

#### **COMMISSION'S ORDER IN**

Case No. HERC/PRO - 77 of 2020 & HERC/PRO - 78 of 2020

ON

TRUE- UP FOR THE FY 2019-20, ANNUAL (MID-YEAR) PERFORMANCE REVIEW FOR THE FY 2020-21, AGGREGATE REVENUE REQUIREMENT OF UHBVNL AND DISTRIBUTION & RETAIL SUPPLY TARIFF FOR THE FY 2021-22

30th March, 2021

HARYANA ELECTRICITY REGULATORY COMMISSION
BAYS 33-36, SECTOR-4, PANCHKULA-134112, HARYANA
https://herc.gov.in

#### IN THE MATTER OF

Filing of ARR Petition for FY 2021-22, Annual Performance Review for FY 2020-21, and True-up for FY 2019-20, under HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations 2019 and Section 45, 46, 47, 61, 62, 64 & 86 of the Electricity Act 2003 read with the relevant guidelines, by Uttar Haryana Bijli Vitran Nigam Ltd and Dakshin Haryana Bijli Vitran Nigam Ltd.

#### **QUORUM**

Shri Pravindra Singh Chauhan Member (in chair)
Shri Naresh Sardana Member

#### **ORDER**

The Haryana Electricity Regulatory Commission (hereinafter referred to as 'the Commission' or HERC), in exercise of the powers vested in it under section 62 of the Electricity Act, 2003 read with section 11 of the Haryana Electricity Reforms Act, 1997 and all other enabling provisions in this behalf, passes this Order determining the True-up of the ARR for the FY 2019-20, Annual (Mid-year) Performance Review for the FY 2020-21, Aggregate Revenue Requirements and distribution and retail supply tariff of UHBVNL and DHBVNL for their Distribution and Retail Supply Business under MYT framework for the FY 2021-22 in accordance with the provisions of Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 (hereinafter referred to as MYT Regulations, 2019).

The Commission, while passing Order in the present case(s), has considered the Petition(s) filed by the Distribution Licensees viz. UHBVNL and DHBVNL along with subsequent filings/additional data provided by them including filings made by the two distribution licensees in response to the various queries of the Commission, objections received from various organisations and individuals and the reply / comments furnished by UHBVNL/DHBVNL thereto to as well as the suggestions of the State Advisory Committee (SAC) Members in the 24<sup>th</sup> meeting held on 05.02.2021. All other relevant facts, data and information available in the Commission as well as in the public domain has been considered while taking a reasoned view germane to the present petitions.

# **CONTENTS**

CH	IAPTE	R 1	7
N	TROD	ON FILED BY UHBVNL AND DHBVNL	
	1.1	PETITION FILED BY UHBVNL AND DHBVNL	7
	1.2	PRESENT PETITION	7
	1.3	PRINCIPLES OF TRUE UP FOR FY 2019-20.	8
	1.4	DISTRIBUTION LOSS FY 2019-20	9
	1.5	SUMMARY OF TRUE UP OF FY 2019-20	. 11
	1.6	Annual Performance Review for FY 2020-21	. 13
	1.7	Transmission Losses and Distribution Losses during the FY 2020-21	. 13
	1.8	AGGREGATE REVENUE REQUIREMENT FOR FY 2020-21	. 14
	1.9	AGGREGATE REVENUE REQUIREMENT FOR FY 2021-22	. 16
	1.10	AGGREGATE REVENUE REQUIREMENT FOR FY 2021-22	. 17
	1.11	REVENUE GAP FOR ARR YEAR FY 2021-22	. 18
	1.12	Prayer	. 19
CH	ΙΔΡΤΕ	8.2	.34
PF	ROCED		
	2.1	ARR PETITIONS FILED BY UHBVNL & DHBVNL	. 34
	2.2	PUBLIC NOTICE	. 34
	2.3	OBJECTIONS FILED BY THE INTERVENERS & DISCOMS REPLY THERETO	. 34
	2.3.1	OBJECTIONS FILED BY PANKAJ BHALOTIA	. 34
	2.3.2	COMMENTS BY FARIDABAD INDUSTRIES ASSOCIATION.	. 43
	2.3.3	COMMENTS OF M/S JINDAL STAINLESS (HISAR) LIMITED, HISAR	. 70
	2.3.4	COMMENTS OF INDIAN ENERGY EXCHANGE LIMITED	. 76
	2.3.5	OBJECTIONS FILED BY SH. GAURAV SAINI, SAINI POWER TRANSACTOR	. 79
	2.4	Public Hearing	. 88
	2.5	STATE ADVISORY COMMITTEE (SAC)	. 88
CH	IAPTE	R 3	.92
	VC	OF ADD FILINGS AND COMMISSIONIS ODDED	02
Αľ	NALYS	S OF ARR FILINGS AND COMMISSION'S ORDER	.92
	3.1	TRUE-UP OF THE ARR FOR THE FY 2019-20.	. 92
	3.1.1	OPERATION & MAINTENANCE EXPENSES	. 92
	3.1.2	Depreciation	. 94
	3.1.3	Interest on Consumers Security Deposit	. 95
	3.1.4	Interest on Capex Loans	. 95
	3.1.5	Interest on Working Capital Loan	. 96

	3.1.6	Interest on Bonds	98
	3.1.7	COST OF RAISING FINANCE AND BANK CHARGES	100
	3.1.8	EXPENDITURE DUE TO OTHER DEBITS	100
	3.1.9	RETURN ON EQUITY (ROE)	104
	3.1.10	Non-tariff Income	106
	3.1.11	True-up of Power Purchase Quantum and Cost	107
	3.1.12	REVENUE FROM SALE OF POWER FOR THE FY 2019-20 (ENERGY SALES)	109
	3.1.13	REVISED ARR FOR THE FY 2019-20	111
	3.1.14		
	3.2	Annual Performance Review for FY 2020-21	114
	3.3	THE REVISED AGGREGATE REVENUE REQUIREMENT FOR THE FY 2020-21:	118
	3.4	REVENUE GAP PROPOSED FOR THE FY 2020-21	119
CI	НАРТЕ	R 4	121
		INATION OF ARR FOR FY 2021-22	
D	ETERM	INATION OF ARR FOR FY 2021-22	121
	4.1	ASSESSMENT OF ENERGY SALES FOR FY 2021-22	121
	4.2	ASSESSMENT OF ENERGY SALES FOR FY 2021-22 BY DHBVNL	123
	4.3	AGRICULTURE PUMP (AP) SALES- FY 2019-20, FY 2020-21 (REVISED) & FY 2021-22 (PROJECTED)	124
	4.4	TRUE UP OF AP SALES FOR FY 2019-20 (TRUE-UP OF RE SUBSIDY).	125
	4.5	AP SALES ESTIMATION FOR FY 2020-21.	127
		SALES PROJECTIONS (OTHER CONSUMER CATEGORIES)	
	4.7	POWER PURCHASE VOLUME	129
	4.8	COMMISSION'S ESTIMATE OF POWER PURCHASE QUANTUM:	129
	4.9	INTERSTATE TRANSMISSION CHARGES & SLDC CHARGES	140
	4.10	Intrastate Transmission Charges & SLDC Charges	140
	4.11	TRANSMISSION LOSSES	141
	4.12	ENERGY BALANCE	141
	4.13	OPERATION & MAINTENANCE EXPENSES	143
	4.14	COMPUTATION OF INFLATION FACTOR	145
	4.15	EMPLOYEE EXPENSES	145
	4.16	REPAIR & MAINTENANCE (R&M) EXPENSES	147
	4.17	Administration & General (A&G) Expenses	148
	4.18	SUMMARY OF O&M EXPENSES	148
	4.19	APPROVED CAPITAL EXPENDITURE AND ADDITIONS TO GFA	149
	4.20	Interest & Finance Charges	150
	4.21	Interest on Consumer Security Deposit:	153
	4.22	Interest on Working Capital Loan	153
	4.23	Depreciation	157

4.24	RETURN ON EQUITY	159
4.25	DECAPITALISATION OR RETIREMENT OR REPLACEMENT OF ASSETS	161
4.26	Non-Tariff Income	161
4.27	Aggregate Revenue Requirement	162
4.28	REVENUE FROM INTER-STATE SALES	163
4.29	AGRICULTURE SUBSIDY	163
4.30	REVENUE GAP FOR ARR YEAR FY 2021-22	164
СНАРТЕ	R 5	166
CAPITA	L EXPENDITURE AND TECHNICAL PARAMETERS	166
5.1	CAPITAL EXPENDITURE	166
5.2	REVIEW OF CAPITAL INVESTMENT PLAN IN PROGRESS FOR FY 2020-21:	172
5.3	CAPITAL INVESTMENT PLAN FOR FY 2021-22	178
5.4	REVIEW OF TECHNICAL PARAMETERS	181
5.5	DISTRIBUTION LOSSES	181
5.6	LOSS REDUCTION TRAJECTORY	183
5.7	DISTRIBUTION TRANSFORMERS (DTS) FAILURE RATE:	185
5.8	NON-REPLACEMENT OF DEFECTIVE ENERGY METERS BY THE DISTRIBUTION LICENSEES:	187
5.9	NON-REPLACEMENT OF ELECTRO-MECHANICAL METERS	188
5.10	IMPLEMENTATION OF SMART METERING PROJECTS IN HARYANA:	190
5.11	PENDING ELECTRICITY CONNECTION/LOAD	190
СНАРТЕ	ER 6	193
WHEEL	NG CHARGES FOR THE FY 2021-22	193
6.1	WHEELING CHARGES FOR THE FY 2021-22	193
6.2	CROSS-SUBSIDY SURCHARGE (CSS)	194
СНАРТЕ	ER 7	199
RENEW	ABLE PURCHASE OBLIGATION (RPO)	199
	:R 8	
	F DAY / USE TARIFF	
8.1	Objective and Need	206
8.2	PROPOSAL BY DHBVNL AND UHBVNL FOR REVISED TOD / TOU TARIFF / NIGHT-TIME CONCESSION	ONAL TARIFF
FOR FY 2021-2	2206	
8.3	COMMENTS/SUGGESTIONS MADE BY STAKEHOLDERS ON TOD	210
8.4	COMMENTS FILED BY M/S JINDAL STAINLESS STEEL	211
8.5	LEGAL AND POLICY FRAMEWORK FOR TOD TARIFF	212

CHAPTER 9	216
DISTRIBUTION & RETAIL SUPPLY TARIFF	216
CHAPTER 10	229
DIRECTIVES	229



# Chapter 1

#### INTRODUCTION

#### 1.1 Petition filed by UHBVNL and DHBVNL

The two distribution licensees (Discoms) in Haryana i.e. Uttar Haryana Bijli Vitran Nigam (UHBVNL) and Dakshin Haryana Bijli Vitran Nigam (DHBVNL) have filed their respective petition(s) for True-up of FY 2019-20, Annual Performance Review (APR) Petition for FY2020-21 and Aggregate Revenue Requirement of FY 2021-22 under Section 26(5) of the Haryana Electricity Reforms Act, 1997 ("the Act") read with the applicable provisions of the Haryana Distribution & Retail Supply License (License No. DRS-2 of 2004) ("the License"), Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply Business under Multi Year Tariff Framework) Regulations, 2019 framed under the enabling provisions of the Electricity Act, 2003. The petition(s) filed by the Discoms are briefly set out below.

#### 1.2 Present Petition

Annual Revenue Requirement (ARR) FY 2021-22, Annual Performance Review (APR) for FY 2020-21 and True-up of FY 2019-20 petition(s) have been submitted by UHBVNL and DHBVNL for approval of expenses of respective year.

- The current petition has been prepared in accordance with the provisions of the following Acts / Policies / Regulations:
- Electricity Act 2003;
- National Electricity Policy;
- National Tariff Policy;
- HERC (Terms and Conditions for Determination of Tariff for Wheeling and Distribution
   & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 and current amendments;
- HERC (Terms and conditions for grant of connectivity and open access for intra-State transmission and distribution system) Regulations, 2012 and amendments thereof;

Chapter 1 Page 7 of 233

#### 1.3 Principles of True Up for FY 2019-20

That the Commission has notified HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff framework) Regulations, 2012 for First Control Period from FY 2014-15 to FY 2016-17 on 5<sup>th</sup> December 2012 (hereinafter referred as "MYT Regulations 2012"). Further, vide subsequent orders the first MYT Control Period was extended to FY 2019-20.

The Commission has notified HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff framework) Regulations, 2012 for First Control Period from FY 2014-15 to FY 2016-17 on 5th December 2012 (hereinafter referred as "MYT Regulations 2012"). Further, vide subsequent orders the first MYT Control Period was extended to FY 2019-20.

On 31<sup>st</sup> October 2019, HERC notified the MYT Regulation for Second Control Period from FY 2020-21 to FY 2024-25 as HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff framework) Regulations, 2019 (hereinafter referred as "MYT Regulations 2019").

According to Regulation 11.6 of the MYT Regulations 2019, the Commission shall review/true-up the Aggregate Revenue Requirement for FY 2019-20 on the same principles as approved in the Tariff Order for FY 2019-20. The relevant portion of the MYT Regulation 2019 is provided as under:

11.6 "The Commission shall review/consider, during the control period, the application made under this Regulation as also the application for truing up of the ARR of the previous year, as per provision of the Regulation 13, on the same principles as approved in the MYT order on the original application for determination of ARR and tariff. The review / true—up for FY 2018-19 and FY 2019-20 shall, however, be done on the same principles as approved in the tariff order for FY 2018-19 and for FY 2019-20. Upon completion of such review/truing up, either approve the proposed modification with such changes as it deems appropriate, or reject the application for the reasons to be recorded in writing. The Commission shall afford opportunity of being heard to the affected party in case it considers rejecting the application."

The Commission had issued the Tariff Order for Distribution & Retail Supply ARR and Tariff for FY 2019-20 on 7<sup>th</sup> March 2019, in line with the provision laid under the MYT Regulations 2012.

As specified in the Regulation 11.6 of the MYT Regulations 2019, Aggregate Revenue Requirement for FY 2019-20 is to be trued up on the basis of expenses approved in Tariff Order dated 7<sup>th</sup> March 2019 against the actual expenses incurred by Discoms during FY 2019-20.

Chapter 1 Page 8 of 233

Actual expenses filed for Discoms are based on the Audited Annual Accounts for FY 2019-20 which are enclosed along with the Petition as Annexure 1.

In line with the above, True-up Petition of Aggregate Revenue Requirement for FY 2019-20 on the basis of expenses approved in Tariff Order dated 7<sup>th</sup> March 2019 and the actual expenses incurred by Discoms as per Audited accounts for FY 2019-20 has been submitted for approval by the Commission.

# 1.4 Distribution Loss FY 2019-20

That it is evident from past year's performance of UHBVN that earnest efforts are being made towards reduction of AT&C losses to plug in the revenue loss. UHBVN has achieved AT&C losses level of 19.61% in FY 2019-20, which is a 14.27% loss reduction over a period of 4 years due to the efforts explained in subsequent paragraphs. That DHBVN has achieved AT&C loss level of 15.41% in FY 2019-20. The AT&C losses were at 21.35% in FY 2016-17 thus there has been a reduction of 5.98% over the period of 3 years. DHBVN has also achieved financial turnaround three years prior to the target given under the UDAY MoU.

That the Discoms have implemented Mhara Gaon JagMag Gaon (MGJG) and Feeder Sanitisation Schemes in rural and urban areas to curb the power theft and to improve the quality of service to the consumers. Line losses of Rural Domestic Feeders (RDS) contribute a significant portion to the overall distribution losses, therefore, to minimise the losses on these feeders. MGJG scheme has been implemented on the RDS feeders to encourage the participation of consumers, surcharge wavier and 15 hours power supply was offered to the villages in initial phase. On achievement of substantial reduction in line losses and increase in collection efficiency, power supply for 24 hours is provided in the villages. Currently, UHBVN is supplying 24x7 power to 2800 villages out of 3,445 villages and DHBVN is supplying 24x7 power to 2078 villages out of 3,650 villages covered under MGJG scheme as on 31st October, 2020 and 1st November, 2020. Works included in MGJG scheme is under progress in remaining villages and the impact of the same will reflect on overall loss level of UHBVNL and DHBVNL in ensuing years.

That the Discoms are further working extensively on strengthening of sub transmission and distribution network under Deendayal Upadhyaya Gram Joti Yojna (DDUGJY), Integrated Power Development Scheme (IPDS). Under these Schemes, the overloaded feeders are bifurcated and trifurcated along with creation of new 33 KV Substations. Works under these schemes are on their closure and the impact of these works will reflect in the performance of Discoms in the ensuing years.

Chapter 1 Page 9 of 233

DHBVN is carrying out system strengthening works under Japan International Cooperation Agency (JICA) funding which will further contribute towards reduction in distribution losses.

That UHBVN is also installing 5 lakhs Smart Meters in Panipat and Karnal under BOOT Mode through Energy Efficiency Services Limited (EESL) which is promoted by Ministry of Power, Govt. of India. DHBVN has also planned to install 5 lakhs smart meters in Gurugram and Faridabad under BOOT Mode through Energy Efficiency Services Limited (EESL) which is promoted by Ministry of Power, Govt. of India. The Discoms have successfully installed back-end system integration software which is a crucial module for establishing two-way communication with Smart Meters. In was observed, from the experience of Discoms in neighbouring state that backend system integration turns out as a major challenge for successful implementation of smart metering project, therefore to avoid such hurdle the Discoms first ensured the successful installation of backend system integration software. UHBVN has so far installed more than one lakh Smart Meters in Panipat & Karnal. DHBVN has so far installed more than 1,00,522 Smart Meters as on 1st October, 2020 in Gurugram and the Discoms also planned to procure additional 10 Lakhs Smart Meters with a view to increase efficiency in meter reading and billing, resulting in reduction of technical and commercial losses of Nigam.

That Discoms are also working on Demand Side Management. Various measures like distribution LED Lights, energy efficient fans and agriculture pump-set have been undertaken. These measures will reduce the energy requirement at LT network and eventually reduces the loss level of Discoms.

That in FY 2019-20, UHBVN has achieved distribution loss level of 19.01% against 21.88% achieved in FY 2018-19. However, the UHBVN has missed the distribution loss target of 14.14% given by the Commission in HERC Tariff Order dated 7<sup>th</sup> March, 2019. It may be noted that UHBVN has added 1.28 Lakhs consumer in FY 2019-20 and 1.23 Lakhs consumers in FY 2018-19, which is higher than the average rate of consumer addition (i.e. 0.83 Lakhs) during the period FY 2013-14 to FY 2016-17. In spite of increase in number of consumers at LT network, UHBVN has been able to consistently reduce the AT&C losses over the past three years, besides achieving financial turnaround in FY 2017-18.

That in FY 2019-20, DHBVN has achieved distribution loss level of 14.37%. The reduction is 0.97 over previous year. DHBVN has marginally missed the distribution loss target of 14.14% given by the Commission in HERC Tariff Order dated 7<sup>th</sup> March, 2019. It may be noted that DHBVN has added 2.29 Lakhs consumers in FY 2018-19 and 1.52 Lakhs consumers in FY 2019-20, which is higher than the average rate of consumer addition of

Chapter 1 Page 10 of 233

1.21 Lakhs during the period FY 2015-16 to FY 2017-18. In spite of increase in number of consumers at LT network, DHBVN has been able to consistently reduce the AT&C losses over the past three years, besides achieving financial turnaround in FY 2016-17.

That the Discoms have endeavoured to achieve the loss targets fixed by the Commission and working aggressively towards it. Initiatives undertaken are of long term in nature and impact will be visible after completion of the works which are under progress. It is submitted that reduction of distribution losses over the last year is a significant achievement and may be appreciated.

It has been further submitted that in accordance to P. Abraham Committee Report and R-APDRP Guidelines issued by Ministry of Power, Distribution Licensee having AT&C losses level ranging between 20% - 30% may be given loss reduction target of 2% per year, whereas for AT&C losses level less than 20% loss reduction target shall be fixed at 1% per year. The relevant extract of the Report is reproduced as under: -

#### "...AT&C Loss Reduction Targets

The Task Force examined the targets set for AT &C losses reduction and after taking into consideration experience of the Utilities felt that the targets should be recast in a manner that they are realistic and achievable based on the present level of AT&C losses in each State. Accordingly, the Task Force recommends the following targets depending on their present level of AT&C losses:

Utilities having AT&C losses above 40%: Reduction by 4% per year
Utilities having AT&C losses between 30 & 40%: Reduction by 3% per year
Utilities having AT&C losses between 20 & 30%: Reduction by 2% per year
Utilities having AT&C losses below 20%: Reduction by 1% per year..."

In view of the above it is submitted that Commission may consider the actual distribution loss level of UHBVNL and DHBVNL for carrying out the true up for FY 2019-20.

#### 1.5 Summary of True up of FY 2019-20

Summary of expenses approved by the Commission vis-à-vis the actual expenses of UHBVN for FY 2019-20 is tabulated below:

UHBVNL True Up of Expenses for FY 2019-20 (Rs. Crore)

Sr. No	Particulars	Approved	Actual	Diff.
1	Power Purchase Expense	9,989.26	11,269.43	1,280.17
1.1	Power Purchase Expense	8,471.51	9,766.90	1,295.39
1.2	Interstate transmission charges	909.25	539.50	(15.21)
1.3	Intrastate transmission & SLDC charges	608.50	963.02	(0.01)
2	Operations and Maintenance Expenses	1,367.90	1,289.42	(78.48)
2.1	Employee Expense	639.87	704.92	65.05

Chapter 1 Page 11 of 233

2.2	Administration & General Expense	85.21	105.67	20.46
2.3	Repair & Maintenance Expense	142.82	81.89	(60.93)
2.4	Terminal Liability	500.00	396.94	(103.06)
3	Depreciation	332.72	317.20	(15.52)
4	Total Interest & Finance Charges	342.80	606.42	263.62
5	Return on Equity Capital	215.13	278.52	63.39
6	Other Expenses	-	107.53	107.53
7	Total Expenditure	12,247.81	13,868.52	1,620.70
8	Less: Non-Tariff Income	197.25	305.24	107.99
9	Net Aggregate Revenue Requirement	12,050.56	13,563.27	1,512.71
10	Total Revenue		9,469.16	
10.1	Revenue from Interstate sales		335.86	
10.2	Revenue from Intrastate sales / Sale of Power		8,644.19	
10.3	Revenue from FSA		489.12	
11	Revenue Gap		(4,094.11)	
12	Subsidy from State Government		3,837.69	
12.1	AP-Subsidy		3770.81	
12.2	Domestic Subsidy		61.19	
12.3	NDS Subsidy		5.69	
13	Revenue Gap (after subsidy)		(256.43)	

**DHBVNL True Up of Expenses for FY 2019-20(Rs. Crore)** 

Sr.	Particulars	Approved	Actual	Difference
		(A)	(B)	(A-B)
1	Total Power purchase cost	14,746.84	15,291.58	(544.74)
1.1	Power Purchase Expenses	12,735.45	13,298.16	(562.71)
1.2	Interstate transmission charges	1,280.17	1,287.53	(7.36)
1.4	Intrastate transmission charges and SLDC charges	731.22	705.89	25.33
2	Operations and Maintenance Expenses	1,643.44	1,601.84	41.60
2.1	Employee Expense (Net of Capitalization)	969.66	918.67	50.99
2.2	Administration & General Expense (Net of Capitalization)	81.69	117.92	(36.23)
2.3	Repair & Maintenance Expense	165.34	122.34	43.00
2.4	Terminal Liability	426.75	442.90	(16.15)
3	Depreciation	307.01	259.99	47.02
4	Total Interest & Finance Charges	359.59	351.96	7.63
5	Return on Equity Capital	193.15	225.34	(32.19)
6	Other Expenses (Debits & Prior period Expenses)	-	40.23	(40.23)
7	Bad & Doubtful Debt		66.86	(66.86)
7	Total Expenditure	17,250.03	17,837.79	(587.76)
8	Less: Non-Tariff Income	469.51	351.76	117.75
9	Net Aggregate Revenue Requirement	16,780.52	17,486.04	(705.52)
10	Total Revenue		13,154.24	
10.1	Revenue from Interstate sales		497.24	
10.2	Revenue from Intrastate sales / Sale of Power		12,657.01	
11	Revenue Surplus/(Gap)		(4,331.79)	
	Less: Subsidy from Govt. of Haryana & NEF		3,153.56	
	Less: FSA Recovered as per Audited Accounts FY 2019-20		714.14	
13	GAP After AP Subsidy		(464.08)	

Revenue Gap of True up for FY 2019-20 (Rs Crores)

Sr. No	Particulars	Amount
1	Revenue gap of UHBVN after Subsidy	(256.43)
2	Revenue gap of DHBVN after Subsidy	(464.08)

Chapter 1 Page 12 of 233

3	Total Revenue surplus/(gap)	(720.51)
4	Revision in Subsidy due to actual AP Sales	(439.48)
5	Revenue surplus/(gap) for FY 2019-20	(1159.99)
6	Revenue Surplus/(Gap) of FY 2017-18 carried forward	(373.90)
7	Total Revenue surplus/(gap) for FY 2019-20	(1533.88)

#### 1.6 Annual Performance Review for FY 2020-21

The Commission has issued the HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff framework) Regulations, 2012 on 5<sup>th</sup> December 2012 (hereinafter referred as "MYT Regulation 2012") for Control Period of FY 2014-15 to FY 2016-17. Further, the Commission vide subsequent amendments has extended the Control Period of MYT Regulation, 2012 till FY 2019-20.

The Commission on 31<sup>st</sup> October 2019 has notified HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 (hereinafter referred as "MYT Regulation 2019") for Second Control Period from FY 2020-21 to FY 2024-25. As per Regulation 11.6 "Mid- Year Performance Review and Tariff Setting" of MYT Regulation 2019, Annual Performance Review (APR) of FY 2019-20 is to be done in accordance with Tariff Order of the relevant year. The relevant extract of the Regulation is provided as under:

#### 11. Mid - Year Performance Review and Tariff Setting

11.6 "The Commission shall review/consider, during the control period, the application made under this Regulation as also the application for truing up of the ARR of the previous year, as per provision of the Regulation 13, on the same principles as approved in the MYT order on the original application for determination of ARR and tariff. The review / true—up for FY 2018-19 and FY 2019-20 shall, however, be done on the same principles as approved in the tariff order for FY 2018-19 and for FY 2019-20..."

Tariff Order on ARR and Retail Supply & Distribution Tariff for FY 2020-21 was issued by the Commission on 1<sup>st</sup> June, 2020.

In line with the above, the Petitioner submits Annual Performance Review of ARR for FY 2020-21. Petitioner has considered actual available data for the first half of current financial year, pro-rata projections and escalations as per principles defined in the MYT Regulations, 2019 to project the ARR for FY 2020-21. Projected ARR for APR Year vis-a-vis approved expenses is submitted for the approval of Commission.

#### 1.7 Transmission Losses and Distribution Losses during the FY 2020-21

#### **Transmission Losses**

Chapter 1 Page 13 of 233

That Interstate and intrastate transmission losses of 3.82% and 2.15% respectively are considered for FY 2020-21, which are as per the loss level approved by the Commission.

#### **Distribution Losses**

That Commission has approved distribution loss target of UHBVN at 21.23% and of DHBVN at 16.53% FY 2020-21. With various system strengthening programmes and other initiatives, Discoms will put earnest efforts to achieve the target given by the Commission.

#### 1.8 Aggregate Revenue Requirement for FY 2020-21

That the revised estimate of Aggregate Revenue Requirement of UHBVN for FY 2020-21 is tabulated as under:

Aggregate Revenue Requirement for FY 2020-21 UHBVNL (Rs. Crores.)

