs.

### 1.3.2 Central Sector Generating Stations Allocation: -

The major power requirement is met by power allocation from Central Sector Generating Stations. Central Sector allocation and power purchased from each generating station in FY 2020-21 to 2022-23 are given in Table 1.3.2.

**Table 1.3.2:: Central Sector Allocation and Energy Received during the FY 2020-21 to 2022-23**

Source of Power (Station wise)		Installed Capacity (MW)	APDoP share % (As on March'23)	APDoP share (MW)	Energy Received (MU)		
					2020-21	2021-22	2022-23
LOKTAK	NHPC	105	4.94	5.19	30.04	19.38	23.21
KOPILI-I	NEEPCO	200	5.19	10.4	0.00	0.00	0.00
KOPILI-II	NEEPCO	25	5.99	1.5	0.00	0.67	0.00
KHANDONG	NEEPCO	50	4.19	2.1	2.72	11.21	0.00
Panyor Lower	NEEPCO	405	6.46	26.2	89.99	74.41	88.87
Free Energy Panyor L	NEEPCO		12	48.6	165.86	137.03	164.12
DOYANG	NEEPCO	75	6.85	5.14	13.54	6.55	11.71
PARE	NEEPCO	110	5.87	6.5	30.52	24.96	30.74
Free Energy Pare	NEEPCO		13	14.3	67.22	54.88	67.82
KAMENG	NEEPCO	600	1.83	11.0	26.30	46.86	53.18
Free Energy Kameng	NEEPCO		12	72	167.11	304.39	344.87
AGBPP	NEEPCO	291	5.69	16.6	61.698	81.54	96.55
AGTCCPP	NEEPCO	135	6.7	9.0	45.842	52.34	60.20
PALATANA	OTPCL	726.6	3.03	22.0	127.989	116.64	142.92
BgTPP	NTPC	750	5.07	38.03	101.80	131.71	157.22
FARAKKA	NTPC	1600	0.19	3.0	20.73	20.11	20.04
KAHALGAON	NTPC	840	0.24	2.02	9.82	11.34	10.66
TALCHAR	NTPC	1000	0.20	2.00	14.32	13.76	14.20
<b>Total</b>				<b>295.50</b>	<b>975.52</b>	<b>1107.78</b>	<b>1286.32</b>
<b>Total Unit Purchased (MU)</b>					<b>575.33</b>	<b>611.47</b>	<b>709.52</b>
<b>Total Free Unit Received (MU)</b>					<b>400.19</b>	<b>496.30</b>	<b>576.80</b>

### 1.3.3 Power from within the State: -

There are power generators within the state of Arunachal Pradesh from where APDoP is receiving/purchasing the entire power generated by them which is tabulated in the table 1.3.3;

**Table 1.3.3:: Power purchased during FY 2020-21 to 2022-23 from the Generators within the State**

Source of Power		Installed Capacity (MW)	APDoP share % (As on March 21)	APDoP share (MW)	Energy Received (MU)		
					FY 2020-21 (Actual)	FY 2021-22 (Actual)	FY 2022-23 (Actual)
DHPD	GoAP	81.54	100	81.54	76.60	48.06	41.97
HPDCL	SPSU	3.0	100	3.0	0.83	4.69	5.24
DIKSHI	IPP	24.0	90	21.6	16.30	47.99	65.17
Free Energy Dikshi			10	2.40		2.13	11.64
SOLAR	APEDA				0.52	0.47	0.96
<b>Total</b>				<b>108.54</b>	<b>94.25</b>	<b>103.33</b>	<b>124.98</b>

(i) **From DHPD: -**

Department of Hydro Power Development (DHPD) has an installed capacity of 81.54 MW consisting of different capacities located in different locations of Arunachal Pradesh. APDoP received about 76.60 MU, 48.06 MU & 41.97 MU during FY 2020-21, 2021-22 and 2022-23 respectively from DHPD. As DHPD is under the same state Govt. (AP) and hence, APDoP does not pay the cost of power to DHPD and hence may be treated as **Free Power**. If new projects come up then there will be capacity addition.

(ii) **Power from Hydro Power Development Corporation of Arunachal Pradesh Limited (HPDCAPL): -**

Arunachal Pradesh Hydro Power Development Corporation Limited is a State Public Sector Undertaking and has commissioned a 3 MW small hydropower project at Zemithang of Tawang district of Arunachal Pradesh over the Sumbachu River and started commercial operation in the year 2020-21. The APDoP received about 0.83 MU, 4.69 MU & 5.24 MU @ Rs. 3.61/Unit (Provisional tariff) costing Rs.1.91 Cr & Rs 2.68 Cr during FY 2021-22 & FY 2022-23 respectively from this project.

(iii) **Dikshi SHP: -**

Dikshi SHP is a small hydropower project of capacity 24 MW in Rupa of West Kameng District developed by M/s Devi Energy Ltd, an Independent Power Producer (IPP). This

project was commissioned in the year 2019 and declared COD on 19 September 2019. The APDoP entered into a PPA with M/s Devi Energy Ltd for purchasing the entire power generated from this project. APDoP purchased power to the tune of 16.30 MU, 47.99 MU & 65.17MU @ Rs. 5.25/unit amounting to Rs. 17.59 Cr, Rs. 22.06 Cr & Rs 34.43 Cr during the year 2020-21, 2021-22 & FY 2022-23 respectively.

(iv) **Arunachal Pradesh Energy Development Agency (APEDA): -**

The Arunachal Pradesh Energy Development Agency is under the Ministry of Power, Govt. of Arunachal Pradesh, which is responsible for the development of Non-Conventional Energy in the state. APEDA has developed various capacities of Solar Power plants across the state with an installed capacity of 4.188 MW. From these plants, APDoP has received about 0.52 MU, 0.47 MU & 0.96 MU of energy free of cost during the year 2020-21, 2021-22 & 2022-23 respectively since it is under the same umbrella of the state Govt. The energy so received is utilized to partially meet up the annual Solar Renewable Power Purchase Obligation (RPO) of the state.

### 1.3.4 Power received from the other Sources:

**Table 1.3.4: Power received from other sources during FY 2020-21 to 2022-23**

Source of Power	Unit	Energy Received (MU)		
		FY 2020-21 (Actual)	FY 2021-22 (Actual)	FY 2022-23 (Actual)
Deviation	MU	39.92	48.82	66.05
IEX Purchase	MU	0.65	3.94	6.15
Banking (Import)	MU	36.12	64.80	39.37
Diesel Generation	MU	0.36	0.39	0.28
<b>Total</b>	<b>MU</b>	<b>77.04</b>	<b>117.95</b>	<b>111.86</b>

- (i) **Deviation:** - Deviation is the difference between the actual drawl and the scheduled drawl from the Grid. The charges for the Deviations for all the time blocks shall be **payable** for over-drawl by the buyer and under-injection by the seller and **receivable** for under-drawl by the buyer and over-injection by the seller and shall be worked out on the average frequency of a time block at the rates specified. Since APDoP is a buyer, it has over-drawn from the Grid to the tune of 39.92 MU, 48.82 MU & 66.05 MU in the FY 2020-21, 2021-22 & 2022-23 respectively.
- (ii) **IEX Purchase:** - In case of any shortage of power, the APDoP resorts to purchasing power from Real-Time Market (RTM) or Day Ahead Market (DAM) from IEX to avoid or minimize Deviation. APDoP purchased 0.65 MU in FY 2020-21, 3.94 MU in FY 2021-22 & 6.15 MU in FY 2022-23 to meet up the power shortage at that time.

- (iii) **Banking:** - APDoP is engaged in the banking of energy during the high hydro season and takes back during the lean hydro season @ 5% above in case of forward banking and sometimes APDoP takes energy in advance from the party and returns to them @ 5% above as and when power is available. As such, there is no financial implication for this activity. The energy was imported via Banking to the tune of 36.12 MU, 64.80 MU & 39.37 MU in the year 2020-21, 2021-22 & 2022-23 respectively.
- (iv) **Diesel Generation:** - DG sets are purely a temporary arrangement to meet any emergency requirement in case of non-availability of power from any other sources and it is mostly kept on standby. The energy generated through DG set in the year 2020-21, 2021-22 & 2022-23 is 0.36 MU, 0.39 MU & 0.28 MU respectively.

### 1.3.5 Total Power received: -

APDoP does not own any Generating Stations. The power required to cater to the needs of the state is met up by purchasing power from the Central Generating Stations, Independent Power Producers (IPP), Free power received from the hydro generating stations located in the state, Generation from DHPD, APEDA, and Banking. The total energy received by APDoP from different sources in the last three years is as shown below: -

**Table 1.3.5: Total Power Received during FY 2020-21 to 2022-23**

Source of Power	Unit	Energy Received (MU)		
		FY 2020-21 (Actual)	FY 2021-22 (Actual)	FY 2022-23 (Actual)
Central Sector Allocation	MU	975.52	1107.78	1286.32
State Generation (IPP+Own)	MU	94.25	103.33	124.98
From Other Sources	MU	77.04	117.95	111.86
<b>Total</b>	<b>MU</b>	<b>1146.81</b>	<b>1329.06</b>	<b>1523.15</b>

### 1.4 Necessity for Filing of Tariff petition: -

The Electricity Act 2003 under sections 62 and 64 provides for the determination of tariff by the appropriate commission on application by a licensee. The Arunachal Pradesh State Electricity Regulatory Commission (APSERC) notified Multi-Year Tariff Regulations- 2018 which provides for the filing of tariff petitions before 30<sup>th</sup> November every year. In pursuance of these legal provisions, APDoP is hereby filling this Multi-Year Tariff petition for FY 2024-25 to FY 2026-27. The APDoP filed a multiyear tariff petition on November 2019 and February 2022, but it got lapsed due to the absence of the Hon'ble Commission.

## **1.5 Procedure Adopted in preparation for this Tariff Petition: -**

While preparing the tariff petition, the APDoP adopted the principle, guidelines, and procedure prescribed by Hon'ble Commission in the Multi-Year Tariff Regulation 2018. First of all, the aggregate revenue requirement of the APDoP is worked out as per guidelines provided in the financial principle of Multiyear Tariff Regulation 2018, then the expected revenue in the existing tariff is worked out. The revenue gap of that year is the difference between the Expected ARR and the Expected Revenue of that year. This revenue gap is covered by increasing or decreasing the retail tariff. They are as follows:

### **1.5.1 Estimation of Aggregate Revenue Requirement: -**

According to Chapter 10.2(1) of APSERC Multi-Year Tariff Regulation 2018, the tariff for retail supply by a Distribution Licensee shall provide for recovery of the Aggregate Revenue Requirement of the Distribution Licensee for the financial year, as approved by the Commission and comprising the following components.

- a) Return on Equity Capital
- b) Interest on Loan Capital
- c) Depreciation
- d) Cost of own power generation/ power purchase expenses
- e) Inter-state Transmission charges
- f) Intra-state Transmission charges
- g) Charges for intervening transmission facilities, if any
- h) Fees and charges of NLDC/RLDC/SLDC etc
- i) Operation and maintenance expenses
- j) Interest in working capital and consumer security deposits and
- k) Provision for bad or doubtful debt.

#### **Minus**

- 1) Non-tariff income
- 2) Income from wheeling charges recovered from the open-access customer
- 3) Income from other businesses to the extent specified in this regulation.
- 4) Receipt from cross-subsidy surcharges from open-access consumers, and
- 5) Receipt from the additional surcharge on charges of wheeling from open access consumers.
- 6) Any revenue subsidy or grant received from the state government other than subsidy under section 65 of the electricity act 2003.





### **1.5.2 Estimation of Annual Revenue Income: -**

On the trends of energy consumption by different categories of consumers in the last few years, the likely consumption of each category of consumers in a particular year are projected. The projected quantities of that particular year are multiplied by the corresponding projected tariff of each category of consumers to give the estimated Annual Revenue Income.

### **1.5.3 Determination of Revenue Gap: -**

The difference in amount between the estimated Aggregate Revenue Requirement and estimated Annual Revenue Income is Revenue Gap for that year.

## **CHAPTER-II :: ESTIMATION OF AGGREGATE REVENUE REQUIREMENT**

According to APSERC Multiyear tariff regulation 2018 Chapter 10.2(1), the following components shall comprise for recovery of Aggregate Revenue Requirement:

- l) Return on Equity Capital
- m) Interest on Loan Capital
- n) Depreciation
- o) Cost of own power generation/ power purchase expenses
- p) Inter-state Transmission charges
- q) Intra-state Transmission charges
- r) Charges for intervening transmission facilities, if any
- s) Fees and charges of NLDC/RLDC/SLDC etc
- t) Operation and maintenance expenses
- u) Interest in working capital and consumer security deposits and
- v) Provision for bad or doubtful debt.

### **Minus**

- 7) Non-tariff income
- 8) Income from wheeling charges recovered from the open-access customer
- 9) Income from other businesses to the extent specified in this regulation.
- 10) Receipt from cross-subsidy surcharges from open-access consumers, and
- 11) Receipt from the additional surcharge on charges of wheeling from open access consumers.
- 12) Any revenue subsidy or grant received from the state government other than subsidy under section 65 of the electricity act 2003.

## 2.1 Return on Equity Capital

APDoP being a Government Department, all funding comes from the State Government/Central Government as a grant without any obligation to pay back. APDoP is not incorporated/registered as a company, hence there is no shareholder/equity as a result **return on equity capital** does not arise. Hence, the APDoP will not claim a Return on Equity Capital.

## 2.2 Interest on Loan Capital

APDoP functions under the Government of Arunachal Pradesh. All financial matters of APDoP are controlled by the finance department of the Government. Taking a loan and its repayment are decided by them. Hence, APDoP cannot take any kind of loan independently and does not have any access to the loan and its repayment process even if the loan is taken for funding the projects under APDoP, its repayment is handled by the Government from its sources. Therefore, expenses on interest on the loan may be considered as Nil and APDoP shall not claim any for purpose of ARR.

## 2.3 Depreciation

Entire Assets under the control of APDoP are created from the grant of the Government of Arunachal Pradesh or the Government of India without any obligation to return. As per the regulatory direction, no depreciation can be claimed on the assets created from subsidies or grants which has no obligation to return. Therefore, APDoP shall not claim any depreciation for ARR.

## 2.4 Category-wise energy Sale Forecast within the State: -

The category-wise energy sale forecast is tabulated below in table 3.4. This forecast is devised by using the Compound Annual Growth Rate (CAGR) of the preceding 5 years as required by section 10.10(2) APSERC Multi-Year Tariff Regulation 2018. As seen from the category-wise monthly sale for the FY 2022-23, there is no effect on seasonal change, hence annual basis forecast has been adapted instead of a monthly basis.