	Aggregate Revenue Requirement for F1 2020-21 UHBVNL (Rs. Crores.)					
Sr. No	Particulars	Approved	Revise Estimates			
1	Total Power Purchase Expense	10,106.80	11831.08			
1.1	Power Purchase Expense	8747.54	10471.82			
1.2	Interstate transmission Charge	830.4	830.40			
1.3	Intrastate transmission charges and SLDC charges	528.86	528.86			
2	Operations and Maintenance Expenses	1307.28	1522.45			
2.1	Employee Expense	740.76	760.98			
2.2	Administration & General Expense	115.6	112.11			
2.3	Repair & Maintenance Expense	146.93	149.36			
2.4	Terminal Liability	303.99	500.00			
3	Depreciation	325.49	367.21			
4	Total Interest & Finance Charges	315.42	450.46			
4.1	Interest on UDAY bonds payable to the State Government	-	-			
4.2	Interest on WC loans including CC/OD limits	98.44	210.32			
4.3	Interest on CAPEX loans	136.71	103.19			
4.4	Interest Cost on Consumer Security Deposit	70.27	68.51			
4.5	Interest on other bonds (HVPNL, FRP)	-	45.44			
4.6	Other Interest and Finance charges	10.00	23.00			
5	Return on Equity Capital	-	290.92			
6	Other Expenses	-	-			
7	Total Expenditure	12,054.99	14462.12			
8	Less: Non-Tariff Income	221.56	221.56			
9	Net Aggregate Revenue Requirement	11,833.43	14,240.56			

That the revised estimate of Aggregate Revenue Requirement of DHBVN for FY 2020-21 is tabulated as under:

Aggregate Revenue Requirement for FY 2020-21 DHBVNL (Rs Crores)

S. No.	Particulars	APR	
		FY 2020-21 FY 2020-21	
		Approved	Projected
1.0	Power Purchase Expenses	13,945.86	14,731.47
1.1	Power Purchase Cost	12,120.16	12,905.77
1.2	Transmission Charges	1,216.80	1,216.80
1.3	Transmission Charges & SLDC	608.90	608.90

Chapter 1 Page 14 of 233

2.0	Operation & Maintenance Expenses	1,596.26	1,729.47
2.1	Employee Expenses (net)	938.93	986.54
2.2	Administration & General Expenses (net)	121.22	125.10
2.3	Repair & Maintenance Expenses	176.11	174.93
2.4	Terminal Benefits	360.00	442.90
3.0	Depreciation	325.23	334.73
4.0	Interest & Finance Charges	442.51	426.10
4.1	Interest on Long Term Loan	181.25	131.16
4.2	Interest on Working Capital	159.30	168.06
4.3	Interest on UDAY Bonds		ı
4.4	Interest on Consumer Security Deposit	75.89	91.49
4.5	Other Interest & Finance Charges	16.08	1.00
4.6	HVPNL Bond Charges		0.10
4.7	MDR Charges/ Digital Payment Transaction Cost		7.20
4.8	LC Charges	7	3.09
4.9	Guarantee Fee	10.00	24.00
5	Return on Equity Capital	1	265.64
6	Prior period expenses & other expenses		-
7	Other Debts, (including wealth tax)		-
8	Provisions for bad and doubtful debt		
9	Aggregate Revenue Requirement	16,309.86	17,487.41
10	Less: Non-Tariff Income	307.66	307.66
11	Net Aggregate Revenue Requirement	16,002.20	17,179.75

That on the basis of the proposed revised estimates of Aggregate Revenue Requirement of Haryana Discoms and proposed income for FY 2020-21, revenue gap works out to Rs 276.86 Crores for FY 2020-21. The details of the same are tabulated below:

# Revenue Gap for FY 2020-21 (Rs Crores)

Particulars	Approved	Revise Estimates
UHBVNL	11,833.43	14,240.56
DHBVNL	16,002.20	17,179.75
Total Aggregate Revenue Requirement	27,835.34	31,420.32
Total Revenue	20,241.20	23,090.31
Revenue from Interstate sales		2,145.03
Revenue from Intrastate sales / Sale of Power		19,804.04
FSA		1,141.23
Revenue Gap	(994.51)	(8,330.01)
Less: Total Subsidy	6,649.93	7,115.33
AP Subsidy		6,649.93
Domestic Subsidy & Others		465.40
GAP After AP Subsidy	944.51	(1,214.67)
Revenue Surplus/(gap) for FY 2018-19 carried forward	817.09	817.09
Carrying Cost @9.5%	120.72	120.72
Net Revenue GAP	(6.70)	(276.86)

The Petitioner submits that the revenue gap for FY 2020-21 was not appropriately allowed to the Petitioner in the Tariff Order dated 01.06.2020. The revenue gap for FY 2020-21 tantamount to Rs. 1,215 Crores against the allowed amount in the Tariff Order. Petitioners have further submitted that liquidity crisis due to COVID-19 has put the distribution licensees

Chapter 1 Page 15 of 233

into a situation of financial distress. The current situations looming under the COVID-19 will further stretch the financial viability of the Discoms. Therefore, it is requested that the Commission may kindly allow proposed revenue gap for FY 2020-21.

# 1.9 Aggregate Revenue Requirement for FY 2021-22

As per the Regulation 71 & 75 of HERC MYT Regulation, 2019, Petition for Determination of Tariff for Second Year of MYT Control Period, i.e. FY 2021-22, is required to be filed before the Commission on 30th November of the year preceding to the ensuing year. Besides the Petition for Aggregate Revenue Requirement for the ensuing years is required to be prepared in accordance to the details provided under the Regulations 8.3, 11 &13 of MYT Tariff Regulation, 2019. The relevant portion of aforesaid regulations are reproduced as under:

#### "71. Tariff Filings

# 71.2 Tariff filing for the control period under MYT framework

71.2.1 The generating company and the licensees shall file an application for approval of ARR for their respective businesses for each year of the control period and tariff for the first year of the control period consistent with the business plan and the capital investment plan approved by the Commission. The ARR and tariff filing shall be filed by 30th November of the year preceding the 1st year of the control period along with requisite fee in accordance with the provisions of Haryana Electricity Regulatory Commission (Fee) Regulations amended from time to time. The application shall contain all the components of the ARR and tariff as provided in these Regulations....

# 71.5 Filing for Mid-year performance review, True-up and determination of tariff for ensuing year

The generating company and the licensees shall file their application for midyear performance review of the current year, true-up of the previous year and tariff for the ensuing year along with requisite fee by 30th November of each year of the control period as per the details mentioned in the Regulation 11 & 13 for the Commission's review, true-up of uncontrollable/controllable items in accordance with Regulation 8.3 and approval of tariff for the ensuing year.

The MYT filing shall also contain an application for mid-year performance review of and true – up petition.

The Aggregate Revenue Requirement (ARR) for FY 2021-22 has been prepared as per the approach specified under the Regulation 8.3 of MYT Regulations, 2019. The financial components of Aggregate Revenue Requirement for FY 2021-22, had been projected based on the past trend, regulatory norms, activities planned and undertaken for the ensuing year. The revenant portion of the aforesaid regulation is reproduced as under:

8.3.4 The Aggregate Revenue Requirement of the Retail Supply Business to be recovered through retail supply tariff of the distribution licensee(s) shall comprise the following: -

Chapter 1 Page 16 of 233

- i) Power Purchase Cost
- ii) Transmission Charges (Inter State & Intra State)
- iii) Interest (Term Loan and normative Working Capital Loan, Consumer Security Deposit)
- iv) Depreciation
- v) Operation & Maintenance Expenses
- vi) Provision for bad and doubtful debt subject to a ceiling of 0.5% of the account receivable as per the latest available audited accounts.
- vii) Return on Equity Capital

Provided that the ARR computed as per above shall be net of Non-Tariff Income, income from Other Business, receipts from cross – subsidy surcharge and additional surcharge etc.

Provided further that the prior period expenses shall be considered at the time of truing – up on a case to case basis subject to prudence check. However, all penalties payable by the distribution licensee arising from Commission's order, courts / tribunal, CGRF / Ombudsman shall not be allowed to be recovered through ARR.

It is pertinent to mention here that the COVID-19 Pandemic has adversely impacted the gross domestic production across the state, this has resulted a significant drop in energy sales and eventually have created a situation of financial distress for the Petitioner. In order to make the realistic projection of financial parameters of Aggregate Revenue Requirement for FY 2021-22 certain deviations from the HERC MYT Regulations, 2019 have been sought and the necessary justification along with rationale have been solicited in the Petition.

The Capital Investment Plan for second year of MYT Control Period has also been submitted for the approval of the commission along with current ARR Petition for FY 2021-22. The directives issued by the Commission in the Tariff Order dated 01.06.2020 had already been furnished before the Commission.

#### 1.10 Aggregate Revenue Requirement for FY 2021-22

That the Aggregate Revenue Requirement of UHBVNL and DHBVNL for FY 2021-22 is tabulated as under:

Aggregate Revenue Requirement for FY 2021-22 UHBVNL (Rs Crores)

Sr. No	Particulars	FY 2021-22
1	Total Power Purchase Expense	12,312.79
1.1	Power Purchase Expense	10,871.70
1.2	Interstate transmission Charge	890.77
1.3	Intrastate transmission & SLDC	550.31
2	Operations and Maintenance Expense	1,637.69
2.1	Employee Expense	860.83
2.2	Administration & General Exp.	114.56

Chapter 1 Page 17 of 233

Sr. No	Particulars	FY 2021-22
2.3	Repair & Maintenance Expense	162.30
2.4	Terminal Liability	500.00
3	Depreciation	396.44
4	Total Interest & Finance Charges	338.57
4.1	Interest on Working Capital incl. CC	277.95
4.2	Interest on CAPEX loans	149.28
4.3	Interest on Consumer Security Deposit	73.59
4.4	Interest on other bonds	31.11
5	Return on Equity Capital	299.78
6	Other Expenses	-
7	Total Expenditure	15,178.62
8	Less: Non-Tariff Income	221.56
9	Net Aggregate Revenue Requirement	14,957.06

Aggregate Revenue Requirement for FY 2021-22 DHBVNL (in Crores)

Sr. No	Particulars	FY 2021-22
1.0	Power Purchase Expenses	16,065.68
1.1	Power Purchase Cost	14,116.08
1.2	Transmission Charges	1,305.26
1.3	Transmission Charges & SLDC	644.33
2.0	Operation & Maintenance Expenses	1,857.33
2.1	Employee Expenses (net)	1,085.55
2.2	Administration & General Expenses (net)	132.71
2.3	Repair & Maintenance Expenses	196.17
2.4	Terminal Benefits	442.90
3.0	Depreciation	398.84
4.0	Interest & Finance Charges	520.88
4.1	Interest on Long Term Loan	178.51
4.2	Interest on Working Capital	213.17
4.3	Interest on Consumer Security Deposit	106.10
4.4	Other Interest & Finance Charges	1.00
4.5	HVPNL Bond Charges	0.10
4.6	MDR Charges/ Digital Payment Transaction Cost	8.00
4.7	LC Charges	4.00
4.8	Guarantee Fee	10.00
5	Return on Equity Capital	307.82
6	Aggregate Revenue Requirement	19,150.55
7	Less: Non-Tariff Income	307.66
8	Net Aggregate Revenue Requirement	18,842.89

# 1.11 Revenue Gap for ARR year FY 2021-22

Based on proposed Aggregate Revenue Requirement and Revenue from sale of Power and AP Subsidy, revenue (gap)/surplus for ARR year FY 2021-22 for Haryana Discoms is detailed as under:

Revenue Surplus/(Gap) for ARR year FY2021-22 (Rs Crores)

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Particulars	FY 2021-22
Aggregate Revenue Requirement	33,799.95
-UHBVN	14,957.06
-DHBVN	18,842.89

Chapter 1 Page 18 of 233

Total Revenue	24,173.08
-Revenue from Interstate sale	1,256.17
-Revenue from Intrastate sale	22,916.90
Revenue Gap	(9,626.88)
AP Subsidy	6,649.93
Domestic Subsidy& other	1,181.88
Revenue surplus/(gap) of FY 2019-20 carried forward -true up	(1,094.40)
Carrying cost @9.25%	(151.85)
Total Revenue surplus/(Gap) after regulatory adjustment	(3,041.32)

#### 1.12 Prayer

In view of the above submissions UHBVNL and DHBVNL have prayed that the Commission may:

- Take the accompanying filing on record and accept the Aggregate Revenue Requirement of True up for FY 2021-22, Annual Performance Year for FY 2020-21 and True-up of FY 2019-20.
- Allow revision of the current petition, filing of any additional / supplementary submissions during the course of these proceedings;
- Allow return on equity as proposed;
- Allow the entire fixed charges of power purchase as the power is procured from the sources whose PPAs have been duly approved by the Commission and also the energy charges of power procurement from these sources as proposed in the filing;
- Allow True-Up of FY 2019-20 along with the carrying cost, revised estimate of expenses projected for FY 2020-21 and Aggregate Revenue Requirement of FY 2021-22 along with actual interest cost on the entire loan
- Allow to continue the current levels of tariff and charges.
- Allow Additional Surcharge of Rs 1.15 per unit to be recovered from Open Access Consumers
- Condone any inadvertent omissions/errors/shortcomings and permit the Discoms to add/change/modify/alter this filing and make further submissions as may be required during the course of these proceedings;
- Pass such Order, as the Commission may deem fit and appropriate keeping in view the facts and circumstances of the case submitted by the Petitioners.

Chapter 1 Page 19 of 233

In continuation of the aforesaid said petition, Discoms, through IA No. 02 of 2021 dated 03.03.2021 (UHBVNL) and IA no 03 of 2021 dated (DHBVNL), have filed supplementary filing with the following submissions and additional prayers:

# 1. Proposal for revised ToD/ToU Tariff/Night-time Concessional Tariff for FY 2021-22

- i. The Commission approved the night-time concessional tariff as proposed by the Discoms in PRO-55 of 2019 via order dated 13.12.2019. The approved concessional tariff for HT Industrial consumers on 11/33 KV was Rs. 5.25/kVAh and on 66 KV and above was Rs. 4.85/kVAh.
- ii. Further, in Tariff Order dated 01.06.2020, the Commission stated as under:
  - "The ToD and Concessional Tariff as determined above shall continue unless the same, by a specific Order and after holding consultation with the stakeholders, is amended / withdrawn by the Commission"
- iii. During the month of Nov 2020 and Dec 2020, only a few consumers opted for concessional tariff. In view of such low adoption by the HT consumers, Discoms hereby submit a proposal to revise the concessional tariff for the period of Nov 2021 to March 2022.
- iv. For proposing revised tariff for incremental consumption following factors have been kept in view: -

That as per the information obtained from the IEX, the landed price Rs/kWh at Haryana periphery of power procured from power exchange from Jul 2020 to Dec 2020 has been as under: -

Month	Price at IEX Rs/kWh	Price at Haryana periphery Rs/kWh
Jul'20	2.47	2.54
Aug'20	2.43	2.50
Sep'20	2.69	2.76
Oct'20	2.73	2.80
Nov'20	2.73	2.80
Dec'20	2.83	2.90

The average price at Haryana periphery for November 2020 to December 2020 works out to be Rs 2.85/kWh. Accordingly, average price at consumers end for procuring power from IEX through Open Access works out as under: -

Chapter 1 Page 20 of 233

Particular	Landed price at Consumer end	
	At 11/33KV Rs/kWh	At 66KV and above Rs/kWh
Landed Price at Haryana Periphery	2.85	2.85
Intrastate Transmission losses @2.15%	0.06	0.06
Intrastate Transmission charges	0.24	0.24
Wheeling Charges	1.00	0.47
Cross Subsidy Surcharge	0.62	0.62
Additional Surcharge	1.01	1.01
Landed Price at consumer end	5.78	5.25

The details of sale of power through Power Exchange by the Discoms from April 2020 to Dec 2020 are as follows:-

Month	Unit in LU's	Amount (Rs. Cr.)	Rate per Unit (Rs/kWh)
2020-21			
Apr-20	856.24	16.80	1.96
May-20	100.61	1.91	1.90
Jun-20	0.92	0.02	2.08
Jul-20	83.20	1.96	2.36
Aug-20	7.97	0.15	1.83
Sep-20	22.34	0.56	2.49
Oct-20	68.14	2.07	3.04
Nov-20	154.23	4.53	2.94
Dec-20	105.48	3.07	2.91

That from the table given above, it can be observed as under: -

a) The weighted average rate for a total of approximately 26 MUs of power sold through Power Exchange during Nov 2020 to Dec 2020 works out to Rs 2.93/kWh. This is equivalent to selling power to a consumer at 66kV and above at Rs 2.99/kWh and to 11/33kV consumer at Rs 3.17/kWh after considering intrastate losses @ 2.15 % and distribution losses (technical) @ 6%. So, if this power is offered to HT consumers at a revised concessional tariff for incremental consumption, it would incentivize the HT consumers in consuming more during night-time and be a win-win situation for the Discoms as well as consumers.

The Energy charges for the HT Consumers at 11KV are Rs 6.65/kVAh whereas at 33 kV, 66/132kV, 220kV, and 400 kV, the Energy charges are Rs.6.55, Rs.6.45, Rs.6.35 & Rs. 6.25/kVAh respectively. Besides, the transmission/distribution losses are much lower in case of consumers at 66 kV and above. It is, therefore, considered prudent that distinction is made between the concessional tariff offered to HT Industrial Consumers on 11/33 kV and that offered to HT Consumers at 66 kV and above.

Chapter 1 Page 21 of 233

#### **Proposed Tariff for FY 2021-22:**

- i) Concessional Tariff or power drawn during off peak hours i.e. 21:00 to 05:30 hours in excess of normal consumption during the corresponding month in the preceding year will be optional and will be available only to HT Consumers, including furnaces, who opt for the scheme, during the period November to March.
- ii) The HT Consumer, desirous of availing this tariff as per the terms and conditions proposed by the Discoms, shall submit the application to the Chief Engineer / Commercial of respective Discom.
- iii) The Committee comprising of Chief Engineer/Commercial and SE / Metering & Protection shall clear the applications, as far as possible, within the same day. However, the decision shall in no case be delayed beyond three working days from the date of receipt of the application.
- iv) The Tariff, as given below, which shall be exclusive of FSA, ED and M. Tax, would be applicable for the energy drawn during off peak hours i.e. 21:00 to 05:30 hours over and above normal consumption in the corresponding month of the preceding year. The energy drawn over and above the normal consumption, on which concessional tariff would apply, would be equal to lesser of  $\Delta x$  and  $\Delta y$ , where

 $\Delta x$ = Cumulative change in consumption during night hours (21:00 Hrs to 05:30 Hrs) over the entire billing cycle.

Δy=Cumulative change in total consumption during the 00:00 to 24:00 hours over the entire billing cycle.

- v) The base consumption for working out the change in consumption would be decided by the Nigam on case to case basis keeping in view the factors like seasonality, load/CD extension etc.
- vi) The concessional tariff from November 2021 to March 2022 (for time slot of **21:00 to 05:30**) shall be as under:

# **Concessional Tariff**

a)	HT Consumers on 11/33 kV	: Rs 4.25/kVAh
b)	HT Consumers on 66 kV and above	: Rs 3.75/kVAh

Chapter 1 Page 22 of 233

- vii) Once opting to avail concessional tariff, the consumer would continue to be charged concessional tariff for the entire duration of the Scheme from November to March. The billing under concessional tariff shall commence from start of billing period immediately following the date of acceptance of the application of the consumer.
- viii) Other terms & conditions of this tariff shall remain as per the ongoing approved concessional tariff scheme.

That as on date, there are two Schemes, ToD/ToU Tariff and night time concessional tariff, are available for consumers which are similar in nature. In both the schemes, there is a rebate/concession in tariff on the incremental consumptions during night time from November to March. The objectives of both the schemes are to shift the load from peak hours to off peak hours and to utilize surplus power available in off peak hours during these months.

That it is requested to merge the schemes of ToD/ToU Tariff and night time concessional tariff and to launch ToD/ToU Tariff scheme from November, 2021 to March, 2022 for HT categories of consumers i.e. HT industry (including Arc furnace) HT NDS, Bulk Supply (other than Bulk Domestic). The proposed ToD/ToU Tariff is as under:-

Period	Charge	
Off-Peak Demand	For incremental consumption:-	09:00 P.M to 05:30 A.M
(Nov. to March)	HT Consumers on 11/33 kV- Rs 4.25/kVAh	
	HT Consumers on 66 kV & above- Rs 3.75/kVAh	
Peak Demand	Normal Energy charges and applicable PLEC charges 5:30 P.M to 09:00 P.M	
(Nov. to March)		
Normal Demand	Normal Energy charges 05:30 A.M to 5:30 P.M	
(Nov. to March)	determined by the Commission	
Demand Charges	As determined by the Commission - shall be the same for all categories of	
	consumers.	

#### 2. Promotional Scheme for Smart Metering:

Haryana Discoms are implementing installation of smart meters across selected cities. ToU/ToD tariff can be easily implemented through smart meters. Hence, in line with the night-time concessional tariff scheme for HT consumers, Discoms hereby also intend to implement concession for LT consumer category (up to 20 kW) where the smart meters are being installed.

That in view of the above objective of appropriate utilization of surplus power during night-time, Discoms hereby submit a proposal to allow a concession of Rs. 0.50/kWh for electricity consumed from 21:00 Hrs to 05:30 Hrs during the month of November'21 to March'22 for

Chapter 1 Page 23 of 233

consumers having load up to 20kW under DS, NDS & LT industry categories. The same may be considered by the Commission.

#### 3. Promotional Scheme for Faster Adoption of Electric Vehicles

With an objective of faster adoption of electric vehicles, Discoms hereby submit a proposal to allow a concessional tariff of Rs. 5.55/kWh or Rs. 5.00/kVAh and Rs. 100/kWh/month as fixed charges to EV Charging stations. The same may be considered by the Commission.

#### 4. Net Metering and gross metering

Haryana Discoms proposed that Net Metering shall only be allowed for Domestic and Agricultural consumers and to be limited upto 10 KW as per Electricity (Rights of Consumers) Rules 2020. For all remaining consumers, Gross Metering mechanism as mentioned in the Electricity (Rights of Consumers) Rules 2020 shall be adopted.

Further, any kind of generation-based incentive for the consumers opting for Net Billing mechanism shall be discontinued. As currently in Haryana an incentive of Rs. 1.00/unit is given to the Domestic and Bulk Domestic consumers under net metering mechanism, this shall also be discontinued.

# 5. RPO targets and RE Regulation

The Electricity Act, 2003 ('Act') by the virtue of section 86(e) embarks upon the responsibly to the Ld. Commission to determine the minimum percentage of renewable to be purchased vis-à-vis total consumption of electricity in the area of the distribution licensee. The Commission however is also responsible for ensuring reasonable tariff by regulating the electricity purchases of distribution licensee in an efficient manner. As per the mandate of the Act, this Commission notified HERC (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 which inter alia specified minimum percentage of solar and non-solar renewable to be purchased by Discoms in the name of Renewable Purchase Obligation (RPO), tabulated as under:

FY	RPO (%) as per HERC RE Regulations, 2017	
	Non Solar Solar	
2020-21	3.00	7.00
2021-22	3.00	8.00

That the Commission in its ARR order dated 01.06.2020 for MYT control period from FY 2020-21 to FY 2024-25 considered the Submissions of Discoms and inter alia decided to waive off the backlog of RPOs as a onetime measure. The Commission, however, directed

Chapter 1 Page 24 of 233

the Discoms to make every possible endeavour to meet the RPO targets as given to them by the Commission in timely manner in true letter and spirit. The Commission has also directed Discoms to perform cost benefit analysis including trade-off between purchase of REC and RE power before rushing with proposal to procure RE power. The Commission in its ARR order dated 01.06.2020 has approved RPO for the FY 2020-21 is as under: -

Energy Consumption for 2020-21 (MU)	% age of Non- solar RPO of energy consumption	Non- Solar RPO (MU)	Solar RPO as % age of energy sales	Solar RPO (MU)	Total renewable energy required to be purchased (MU)
36320.4*	3.00%	1089.60	7.00%	2542.40	3632

\*excluding Hydro and RE sources

That the Discoms/HPPC in compliance with the orders/directives of the Commission have made sincere efforts in achieving RPO targets. The Commission may however take notice that the outbreak of Corona Virus pandemic had resulted into unprecedented conditions across the world which inter alia resulted in imposition of various restrictions across all sectors. The supplies from China and local manpower constraints during the COVID pandemic situation has severely affected the commissioning of Renewable Power Projects. Despite the fact that the Discoms have sufficient tie up for Renewable energy Power for meeting its RPOs, the power from RE power against various PPAs/PSAs signed by Discoms/HPPC could not commenced due to delay in Commissioning of renewable energy projects. Besides above, non-trading of RECs in energy exchanges on account of APTEL orders and the limited availability of short-term power posed further challenges in meeting RPOs during the current FY 2020-21. It may be noted that the REC trading stands suspended since July, 2020, whereas limited Renewable power is being traded in energy exchanges. Against all challenges the Discoms/HPPC has made sincere all out efforts and shall be able to achieve the following levels of RPO during FY 2020-21: -

	Achieved in MUs			
RPO Description	FY 2019-20	FY 2020-21		
		Upto November, 2020	Expected during remaining FY 2020-21	Total
Solar	401	938	250	1188
Non Solar	902	632	600	1232

That Non-solar RPOs are expected to be achieved whereas shortfall in solar RPOs shall be there during the FY 2020-21. In order to fulfil solar RPOs Discoms/HPPC is exploring options of purchasing RECs and solar energy on short term basis. The shortfall is however attributed to following reasons: -

- a. Delay in commissioning of RE project due to COVID/force majeure situation;
- b. Limited availability of solar power on short term basis

Chapter 1 Page 25 of 233

#### c. Suspension of REC trading in lieu of APTEL orders since June, 2020.

That the Commission may appreciate that despite all adverse situations, Discoms/HPPC expects to achieve its non-solar RPO targets whereas solar power against solar RPOs has increased to three folds in comparison to solar RPO achieved during FY 2019-20. The Commission may kindly take notice that the delay in RE projects due to COVID situation/force majeure has led to slippage of solar and non-solar RE power in FY 2020-21 to the tune of 562 MUs and 2976 MUs respectively. Had the commissioning of projects not delayed in lieu of force majeure conditions and RECs would have been traded across the year, the yearly RPO targets would have been met comfortably. The delay in Commissioning of renewable Projects would also impact the RPO planning of FY 2021-22. Slippage of solar and non-solar RE power to the tune of 1549 MUs and 808 MUs respectively is further expected during FY 2021-22 due to delay in RE projects amidst COVID pandemic/force majeure conditions. Details are attached at Annexure-I for kind perusal please. Discoms/HPPC may not be penalized for non-compliance of RPOs for reasons beyond their control. Equivalent purchase of RECs in due course in lieu of this shall adversely impact the tariff and consumers at large. Generation loss due to delay in commissioning of renewable energy projects in lieu of force majeure for may be considered for the purpose of RPO compliance of Discoms. SECI vide letter dated 01.10.2020 has also proposed similar relaxation to MNRE (Copy enclosed as Annexure-II). As such, the Commission may consider to allow accounting generation loss due to delay in commissioning of renewable energy projects in lieu of force majeure/non execution of project by the developers/conditions beyond the control of developer/change in law/Policy etc. for the purpose of RPO compliance.

It is further submitted that Haryana Discoms are continuously requesting for allowing interchangeability of solar and non-solar RPOs so as renewable power matching with State load curve be sourced. The Commission may kindly consider that the load curve of Haryana is not apt for accommodating the solar energy above a certain level owing to the limited flexibility of thermal generation. Whereas, the wind generation suits better in comparison to solar generation. The Commission, as per the provisions of the Act, may prudently decide the RPOs for obligated entities including Discoms in such a way that would not impact the electricity consumers of the State adversely besides meeting its overall objective of reducing carbon foot prints in line with national objectives. It will be prudent that solar and non-solar RPO be merged to one so as Obligated Entities/Discoms/HPPC may consider sourcing renewable power compatible to demand curve of the State. The State is in receipt of reference dated 20.10.2020 from Shri Piyush Goyal Ld. Minister of Railways, Minister of Commerce and Industry and Minister of Consumer Affairs, Food and Public Distribution to

Chapter 1 Page 26 of 233

the Government of India whereby inter alia intervention of State has been sought for merging of solar and non-solar RPOs so as Indian railways may install additional solar power capacity on its own land rather arranging/installing non-solar power plants due to technical constraints (Copy of letter enclosed as Annexure-III). Accordingly, the Commission may consider defining solar and non-solar RPOs however allow interchangeability between solar and non-solar RPOs so as resources be best utilized as per need besides meeting the overall objective of reducing carbon footprints.

That HPPC vide office memo no. Ch-115/HPPC/SE/C&R-I/LTP-III/HERC dated 19.01.2021 has also submitted its comments on the draft HERC RE Regulations, 2020 which inter alia covers views of Discoms/HPPC on the RPO and future trajectory thereof. The Commission is requested to consider the ibid comments of HPPC in the matter please along with above submissions.

# In view of the above, the petitioners have requested the Commission to consider the following: -

- i. Allowing accounting of generation loss/slippage of solar and non-solar power against the PPAs/PSAs due to delay in commissioning of renewable energy projects in lieu of force majeure/non-execution of project by the developers/conditions beyond the control of developer/change in law/Policy etc. for the purpose of RPO compliance.
- ii. Allowing accounting of generation loss/slippage of solar and non-solar power amidst COVID/force majeure situation to the tune of 468 MUs and 2776 MUs respectively for RPO compliance with respect to FY 2020-21.
- iii. Allowing interchangeability between solar and non-solar RPOs so as resources be best utilized as per need besides meeting the overall objective of reducing carbon footprints.

#### 6. Capex during FY 2021-22 for installation of Electric Vehicle Charging Station

UHBVN proposes installation of one electric vehicle charging station in each District. The cost of installation of one such EV charging station is approximately 20 lacs. The total cost of 10 no. charging station in 10 Districts under the jurisdiction of UHBVN comes out to be Rs. 2 Cr. approx. Accordingly, Additional Capital Expenditure for installation of electrical vehicle charging station in UHBVN for FY 2021-22 may be considered as Rs. 2 Cr.

- 7. Other issues highlighted by the Commission during Public Hearing on 28.01.2021
- i) Pendency of release of connections:

Chapter 1 Page 27 of 233

In the public hearing held on dated 28.01.2021, the Commission has observed that **60857** applications with load of **667.592 MW** are pending as on 30.09.2020 and directed UHBVN to release the same at the earliest.

This is based on the information sought by the HERC as per the prescribed format with respect to pending applications as on 30.09.2020. However, the figure of pending applications considered by the Commission in hearing and in press release also includes **40630** applications for **324.43 MW** of Agriculture category, Applications received with ageing less than 30 days and applications pending on compliance of demand notice.

In order to have clear picture of pending applications for new connections, out of total pending applications, the applications on account of following are required to be excluded as per the reasons given against each of them.

Sr.	Pending applications on	Reason for exclusion		
No.	account of			
1	Agriculture category	Released as per policy from time to time		
2	New Applications pending	Clause 4.4.7 of supply code regulations which prescribe 30 days		
	within prescribed timelines	for LT connections and 71 days for HT (11KV connection)		
3	Pending on compliance of	Clause 4.4.7 & 4.4.3 (3) of supply code regulations which		
	demand notice	prescribe additional time for compliance of demand notice by		
		applicant in addition to prescribe timelines of 30/71 days		

Accordingly, the details pending applications as on 30.01.2021 has been prepared and is attached as **Annexure-IV**. The salient features are given as under: -

- (a) As on 30.01.2020, the number of pending applications are **50097** with applied load of **646.506 MW**.
- (b) Out of the total pending applications, **40378** applications pertain to Agriculture category with applied load of **322.705** MW
- (c) The Number of pending applications pertaining to Non-AP categories are only **9719** with applied load of **323.801 MW**
- (d) Out of total pending Non-AP applications, the pending applications having age less than 30 days for LT and 71 days for HT are **8487** with applied load of **125.955 MW**
- (e) Therefore, total overdue pending applications are only **1232** with applied load of **197.846 MW** only
- (f) Out of total overdue **1232** applications,**127** applications with applied load of 129.356 MW are pending on compliance of demand notice i.e. on part of consumer

Chapter 1 Page 28 of 233

- (g) Therefore, after excluding agriculture applications, New applications received pending under prescribed timelines of HERC and applications pending on compliance of demand notice i.e. on consumer part, only 1105 overdue applications with 68.49MW are in process in various steps
- (h) Out of 1105 overdue applications with 68.49 MW in process, 1088 applications of 36.621 MW are on release stage.
- (i) For only 17 overdue applications with 31.869 MW load demand notices have not been issued. The reason for such applications with major load are given as under: -

Sr.	Name of applicant	Load	Reason of pendency
No.		(MW)	
1	MARUTI SUZUKI INDIA LIMITED (At	17. 50	Approval pending on part of HSIIDC
	132 KV Level)		
2	MARUTI SUZUKI INDIA LIMITED (At 33	4.00	System overloaded. Augmentation of
	KV Level)		132/33 KV is to be done by HSIIDC
3	Others	7.6620	Due to court case non-compliances by
			applicants, HVPN etc.
	Grand Total		

Therefore, the Commission is requested to consider the above status for the purpose of performance.