**Table:: 2.4 Energy sale (With in the State ) projection for entire control period**

Consumer Category	Past Year Energy Consumption data (in MU)					CAGR (5 Years)*	Estimate (MU)		Projected Sale in MU	
	FY 2018-19	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23		FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
	I	II	III	IV	V		VI	VII	VIII	IX
<b>HT &amp; EHT Category</b>										
<b>Non Commercial Consumers (Domestic)</b>										
AC 50Hz,3-Phase, 11KV	3.58	3.52	4.48	5.33	8.18	22.94%	10.06	12.36	15.20	18.69
AC 50Hz,3-Phase, 33KV	2.08	3.74	3.86	3.92	4.40	20.61%	5.31	6.40	7.72	9.31
<b>Commercial Consumers (Non-Industrial)</b>										
AC 50Hz,3-Phase, 11KV	9.60	10.32	10.34	11.97	17.18	15.66%	19.87	22.98	26.58	30.74
AC 50Hz,3-Phase, 33KV	0.15	0.09	0.28	0.33	0.27	16.31%	0.32	0.37	0.43	0.50
<b>Public Lighting and Water Supply Consumers</b>										



**Multi Year Tariff Petition & Aggregate Revenue Requirement of Deptt. of Power  
for FY 2024-25 to 2026-27**

Consumer Category	Past Year Energy Consumption data (in MU)					CAGR (5 Years)*	Estimate (MU)	Projected Sale in MU		
	FY 2018-19	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23		FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
	I	II	III	IV	V		VI	VII	VIII	IX
AC 50Hz,3-Phase, 11KV	3.75	3.58	3.72	3.00	3.26	0.00%	3.26	3.26	3.26	3.26
AC 50Hz,3-Phase, 33KV	0.00	0.00	0.62	0.00	0.00	0.00%	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>										
AC 50Hz,3-Phase, 11KV	0.01	0.00	0.19	0.00	0.01	0.00%	0.01	0.01	0.01	0.01
AC 50Hz,3-Phase, 33KV	0.00	0.00	0.34	0.00	0.00	0.00%	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>										
AC 50Hz,3-Phase, 11KV	12.79	14.38	14.30	18.71	20.17	12.06%	22.60	25.33	28.38	31.80
AC 50Hz,3-Phase, 33KV	22.34	21.12	27.85	32.27	38.00	14.20%	43.40	49.56	56.60	64.65
AC 50Hz,3-Phase, 132 KV	104.26	129.84	84.05	157.83	158.52	11.04%	176.02	195.46	217.04	241.01
<b>Bulk Mixed Consumers</b>										
AC 50Hz,3-Phase, 11KV	18.68	16.98	16.38	16.70	18.51	0.00%	18.51	18.51	18.51	18.51
AC 50Hz,3-Phase, 33KV	6.82	7.60	8.18	9.14	9.01	7.22%	9.66	10.36	11.11	11.91
AC 50Hz,3-Phase, 132 KV	36.06	22.73	1.49	0	0.00	0.00%	0.00	0.00	0.00	0.00
<b><u>Low Voltage Category</u></b>										
<b>Non Commercial Consumers (Domestic)</b>										
AC 50Hz,1-Phase, 230 Volt	125.51	126.49	131.107	145.190	165.04	7.09%	176.74	189.26	202.67	217.02
AC 50Hz,3-Phase, 400 Volt	19.63	20.61	22.212	25.340	26.41	7.70%	28.44	30.63	32.98	35.52
KJP & BPL connection AC 50Hz,1-Phase, 230 Volt	21.08	24.08	25.715	28.000	32.63	11.54%	36.40	40.60	45.28	50.51
<b>Commercial Consumers (Non-Industrial)</b>										
AC 50Hz,1-Phase, 230 Volt	24.74	25.64	25.429	30.350	41.31	13.68%	46.96	53.39	60.69	68.99
AC 50Hz,3-Phase, 400 Volt	17.32	18.58	17.666	21.730	29.54	14.28%	33.76	38.58	44.09	50.38
<b>Public Lighting and Water Supply Consumers</b>										
AC 50Hz,1-Phase, 230 Volt	3.37	2.84	2.447	2.620	3.15	0.00%	3.15	3.15	3.15	3.15
AC 50Hz,3-Phase, 400 Volt	1.59	1.92	2.528	2.380	2.56	12.67%	2.89	3.25	3.67	4.13
<b>Agricultural Consumers</b>										
AC 50Hz,1-Phase, 230 Volt	0.00	0.01	0.182	0.010	0.01	73.37%	0.02	0.03	0.05	0.08
AC 50Hz,3-Phase, 400 Volt	0.00	0.01	0.061	0.050	0.04	100.00%	0.07	0.15	0.30	0.60
<b>Industrial Consumers</b>										
AC 50Hz,1-Phase, 230 Volt	2.17	0.50	0.336	1.630	0.50	0.00%	0.50	0.50	0.50	0.50
AC 50Hz,3-Phase, 400 Volt	2.12	1.08	0.977	1.260	1.92	0.00%	1.92	1.92	1.92	1.92
<b>Temporary Consumer</b>										
LT/HT	0.14	0.24	0.372	0.480	1.49	0.00%	1.49	1.49	1.49	1.49
<b>Total</b>	<b>437.79</b>	<b>455.90</b>	<b>405.11</b>	<b>518.24</b>	<b>582.10</b>		<b>641.33</b>	<b>707.53</b>	<b>781.61</b>	<b>864.67</b>

In cases where there CAGR is negative, the growth factor has been considered as NIL. Hon'ble Commission is requested to approve the projected Energy Sale within the state for FY 2023-24, 2024-25 2025-26 & 2026-27 at 641.33MU, 707.53MU, 781.61MU, and 864.67MU respectively.



## 2.5 Forecast of Sale of Power Outside the State: -

The energy sale forecast outside the state is calculated assuming annual increment of 5% above the previous year's consumption and is shown in table 2.5 below:

**Table 2.5: Energy Sale Forecast outside the State**

Particulars	Unit	FY	FY	FY	FY	Current Year	MYT Control Period		
		2019-20 (Actual)	2020-21 (Actual)	2021-22 (Actual)	2022-23 (Actual)	FY 2023-24 (Estimate)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)
Energy Sale (IEX)	MU	111.85	179.66	168.22	234.12	245.83	258.12	271.02	284.57
Bilateral Sale	MU	0.00	7.20	96.71	130.42	136.94	143.79	150.98	158.53
Deviation Export	MU	74.94	14.89	13.14	14.76	14.69	13.96	13.26	12.60
Banking Export	MU	0.00	83.52	47.82	71.52	75.10	78.85	82.79	86.93
<b>Total</b>	<b>MU</b>	<b>186.79</b>	<b>285.28</b>	<b>325.89</b>	<b>450.82</b>	<b>472.56</b>	<b>494.71</b>	<b>518.05</b>	<b>542.63</b>

The Hon'ble Commission advised the APDoP through tariff order to reduce the sale outside the state as the sale at IEX is lower than the purchase price, in fact, APDoP is selling power in the IEX at the rate determined in the Exchange for a particular slot. The average selling rate at IEX is not much difference of the average purchase cost and sometimes it is in higher side. Also, APDoP has to resort to sale of power in RTM/DAM market of IEX as allocation of power especially during peak hours is much higher than the actual requirement of the state. Further, APDoP entered PPA with many generators before the inception of IEX and so the immediate termination of PPA may not be possible. Also, due to free power allocated from the Generating station located in Arunachal Pradesh, as being the home state, there used to be surplus power, especially during the high hydro season, hence the sale outside the state has to be continued. Hence, steady-outside state sales@5% annual increment has been projected for the ensuing and entire control period. Therefore, Hon'ble Commission is requested to approve the projected Energy Sale outside the state through IEX for FY 2023-24, 2024-25, 2025-26 & 2026-27 at 245.83 MU, 258.12 MU, 271.02 MU and 284.57 MU respectively.

The APDoP is selling surplus power under bilateral mode @ exchange rate plus 5 paise. Under this mode, the APDoP sold 7.20 MU of energy earning Rs. 1.87 Cr in the FY 2020-21, 96.71 MU of energy earning Rs. 35.73 Cr in the FY 2021-22 and 130.42 MU of energy earning Rs. 80.49 Cr in the FY 2022-23. The APDoP is planning to sell energy under bilateral mode to the tune of 136.94 MU, 143.79 MU, 150.98 MU, and 158.53 MU in the years 2023-24, 2024-25, 2025-26 & 2026-27 respectively. Hon'ble Commission is requested to approve the above proposal.



**2.6 Total Energy Sale Forecast: -**

The total energy sale forecast both within the state and outside the state is tabulated in the table 2.6 below:

**Table 2.6 :: Total Energy Sale Forecast**

Particulars	Unit	FY 2019-20 (Actual)	FY 2020-21 (Actual)	FY 2021-22 (Actual)	FY 2022-23 (Actual)	Current Year	MYT Control Period		
						FY 2023-24 (Estimate)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)
With in the State	MU	455.90	405.11	518.25	582.10	641.33	707.53	781.61	864.67
Outside the State	MU	186.79	285.28	325.89	450.82	472.56	494.71	518.05	542.63
<b>Total</b>	<b>MU</b>	<b>642.69</b>	<b>690.38</b>	<b>844.14</b>	<b>1032.92</b>	<b>1113.89</b>	<b>1202.24</b>	<b>1299.66</b>	<b>1407.30</b>

**2.7 Power Purchase Estimation: -**

The power purchase quantum for the current year and ensuing control period years is estimated considering various factors like previous energy consumptions, energy sale projection, judicious scheduling, likely distribution losses, surplus energy sale during high hydro, restricting deviation import, restricting import from high-cost generators, total energy requirement, etc. and is shown in table 2.7

**Table 2.7:: Power Purchase Estimation**

Source of Power (Station wise)		Energy Received (MU)	Multiplying Factor	Current year (Estimation) MU	Projection (MU)		
		FY 2022-23 (Actual)		FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
LOKTAK	NHPC	23.21	0%	23.21	23.21	23.21	23.21
KOPILI-I	NEEPCO	0.00	0%	0	0	0	0
KOPILI-II	NEEPCO	0.00	0%	0	0	0	0
KHANDONG	NEEPCO	0.00	0%	0	0	0	0
Panyor Lower	NEEPCO	88.87	0%	88.87	88.87	88.87	88.87
Free Energy Panyor L	NEEPCO	164.12		164.12	164.12	164.12	164.12
DOYANG	NEEPCO	11.71	0%	11.71	11.71	11.71	11.71
PARE	NEEPCO	30.74	0%	30.74	30.74	30.74	30.74
Free Energy Pare	NEEPCO	67.82		67.82	67.82	67.82	67.82
KAMENG	NEEPCO	53.18	0%	53.18	53.18	53.18	53.18
Free Energy Kameng	NEEPCO	344.87		344.87	344.87	344.87	344.87
AGBPP	NEEPCO	96.55	0%	96.55	96.55	96.55	96.55
AGTCCPP	NEEPCO	60.20	0%	60.20	60.20	60.20	60.20
PALATANA	OTPCL	142.92	0%	142.92	142.92	142.92	142.92



Source of Power (Station wise)		Energy Received (MU)	Multiplying Factor	Current year (Estimation) MU	Projection (MU)		
		FY 2022- 23 (Actual)		FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
BgTPP	NTPC	157.22	0%	157.22	157.22	157.22	157.22
FARAKKA	NTPC	20.04	0%	20.04	20.04	20.04	20.04
KAHALGAON	NTPC	10.66	0%	10.66	10.66	10.66	10.66
TALCHAR	NTPC	14.20	0%	14.20	14.20	14.20	14.20
DHPD	GoAP	41.97	0%	41.97	41.97	41.97	41.97
HPDCL	SPSU	5.24	0%	5.24	5.24	5.24	5.24
DIKSHI	IPP	65.17	0%	65.17	65.17	65.17	65.17
Free Energy Dikshi		11.64	0%	11.64	11.64	11.64	11.64
SOLAR	APEDA	0.96	0%	0.96	0.96	0.96	0.96
Deviation		66.05	-5%	62.75	59.61	56.63	53.80
IEX Purchase		6.15	0%	6.15	6.15	6.15	6.15
Banking (Import)		39.37	5%	41.34	43.41	45.58	47.86
Diesel Generation		0.28	0%	0.28	0.28	0.28	0.28
<b>TOTAL</b>		<b>1523.15</b>		<b>1521.81</b>	<b>1520.74</b>	<b>1519.93</b>	<b>1519.38</b>

From the above table, it may be seen that deviation import (UI) is reduced by 5% per year as it is a costly affair. Estimated Energy Requirement for FY 2023-24, 2024-25, 2025-26 & 2026-27 is kept at 1521.81MU, 1520.74 MU, 1519.93 MU, and 1519.38 MU respectively. The aggregate power requirement is decreasing every year. This is because the APDoP shall endeavour to reduce the AT&C loss. Hon'ble Commission is requested to approve the above estimates.

## **2.8 Power Purchase Cost Estimation: -**

The power purchase cost has been estimated by escalating the actual amount paid in the previous year to the Source/Agency by 5%. Further, as shown in Table 2.8, the drawl from Deviation is proposed to be reduced by 5%, accordingly, the Purchase Cost from deviation is reduced by that extent.



Particulars	Previous Year	Multiplying Factor for units	Multiplying Factor for cost (in	Current Year	MYT Control Period			Rs in Crore
	FY 2022-23 (Actual)			FY 2023-24 (Estimated)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)	
	NEEPCO			198.88	0	5	208.82	219.26
NTPC (Farakka, Kahal Gaon, Talchar)	18.29	0	5	19.20	20.16	21.17	22.23	
NTPC (BGTP)	121.57	0	5	127.65	134.04	140.74	147.77	
NHPC	9.27	0	5	9.74	10.22	10.73	11.27	
OTPC	39.61	0	5	41.59	43.67	45.85	48.14	
Deviation	21.29	-5	5	21.29	21.29	21.29	21.29	
Reactive	0	0	5	0.00	0.00	0.00	0.00	
Devi Engries	34.43	0	5	36.15	37.96	39.86	41.85	
HPDCAPL	2.68	0	5	2.81	2.95	3.10	3.25	
APPCPL	21.67	0	5	22.75	23.89	25.08	26.34	
Misc. Exp.	8.07	0	5	8.47	8.89	9.34	9.80	
<b>Total</b>	<b>475.75</b>			<b>498.48</b>	<b>522.34</b>	<b>547.39</b>	<b>573.69</b>	

The Hon'ble Commission is requested to approve the power purchase cost for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs 498.48 Cr, 522.34 Cr, 547.39 Cr, and 573.69 Cr respectively.

## 2.9 Inter-State and Intra-State Transmission Charges: -

The entire interstate power transmission in APDoP is transmitted through the PGCIL transmission infrastructure. The transmission charges incurred during 2019-20 to 2022-23 and projected transmission charges during the control period are tabulated in table 2.9(A) below. APDoP shall try to reduce power import from outside the State as many projects under IPP are coming up in the state. There is also a chargeable intrastate transmission system constructed by M/s Devi Energy Ltd to evacuate the power generated from the Dikshi SHP and the charges of previous years. Hence, the transmission charge has been calculated based on the proposed energy to be imported during respective years. Further, the transmission charges of last year are escalated by 5% year over year to factor in the yearly cost variations. The projected charges for the control period are shown in table 2.9(B).



<b>Table:: 2.9 (A) Inter State Transmission Charges</b>								
<b>Rs in Crore</b>								
Utility	Previous Year (Actual)				Current Year (Estimated)	MYT Control Period (Projected)		
	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23	FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
PGCIL	40.58	54.12	28.17	1.90	1.9	1.9	1.9	1.9
CTUIL			74.65	107.83	113.12	118.70	124.57	130.75
APDCL		2.12	2.81	2.79	2.93	3.08	3.23	3.39
<b>Total</b>	40.58	56.23	105.63	112.51	117.95	123.67	129.70	136.04

Hon'ble Commission is requested to approve the Estimated Inter-State Transmission Charges for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs 117.95 Cr, Rs 123.67 Cr, Rs 129.70 Cr, and 136.04 Cr respectively.

<b>Table:: 2.9(B) Intra State Transmission Charges</b>								
<b>Rs in Crore</b>								
Utility	Previous Years (Actual)				Current Year (Estimated)	MYT Control Period		
	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23	FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
							Projected	
Devi Energies	6.99	11.81	11.45	11.45	12.02	12.62	13.25	13.92

APDoP has escalated the Intra State Transmission Charges for the previous year by 5% year over year to project the Intra State Transmission Charges. The Hon'ble Commission is requested to approve the estimated Intra State Transmission Charges for FY 2023-24, 2024-25, 2025-26 & 2026-27 as proposed above for the respective years.

## 2.10 Fees and charges of NLDC/RLDC/SLDC etc.: -

The fees for NERLDC have been estimated with proposed annual increment @ 5% of the previous year. Fees and charges for NERLDC and NERPC during 2019-20 to 2022-23 and projected fees for the control period are tabulated in table 2.10 below;



<b>Table:: 2.10 Fee and Charges of NERLDC</b>								
Utility	Fee and Charges of NERLDC (Rs in Crore)							
	Previous Years (Actual)				Current Year (Estimated)	MYT Control Period (Projected)		
	FY 2019-20	FY 2020-21	FY 2021-22	FY 2022-23	FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
NERLDC Fee	1.04	0.64	1.01	1.11	1.17	1.22	1.28	1.35
NERPC board fund	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01
<b>Total</b>	<b>1.05</b>	<b>0.65</b>	<b>1.02</b>	<b>1.12</b>	<b>1.18</b>	<b>1.23</b>	<b>1.29</b>	<b>1.36</b>

Hon'ble Commission is requested to approve the Estimated NERLDC fee and NERPC board fund for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs 1.18Cr, 1.23Cr, 1.29Cr, and 1.36Cr respectively.

### 2.11 Operation and Maintenance Cost: -

Operation and maintenance cost consist of three components;

- 1) Employee cost,
- 2) Repair and Maintenance cost
- 3) Administrative and General costs.

The APDoP has 9988 Nos of total employees. The detail is shown in table 2.11.

<b>Table:: 2.11(A) Number of Employees</b>								
Category of Employees	(Actual) FY 2019-20	(Actual) FY 2020-21	(Actual) FY 2021-22	(Actual) FY 2022-23	FY 2023-24 (Estimate)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)
Regular Employees	1054	1054	1054	1054	1054	1054	1054	1054
Work Charged Employees	2786	2786	2786	2786	2786	2786	2786	2786
Casual Employees	6148	6148	6148	6148	6148	6148	6148	6148
<b>Total</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>	<b>9988</b>

The past and projected cost of these three components for the entire control period has been calculated as per APSERC guidelines provided in format 5 of MYT regulation 2018. The O&M expenses of the first year of the control period i.e. 2024-25 have been computed by escalating the average of the previous 3 years by 5.72% twice. And then next years of the control period are computed by increasing by 5.72% every year. The details are shown in table 2.11(B).



Sl. No.	Particulars	Previous Year				3 Year Average	Current Year	MYT Control Period		
		(Actual) FY 2019-20	(Actual) FY 2020-21	(Actual) FY 2021-22	(Actual) FY 2022-23		(Estimated) FY 2023-24	(Projected) FY 2024-25	(Projected) FY 2025-26	(Projected) FY 2026-27
1	Employee Expenses	312.81	315.38	336.88	372.93	341.73	380.82	402.61	425.64	449.98
2	A&G Expenses	5.86	5.46	9.24	15.11	9.94	11.07	11.71	12.38	13.08
3	R&M Expenses	48.18	40.83	28.85	28.96	32.88	36.64	38.74	40.95	43.30
4	<b>Total O&amp;M Expenses</b>	<b>366.85</b>	<b>361.67</b>	<b>374.97</b>	<b>417.00</b>	<b>384.55</b>	<b>428.54</b>	<b>453.05</b>	<b>478.97</b>	<b>506.36</b>

Hon'ble Commission is requested to approve Estimated O&M expenses for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs. 428.54 Cr, 453.05 Cr, Rs. 478.97 Cr & Rs.506.36Cr respectively.

#### **2.12 Interest in Working Capital**

Working capital for APDoP used to be provided by the Government of AP as a grant as and when required, and therefore no interest on working capital is required to be paid by APDoP. Hence, interest in working capital may be considered **Nil**.

#### **2.13 Bad and doubtful debt**

APDoP does not have any bad and doubtful debt as per records. Therefore, provision for bad and doubtful debt may be considered **Nil**.

#### **2.14 Aggregate Revenue Requirement**

Considering all the aspects depicted above the aggregate revenue requirements of APDoP for the ensuing and entire controlled period are summarised in table 2.10.



<b>Table 2.14 :: Aggregate Revenue Requirement</b>					
<b>(Rs. In Crores)</b>					
<b>S.L No.</b>	<b>Particulars</b>	<b>(Estimated) FY 2023-24</b>	<b>(Projected) FY 2024-25</b>	<b>(Projected) FY 2025-26</b>	<b>(Projected) FY 2026-27</b>
1	Return on Equity Capital				
2	Interest on Loan Capital				
3	Depreciation				
4	Power Purchase Expenses	498.48	522.34	547.39	573.69
5	Interstate Transmission Charges	117.95	123.67	129.70	136.04
6	Intrastate Transmission Charges	12.02	12.62	13.25	13.92
7	Fees and charges of NERLDC/NERPC	1.18	1.23	1.29	1.36
8	O&M expenses	428.54	453.05	478.97	506.36
9	Interest on working Capital				
10	Provision for bad and doubtful debt				
11	<b>Total Revenue Requirement</b>	<b>1058.17</b>	<b>1112.92</b>	<b>1170.60</b>	<b>1231.38</b>

Hon'ble Commission is requested to approve the Estimated Aggregate Revenue Requirement for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs. 1058.17 Cr, Rs. 1112.92 Cr, Rs 1170.60 Cr, and Rs.1231.38 Cr respectively.



## CHAPTER – III:: EXPECTED REVENUE AND REVENUE GAP RECOVERY

### 3.1 Expected revenue in the existing tariff from the sale within the state: -

The category-wise energy sale in MU has been projected in table 2.4. by using CAGR. These energy sale projections have been multiplied by category-wise existing tariffs to estimate the expected revenue from within the state and are tabulated in table 3.1

**Table 3.1::Revenue projection from the sale of energy within the state in the existing tariff**

Consumer Category	Existing Tariff (Per Kwh)	Previous Year (Actual)		Ensuing Year (Estimated)		Sale Projection in MYT Control Period					
		FY 2022-23		FY 2023-24		FY 2024-25		FY 2025-26		FY 2026-27	
		Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.
<b>Non Commercial Consumers (Domestic)</b>											
3-Phase, 11KV	3.40	8.18	2.78	10.06	3.42	12.36	4.20	15.20	5.17	18.69	6.35
3-Phase, 33KV	3.25	4.40	1.43	5.31	1.72	6.40	2.08	7.72	2.51	9.31	3.03
<b>Commercial Consumers (Non-Industrial)</b>											
3-Phase, 11KV	4.20	17.18	7.21	19.87	8.34	22.98	9.65	26.58	11.16	30.74	12.91
3-Phase, 33KV	4.00	0.27	0.11	0.32	0.13	0.37	0.15	0.43	0.17	0.50	0.20
<b>Public Lighting and Water Supply Consumers</b>											
3-Phase, 11KV	4.20	3.26	1.37	3.26	1.37	3.26	1.37	3.26	1.37	3.26	1.37
3-Phase, 33KV	4.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>											
3-Phase, 11KV	2.75	0.01	0.00	0.01	0.00	0.01	0.00	0.01	0.00	0.01	0.00
3-Phase, 33KV	2.65	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>											
3-Phase, 11KV	3.85	20.17	7.76	22.60	8.70	25.33	9.75	28.38	10.93	31.80	12.24
3-Phase, 33KV	3.50	38.00	13.30	43.40	15.19	49.56	17.35	56.60	19.81	64.65	22.63
3-Phase, 132 KV	3.35	158.52	53.10	176.02	58.97	195.46	65.48	217.04	72.71	241.01	80.74
<b>Bulk Mixed Consumers</b>											
3-Phase, 11KV	3.75	18.51	6.94	18.51	6.94	18.51	6.94	18.51	6.94	18.51	6.94
3-Phase, 33KV	3.40	9.01	3.06	9.66	3.29	10.36	3.52	11.11	3.78	11.91	4.05
3-Phase, 132 KV	3.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Low Voltage Category</b>											
<b>Non Commercial Consumers (Domestic)</b>											
1-Phase, 230 Volt	4.00	165.04	66.02	176.74	70.69	189.26	75.70	202.67	81.07	217.02	86.81
3-Phase, 400 Volt	4.00	26.41	10.56	28.44	11.38	30.63	12.25	32.98	13.19	35.52	14.21
KJP & BPL connection	2.65	32.63	8.65	36.40	9.64	40.60	10.76	45.28	12.00	50.51	13.38



Consumer Category	Existing Tariff (Per Kwh)	Previous Year (Actual)		Ensuing Year (Estimated)		Sale Projection in MYT Control Period					
		FY 2022-23		FY 2023-24		FY 2024-25		FY 2025-26		FY 2026-27	
		Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.
<b>Commercial Consumers (Non-Industrial)</b>											
1-Phase, 230 Volt	5.00	41.31	20.66	46.96	23.48	53.39	26.69	60.69	30.34	68.99	34.49
3-Phase, 400 Volt	5.00	29.54	14.77	33.76	16.88	38.58	19.29	44.09	22.04	50.38	25.19
<b>Public Lighting and Water Supply Consumers</b>											
1-Phase, 230 Volt	5.10	3.15	1.60	3.15	1.60	3.15	1.60	3.15	1.60	3.15	1.60
3-Phase, 400 Volt	5.10	2.56	1.31	2.89	1.47	3.25	1.66	3.67	1.87	4.13	2.11
<b>Agricultural Consumers</b>											
1-Phase, 230 Volt	3.10	0.01	0.00	0.02	0.00	0.03	0.01	0.05	0.01	0.08	0.03
3-Phase, 400 Volt	3.10	0.04	0.01	0.07	0.02	0.15	0.05	0.30	0.09	0.60	0.19
<b>Industrial Consumers</b>											
1-Phase, 230 Volt	4.30	0.50	0.21	0.50	0.21	0.50	0.21	0.50	0.21	0.50	0.21
3-Phase, 400 Volt	4.30	1.92	0.82	1.92	0.82	1.92	0.82	1.92	0.82	1.92	0.82
<b>Temporary Consumer</b>											
LT/HT	6.50	1.49	0.97	1.49	0.97	1.49	0.97	1.49	0.97	1.49	0.97
<b>Total</b>		582.10	222.67	641.33	245.26	707.53	270.51	781.61	298.78	864.67	330.48

In the following tables,, the revenue, which includes non-tariff income such as late payment surcharge, meter rent etc., has also been shown. The following tables show the total income that includes not only revenue from existing tariff, as well as it also includes non -tariff income for the FY 2022-23, FY 2023-24, FY 2024-25, FY 2025-26 and FY 2026-27 respectively.

Table 3.1A Revenue for FY 2022-23 (including non-tariff income)							
Consumer Category	Existing Tariff (Per Kwh)	Previous Year (Actual) FY 2022-23					
		Revenue from existing tariff		Other Revenue Billed			Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges	
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>High Voltage Category</b>							
<b>Non Commercial Consumers (Domestic)</b>							
3-Phase, 11KV	3.4	8.18	2.78	0.33	0.03	0.00	3.15
3-Phase, 33KV	3.25	4.4	1.43	0.28	0.01	0.00	1.72
<b>Commercial Consumers (Non-Industrial)</b>							
3-Phase, 11KV	4.2	17.18	7.21	1.33	0.08	0.00	8.63
3-Phase, 33KV	4	0.27	0.11	0.00	0.00	0.00	0.11
<b>Public Lighting and Water Supply Consumers</b>							



Table 3.1A Revenue for FY 2022-23 (including non-tariff income)							
Consumer Category	Existing Tariff (Per Kwh)	Previous Year (Actual) FY 2022-23					
		Revenue from existing tariff		Other Revenue Billed			Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges	
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
3-Phase, 11KV	4.2	3.26	1.37	0.42	0.00	0.00	1.79
3-Phase, 33KV	4	0	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>							
3-Phase, 11KV	2.75	0.01	0.00	0.00	0.00	0.00	0.00
3-Phase, 33KV	2.65	0	0.00	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>							
3-Phase, 11KV	3.85	20.17	7.76	0.59	0.02	0.01	8.37
3-Phase, 33KV	3.5	38	13.30	1.01	0.05	0.00	14.34
3-Phase, 132 KV	3.35	158.52	53.10	0.08	0.03	0.00	53.22
<b>Bulk Mixed Consumers</b>							
3-Phase, 11KV	3.75	18.51	6.94	0.52	0.03	0.00	7.52
3-Phase, 33KV	3.4	9.01	3.06	0.03	0.01	0.00	3.10
3-Phase, 132 KV	3.25	0	0	0	0	0	0.00
<b>Low Voltage Category</b>							
<b>Non Commercial Consumers (Domestic)</b>							
1-Phase, 230 Volt	4	165.04	66.02	17.91	1.08	0.74	85.72
3-Phase, 400 Volt	4	26.41	10.56	1.94	0.05	0.03	12.58
KJP & BPL connection	2.65	32.63	8.65	6.84	0.26	0.00	15.75
<b>Commercial Consumers (Non-Industrial)</b>							
1-Phase, 230 Volt	5	41.31	20.66	3.09	0.20	0.09	24.19
3-Phase, 400 Volt	5	29.54	14.77	2.69	0.06	0.02	17.55
<b>Public Lighting and Water Supply Consumers</b>							
1-Phase, 230 Volt	5.1	3.15	1.60	0.59	0.00	0.00	2.19
3-Phase, 400 Volt	5.1	2.56	1.31	0.35	0.01	0.05	1.71
<b>Agricultural Consumers</b>							
1-Phase, 230 Volt	3.1	0.01	0.00	0.00	0.00	0.00	0.00
3-Phase, 400 Volt	3.1	0.04	0.01	0.00	0.00	0.00	0.01
<b>Industrial Consumers</b>							
1-Phase, 230 Volt	4.3	0.5	0.21	0.18	0.00	0.01	0.40
3-Phase, 400 Volt	4.3	1.92	0.82	0.27	0.01	0.00	1.10
LT/HT	6.5	1.49	0.97	0.05	0.00	0.00	1.02
<b>Total</b>		582.1	222.67	38.50	1.94	0.96	264.19



**Table 3.1B Revenue for FY 2023-24( including non-tariff income)**

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Estimate) FY 2023-24						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>High Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
3-Phase, 11KV	3.4	10.06	3.42	0.37	0.04	0.00	0.40	3.82
3-Phase, 33KV	3.25	5.31	1.72	0.31	0.01	0.00	0.32	2.05
<b>Commercial Consumers (Non-Industrial)</b>								
3-Phase, 11KV	4.2	19.87	8.34	1.46	0.09	0.00	1.56	9.90
3-Phase, 33KV	4	0.32	0.13	0.00	0.00	0.00	0.01	0.13
<b>Public Lighting and Water Supply Consumers</b>								
3-Phase, 11KV	4.2	3.26	1.37	0.46	0.00	0.00	0.46	1.83
3-Phase, 33KV	4	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>								
3-Phase, 11KV	2.75	0.01	0.00	0.00	0.00	0.00	0.00	0.00
3-Phase, 33KV	2.65	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>								
3-Phase, 11KV	3.85	22.60	8.70	0.65	0.02	0.01	0.68	9.38
3-Phase, 33KV	3.5	43.40	15.19	1.12	0.06	0.00	1.17	16.36
3-Phase, 132 KV	3.35	176.02	58.97	0.09	0.04	0.00	0.13	59.09
<b>Bulk Mixed Consumers</b>								
3-Phase, 11KV	3.75	18.51	6.94	0.58	0.03	0.00	0.61	7.55
3-Phase, 33KV	3.4	9.66	3.29	0.03	0.01	0.00	0.04	3.33
3-Phase, 132 KV	3.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Low Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
1-Phase, 230 Volt	4	176.74	70.69	19.80	1.19	0.82	21.81	92.50
3-Phase, 400 Volt	4	28.44	11.38	2.14	0.05	0.04	2.23	13.61
KJP & BPL connection	2.65	36.40	9.64	7.55	0.29	0.00	7.84	17.49
<b>Commercial Consumers (Non-Industrial)</b>								
1-Phase, 230 Volt	5	46.96	23.48	3.50	0.22	0.10	3.83	27.31



**Table 3.1B Revenue for FY 2023-24( including non-tariff income)**

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Estimate) FY 2023-24						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
3-Phase, 400 Volt	5	33.76	16.88	2.97	0.06	0.03	3.06	19.94
<b>Public Lighting and Water Supply Consumers</b>								
1-Phase, 230 Volt	5.1	3.15	1.60	0.65	0.00	0.00	0.65	2.26
3-Phase, 400 Volt	5.1	2.89	1.47	0.38	0.01	0.05	0.44	1.92
<b>Agricultural Consumers</b>								
1-Phase, 230 Volt	3.1	0.02	0.00	0.00	0.00	0.00	0.00	0.00
3-Phase, 400 Volt	3.1	0.07	0.02	0.00	0.00	0.00	0.00	0.02
<b>Industrial Consumers</b>								
1-Phase, 230 Volt	4.3	0.50	0.21	0.20	0.00	0.01	0.20	0.42
3-Phase, 400 Volt	4.3	1.92	0.82	0.30	0.01	0.00	0.31	1.13
LT/HT	6.5	1.49	0.97	0.06	0.00	0.00	0.06	1.03
<b>Total</b>		<b>641.34</b>	<b>245.26</b>	<b>42.62</b>	<b>2.14</b>	<b>1.06</b>	<b>45.81</b>	<b>291.07</b>

**Table 3.1C Revenue for FY 2024-25(including non-tariff income)**

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2024-25						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>High Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
3-Phase, 11KV	3.4	12.36	4.20	0.41	0.04	0.00	0.45	4.65
3-Phase, 33KV	3.25	6.40	2.08	0.35	0.01	0.00	0.36	2.44
<b>Commercial Consumers (Non-Industrial)</b>								
3-Phase, 11KV	4.2	22.98	9.65	1.62	0.10	0.00	1.72	11.37
3-Phase, 33KV	4	0.37	0.15	0.01	0.00	0.00	0.01	0.15
<b>Public Lighting and Water Supply Consumers</b>								
3-Phase, 11KV	4.2	3.26	1.37	0.51	0.00	0.00	0.51	1.88
3-Phase, 33KV	4	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>								
3-Phase, 11KV	2.75	0.01	0.00	0.00	0.00	0.00	0.00	0.00
3-Phase, 33KV	2.65	0.00	0.00	0.00	0.00	0.00	0.00	0.00





Table 3.1C Revenue for FY 2024-25(including non-tariff income)