## ii) Collection Efficiency of Sonipat Circle:

Due to COVID effect proper reading and bill distribution could not managed. Now bills with proper reading are being distributed to all consumers and recovery is being monitored on daily basis. In the month of Dec20 collection efficiency of urban is 112.39%, RDS 115.48%, industry 110.19% and overall 108.59%. Best efforts are being made to achieve the collection efficiency targets of FY 2020-21.

# iii) Status of pending MCOs of Smart Meters and Remote Disconnection of defaulters in Panipat:

27,512 numbers of smart meters have been installed by the M/s EESL in Panipat city. The Subdivision-wise Smart meters installed and pendency of MCOs as on date is as under:

Name of Operation	No. of Smart Meters	MCOs	No. of pending	
S/Division	installed	Completed	MCOs	
Sanoli Road	15058	14978	80	
City Panipat	8500	8121	379	
Model Town	3954	3954	Nil	
TOTAL	27512	27053	459	

Chapter 1 Page 29 of 233

The above said Pendency of MCOs in Operation City, S/Division, Panipat was because the "Lotus" make smart meters were installed through an outsourced agency against smart grid project funded by Govt. of Japan and were entered into RAPDRP system by another outsourced agency. The serial no. of smart meters were inadvertently entered by the outsourced agency. However, the above said error is now been sorted out and the pendency would be cleared by 15.02.2021.

In case of Operation Sub Division Sanoli Road, Panipat, the old version meters were replaced with DLMS type electronic meter in the month of April, 2020 and later the same were also replaced with Smart Meters. The MCOs were issued twice but could not be entered in RAPDRP system due to certain technical reasons such as generation of high bills and their trapping as exceptional bills. However, now the same are being set right and the pendency would be cleared by 15.02.2021.

Further, it is submitted that Remote Disconnection of defaulters could not be started because of issue of VPN access and other technical issues, which is being resolved and remote disconnection will be started shortly.

#### iv) Missed call-based Bill information:

- i. Consumers can download their latest electricity bill by giving missed call on 7087019636 from his registered mobile number linked with his consumer account no.
- ii. Once the call is made, the call will get automatically disconnected and consumer will receive an SMS on its registered mobile no. carrying a link to download latest copy of bill in PDF format.
- iii. Post clicking the Link, a web page will be open on consumer mobile screen and an OTP will be received on consumer registered mobile no. After entering the OTP, consumer can download copy of latest bill in PDF format. The same link also has the option to update mobile no. and aadhar no. and facility to make online payment also.

#### **Additional Prayers**

That on consideration of the above submissions, the Commission is requested:-

i. To approve the revised ToD/ToU Tariff/Night-time Concessional Tariff, the Promotional Schemes for Smart Metering & Faster Adoption of Electric Vehicles as per the proposal given above.

Chapter 1 Page 30 of 233

- ii. To allow accounting of generation loss/slippage of solar and non-solar power against the PPAs/PSAs due to delay in commissioning of renewable energy projects in lieu of force majeure/non-execution of project by the developers/conditions beyond the control of developer/change in law/Policy etc. for the purpose of RPO compliance.
- iii. To allow accounting of generation loss/slippage of solar and non-solar power amidst COVID/force majeure situation to the tune of 468 MUs and 2776 MUs respectively for RPO compliance with respect to FY 2020-21.
- iv. To allow interchangeability between solar and non-solar RPOs so as resources be best utilized as per need besides meeting the overall objective of reducing carbon footprints.
- v. To allow Capex for installation of Electric Vehicle Charging Station during FY 2021-22.
- vi. To consider the comments on the draft HERC RE Regulations, 2020 submitted on 19.01.2021 along with above submissions.

In continuation of the above petition and submissions, DHBVNL, through another interlocutory application IA No. 4 of 2021 vide memo no. Ch.152/SE/RA-682 dated 16.03.2021, have filed additional submissions on applicable tariff for consumers to whom **temporary metered connections** are granted.

- DHBVN is a State-Owned Power Distribution Company and registered under the companies Act, 1956, formed under corporatisation/ restructuring of erstwhile Haryana State Electricity Board (HSEB) and is holder of distribution and retail supply of electricity License (License No. DRS-2 of 2004) in the Southern Zone of Haryana.
- 2. Pursuant to Section 61, 62 and 64 of Electricity Act 2003, Distribution Licensee in Haryana is required to make application of Annual Revenue Requirement (ARR) before the Haryana Electricity Regulatory Commission for determination of Retail Supply Tariff in accordance to the procedures laid out in HERC (Terms and conditions for Determination of Tariff for Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019and its subsequent amendments from time to time. The ARR Petition for FY 2021-22along with True-up for FY 2019-20 was filed on 27.11.2020by Dakshin Haryana Bijli Vitran Nigam Limited (hereinafter referred to as "DHBVN")
- **3.** The present additional submission is being filed before the Hon'ble Commission for change in the applicable tariff for temporary metered connections

Chapter 1 Page 31 of 233

#### **Background**

- I. The temporary metered connections were being billed at Energy charges 1.5 times the energy charges of relevant category for which temporary supply has been sought plus fixed charges/ MMC at normal rates of relevant consumer category as per the tariff determined by the Hon'ble Commission in the Tariff Order dated 15.11.2018.
- II. Subsequently, the temporary metered connections started getting billed at NDS category tariff as per the HERC Tariff Order dated 07.03.2019.
- III. Clause no. 4.5.2 of the Haryana Electricity Regulatory Commission (Electricity Supply Code) Regulations, 2014 provides guidance with respect to the time period for which the temporary supply connection may be granted to the eligible consumers as elaborated under:

"Temporary supply connection shall be granted for a period of up to 3 months at a time, which can be further extended depending upon the requirement. For extension of the period of temporary supply, the procedure detailed in Regulation 4.5.12 shall be applicable.

Provided that in case of construction of buildings (both residential and non-residential), where it would take longer time for completion of the same or other such projects, the temporary supply connection shall be given for a period as under:

For construction of buildings = Two years

For other projects = One year

The above period shall be extended by six months at a time on the request of the developer if the project/building is not completed by that time.

Provided further that when any part of the building / project has been effectively completed and possession offered to a prospective occupant, then the developer/occupant of such building/portion shall apply for a permanent connection to the licensee within one month from the date of such effective completion/offer of possession. The temporary connection shall be removed three months after the date of such effective completion / offer of possession."

IV. From the above specified Clause no. 4.5.2 of HERC (Electricity Supply Code) Regulations, 2014, it may be observed that in case of developers, there is a provision to grant the temporary connection for a period of up to 2.5 years for construction of buildings and up to a period of 1.5 years in case of other projects.

Chapter 1 Page 32 of 233

- V. It has been observed that in many cases, the consumers to whom the temporary metered connection is granted, the request / application for a regular connection under appropriate category is not received by the Nigam even after construction of building or any other project is complete. Further, in certain instances it has been observed that the developers / builders continue to supply power to the residents / occupants in the buildings / projects without applying for a fresh regular connection as per applicable category. In some cases, such kind of lapses are wilful and in some cases such events happen inadvertently. Also, in a number of such instances, it becomes difficult for the Nigam to disconnect such temporary connections to avoid inconvenience to the residents / occupants.
- VI. In view of the above, the Nigam is of the opinion that if there is sufficient motivation for the consumers to intimate the Nigam to terminate the temporary connection and apply for regular connection, the events described in Point no. V above may be avoided. Accordingly, the Nigam would like to submit to the Hon'ble Commission to allow billing of the consumers with temporary metered connections at Energy charges 1.5 times the energy charges of relevant category for which temporary supply has been sought plus fixed charges/ MMC at normal rates of relevant consumer category.
- VII. Further, the Nigam submits to the Hon'ble Commission to take cognizance of the fact some builders have tendency to misuse the temporary connections, which is otherwise meant only construction / development purposes only.

Prayer :The Nigam respectfully prays that the Commission may:

- i. Take the submission and prayer of DHBVN on record.
- ii. Allow change in the tariff applicable for temporary metered connections
- iii. Condone any inadvertent omissions/errors/shortcomings and permit DHBVN to add/change/modify/alter the submissions and make further submissions as may be required during the course of these proceedings;
- iv. Pass such Order, as the Hon'ble Commission may deem fit and appropriate keeping in view the facts and circumstances of the case submitted by DHBVN.

Chapter 1 Page 33 of 233

# Chapter 2

# PROCEDURAL ASPECTS OF THE ARR PETITION (S)

#### 2.1 ARR Petitions filed by UHBVNL & DHBVNL

The Petition(s) filed by UHBVNL and DHBVNL as reproduced in the preceding chapter were examined at length. The Commission, vide memo no. 4370/HERC/PRO 77 of 2020 dated 06.01.2021 (UHBVNL) and vide memo no. 4411/HERC/PRO 78 of 2020 dated 08.01.2021 (DHBVNL) sought a few clarification / additional information from the petitioners, which were provided by the Discoms.

#### 2.2 Public Notice

The Discom (UHBVN & DHBVN), as required, issued a Public Notice in two Newspaper i.e. UHBVNL: The Tribune (English) and Dainik Bhaskar (Hindi) dated 04.12.2020 and DHBVNL The Tribune (English) and Dainik Bhaskar (Hindi) dated 31.12.2020 informing the stakeholders / General Public regarding their petition / availability of documents and inviting objections on the same. Additionally, the Commission also issued public notice dated 02.01.2021 in Dainik Jagran (Hindi) and Indian Express (English) inviting objections / suggestions / comments from the stakeholders / general public.

## 2.3 Objections filed by the Interveners & Discoms Reply thereto

In response to the public notice issued by the Discoms and the Commission, objections were received from various stakeholders. The objections and the response of the Discoms thereto is reproduced below:-

#### 2.3.1 Objections filed by Pankaj Bhalotia

#	Particulars	Reply
1.	Since both the Discoms of the State are under profit, so there should be reduction in tariff for FY 2021-2022 from its current level, whereas DHBVN and UHBVN both through their respective petitions have pleaded to continue with the current levels of Tariff to meet the expenses. Not sure why and if they can explain it in true spirit of reply.	In this regard, it is submitted that the True Up FY 2019-20 has been submitted based on the audited accounts while APR & ARR have been projected as per MYT Regulation, 2019. Discoms have requested to the Commission vide petition HERC/PRO-77 of 2020 & HERC/PRO-78 of 2020 to continue with the current levels of tariff in order to meet the revenue requirement for the financial year 2021-22. Further, the basis of projections has already been submitted to the Commission. On the finalization of audited accounts, the profit or loss shall be passed on in the subsequent year tariff.  Therefore, there is no merit in the contention of the Objector to reduction in tariff.
2.	A separate tariff structure for prepaid electricity consumers and also for consumers taking supply through Independent Feeder: The Commission while deciding tariff for FY	<ul> <li>For the consumers, who opt for prepaid metering, there is a provision of 5% rebate as per HERC prepaid metering Regulation, 2014.</li> <li>The consumers on Independent feeder are being</li> </ul>

Chapter 2 Page 34 of 233

2017-18 in Case No. HERC/PRO-39 of 2016 & HERC/PRO-40 of 2016, did acknowledged my suggestions/ objections to have separate tariff structure for prepaid meter and for Independent Feeder, but so far nothing has been done in this regard neither by the Commission nor by the Discom of the State to have separate tariff structure for prepaid meter and for Independent Feeder. Not sure why the Commission and Discom have not done anything so far in this respect. What is the use of asking comments, suggestions if neither Commission nor Discom is going to do anything in that respect and that too after acknowledging it?

Is Commission or Discom going to introduce separate tariff structure this time for Independent Feeder and Prepaid Meter or all in vain and nothing can be done in that respect? This should not result into wastage of time and money in giving comments, suggestions because everything is already predecided? Hoping that comments, suggestions, objections are not asked from general public only for the sake of asking it? A separate tariff structure for prepaid electricity consumers and also for consumers taking supply through Independent Feeder: Commission while deciding tariff for FY 2017-18 in Case No.HERC/PRO-39 of 2016 & HERC/PRO-40 of 2016, did acknowledged my suggestions/ objections to have separate tariff structure for prepaid meter and for Independent Feeder, but so far nothing has been done in this regard neither by the Commission nor by the Discom of the State to have separate tariff structure for prepaid meter and for Independent Feeder. Not sure why the Commission and Discom have not done anything so far in this respect. What is the use of asking comments, suggestions if neither Commission nor Discom is going to do anything in that respect and that too after acknowledging it?

Is Commission or Discom going to introduce separate tariff structure this time for Independent Feeder and Prepaid Meter or all in vain and nothing can be done in that respect? This should not result into wastage of time and money in giving comments, suggestions because everything is already predecided? Hoping that comments, suggestions, objections are not asked from general public only for the sake of asking it?

3. No provisions/allowance in tariff for line and distribution loss for Independent Feeder consumer: When there is only one consumer connected to an Independent feeder, then meter reading and billing is done as per units recorded at meter installed at power house and not as per units recorded at meter installed at consumer place. However when there is more than one consumer connected

charged respective tariff relevant to their applicable consumer category & voltage level for use of electricity. So there is no need of separate tariff for Independent feeder.

The facility of Independent feeder is a special facility which is being provided by the Discoms on consumer request. So, the relevant feeder losses should be borne by the specific consumer only as it is being provided as a special facility and the losses of these consumers may not be passed on to the other consumers of the state.

Chapter 2 Page 35 of 233

to an Independent meter, meter reading and billing is done as per units recorded at consumer place. So is there no discrimination in not allowing distribution loss when there is only one consumer connected to an Independent feeder. Why losses for line transmission and distribution need to be bear by the consumer when the same has to be bear by the Discom. There should be a % rebate/relief in units to cover distribution/transmission loss when there is only one consumer connected to an Independent Feeder?

Clear mention of various Provisions, Rules and Regulations of applicability of Municipal Tax and Electricity Duty: The Commission while announcing tariff for FY 2021-2022, in the footnotes of tariff order, should also mention provisions, rules and regulations of applicability of Municipal Tax and Electricity Duty on various consumers. The Municipal Tax and Electricity Duty may not be applicable and payable by all consumers in all cases and situation. Therefore to not to get charge excessively in the name of Municipal Tax and Electricity Duty when not applicable and payable, I would suggest that the Commission should also describe clearly in tariff structure, the rules and regulations of applicability of Municipal Tax and Electricity Duty and in what all -cases both are payable as well as not payable.

It is submitted that the tariff charged to consumers in addition to other charges are levied as per the direction given by the Commission under Note no. 8 and 15 specified in Schedule of tariff and charges of Tariff Order for FY 2020-21. The relevant part of the above specified note is reproduced as under:

"Notes:

8. The above tariff does not include Electricity Duty, Municipal Tax and FSA.

15. In addition to the tariff as above, the Discoms shall levy FSA as per HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2012."

Therefore in light of the above, Municipal Tax and Electricity Duty are charged in addition to the tariff on those consumers having particular amount of energy consumption in a particular billing cycle.

The DISCOMs are charging Municipal Tax and Electricity Duty from the consumers as per the guidelines issued by the various competent authorities of the State Govt. and subsequently, the collected Tax/Duty is transferred to the concerned authority.

Discoms are liable to pay compensation as 5 per the provisions of the Harvana Electricity Regulatory Commission (Standards Performance of Distribution Licensee and Determination Compensation) of Regulations, 2020: The foot-note of the tariff order should clearly say that Discoms of the state are liable to pay compensation to its consumer in accordance of the provisions of Haryana Electricity Regulatory Commission (Standards of Performance of Distribution Licensee and Determination of Compensation) Regulations, 2020. I believe, currently, due to lack of awareness neither the consumer demands nor the Discoms pays any compensation/penalty to its consumers.

The Standards of Performance regulation is available in public domain and same may not be intermingled with tariff. So it is requested that same may not be specified in the notes related to tariff.

6. Applicability of fuel Surcharge Adjustments (FSA) from first month itself of a financial year: Will Fuel Surcharge Adjustments (FSA) be payable from first month itself of new financial year starting from April 2021 onwards? When Commission approves tariff for a financial year, does that tariff is not determined and approved by the commission on the basis of right projection of cost and revenue, which results into FSA become payable from first month itself of a financial

As per HERC MYT Regulations, 2019 the distribution licensees shall recover FSA amount on account of increase in fuel and power purchase costs from the consumers on a quarterly basis, so as to ensure that FSA accrues in a quarter is recovered in the following quarter without going through the regulatory process. However, in past, whenever the FSA amount is more, the recovery spills over a period of 3-4 years (to reduce the sudden burden on the consumers) and when the FSA was levied after the end of the year, HERC had allowed the recovery of FSA again over a span of 3-4 years; In contrast, the DISCOMs paid the

Chapter 2 Page 36 of 233

year? It is understandable that projection may go wrong at later stage of a financial year due to various unforeseen circumstances but not at first month itself of a financial year and also not at the time of approving tariff of a financial year.

entire cost of power purchase on a regular basis during the vear itself.

Thus, in continuation to above, the charging of FSA from first month itself is not accounting for that current financial year but is on the account of spill-over of FSA amount of previous unrecovered amount.

7. Can Fuel Surcharge Adjustments (FSA) be merged with tariff and not to be payable separately: I would suggest Commission to consider this proposal of merging and combining of FSA with tariff and approve tariff accordingly for FY 2021-22, with clearly mentioning in tariff order that no FSA is applicable and payable for tariff mentioned in tariff order. This I think will address many of ongoing concern and issue related to FSA.

FSA charges are on account of variation in fuel prices, which is quite difficult to be projected at the start of a financial year. Further, variation in fuel charges are passed on to the Discoms by the power generators and in line with the same and as per HERC MYT Regulations, 2019, Discoms apply Fuel Surcharge Adjustment as a pass- through cost to the consumer on a quarterly basis.

As it is not possible to predict the FSA charges while determining the tariff for a financial year, so FSA may not be merged with the tariff.

Furthermore, the separate head of FSA make the tariff more transparent for the consumers.

- Some of the term/sentences used in previous years tariff structure of Bulk Supply Domestic has not been defined anywhere, neither by the Commission nor by the Discoms in the tariff order or in any of the Regulation in
  - vogue. There is nowhere define the process how the number of flats/dwelling units will be calculated and declared and what all
- It is submitted that the Nigam is levying the tariff to the Bulk Supply Domestic consumer in line to the Haryana Electricity Regulatory Commission (Single Point Supply to Employers' Colonies, Group Housing Societies and Residential or Commercial cum Residential Complexes of Developers) Regulations, 2013, and as per the applicable tariff as approved by the Commission from time to time.
- includes in a definition of a flat and a dwelling unit (DU) for a housing society so that correct tariff structure of bulk supply domestic is charge. Neither, the same has been defined in the Single Point Supply Regulations 2020 nor in the bulk supply domestic tariff structure of any year.
- The definition of dwelling unit/flat may be dealt in the relevant Regulation i.e. Single Point Supply Regulation. Further, the objectors may seek the clarification on issues from Commission through a separate Petition.
- How will the Distribution Licensees of the state (DHBVN/UHBVN) come to know that how many flats/dwelling unit is there in a housing society for correct charge of bulk supply domestic tariff structure?
- Whose responsibility is to have correct number of flats/dwelling maintained/declared for correct charge of tariff under bulk supply domestic tariff
- The definition of a flat/dwelling unit is no-where define, as to what it means and what all it includes:
  - ls under-construction of I. flat/dwelling unit falls under definition of a flat/dwelling unit, or only a complete and construed flat/dwelling unit falls under definition of a flat/dwelling unit?
  - Is it require to have possession of a flat/dwelling unit to falls under the definition of a flat/dwelling unit?
  - III. Is it require to have occupancy of a flat/dwelling unit to falls under the definition of a flat/dwelling unit?
  - IV. Is it once the Occupation Certificate (OC) issued by a Competent Authority for

Chapter 2 Page 37 of 233 particular Housing Tower, all the flats/dwelling units under that housing tower falls under the definition of a flat/dwelling unit? Whether occupied, not occupied, vacant has no relevance here. Once Occupation Certificate (OC) issued and received, all the flat/dwelling units mentioned over there in such Occupation Certificate (OC) falls under definition a flat/dwelling units for the purpose of bulk supply domestic tariff.

- Does only flat/apartment/dwelling unit falls under definition of а flat/dwelling/residential unit or does it mean and includes Economic Weaker section flat (EWS), Shop, Club, School, RWA office etc also in the definition of a flat/dwelling/residential units for the purpose of bulk supply domestic tariff and how their numbers will be calculated for the purpose of total number of flats/dwelling (DU)/residential units?
- VI. How the numbers of flats, dwelling units, apartments, EWS, School, Club, Shops, RWA office etc will get calculated for the purpose of correct charge of tariff in bulk supply domestic category is also not defined anywhere in the Single Point Supply Regulations, 2020 and in the Bulk Supply Domestic Tariff structure?
- The Commission while approving tariff structure for F y 2020-21 and in all earlier years in Notes of the tariff structure had always said that Total-consumption under bulk supply (domestic) category shall be charged at a single tariff depending upon the average consumption/flat/residential unit for that month" however, the Commission has not defined the method and process how such average consumption / flat / resident / dwelling unit shall be worked out and what all includes in the definition of a flat / residential unit / dwelling unit.
- No Subsidy in Tariff under Bulk Supply Domestic to Resident of a Group Housing Society under Single Point Supply.
  - a) Is a Resident of a group housing society under bulk supply domestic is not a domestic category consumer for all purposes and whatever/whichever subsidy, discount, rebate etc as available to a domestic supply (DS)

As per Section 65 of the Electricity Act, 2003, if the State Govt. gives a rebate or exemption to category/categories of consumer on the tariff determined by the Commission, subsidy to that extent has to be given by the State Government to the Discom. The subsidy announced by the State Govt. is being provided to the consumers under Domestic Category and upto a particulars consumption of units.

Chapter 2 Page 38 of 233

- category consumer is also same way available to a Resident of a Group Housing Society having Single Point Supply.
- b) If point (a) is correct, then why the subsidy in tariff when announced by the Chief Minister of the Haryana on 11.09.2018 has not been passed on to me yet as a Resident of a Group Housing Society having supply on Single Point Bulk Supply Domestic. Has Commission or Discoms of the State made any provision, rules, regulation in same regard that how such subsidy will flow to a Resident of a Group Housing Society under Single point Supply so that I as a resident of a roup Housing Society could receive such Subsidy? Why should I be deprived off to not to receive such subsidy?
- c) By not passing such subsidy to me as a resident of Group Housing Society, is there no discrimination to me and I have been deprived off to receive such subsidy though entitled to receive and to that extent the Single Point Supply is unable to provide any relief or guidance.
- d) I had filed a petition in past in same respect HERC/PRO 48 of 2018, but all in vain whereas everyone including Commission and Discom misunderstood the Petition and gave impugned decision.

The Tariff for Bulk Supply Domestic is being charged as per HERC Tariff Order for the relevant year.

- 10. No Corresponding Reduction in Tariff for Bulk Supply Domestic when Domestic Supply (DS) supply category tariff was reduced by the Commission during last year Tariff announcement on June 01, 2020
  - a) While announcing tariff last year on June 1, 2020 the Commission reduced the tariff for a Domestic Supply (DS) Category consumer under Category- I and II, but there was no corresponding reduction made in tariff for bulk supply domestic category. The Tariff for bulk supply domestic category kept at same structure as it was in previous year.
  - By not reducing the tariff for bulk b) supply domestic category, the residents of a -Group Housing Society were not benefited for the reduction in Tariff made under Domestic Supply (DS) Category. Basically, the reduction in Tariff made under Domestic Supply (DS) Category under I and II has resulted into lower tariff for individual consumption inside the flat, but at the same time, it has resulted into increase in the share in common area electricity (CAE). So Net Net there is no impact on the pocket of a Resident of Group Housing Society under Single Point Supply by

Chapter 2 Page 39 of 233

reducing the Tariff for DS Category, because such reduction increases the share in common area electricity (CAE) and thus no benefit for reduction in tariff for domestic supply category if there is corresponding reduction in Tariff for Bulk Supply Domestic category. See the example below to understand it better

Let's say the monthly electricity bill of the housing society for July month was Rs. 10 Lakhs and out of that Rs. 10 lakhs bill, 50% (Rs. 5 Lakhs was for individual consumption inside the flat on which DS tariff was applicable) and balance 50% was for common area use. Now, after the Tariff Order dated: June 01, 2020 and due to reduced DS Category Tariff the share of individual consumption has got reduced to 40% from earlier 50% and consequently the common area share got increased to 60% from earlier 50%, whereas common area share should have remained same to 50%. The Question is why reduction in DS category Tariff would result into increase in share of common area electricity for a resident of a group housing society?

- c) So how reduction in Tariff for individual consumption will result into increase in share of Common Area Electricity (CAE) for a resident of a group housing society. To that extent isn't it a hardship on a resident of a group housing society having Single Point Supply and which the Commission would like to correct while announcing tariff for FY 2021-22. Looks like a miss by the Commission last year, which it would like not to repeat again this year.
- d) See copy of notice issued by RWA of housing society as Annexure -1, to elaborate more on the issue that how a reduction in DS category tariff by Tariff order dated: June 1, 2020 has resulted into increase in share of common area electricity and accordingly there is overall no change in electricity bill for a Resident. Such Resident will continue to discharge same amount as it was discharging before reduction in Tariff in DS category. The reduction in Tariff under DS category has infact not provided any relief and reduction on the pocket of a resident of a Group Housing Society which is clearly evident from the Notice of RWA as attached and I am sure both Commission and Discom would agree to it, so isn't it un-justify and requires correction by the Commission while announcing Tariff this year for Fy 2021-22 by making reduction in Tariff for bulk supply domestic so that a resident of a

Chapter 2 Page 40 of 233

group housing society can also get benefit of reduction in tariff structure for domestic supply (DS) category.

# 11. Rationality in levy of minimum month charge (MMC) by either reducing it from current structure or making it to NIL.

On Page 274 of the Tariff Order dated: 01-June-2020 the Commission talked about making rationality of MMC under Domestic Supply (DS) Tariff and accordingly said that "The Commission observes that a lot of DS consumers fall in Category — I of the existing schedule of tariff. Considering the fact that a high percentage of such consumers are being billed at the MMC rate i.e. Rs. 115 per month of the connected load up to 2 KW and Rs. 70 / KW per month above 2 KW. It is felt that MMC rates trigger in if the consumption of a consumer falls below the threshold level i.e about 93 Units per month or even if the consumption is nil. In effect the MMC indirectly encourages wasteful consumption. Keeping these factors in mind the Commission, in order to make attractive billing on the basis of tariff instead of MMC and also to provide some relief to the DS Consumers at the margin given the impact of COVID - 19 Pandemic and its impact on employment, income and earnings of the small DS Consumers, has considered it appropriate to revise the tariff applicable for such consumers."

- i. However, in the Tariff structure that was issued for Domestic Supply (DS) Categories in the Tariff Order dated: June 1, 2020, there was no reduction or removal of MMC from previous year tariff structure. The MMC was kept at same level and structure. Was there any inadvertent errors that had occurred with respect to not reducing or not removing MMC while issuing the tariff order dated: June 1, 2020 and now the Commission would like to correct it in the Tariff Order for FY 2021-2022.
- How keeping the MMC at same rate and structure as previous tariff structure, justify the Commission observations and direction on Page 274 that
  - a. In effect the MMC indirectly encourages wasteful consumption.
  - b. in order to make attractive billing on the basis of tariff instead of MMC

Since the commission has reduced the domestic supply tariff but kept MMC at same rate and structure, so will there not be no increase in wasteful consumption due to MMC kept at same rate and structure, as noted and observed by the Commission on Page 274.

iii. With the use and consumption of Solar energy getting picked up, and more and more people moving towards it, and It is submitted that the Discoms are charging Minimum Monthly Charge (MMC) to Domestic Supply Category consumers as per tariff order notified dated 1.06.2020. As per the Tariff Order, Minimum Monthly Charges to domestic supply consumers having up to 100 units per month is Rs. 115 up to 2kW connections and Rs. 70 per kW for connection having connected load above 2kW. Whereas the domestic consumers who consume more than 100 units are being charged with the rate of Rs. 125 up to 2kW connected load and Rs. 75 per kW for consumers having connected load above 2 kW.

In addition, as per the Order dated 02.07.2001 of HERC/PRO-1 of 2001, the Commission has already dealt with the justification or reasonableness of the MMC on consumers. The Commission had quoted the Supreme Court of India on various cases and had concluded that the MMC are fully justified and reasonable and very much a part of tariff. The excerpts from that order are reproduced herewith:

20

20. .....

Again in Andhra Steel Corporation Ltd. & others V/s A.P.S.E.B. and other (1991) 3 SCC 263 while appreciating the genesis of prescription of minimum charges, the Supreme Court of India held that the purpose of prescribing minimum charges is to ensure that no undue loss is caused to the Electricity Board because the absence of minimum charges is likely to create a tendency in a prospective consumer to have connection for inflated requirement and having agreed to meet such requirement the Electricity Board would be under obligation to maintain the supply up to that requirement even if no or very little energy was consumed

.....