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2024-25						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>Industrial Consumers</b>								
3-Phase, 11KV	3.85	25.33	9.75	0.72	0.02	0.01	0.75	10.50
3-Phase, 33KV	3.5	49.56	17.35	1.23	0.07	0.00	1.30	18.65
3-Phase, 132 KV	3.35	195.46	65.48	0.10	0.04	0.00	0.14	65.62
<b>Bulk Mixed Consumers</b>								
3-Phase, 11KV	3.75	18.51	6.94	0.64	0.04	0.00	0.68	7.62
3-Phase, 33KV	3.4	10.36	3.52	0.03	0.01	0.00	0.05	3.57
3-Phase, 132 KV	3.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Low Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
1-Phase, 230 Volt	4	189.26	75.70	21.86	1.32	0.90	24.08	99.78
3-Phase, 400 Volt	4	30.63	12.25	2.37	0.06	0.04	2.47	14.72
KJP & BPL connection	2.65	40.60	10.76	8.36	0.32	0.00	8.68	19.44
<b>Commercial Consumers (Non-Industrial)</b>								
1-Phase, 230 Volt	5	53.39	26.69	3.77	0.25	0.12	4.13	30.83
3-Phase, 400 Volt	5	38.58	19.29	3.29	0.07	0.03	3.38	22.67
<b>Public Lighting and Water Supply Consumers</b>								
1-Phase, 230 Volt	5.1	3.15	1.60	0.72	0.00	0.00	0.72	2.33
3-Phase, 400 Volt	5.1	3.25	1.66	0.42	0.01	0.06	0.49	2.15
<b>Agricultural Consumers</b>								
1-Phase, 230 Volt	3.1	0.03	0.01	0.00	0.00	0.00	0.00	0.01
3-Phase, 400 Volt	3.1	0.15	0.05	0.00	0.00	0.00	0.00	0.05
<b>Industrial Consumers</b>								
1-Phase, 230 Volt	4.3	0.50	0.21	0.22	0.00	0.01	0.23	0.44
3-Phase, 400 Volt	4.3	1.92	0.82	0.33	0.01	0.00	0.34	1.16
LT/HT	6.5	1.49	0.97	0.06	0.00	0.00	0.06	1.03
<b>Total</b>		707.53	270.51	47.00	2.37	1.17	50.54	321.05



Table 3.1D Revenue for FY 2025-26( including non-tariff income)

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2025-26						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>High Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
3-Phase, 11KV	3.4	15.20	5.17	0.45	0.04	0.00	0.49	5.66
3-Phase, 33KV	3.25	7.72	2.51	0.38	0.01	0.00	0.39	2.90
<b>Commercial Consumers (Non-Industrial)</b>								
3-Phase, 11KV	4.2	26.58	11.16	1.79	0.11	0.00	1.90	13.07
3-Phase, 33KV	4	0.43	0.17	0.01	0.00	0.00	0.01	0.18
<b>Public Lighting and Water Supply Consumers</b>								
3-Phase, 11KV	4.2	3.26	1.37	0.56	0.00	0.00	0.56	1.93
3-Phase, 33KV	4	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>								
3-Phase, 11KV	2.75	0.01	0.00	0.00	0.00	0.00	0.00	0.00
3-Phase, 33KV	2.65	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>								
3-Phase, 11KV	3.85	28.38	10.93	0.79	0.02	0.01	0.83	11.75
3-Phase, 33KV	3.5	56.60	19.81	1.36	0.07	0.00	1.44	21.25
3-Phase, 132 KV	3.35	217.04	72.71	0.11	0.04	0.00	0.15	72.86
<b>Bulk Mixed Consumers</b>								
3-Phase, 11KV	3.75	18.51	6.94	0.71	0.04	0.00	0.75	7.69
3-Phase, 33KV	3.4	11.11	3.78	0.04	0.01	0.00	0.05	3.83
3-Phase, 132 KV	3.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Low Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
1-Phase, 230 Volt	4	202.67	81.07	24.14	1.45	1.00	26.59	107.65
3-Phase, 400 Volt	4	32.98	13.19	2.61	0.07	0.05	2.73	15.92
KJP & BPL connection	2.65	45.28	12.00	9.23	0.35	0.00	9.58	21.58
<b>Commercial Consumers (Non-Industrial)</b>								
1-Phase, 230 Volt	5	60.69	30.34	4.16	0.27	0.13	4.56	34.91
3-Phase, 400 Volt	5	44.09	22.04	3.63	0.07	0.03	3.74	25.78



<b>Table 3.1D Revenue for FY 2025-26( including non-tariff income)</b>								
Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2025-26						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>Public Lighting and Water Supply Consumers</b>								
1-Phase, 230 Volt	5.1	3.15	1.60	0.79	0.01	0.00	0.80	2.40
3-Phase, 400 Volt	5.1	3.67	1.87	0.47	0.02	0.06	0.54	2.41
<b>Agricultural Consumers</b>								
1-Phase, 230 Volt	3.1	0.05	0.01	0.00	0.00	0.00	0.00	0.01
3-Phase, 400 Volt	3.1	0.30	0.09	0.00	0.00	0.00	0.00	0.09
<b>Industrial Consumers</b>								
1-Phase, 230 Volt	4.3	0.50	0.21	0.24	0.00	0.01	0.25	0.46
3-Phase, 400 Volt	4.3	1.92	0.82	0.37	0.01	0.00	0.38	1.20
LT/HT	6.5	1.49	0.97	0.07	0.00	0.00	0.07	1.04
<b>Total</b>		781.61	298.78	51.90	2.62	1.29	55.81	354.59

<b>Table 3.1E Revenue for FY 2026-27(including non-tariff income)</b>								
Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2026-27						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
<b>High Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
3-Phase, 11KV	3.4	18.69	6.35	0.50	0.05	0.00	0.54	6.90
3-Phase, 33KV	3.25	9.31	3.03	0.42	0.01	0.00	0.43	3.46
<b>Commercial Consumers (Non-Industrial)</b>								
3-Phase, 11KV	4.2	30.74	12.91	1.98	0.13	0.00	2.11	15.02
3-Phase, 33KV	4	0.50	0.20	0.01	0.00	0.00	0.01	0.21
<b>Public Lighting and Water Supply Consumers</b>								
3-Phase, 11KV	4.2	3.26	1.37	0.62	0.00	0.00	0.62	1.99
3-Phase, 33KV	4	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Agricultural Consumers</b>								
3-Phase, 11KV	2.75	0.01	0.00	0.00	0.00	0.00	0.00	0.00
3-Phase, 33KV	2.65	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Industrial Consumers</b>								



**Table 3.1E Revenue for FY 2026-27(including non-tariff income)**

Consumer Category	Existing Tariff (Per Kwh)	Ensuing Year (Projected) FY 2026-27						
		Revenue from existing tariff		Other Revenue Billed			Total other income	Total Revenue Billed
		Energy Charge		LPS	Metre Rent	Any Other Charges		
		Sale (MU)	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.	Rs in Cr.
3-Phase, 11KV	3.85	31.80	12.24	0.88	0.02	0.02	0.91	13.16
3-Phase, 33KV	3.5	64.65	22.63	1.51	0.08	0.00	1.59	24.21
3-Phase, 132 KV	3.35	241.01	80.74	0.12	0.05	0.00	0.17	80.91
<b>Bulk Mixed Consumers</b>								
3-Phase, 11KV	3.75	18.51	6.94	0.78	0.04	0.00	0.83	7.77
3-Phase, 33KV	3.4	11.91	4.05	0.04	0.02	0.00	0.06	4.11
3-Phase, 132 KV	3.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Low Voltage Category</b>								
<b>Non Commercial Consumers (Domestic)</b>								
1-Phase, 230 Volt	4	217.02	86.81	26.70	1.61	1.10	29.41	116.22
3-Phase, 400 Volt	4	35.52	14.21	2.89	0.07	0.05	3.02	17.23
KJP & BPL connection	2.65	50.51	13.38	10.21	0.39	0.00	10.60	23.98
<b>Commercial Consumers (Non-Industrial)</b>								
1-Phase, 230 Volt	5	68.99	34.49	4.61	0.30	0.14	5.05	39.54
3-Phase, 400 Volt	5	50.38	25.19	4.02	0.08	0.04	4.13	29.33
<b>Public Lighting and Water Supply Consumers</b>								
1-Phase, 230 Volt	5.1	3.15	1.60	0.87	0.01	0.00	0.88	2.48
3-Phase, 400 Volt	5.1	4.13	2.11	0.52	0.02	0.07	0.60	2.71
<b>Agricultural Consumers</b>								
1-Phase, 230 Volt	3.1	0.08	0.03	0.00	0.00	0.00	0.00	0.03
3-Phase, 400 Volt	3.1	0.60	0.19	0.00	0.00	0.00	0.00	0.19
<b>Industrial Consumers</b>								
1-Phase, 230 Volt	4.3	0.50	0.21	0.27	0.00	0.01	0.28	0.49
3-Phase, 400 Volt	4.3	1.92	0.82	0.41	0.01	0.00	0.42	1.24
LT/HT	6.5	1.49	0.97	0.08	0.00	0.00	0.08	1.05
<b>Total</b>		864.67	330.48	57.41	2.89	1.43	61.73	392.21



**3.2 Expected revenues from sales outside the state: -**

**Table 3.2::Revenue projection from sales outside the state in the existing tariff**

Consumer Category	Average Tariff (Per Kwh)	Previous Year		Current Year Estimated		Sale Projection in MYT Control Period (in MU)					
		FY 2022-23		FY 2023-24		FY 2024-25		FY 2025-26		FY 2026-27	
		Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.
Energy Sale (IEX)	5.80	234.12	135.69	245.83	142.47	258.12	149.60	271.02	157.08	284.57	164.93
Bilateral Sale	6.17	130.42	80.49	136.94	84.51	143.79	88.74	150.98	93.18	158.53	97.84
Deviation Export	0										
		14.76	0.00	14.69	0.00	13.96	0.00	13.26	0.00	12.60	0.00
<b>Total</b>		379.30	216.18	397.46	226.99	415.86	238.34	435.26	250.25	455.70	262.77

**3.3 Expected revenue from sales both within and outside the state: -**

**Table 3.3: Revenue projection from the sale within and outside the state in the existing tariff**

Consumer Category	Average Tariff (Per Kwh)	Previous Year		Current Year Estimated		Sale Projection in MYT Control Period (in MU)					
		FY 2022-23		FY 2023-24		FY 2024-25		FY 2025-26		FY 2026-27	
		Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.	Sale (MU)	Rs in Cr.
With in the State	3.91	582.10	264.19	641.33	291.07	707.53	321.05	781.61	354.59	864.67	392.21
Out side the State	3.99	379.30	216.18	397.46	226.99	415.86	238.34	435.26	250.25	455.70	262.77
<b>Total</b>		961.40	480.37	1038.79	518.06	1123.39	559.38	1216.87	604.85	1320.37	654.97

The actual revenue billed (Within the State) is Rs. 264.19 Cr for FY 2022-23. The total revenue includes other charges such as Late Payment Surcharge, Meter Rent etc. in addition to revenue from Tariff. The petitioner has calculated the ratio of total revenue & revenue from Tariff for the FY 2022-23. Further, revenue from tariff for the ensuing years have been calculated at the proposed rate & the same has been increased in the above ratio to arrive at the total revenue.



### 3.4 Aggregate Revenue Requirement and Revenue Gap: -

From chapter II, the annual revenue requirement, income, average cost of supply, and revenue gap is tabulated in table 3.4.

S.L No.	Particulars	Current Year	MYT Control Period		
		(Estimated) FY 2023-24	(Projected) FY 2024-25	(Projected) FY 2025-26	(Projected) FY 2026-27
	ARR	Rs. In Cr.	Rs. In Cr.	Rs. In Cr.	Rs. In Cr.
1	Return on Equity Capital				
2	Interest on Loan Capital				
3	Depreciation				
4	Power Purchase Expenses	498.48	522.34	547.39	573.69
5	Interstate Transmission Charges	117.95	123.67	129.70	136.04
6	Intrastate Transmission Charges	12.02	12.62	13.25	13.92
7	Fees and charges of NERLDC/NERPC	1.18	1.23	1.29	1.36
8	O&M expenses	428.54	453.05	478.97	506.36
9	Interest on working Capital				
10	Provision for bad and doubtful debt				
11	<b>Total Revenue Requirement</b>	1058.17	1112.92	1170.60	1231.38
12	<b>Revenue from EXISTING Tariff</b>	245.26	270.51	298.78	330.48
13	<b>Other income (Non-Tariff)</b>	45.81	50.53	55.81	61.73
14	<b>Total revenue within state (including other income)</b>	291.07	321.05	354.59	392.21
15	Revenue from Sale of Surplus Power	226.99	238.34	250.25	262.77
16	<b>Total Annual Income (14+15)</b>	518.06	559.38	604.85	654.97
17	<b>Revenue gap (11-16)</b>	540.11	553.54	565.76	576.40
18	Total Energy Sale (MU)	1113.89	1202.24	1299.66	1407.30
19	Gross Energy Input	1521.81	1520.74	1519.93	1519.38
20	<b>Average Cost of Supply (ACS) (11/19 - Rs/Kwh)</b>	6.95	7.32	7.70	8.10

### 3.5 ARR & ACS Gap from FY 2023-24 to FY 2026-27: -

**3.5.1** The ACS and ARR Gap has been calculated as per the guidelines of Central Electricity Authority. The ACS-ARR gap for the FY 2023-24 is shown in the table below.

SL NO	Table No. 3.5.1 ACS-ARR Gap of FY 2023-24		
1	<b>Total Revenue Requirement</b>	Rs in Crore	1058.17
2	<b>Gross Energy Input</b>	in MU	1521.81
3	Revenue from EXISTING Tariff	Rs in Crore	245.26
4	Other income(Late payment, Meter rent etc)	Rs in Crore	45.81
5	Total revenue within state ( including other income)	Rs in Crore	291.07
6	Revenue from Sale of Surplus Power	Rs in Crore	226.99
7	<b>Total Annual Income</b>	Rs in Crore	518.06
8	<b>Grant (1-7)</b>	Rs in Crore	540.11
9	<b>Avg. Cost of Supply (Rs/Kwh) (1/2*10)</b>	RS/KWH	6.95
10	<b>Average Realisable Revenue (Rs/Kwh) (7+8/2*10)</b>	Rs/KWH	6.95
11	ACS-ARR ( 9-10)	Rs/KWH	0.00

**3.5.2** The ACS and ARR Gap has been calculated as per the guidelines of Central Electricity Authority. The ACS-ARR gap for the FY 2024-25 is shown in the table below.

SL NO	Table No. 3.5.2 ACS-ARR Gap of FY 2024-25		
1	<b>Total Revenue Requirement</b>	Rs in Crore	1112.92
2	<b>Gross Energy Input</b>	in MU	1520.74
3	Revenue from EXISTING Tariff	Rs in Crore	270.51
4	Other income(Late payment, Meter rent etc)	Rs in Crore	50.53
5	Total revenue within state ( including other income)	Rs in Crore	321.05
6	Revenue from Sale of Surplus Power	Rs in Crore	238.34
7	<b>Total Annual Income</b>	Rs in Crore	559.38
8	<b>Grant (1-7)</b>	Rs in Crore	553.54



SL NO	Table No. 3.5.2 ACS-ARR Gap of FY 2024-25		
9	<b>Avg. Cost of Supply (Rs/Kwh) (1/2*10)</b>	RS/KWH	7.32
10	<b>Average Realisable Revenue (Rs/Kwh) (7+8/2*10)</b>	Rs/KWH	7.32
11	<b>ACS-ARR ( 9-10)</b>	Rs/KWH	0.00

**3.5.3** The ACS and ARR Gap has been calculated as per the guidelines of Central Electricity Authority. The ACS-ARR gap for the FY 2025-26 is shown in the table below.

SL NO	Table No. 3.5.3 ACS-ARR Gap of FY 2025-26		
1	<b>Total Revenue Requirement</b>	Rs in Crore	1170.60
2	<b>Gross Energy Input</b>	in MU	1519.93
3	Revenue from EXISTING Tariff	Rs in Crore	298.78
4	Other income(Late payment, Meter rent etc)	Rs in Crore	55.81
5	Total revenue within state ( including other income)	Rs in Crore	354.59
6	Revenue from Sale of Surplus Power	Rs in Crore	250.25
7	<b>Total Annual Income</b>	Rs in Crore	604.85
8	<b>Grant (1-7)</b>	Rs in Crore	565.76
9	<b>Avg. Cost of Supply (Rs/Kwh) (1/2*10)</b>	RS/KWH	7.70
10	<b>Average Realisable Revenue (Rs/Kwh) (7+8/2*10)</b>	Rs/KWH	7.70
11	<b>ACS-ARR ( 9-10)</b>	Rs/KWH	0.00





**3.5.4** The ACS and ARR Gap has been calculated as per the guidelines of Central Electricity Authority. The ACS-ARR gap for the FY 2026-27 is shown in the table below.