34. The Commission would, therefore, like to clarify the concept of MMC and its purpose. The monthly minimum charges are levied from consumers to recover the fixed cost component of two-part tariff. This basically consists of reasonable return on capital expenditure and standing charges such as Operation & Maintenance cost, salaries & wages, Administrative & General expenses etc. which are fixed in nature and are recoverable from consumers by the Licensee to maintain and keep the system in readiness to meet the demand of the consumers at any point of time. The variable charge, second part of the two part tariff, relates to cost of energy and technical losses i.e. energy lost in the Transmission and Distribution (T&D) network during the transportation of energy up to the consumer's premises."

Further, in case, when consumption of electricity in any particular billing period is recorded for the domestic category consumer, the other charges are levied as per the directions given by the Commission in Tariff Order dated 1.6.2020 which are reproduced as under:

"8. The above tariff does not include Electricity Duty, Municipal Tax and FSA.

15. In addition to the tariff as above, the Discoms shall levy FSA as per HERC (Terms and Conditions for Determination of Tariff for Generation,

Chapter 2 Page 41 of 233

even the Commission and State Government encouraging people to move and use Solar energy for the need of electricity which is not only economical but environment friendly also, so having Minimum monthly charge (MMC) actually discourages people to move towards Solar energy specifically for a small consumption category consumers.

Why I say so that because MMC becomes a fixed cost for a small consumption category consumer who wish to move to Solar energy alongwith continuing with an electricity connection, so even if I wish to move to Solar energy, I do not find moving to solar energy economical because of two reasons as below

- I still need to have an electricity connection from Discom for my need of electricity along with solar energy.
- ii. Since I have an electricity connection from Discom, I will continue to pay MMC. So why will I move to Solar energy and make a huge investment there, if I have to continue to pay MMC to Discom, which becomes a fixed cost to me along with making investment to solar energy.
- iv. On MMC, I had filed a petition (case number HERC/PRO 03 of 2018) earlier on the similar grounds as observed and noted by the Commission in the Order dated: 01-June-2020 on Page 274, but that petition had gone in vain wherein everyone had misunderstood it including the Commission.
- v. It is clear and evident now that, there was a clear case of miss and apparent mistake and error committed by the Commission while announcing tariff on June 01, 2020 by not reducing or eliminating MMC from its current level and the same mistake or error Commission would like to repeat again this year and will surely rationalize MMC either by reducing it and eliminating it so that it make sense. I strongly believe that Commission would not like to disappoint me in this respect.

# 12. Applicability of minimum month charge (MMC) and when applicable how it should be calculated and charged:

The tariff order should specify the methodology of charging minimum month charge (MMC) from a domestic category consumer. Currently in the absence of it, there is ambiguity in charging MMC as to in what all condition and situation it is applicable and when applicable, what all it includes?

The Commission should mention in the tariff order that when minimum month charge (MMC) is applicable in any case, only minimum month charge (MMC) is payable and no charges such as FSA, Electricity Duty

Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2012."

Therefore, in light of the above, charges like FSA, Municipal Tax and Electricity Duty will be charged additional to the MMC charges on domestic category consumers having particular amount of energy consumption in any billing cycle.

Chapter 2 Page 42 of 233

Ī	and Municipal Tax is payable. Consumptions									
	of units hav	ve no rel	evance v	vhen m	inimum					
	month chai									
case. I have mentioned a situation and examples										
					below to clarify in the tariff order by the Commission that when minimum monthly					
	charge (MM									
	correct one		-	-						
	monthly ch									
	example -2,	or examp	le — 3, o	r examp	le — 4?					
	Units									
	Consumptio	100 units	in a month							
-	n:	71/14/								
-	'Load	7KW	unit upto 50		360.00					
	Tariff		unii upio 50 Rs. 4.50/u		300.00					
		above 50								
ľ	FSA		unit upto 50	)	37.00					
			Rs. 0.37/u							
		above 50	units							
	Municipal 0.05/unit 5.00									
ļ										
	Electricity 0-101 unit 10.0				10.00					
-	Duty [Total Bill				412.00					
ŀ	MMC	Dc 115 :	ipto 2 kw ai		580.00					
	IVIIVIC	Rs. 70 ab		iu	300.00					
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l	coming out									
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	consumption	n or a	month	wnen i	VIIVIC IS					
Ļ	applicable:		La a		1-0					
-	Tariff	E-1	E-2	E-3	E-4 360.00					
ŀ	FSA	37.00			37.00					
ŀ	Municipal									
	Tax	5.00	5.00		5.00					
ļ	Electricity									
Total (A) 52.00 15.00 412.00										
	MMC (B)	580.00	580.00	580.00						
	Grand Total	632.00	595.00	580.00	412.00					
	(A+B)									

# **Commission's Observation:**

The Commission, has taken note of the submissions of the intervener and Discom's reply thereto. The objections pertaining to FSA, MT, ED and rebate for prepaid consumers as well as single point consumers are not being dealt with here. The remaining observations shall be kept in view while determining the present petition.

# 2.3.2 Comments by Faridabad Industries Association.

#	Particulars	Reply				
1.	Distribution Losses	It is submitted that COVID-19 pandemic has also				
	At 4.5.5 of the petition, for FY 2021-22, DHBVNL	eroded the significant amount of liquidity in most of				
	has considered distribution loss of 16% and AT&C	the sectors. This situation has resulted in liquidity crisis				
	loss of 16.84%, which is not acceptable.	for consumers, which will be reflected in the				
	All the principals of tariff fixation as laid down in	performance of the Petitioner in form drop in				
	MYT tariff regulations 2019 shall be applicable for	collection efficiency and increase in defaulting amount.				
	the projection and determination of ARR for the	In such a catastrophe, it has been solicited to the				
	FY 2021-22 also. In its MYT Order dated 1 June	Commission that the collection efficiency target at the				
	2020, the commission had observed the following:	level of 99% may be allowed for the FY 2021-22.				

Chapter 2 Page 43 of 233

"c) FY 2020-21 The Commission has considered the submissions of UHBVN and DHBVN in their petitions filed for True up for FY 2018-19, Revised Aggregate Revenue Requirement of 2019-20 & proposed Aggregate Revenue Requirement for FY 2020-21 and after analyzing them observes that the AT&C loss target of 18.91% and 15.03% for FY 2020-21 proposed by UHBVN and DHBVN respectively is on lower side. Under UDAY scheme Haryana DISCOMs were required to reduce AT&C losses to 15.00% up to FY 2018-19 to utilize the grant of GOI but only DHBVN could achieve the target."

Further regarding collection efficiency, commission has set the target of 99.5 %collection efficiency for the year 2021-22 and also made the following observations in the MYT order:

"The Commission, in its Tariff Order for FY 2019-20 dated 07/03/2019 had considered the Collection Efficiency norms as 99% for FY 2019-20. The norms for Collection Efficiency for the distribution licensee(s) shall be 99.50% for the Control Period form FY 2020-21 to FY 2024-25 as per Regulation 57.2 of the HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019. It has been specified in Regulation 12 of HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2012that any over achievement or under achievement in respect of Collection Efficiency shall be subject to incentive and penalty framework."

The Commission, must therefore, set justifiable targets for AT&C Loss, distribution loss and collection efficiency in line with the MYT Tariff regulations 2019 and its own MYT order dated 1 June 2020.

Commission is therefore, requested to approve the energy balance considering better targets for AT&C Losses, distribution losses and collection efficiency which in any case cannot be less than the targets given in MYT Tariff order dated june 2020.

The assumptions made by DHBVN against these controllable parameters must therefore, be rejected by the Commission and should not form basis for the projection of ARR for FY 2021-22.

# 2. Employee Expenses

The regulation 57.4 of MYT regulations 2019 clearly stipulate the following wrt the treatment of O & M and employee expenses:

"The O&M expenses for the nth year of the control period shall be approved based on the formula given below. O&Mn = (R&Mn + EMPn + A&Gn)\* (1-Xn) + Terminal Liabilities Where, • R&Mn - Repair and Maintenance Costs of the Distribution Licensee(s) for the nth year; • EMPn - Employee Costs of the Distribution Licensee(s) for the nth year excluding terminal liabilities; • A&Gn -

Also as per the recommendation of the P. Abraham Committee Report and R-APDRP Guidelines issued by Ministry of Power, regarding fixation of AT&C loss target for Distribution Licenses, the target loss reduction of 2% per year should be kept for the Distribution Licensee having losses within the range of 20% - 30% and the target of 1% loss reduction per year, should be kept for the licensee having AT&C losses level less than 20% loss. The relevant extract of the Report is reproduced as under: -

#### "...AT&C Loss Reduction Targets

The Task Force examined the targets set for AT &C losses reduction and after taking into consideration experience of the Utilities felt that the targets should be recast in a manner that they are realistic and achievable based on the present level of AT&C losses in each State. Accordingly, the Task Force recommends the following targets depending on their present level of AT&C losses:

Utilities having AT&C losses above 40%: Reduction by 4% per year

Utilities having AT&C losses between 30 & 40%: Reduction by 3% per year.

Utilities having AT&C losses between 20 & 30%: Reduction by 2% per year

Utilities having AT&C losses below 20%: Reduction by 1% per year..."

Accordingly, the AT&C losses of 16.84%, Distribution losses of 16.00% and collection efficiency 99% are being solicited for the approval of the Commission for the FY 2021-22.

It is submitted that as per MYT Regulation, 2019, the escalation factor of 4% shall be applicable to the actual audited expenses of FY 2018-19 for the financial year preceding the base year which is FY 2020-21. Further, the escalator factor has to be implemented at the value determined above. The same methodology has been followed in MYT Petition. Now, for ARR of FY 2021-22 escalation factor of 6.09% has been determined as per MYT Regulation and same has been applied on the revised estimates of FY 2020-21.

The relevant clause of MYT Regulation, 2019 is as follows:

Chapter 2 Page 44 of 233

Administrative and General Costs of the Distribution Licensee(s) for the nth year; The above components shall be computed in the following manner. (a) R&Mn= K \* GFA \*INDXn/ INDXn-1 Where, • 'K' is a constant (expressed in %) governing the relationship between O&M costs and Gross Fixed Assets (GFA) for the nth year. The value of K will be 1.65% for DHBVN and UHBVN respecttively for the entire control period; • 'GFA'is the average value of the gross fixed asset of the nth year. • 'INDXn 'means the inflation factor for the nth year as defined herein after. (b) EMPn(excluding terminal liabilities) + A&Gn= (EMPn-1 + A&Gn1)\*(INDXn/ INDXn-1) Where, • INDXn - Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Page 103 of 128 Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under: • INDXn= 0.55\*CPIn +0.45\*WPIn. Note 1: For the purpose of estimation, the same INDXn value shall be used for all years of the control period. However, the Commission shall consider the actual values of the INDXn at the end of each year during the annual performance review exercise and true-up the employee cost and A&G expenses on account of this variation. Note 2: Any variation in employee cost and A&G cost on account of reasons beyond variation in INDXn shall be subject to the incentive and penalty framework specified in Regulation 12."

In table 48 of the tariff petition for FY 2021-22, DHBVNL has projected a figure of Rs 1528.45 Cr for the FY 2021-22 after deducting expenses capitalized. They have escalated the employee expenses for 2020-21 by indexation factor of 6.09% for arriving at the employee expenses for 2021-22.

The regulations clearly state that the actual audited expenses for the financial year preceding the base year, subject to prudence check, shall be escalated at the escalation factor of 4% to arrive at the Employee Costs and Administrative and General Costs for the base year of the control period.

Commission is requested to approve the employee expenses for 2021-22 strictly as per the base year after applying the prudent checks and the corresponding escalation and inflation in line with the provisions laid down in Tariff regulations 2019.

- "(b) EMPn(excluding terminal liabilities) + A&Gn= (EMPn-1 + A&Gn1)\*(INDXn/INDXn-1) Where,
- INDXn Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under:
- INDXn= 0.55\*CPIn +0.45\*WPIn."

Therefore, it is requested to Commission to kindly allow the employee cost as claimed by the Nigam as the same has been projected as per MYT Regulation, 2019.

# 3. R&M Expenses

In table 49 at 4.13.2 of its tariff petition for FY 2021-22, DHBVNL has asked for R&M expenses of Rs 196.17 Cr for 2021-22. Further it is observed that actual R & M expenses of DHBVNL as per its true up petition for 2019-20 are low at Rs 122.34 cr against the approved figure of Rs 165.34 cr as per the tariff order dated 7 MARCH 2019.

Historically they have been spending much less on R and M as can be seen from the historical figures of the petitioner. The commission is therefore,

- It is submitted that R&M expenses has been determined as per clause 57.4 (a) of MYT Regulation 2019. The Clause 57.4 (a) is quoted below:
- (a) R&Mn= K \* GFA \*INDXn/ INDXn-1 Where.
- 'K' is a constant (expressed in %) governing the relationship between O&M costs and Gross Fixed Assets (GFA) for the nth year. The value of K will be 1.65% for DHBVN and UHBVN respectively for the entire control period;
- 'GFA'is the average value of the gross fixed asset of

Chapter 2 Page 45 of 233

requested to re estimate and re approve the R & M expenses for FY 2020-21 and FY 2021-22 after taking into account the actual R & M expenses of FY 2019-20 as given in the true up petition.

the nth year.

• 'INDXn'means the inflation factor for the nth year as defined herein after.

Therefore, it is requested to Commission to approve R&M expenses as submitted in the Petition.

#### 4. A & G expenses

As given in Table 50 of the ARR petition of DHBVN, it has proposed A & G expenses of Rs 132.71 Cr. for FY 2021-22 after applying a indexation factor of 6.09 % on the A & G expenses for 2020-21.

However, as per our submissions on true up petition for FY 2019-20, Commission needs to approve only Rs 81.69 cr (after capitalization) against Rs 117.92 cr as the A & G expenses for FY 2019-20, which was approved by the Commission in its tariff order dated 7 March 2019. The estimated expenses for 2020-21 and FY 2021-22 shall be calculated taking this Rs 81.69 cr as the base expenses for 2019-20 after applying inflation factor and escalation factor in line with MYT Regulations 2019.

The Commission is therefore, requested not to allow Rs 132.71 cr as the A & G expenses for 2021-22 and project these expenses based on the figures which are allowed in the true up for 2019-20 which is substantially low.

It is submitted that A&G expenses has been determined as per clause 57.4 (b) of MYT Regulation 2019. The Clause 57.4 (a) is quoted below:

The relevant clause of MYT Regulation, 2019 is as follows:

"(b) EMPn(excluding terminal liabilities) + A&Gn= (EMPn-1 + A&Gn1)\*(INDXn/INDXn-1) Where,

- INDXn Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under:
- INDXn= 0.55\*CPIn +0.45\*WPIn."

Therefore, it is requested to the Commission to kindly allow the employee cost as claimed by the Nigam as the same has been projected as per MYT Regulation, 2019.

# 5. Non-Tariff Income

As per 4.22, the DHBVNL has requested for Non Tariff Income of Rs 307.66 cr for FY 2021-22, which is at the same level as for FY 2020-21.It has not included income due to late payment surcharge. As Late payment surcharge is also legitimate NTI, taking it into account, Total NTI for FY 2020-21 and 2021-22 shall be much more than the estimates of DHBVN as given above.

Even in the true up petition at 2.20.4, DHBVN has submitted a non tariff income of Rs 351.76 Cr for the year FY 2019-20 after deducting delayed payment surcharge received from the consumers from the NTI to arrive at the net NTI. This practice is not acceptable as per the Commission's position in its previous tariff orders and the prevailing regulatory regime.

Commission is therefore, requested to re estimate the non tariff income figures of DHBVN for FY 2020-21 and FY 2021-22 based on above principles.

The Nigam has not considered the delayed payment surcharge for FY 2019-20 as part of non-tariff income. As the delayed payment surcharge are the charges collected against the receivables which were not timely received from the consumers. Due to delay in receiving of revenue, the Nigam has to arrange additional working capital to carry out its operation work. Hence, the revenue received from delayed payment surcharges is not an income to the Discoms, rather it is an carrying cost recovered from consumers to repay the interest on the increased portion of working capital which has occurred due to delay in receiving of revenue.

## 6. Power purchase costs

As per table 41 of the petition, DHBVNL has considered 16 % distribution loss and a collection efficiency of 99.0% for arriving at the power purchase quantum and cost for FY 2021-22. Table 45 on energy balance for DHBVN Indicates that it has taken into consideration power purchase quantum of 34437.56 MUs at a power purchase cost of Rs 14116.08 cr for the year FY 2021-22. At &c Loss has been taken at 16.84% for FY 2021-22. Kind attention of Commission in invited to our submissions at item 1 of our comments, where the quote from Commission's order dated 1 June 2020 is elaborated and is reproduced here for the sake of reference. "c) FY 2020-21 The Commission has considered the

It is submitted that COVID-19 pandemic has also eroded the significant amount of liquidity in most of the sectors. This situation has resulted in liquidity crisis for consumers, which will be reflected in the performance of the Petitioner in form drop in collection efficiency and increase in defaulting amount. In such a catastrophe, it has been solicited to the Commission that the collection efficiency target at the level of 99% may be allowed for the FY 2021-22.

Chapter 2 Page 46 of 233

submissions of UHBVN and DHBVN in their petitions filed for True up for FY 2018-19, Revised Aggregate Revenue Requirement of 2019-20 & proposed Aggregate Revenue Requirement for FY 2020-21 and after analysing them observes that the AT&C loss target of 18.91% and 15.03% for FY 2020-21 proposed by UHBVN and DHBVN respectively is on lower side. Under UDAY scheme Haryana DISCOMs were required to reduce AT&C losses to 15.00% up to FY 2018-19 to utilise the grant of GOI but only DHBVN could achieve the target."

Even the target of AT & C Loss of 15.03 % was found on lower side for the FY 2020-21 and going forward expecting a further reduction of 1% in the following year, target of 16.84 % AT &C loss for FY 2021-22 is totally beyond logic and contravening the letter and spirit of laid down regulations. Even a collection efficiency of 99.5 % has been stipulated in the MYT Regulations 2019 against the 99.0 % as proposed by the DHBVN for FY 2021-22 which should not be accepted by the commission.

In order to incentivize performance, commission must consider lesser targets for distribution loss and AT and C Loss reduction for FY 2021-22 and that should be taken into account to consider the power purchase quantum and its associated cost for the FY 2021-22.

7. Supply Voltage wise and consumer category wise distribution and AT&C losses:

As stipulated under regulation 57.1 (e) of HERC regulations 2012, the DISCOMs are required to submit the information on these losses to arrive at wheeling charges, open access charges and other important parameters like collection efficiency and AT&C losses category wise. The abstract from the tariff regulations 2019 are placed here:

"(e) In the absence of requisite data in respect of such energy audit / sample surveys / sample DT metering/ meter readings of segregated 11kV AP feeders, the Commission shall not accept the claim of the distribution licensee and may proceed to fix the loss levels and the load factor for unmetered agriculture consumption on the basis of the information available with it; The distribution licensee shall furnish within a period of six months from the date of notification of these Regulations, computation of supply voltage - wise and consumer category wise distribution and AT&C losses;"

However, despite repeated directives by the commission and the clear legal provisions stipulated in the regulations, DHBVN has not submitted computation of supply voltage wise and consumer category wise distribution and AT&C losses till date.

DHBVN has again flouted the directions of the Commission by its failure to submit information on supply voltage wise and consumer category wise distribution and AT&C losses. This issue is pending for over 8 years. We request the Commission once again to take a serious view of

DHBVN submits that the information is being furnished from time to time as and when required by the Commission. It is pertinent to mention here that Nigam has submitted actual voltage wise losses for FY 2019-20 with HERC along with additional information sought by HERC on ARR Petition for FY 2021-22. Further in regard to the category wise distribution and AT&C losses, there is no standard methodology to cater such specific requirement of the intervener.

In regard to submission of measure or plan to reduce the inter category cross subsidy, Tariff is being charged to the consumers on the basis of average cost of supply incurred by the Discoms. Efforts are being made to reduce the AT&C losses which eventually mellow down the current level of average cost of supply of the Discoms. Therefore, in view of the above Discoms has proposed to retain the current level of tariff for FY 2021-22.

Chapter 2 Page 47 of 233

the matter including invoking Section 142 of the  $\mbox{\sc F}\Delta$ 

#### 8. Authentication of AP sales

The DHBVN has failed to submit the details of AP Sales time and again despite repeated directives from the commission. Referring to the strong remarks expressed by the commission as given below in its tariff order dated 1June 2020:

"The Commission observes that DHBVN Agriculture sales for FY 2018-19 is 6148.62 MU as per data provided vide its office Memo. No. Ch-44/SE/RA-659 dated 07/02/2020 and 5149.05 MU computed as per Commission's methodology, which reveals a significant difference of 999.57 MU in these two figures appearing to be unrealistic. Therefore, Commission feels that the matter needs to be investigated. The Commission notes with concern that despite issuance of directives to this effect in its previous orders a fact also pointed out by the Intervener, DHBVN did not engage a third party for analysing and authenticating its AP sales data for FY 2017-18. In view of the above, the Commission again

In view of the above, the Commission again directs DHBVN to engage a third party for analysing and authenticating its AP sales of FY 2017-18 and FY 2018-19 and submit its report within 3 months from the date of this order and also to examine the AP sales data meticulously for the FY 2019-20."

Commission must take this serious lapse in to consideration and invoke action under section 142 of the Electricity act.

Nigam submits projections of agriculture category consumer sales has been done as per the commission approved methodology. Further, Nigam has issued LOI to M/s Pranat Engineers Pvt. Ltd. vide Memo No. 84/EA-57/2019 dated 26.11.2020 for AP Sales third party authentication and the same been informed to Commission Vide memo No. Ch. 85/SE/RA-675 dated 02.12.2020, thereafter, Work Order vide Memo No. Ch-86/EA-57/2019 dated 10.12.2020 has been issued to M/s Pranat Engineers Pvt. Ltd.. The Period of completion of work is 3 months from date of issuance of Work Order. The report will be submitted to the Commission on its completion.

# 9. Replacement of defective Meters

The commission has been insisting and giving instructions to the DHBVN for so many years to replace the defective meters and had given the following directive in its order dated 1 June 2020: "The Commission in Order dated. 07/03/2019 had directed the etitioners, "The dead / defective meters shall be replaced within a month. In case the DISCOMs fails to do so the Consumer concerned shall do so. However, in case the consumer fails to replace the dead / defective meter after expiry of one month, the consumer shall be liable to pay twice the normal tariff of the category that the consumer falls in."

DISCOMs in their reply have submitted, "It may be noted that meter replacement is a continuous process and meters keep on getting defective necessitating replacement. Therefore, at any point of time some percentage of defective meters is inevitable.

Further, as per CEA Installation and Operation of Meters Regulations, 2006, the obligation to maintain a correct meter at consumer premises is that of the Licensee. The consumer however may elect to purchase his own meter and, in that case, "the meter purchased by the consumer shall be tested, installed and sealed by the Licensee". In case the meter gets defective, the responsibility to replace the same is again of the Licensee. The consumer cannot be allowed to replace his own defective meter. He can only purchase a new

Nigam has already provided the status of Three phase Single-phase defective meters pending for replacement to the Commission vide Memo No. Ch 83/ SE/ RA-682 dated 22.1.2020. Further, Nigam has been making earnest efforts to replace all electromechanical meters in the system including through various schemes being introduced like Bill Settlement Scheme, MGJG, LRP etc. Pendency in replacement of electromechanical meters is prominent in rural areas primarily due to high public resentment for replacement of electromechanical meters. Presently, work under MGJG Scheme in rural areas covering relocation of meters outside the premises and replacement of defective/electromechanical meters are being carried out in phased manner. More improvement in in replacement of electromechanical meter will be observed once the work under the MGJG will get completed. Further, meter replacement is a regular activity and the same has being done based on the demand of the consumer/at the time when the meter is found defective and during defective period provisional sales has been assessed as per HERC Supply Code.

Chapter 2 Page 48 of 233

meter as per Licensees' specification, get it tested and installed from the licensee as stated above. So, the directive given by the Commission is in not in accordance with the CEA Installation and Operation of Meters Regulations.

The relevant extract from the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 is reproduced as under: -

"15. Meter failure or discrepancies

#### (2) Consumer meters

In case the consumer reports to the licensee about consumer meter readings not commensurate with his consumption of electricity, stoppage of meter, damage to the seal, burning or damage of the meter, the licensee shall take necessary steps as per the procedures given in the Electricity Supply Code of the Appropriate Commission read with the notified conditions of supply of electricity."

In view of the facts mentioned above, the Commission may kindly withdraw the directive." The Commission has considered the reply of DISCOMs and acknowledges the fact that the defective meters are to be replaced as per relevant Regulations in vogue. Further, the Commission is of considered view that that despite issuance of directives almost in each tariff order distribution licensees have not been able to get the meters replacement of defective energy meters as per the norms fixed by the commission. The licensees should ensure availability of energy meters at Nigam's stores, empower its officials and plan its activities suitably in order to achieve the envisaged targets. The Discoms ought not to lose site of Section 55 (1) of the Electricity Act, 2003 i.e. "No licensee shall supply electricity, after the expiry of two years from the appointed date, (emphasis added) except through installation of a correct meter in accordance with the regulations". The reply of the Nigam has always been very vague and open ended. This point has been commented upon by the Commission for the last 10 years. Despite the directive time and again, there are significant no of defective meters in DHBVN.

The Commission should ensure a time bound compliance from the discom as defective meters are a huge burden on the power system and its economics and concerted efforts should be made by the discom to get it replaced in a time bound manner. We request commission to impose heavy penalties on discom for this gross violation time and again.

# 10. Reporting of Circle wise losses

The utilities are required to place on their website the circle wise losses suffered in the respective utilities along with the name (s) and designations(s) of the officers concerned working in the supervisory capacity. Such information should be updated periodically on quarterly basis. The information in respect of total losses incurred in a year should also be made public at the time of filling ARRs for information of the consumers. However, despite repeated directives by the

Nigam submits that circlewise AT&C losses has been uploading on their website on regular basis.

Chapter 2 Page 49 of 233

Commission, utilities have failed to comply with such an important aspect which can go a long way in managing the acute problem of distribution losses. Commission may kindly make a strong note of this for passing necessary instructions to the DHBVN.

11. Non replacement of Electro-mechanical Meters:

Commission in its order dated 1 June 2020 and its earlier orders has been directing to replace the electromechanical meter on 100% basis. The excerpts from the june 2020 order are placed

below:

"The Commission has considered the submissions of the Petitioners and observes that the progress made for replacement of defective meters is considerable lagging in order to achieve the target specified related to replacement of electromechanical meters. Therefore, the Petitioners are again directed to replace all the electro-mechanical meters at least in urban area before filing of next year's ARR / Tariff Petition."

hefore filing of next year's ARR / Tariff Petition."

As can be seen, discom not only flouts the repeated directives of the commission on the issue but also contravenes the legal provisions of tariff regulations and Electricity Act which prohibits use of electromechanical meters. Commission is requested to closely monitor the compliance by the DHBVN and impose heavy penalties in the event of unsatisfactory progress.

The Status of Electromechanical Meter as on 30.11.2020 is given below:

Circle	Urban					
	Single	Three	Total			
	Phase	Phase				
Faridabad	5	0	5			
Palwal	0	0	0			
Gurugram-1	0	0	0			
Gurugram-2	0	0	0			
Narnaul	0	0	0			
Rewari	0	0	0			
Bhiwani	0	0	0			
Hisar	0	0	0			
Fatehabad	51	0	51			
Sirsa	68	0	68			
Jind	375	17	392			
Total	499	17	516			

The replacement of remaining electromechanical meter will be completed at the earliest.

### 12. Smart metering:

Reference is made to the commission's directive in its order dated 1 June 2020 as below:

"The Commission has considered the submissions of the Petitioners and observes that the DISCOMs could not achieve the targets of installation of Smart Meter envisaged in National Tariff Policy 2016 due to constraints explained above. In the public hearing on 12.02.2020, the Licensees submitted that UHBVN and DHBVN have collaborated with EESL for roll out of 10 Lac Smart Meters and M/S L&T has been engaged as System Integrator for execution of project. Approximately 50,000 smart meters have been installed in Karnal and Panchkula. Besides, 50,000 smart meters have been installed in Gurgaon. In addition, purchase process of 20 Lac smart meters on CAPEX Model is in progress.

It is observed that the Hon'ble Minister of Finance, Government of India, while presenting the Budget on February 1, 2020 for the year 2020-2021 in the Parliament, has mentioned at para number 58 of her speech that:

"58. Taking electricity to every household has been a major achievement. However, the distribution sector, particularly the DISCOMs are under financial stress. The Ministry intends to promote "smart" metering. I urge all the States and Union Territories to replace conventional energy meters by prepaid smart meters in the next 3 years. Also, this would give consumers the freedom to choose the supplier and rate as per their requirements. Further measure to reform DISCOMs would be taken.

- It is to inform that installation of smart meter is affected by COVID pandemic. The current progress of smart meter installation is as follows:
  - Smart Meters Procured & installed in DHBVN upto 17.01.2021- 116563 nos.
  - Supply Under Process 25000(1 Phase) & 12000 (3 Phase)
  - Further RFP for Engagement of Agency for Supply, Implementation and Maintenance of additional 2 million Smart Meters and AMI System for consumers of UHBVN and DHBVN is in process which is to be floated by UHBVN on behalf of UHBVN & DHBVN.
- Further, the installation of remaining smart meters is under progress.

Chapter 2 Page 50 of 233

I propose to provide about Rs. 22,000 Crores to power and renewable energy sector in 2020-21" In view of above, Government of India has planned to replace conventional energy meters by prepaid smart meters in the next 3 years and to provide electricity consumers the freedom to choose the supplier and rate as per their wisdom. Accordingly, DISCOMs are directed to expedite the Installation of Smart Meter with associated features and submit year-wise detailed plan of three years to replace conventional energy meters by prepaid smart meters."

Despite the clear provisions and the directions from the Commission as well as from the Govt of India, the progress on smart meters is extremely tardy by the DHBVN. They need to be pulled up by the commission and taken to task for their laxity and a definite time frame must be fixed to complete the job.

## 13. Directive on RPO Obligation

The Commission has been directing the Discom to purchase renewable energy or RECs to meet the RPO targets set for the various periods and also to make up for the shortfall of RPO compliance carried forward for the previous years, on actual basis. In view of Haryana Government's mandate to promote RE energy especially roof top solar and Waste to Energy, Discom was directed to meet the maximum RPO targets from these sources.

However, despite repeated directives from the commission, years after years, the discom is terribly short of purchase of renewable energy and meeting the RPO obligations.

The continuous noncompliance by the discommust be dealt with sternly by the Commission in line with the provisions of the tariff regulations and the latest regulations on RPO.

It has been observed that the directives issued by Commission are not complied by DHBVN time and again. Directives are essential and integral part of the order issued by the Commission and any noncompliance should be viewed seriously by Commission. As there has been repeated flouting of the directives of the Commission by the DHBVN, Commission must take stringent view and may consider taking punitive action against the concerned official by holding him personal guilty for non-compliance and may also consider imposing penalty by invoking section 142 of the electricity act 2003

Discoms/HPPC are endeavouring to meet solar RPO targets through long term power purchase, however, shortfall, if any, in meeting the yearly solar RPO targets, shall be met through purchase of REC or short term power purchase after doing cost benefit analysis vis-àvis available options.

The existing solar power capacity available with Haryana Discoms/HPPC through long term agreements is 125.8 MW and about 302 MW through solar rooftop. Besides this, HPPC has made the following long-term tie-ups/plans for procurement of Solar Power for compliance of mandated RPOs:

S. No.	Name of the	Contracted	Date of	Expected
	firm	Capacity (MW)	Signing of PPA	Commissioning of Project
1.	SECI, ISTS Solar T-I 2000 MW Scheme	100	27.11.2018	31.01.2021
2.	SECI, ISTS Solar T-II 3000 MW Scheme	400	28.05.2019	03.03.2022
3.	SECI (ISTS Hybrid (Wind+Solar) T- I 1200 MW Scheme)	330	11.07.2019	13.08.2021
4.	SECI (ISTS Solar T-IV 1200 MW Scheme)	250	19.03.2020	25.02.2022
5.	NIT-77 (241 MW on long term basis)	241	06.07.2020 (240 MW) 19.06.2020 (1 MW)	2021-22
6.	HPGCL (Solar)	93	Under process	2021-22
7.	PM KUSUM	14.57	01.07.2020 (2 MW) under UHBVN, 8.57 MW on dated 21.08.2020 under DHBVN	2021-22
8.	M/s Amplus Sun Solutions Pvt. Ltd.	50	28.09.2020	Jan, 2021
9.	M/s LR Energy	20	30.10.2020	Mar, 21
10.	M/s Avaada Green HN Project Pvt Ltd	50	20.11.2020	19.08.2021
	Total	1548.57		

Besides above long-term tie-ups, proposal of another 50 MW from M/s CMES Power 2 Pvt. Ltd. is under process. Furthermore, additional 100 MW per year is expected to be commissioned every year through solar rooftop.

Chapter 2 Page 51 of 233

With the above arrangements/tie-ups, the total installed capacity to the tune of 2226 MW solar power is expected to be available with HPPC by the end FY 2021-22 to meet RPO targets. Around 4750 Mus of solar power quantum is expected from current long-term arrangements during FY 2022-23. This shall be about 10.8% of total energy purchase of Discoms.

It may be noted that the unprecedented situation of Covid-19 epidemic has adversely impacted the Renewable Energy Sector and Commissioning of Solar projects has been delayed by 6 to 12 months. The projects which are to be commissioned in FY 2020-21 have slipped further to FY 2021-22 for which extensions in COD have been granted by the concerned Govt. Agencies. The unexpected delav commissioning of these solar projects has hampered the Discoms planning of power procurement, however, endeavours are being made to meet the gap with short term power and REC certificates in order to comply with the directions of the Commission.

## 14. Standards of performance and reliability indices

As per HERC regulations 2004 on standards of performance, clause 3.1 stipulates that these standards shall be the minimum standards of the service with reference to the quality, continuity and reliability of the services of distribution company. Further, as per clause 8.1 of these regulations, every licensee shall furnish the information on these standards and reliability indices (refer clause 8.3) every year.

Further as per schedule 1 of the guaranteed standards of the performance of these regulations, the period of load shedding shall not exceed 4 hours per day continuously for 4 days and in the event of the failure by the licensee to do so, a penalty has been specified. Further, as per the overall standards of performance as given in schedule II, defective meters shall not exceed 1% of the metered installations as per these standards, though there are still many more lacs defective meters in the licensed area of the petitioner. In fact, most of these provisions are grossly and blatantly flouted by the licensee. No such compensation has been paid by the utility against the non compliance of these standards of the performance, even though there is a provision for automatic payment of compensation as per clause 7.2 of these regulations.

Even, the DTs failure rate is much higher than the stipulated one in the regulation which is affecting the ARR adversely. Commission has noted its concern in the last tariff order dated 1 June 2020 as below:

"The DT damage rate is to be analysed on the basis of total number of DTs damaged irrespective of the fact whether the transformer damaged was within warranty period or not, as all these DTs were part of the system. The Commission considered it appropriate to consider the total damaged DT irrespective of damaged within warranty or not. The high level of transformer damage rate not only affect the continuity of supply adversely but also reflects upon poor

Nigam has been providing standard of performance to the Commission on regular basis.

Chapter 2 Page 52 of 233

monitoring and maintenance of distribution system which in turn also impacts the finances of the distribution licensees.

From analysis of the data, it is observed that failure rate of DTs in urban and rural area of UHBVNL during FY 2018-19 is 5.64% and 10.19% respectively which is above the maximum limit prescribed by the Commission and the Failure Rate of DTs in urban area of DHBVNL during FY 2018-19 is 5.66%which is also above the maximum limit prescribed by the Commission. The failure rate in rural area of DHBVN is within the norms prescribed by the Commission.

The Commission has analysed the submissions of the Petitioners and observes that despite issuance of regular directives to the DISCOMs to ensure the reduction of DTs failure rate, there is hardly any improvement. In the FY 2018-19, DTs failure rate in both Urban and Rural area of UHBVN and Urban area of DHBVN is higher than the norms, also, overall DTs failure rate of both Licensees in FY 2018-19 is increased in comparison to that of FY 2017-18. The commission again directs the licensees to bring down the distribution transformer damage rate below the prescribed limits by FY 2020-21. Any slippage on account of the timeline shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder

As per MYT Regulations the distribution licensee shall maintain a proper record of failure of the distribution transformers and submit the same in the quarterly report to the Commission. The DISCOMs are again directed to ensure that quarterly reports be submitted regularly."

Commission is requested to look into the performance indices of the discom and order punitive action where non-compliance is observed.

# 15. New supply connections

As per Haryana Electricity Regulatory Commission (Duty to supply electricity on request, Power to recover expenditure incurred in providing supply & Power to require security) Regulations, 2005, it is the Duty of Licensee to supply electricity on request. As per clause 3.1 of these regulations, every distribution Licensee shall, on receipt of an application from the owner or occupier of any premises, give supply of electricity to such premises, within one month of receipt of the application, complete in all respects along with the non - refundable application processing fee. However, a no of new connections remain pending as observed by the commission at 5.12 in last tariff order dated 1 june 2020 as given below: "Accordingly, the Commission in the interest of justice directs the distribution licensees to award compensation as per HERC Regulations wherever the delay in releasing the AP connections under Tatkal Scheme is beyond thirty days. It is directed that pending connections be released within one month, otherwise interest at State Bank of India

It is submitted that the process of release of application is continuous in nature and general application (DS & LT Category) have time lines of 30 days for release of connection. The overdue application as on 17.2.2021 is 2,352.

Chapter 2 Page 53 of 233

MCLR rate with one-year tenor applicable on 01.04.2018 shall be payable from the date of deposit of tatkal premium amount.

*In view of the above, the Commission again directs* the distribution licensees to expedite the release of pending applications for new connections as well as load enhancement. The present backlog should be removed within two months from the date of this Order and the distribution licensees shall submit a report on the same thereafter. In case backlog is not cleared within two months, it shall be deemed to be a notice under section 142 against the erring Officer/Official and the penalty so levied shall be paid to the sufferers. Compensation paid to the applicants, as specified by the Commission in its Regulations, for delay in expediting new connection or release of extended load shall also informed within two months from the date of this Order. The details of pending connections be uploaded on the website of the DISCOMs on monthly basis along with action plan to release the same. '

A large no of pending requests for new supply connections beyond the permissible time limit is clearly violative of the statutory provisions and commission must not allow this to happen without punitive actions.

# 16. Penalty for contraventions

It has been observed that the licensee has not been complying with the various provisions of regulations, supply code, Electricity act, Conditions of the License and directives issued by the commission in the past. It has also been found flouting various provisions of applicable regulations and Act as can be seen from the tariff orders of the commission and by discom's own admission in its ARR petition. Though there are provisions in the Act and the regulations, e.g. Sections 142 and 146 of the Act and other regulations in force provide for penal action against the licensee, no penal action is taken against the licensee. Also, Discom has been flouting almost all the provisions of supply code and various standards of performance, neither any compensation is given to the gullible consumers, nor any penal action is ever taken by the commission though, repeated warnings for taking penal actions have been issued by the commission in vain in its tariff orders and otherwise.

As there has been repeated flouting of these provisions, commission may take stringent view and may consider taking punitive action against the concerned official by holding him personal guilty for non-compliance and may also consider imposing penalty by invoking section 142 of the electricity act 2003.

## 17. Tariff philosophy

As per National tariff policy, cross subsidy should be reduced every year. Clause 8.3 on tariff policy provides as under: Nigam submits that it is submitting data to HERC on regular basis, HERC may take note of all these data.

Nigam submits that tariff determination is prerogative of the Commission

Chapter 2 Page 54 of 233

1. In accordance with the National Electricity Policy, consumers below poverty line who consume below a specified level, say 30 units per month, may receive a special support through cross subsidy. Tariffs for such designated group of consumers will be at least 50% of the average cost of supply.

2. For achieving the objective that the tariff progressively reflects the cost of supply of electricity, the SERC would notify roadmap within six months with a target that latest by the end of year 2010-2011 tariffs are within ± 20 % of the average cost of supply. The road map would also have intermediate milestones, based on the approach of a gradual reduction in cross subsidy. For example if the average cost of service is Rs 3 per unit, at the end of year 2010- 2011 the tariff for the cross subsidized categories excluding those referred to in para 1 above should not be lower than Rs 2.40 per unit and that for any of the cross subsidizing categories should not go beyond Rs 3.60 per unit."

Further MYT regulations 2019 provide the following provisions for cross subsidy:

## "69 INTER CATEGORY CROSS-SUBSIDY

69.1 The distribution licensee's tariff proposal should reflect the reasonable cost of providing service to each consumer class. In case where tariffs are historically distorted with significant level of cross-subsidy, the aim should be to gradually move to non-cross subsidized tariffs.

69.2 In the annual performance review and tariff application, the distribution licensee shall include a report on how far they have implemented the cross-subsidy reduction trajectory approved by the Commission for reduction of cross-subsidy and the measures being proposed in the current application to implement the plan."

The Licensees have not submitted any measures or plan to reduce the inter category cross subsidy which is a vital requirement of tariff policy and MYT Regulations.

# 18. Audit of loss-making feeders

In DHBVN, there is a high no of feeders, both urban and rural, on which the losses are consistently above 50%, but the licensee has not bothered to get energy audit of such feeders done and take suitable measures to curtail the same despite numerous directives of the commission on the issue. The Commission had further viewed this lapse on the part of licensee very seriously and had directed to file report on the status of losses on each of these feeders and also prominently display them on their website within 3 months with detailed reasons for non-compliance of the Commission's directives. However, despite all these warnings, nothing has been done by the discom.

Again in its order dated 1 June 2020, commission had strongly observed the following:

"5.6 Feeder Looses-Urban & Rural (UHBVN & DHBVN)

Nigam submits that it has implemented Mhara Gaon JagMag Gaon (MGJG) and Loss Reduction Plan (LRP) in rural and urban areas to curb power theft, reduce losses and to improve quality of service to the consumers. Line losses of Rural Domestic Feeders (RDS) contributes a significant portion of distribution losses, therefore to minimise the overall distribution losses, DHBVN had implemented MGJG scheme on RDS feeders. As per the scheme, on achievement of line losses less than 20% and defaulting amount less than 10%, power supply of 24 hours would be made available to the villages. Currently, DHBVN is supplying 24x7 power to 2,272 villages out of 3,650 villages covered under MGJG scheme as on 25.1.2021. Works included in MGJG scheme are under progress in remaining villages and the impact of the same will reflect on overall loss level of DHBVN in ensuing.

Chapter 2 Page 55 of 233

The Commission observes that although DISCOMs have shown some improvement, yet, are far behind the targets set by the Commission vide Tarff Order dated 07/03/2019 despite incurring substantial Capital Expenditure on system strengthening schemes/activities and Mhara Gaon Jagmag Gaon (MGJG) scheme. The Commission, in order dated 07/03/2019, had observed as under:

"The Commission has analysed the submissions of the Petitioners and is of judicious view that DISCOMs shall achieve the target as prescribed by the Commission for FY 2019-20. Any slippage on account of the target shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder."

DISCOMs in its reply have submitted that for achieving the targets for Urban and Rural Feeders in the FY 2019-20, schemes like Mhara Goan Jagmag Goan (MGJG), Urban Feeder Sanitization, are vigorously being implemented due to which overall AT&C Losses have reduced significantly i.e. from 30.02% in FY 2015-16 to 17.45% in FY 2018-19. Earnest efforts are being made to achieve the AT&C loss targets given by the Commission.

The year-wise position of the line losses on 11kV Rural and Urban feeders of the licensees, as per the details provided by UHBVNL and DHBVNL, is as under:

0	unucr.											
Rur Fee	Status of Rural Feeder		FY 2016-17		FY 2017-18		FY 2018-19					
	Distribution Losses											
Н	D H	T o t al	% a g e	UH	D H	T o t a	% a g e	UH	D H	Tot	tal	% a g e
B e I o w 5 0 %	6 9	3 2 6	3 9 5	2 2 . 5 8 %	1 7 8	4 5 2	6 % 0	3 4 . 4 3 %	3 2 1	5 5 1	8 7 2	4 5 5 1 %
A b o v e 5 0 %	7 9 3	5 6 1	1 3 5 4	7 7 4 2 %	7 0 4	4 9 6	1 2 0 0	6 5 7 %	6 1 2	4 3 2	1 0 4 4	5 4 4 9 %
T o t a I	8 6 2	8 8 7	1 7 4 9	1 0 0 %	8 8 2	9 4 8	1 8 3 0	1 0 0 %	9 3 3	9 8 3	1 9 1 6	1 0 0 %

The Commission agrees with the stakeholders that the distribution losses must be minimised to the extent possible and in no case must exceed the permissible limits. The distribution Licensees are directed to reduce AT&C losses of all urban feeders below 25% and that of Rural feeders below 50% in FY 2020-21. DISCOMs shall submit detailed action plan to achieve the target within two months of issuance of orders."

These losses are taking place repeatedly even after making huge capital expenditure on loss

Chapter 2 Page 56 of 233

reduction. The adverse effect of increase in the cost of supply due to such losses is borne by honest consumers, while the distribution companies are reluctant to take action against the defaulters for want of will power. Most of these losses are caused by the connivance of Discoms with the unscrupulous and corrupt elements. The mounting losses of the DHBVN are a big drain on the state exchequer.

Strangely, the government has done nothing except doling out huge subsidies and infusing funds in the form of equity without any notable improvement in their performance.

Commission must therefore, invoke Section 142 of the Electricity Act, 2003 and take stringent action against the discom.

In view of the above, we, the industry of Haryana look forward for your kind intervention in order to improve the distribution power system of DHBVN to make it more viable, cost effective, efficient and robust so as to serve power to its consumers at a reasonable price.

#### 19. Additional surcharge:

Referring to the commission's MYT order, an additional surcharge of Rs 1.15 per unit was allowed by the commission as below:

Commission's order dated 1 June 2020 page 253. "ADDITIONAL SURCHARGE: The Commission has taken note of the proposal of the Discoms on quantification and levy of additional surcharge for the 2nd Half of the FY 2019-20 in line with Regulation 22 of the HERC (Terms and Conditions for Grant of Connectivity & Open Access for Intrastate Transmission and Distribution System) Regulations 2012 as may be amended from time to time. The Discoms have accordingly proposed to levy an additional surcharge of Rs. 1.15 / kWh from the Open Access Consumers. Given the voluminous data and objections filed by the stakeholders The Commission shall take up the issue separately. Till the time Discoms may continue to levy Additional Surcharge in vogue i.e. @ 1.15 / Unit."

Commissions order dated 1 June 2020 page 283

# "19. Additional Surcharge

The Discoms are directed to file complete data / details of the second half of FY 2019-20 and also place the same on its website for determination of Additional Surcharge to be levied in the first half of the FY 2020-21."

This issue of levying additional surcharge on open access consumers has been raised by us in every hearing with little consideration from the commission. At the very outset we disapprove the levy of Additional Surcharge because each consumer has entered into contract with the Nigam and the latter is required to supply the same irrespective of the fact whether the consumer uses it or otherwise. Thus, a consumer who procures OA power is not causing any loss to the Nigam; more so, information on day ahead basis is being provided to the Nigam. Further, fixed charges are being paid by the

It is submitted that this matter of additional Surcharge is not a part of the current ARR Petition. The Discoms are filing separate petition for approval of additional surcharge in accordance with the direction of the Commission. So, the objection of the intervener may not be dealt in the current ARR petition.

Chapter 2 Page 57 of 233

consumer on the contract demand, then why this aspect is not deducted from the so called 'Stranded Power' when calculating the Additional Surcharge. As a matter of fact the Regulator is required to provide an even playing field to both the Discom and the consumer including in Open Access but to the contrary, levy of unjustified Additional Surcharge makes OA power comparatively unviable.

The other crucial factors and reasons for not levying the additional surcharges may be looked in to as given below:

- There is already a multiplicity of mechanism of recovery of so-called Fixed Charges paid to the generating companies. The Fixed Cost is fully booked in the cost of power purchase allowed to the Licensee through every successive ARR order;
- b) The Fixed Demand Charges recovered from the consumers include substantial part of the fixed cost borne by the Licensee.
- c) During True up of ARRs at the end of each Financial Year, the difference in approved and actual power purchase cost is allowed to the Licensee and hence the total fixed cost is accounted for in the annual expenditure of the Licensee;.
- d) While computing the FSA, any unrecovered gap in the cost of power purchase is fully figured in.
- e) DHBVN sells the surplus power over the Power Exchange Platform. Thus the power so sold brings revenue to the Licensee. Moreover, the Licensee also buys substantial power over the Exchange.
- f) The power claimed to have been surrendered/backed down depends on what was the PLF of the specific generating stations. Moreover, the power scheduled by the Open Access consumers is not Round the Clock power but only in certain time blocks. This has impact on the calculations submitted by the Licensee for determination of Addl. Surcharge.
- g) The DHBVN needs to certify that the backing down was as per their instructions and not a fait accompli and has to be ensured that the backing down was done on merit order basis and not by pick and choose method.
- h) Further in majority of States, no Addl. Surcharge is levied on Open Access Consumers. Any such levy proves a disincentive to buy cheaper power available over the Power Exchange from outside the State sources and frustrates the very purpose of facilitating the concept of Open Access provided under the Electricity Act, 2003 and Tariff Policy framed there under.
- As a result of these exorbitant additional cost levied on open access consumers in our state, the state industry becomes unviable because of heavier input electricity costs in comparison to the industry in other states.

Chapter 2 Page 58 of 233

So, Commission is requested to reduce the demand charges or fixed charges or not to charge the additional surcharge from open access consumers.

We request the Commission to direct the Nigam for better demand side management and review their long-term agreements thereby curtailing the Additional Surcharge to a negligible amount.

## 20. Peak Load Exemption Charges (PLEC):

PLEC on Open Access consumers was introduced vide HERC 1st Amendment dated 3rd December 2013 due to overloading of the power infrastructure during peak hours.

The basis of levying PLEC during peak load which may call for scheduling of expensive power and impose burden on the system requiring further investments which largely remains un-utilized during the off-peak hours / months of the year, may not hold good now because of the fact that power infrastructure in Haryana has been considerably upgraded and there is no constraint on HVPNL/DISCOM infrastructure. Further the DHBVN is duty bound to manage the system constraint and its failure to do so cannot be compensated by the levy of PLEC which would only breed the inefficiency in its work culture. In the present scenario, levy of PLEC on all consumers including Open Access consumers is unjustified.

Hence Commission is requested to discontinue levy of PLEC on all consumers including Open Access consumers.

It is submitted that the issue raised by the objector are devoid of merit, as levy of Peak Load Exemption Charges is primarily due to high cost of energy available in Energy Exchange during peak load hours (PLHs). PLEC is levied keeping in view two factors i.e. to compensate the licensee for scheduling costlier power during PLHs and secondly to contain the demand within available peak capacity.

As Open Access Consumers purchase power through energy exchange contributing loading on the system, even licensee are forced to back down the generating stations, still the power drawn by open access contributes in the load. Therefore, PLEC charges must be recovered from open access consumers.

# Comments on True-up petition of DHBVNL for FY 2019-2020 before HERC:

# 1. O & M Expenses

As per 13.2 of MYT regulation 2012:

"13.2 Truing-up of uncontrollable items shall be carried out at the end of each year of the control period through tariff resetting for the ensuing year and for controllable items shall be done only on account of force majeure conditions and for variations attributable to uncontrollable factors." As given at 2.6 of the true-up petition of DHBVNL, the comparison of approved O & M expenses by HERC in its order dated 7 MARCH 2019 and actual being claimed by DHBVNL for FY 2019-20 in this petition is given below:

"Table 6: O&M Expenses for FY 2019-20 (In Rs. Crores)

Crore	10103							
Sr.	Particulars	Approved	Actual	Difference				
1	Employee	969.66	918.6	50.99				
	Expense		7					
2	Administra	81.69	117.9	(36.23)				
	tion &		2					
	General							
	Expense							
3	Repair &	165.34	122.3	43.00				
	Mainte nanc		4					
	e Expense							
4	Terminal	426.75	442.9	(16.15)				
	Liability		0					
	Total	1643.44	1601.	41.60				
			84					

It indicates that DHBVNL has spent 36.23 cr more on A & G expenses and 16.15 cr on terminal liability which need to be disallowed by the Commission as 57.3 of the regulation clearly

It is submitted that Petitioner in RA 18 of 22.10.2019 that the Commission in Tariff Order dated 07.03.2019, had estimated the employee and A&G expenses for FY 2019-20 by considering the approved cost and indexation factor for FY 2017-18. Further to the request of the Petitioner in the said Petition, the Commission stated the following:

"The Commission has considered the arguments put forth by the licensee in support of its claim and observes that at the time of impugned order, values of WPI and CPI were available for FY 2018-19 only upto September, 2018, and therefore inflation factor was calculated for the FY 2017-18. In view of the fact that these expenses are eligible for true up based on actual inflation figures for the FY 2019-20, along with holding cost, the Commission does not find it appropriate to replace one estimated cost with another. Further, there is no error apparent from the records, warranting the Commission to exercise its review jurisdiction"

In view of above and considering the actual CPI-WPI values for FY 2019-20, the Petitioner has calculated at revised index figure of 6.09% for arriving at normative A&G expenses for FY 2019-20 as against the index of 3.04% considered by the Commission in order dated 07.03.2019. Hence, the revised normative A&G expenses considering indexation of 6.09% on audited A&G expenses of FY 2018-19 (Rs. 111.37 Crores.) are Rs 118.15 Crores which is less than the claimed amount of Rs 117.92 Cr.

Further, with reference to R&M expenses, Petitioner

Chapter 2 Page 59 of 233

indicates that:

"

# **57.3 Operation and Maintenance Expenses**

The actual audited O & M expenses for the financial year preceding the base year, subject to prudence check, shall be escalated at the escalation factor of 4% to arrive at the O & M expenses for the base year of the control period. The O&M expenses for the nth year of the control period shall be approved based on the formula given below.

## O&Mn = (R&Mn + EMPn + A&Gn)\* (1-Xn) + Terminal Liabilities

Where,

- R&Mn Repair and Maintenance Costs of the Distribution Licensee(s) for the nth year;
- EMPn Employee Costs of the Distribution Licensee(s) for the nth year excluding terminal liabilities;
- ☑ A&Gn Administrative and General Costs of the Distribution Licensee(s) for the nth year;

The above components shall be computed in the following manner.

# (a) R&Mn = K \* GFA \* INDXn / INDXn-168 Where.

- If 'K' is a constant (expressed in %) governing the relationship between O&M costs and Gross Fixed Assets (GFA) for the nth year. The value of K will be 1.65% for DHBVN and UHBVN respectively for the entire control period;
- ② 'GFA' is the average value of the gross fixed asset of the nth year.
- **'INDXn'** means the inflation factor for the nth year as defined herein after.

# (b) EMPn (excluding terminal liabilities) + A&Gn = (EMPn-1 + A&Gn1)\*(INDXn/INDXn-1) Where.

☑ INDXn – Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under:

# 

- **Note 1:** For the purpose of estimation, the same INDXn value shall be used for all years of the control period. However, the Commission shall consider the actual values of the INDXn at the end of each year during the annual performance review exercise and true-up the employee cost and A&G expenses on account of this variation.
- **Note 2:** Any variation in employee cost and A&G cost on account of reasons beyond variation in INDXn shall be subject to the incentive and penalty framework specified in regulation 12.
- **Note 3:** As and when any material price index specific to power sector or a more relevant Index becomes available, the same shall replace the Index used for working out R&M cost.
- **Note 4**: Terminal liabilities shall be approved as per actual expenditure incurred by the distribution licensee or established through actuarial valuation for the ensuing year.
- Note 5: O&M expenses made on account of

spending legitimate expense each year to provide reliable & quality power to its consumers.

Chapter 2 Page 60 of 233

extraordinary situations (if any) shall be submitted to Commission for its approval. Such expenses shall be filed separately and will not be subjected to incentive and penalty framework. The approved amount by the Commission shall be trued up in the annual performance review.

**Note 6:** Changes in the pay scales of employees necessitated on account of pay revision by Pay Commission or by the State Government orders shall be considered by the Commission for true-up during the annual performance review.

#### (c) Xn is an efficiency factor for nth year

The Value of Xn will be determined by the Commission in the MYT order for the control period."

In line with above regulations, the discom should have given a clear explanation and calculation of expenses of all the components of O &M expenses and a mere mention of this amount in the audited accounts is not enough. They must take a base value of employee expenses, R &M expenses and A &G expenses, apply inflationary index and the efficiency factor to arrive at the expenses which they wish to get approved from the commission.

In the absence of any calculation and justification, Commission may therefore, allow A &G expenses of Rs 81.69 Cr as approved in the tariff order dated 7 MARCH 2019 for FY 2019-20 against Rs 117.92 Cr as claimed by the DHBVN in line with MYT Regulations while considering true up for FY 2019-20.

Further it is observed that actual R & M expenses of DHBVNL are low at Rs 122.34 cr against the approved figure of Rs 165.34 cr as per the tariff order dated 7 MARCH 2019. It is found that DHBVNL is not spending enough on R & M expenses as a percentage of total ARR. It should improve its operational performance with judicial expenditure on R & M. The study on "Various power distribution models in India" conducted by CRISIL Infrastructure Advisory for the High level panel (HLP) constituted under the Chairmanship of Shri V.K. Shunglu highlighted that one of the reasons behind better performance of the private distribution licensees has been IT implementation, adequate expenditure on R&M and judicious expenditure on employee cost.

A comparison of these expenses with other government and private distribution companies indicates that while the private distribution licensee have been spending about 25% to 35% of their O&M expense on repair and maintenance of their network, the majority of DHBVN's O&M costs are directed towards employees and administration.

We humbly request the Commission to direct the licensee to work on improving its operational performance by judicious expenditure in O&M cost for supplying quality power to the consumers.

# 2. RPO Obligation

At 3.2.11 of the distribution tariff order dated 7 MARCH 2019, the Commission had stipulated the

It is submitted that the Commission vide Order dated 1.6.2021 in chapter 7 has waived off the current backlog of RPO due to COVID-19 Pandemic. The

Chapter 2 Page 61 of 233

Renewable energy purchase quantum as 3360.75 MUs

Also as given at 3.2.11 of the order dated 7 MARCH 2019 and the notes below it. Commission had considered the total shortfall in solar and nonsolar RPO from 2011-12 to 2017-18 as 1635 MUs. Commission had further directed that the discomshould meet the RPO obligations as provided in HERC Regulations and any shortfall in meeting RPO shall be treated in accordance with the Regulation of HERC (Terms and Conditions for determination of Tariff for Renewable Energy Sources, Renewable Purchase Obligation and Renewable energy Certificate) Regulations, 2010 and discom would be penalized accordingly, which is fully supported by MYT regulations 2012 also. Regulation 59.8 of MYT Regulation 2012 clearly stipulates that distribution license is obliged to follow renewable energy regulations and is to be penalized accordingly in case of any shortfall.

As can be seen from the DHBVN true up petition, there is hardly any energy purchase from renewable energy sources and the DHBVN has miserably failed

in its obligation of RPO which has now been repeatedly happening over the years.

The Commission is therefore, requested to treat the violation in accordance with the provisions of regulation 65, 66 and 67 on renewal energy purchase and penalize the DISCOM accordingly.