SL NO	Table No. 3.5.4 ACS-ARR Gap of FY 2026-27		
1	<b>Total Revenue Requirement</b>	Rs in Crore	1231.38
2	<b>Gross Energy Input</b>	in MU	1519.38
3	Revenue from EXISTING Tariff	Rs in Crore	330.48
4	Other income(Late payment, Meter rent etc)	Rs in Crore	61.73
5	Total revenue within state ( including other income)	Rs in Crore	392.21
6	Revenue from Sale of Surplus Power	Rs in Crore	262.77
7	<b>Total Annual Income</b>	Rs in Crore	654.97
8	<b>Grant (1-7)</b>	Rs in Crore	576.40
9	<b>Avg. Cost of Supply (Rs/Kwh) (1/2*10)</b>	RS/KWH	8.10
10	<b>Average Realisable Revenue (Rs/Kwh) (7+8/2*10)</b>	Rs/KWH	8.10
11	<b>ACS-ARR ( 9-10)</b>	Rs/KWH	0.00

### **3.6 Full Cost Tariff, Grant & Proposed Tariff FY 2024-25**

3.6.1 It is submitted that category wise cost of supply has not been computed by APDoP till date. APDoP shall initiate an exercise & calculate the cost of supply of every category wise consumer after analysis of various cost factors associated with the supplying power to various categories of consumers. However, for determining the differential grant for various categories of consumers, APDoP has considered average cost of supply of Rs. 11.65 per unit as full cost tariff for recovery of the proposed ARR. Accordingly, the category wise grant & proposed net tariff for the FY 2024-25 has been calculated.

3.6.1a::Full cost tariff for FY 2024-25	
Total Revenue Requirement	1112.92
Revenue from Sale of Surplus Power	238.34
Other income(Late payment, Meter rent etc)	50.53
<b>Revenue requirement from within state</b>	<b>824.05</b>
Energy sale within state	707.53
<b>Full cost tariff</b>	<b>11.65</b>



3.6.2 Considering the above, the full cost tariff, category wise grant & net tariff proposal for FY 2024-25 for individual categories is given below along with the comparison of existing and proposed energy charges.

Table No. 3.6.1b Revenue at Full Cost Tariff for the FY 2024-25

Consumer Category	Full cost Tariff (Per Kwh)	Revenue at full cost tariff	
		FY 2024-25	
		Sale (MU)	Rs in Cr.
<b>Non Commercial Consumers (Domestic)</b>			
3-Phase, 11KV	11.65	12.36	14.40
3-Phase, 33KV	11.65	6.40	7.46
<b>Commercial Consumers (Non-Industrial)</b>			
3-Phase, 11KV	11.65	22.98	26.76
3-Phase, 33KV	11.65	0.37	0.43
<b>Public Lighting and Water Supply Consumers</b>			
3-Phase, 11KV	11.65	3.26	3.80
3-Phase, 33KV	11.65	0.00	0.00
<b>Agricultural Consumers</b>			
3-Phase, 11KV	11.65	0.01	0.01
3-Phase, 33KV	11.65	0.00	0.00
<b>Industrial Consumers</b>			
3-Phase, 11KV	11.65	25.33	29.50
3-Phase, 33KV	11.65	49.56	57.73
3-Phase, 132 KV	11.65	195.46	227.65
<b>Bulk Mixed Consumers</b>			
3-Phase, 11KV	11.65	18.51	21.56
3-Phase, 33KV	11.65	10.36	12.07
3-Phase, 132 KV	11.65	0.00	0.00
<b>Low Voltage Category</b>			
<b>Non Commercial Consumers (Domestic)</b>			
1-Phase, 230 Volt	11.65	189.26	220.43
3-Phase, 400 Volt	11.65	30.63	35.67
KJP & BPL connection	11.65	40.60	47.28
<b>Commercial Consumers (Non-Industrial)</b>			
1-Phase, 230 Volt	11.65	53.39	62.18
3-Phase, 400 Volt	11.65	38.58	44.93

Consumer Category	Full cost Tariff (Per Kwh)	Revenue at full cost tariff	
		FY 2024-25	
		Sale (MU)	Rs in Cr.
<b>Public Lighting and Water Supply Consumers</b>			
1-Phase, 230 Volt	11.65	3.15	3.66
3-Phase, 400 Volt	11.65	3.25	3.79
<b>Agricultural Consumers</b>			
1-Phase, 230 Volt	11.65	0.03	0.03
3-Phase, 400 Volt	11.65	0.15	0.17
<b>Industrial Consumers</b>			
1-Phase, 230 Volt	11.65	0.50	0.58
3-Phase, 400 Volt	11.65	1.92	2.23
<b>Temporary Consumer</b>			
LT/HT	11.65	1.49	1.73
<b>Total</b>		<b>707.53</b>	<b>824.05</b>

**Table 3.6.2:: GRANT GIVEN TO DIFFERENT CATEGORY OF CONSUMERS**

Consumer Category	Government Grant RATE (Per Kwh)	Total Government Grant	
		FY 2024-25	
		Sale (MU)	Rs in Cr.
<b>Non Commercial Consumers (Domestic)</b>			
3-Phase, 11KV	8.25	12.36	10.20
3-Phase, 33KV	8.40	6.40	5.38
<b>Commercial Consumers (Non-Industrial)</b>			
3-Phase, 11KV	7.45	22.98	17.11
3-Phase, 33KV	7.65	0.37	0.28
<b>Public Lighting and Water Supply Consumers</b>			
3-Phase, 11KV	7.45	3.26	2.43
3-Phase, 33KV	7.65	0.00	0.00
<b>Agricultural Consumers</b>			
3-Phase, 11KV	8.90	0.01	0.01
3-Phase, 33KV	9.00	0.00	0.00
<b>Industrial Consumers</b>			



Consumer Category	Government Grant RATE (Per Kwh)	Total Government Grant	
		FY 2024-25	
		Sale (MU)	Rs in Cr.
3-Phase, 11KV	7.80	25.33	19.75
3-Phase, 33KV	8.15	49.56	40.38
3-Phase, 132 KV	8.30	195.46	162.17
<b>Bulk Mixed Consumers</b>			
3-Phase, 11KV	7.90	18.51	14.62
3-Phase, 33KV	8.25	10.36	8.54
3-Phase, 132 KV	8.40	0.00	0.00
<b>Low Voltage Category</b>			
<b>Non Commercial Consumers (Domestic)</b>			
1-Phase, 230 Volt	7.65	189.26	144.72
3-Phase, 400 Volt	7.65	30.63	23.42
KJP & BPL connection	9.00	40.60	36.52
<b>Commercial Consumers (Non-Industrial)</b>			
1-Phase, 230 Volt	6.65	53.39	35.48
3-Phase, 400 Volt	6.65	38.58	25.64
<b>Public Lighting and Water Supply Consumers</b>			
1-Phase, 230 Volt	6.55	3.15	2.06
3-Phase, 400 Volt	6.55	3.25	2.13
<b>Agricultural Consumers</b>			
1-Phase, 230 Volt	8.55	0.03	0.02
3-Phase, 400 Volt	8.55	0.15	0.13
<b>Industrial Consumers</b>			
1-Phase, 230 Volt	7.35	0.50	0.37
3-Phase, 400 Volt	7.35	1.92	1.41
<b>Temporary Consumer</b>			
LT/HT	5.15	1.49	0.77
<b>Total</b>		<b>707.53</b>	<b>553.54</b>



Table - 3.6.3 Full Cost Tariff, Grant & Proposed Tariff FY 2024-25

Sl. No.	Category	Full cost Tariff (Rs./Kwh)	Proposed Tariff (Rs./Kwh)	Expected Grant (Rs./Kwh)	Full Cost Tariff Revenue (Rs Cr.)	Revenue at proposed tariff (Rs Cr.)	Expected Total Grant (Rs Cr.)
	<b>Non Commercial (Domestic)</b>						
	<b>LT - AC 50 Hz</b>						
1	1-Phase, 230 Volt	11.65	4.00	7.65	220.43	75.70	144.72
2	3-Phase, 400 Volt	11.65	4.00	7.65	35.67	12.25	23.42
3	KJP & BPL connection	11.65	2.65	9.00	47.28	10.76	36.52
	<b>HT - AC 50 Hz</b>						
4	3-Phase, 11KV	11.65	3.40	8.25	14.40	4.20	10.20
5	3-Phase, 33KV	11.65	3.25	8.40	7.46	2.08	5.38
	<b>Commercial (Non-Industrial)</b>						
	<b>LT - AC 50 Hz</b>						
6	1-Phase, 230 Volt	11.65	5.00	6.65	62.18	26.69	35.48
7	3-Phase, 400 Volt	11.65	5.00	6.65	44.93	19.29	25.64
	<b>HT - AC 50 Hz</b>						
8	3-Phase, 11KV	11.65	4.20	7.45	26.76	9.65	17.11
9	3-Phase, 33KV	11.65	4.00	7.65	0.43	0.15	0.28
	<b>Public Lighting And Water Supply</b>						
	<b>LT - AC 50 Hz</b>						
10	1-Phase, 230 Volt	11.65	5.10	6.55	3.66	1.60	2.06
11	3-Phase, 400 Volt	11.65	5.10	6.55	3.79	1.66	2.13
	<b>HT - AC 50 Hz</b>						
12	3-Phase, 11KV	11.65	4.20	7.45	3.80	1.37	2.43



Table - 3.6.3 Full Cost Tariff, Grant & Proposed Tariff FY 2024-25

Sl. No.	Category	Full cost Tariff (Rs./Kwh)	Proposed Tariff (Rs./Kwh)	Expected Grant (Rs./Kwh)	Full Cost Tariff Revenue (Rs Cr.)	Revenue at proposed tariff (Rs Cr.)	Expected Total Grant (Rs Cr.)
13	3-Phase, 33KV	11.65	4.00	7.65	0.00	0.00	0.00
	<b>Agricultural</b>						
	<b>LT - AC 50 Hz</b>						
14	1-Phase, 230 Volt	11.65	3.10	8.55	0.03	0.01	0.02
15	3-Phase, 400 Volt	11.65	3.10	8.55	0.17	0.05	0.13
	<b>HT - AC 50 Hz</b>						
16	3-Phase, 11KV	11.65	2.75	8.90	0.01	0.00	0.01
17	3-Phase, 33KV	11.65	2.65	9.00	0.00	0.00	0.00
	<b>Industrial</b>						
	<b>LT - AC 50 Hz</b>						
18	1-Phase, 230 Volt	11.65	4.30	7.35	0.58	0.21	0.37
19	3-Phase, 400 Volt	11.65	4.30	7.35	2.23	0.82	1.41
	<b>HT - AC 50 Hz</b>						
20	3-Phase, 11KV	11.65	3.85	7.80	29.50	9.75	19.75
21	3-Phase, 33KV	11.65	3.50	8.15	57.73	17.35	40.38
22	3-Phase, 132KV	11.65	3.35	8.30	227.65	65.48	162.17
	<b>Bulk Mixed</b>						
	<b>HT - AC 50 Hz</b>						
24	3-Phase, 11KV	11.65	3.75	7.90	21.56	6.94	14.62
25	3-Phase, 33KV	11.65	3.40	8.25	12.07	3.52	8.54
26	3-Phase, 132 KV and above	11.65	3.25	8.40	0.00	0.00	0.00
27	<b>Temporary Consumer</b>	11.65	6.50	5.15	1.73	0.97	0.77
<b>TOTAL</b>					<b>824.05</b>	<b>270.51</b>	<b>553.54</b>



**Table 3.6.4.: Proposed tariff for the FY 2024-25**

Sl.No.	Category of Consumers	Existing Tariff (Rs/KWH)	Proposed Tariff (Rs/KWH)
	<b>Non-Commercial (Domestic)</b>		
	<b>LT - AC 50 Hz</b>		
1	1-Phase, 230 Volt	4.00	4.00
2	3-Phase, 400 Volt	4.00	4.00
3	KJP & BPL connection	2.65	2.65
	<b>HT - AC 50 Hz</b>		
4	3-Phase, 11KV	3.40	3.40
5	3-Phase, 33KV	3.25	3.25
	<b>Commercial (Non-Industrial)</b>		
	<b>LT - AC 50 Hz</b>		
6	1-Phase, 230 Volt	5.00	5.00
7	3-Phase, 400 Volt	5.00	5.00
	<b>HT - AC 50 Hz</b>		
8	3-Phase, 11KV	4.20	4.20
9	3-Phase, 33KV	4.00	4.00
	<b>Public Lighting and Water Supply</b>		
	<b>LT - AC 50 Hz</b>		
10	1-Phase, 230 Volt	5.10	5.10
11	3-Phase, 400 Volt	5.10	5.10
	<b>HT - AC 50 Hz</b>		
12	3-Phase, 11KV	4.20	4.20
13	3-Phase, 33KV	4.00	4.00
	<b>Agricultural</b>		
	<b>LT - AC 50 Hz</b>		
14	1-Phase, 230 Volt	3.10	3.10
15	3-Phase, 400 Volt	3.10	3.10
	<b>HT - AC 50 Hz</b>		
16	3-Phase, 11KV	2.75	2.75
17	3-Phase, 33KV	2.65	2.65
	<b>Industrial</b>		
	<b>LT - AC 50 Hz</b>		
18	1-Phase, 230 Volt	4.30	4.30
19	3-Phase, 400 Volt	4.30	4.30
	<b>HT - AC 50 Hz</b>		
20	3-Phase, 11KV	3.85	3.85
21	3-Phase, 33KV	3.50	3.50
22	3-Phase, 132KV	3.35	3.35
	<b>Bulk Mixed</b>		
	<b>HT - AC 50 Hz</b>		

**Table 3.6.4:: Proposed tariff for the FY 2024-25**

Sl.No.	Category of Consumers	Existing Tariff (Rs/KWH)	Proposed Tariff (Rs/KWH)
24	3-Phase, 11KV	3.75	3.75
25	3-Phase, 33KV	3.40	3.40
26	3-Phase, 132 KV and above	3.25	3.25
27	<b>Temporary Consumer</b>	6.50	6.50

Accordingly, the Hon'ble Commission is requested to approve the Proposed Tariff for the FY 2024-25.

### 3.7 Revenue gap and its recovery: -

<b><u>Table 3.7 :: Revenue Gap and its Recovery for the Entire Control Period</u></b>				
				(Rs. In Cr.)
S.L No.	Particulars	MYT Control Period		
		(Projected) FY 2024-25	(Projected) FY 2025-26	(Projected) FY 2026-27
1	Aggregate Revenue Requirement ( ARR)	1112.92	1170.60	1231.38
2	Less: Other Income	50.53	55.81	61.73
3	Net ARR ( 1-2)	1062.39	1114.79	1169.65
4	Less: Income- Sale of power outside State	238.34	250.25	262.77
5	Net ARR from within the state (3-4)	824.05	864.54	906.88
6	Income from proposed tariff	270.51	298.78	330.48
7	Expected Government Grant	553.54	565.76	576.40
8	Net Revenue Gap (5-6-7)	0	0	0

The revenue gap stands at Rs.553.54 Cr. for the FY 2024-25, The recovery of this gap is expected from the state Government as a **grant**.

## **CHAPTER –IV:: AGGREGATE TECHNICAL & COMMERCIAL LOSS**





As per Clause 10.14 of APSERC Multiyear Tariff Regulation 2018 the licensee has to provide complete information about the AT&C losses during the previous year and that projected for the years for which the application is being made. In this chapter, the AT&C loss is analysed and projected for the entire control period.