#### 3. Power purchase Costs

As per 2.4.8 of DHBVN petition, DHBVNL has asked for a true up of power purchase cost of Rs 15291.58 Cr for FY 2019-20 against the approved figures of Rs. 15450.51 Cr. As per 2.4.6 of the petition, It has indicated the average actual per unit cost of power as Rs 4.88 against the approved average power purchase cost of Rs 4.58 per unit by HERC in its tariff order dated 9 march 2019. DHBVN has attributed the higher power purchase costs to the revision in tariff of some generating stations and prior period expenses during FY 2019-20.

It may be noted that as per MYT regulations 8.3 (b) of 2012, governing the Multiyear tariff frame work, power purchase cost for short term power and UI is a controllable parameter and any cost escalation on account of short-term power and UI cannot be allowed to pass on in the ARR of the distribution licensee.

Referring to table 6 of true up petition of DHBVNL, it is observed that its actual power purchase quantum FY 2019-20 has gone down from the approved figures of 59471.38 MUs to 55442.34 MUs while the per unit cost has gone up against the approved figures.

It has been repeatedly stated by the Commission that the licensees must monitor their power purchase activity prudently and must ensure no trading losses.

The Commission had clearly not allowed any short term power purchase or drawl under UI mechanism for estimating power purchase cost of relevant extract is given below:

"...The Commission has decided to waive off the current backlog of RPO in view of unprecedented circumstances due to Covid-19 Pandemic as a onetime measure

It is submitted that a Study on Least Cost Power Procurement is under progress by HPPC, the same will be submitted to the on completion.

Chapter 2 Page 62 of 233

DHBVN for FY 2019-20. Also Regulation 60.3 of HERC Tariff regulation 2012 on short term power requirements, do not allow the provisions of pass through of quantum and cost of short term power purchased by the DISCOMs without the approval of the Commission.

The Commission is therefore, requested not to consider and allow any power purchase cost incurred on account of short-term power purchase for the FY 2019-20. Commission is also requested to disallow any illogical and imprudent procurement of power resulting in trading loss and true up ARR for FY 2019-20 only after adjusting the FSA already collected from the consumers.

It may further be noted that power purchase cost of DHBVNL is considerably higher than that of some other DISCOMs like MP and Rajasthan as a percentage of their total ARRs. Where as in case of DHBVN, it is generally about 80% of the total ARR, it is about 70% of their respective ARRs in M.P and Rajasthan. The Model tariff regulations of Forum of Regulators also have suggested detailed power purchase planning by distribution licensee on long-term, medium-term and short-term basis. On its part, Commission also had made the similiar observations as given below in tariff order dated 30th March 2013:

"The Commission is of the opinion that excess availability of power is due to mismatch between the availability of power and the ability of the licensees to supply the same to the consumers in an efficient manner in the state. The interstate sale of power should be managed in such a manner so that the consumers of the state are not made to suffer loss due to this inability of the licensee. In case the power procurement planning in done in an efficient manner, the licensees should even be able to subsidise the consumers of Haryana by selling the excess power to consumers outside the state at remunerative rates."

The Commission is therefore, requested to guide the distribution licensees of Haryana to carry out a better power procurement planning in short, medium and long run so as to arrive at an optimum power purchase cost.

# 4. Efficiency factor

Referring to 57.3 of the tariff regulations, following has been stipulated:

# "57.3 Operation and Maintenance Expenses

The actual audited O & M expenses for the financial year preceding the base year, subject to prudence check, shall be escalated at the escalation factor of 4% to arrive at the O & M expenses for the base year of the control period. The O&M expenses for the nth year of the control period shall be approved based on the formula given below.

O&Mn = (R&Mn + EMPn + A&Gn)\* (1-Xn) + Terminal Liabilities

Where.

☑ R&Mn – Repair and Maintenance Costs of the Distribution Licensee(s) for the nth year;

It is submitted that O&M expenses claimed by Petitioner is less than the approved expenses. Therefore, it is requested to the Commission to kindly approved the O&M expenses as claimed in the Petition.

Chapter 2 Page 63 of 233

EMPn – Employee Costs of the Distribution Licensee(s) for the nth year excluding terminal liabilities;

☑ A&Gn – Administrative and General Costs of the Distribution Licensee(s) for the nth year;

The above components shall be computed in the following manner.

# (a) R&Mn = K \* GFA \* INDXn / INDXn-168 Where.

If 'K' is a constant (expressed in %) governing the relationship between O&M costs and Gross Fixed Assets (GFA) for the nth year. The value of K will be 1.65% for DHBVN and UHBVN respectively for the entire control period;

② 'GFA' is the average value of the gross fixed asset of the nth year.

② **'INDXn'** means the inflation factor for the nth year as defined herein after.

(b) EMPn (excluding terminal liabilities) + A&Gn = (EMPn-1 + A&Gn1)\*(INDXn/INDXn-1)
Where.

Il INDXn – Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under:

## ? INDXn = 0.55\*CPIn +0.45\*WPIn.

**Note 1:** For the purpose of estimation, the same INDXn value shall be used for all years of the control period. However, the Commission shall consider the actual values of the INDXn at the end of each year during the annual performance review exercise and true-up the employee cost and A&G expenses on account of this variation.

**Note 2:** Any variation in employee cost and A&G cost on account of reasons beyond variation in INDXn shall be subject to the incentive and penalty framework specified in regulation 12.

**Note 3:** As and when any material price index specific to power sector or a more relevant Index becomes available, the same shall replace the Index used for working out R&M cost.

**Note 4**: Terminal liabilities shall be approved as per actual expenditure incurred by the distribution licensee or established through actuarial valuation for the ensuing year.

**Note 5**: O&M expenses made on account of extraordinary situations (if any) shall be submitted to Commission for its approval. Such expenses shall be filed separately and will not be subjected to incentive and penalty framework. The approved amount by the Commission shall be trued up in the annual performance review.

**Note 6:** Changes in the pay scales of employees necessitated on account of pay revision by Pay Commission or by the State Government orders shall be considered by the Commission for true-up during the annual performance review.

#### (c) Xn is an efficiency factor for nth year

The Value of Xn will be determined by the Commission in the MYT order for the control period."

It is quite clear from the above that while

Chapter 2 Page 64 of 233

calculating the O&M Expenses for the distribution licensee, efficiency factor of the licensee is to be applied and O&M Expenses will be calculated accordingly. However, the same has not been taken into account for calculating these expenses by DHBVN.

It is extremely important to link the expenses of the distribution licensee with the efficiency so as to incentivize his performance. Commission must therefore, decide immediate figures for efficiency factor and reflect them in the allowable costs for O&M Expenses.

# 5. Other Interest and finance charges including stamp duty paid to state

As per table 12 of the true-up petition, DHBVNL has asked for these charges of Rs 26.09 cr against the approved charges of Rs 5 crores as per the order dated 7 march 2019.

Even in the ARR petition for FY2019-20 , the DHBVN had proposed the cost of raising finance as Rs 5 crores which was accepted by the commission as per the ARR GIVEN AT 3.2.26 ON PAGE 269 OF THE TARIFF ORDER DATED 7 MARCH 2019.

**Further,** as per 8.3 (b) of MYT regulations 2012 notified by the Commission, interest and finance charges are a controllable parameter and cannot be allowed on actual basis

For DHBVNL, the Commission had approved Rs. 5 crores as cost of raising finance based on the principles laid down in the MYT Regulations. Against this approved figure of Rs 5.0 Cr, the discom has claimed Rs 26.09 Cr as other interest and finance chargesin the true up petition, which can not be allowed to be passed on and must be disallowed by the Commission.

Also 12.1 of MYT regulations provide for the following:

"12.1 Various elements of the ARR of the generating company and the licensee will be subject to incentive and penalty framework as per the terms specified in this regulation. The overall aim is to incentivize better performance and penalize poor performance, with the base level as per the norms / benchmarks specified by the Commission."

Hence, the Commission is requested to allow the other interest and finance charges to the tune of Rs 5.0 cr only and the balance may be disallowed.

## 6. Return on Equity

As per 2.17.3 of its true up petition, DHBVNL has claimed a return on equity of Rs 225.34 cr for FY 2019-20 against the commission's allowed figures of Rs 193.15 Cr as per tariff order dated 7 march 2019.

We request the Commission to take a judicious decision in the matter and allow the RoE Rs 193.156 Cr only for FY 2019-20 in consonance with its tariff order and the provisions given in the tariff regulations.

Expenditure due to other debts
 At 2.18 of its true up petition, DHBVNL has claimed

Commission for FY 2019-20 is Rs 359.59 Cr. against which the actual expenditure claimed in the true up filing is Rs 351.96 Cr. which is well within the approved amount under the head "Interest & Finance Charges". The expenditure under the sub head "other interest & finance charges" is increased due to payment of stamp duty to the state Govt. on account equity infusion and bond issuance expenses of HVPN and the same is claimed in true up petition accordingly being justifiable expenses. The overall expense is well within the approved limits by the Commission.

The total Interest & finance charges approved by the

It is submitted that ROE has been computed as per MYT Regulation, 2012. Therefore, it is requested to the Commission to allow ROE as claimed by the Petitioner.

It is submitted that Petitioner has claimed bad & doubtful debt as per clause 64 of MYT Regulation

Chapter 2 Page 65 of 233

an expenditure of Rs 39.43 cr on account of other debts like miscellaneous losses, unrealized surcharge, refunds, compensation etc.

It may kindly be noted that there is no scope for recovery of expenses on account of such under performance and incompetency on part of DISCOM and there is clear provision in regulation regarding bad and doubtful debts as given at 64 of regulations 2012 which is produced below:

"64 Bad and doubtful debts shall be allowed to the extent the distribution licensee has actually written off bad debts subject to a maximum of 0.5% of sales revenue. However, this shall be allowed only if the distribution licensee submits all relevant data and information to the satisfaction of the Commission. In case there is any recovery of bad debts already written off, the recovered bad debts will be treated as other income."

DISCOM has not been mandated to waive off any kind of bad debts and instead charge the same from the consumer through its ARR. This is absolutely against any norms of commercial transactions. The waived off bad debts cannot be loaded on any consumers; it has to be suffered by discom as a loss. This results in decrease in collection efficiency, increase in commercial losses and overall worsens the scenario of AT &C losses, which is the ultimate benchmark for the health of any distribution utility. Moreover, the honest consumer, who is diligently and regularly paying his dues has to bear the brunt of defaulters and pay for their misdeeds. Further the facility of waiving off creates a bad habit amongst consumers expecting this undue and unfair advantage every time from the government authorities and promotes wastage of energy, thereby, resulting in more distribution losses. There is no provision for waive off of any kind of electricity dues and the discom should be sternly warned that they must take recourse to all possible means of recovery against the defaulters. As there is no justification given by licensee and

8. Distribution losses & AT&C Losses

Referring to the Commission's latest tariff order dated 7 March 2019, against a target of 14.14 % for distribution losses, the DHBVN has indicated a figure of 14.37 % for FY 2019-20, As per the table 91 of this order, the DHBVN had projected the same AT&C losses for 2018-19 and 2019-20 at 15%/.

there is absolutely no legal provision to sustain this claim, the Commission is, therefore, requested not to consider this expense in the ARR

while truing up the costs for FY 2019-20.

However, the commission had stipulated the following in its order for losses for 2019-20:

"c) FY 2019-20 The AT&C losses have been pegged in line with the losses envisaged under UDAY scheme. Considering the past performance huge efforts shall be required to meet the AT&C loss targets pegged by the Licensees. DHBVNL is directed to explain, within three months, from the date of this Order, the reason of consideration of

2012.

"Bad and doubtful debts shall be allowed to the extent the distribution licensee has actually written off bad debts subject to a maximum of 0.5% of sales revenue. However this shall be allowed only if the distribution licensee submits all relevant data and information to the satisfaction of the Commission. In case there is any recovery of bad debts already written off, the recovered bad debts will be treated as other income" Further, as a commercial entity despite being best effort there is always some bed debt. And as per regulation the allowable bed debt is subject minimum of written off bed debt and 0.5% of sales revenue.

It is evident from past years performance of DHBVN that earnest efforts are being made towards reduction of line losses and commercial losses to plug in the revenue loss. DHBVN has achieved AT&C loss level of 15.41% in FY 2019-20. The AT&C losses were at 21.35% in FY 2016-17 thus there has been a reduction of 5.98% over the period of 3 years. DHBVN has also achieved financial turnaround three years prior to the target given under the UDAY MoU.

2.3.2 DHBVN has implemented Mhara Gaon JagMag Gaon (MGJG) and Feeder Sanitisation Schemes in rural and urban areas to curb power theft and to improve quality of service to the consumers. Line losses of Rural Domestic Feeders (RDS) contributes a significant portion of distribution losses, therefore to minimise the overall distribution losses, DHBVN had implemented MGJG scheme on RDS feeders. As per

Chapter 2 Page 66 of 233

same AT&C Loss Level for FY 2019-20 as that of FY 2018-19 i.e., 15.00% with no reduction rate. However, they have sought CAPEX for reduction of AT&C Loss Level during FY 2019-20. The Commission observes that there are no AT&C Loss target for FY 2019-20 under UDAY - Tripartite MoU among Ministry of Power, Gol; Govt. of Haryana and Haryana DISCOMs signed on 11/03/2016. Therefore, the Commission has analysed the reduction rates in Actual AT&C loss level for FY 18 v/s FY 17 and reduction rates in AT&C loss level for FY 19 v/s FY 18 as projected by the DISCOMs. Considering the fact that there is saturation in Loss Levels as the trajectory declines, the Commission is of the judicious view that AT&C Loss Level Target for FY 2019-20 be 1.50% & 5.80% lower than the projection for DHBVNL & UHBVNL for FY 2018-19 respectively. With this target, UHBVNL will get 1 extra year to reach to the levels of AT&C as mandated under UDAY for FY 2018-19."

As per above the DHBVN had a target of AT&C loss reduction of 1.5% from the level of 2018-19, which comes to 13.5 %. Against this, DHBVN has achieved a AT%C LOSS OF 15.41% as per 2.3.1 of the petition which is an under achievement of 1.91%.

Therefore, there is a clear cut short fall of minimum 1.91% on account of AT &C losses for the FY 2019-20 which is to be subjected to the penalty framework as stipulated in the 57.1(g) of MYT regulations 2012, which are reproduced below:

"(g) Any overachievement and underachievement of the loss trajectory specified by the Commission in the MYT order shall be subject to incentive and penalty framework specified in regulation 12. The distribution licensee(s) shall provide a statement to this effect in the mid-year performance review and true-up."

This penalty for under achievement of losses by the DHBVN is to be levied in line with Regulation 12 of the Tariff regulations reproduced below:

- "(d) Only for Distribution licensee
- (i) Distribution losses Applicable when actual distribution losses fall below or exceed the level specified by the Commission
- (ii) Collection efficiency- Applicable when actual collection efficiency falls below or exceeds the level specified by the Commission
- (iii) Recovery of arrears Applicable when actual recovery of arrears of previous years falls below or exceeds the targets specified by the Commission
- 12.3 The gains / losses shall be computed item wise separately for each business. The computations shall be based on the data submitted by the generating company and the licensees in the application for mid-year performance review / true up and audited annual accounts corresponding to the financial year.

12.4 In case of gain

The item wise gain shall be shared between the

the scheme, on achievement of line losses less than 20% and defaulting amount less than 10%, power supply of 24 hours would be made available to the villages. Currently, DHBVN is supplying 24x7 power to 2,272 villages out of 3,650 villages covered under MGJG scheme as on 25.1.2021. Works included in MGJG scheme are under progress in remaining villages and the impact of the same will reflect on overall loss level of DHBVN in ensuing

DHBVN is further working extensively on strengthening of sub transmission and distribution network under the Deendayal Upadhyaya Gram Jyoti Yojna (DDUGJY) and Integrated Power Development Scheme (IPDS). Under these Schemes the overloaded feeders are being bifurcated and trifurcated along with creation of new 33 kV Substations. Works under these schemes are at their closure and the full impact of these works will reflect in the performance of DHBVN in ensuing years.

DHBVN is also carrying out system strengthening works under Japan International Cooperation Agency (JICA) funding which will further contribute towards reduction in distribution losses.

2.3.5 DHBVN has also planned to install 5 lakh smart meters in Gurugram and Faridabad under BOOT Model through Energy Efficiency Services Limited (EESL) which is promoted by the Ministry of Power, Govt. of India. DHBVN has successfully installed backend system integration software which is a crucial module for establishing two-way communication with Smart Meters. From the experience of Discoms in neighbouring state, it was observed that the backend system integration turns out as a major challenge for successful implementation of smart metering project; therefore, to avoid such hurdle DHBVN first ensured the successful installation of backend system integration software. DHBVN has so far installed more than 1,16,563 Smart Meters as on 1st Oct 2020 in Gurugram and has planned to complete the installation of the remaining smart meters by the end of 2021 with a view to increase efficiency in meter reading and billing, resulting in reduction of technical and commercial losses of Nigam.

DHBVN is also working on Demand Side Management; various measures like distribution of LED Lights, energy efficient fans and installation of energy efficient agriculture pump-set have been undertaken. These measures will reduce the energy requirement at LT network and eventually reduces the loss level of the Nigam.

During FY 2019-20, DHBVN has achieved distribution loss level of 14.37%. The reduction of distribution loss of FY 2019-20 in comparison with FY 2018-19 is 0.97%. DHBVN has marginally missed the distribution loss target of 14.14% given by the Commission in HERC Tariff Order dated 7th March 2019. DHBVN endeavours to achieve the loss targets fixed by the Commission and is working aggressively towards it. Initiatives undertaken by DHBVN are of long term in nature and impact will be visible after completion of the works which are under progress. It is submitted that reduction of distribution losses over the last year is a significant achievement and may be appreciated.

generating company or the licensee, as the case may be, and their respective beneficiaries in the ratio of 50:50. However, the sharing ratio of 50:50 may be revised to a maximum of 60:40 at the time of true-up during mid-year performance review / true-up. The manner of utilization of the additional 10% gain shall be specified by the Commission from time to time.

## 12.5 In case of loss

- 12.5.1 The item wise losses on account of controllable factors in case of a distribution licensee shall be dealt with in the following manner:
- (a) The loss to the Distribution Licensee on account of Distribution losses, as may be admitted by the Commission after prudence check, shall be dealt with as under:
- (i) One-third of the amount of such loss may be passed on as an additional charge in tariff over such period as may be specified in the Order of the Commission; and
- (ii) The balance amount of loss shall be absorbed y the Distribution Licensee.
- (b) The item wise losses on account of other controllable factors, unless otherwise specifically provided by the Commission, shall be borne by the distribution licensee. "

At page 301 of the Tariff order dated 7 March 2019, the commission also had clearly laid out the treatment for the losses for FY 2019-20 as given below:

"As specified under Regulation 12 of HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2012, overachievement and underachievement of the loss trajectory and the collection efficiency specified by the Commission shall be subject to incentive and penalty framework and that the distribution licensees shall provide a statement to this effect in the mid-year performance review and True-up."

Commission is therefore, requested to allow only one-third of the loss on account of losses of DHBVN to be passed on to the consumers and the loss on account of two-third losses shall be absorbed by distribution licensee in line with regulations and commission's orders.

In view of the above it is submitted that the Commission may kindly consider the actual distribution loss level of DHBVN for carrying out the true up for FY 2019-20.

# 9. Collection Efficiency

Collection efficiency is defined as ratio of total revenue realized to the total revenue billed during the year and its target has been specified in 57.2 of the regulations as under:

# **"57.2** Collection Efficiency

The norms fo collection efficiency for the distribution licensee(s) shall be as under:

Distribution Licensee		2014-15	2015-16	2016-17	
DHBVN	98%	98.5%	99%	99%	

Besides the collection efficiency, the Commission shall also monitor the recovery of arrears of

It is submitted that collection efficiency for FY 2019-20 is 98.79% and revenue billed is Rs 13,371.15 Cr. Further, the same information has already been provided to the Commission vide Memo No. Ch. 83/SE/RA-682 dated 22.1.2021.

Chapter 2 Page 68 of 233

previous years for which the Commission shall prescribe the targets and shall accordingly assess the performance of the licensee with regard to recovery of arrears.

Any over achievement or under achievement in respect of collection efficiency and recovery of arrears shall be subject to incentive and penalty framework as specified in regulation 12."

Further referring to the tariff order dated 7 March 2019, a collection efficiency of 99 % was specified by the commission for FY 2019-20 for DHBVN. However, true up petition of DHBVNL provides no information in the petition regarding revenue billed and the collection efficiency for FY 2019-20. These figures are required to be provided by the licensee which then would be subjected to the prudence check of the commission and any shortfall in the targets will be subjected to the penalty framework as per regulation 12 of MYT regulations 2012.

Commission is therefore, requested to direct the licensee to provide the necessary information and figures immediately to assess the performance of licensee against the targets for these controllable parameters.

#### 10. Non-Tariff Income

DHBVN has submitted a non tariff income of Rs 351.76 Cr for the year FY 2019-20 in its true up petition. As per 2.20.4 of its true up petition, It has deducted delayed payment surcharge and discount on timely payment from the NTI to arrive at the net NTI. It has claimed that since these are the receivables from the consumers that are not received in time, and as there is a delay in receiving the revenue, the Nigam has to procure additional working capital. Therefore, the revenue received on account of delayed payment surcharges is not income of the Nigam and hence may not be a part of NTI.

However, as per MYT regulations 2012 governing the tariff fixation, the following provisions have been laid down:

"67.1 All incomes being incidental to electricity business and derived by the licensee from sources, including but not limited to profit derived from disposal of assets, rents, delayed payment surcharge, meter rent, income from investments other than contingency reserves, miscellaneous receipts from the consumers, etc shall constitute non-tariff income of the licensee;"

In line with the above legal provisions, Commission also has been consistently disallowing deduction of late payment surcharges from Non tariff income time and again. In view of the above justification and in line with the prevailing tariff regulations 2102 and also the Commission's own tariff orders and pure logic, Commission must disallow the claim of the discom and the amount collected as late payment surcharge will be considered as income of the discom and be deducted from the ARR. The total NTI therefore, be considered as Rs 637.32 Cr against the figures of Rs 351.76 Cr as considered by the DHBNV in its petition.

It is submitted that reply to this query is already clarified above in Point no. 5.

Chapter 2 Page 69 of 233

# **Commission's Observation**

The Commission has carefully perused the submissions/ observations of the petitioner as well as that of the interveners and observes that the expenses, as such, of the distribution licensee shall be assessed after prudence check in accordance with the MYT regulations. It is further observed that the Discoms have filed voltage wise loss level as well. Since the additional surcharge is not part of the present ARR petition, the intervener may submit their comments separately.

# 2.3.3 Comments of M/s Jindal Stainless (Hisar) Limited, Hisar

# Particulars Reply

**TRUE-UP OF EXPENSES FOR FY 2019-20** 

The Commission vide order dated 07.03.2019 approved the ARR of DHBVN for FY 2019-20 of Rs. 16,780.52 Crore whereas DHBVN application for True-up for FY 2019-20 is for Rs. 17,486.04 Crore with a gap of Rs. 464.08 Crore. This revenue gap is inspite of the fact that DHBVN has always claimed to have achieved turn around and operating with net profit. The main variations claimed are in Power Purchase Cost, and Return on Equity. The Cumulative Revenue Gap for both the Distribution Companies ending FY 2019-20 is reported as Rs. 1533.88 Crore.

Although the Discoms have been operating under regulated regime for the last over 20 years and the electricity consumers in the State are paying one of the highest electricity tariff in the country but these Distribution Companies are still reporting recurring losses, which forfeits the very purpose of undertaking re-organization of the State Electricity Board under the Electricity Act, 2003.

We would urge the Commission to disallow all the variations in the ARR, which fall under the category of 'Controllable Parameters of the ARR" as defined under Reg. 8.3.8 of MYT Regulations, 2019 so that the electricity consumers are not unnecessarily burdened because of the deficiencies in the working of the Utilities.

Nigam submits that the revenue gap in the True up for FY 2019-20 arises out of the difference between the Actual expenditure of the Nigam and the Projected Expenditure as approved by the Commission. Further, Nigam would like to highlight that all the expenditure including controllable parameters have been claimed

as per provisions of MYT Regulation.

Further, the variation in power purchase cost is due to prior period expenses while Return on equity has been claimed as per MYT Regulation, 2012. In addition to above, it is evident from the past years tariff orders issued by the Commission time to time that in spite of such huge revenue gap being carried by the DHBVN over the years, the consumers are not being burdened at once and are eased with very limited or sometimes no tariff hikes. The same burden is being carried by the Nigam over the years. Discoms have requested to the Commission vide petition HERC/PRO-77 of 2020 & HERC/PRO-78 of 2020 to continue with the current levels of tariff in order to meet the revenue requirement for the financial year 2021-22.

#### II ANNUAL PERFORMANCE REVIEW OF 2020-21:

The Commission vide order dated 01.06.2020 approved the ARR of DHBVN for FY 2020-21 of Rs. 16,002.20 Crore whereas DHBVN application for APR for FY 2020-21 is for Rs. 17,179.75 Crore with a gap of Rs. 1,177.55 Crore. This revenue gap is inspite of the fact that there was a net Revenue Surplus of Rs. 817.09 Crore for FY 2018-19, which was retained by the Utilities without giving any benefit to the consumers. The main variations claimed are in Power Purchase Cost, Operation & Maintenance Expenses and Return on Equity. The Cumulative Revenue Gap for both the Distribution Companies ending FY 2019-20 is reported as Rs. 1214.67 Crore.

The observations made on the True-up of ARR for FY 2019-20 also apply to the revised ARR for FY 2020-21, which may kindly be considered.

Nigam submits that the revenue gap in the APR for FY 2020-21 arises based on the revised projections which has been computed based on the actual of H1 & projections of H2. Further, Nigam would like to highlight that revenue surplus of Rs 817.09 Cr. of FY 2018-19 has been considered while computing the overall Haryana gap of Rs 276.86 Cr. for FY 2020-21.

In regard to the objector's query on the APR for FY 2020-21, the Petitioner had already given its reply on the same issues for True-up of FY 2019-20 and the same shall be considered for the brevity to the petitioner replies for Annual Performance Review for FY 2020-21.

Chapter 2 Page 70 of 233

The Commission may kindly consider taking necessary corrective measures so that the operational efficiency of the Distribution Licensees is improved by curtailing expenses and to save the consumers from ever increasing burden on their electricity bills.

# III ANNUAL REVENUE REQUIREMENT FOR FY 2021-

The Licensee has projected an Annual revenue Requirement of Rs.18,842.89 Crore for the year 2021-22. A net revenue gap of Rs. 3,041.32 Crore has been projected for both the Distribution Licensees (including gap of True up for FY 2019-20 carried forward).

Some of the main observations on the ARR submissions for FY 2021-22 and a few other suggestions are as under;

#### 1. Estimates for sale of power:

The sales estimates play a very important role in deciding the revenue requirement and the revenue receipts of the Utility and therefore, this assessment has to be undertaken with extra care. Although there was severe impact on the energy sales during FY 2020-21 due to Covid-19 and associated national lockdowns and slow down of economy thereafter, but as of now that phase has passed and industrial production has picked up. Accordingly, instead of going by the traditional CAGR method due diligence should be used to assess the future sales more carefully.

# 2. Estimated sales to Agriculture Consumers:

This is a very important consumer block the energy sales to which is done rather in a lesser scientific manner. A large portion of this power goes to the sector which still gets un-metered power and assessment is made on pure sample basis. Although lot of emphasis is laid at the national level for supply of only metered electricity to the consumers but in Haryana still over 20% of power supply is un-metered.

The present system of taking readings from sample feeder meters is full of flaws. In fact it suits the Distribution Utilities as firstly they are able to show lower distribution losses by passing on a sizeable part of the losses to wards un-metered sale to agriculture tubewells. Moreover, by doing so they are able to raise inflated demand of RE Subsidy.

We would request the Commission to have a field survey and to find out as to how many meters are in working order and how many meters are actually read. As there are no stake-holders in this computation, the Utilities are able to continue with their hide and seek game and unnecessarily burden the State Exchequer by inflated RE Subsidy claims.

# 3. Working of meters installed at Government connections like Lift Irrigation, Street Light, MITC Tubewells and Public Water Works, etc.

The meters installed at majority of these locations are not in working condition and these consumers are billed on the basis of their connected load. This results in over booking of power sales to these categories and these consumers do not bother

The point wise reply of observations on ARR FY 2021-22 is given below:

Nigam submits that sales estimation is based on the 2 to 7 years of CAGR without considering the sales of FY 2020-21. The Commission in previous tariff Orders has approved the CAGR method for sales estimation. The relevant extract is below:

"The Commission has considered the above and is of the view that CAGR of time series data is a realistic estimate; hence, the methodology is in line with the previous order (s) of the Commission.."

Therefore, it is requested to the Commission to continue with the CAGR methodology of sales estimation.

Nigam submits projections of agriculture category consumer sales has been done as per the commission approved methodology. Further, Nigam has issued LOI to M/s Pranat Engineers Pvt. Ltd. vide Memo No. 84/EA-57/2019 dated 26.11.2020 for AP Sales third party authentication and the same been informed to the Commission Vide memo No. Ch. 85/SE/RA-675 dated 02.12.2020, thereafter, Work Order vide Memo No. Ch- 86/EA- 57/2019 dated 10.12.2020 has been issued to M/s Pranat Engineers Pvt. Ltd.. The Period of completion of work is 3 months from date of issuance of Work Order. The report will be submitted to the Commission on its completion.

Nigam submits that meter replacement is a regular activity and the same has being done based on the demand of the consumer/at the time when the meter is found defective. Further, during defective period provisional sales has been assessed as per HERC Supply Code.

Chapter 2 Page 71 of 233

much as they have no direct stake in the electricity charges. The Commission may kindly look into this grey area also so that the sales figures are correctly projected.

# 4. Surplus Power projected in Energy Balance & Inter-State sale:

The Distribution Companies have shown over 10% of the available energy as surplus which is accounted for as sold at the APPC. This is again a grey area where power is being purchased at much higher rates and sold outside the State at lower rates. This puts extra burden on the electricity consumers.

Discoms are required to meet the power requirements of its consumers on 24x7 basis. To meet this objective it has entered into long term PPAs/arrangements. The power remain after meeting the demand of the consumer is sell at APPC rate and the revenue from the same is also passed on to the consumer.

The APPC rate has been computed after considering the power from all the available sources which includes both costlier & cheaper power, therefore, it may not be appropriate to say that surplus power being sold at lower rates.

# 5. Impact of extra purchase on determination of Additional Surcharge:

The surplus power purchased finally affects the need for backing down of generation sources and is tagged as backed down due to the purchase of power by consumers through open access. In fact the Distribution Utilities are themselves responsible for this extra purchase and the burden of Addl. Surcharge is totally uncalled for. Many of the States do not levy such Addl. Surcharge on open access consumers.

Discoms are required to meet the power requirements of its consumers on 24x7 basis. To meet this objective it has entered into long term PPAs/arrangements. In view of the peculiar features of short-term open access, the obligations of the Discom, in terms of existing power purchase commitments, get stranded whenever a consumer avails short term open access, except for the rare situation of notified energy cuts. In merit order of operation, the power at the margin gets stranded. Moreover, since the short term open access is taken only for limited durations depending upon the market rates in particular time slots and Discoms has to meet the requirement of such open access consumers also in all other periods, the power commitments shall continue to get stranded.

In case of short-term open access, the power at the margin in merit order operation gets stranded. The power from such sources involves certain fixed costs which have to be essentially paid by the Discom even if such power is stranded for short durations. Further, additional surcharge levied upon open access consumer as per section 42 of the Electricity Act'03 read with Regulation 22 of HERC (Terms & Conditions for grant of connectivity and open access for intrastate transmission and distribution system) Regulation, 2012.

## 6. Time of Use Tariff:

The Commission has recognized the need for giving surplus power during off-peak hours 09:00 PM to 05:30 AM and a rebate of 15% is given to the consumers availing ToU/ToD tariff. The Foot Note (b) of the ARR order reads as under,

b) The off-peak discount under ToD tariff shall be applicable for power drawn during off peak hours in excess of the normal consumption during the off peak of the corresponding month in the preceding year.

The net effect is that hardly any consumer is able to derive any benefit from this provision. We would urge the Commission to allow this rebate on the entire power consumed during off-peak load hours. By doing so it would be possible to use the surplus power available with the Utility during night hours and benefit the consumers. The Commission may like to align the off-peak rebate accordingly.

Nigam submits that it is prerogative of the Commission to determine the Schedule of Tariff under the MYT Regulation, 2019 and recovery of the same from consumers is binding for the Nigam.

# 7. Reg. 62 of MYT Regulations, 2019:

This Regulation deals with the 'Wheeling Charges'

Nigam submits that wheeling charges recovered from Open Access consumers during FY 2019-20 is already

Chapter 2 Page 72 of 233

to be recovered from open access consumers and reads as under,

62. WHEELING CHARGES

62.1 The consumers availing wheeling services for 'open access', will be charged a wheeling tariff as determined under these Regulation;

62.2 Income from wheeling from open access consumers:

25% of the wheeling charges collected from open access consumers shall be retained by the distribution licensees and the balance 75% shall be adjusted towards reduction of ARR for the retail supply business.

The Commission, vide order dated 01.06.2020, had imposed the distribution wheeling charges on all open access consumers including those connected on 66 kV and higher voltages. The income from these charges should have been shown and dealt with in the DHBVN ARR Filing but no such detail is forthcoming from the ARR filed by DHBVN.

been considered in Non-Tariff Income.

#### 8. Reg. 63 of MYT Regulations, 2019:

The above Regulations reads as under,

63.2 The cross-subsidy surcharge and additional surcharge shall be considered as non-tariff income for retail supply. The licensee shall provide the consumer category-wise details of the cross – subsidy and additional surcharge received during the year along with the tariff filings.

63.3 The distribution licensee shall also submit along with ARR, requisite calculation for determination of cross subsidy surcharge and additional surcharge for consideration of the Commission. The cross-subsidy surcharge and additional surcharge shall be payable as determined by the commission from time to time. The ARR Petition filed by the Distribution Licensee does not provide details as required to be submitted in compliance to the above Regulations.

The Nigam submits that Cross subsidy Surcharge (CSS) & Additional Surcharge (AS) are treated as Non-Tariff Income (NTI) as per provisions of relevant Regulation and booked/ shown in the accounts of discoms accordingly. Further, the Non-Tariff Income (NTI) is also shown separately in the ARR Petition.

#### 9. Reg. 68 of MYT Regulations. 2019:

Reg. 68(3) of MYT Regulations, 2019 reads as under,

68. SUBSIDY

68.1 Pursuant to Section 65 of the Electricity Act, 2003 in case the State Government requires grant of any subsidy to any consumer or class of consumers in the tariff determined under Section 62, the distribution licensee should ensure that the State Government shall, notwithstanding any direction which may be given under Section 108, pay in advance the requisite amount as determined by the Commission to compensate the distribution licensee affected by the grant of subsidy.

68.3 The amount of subsidy agreed to by the State Government may be provided in the form of payment in cash in advance as per section 65 of Electricity Act or by book adjustment of net dues payable by the distribution licensee to the State Government. The book adjustment shall be done on the basis of cash in hand with the distribution licensee and not on an accrual basis in respect of dues to be collected by the distribution licensee from consumers on behalf of the State Government.

Nigam submits that the amount of RE subsidy is determined by the Commission in pursuant to relevant provision of EA'2003. The state government is releasing the subsidy as determined by the Commission to Haryana power discoms on monthly basis.

Chapter 2 Page 73 of 233

The above provision of the Regulations is not being made. Firstly, as we said above, there are apparent errors in calculation of the RE Subsidy to be paid by the State Government and even the amount so determined by the Commission is not being paid in advance, which results in extra financial burden in taking bridge loan for such deficit.

The Commission may kindly take note of the ground reality and take appropriate action.

#### 10. Reg. 69 of MYT Regulations, 2019:

The aforesaid Regulation deals with Inter Category Cross-Subsidy and reads as under:

69 INTER CATEGORY CROSS-SUBSIDY

69.1 The distribution licensee's tariff proposal should reflect the reasonable cost of providing service to each consumer class. In case where tariffs are historically distorted with significant level of cross-subsidy, the aim should be to gradually move to non-cross subsidized tariffs.

69.2 In the annual performance review and tariff application, the distribution licensee shall include a report on how far they have implemented the cross-subsidy reduction trajectory approved by the Commission for reduction of cross-subsidy and the measures being proposed in the current application to implement the plan.

In the ARR filing of DHBVN, no such data/details have been appended. The National Electricity Policy and Tariff Policy, notified by the Government of India give lot of stress on the need for aligning the tariffs of all electricity consumers to their respective actual cost of service. However, in Haryana the cross-subsidizing group of consumers is heavily burdened by way of heavy cross-subsidization to other consumers. For example, as per the last ARR order of Discoms dated 01.06.2020, the HT Industrial consumers are providing cross subsidy of 62 Ps/unit to the crosssubsidized categories of consumers, which is mainly the domestic sector. The Commission may kindly take suitable measures to reduce this cross subsidy in line with the provisions under the above Regulations and save industrial consumers from

this extra burden.

11. Fuel Surcharge to be merged with normal

tariff:

The concept of Fuel Surcharge Adjustment was introduced under the Electricity Act, 2003 to avoid need for frequent amendments in the electricity tariff. But it has become a permanent feature and is continuing since the initiation.

S.62(4) of the Electricity Act, 2003 reads as under, 62(4) No tariff or part of any tariff may ordinarily be amended, more frequently than once in any financial year, except in respect of any changes expressly permitted under the terms of any fuel surcharge formula as may be specified.

Therefore, the Fuel Surcharge Adjustment is to be allowed for mid-year tariff adjustment and not as a perpetual levy. The prevailing FSA should be actually merged into the basic tariff while determining the Distribution Retail tariff for each Financial Year. In case any FSA becomes due

Nigam submits that it is prerogative of the Commission to determine the Tariff under the MYT Regulation, 2019 and recovery of the same from consumers is binding for the Nigam

FSA charges are on account of variation in fuel prices, which is quite difficult to be projected at the start of a financial year. Further, variation in fuel charges are passed on to the Discoms by the power generators and in line with the same and as per HERC MYT Regulations, 2019, Discoms apply Fuel Surcharge Adjustment as a pass- through cost to the consumer on a quarterly basis.

As it is not possible to predict the FSA charges while determining the tariff for a financial year, so FSA may not be merged with the tariff.

Furthermore, the separate head of FSA make the tariff more transparent for the consumers.

Chapter 2 Page 74 of 233

thereafter, a separate levy could be ordered. The Commission may kindly consider this suggestion so that FSA gets reflected in the overall tariff itself.

# 12. Implementation of Haryana Enterprises and Employment Policy, 2020:

The Haryana Government has notified the "Haryana Enterprises and Employment Policy 2020" vide Industries & Commerce Department Notification of 28.12.2020. Through this Policy, the State Government has emphasized the need for fostering 'Ease of doing Business'. Chapter 5 of this Policy reads as under,

"Apart from easing regulations, Haryana has adopted a three-pronged approach for Ease of Doing Business. The State's EoDB strategy is being implemented in three phases i.e. 'Design & Develop', 'Implement &Use' and 'Improve'. The ultimate objective of Haryana's 3 phase strategy is creating a conducive environment for businesses. In an environment, where all states are competing against each other for attracting investments, the role of business facilitation becomes crucial. The Government of Haryana is determined to create an ecosystem in which the Ease of Doing Business matches and even exceeds the best global standards.

Lot of emphasis has been laid in this Policy on the Power Sector facilitating the new investment in the State. Para 5.9 of this policy is dedicated to action plan for 'Power' in the State. This portion of the policy reads as under,

5.9. Power

5.9.1 Rationalising of penalty on exceeding contractual demand: The penalty for exceeding the maximum contract demand may be rationalised from 25% of the total month's electricity consumption to 25% of the day's consumption, where feasible to evaluate the day's electricity consumption.

5.9.2 Competitive power tariffs: Differential power tariff shall be introduced to provide electricity to industrial units at competitive rates during offpeak hours.

5.9.3 Captive Solar Power plants: Permissions for setting up Captive Solar Power plants shall be provided on ongoing basis through single window portal, instead of the existing window-based application process.

5.9.4 Insolvency and Bankruptcy dues: An investor purchasing assets (land/ building/ machinery) of a sick unit, which has filed under the Insolvency and Bankruptcy Code, 2016 from the bank or National Company Law Tribunal, shall not be liable to pay the electricity dues of the sick unit when applying for a new electricity connection if the new investor was not given prior intimation about such dues by the Power Department at the time of purchase of assets.

Para 5.9.1 and 5.9.2 are very relevant while the Commission is dealing with the ARR filing of the Distribution Utilities. We would request the Commission to look into these Policy provisions so that the electricity consumers in the State are

Nigam submits that it is prerogative of the Commission to determine the Tariff under the MYT Regulation, 2012 and recovery of the same from consumers is binding for the Nigam

Chapter 2 Page 75 of 233

largely benefitted.

At present, there is provision for levy of MDI penalty @ 25% of the SOP Charges if the power drawal of the consumer exceeds more than 5% of the contract demand. This is a very heavy levy especially for the industrial consumers and they are sometimes put to very heavy penalty. The instructions read as under,

#### **Contract Demand**

- a) The contract demand means the maximum kW/kVA for the supply of which the Licensee undertakes to provide facilities from time to time.
- b) In case the consumer exceeds his Contract Demand in any month by more than 5%, a surcharge of 25% will be levied on the Sale of Power (SOP)/monthly minimum charges (Industrial, Factory Lighting and Colony Lighting).
- If in any case the maximum demand is being measured in kW, the same shall be converted in KVA by the use of actual power factor.

The Maximum Demand is recorded for an average of 30 Minutes time slots and if the demand of the consumer exceeds this limit of 5% in any of the 30 minutes time slots during the month, the consumer becomes liable to pay huge penalty which is not commensurate with his act of omission. The Commission may kindly consider modification in these instructions and limit the penalty to the particular time slot or at the most that day instead of the entire month.

We would request the Commission to take due cognizance of the above Observations/Comments while finalizing the ARR of Distribution Licensees for FY 2021-22.

# **Commission's Observation**

The Commission has carefully examined the observations on true up, time of Use Tariff and wheeling charges submitted by the intervener and would consider the same while examining the same at the relevant paragraphs of the present Order.

# 2.3.4 Comments of Indian Energy Exchange Limited

#	Particulars	Reply
1	4.1. Levying voltage wise Wheeling Charge &	It is submitted that the Commission has already
	Losses on open access consumers	clarified this issue in Order dated 29.12.2020 in Case
	4.1.1. The Commission in the past tariff orders, has	Nos HERC/RA-6 of 2020, HERC/RA-7 of 2020 &
	determined the wheeling charge and losses for LT	HERC/RA-8 of 2020.
	and HT network as a whole for levying it on the	In the said order, the Commission had already
	open access consumers.	examined the arguments submitted by the review
	4.1.2. The Commission in Regulation 62 of the	petitioners and concluded that the recovery of
	HERC (Terms and Conditions for Determination of	technical losses from the wheeling consumers ought
	Tariff for Generation, Transmission, Wheeling and	to be for the system as a whole and not voltage-wise.
	Distribution & Retail Supply under Multi Year Tariff	The relevant excerpt from the order is reproduced
	Framework) Regulations, 2019, has specified that	herewith:

Chapter 2 Page 76 of 233

the wheeling charge and loss are allowed to be recovered through the approved level of wheeling losses arising from the operation of the distribution system. In the current scenario the HT consumers are not utilising the LT network and therefore levying cost and losses of LT network on the HT consumers is not in line with the abovementioned regulation and in fact HT is cross subsidising LT.

4.1.3. Since the distribution systems at HT Level and LT level are at different voltage level therefore, taking into account cost of both HT and LT network, for the purpose of computing Wheeling Charge is resulting into burden of LT charges on the consumers at HT level.

4.1.4. The Hon'ble Appellate Tribunal of Electricity has in plethora of judgements (Judgement dated 17.12.2014 in Appeal Nos. 142 of 2013 & 168 of 2013 between M/s Mawana Sugar Ltd Versus Punjab State Electricity Regulatory Commission and Punjab State Power Corporation Ltd.) has held that the wheeling charges and losses must be computed voltage wise. The Hon'ble APTEL has emphasised on the necessity of imposing voltage wise wheeling losses and charges on the open access consumers.

4.1.5. In the absence of voltage wise breakup of the wheeling ARR, it is suggested that the Commission may consider the LT/HT sales ratio to allocate cost and determine the charges separately.

4.1.6. Voltage wise losses and charges will lead to recovery of appropriate charges from the consumer, thereby not rendering the competition ineffective.

from the Electricity Act, 2003, as also the definition of Distribution system as provided in the Electricity Rules, 2005. The Commission observes that, drawing support from the relevant provisions of the Electricity Act, 2003, and the Electricity Rules, 2005, this Commission has already, vide order dated 17.06.2020 in PRO 11 of 2017, deliberated on the recovery of technical losses from consumers for usage of Distributions System at all and any voltage level as below: "The Commission observes that the Electricity Rules, 2005 defines a distribution system as "4. Distribution System.- The distribution system of a distribution licensee in terms of sub-section (19) of section 2 of the Act shall also include electric line, sub-station and electrical plant that are primarily maintained for the purpose of distributing electricity in the area of supply of such distribution licensee notwithstanding that such line, substation or electrical plant are high pressure cables or overhead lines or associated with such high pressure cables or overhead lines; or used incidentally for the purposes of transmitting electricity for others". Hence, it can be seen from the ibid Rules that a distribution system also includes high pressure cables used for transmitting electricity. Accordingly, the Commission is of the considered view that the recovery of technical losses from the wheeling consumers ought to be for the system as a whole and not voltage wise. The review of HERC Order dated 01.06.2020 on this issue is denied.

"The Commission has also considered the argument

put forth by the respondent discom drawing support

"Hence, the current objection raised by the objector does not hold any merit in that context.

# 2 4.2. Levy of wheeling charge on STU connected open access consumers

4.2.1. The Commission, vide the Tariff Order dated 01.06.2020 has approved levy of Wheeling Charges @ Rs. 0.47/unit on the consumers of Discoms drawing power at 66 kV and above.

4.2.2. It is humbly submitted that the aforementioned judgement of the Hon'ble APTEL (Judgement dated 17.12.2014 in Appeal Nos. 142 of 2013 & 168 of 2013) clearly provides that if a consumer is availing supply at transmission network, it implies it is not utilising the distribution network of the distribution licensee and in such a case, no wheeling charges ought to be levied on such consumers.

4.2.3. In Haryana, the consumers above 66 kV are connected with the STU and are not using the distribution system of the Discoms. The non-availability of discom network at and above 66 kV level also manifests from the gazette notification dated 1.7.1999 of the Haryana Electricity Reform (Transfer of Distribution Undertakings from Haryana Vidyut Prasaran Nigam Ltd. to Distribution Companies) Scheme, 1999 which in the definition of "(g) distribution system" and "(w) transmission system" provides for the segregation of assets between the distribution (upto 33 kV) and transmission system (at and above 66 kV) in the

It is submitted that the Commission has already addressed this issue in Order dated 29.12.2020 in Case Nos HERC/RA-6 of 2020, HERC/RA-7 of 2020 & HERC/RA-8 of 2020. In the said order, the Commission had already examined the arguments submitted by the review petitioners and concluded that all the open access consumers are to pay wheeling charges, irrespective of the voltage level at which they are connected. The relevant excerpt from the order is reproduced herewith:

"The Commission has examined the arguments put forth by the review petitioners and observes that the open access regulations quoted by the petitioners, empower the Commission to calculate and levy wheeling charges on the open access consumers of the Distribution licensee. An examination of the impugned regulations makes it clear that the regulations prescribe levy of separate wheeling charges for use of transmission system and for the Distribution system. Regulation 19(2) deals with the levy of charges for the use of transmission system of the transmission licensee(s) and regulation 19 (3) for the use of Distribution System. The regulation also prescribes the methodology of calculation of such wheeling charges separately for the short-term open access consumers and for the medium and long-term open access consumers. The regulations further prescribe the methodology for calculation of charges for those

Chapter 2 Page 77 of 233

state of Haryana. (A copy of notification dated 01.07.1999 is attached).

4.2.4. In view of the above, levy of wheeling charges on such consumers may kindly be reviewed by the Commission.

consumers where a dedicated distribution system has been constructed for exclusive use of an open access consumer at the cost of the licensee and for consumers other than those for whom a dedicated distribution system has been constructed for exclusive use of an open access consumer at the cost of the licensee.

Thus, upon examination of the open access regulations, it is apparent that all consumers who are availing open access from the Distribution Licensees, are obliged to pay for use of the distribution system of the Distribution Licensee in accordance with the relevant regulations. Though different methodology of recovery is prescribed, no waiver is prescribed for any type of distribution consumer; be it at any voltage level. Accordingly, on an examination of the relevant regulations it is held that all open access consumers are to pay wheeling charges, irrespective of the voltage level at which they are connected. Further, since none of the open access consumers are availing medium term or long-term open access, where the levy of the wheeling charges has to be calculated in Rs/MW, the Commission has continued to calculate the wheeling charges based on Energy. In view of the above discussions, the review sought on this account is denied.

"Hence, the current objection raised by the objector does not hold any merit in that context.

- 4.3. Power Purchase from Market/ Short-term
  - 4.3.1. Power Exchange as part of the Merit Order Despatch
  - a) Considering the advantages of competitive rates in power market/exchanges, the Licensees may utilise them and optimise their power purchase costs. It is suggested that the HERC may consider formalising the optimisation through market by evolving appropriate procedure for considering short term market rates while finalising the Merit Order of the Discoms.
  - b) It is submitted that on the similar grounds, the UPERC has recently issued the Draft Merit Order Despatch and Power Purchase Optimization Regulations, 2020, wherein it is mandated to consider the opportunities in the market while procuring power. Extract of the relevant section is produced below:
  - "6. GENERAL PRINCIPLES FOR DISPATCH SCHEDULING
  - h. Opportunities in the market- the distribution licensee should not only consider the contracted generation through PPAs at its disposal but also the existing market opportunities for purchasing power during deficit scenarios or replacing costlier generation after taking into account the market scenario, in order to optimize overall power procurement cost."
  - c) In view of the above, the Commission may consider evolving appropriate framework by which the STOA/Power Exchange rates can be considered as a part of the merit order of Discom. This proposal will not cause any loss to the Discom in any circumstances since the bids are cleared on the Power Exchange only when the prices are less than quoted price and in case if bids are not

It is pertinent to mention that Merit Order Dispatch methodology has been prepared on the basis of variable cost quoted by the Generators for immediately preceding month along with the transmission losses notified by PGCIL. However, in case of power exchanges, the price of power is dependent on the real time demand supply scenario and experiences considerable variation. Thus, it is not feasible for Discoms to consider these prices while arriving at MOD schedule as the actual power price on exchange can vary widely.

Nonetheless, Discoms are already catering to the short-term power requirement through power exchanges, RTM, and DEEP portal as and when required to reduce the overall power purchase cost. For FY21 (up to Dec'20), Haryana Discoms have purchased a total of 1871 MUs from power exchanges (including 243.5 MUS of RTM but excluding GTAM). Whereas, around 166 MUs have been procured from the GTAM market for fulfilling portion of the RPO obligations of the Discom.

With regards to meeting renewable power purchase obligations, as mentioned above, Haryana Discoms are already procuring power from GTAM market. This is already mentioned by the objector itself in its submission (Haryana being one of the key participants in GTAM market).

Chapter 2 Page 78 of 233

cleared at the desired rates, they can always call upon the dispatches from their tied-up stations under long term PPA. This will be a win-win situation for the Discom as well as the consumers of the state. 4.3.2. Renewable power from the G-TAM market It is necessary to bring to the notice of the Commission that the Discoms have the option to fulfil their existing RPO obligations as well as the targets in forthcoming years by procuring RE power through the GTAM market also. Following is further submitted in this regard: Green Term Ahead Market (GTAM) was introduced during FY 21 at IEX platform w.e.f. 21.08.2020 wherein Solar and Non-Solar renewable energy is being transacted in four contracts namely intra-day, Dav Ahead contingency, Daily and Weekly. The buyers of this market can fulfil their respective RPOs. The introduction of GTAM has opened avenues for the development of organized renewable energy market to provide an alternate market-based route to the RE generators to sell their green power and to the buyers to fulfil their RPO at competitive price with flexibility of entry and exit in the market. c) The market has witnessed an encouraging response since launch and has registered trade of around 550 MUs since launch. A total of around 20 customers participated in the new market segment during the month. The key participants included distribution utilities of Haryana, Maharashtra, Karnataka, Telangana, Bihar, Daman and Diu, Dadra and Nagar Haveli, DVC, CESC and generators like Amplus Green Power Pvt. Ltd., open access consumers such as Jindal Stainless Ltd., Dalmia Cement, amongst others. It is a market-based mechanism where RE surplus and RE deficit states trade RE power and balance their RPO targets. The Commission may therefore allow an explicit provision of RE power purchase through GTAM market to the Discom.

### **Commission's Observation**

The Commission has carefully examined the observations on levy of wheeling charges and losses on the open access consumers of the Discoms and is of the considered view that so long they remain consumers of the Discoms, certain charges are required to be paid by them in accordance with the relevant regulations.

# 2.3.5 Objections filed by Sh. Gaurav Saini, Saini Power Transactor

#	Particulars	Reply
1	Determination of Wheeling Charges for Embedded	It is submitted that the Commission has already
	open access consumers getting power supply at 66	addressed this issue in Order dated 29.12.2020 in
	kV and higher voltages	Case Nos HERC/RA-6 of 2020, HERC/RA-7 of 2020
	It is formed that the distribution system network cost	& HERC/RA-8 of 2020. In the said order, the

Chapter 2 Page 79 of 233

of ₹. 0.47 per unit imposed on embedded open access consumers of the DISCOM's drawing power at 66kV or above is totally wrong and is against the Haryana Govt. Notification No. S.O. 109/H.A.10/98/S.231/98 dated 14th August 1997

Schedule B 1(A) and Haryana Govt. Notification No. S.O. 156/H.A. 10/98/Ss 23, 24, 25 and 55/99 dated 1st July 1999.

In the order against case no. Case Nos. HERC/RA-6 of 2020, Case Nos. HERC/RA-7 of 2020, Case Nos. HERC/RA-8 of 2020 on page no. 39 the DISCOM's reply has been mentioned which is

a) It is submitted that the grievance of the Petitioner is mis-founded. In this regard, reliance is placed on the definition of distribution system provided under section 2 (19) of the Electricity Act 2003 which states that distribution system is the system of wires and associated facilities between delivery points on the transmission lines or the generating station and the point of connection to the consumers. Relevant excerpt of section 2 (19) is reproduced here as under: "distribution system" means the system of wires and associated facilities between the delivery points on the transmission lines or the generating station connection and the point of connection to the installation of the consumers;"

- b) In view of the above, any system of wires & associated facilities between the transmission lines/generating station and point of connection to the consumer are the part of the distribution system. Thus, system of wires and associated facilities for connections at 66 KV & above voltage level between STU and point of connection at the consumer installation are the part of distribution system and open access consumers connected at such voltage level are utilising distribution system for respective consumption through open access.
- c) Further, the definition of Distribution System as provided in Electricity Rules, 2005 categorically includes high pressure cables.
- "4. Distribution System.- The distribution system of a distribution licensee in terms of sub-section (19) of section 2 of the Act shall also include electric line, substation and electrical plant that are primarily maintained for the purpose of distributing electricity in the area of supply of such distribution licensee notwithstanding that such line, substation or electrical plant are high pressure cables or overhead lines or associated with such high pressure cables or overhead lines; or used incidentally for the purposes of transmitting electricity for others"
- d) In a similar situation in the case of Northern Railways in PRO 66 of 2017 the Commission had observed as under:

"The Commission observes that the Electricity Rules, 2005 defines a distribution system as "4. Distribution System.- The distribution system of a distribution licensee in terms of sub-section (19) of section 2 of the Act shall also include electric line, sub-station and electrical plant that are primarily maintained for the purpose of distributing electricity in the area of supply of such distribution licensee notwithstanding that such line, substation or electrical plant are high pressure

Commission had already examined the arguments submitted by the review petitioners and concluded that all the open access consumers are to pay wheeling charges, irrespective of the voltage level at which they are connected. The relevant excerpt from the order is reproduced herewith:

..

The Commission has examined the arguments put forth by the review petitioners and observes that the open access regulations quoted by the petitioners, empower the Commission to calculate and levy wheeling charges on the open access consumers of the Distribution licensee. An examination of the impugned regulations makes it clear that the regulations prescribe levy of separate wheeling charges for use of transmission system and for the Distribution system. Regulation 19(2) deals with the levy of charges for the use of transmission system of the transmission licensee(s) and regulation 19(3) for the use of Distribution System. The regulation also prescribes the methodology of calculation of such wheeling charges separately for the short-term open access consumers and for the medium and long-term open access consumers. The regulations further prescribe the methodology for calculation of charges for those consumers where a dedicated distribution system has been constructed for exclusive use of an open access consumer at the cost of the licensee and for consumers other than those for whom a dedicated distribution system has been constructed for exclusive use of an open access consumer at the cost of the licensee.

Thus, upon examination of the open access regulations, it is apparent that all consumers who are availing open access from the Distribution Licensees, are obliged to pay for use of the distribution system of the Distribution Licensee in accordance with the relevant regulations. Though different methodology of recovery is prescribed, no waiver is prescribed for any type of distribution consumer; be it at any voltage level. Accordingly, on an examination of the relevant regulations it is held that all open access consumers are to pay wheeling charges, irrespective of the voltage level at which they are connected. Further, since none of the open access consumers are availing medium term or long-term open access, where the levy of the wheeling charges has to be calculated in Rs/MW, the Commission has continued to calculate the wheeling charges based on Energy. In view of the above discussions, the review sought on this account is denied.

"

Hence, the current objection raised by the objector does not hold any merit in that context.

Chapter 2 Page 80 of 233

cables or overhead lines or associated with such high pressure cables or overhead lines; or used incidentally for the purposes of transmitting electricity for others" Hence, it can be seen from the ibid Rules that a distribution system also includes high pressure cables used for transmitting electricity. The Commission after due deliberations is of the considered view that NR, as a Medium-Term Open Access consumer, as per the ibid Rules is using, incidentally, the distribution system of UHBVNL and DHBVNL. NR is not an embedded Open Access Consumer. Hence, wheeling charges determined by the Commission are not recoverable from NR. However, NR is liable to bear, besides intra state transmission loss, the distribution system network cost as determined by the Commission for the relevant year i.e. Rs. 0.47 per Unit for FY 2020-21 in the ARR/Tariff order of HVPNL (STU)."

- e) Hence, levying of distribution system network cost on embedded open access consumers taking supply at 66 KV or above is in line with the provisions of the Electricity Act 2003. In any case, revenue from open access charges are accounted for in the ARR as per the provisions of the HERC MYT Regulations, 2019.
- f) The contention of the Review Petitioner that since no such issue was raised or proposed by the respondents/DISCOM therefore such levy is an error is completely incorrect. It is submitted that the Commission has suo-moto powers in terms of Section 61 (d) of the Electricity Act and regulation 12 of Haryana Electricity Regulatory Commission (Conduct of Business) Regulations, 2019. Thus, there is no error on the part of the Commission.