#### 4.1 Net Input Energy Calculation Projection: -

The detailed calculation of Net Energy Input used in AT&C Loss Projection is given below in Table 4.1;

<b>Table 4.1 Net Input Energy Calculation Projection</b>						
Particulars	Calculation	Unit	Current Year	MYT Control Period		
			FY 2023-24 (Estimated)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)
Energy Import from Grid	A	MU	1349.07	1345.93	1342.95	1340.12
Energy Export Out Side the State	B	MU	472.56	494.71	518.05	542.63
Energy Injected in State from Grid	C=A-B	MU	876.51	851.21	824.89	797.48
Transmission loss on C(3.25%)	D	MU	28.49	27.66	26.81	25.92
<b>State Own Generation + RECEIVED FROM OTHER SOURCE</b>	E	MU	172.75	174.82	176.99	179.26
Gross Input Energy (including Export outside the state)	F=A+E	MU	1521.81	1520.74	1519.93	1519.38
Input Energy (in the State)	F=C+E	MU	1049.26	1026.03	1001.88	976.75
Net Input Energy (in the State)	G=F-D	MU	1020.77	998.36	975.07	950.83

#### 4.2 AT&C loss and its projection: -

Due to the scattered load over a vast geographical area, the distribution loss is comparatively high in Arunachal Pradesh. However, many projects are going on under APDoP, whose target is to reduce distribution loss and AT&C Loss as per trajectories fixed by Govt of India. But, because of the slow progress of dream projects for the reduction of AT&C losses like IPDS, RDSS, etc, the AT&C loss reduction in Arunachal Pradesh is not up to the expectation. APDoP has followed the revised methodology for calculation of AT&C losses as prescribed by CEA vide communication F.no. CEA-GO-13-25/1/2023-DPR Division/-73 Dt.30.06.2023

The AT&C loss for the current year and projection for the control period is tabulated in table 4.2

**Table 4.2 :: AT&C Loss Projection**



S No	Particulars	Calculation	Unit	Current Year	MYT Control Period		
				FY 2023-24 (Estimated)	FY 2024-25 (Projected)	FY 2025-26 (Projected)	FY 2026-27 (Projected)
A	Input Energy (MkWh)	A		1049.26	1026.03	1001.88	976.75
B	Transmission Losses(MkWh)	B		28.49	27.66	26.81	25.92
C	Net Input Energy (MkWh)	C=A-B		1020.77	998.36	975.07	950.83
D	Energy Sold(MkWh)	D		641.33	707.53	781.61	864.67
E	Revenue from Sale of Energy Including Government Grant (Rs. Cr.)	E		831.18	874.58	920.35	968.61
E (i)	<b>Likely Collection (90% of Tariff &amp; 100% of Grant)</b>	E (i)		802.07	842.48	884.89	929.39
F	Adjusted Revenue from Sale of Energy on Subsidy Received basis (Rs. Cr.)	F		831.18	874.58	920.35	968.61
G	Opening Debtors for Sale of Energy (Rs. Cr.)	G		391.87	420.98	453.08	488.54
H	(i) Closing Debtors for Sale of Energy (Rs. Cr.)	(i)		420.98	453.08	488.54	527.76
	(ii) Any amount written off during the year directly from(i)	(ii)					
I	Adjusted Closing Debtors for sale of Energy (Rs. Cr.)	H (i+ii)		420.98	453.08	488.54	527.76
J	Collection Efficiency (%)	(E (i)+G-I)/E*100		93.00	92.66	92.29	91.90
K	Units Realized (Mkwh) = [ Energy Sold*Collection efficiency]	D*J/100		596.42	655.58	721.38	794.64
L	Units Unrealized (Mkwh)= [ Net Input Energy-Units Realized]	C-K		424.36	342.78	253.69	156.19
M	<b>AT&amp;C Losses (%) = [{ Units Unrealized/Net Input Energy}*100]</b>	<b>L/C *100</b>		41.57	34.33	26.02	16.43

Hon'ble Commission is requested to approve Estimated AT&C Loss for FY 2023-24 at 41.57%, for the FY 2024-25, 2025-26 & 2026-27 at 34.33%, 26.02%, and 16.43% respectively.

### CHAPTER-V::CATEGORIES OF CONSUMERS



In this chapter, the categories of consumers are defined; if any consumer does not come under the following defined categories Assistant Engineer/Executive Engineer of the licensee shall categorize it to the nearest similarity.

**Category-I:: Domestic (Non-commercial):-**

Consumers use electrical energy for domestic and non-profit purposes such as lights, fans, and others appliances only for residential and non-residential but non-commercial use. This category of consumers includes but is not limited to the consumption of energy by Government owned Residential and Non-Residential buildings, Government owned Educational and Research Institutions, Charitable Institutions, Government owned Hospitals and Dispensaries, and religious premises like Churches, Temples, Mosques, and community halls.

**Category-II:: Commercial (Non-Industrial):-**

The consumers under this category are those who use electrical energy for lighting, fans, and other appliances in commercial places such as Shops, Optical houses, Restaurants, Bars, Tailoring shops, Cinemas, Hotels, Lodging and Boarding, Private Nursing Homes and Private Hospitals, Religious Hospitals, Private run Schools and Hostels and Boarding facilities and other educational institute demanding fees, photographic studios, Battery charging units, repair workshops, and Petrol Pumps, etc.

**Category-III:: Public Lighting and Water Supply:-**

This category of consumers shall apply to Public Street lighting Systems in Municipalities, Towns, other Towns, Villages, etc. including Signal Systems, Rope Ways, and Park lighting. Water Pumps and Equipment for public water supply systems and Treatment plants and associated applications shall also be covered in this category.

**Category-IV:: Agricultural:-**

The consumers in agricultural fields/farms for purpose of pumps, field lighting, and other applications for farmers in their irrigation and cultivation and not connected to any attached commercial or industrial installations in the agricultural field/farms.

**Category-V:: Industrial:-**

The Industrial consumers cover all Government registered Industrial power consumers which are not covered by Category No. II (Supply for Commercial Purpose), such as steel fabrication, motor body builders, power handloom industry, poultry farming, pisciculture, prawn culture, floriculture in the greenhouse, mushroom production, cold storage and any other type of industry where raw material is covered into finished product with the help of electrical power.

**Category-VI:: Bulk Mixed:-**

The Bulk Mixed Consumers are those consumers drawing bulk power at HT voltage having a mixed load of all categories of consumers such as a village, a town, a colony, etc. drawing power at one metering point. It will also include a University Campus, an All-India Radio complex, College complex. Defence Installations, Railway complex, Government



Complexes, etc. arranges their distribution of power. This will not include an Industrial complex which may consist of a mixed load.

**Category-VII:: Temporary:-**

Temporary consumers are those who would consume electricity for a limited period, which could be determined at its initial application itself such as marriage, religion, festival, exhibition, concert, public function/gathering, etc. which are temporary up to a period not exceeding 90 days.

**CHAPTER – VI:: SCHEDULES**



Schedules of category-wise electrical energy charges(tariff) and other charges are proposed for the 1<sup>st</sup> year of control period in this chapter for approval of the Hon'ble Commission.

## 6.1 Schedule-I:: Category-wise Tariff Schedule

### 6.1.1 Category - 1:: Non-Commercial Consumers (Domestic)

Sl. No.	System of Supply & Metering Point	Tariff (Rs./KWH)
	<b>LT - AC 50 Hz</b>	
1	1-Phase, 230 Volt	4.00
2	3-Phase, 400 Volt	4.00
3	KJP & BPL connection	2.65
?	<b>HT - AC 50 Hz</b>	
4	3-Phase, 11KV	3.40
5	3-Phase, 33KV	3.25

### 6.1.2 Category - 2:: Commercial Consumers (Non Industrial)

Sl. No.	System of Supply & Metering Point	
	<b>LT - AC 50 Hz</b>	
1	1-Phase, 230 Volt	5.00
2	3-Phase, 400 Volt	5.00
	<b>HT - AC 50 Hz</b>	
3	3-Phase, 11KV	4.20
4	3-Phase, 33KV	4.00

### 6.1.3 Category – 3:: Public Lighting And Water Supply Consumers

Sl. No.	System of Supply & Metering Point	
	<b>LT - AC 50 Hz</b>	
1	1-Phase, 230 Volt	5.10
2	3-Phase, 400 Volt	5.10
	<b>HT - AC 50 Hz</b>	
3	3-Phase, 11KV	4.20
4	3-Phase, 33KV	4.00



6.1.4 Category – 4:: Agricultural Consumers

Sl. No.	System of Supply & Metering Point	
	<b>LT - AC 50 Hz</b>	
1	1-Phase, 230 Volt	3.10
2	3-Phase, 400 Volt	3.10
	<b>HT - AC 50 Hz</b>	
3	3-Phase, 11KV	2.75
4	3-Phase, 33KV	2.65

6.1.5 Category –5:: Industrial Consumers

Sl. No.	System of Supply & Metering Point	
	<b>LT - AC 50 Hz</b>	
1	1-Phase, 230 Volt	4.30
2	3-Phase, 400 Volt	4.30
	<b>HT - AC 50 Hz</b>	
3	3-Phase, 11KV	3.85
4	3-Phase, 33KV	3.50
5	3-Phase, 132KV	3.35

6.1.6 Category–6 :: Bulk Mixed Consumers

Sl. No.	System of Supply & Metering Point	
1	3-Phase, 11KV	3.75
2	3-Phase, 33KV	3.40
3	3-Phase, 132 KV and above	3.25

6.1.7 Category–7:: Temporary Consumers

Sl. No.	System of Supply & Metering Point	
1	1-Phase, 230 Volt	6.50
2	3-Phase, 400 Volt	6.50

6.2 Schedule- II –Miscellaneous Charges

The following miscellaneous Charges are adopted as per “Annexure 10.13 Detail of Various Electricity Charges” of **Arunachal Pradesh State Electricity Regulatory Commission (Electricity Supply Code) Regulation, 2020**. The clauses mentioned in the Remark column are also referred to from the above regulation.

**Table 6.2.1:: Miscellaneous Charges**

Sl. No.	Heading of Electricity Charge	Units	Charges (Rs)	Remark
1	Registration cum processing fees	Per applicant	50.00 (for LT); 1000.00 (for HT); 5000.00 (for EHT)	As per clause 3.6.2
2	Meter Rent: Monthly charges for hiring of the meters	Rs. / Meter /Month		As per clause 5.1.6 Meter rental shall not be levied in case a consumer elects to purchase the meter by its own. *
	1-Ph LT		20.00	
	3-Ph LT (whole current)		50.00	
	3-Ph LT (with CT)		100.00	
	11 kV HT		500.00	
	33 kV HT		750.00	
	132 kV EHV		1000.00	
3	Shifting/Fixing/Re-fixing of meter on consumer request	Rs Per shift		As per clause 3.13
	Shifting of Meter		200.00	
	If shifting is in the interest of the Discom.		Free of cost	
4	Security amount for providing Electric Plant & Meter to the premises of consumers (interest bearing/refundable)			
	Load Security Deposit:		(a) For new consumer: Calculated as per Annexure 10.10	(a) As per clause 3.21.4(2)(a)(i)
			(b) For existing consumer: Review the consumption pattern of the consumer from April to March of the previous year	(b) As per clause 3.21.4(2)(a)(ii) Note: Load Security Deposit shall not be levied to pre-paid consumers.
	Meter security		The amount of security deposit for meter security shall normally be the price of the meter as fixed by the licensee from time to time.	Meter security deposit shall not be levied in case a consumer elects to purchase the meter of his own.



Table 6.2.1:: Miscellaneous Charges

Sl. No.	Heading of Electricity Charge	Units	Charges (Rs)	Remark
5	Interest on Security Deposit		Pay interest at the State Bank of India base rate prevailing on the 1st of April for the year	As per Clause 3.21.5
6	Meter testing Charges	Meter Testing	For each time (Rs)	As per clause 5.1.4
	First testing and inspection of new installation		Free of cost	
	Single Phase LT Energy Meter		50.00	
	Three Phase LT Energy Meter - whole Current		100.00	
	Three Phase LT Energy Meter -CT operated		200.00	
	HT Energy Meter - Tri vector		1000.00	
	LT-CT (per CT)		100.00	
	CT/PT unit		1500.00	
	HT-CT alone (per set)		750.00	
	132/220kV Metering Equipment		1000.00	
7	Testing of consumer's Installation on request of consumer	Rs. Charges per Installation		
	Single phase		100.00	
	Three phase		200.00	
	HT / EHT supply		1000.00	
8	Charges for testing of Transformer oil	Rs per testing		
	Testing of transformer oil		200.00	
	Disconnection and Reconnection	Rs per connection or disconnection		As per clause 7
	Disconnection charges any purposes other than non-payment of bills			
	Single phase		150.00	
	Three phase		250.00	
	HT consumers (11kV above)		750.00	
	Reconnection charges due to non-payment of bills			
	Single phase		150.00	
	Three phase		250.00	
	HT consumers (11kV above)		750.00	
9	Change of name of ownership	up to 5 kW	50.00	
		above 5 kW	200.00	





Table 6.2.1:: Miscellaneous Charges

Sl. No.	Heading of Electricity Charge	Units	Charges (Rs)	Remark
10	Charges for replacement of connection wire, cut out, fuse etc			
	For Cable and wire			
	1-Ph connection	Rs per connection	250.00	
	3-Ph LT connection	Rs per connection	400.00	
	3-Ph HT connection	Rs per 100 meters of the HT line	700.00	
	For Cut out & fuse	Rs per cut out	10.00	
		Rs per fuse	3.00	
11	Reduction or enhancement of load/ conversion of service/ reclassification of consumer/ request for permanent disconnection	Each Service		
	LT 1-Ph	Rs	75.00	
	LT 3-Ph	Rs	200.00	
	LT Industrial	Rs	300.00	
	HT connection	Rs	750.00	
12	Surcharge/Penalty for late payment of bill		Simple interest @2% will be charged as penalty on outstanding bill amount each 30 days successive period or part thereof until the amount is paid in full	As per clause 5.3.7
13	Rebate		3% on the bill amount on current bills (for early payment)	As per clause 5.3.8
			5% on recharge amount on pre-paid meter	
14	Temporary Connection	In addition to normal processing fee as per Sl.no.1 additional fee need to be paid	Rs 1000 (LT); Rs 5000 (HT).	As per clause 3.8
15	Meter not read during a billing cycle (provisional bill)		Average consumption of last three billing cycles (not generate more than two during one financial year)	As per clause 5.1.3 (6)



**Table 6.2.1:: Miscellaneous Charges**

Sl. No.	Heading of Electricity Charge	Units	Charges (Rs)	Remark
16	Meter not made accessible on two consecutive meter reading (at least days after the date of notice)		Penalty charges shall be 5% of average billing amount for the last 12 months	As per clause 5.1.3 (8)
17	HT Consumers and metered on the LT side		Shall be charged 3% percent over the metered consumption on LT side	As per clause 5.1.1 (8)(a)

**Timeline for Issue of Demand Note**

The following Timeline are adopted as per “Annexure 10.14 Timelines for Issue of Different Services” of **Arunachal Pradesh State Electricity Regulatory Commission (Electricity Supply Code) Regulation, 2020**.

**Table 6.2.2 :: Timeline for Issue of Demand Note**

Particulars		No. of working days from receipt of application form		
		Urban Areas	Rural Areas	Remote Areas
Extension of distribution mains not required		Within 10 working days	Within 15 working days	Within 15 working days
(1) In case of LT service connections		Within 10 working days	Within 15 working days	Within 20 working days
(2) In case of HT service connections		Within 20 working days	Within 30 working days	Within 40 working days
(3) In case of EHT service connections		Within 45 working days	Within 45 working days	Within 50 working days
Activity		Urban	Rural	Remote Area
New connection/ additional load where supply can be provided from existing network	FY (20-21)	30 days	45 days	55 days
New connection/ additional load where supply can be provided from existing network	FY (21-22)	25 days	40 days	50 days
New connection/ additional load where supply can be provided from existing network	FY (22-23) onwards	20 days	35 days	45 days



**Table 6.2.2 :: Timeline for Issue of Demand Note**

Particulars		No. of working days from receipt of application form		
New connection/ additional load where supply can be provided after extension / augmentation of network		LT 30 days	LT 45days	LT 55 days
		HT 90 day	HT 120 days	HT 145 days
		EHT 180 days	EHT 210 days	EHT 240 days
Release of temporary connection		Urban	Rural	Remote Area
where supply can be provided from existing network		5 days	10 days	15 days
where supply can be provided after extension/augmenta tion of network		LT 30 days HT 90 days	LT 45 days HT 120 days	LT 60 days HT 145 days
Conversion of Service		Urban Areas	Rural Areas	
(1) Conversion from LT single phase to LT three phase or vice-versa		Within 30 working days	Within 40 working days	
(2) Conversion from LT to HT or vice-versa		Within 90 working days	Within 120 working days	

### **6.3 Schedule-III –General Conditions of Supply**

#### **6.3.1 Payment:**

The bill shall be paid in full inclusive of all arrears if the consumer pays within the last day for payment indicated on the body of the bill. However, the consumer making payment in full within the due date indicated on the body of the bill will be entitled to avail rebate.

#### **6.3.2 Billing Cycle:**

Normally the billing cycle shall be on monthly basis.

#### **6.3.3 Defaulter:**

A consumer shall be automatically called a defaulter if he fails to clear all the outstanding and current bills accumulated for 2 months. On being a defaulter, the consumer shall be liable for disconnection after adjustment of the security deposit against the energy bill account. After adjustment of the security deposit, if the consumer desires re-connection the consumer shall have to clear all outstanding dues and pay the fresh security deposit.

#### **6.3.4 Application for Connection:**



The Consumer shall apply for service connection to the nearest Assistant Engineer intimating details of load demand, location, etc.

#### **6.3.5 Mixed Load:**

Mixed domestic and commercial establishments shall be treated as commercial establishments if the load on the commercial side is more than 50% of the total load.

#### **6.3.6 Ownership Meter:**

The energy meter and its allied instrument used for registration of energy data only shall deem to be the property of the supplier and the consumer shall have no right over it for ownership after the commencement of supply.

### **CHAPTER- VII::TARIFF FOR DISTRIBUTION WHEELING BUSINESS**

Chapter 9 of APSERC Multi-Year Tariff 2018 provides the tariff for the distribution wheeling business and chapter 9.1 provides for segregation accounts for Wheeling Business and Retail Supply Business. Chapter 9.5 provides for the adoption of the following allocation matrix in case of non-segregation of accounts.

<b>Particulars</b>	<b>Wire Business (%)</b>	<b>Retail Supply Business (%)</b>
Power Purchase Expenses	0	100
Intra-State Transmission Charge (Intra and Inter both)	0	100
SLDC Charge	0	100
Open Access Charge	0	100
Employee Expenses	60	40
Administration and General Expenses	50	50
Repair & Maintenance Expenses	90	10
Depreciation	90	10
Interest on Long-term Loan Capital	90	10
Interest on Working Capital and on Consumer Security Deposit	10	90
Bad Debt Written off	0	100



<b>Particulars</b>	<b>Wire Business (%)</b>	<b>Retail Supply Business (%)</b>
Income Tax	90	10
Contribution to contingency reserves	100	0
Return on Equity	90	10
Non-Tariff Income	10	90

Since APDoP does not have a separate account for the Wire Business and Retail Supply Business, the allocated matrix is followed.

### **Distribution Business**

The wheeling charges for the entire control period are tabulated below:

<b>Particulars</b>	<b>Wire Business (%)</b>						
	<b>Previous Year</b>			<b>Current Year</b>	<b>MYT Control Period</b>		
	<b>FY 2020-21 (Rs in Cr.)</b>	<b>FY 2021-22 (Rs in Cr.)</b>	<b>FY 2022-23 (Rs in Cr.)</b>	<b>FY 2023-24 (Rs in Cr.)</b>	<b>FY 2024-25 (Rs in Cr.)</b>	<b>FY 2025-26 (Rs in Cr.)</b>	<b>FY 2026-27 (Rs in Cr.)</b>
Power Purchase Expenses							
Intra-State Transmission Charge (Intra and Inter both)							
SLDC Charge							
Open Access Charge							
Employee Expenses	189.23	202.13	223.76	228.49	241.56	255.38	269.99
Administration and General Expenses	2.73	4.62	7.56	5.54	5.85	6.19	6.54
Repair & Maintenance Expenses	36.75	25.97	26.06	32.98	34.86	36.86	38.97
Depreciation							



Particulars	Wire Business (%)						
	Previous Year			Current Year	MYT Control Period		
	FY 2020-21 (Rs in Cr.)	FY 2021-22 (Rs in Cr.)	FY 2022-23 (Rs in Cr.)	FY 2023-24 (Rs in Cr.)	FY 2024-25 (Rs in Cr.)	FY 2025-26 (Rs in Cr.)	FY 2026-27 (Rs in Cr.)
Interest on Long-term Loan Capital							
Interest on Working Capital and on Consumer Security Deposit							
Bad Debt Written off							
Income Tax							
Contribution to contingency reserves							
Return on Equity							
Non-Tariff Income							
<b>Total</b>	228.71	232.71	257.38	267.01	282.28	298.43	315.50

Particulars	Unit	Wheeling Charge			
		Current Year	MYT Control Period		
		FY 2023-24	FY 2024-25	FY 2025-26	FY 2026-27
ARR for Wire Business	Rs in Crore	267.01	282.28	298.43	315.50
Energy input	MU	1521.81	1520.74	1519.93	1519.38
Wheeling Charge (ARR/Energy Input)	Rs per Unit	1.75	1.86	1.96	2.08

Hon'ble Commission is requested to approve the wheeling charge for FY 2023-24, FY 2024-25, 2025-26 & 2026-27 at Rs. 1.75 per kWh, Rs. 1.86 per kWh, Rs. 1.96 and Rs. 2.08 per kWh respectively.

### **CHAPTER-VIII:: RENEWABLE PURCHASE OBLIGATION (RPO)**

Renewable Purchase Obligation (RPO) mandates that all electricity distribution licensees should purchase or produce a minimum specified quantity of their requirements from Renewable Energy Sources. This is as per the Indian Electricity Act, 2003. The State Electricity Regulatory Commissions fix the minimum RPO for the State.

#### **8.1 Renewable Energy (Solar) Purchase Obligation: -**

Year	RPO Applicable on	Quantum of Energy Liable for RPO	SOLAR RPO				
			Solar RPO (in %)	Solar RPO (in MU)	Solar RPO fulfilled by State Generation/REC	(+) Surplus/ (-) Shortfall	
			(in MU)	D	E=C*D%	F	G=E-F
2012-13	Total Consumption	598.62	0.1	0.60	0.00	-0.60	
2013-14	Total Consumption	595.74	0.15	0.89	0.00	-0.89	
2014-15	Total Consumption	689.67	0.2	1.38	0.00	-1.38	
2015-16	Total Consumption	735.00	0.2	1.47	0.00	-1.47	
2016-17	Excluding Hydro Source	367.67	2.75	10.11	0.00	-10.11	
2017-18	Excluding Hydro Source	409.23	4.75	19.44	0.00	-19.44	
2018-19	Excluding Hydro Source	418.17	6.75	28.23	0.00	-28.23	
2019-20	Excluding LHP	336.28	6	20.18	0.99	-19.19	
2020-21	Excluding LHP	267.82	8	21.43	0.52	-20.90	
2021-22	Excluding LHP	335.10	10.5	35.19	0.47	-34.72	
2022-23	Excluding LHP	286.57	10.5	30.09	0.96	-29.13	
<b>TOTAL</b>					169.00	2.94	-166.06

The APDoP could not meet-up the Renewable Power Purchase Obligation (RPO) for Solar since the inception of the RPO due to the non-availability of a Solar plant in the vicinity and also due to funding constraints. The total calculated RPO (Solar) from 2012-13 to 2022-23 as tabulated above is 169 MU, out of which the state could fulfil only 2.94 MU (Generation from APEDA and purchase of REC from IEX), and the net RPO (Solar) to be fulfilled is 166.06 MU.

**Table 8.1 (A):: Solar Renewable Energy Certificate Purchased**



Date of Purchase	REC Number	Serial No.	Nos. of Solar REC	In MU	Remark
30-03-2022	C-IEX_SL001442	IEX_0010000	10000	10	2021-22
27-04-2022	C-IEX_SL000064	IEX_0005000	5000	5	2022-23
25-05-2022	C-IEX_SL000195	IEX_0010000	5000	5	
27-06-2022	C-IEX_SL000536	IEX_0015000	5000	5	
30-08-2022	C-IEX_SL000707	IEX_0030000	15000	15	
28-09-2022	C-IEX_SL000863	IEX_0050000	20000	20	
27-10-2022	C-IEX_SL000975	IEX_0070000	20000	20	
30-11-2022	C-IEX_SL001084	IEX_0090000	20000	20	
					2023-24
			<b>Total</b>	100	

The APDoP has purchased 100 MU of RE (Solar) in the year 2021-22 2022-23 & 2023-24 as shown in the above table. Now, the balance quantum of RE (Solar) is proposed to be met up in the coming years or through an adjustment from other sources.

## 8.2 Renewable Energy (Non-Solar) Purchase Obligation: -

DHPD has many hydro stations with an installed capacity of less than 25 MW that comes under Renewable Energy Compliance. There are few HE projects under IPP & SPSU whose installed capacity is less than 25 MW as such qualify to be considered to meet up the RPO (Non-Solar) compliance. The APDoP is drawing 100% of the power generated by these hydro stations which is enough to meet up Renewable Energy Compliance for non-Solar RPO as per the regulation for RPO and its compliance issued by the Commission from time to time. The details of RPO (non-Solar) target and achievement since the inception of the RPO Compliance Regulation are tabulated below in Table 8.2(A): -

**Table 8.2(A):: Renewable Power Purchase Obligation (Non Solar)**





Year	RPO Applicable on	Quantum of Energy Liabile for RPO	RPO Achievement			
			Non-Solar RPO (in %)	Non-Solar RPO	Non-Solar RPO fulfilled by State Hydro Generation	(+) Surplus/ (-) Shortfall
		(in MU)	(in %)	(in MU)	(in MU)	(in MU)
A	B	C	D	E=C*D%	F	G=E-F
2012-13	Total Consumption	598.62	4.1	24.54	49.95	25.41
2013-14	Total Consumption	595.74	5.45	32.47	52.84	20.37
2014-15	Total Consumption	689.67	6.8	46.90	52.98	6.08
2015-16	Total Consumption	735.00	6.8	49.98	58.62	8.64
2016-17	Excluding Hydro Source	367.67	8.75	32.17	62.17	30.00
2017-18	Excluding Hydro Source	409.23	9.5	38.88	59.81	20.93
2018-19	Excluding Hydro Source	418.17	10.25	42.86	61.71	18.85
2019-20	Excluding LHP	336.28	11.5	38.67	96.17	57.50
2020-21	Excluding LHP	267.82	12.5	33.48	94.20	60.72
2021-22	Excluding LHP	335.10	10.5	35.19	102.85	67.67
2022-23	Excluding LHP	286.57	10.5	30.09	124.02	93.93
	<b>Total</b>			<b>405</b>	<b>815</b>	<b>410</b>

As can be seen from the above table, there is an RPO (non-Solar) surplus of 410 MU. Out of this surplus, APDoP has sold 21.59 MU and earned extra revenue amounting to Rs.8.15 Cr. The detail of the sale of RE power is shown below:

**Table 8.2(B):: Non Solar RE Power Sold**

<b>Month</b>	<b>MU</b>	<b>Revenue Earned (in Crore)</b>
May-21	0.34	0.13
Jun-21	4.61	1.75
Jul-21	1.49	0.56
Aug-21	4.8	1.81
Sep-21	5.52	2.09
Oct-21	4.83	1.81
<b>Total</b>	<b>21.59</b>	<b>8.15</b>

**CHAPTER- IX:: Fuel and Power Purchase Cost Adjustment (FPPCA) charges**

Section 62 sub-section 4 of the Electricity Act, 2003 provides that no tariff or part of any tariff may ordinarily be amended, more frequently than once in every financial year, except in respect of any changes expressly permitted under the terms of any fuel surcharge formula as may be specified.

This provision of the Act requires the Commission to specify the formula for fuel surcharge. However, Tariff Regulations issued by the Hon'ble Commission do not provide for such mechanism.

Accordingly, it is requested that the Hon'ble Commission may consider & specify the formula for working out the Fuel and Power Purchase Cost Adjustment (FPPCA) charges and other terms and conditions of FPPCA to allow petitioner to recover the FPPCA charges from the consumers automatically every month satisfying the stipulated condition in this regard.

The Fuel and Power Purchase Cost Adjustment (FPPCA) is prescribed by the Assam Electricity Regulatory Commission vide Assam Electricity Regulatory Commission (Fuel and Power Purchase Price Adjustment Formula) Regulations, 2010, (Amendment) 2012. The prescribed mechanism is detailed below.



FUEL & POWER PURCHASE PRICE ADJUSTMENT (FPPPA) FORMULA

- (i) The amount of Fuel & Power Purchase Price Adjustment (FPPPA) shall be computed as under:

$$V = VF + VPP$$

Where,

V = Amount of incremental Cost in a specified period on account of Fuel & Power Purchase (₹).

VF = Amount of differential cost on account of fuels on generation by different power stations of the state generators (₹).

VPP = Amount of differential cost on account of Power purchase (₹)

- (ii) The FPPPA rate shall be calculated as,

$$V (₹)$$

$$\text{FPPPA Recovery Rate} = \frac{\text{-----}}{\text{Energy sales (KWH)}} \times 100$$

(Paise/kWh)

Where Energy sales consist of,

- (a) Metered sale of Energy.... (ES1)
- (b) Assessment of unmetered sale .... (ES2)
- (c) Deemed sale of Energy on account of excess T&D losses ...(ES3) Less
- (d) Energy sale to the Exempted categories of consumers. (ES4)

The deemed sale of energy on account of excess T&D losses is equal to actual T&D losses minus losses allowed by the Commission. In case the figure is negative, the same may be ignored.



The recovery formula shall be as under:

$$\text{FPPPA Recovery Rate (Paaise /Kwh)} = \frac{Q_C (RC2-RC1) + Q_O (R02- R01 ) + Q_G(RG2 - RG1)+ QPP (RPP2-RPP1)}{ES1 + ES2 + ES3 - ES4} \times 100$$

FOR COAL BASED STATION:

Q<sub>C</sub> = Quantity of coal consumed during the period in MT as per normative parameter.

$$Q_C = \frac{SHR}{NCV_O} \times \left[ \frac{USO}{(1-AUX)} \right] \times (1+L_o) \times 10^3$$

Q<sub>O</sub> = Quantity of oil consumed during the period in KL as per normative parameter.

= Generation (in MU) x specific oil consumption (ml/kWh) as approved by the Commission

USO = Actual unit sent out in MU.

AUX = Auxiliary Consumption Approved by the Commission (in %)

SHR = Station heat rate as approved by the Commission in Kcal. /Kwh.

NCV<sub>O</sub> = Approved calorific value of coal fired in kcal/kg.

L<sub>O</sub> = Transit & storage losses of coal as approved by the Commission.

RC1 = Average rate of coal Ex. Power station coal yard as approved by the Commission for the period in ₹ / MT.

RC2\* = Average rate of coal Supplied Ex. Power station coal yard as per actual for the period in ₹ / MT.

RO1 = Average rate of oil Ex. Power Station approved by the Commission for that period in ₹ /K.L.

RO2 = Average rate of oil actually supplied Ex. Power station during the period in ₹ / K.L.

\* If the grade of coal supplied is inferior or superior to the grade considered in the last tariff order, then average rate of coal supplied (RC2) will be corresponding to the grade of coal considered by the Commission in the last tariff order.



**FOR GAS BASED STATION:**

$Q_G$  = Quantity of Natural Gas consumed as per normative parameters during the period in 1000 SCM.

$$Q_G = \frac{SHR}{NCV_G} \times \left[ \frac{USO}{(1-AUX)} \right] \times (1+L_G) \times 10^3$$

USO = Unit sent out in MU.

AUX = Auxiliary Consumption approved in percentage.

SHR = Station heat rate as approved by the Commission in kcal/kwh

$NCV_G$  = Approved calorific value of gas fired in kcal/SCM.

$L_G$  = Transit and storage losses of Gas as approved by the Commission if any,

RG1 = Average rate of Natural gas as approved by the commission including Transportation in ₹/1000 SCM

RG2\* = Actual Average rate of Gas Supplied during the period including Transportation  
In ₹/1000 SCM.

- If the grade of Gas supplied is inferior or superior to the grade considered in that last tariff order, then average rate of Gas supplied (RG2\*) will be corresponding to the grade of Gas considered by the Commission in the last tariff order.

[ $Q_C$  and  $Q_O$  and  $Q_G$  will have to be calculated station wise.]

**LEGENDS:**

SCM = Standard Cubic Metre

MU = Million Unit

Kcal = Kilo Caloric

Kwh = Kilowatt hour

**For Power Purchase**

RPP1 = Average rate of power purchase as approved by the Commission in ₹/Kwh

RPP2 = Actual Average rate of power purchase during the period in ₹/Kwh

QPP= Actual Quantity of power purchased during the period in Kwh for sale to the Distribution License scheduled consumers



N.B. For computation of power purchase, the ex-bus cost of energy from generating stations including associated transmission cost shall be considered .

The Hon'ble Commission may consider & if deemed fit approve the Fuel and Power Purchase Cost Adjustment (FPPCA) mechanism as above for the APDoP till the FPPCA regulation is issued by the Hon'ble APSERC.

### **CHAPTER- X:: Business Plan from FY 2024-25 to FY 2026-27**

In this section, APDOP has proposed the business plan for the ensuring control period i.e. from FY 2024-25 to FY 2026-27.

#### **1) Number of Consumers: -**

The APDoP has at present 298447 consumers in different categories. According to the trends of consumer growth in the last 4 years, and based on this growth the number of consumers for the entire control period has been projected using the average annual growth rate of the last 4 years

#### **2) Source of Power: -**

The APDoP acquires Power from different sources for distribution within the State as well and the sale the surplus power outside the state as mentioned below. APDoP has considered the sources of power during the previous years to project the power procurement plan for the control period as discussed below.

#### **2.1) Diesel Generating (DG) Sets: -**

APDoP has DG sets of different capacities installed at different locations with a total installed capacity of about 20.45 MW. These DG sets are kept on standby and used as and when required. Further, APDoP is on the way to phasing out the DG Sets slowly due to its high generation cost. Since these sets are owned by APDoP, the power generated from it will not be included in the power purchase cost. The Expenditure on DG sets shall be included in Operation and Maintenance Costs.

#### **2.2) Central Sector Generating Stations Allocation: -**

The major power requirement is met by power allocation from Central Sector Generating Stations such as NHPC, NEEPCO, NTPC, OTPCL etc. APDoP plans to procure power from these sources during the control period.

APDOP has planned to purchase power from different sources at an estimated cost of Rs 522.34 Cr in the FY 2024-25, Rs 547.39 Cr in the FY 2025-26 and Rs 573.69 Cr in the FY 2026-27.



### **2.3) Power from within the State:**

There are power generators within the state of Arunachal Pradesh from where APDoP is receiving/purchasing the entire power generated by them.

#### **i) From DHPD: -**

Department of Hydro Power Development (DHPD) has an installed capacity of 81.54 MW consisting of different capacities located in different locations of Arunachal Pradesh. APDoP received about 76.60 MU, 48.06 MU & 41.97 MU during FY 2020- 21, 2021-22 and 2022-23 respectively from DHPD. As DHPD is under the same state Govt. (AP) and hence, APDoP does not pay the cost of power to DHPD and hence may be treated as Free Power. If new projects come up then there will be capacity addition. APDoP has included power from DHPD in the power procurement plan for the control period.

#### **(ii) Power from Hydro Power Development Corporation of Arunachal Pradesh Limited (HPDCAPL): -**

Arunachal Pradesh Hydro Power Development Corporation Limited is a State Public Sector Undertaking and has commissioned a 3 MW small hydropower project at Zemithang of Tawang district of Arunachal Pradesh over the Sumbachu River and started commercial operation in the year 2020-21. The APDoP received about 0.83 MU, 4.69 MU & 5.24 MU @ Rs. 3.61/Unit (Provisional tariff) costing Rs.1.91 Cr & Rs 2.68 Cr during FY 2021-22 & FY 2022-23 respectively from this project. APDoP has included power from HPDCAPL in the power procurement plan for the control period on the basis of power received during the previous years as detailed above.

#### **(iii) Dikshi SHP: -**

Dikshi SHP is a small hydropower project of capacity 24 MW in Rupa of West Kameng District developed by M/s Devi Energy Ltd, an Independent Power Producer (IPP). This project was commissioned in the year 2019 and declared COD on 19 September 2019. The APDoP entered into a PPA with M/s Devi Energy Ltd for purchasing the entire power generated from this project. APDoP purchased power to the tune of 16.30 MU, 47.99 MU & 65.17MU @ Rs. 5.25/unit amounting to Rs. 17.59 Cr, Rs. 22.06 Cr & Rs 34.43 Cr during the year 2020-21, 2021-22 & FY 2022-23 respectively. APDoP has included power from Dikshi SHP in the power procurement plan for the control period on the basis of power received during the previous years as detailed above.



**(iv) Arunachal Pradesh Energy Development Agency (APEDA): -**

The Arunachal Pradesh Energy Development Agency is under the Ministry of Power, Govt. of Arunachal Pradesh, which is responsible for the development of Non-Conventional Energy in the state. APEDA has developed various capacities of Solar Power plants across the state with an installed capacity of 4.188 MW. From these plants, APDoP has received about 0.52 MU, 0.47 MU & 0.96 MU of energy free of cost during the year 2020-21, 2021-22 & 2022-23 respectively since it is under the same umbrella of the state Govt. The energy so received is utilized to partially meet up the annual Solar Renewable Power Purchase Obligation (RPO) of the state. APDoP has included power from APEDA in the power procurement plan for the control period on the basis of power received during the previous years as detailed above.

**2.4 Power received from the other Sources:**

**(i) Deviation:** - Deviation is the difference between the actual drawl and the scheduled drawl from the Grid. The charges for the Deviations for all the time blocks shall be payable for over-drawl by the buyer and under-injection by the seller and receivable for under-drawl by the buyer and over-injection by the seller and shall be worked out on the average frequency of a time block at the rates specified. Since APDoP is a buyer, it has over-drawn from the Grid to the tune of 39.92 MU, 48.82 MU & 66.05 MU in the FY 2020-21, 2021-22 & 2022-23 respectively. APDoP plans to reduce the deviation during the control period by scheduling the power requirement & management.

**(ii) IEX Purchase: -**

In case of any shortage of power, the APDoP resorts to purchasing power from Real-Time Market (RTM) or Day Ahead Market (DAM) from IEX to avoid or minimize Deviation. APDoP purchased 0.65 MU in FY 2020-21, 3.94 MU in FY 2021-22 & 6.15 MU in FY 2022-23 to meet up the power shortage at that time. APDoP shall try to manage power procurement from IEX so as to reduce the purchase cost from the RTM & DAM during the control period.

**(iii) Banking: -**

APDoP is engaged in the banking of energy during the high hydro season and takes back during the lean hydro season @ 5% above in case of forward banking and sometimes APDoP takes energy in advance from the party and returns to them @ 5% above as and when power is available. As such, there is no financial implication for this activity. The energy was imported via Banking to the tune of 36.12 MU, 64.80 & 39.37 MU in the year 2020-21, 2021-22 & 2022-23 respectively. APDoP shall engage in banking during the control period based on the seasonal power availability & demand. The inward & outward energy from banking has been considered in projecting the energy balance for the control period.





**(iv) Diesel Generation: -**

DG sets are purely a temporary arrangement to meet any emergency requirement in case of non-availability of power from any other sources and it is mostly kept on standby. The energy generated through DG set in the year 2020-21, 2021-22 & 2022-23 is 0.36 MU, 0.39 MU & 0.28 MU respectively.

**3) Category-wise energy Sale Forecast within the State: -**

The category-wise energy sale forecast is devised by using the Compound Annual Growth Rate (CAGR) of the preceding 5 years as required by section 10.10(2) APSSERC Multi-Year Tariff Regulation 2018. As seen from the category-wise monthly sale for the FY 2022-23, there is no effect on seasonal change, hence annual basis forecast has been adapted instead of a monthly basis. In cases where there CAGR is negative, the growth factor has been considered as NIL. Hon'ble Commission is requested to approve the projected Energy Sale within the state for FY 2023-24, 2024-25 2025-26 & 2026-27 at 641.33MU, 707.53MU, 781.61MU, and 864.67MU respectively.

**4) Forecast of Sale of Power Outside the State: -**

The energy sale forecast outside the state is calculated assuming annual increment of 5% above the previous year's consumption. The Hon'ble Commission advised the APDoP through tariff order to reduce the sale outside the state as the sale at IEX is lower than the purchase price, in fact, APDoP is selling power in the IEX at the rate determined in the Exchange for a particular slot. The average selling rate at IEX is not much difference of the average purchase cost and sometimes it is in higher side. Also, APDoP has to resort to sale of power in RTM/DAM market of IEX as allocation of power especially during peak hours is much higher than the actual requirement of the state. Further, APDoP entered PPA with many generators before the inception of IEX and so the immediate termination of PPA may not be possible. Also, due to free power allocated from the Generating station located in Arunachal Pradesh, as being the home state, there used to be surplus power, especially during the high hydro season, hence the sale outside the state has to be continued. Hence, steady-outside state sales@5% annual increment has been projected for the ensuing and entire control period. Therefore, Hon'ble Commission is requested to approve the projected Energy Sale outside the state through IEX for FY 2023-24, 2024-25, 2025-26 & 2026- 27 at 245.83 MU, 258.12 MU, 271.02 MU and 284.57 MU respectively. The APDoP is selling surplus power under bilateral mode @ exchange rate plus 5 paise. Under this mode, the APDoP sold 7.20 MU of energy earning Rs. 1.87 Cr in the FY 2020-21, 96.71 MU of energy earning Rs. 35.73 Cr in the FY 2021-22 and 130.42 MU of energy earning Rs. 80.49 Cr in the FY 2022-23 The APDoP is planning to sell energy under bilateral mode to the tune of 136.94 MU, 143.79 MU, 150.98 MU, and 158.53 MU in the years 2023-24, 2024-25, 2025-26 & 2026-27 respectively. Hon'ble Commission is requested to approve the above proposal.



**5) Power Purchase Estimation: -**

The power purchase quantum for the current year and ensuing control period years is estimated considering various factors like previous energy consumptions, energy sale projection, judicious scheduling, likely distribution losses, surplus energy sale during high hydro, restricting deviation import, restricting import from high-cost generators, total energy requirement, etc. deviation import (UI) is reduced by 5% per year as it is a costly affair. Estimated Energy Requirement for FY 2023-24, 2024-25, 2025-26 & 2026-27 is kept at 1521.81MU, 1520.74 MU, 1519.93 MU, and 1519.38 MU respectively. The aggregate power requirement is decreasing every year. This is because the APDoP shall endeavour to reduce the AT&C loss. Hon'ble Commission is requested to approve the above estimates.

**6) Power Purchase Cost Estimation: -**

The power purchase cost has been estimated by escalating the actual amount paid in the previous year to the Source/Agency by 5%, the drawl from Deviation is proposed to be reduced by 5%, accordingly, the Purchase Cost from deviation is reduced by that extent. The Hon'ble Commission is requested to approve the power purchase cost for FY 2023- 24, 2024-25, 2025-26 & 2026-27 at Rs 498.48 Cr, 522.34 Cr, 547.39 Cr, and 573.69 Cr respectively.

**7) Intra state and Interstate Transmission charges: -**

The entire interstate power transmission in APDoP is transmitted through the PGCIL transmission infrastructure. The transmission charges for the control period has been projected based on the transmission charges incurred during 2019-20 to 2022-23. APDoP shall try to reduce power import from outside the State as many projects under IPP are coming up in the state. There is also a chargeable intrastate transmission system constructed by M/s Devi Energy Ltd to evacuate the power generated from the Dikshi SHP and the charges of previous years. Hence, the transmission charge has been calculated based on the proposed energy to be imported during respective years. Further, the transmission charges of last year are escalated by 5% year over year to factor in the yearly cost variations. Hon'ble Commission is requested to approve the Estimated Inter-State Transmission Charges for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs 117.95 Cr, Rs 123.67 Cr, Rs 129.70 Cr, and 136.04 Cr respectively.

APDoP has escalated the Intra State Transmission Charges for the previous year by 5% year over year to project the Intra State Transmission Charges. The Hon'ble Commission is requested to approve the estimated Intra State Transmission Charges for FY 2023-24, 2024-25, 2025-26 & 2026-27 as proposed above for the respective years.

**8) Fee and Charges of NERLDC: -**

The fees for NERLDC have been estimated with proposed annual increment @ 5% of the previous year Hon'ble Commission is requested to approve the Estimated NERLDC fee and NERPC board fund for FY 2023-24, 2024-25, 2025-26 & 2026-27 at Rs 1.18Cr, 1.23Cr, 1.29Cr, and 1.36Cr respectively.



**9) Interest in Working Capital: -**

Working capital for APDoP used to be provided by the Government of AP as a grant as and when required, and therefore no interest on working capital is required to be paid by APDoP. Hence, interest in working capital has been considered Nil during the control period.

**10) Bad and doubtful debt: -**

APDoP does not have any bad and doubtful debt as per records. APDoP has not projected any bad and doubtful debt. Therefore, provision for bad and doubtful debt may be considered Nil during the control period.

**11) Return on Equity Capital:-**

APDoP being a Government Department, all funding comes from the State Government/Central Government as a grant without any obligation to pay back. APDoP is not incorporated/registered as a company, hence there is no shareholder/equity as a result return on equity capital does not arise. Hence, the APDoP does not propose to claim Return on Equity Capital during the control period.

**12) Interest on Loan Capital-**

APDoP functions under the Government of Arunachal Pradesh. All financial matters of APDoP are controlled by the finance department of the Government. Taking a loan and its repayment are decided by them. Hence, APDoP cannot take any kind of loan independently and does not have any access to the loan and its repayment process even if the loan is taken for funding the projects under APDoP, its repayment is handled by the Government from its sources. Therefore, expenses on interest on the loan may be considered as Nil and APDoP does not propose to claim any interest on loan for the control period.

**13) Depreciation: -**

Entire Assets under the control of APDoP are created from the grant of the Government of Arunachal Pradesh or the Government of India without any obligation to return. As per the regulatory direction, no depreciation can be claimed on the assets created from subsidies or grants which has no obligation to return. Therefore, APDoP does not propose to claim any depreciation during the control period.



In view of the above submission in respect of the technical & financial parameters for the control period FY 2024-25 to 2026-27, it is requested that the Hon'ble Commission may kindly approve the Business plan for the Control Period.

### **CHAPTER- XI:: COMPLIANCE OF DIRECTIVES**

Hon'ble Commission has not issued any directives for compliance as the Tariff Petition filed last year was not considered and the Tariff order was not issued due to the absence of the Hon'ble Commission. However, APDoP has been putting its best effort to comply with the directives issued by Hon'ble Commission through each successive tariff orders, but being a government department, functioning under the Ministry of Power, Govt. of Arunachal Pradesh unlike other Discoms, APDoP has limited decision-making independently. Hence, compliance with most of the directives takes a longer time as it requires government funding, sanctions, approvals, etc.

#### **10.1 Step towards digitization**

Web-based online billing and payment of electricity bills are now operational under IPDS towns. This project covers 9 towns in Arunachal Pradesh. Further, an isolated computerized billing system has been developed at Bomdila and Miao Electrical Divisions which are also operational. Other towns called non-RAPDRP towns consisting of 16 towns are in the pipeline. On completion of these projects, the online Billing, Payment, and SMS alerts system shall be fully operative in all major towns of Arunachal Pradesh.

#### **10.2 Prepaid Metering/Smart Pre-Paid Metering**

Many of the consumers have been provided with prepaid meters in Naharlagun and Itanagar of the Capital complex. These consumers including other consumers of urban areas shall be provided with smart pre-paid meters and remote/rural area consumers shall be provided with pre-paid meters under RDSS.

#### **10.3 Maintenance of accounts and records and conducting the audit**

APDoP maintains accounts and records and gets audited by Accountant General as per CPWD manuals. APDoP has so far, no staffing set up of experts in maintaining records and accounts as per formats provided in the MYT regulations. However, APDoP shall approach the Ministry of Power for providing such a setup.

#### **10.4 Interest in Working Capital**

APDoP is executing department of the Government of Arunachal Pradesh and executes the projects funded by the government and then operates and maintains these from the fund provided by the state government. Even if government fund or grant is not provided, APDoP cannot resort to borrowing money from banks/financial institutions independently. APDoP, categorized as an essential service department, in the functioning condition is a must for the government. Hence, there is no interest in working capital.

#### **10.5 Interest on Loan**

No project under APDoP is implemented on loans taken by the department, so, interest on loans does not arise. For augmentation/project work even if government fund or grant is not



received, APDoP cannot resort to borrowing money from banks/financial institutions independently.

#### **10.6 Return on Equity (ROE)**

APDoP is not incorporated or registered as a company or any similar body, hence it has no shareholders so no equities. Therefore, ROE is Nil.

#### **10.7 POC and Other charges**

This directive has been complied and interstate transmission charges, NERLDC/NERPC charges, and reactive charges are indicated in sections 3.5, section 3.6, and table 3.1 of chapter III respectively.

#### **10.8 Energy Audit and Accounting**

Proper and reliable energy accounting can be done if every transmission and distribution line is properly metered. As of now, many of these lines are not metered. Under IPDS, Comprehensive Schemes, RDSS, and many other projects where provisions of metering are in the pipelines. After completion of these schemes, energy accounting and auditing in every voltage shall be possible.

Now, APDoP has outsourced the Energy Accounting as per BEE guidelines & Commercial Audit as per guidelines of MoP, of the Deptt. beginning from the year 2021-22, as it being one of the pre-qualification criteria for RDSS scheme and shall try its best to carry forward the same in the coming years provided the necessary fund is given by the state Govt. The Energy Audit has been completed for the FY 2021-22 & FY 2022-23. Also, Energy Audit Cell has been formed within the Dept, with the CE (Com) as the Nodal Officer and SE (Com) as Energy Manager.

#### **10.9 Sale of Power Outside the state**

The Hon'ble commission has advised in its earlier order to APDoP to reduce the quantum of power sales and then to finally stop purchasing power through IEX. In compliance, the APDoP has proposed a steady-state power sale projection in the current FY and within the entire control period as it cannot be undone instantly as explained earlier.

#### **10.10 Introduction of slab-based tariff**

No Slab based tariff has been proposed in this petition.




**CHAPTER – XII:: PRAYER**

The APDoP respectfully prays to the Hon'ble Commission-

1. To admit this Petition for approval of determination of ARR for FY 2024-25 to FY 2026-27 and tariff for the FY 2024-25.
2. To approve the proposed retail tariff for FY 2024-25.
3. To approve the proposed ARR for FY 2024-25 to FY 2026-27.
4. To approve the Business for the FY 2024-25 to FY 2026-27.
5. To grant any other relief as the Hon'ble Commission may consider appropriate.
6. To pass any other order as the Hon'ble Commission may deem fit and appropriate under the circumstances of the case and in the interest of justice.
7. The petitioner craves leave of the Hon'ble Commission to allow further submissions, additions, and alterations to this petition as may be necessary from time to time.

Dated Itanagar the 3rd January 2024

  
Petitioner  
For the Department of Power  
Government of AP  
Itanagar