The justification given by the DISCOM's is totally wrong as this definition cannot be read alone and it must be read along with several definitions which are: Central Transmission Utility as per Electricity act Section (2) (10)

"Central Transmission Utility" means any Government company which the Central Government may notify under sub-section (1) of section 38;

Distribution Licensee as per Electricity act Section (2) (17)

"distribution licensee" means a licensee authorised to operate and maintain a distribution system for supplying electricity to the consumers in his area of supply;

Inter-State Transmission System as per Electricity act Section (2) (36):

inter-State transmission system" includes -

- i. any system for the conveyance of electricity by means of main transmission line from the territory of one State to another State;
- ii. the conveyance of electricity across the territory of an intervening State as well as conveyance within the State which is incidental to such inter-State transmission of electricity;
- iii. the transmission of electricity within the territory of a State on a system built, owned, operated, maintained or controlled by a Central Transmission Utility.

Intra-State Transmission System as per Electricity act Section (2) (37)

"intra-State transmission system" means any system

Chapter 2 Page 81 of 233

for transmission of electricity other than an inter-State transmission system;

State Transmission Utility as per Electricity act Section (2) (67)

"State Transmission Utility" means the Board or the Government company specified as such by the State Government under sub-section (1) of section 39;

Section (2) (76) Wheeling

"wheeling" means the operation whereby the distribution system and associated facilities of a transmission licensee or distribution licensee, as the case may be, are used by another person for the conveyance of electricity on payment of charges to be determined under section 62;

Section 38. (Central Transmission Utility and functions) (1) The Central Government may notify any Government company as the Central Transmission Utility:

Provided that the Central Transmission Utility shall not engage in the business of generation of electricity or trading in electricity:

Provided further that the Central Government may transfer, and vest any property, interest in property, rights and liabilities connected with, and personnel involved in transmission of electricity of such Central Transmission Utility, to a company or companies to be incorporated under the Companies Act, 1956 to function as a transmission licensee, through a transfer scheme to be effected in the manner specified under Part XIII and such company or companies shall be deemed to be transmission licensees under this Act.

Section 39. (State Transmission Utility and functions)
(1) The State Government may notify the Board or a Government company as the State Transmission

Provided that the State Transmission Utility shall not engage in the business of trading in electricity:

Utility:

Provided further that the State Government may transfer, and vest any property, interest in property, rights and liabilities connected with, and personnel involved in transmission of electricity, of such State Transmission Utility, to a company or companies to be incorporated under the Companies Act, 1956 to function as transmission licensee through a transfer scheme to be effected in the manner specified under Part XIII and such company or companies shall be deemed to be transmission licensees under this Act.

The definitions of Distribution Licensee and State Transmission Utility is clearly mentioned in the Electricity Act. Moreover, the electricity act says that the "The State Government may notify the Board or a Government company as the State Transmission Utility." And

"PART IV Section 12 along with Section 14 Appropriate Commission may, on an application made to it under section 15, grant a licence to any person -

- (a) to transmit electricity as a transmission licensee; or
- (b) to distribute electricity as a distribution licensee; or
- (c) to undertake trading in electricity as an electricity trader,"

Haryana Government vide it's Notification No. S.O. 109/H.A.10/98/S.231/98 dated 14th August 1998 under section 55 read with sections 23, 24 and 25 of

Chapter 2 Page 82 of 233

Haryana Electricity Reform Act, 1997 (Act 10 of 1998) transferred the undertakings, assets, properties, liabilities, proceedings and personnel of Haryana State Electricity Board to Haryana Power Generation Corporation Limited (Genco) and Transmission Corporation of Haryana Limited (Transco) [registered as Haryana Vidyut Prasaran Nigam Limited]

Classification of assets, liabilities and proceedings (under section 23 and 55)

- a. Generation Undertakings as specified in schedule A and
- b. Transmission and distribution undertaking as specified in schedule B

Section B: Transmission Undertaking

The transmission undertaking shall comprise of all assets, liabilities and proceedings of the board other than those including in Schedule 'A'. Such Assets, liabilities and proceedings forming part of this schedule shall not include but not limited to the following:

Transmission Assets:

"All Transmission lines with towers/H. poles of voltage 66kV, 132kV, 220kV, on double circuit/single circuit/single circuit on doble circuit towers with grid Sub-station of various capacities with all associated and related equipment's, including step-down transformers, circuit breakers metering arrangements and other protective devices with power-line communication system, allied control rooms, lands building, roads and other auxiliary assets spread over within and outside the territory of the state including such assets under construction and assets required, transferred or rights of which were vested with the board by transfer, sale, lease or otherwise but excluding such constructions or installation lawfully owned and operated by others."

**Distribution Assets** 

"All 33kV, 11kV, L.T. (single phase 2 wires to 3 phase 5 wires) lines (with overhead lines and underground cables on different types of supports with various sizes of conductor and step-up/step-down transformers, breakers, protective and metering devices and control rooms, testing laboratories, lands buildings, roads, , diesel generating sets and other conventional and non-conventional generating units, service connections and installation inside consumer's premises, street lighting and signal systems, owned by or leased to the boards but excluding fitting fixtures and installation owned by private persons or local authorities"

Haryana Government Vide it's Notification No. S.O. 156/H.A. 10/98/Ss 23, 24, 25 and 55/99 dated 1st July 1999, makes the transfer of distribution undertakings of Haryana Vidyut Prasaran Nigam Limited to Distribution Companies i.e. Uttar Haryana Bijli Vitran Nigam Limited and Dakshin Haryana Bijli Vitran Nigam Limited under Haryana Electricity Reform (Transfer of Distribution Undertaking from Haryana Vidyut Prasaran Nigam Limited to Distribution Companies) Scheme 1999 under Section 2(1)(g) defines Distribution system as:

"Any system consisting mainly of cables, service lines and overhead lines, electrical plant and meter having

Chapter 2 Page 83 of 233

designed voltage of 33kV, 11kV, L.T. (single phase 2wires to 3 phase 3 or 4 wires) lines with overhead lines and underground cables on different types of supports with various sizes of conductor and step-up and step-down transformers, breakers, protective and metering devices, control rooms, testing laboratories, used exclusively or primarily for the transportation of electricity from a transmission system or Generating Set or other points to the point of delivery to end users taking any supply of electricity at voltage of 33kV or under, and includes lands, buildings, roads, diesel generating sets and other conventional and nonconventional generating units, service connections and installation, street lighting and signal systems, any electrical plant and meters which are employed, deployed and/or used in connection with the distribution of electricity but shall not include any part of the Transmission System"

Now by imposing distribution system network cost on consumers connected on 66kV and above voltage level to totally wrong and goes directly against the Haryana Govt. Notification S.O. 109/H.A.10/98/S.231/98 dated 14th August 1997 and Notification S.O. 156/H.A. 10/98/Ss 23, 24, 25 and 55/99 dated 1st July 1999. If such charge is imposed again then it would imply that the motive for which the commission was established in the first place has failed because one can only charge from someone else only when the first person owns, operates and manages an asset. When someone else owns an asset and some other person charges for those assets then it becomes a fraud. But Irony is that the State Transmission licensee is also charging ₹. 0.24/unit from open access consumer and the State Distribution companies are also charging ₹. 0.47 for using the same network and ultimately the open access consumer is the one who is suffering the most in this case and the state transmission utility and DISCOM's have made it a monopolistic market by ganging up on the open access consumer.

The most shocking part to me was that the State Electricity Regulatory Commission is supporting such as rhetoric, the single judicial body that was appointed to prevent and punish such person conducting the act.

# 2 Determination of Additional Surcharge

The Commission has correctly observed that given the long-term commitment of power purchase of the Discoms to meet its universal service obligation to supply power on demand, in the short to medium term, some quantum of power will continue to be stranded as the variation in consumption varies widely in a day and more in different seasons. To carter the demand of the consumers the Discoms have to enter into PPA for more power than required in order to ensure energy security and readily power availability and also to meet short to medium term power demand growth. By doing so there will always be power that will be stranded.

The MYT Regulations, 2012 (regulation 22) provides as under:-

"Additional Surcharge:-

An open access consumer, receiving supply of electricity from a person other than the distribution licensee of his area of supply, shall pay to the

It is submitted that this matter of additional Surcharge is not a part of the current ARR Petition. The Discoms are filing separate petition for approval of additional surcharge in accordance with the direction of the Commission. So, the objection of the intervener may not be dealt in the current ARR petition.

Further, As per the HERC MYT Regulations 2019, to ensure that the surrendered power stranded only due to the open access consumers is considered for the determination of additional surcharge, the lower of the open access power and the surrendered power in MW in each 15 minutes time slot is taken into account to calculate the average stranded power in MW for each month.

The matter and the methodology of calculating Additional Surcharge was also discussed in detail in various cases by the Commission i.e. in HERC/PRO 40 of 2019, HERC/PRO-14 of 2016, and HERC/PRO-5 of 2015. The Commission had dealt at length

Chapter 2 Page 84 of 233

distribution licensee an additional surcharge in addition to wheeling charges and cross-subsidy surcharge, to meet out the fixed cost of such distribution licensee arising out of his obligation to supply as provided under sub-section (4) of Section 42 of the Act.

Additional Surcharge shall become applicable only if the obligation of the licensee in terms of power purchase commitments has been and continues to be stranded or there is an unavoidable obligation and incidence to bear fixed costs consequent to such a contract.

It clearly specifies that the additional surcharge is to recover the fixed costs consequent to such a contract but the whole burden cannot be put alone on open access consumer due to which charges are calculated on per unit basis, but the methodology for calculating such surcharge is not correct.

Commission in its order in Case No. HERC/PRO - 59 of 2019 & HERC/PRO - 60 of 2019 on page no. 1.23 prescribed the Revised Revenue Estimations for FY2020-21

Revised Revenue Estimations for FY2020-21 (Rs. Crores)								
Sr.		UHB	VN	DHB	VN			
No.	Category	MYT Projection	Revised Projection	MYT Projection	Revised Projection			
1	Domestic	2214.36	2280.59	3436.69	3844.12			
2	Non- Domestic	1050.22	683.73	2475.71	1593.14			
3	HT Industry	3923.71	2534.22	5133.64	3044			
4	LT- Industry	702.07	451.45	790.3	474			
5	Lift Irrigation	49.76	46.79	168.69	158.02			
6	AP Sales	18.43	18.43	35.91	35.91			
7	Bulk Supply	206.86	210.61	598.69	699.63			
8	Railways	6.14	4.17	77.27	39.61			
9	Street Light	66.91	66.12	82.64	67.85			
10	MITC	2.5	3.61	-	-			
11	PWW	369.42	372.45	576.24	549.11			
12	Total Energy Charges	8610.38	6672.16	13375.78	10505.39			
13	Fixed Charges	896.91	881.89	1412.05	1379.76			
14	Revenue Billed	9507.29	7554.05	14787.83	11885.15			
15	Collection Efficiency	0.995	0.99	0.995	0.99			
16	Revenue Realised	9459.75	7478.51	14713.89	11766.3			

In Section 4.10 Power Purchase Cost on page no. 173 of the same order Commission approved the FY 2020-21 Power Purchase Quantum and Cost.

In Section 4.10 Power Purchase Cost on page no. 173 of the same order Commission Approved the FY 2020-21 Power Purchase Quantum and Cost.

	HERC Approved FY 2020-21 Power Purchase Quantum and Cost										
Source		Quant um		Fixed Charg es	Energy Charge s	Energy Charge s	TOT AL PPC				
		ми	Rs Million	Rs / kWh	Rs / kWh	Rs. Million	Rs. Mill ion				
	Singrauli STPS	1,322.00	₹996.05	₹ 0.75	₹ 1.47	₹1,943.34	₹2,93 9.39				
J	Rihand STPS I	423.6 1	₹414.98	₹ 0.98	₹ 1.41	₹ 597.28	₹1,01 2.27				
NTP	Rihand II TPS	371.4 7	₹318.82	₹ 0.86	₹1.41	₹ 523.77	₹ 842.6 0				
	Rihand III	365.2 8	₹621.03	₹1.70	₹ 1.43	₹ 522.35	₹1,14 3.38				

almost all the legal issues and objections raised by the interveners in above mentioned cases. The same methodology, as decided by the Commission in above cases, is being followed by Discoms for filing the petition of Additional Surcharge. Hence, the understanding of the objector is not aligned with the same.



	Unchhaha r TPS I	58.43	₹ 88.75	₹1.52	₹ 3.68	₹ 215.02	₹ 303.7 7	
	Unchhaha r TPS II	122.2	₹172.66	₹1.41	₹ 3.72	₹ 454.63	₹ 627.2 9	
	Unchhaha r TPS III	71.00	₹119.38	₹1.68	₹ 3.69	₹ 261.99	₹ 381.3 7	
	Unchhaha r TPS IV	224.4	₹123.06	₹ 0.55	₹ 3.42	₹ 767.48	₹ 890.5	
	Anta CCPP	5.25	₹124.20	₹23.66	₹ 4.95	₹ 26.00	4 ₹ 150.2	
	Auraiya CCPP	10.95	₹186.75	₹17.05	₹ 4.53	₹ 49.60	0 ₹ 236.3	
	Dadri CCPP	38.44	₹177.06	₹4.61	₹ 3.72	₹142.98	5 ₹ 320.0	
	Faridabad CCPP	393.9 0	₹2,553.34	₹ 6.48	₹ 3.78	₹1,488.94	4 ₹4,04	
	Farakka STPS	66.71	₹ 69.85	₹1.05	₹ 2.50	₹ 166.78	2.29 ₹ 236.6	
	Kahalgaon I STPS	158.8 5	₹200.72	₹1.26	₹ 2.29	₹ 363.77	3 ₹ 564.4 9	
	Kahalgaon	442.6	₹601.57	₹1.36	₹ 2.18	₹ 964.93	₹1,56	
	Kol Dam	301.4	₹1,046.70	₹3.47	₹ 2.78	₹ 837.89	6.50 ₹1,88	
-	Salal I HPS	431.8	₹843.01	₹1.95	₹ 0.71	₹ 306.59	4.60 ₹1,14	
	Bairasiul HPS	159.9 9	₹118.18	₹0.74	₹ 0.99	₹ 158.39	9.60 ₹ 276.5 7	
	Tanakpur HPS	25.09	₹ 58.27	₹ 2.32	₹ 1.79	₹ 44.91	7 ₹ 103.1 9	
	Chamera I HPS	323.4 8	₹355.19	₹1.10	₹ 1.22	₹ 394.64	₹ 749.8	
	Chamera II HPS	72.61	₹ 95.22	₹1.31	₹ 1.09	₹ 79.15	3 ₹ 174.3	
	Chamera-	79.93	₹233.97	₹ 2.93	₹ 2.30	₹ 183.84	7 ₹ 417.8 1	
NHPC	Dhauligan ga HPS	54.72	₹ 85.20	₹1.56	₹ 1.32	₹72.23	₹ 157.4 3	
	Dulhasti HPS	104.8	₹346.87	₹3.31	₹ 2.97	₹ 311.38	₹ 658.2 4	
	Uri I HPS	136.9 4	₹203.55	₹1.49	₹ 0.90	₹ 123.24	₹ 326.7 9	
	Uri-II HPS	62.61	₹305.16	₹4.87	₹ 2.63	₹ 164.66	₹ 469.8 2	
	Sewa II HPS	25.40	₹ 89.90	₹ 3.54	₹ 2.38	₹ 60.44	₹ 150.3 4	
	Parbati-III HPS	56.24	₹135.87	₹2.42	₹ 1.68	₹94.49	₹ 230.3 5	
SIVNL	SJVNL (Nathpa Jhakri) HPS	283.2	₹418.93	₹1.48	₹ 1.63	₹461.66	₹ 880.5 9	
S	Rampur HPS	69.00	₹178.70	₹2.59	₹ 2.09	₹144.21	₹ 322.9 1	
20	Tehri (THDC) HPS	210.8 7	₹617.36	₹2.93	₹ 2.86	₹ 603.09	₹1,22 0.44	
THDC	Koteshwa r HPS	48.35	₹ 113.10	₹2.34	₹ 2.48	₹ 119.90	₹ 233.0 1	
	NAPP (Narora)	195.3 5	₹8.76	₹0.04	₹ 3.32	₹ 648.57	₹ 657.3 2	
NPCIL		545.0 0	₹ 28.23	₹ 0.05	₹ 3.81	₹2,076.45	₹2,10 4.68	
	HPGCL (as per HERC Order)	8.32	₹13,175.4 9	₹ 0.79	₹ 3.64	₹60,845.4 4	₹74,0 20.93	
р	ввмв	2,868. 04	₹1,648.36	₹ 0.57	₹ 0.00	₹ 0.00	₹1,64 8.36	

Chapter 2 Page 86 of 233

1	1			1	ı	1	70	1
	Mejia TPS	491.4 5	₹926.95	₹1.89	₹ 2.98	₹1,464.52	₹2,39 1.48	
DVC	Koderma TPS	417.0 0	₹1,151.60	₹ 2.76	₹ 3.00	₹1,251.00	₹2,40 2.60	
	Raghunat hpur TPS	689.0 0	₹488.84	₹0.71	₹ 3.00	₹2,067.00	₹2,55 5.84	
UMPP	CGPL Mundra UMPP TPS	2,509. 80	₹2,361.82	₹ 0.94	₹ 2.00	₹5,019.60	₹7,38 1.42	
5	Sasan UMPP TPS	3,278. 25	₹623.98	₹0.19	₹ 1.30	₹4,261.73	₹4,88 5.70	
	Tala, HPS	45.07	₹1.36	₹0.03	₹ 2.24	₹ 100.96	₹ 102.3	
	PTC GMR Kamalang a TPS	1,963. 42	₹2,867.01	₹1.46	₹1.71	₹3,357.45	2 ₹6,22 4.46	
	PTC Baglihar HPS J&K	263.7 2	₹13.74	₹ 0.05	₹ 3.86	₹1,017.96	₹1,03 1.70	
	PTC Lanco Amarkant ak TPS	1,931. 12	₹2,810.77	₹1.46	₹ 2.12	₹4,093.97	₹6,90 4.75	
Ş	PTC Karcham wangtoo HPS	1,235. 40	₹3,176.57	₹2.57	₹ 1.96	₹2,421.38	₹5,59 7.95	
Others	IGSTPP, Jhajjar (Aravali) TPS	2,671. 98	₹8,274.36	₹3.10	₹ 4.05	₹10,821.5 2	₹19,0 95.88	
	Pragati Power CCPP	87.63	₹982.42	₹11.2 1	₹ 4.48	₹ 392.58	₹ 1,375. 00	
	Adani Power Ltd. TPS	8,544. 86	₹9,498.48	₹1.11	₹ 2.66	₹22,729.3 3	₹32,2 27.81	
	Teesta III HPS	0.00	₹ 0.00	#DIV/ 0!	₹ 0.00	₹ 0.00	₹ 0.00	
	MGSTPS, CLP, Jhajjar TPS	5,674. 06	₹8,365.05	₹1.47	₹ 3.78	₹21,447.9 5	₹29,8 12.99	
	Gati/Dans /Shiga/IA HPS	1,374. 11	₹ 76.80	₹ 0.06	₹ 4.14	₹5,688.82	₹ 5,765. 61	
	Bhoruka HPS	29.14	₹ 0.00	₹ 0.00	₹ 3.17	₹ 92.37	₹ 92.37	
	P&R Gogripur HPS	9.71	₹ 0.00	₹ 0.00	₹ 3.96	₹ 38.45	₹ 38.45	
	Puri Oil Mill HPS	13.59	₹ 0.00	₹0.00	₹ 3.68	₹ 50.01	₹ 50.01	
	Biomass Projects	217.1	₹0.00	₹0.00	₹ 8.64	₹1,876.09	₹ 1,876. 09	
	Cogenerat ion Plants	290.5 7	₹ 0.00	₹ 0.00	₹ 5.31	₹1,542.93	₹ 1,542. 93	
	Solar Projects (JNNSM)	16.27	₹ 0.00	₹0.00	₹ 5.67	₹92.25	₹ 92.25	
	Siwana Solar	8.32	₹ 0.00	₹0.00	₹ 6.21	₹51.67	₹ 51.67	
ower		1.66	₹ 0.00	₹0.00	₹ 5.65	₹ 9.38	₹ 9.38	
Renewable Power	JBM Solar	33.28	₹ 0.00	₹ 0.00	₹ 5.67	₹ 188.70	₹ 188.7 0	
Ren	HPGCL Solar	16.64	₹ 0.00	₹ 0.00	₹ 4.88	₹81.20	₹ 81.20	1
	SECI (weighted average of 5.50 & 2.51)	667.2 7	₹ 0.00	₹0.00	₹ 3.15	₹2,101.90	₹ 2,101. 90	
	Wind Power	2,284. 88	₹ 0.00	₹ 0.00	₹ 2.71	₹6,192.02	₹ 6,192. 02	
	Waste to Energy (JBM)	22.15	₹ 0.00	₹0.00	₹ 6.84	₹ 151.51	₹ 151.5 1	
	Paddy Stubble PP	29.64	₹ 0.00	₹0.00	₹ 7.65	₹ 226.75	₹ 226.7 5	
	Thermal (pilot project)	1,991. 04	₹ 26.00	₹0.01	₹ 4.25	₹ 8,459.01	₹ 8,478. 95	
	TOTAL	63,66 6.54	₹68,519.9 9	₹1.08		₹1,83,510 .05	₹2,52, 023.9 8	

Chapter 2 Page 87 of 233

If we add up the total fixed charges it comes to ₹ 68,519.99 million against the volume of 63,666.54 MU. But it is to be noted that the total volume also contains the energy that doesn't have fixed cost and by removing that energy the total come to 60,026.28 MU. As the discom also recovers some amount from fixed charges So the methodology should be to recover the remaining cost and should be in per unit form which is as follows:

Sr. No.	Particular	methodology	in Millions	In crores
1	Quantum approved by HERC	1	60,026.28	6,002.63
2	Fixed charges to be paid	2	₹ 68,519.99	₹ 6,852.00
3	Estimated Revenue from Fixed Charges	3	₹ 22,616.50	₹ 2,261.65
4	Fixed charges to be recovered	4=2-3	₹ 45,903.49	₹ 4,590.35
5	Additional Surcharge	5=4/1	₹ 0.76	₹0.76

So the additional surcharge should have been ₹ 0.76/unit for the current F.Y. and the same methodology should be used for calculation of additional surcharge to the F.Y. 2021-22

#### **Commission's Observation**

The Commission has carefully examined the observations on levy of wheeling charges and losses on the open access consumers of the Discoms and is of the considered view that so long they remain consumers of the Discoms, certain charges are required to be paid by them in accordance with the relevant regulations. Since the additional surcharge is not part of the present ARR petition, the intervener may submit their comments separately.

# 2.4 Public Hearing

The public hearing in the matter was held as scheduled. The interveners mostly reiterated the issues / objections that they had submitted in writing. The submissions made by the Interveners as well as the Commission's view on the same have already been reproduced earlier in the present Order. Hence, for the sake of brevity the same are not being repeated here.

# 2.5 State Advisory Committee (SAC)

The 24<sup>th</sup> meeting of the State Advisory Committee was held on 05.02.2021 in the Conference Hall of HERC at Panchkula to seek views of the Members on the ARR / Tariff Petitions (s) filed by the Haryana Power Utilities i.e. HPCL, HVPNL, UHBVNL and DHBVNL. The agenda was sent to the SAC Members well in advance. The proceedings related to the Discoms are reproduced here under: -

Chapter 2 Page 88 of 233

The Chairman placed on record the good work done by the officers / officials of the Haryana Power Utilities for the efficiency and diligence shown by them in these difficult times and informed the SAC Members that the hearings in the MYT Petitions filed by HPGCL, HVPNL, UHBVNL and DHBVNL, including true-up for the FY 2019-20, annual (mid-term) performance review for the FY 2020-21 and ARR / Tariff proposal for the ensuing financial year i.e. FY 2021-22, has been concluded. In order to take the process, forward the present meeting of the SAC has been convened to have the benefit of the suggestions of the SAC Members to give a final shape to the MYT Order(s) under consideration of the Commission. The Chairman invited the Managing Directors of the Power Utilities to make a brief statement regarding their respective petitions filed for the consideration and Order of the Commission followed by the views of the SAC Members thereto.

Shri Balkar Singh, Managing Director of DHBVNL, informed the SAC Members regarding the efforts made for expeditiously releasing the pending applications for the release of new electricity connections and the fact that the pendency has reduced considerably. The MD highlighted the fact that the Consumer Satisfaction levels in their licensed area has improved significantly.

The MD of UHBVNL, Shri Shashank Anand, also dwelt at length on the drastic improvement in the Consumer Satisfaction levels in the distribution area of UHBVNL. He further informed that they are working towards reigning in distribution losses and cutting down the power purchase cost, which is the single largest component of the ARR. He informed the SAC Members that besides the ARR / Tariff petition, which is already in the public domain and on which public hearing has already been conducted by the Commission, they have made a few additional submissions for the consideration and Order of the Commission. The additional submissions include introduction of nigh time concessions for HT Industrial Consumers for consumption between 9 PM to 5.30 A.M. in order to encourage shifting of load from peak hours to non-peak hours; tariff incentive of Rs. 0.50 / kWh for consumers installing pre-paid meter, concessional tariff for EV charging stations and introduction of Gross Metering for consumers installing roof top solar system.

Shri J N Mangla, President, Gurgaon Industries Association, informed the SAC Members, that despite appreciable efforts made by the Discoms, a few difficulties remain to be addressed regarding billing complaints. He informed that issue of wrong bills and corrections of the same is being referred to the Nigam's head office at Hissar which takes months to resolve. He suggested that such issues ought to be resolved immediately at the sub-division level itself. Shri Mangla informed that the quality quantum of electricity supply from the Nigam has vastly improved over the years and the same is commendable. Regarding CGRF

Chapter 2 Page 89 of 233

at Gurgaon, he informed that there is lack of awareness regarding the kind of complaints that can be taken up and sittings of the CGRF as such. Additionally, he informed the SAC members that the Nigam do not ensure or inform the consumers when their meter is replaced by smart meter, hence, the consumer is not aware of his electricity consumption recorded as on that day by the old / replaced meter. Concluding his suggestions, he submitted that quite often the officers of the Nigam are not available in their respective office as they are busy or away for one meeting or the other. He suggested that all such meetings can be scheduled in the afternoon so that the officers / officials are available to attend to the consumers up to 1 P.M.

The Chairman interjected to point out that CGRF is empowered to hear the grievances of the electricity consumers regarding all issues of metering, billing, connections etc. except theft cases. The consumers, in case aggrieved by the order passed by the CGRF has the liberty to appeal before the Ombudsman, while the appeal of Discoms, if any, could be preferred in the Hon'ble High Court. The details of the powers and functions of the CGRF and Ombudsman is available in the HERC Regulations available in the public domain.

The representative of HAREDA Shri P.K. Nautiyal, informed the SAC Members regarding the significance of RE Power in the light of target set by the Government of India and the Policy of Haryana Govtt. Hence, he suggested that the RPO trajectory notified by the HERC needs to be re-aligned as such so as to ensure that over the years about 40% of the power should be sourced from RE projects. Regarding this, he suggested that a complete action plan for larger integration of RE Power needs to be put in place.

Shri Jitesh Modi, representing Faridabad Industries Association (FIA) highlighted the issue of about 20,000 pending release of new connections in DHBVNL. He suggested that given the power surplus scenario in Haryana, the peak hours and related dispensations needs to be done away with. Regarding smart meter, he informed, that the same has been commendably rolled out by the Nigam but a few boatnecks still remain to be addressed.

The MD, UHBVNL, informed the SAC Members that for Smart Meters MoU has been signed with EESL and by November, 2021 it will be rolled out in four towns of Haryana selected for the purpose. The target is to install 10 Lakh meters in the first phase. At present 2.4 Lakh smart meters have been installed. Further, in order to address the bottlenecks dedicated resources have been made available to ensure roll out with full pre-paid functionality. Additionally, RFP has been floated for another 20 lakh smart meters and the tenders received shall be opened shortly.

Chapter 2 Page 90 of 233

It was further informed that as per the HERC tariff order in vogue, 5% rebate in energy charges is being allowed to the consumers who have installed pre-paid meter. Given the benefits of pre-paid system in terms of cost saving, improvement in billing efficiency and revenue collection the Commission may take a view regarding the quantum of incentive in the tariff for the ensuing financial year.

In the end, the Chairman thanked all the SAC Members and representatives for their valuable suggestions and advised the Discoms to vigorously work towards ensuring 100% consumer satisfaction especially on metering / billing and release of new connections as well as load extension.

The Commission, while passing the present Order has kept in mind the suggestions of the SAC Members.

Chapter 2 Page 91 of 233

# Chapter 3

### ANALYSIS OF ARR FILINGS AND COMMISSION'S ORDER

The Commission, while passing this Order for True-up of the FY 2019-20, Annual (Mid-year) Performance Review of the FY 2020-21 and determination of ARRs of the UHBVNL and DHBVNL for FY 2021-22, has taken into account their respective Petitions including the supplementary submissions, additional information/data provided by them from time to time, revised ARRs, objections / suggestions of the stakeholders, replies of distribution licensees thereto, views expressed by the objectors during the public hearing(s) and the suggestions of the State Advisory Committee.

# 3.1 True-up of the ARR for the FY 2019-20

The Discoms have submitted that their petition(s) for True-up of the ARR for the FY 2019-20 are based on the audited accounts. The True-up petitions have been examined by the Commission in the light of the MYT Regulations, 2012 and amendment thereof, relevant Orders of the Commission and the audited accounts for the FY 2019-20 made available to the Commission by the Discoms.

# 3.1.1 Operation & Maintenance Expenses

The Operation & Maintenance Expenses of the Distribution licnsees includes

- Employee Expenses;
- Repair & Maintenance Costs and
- Administrative and General Expenses.

Employee Expenses consist of salaries, dearness allowance, bonus, terminal benefits in the form of pension & gratuity, leave encashment and staff welfare expenses.

Repairs and Maintenance expenses include regular expenditure made for improvement of system reliability and quality of power supply. Also, these expenses are important in view of the system maintenance and loss reduction within the distribution network.

Administrative expenses mainly comprise of rents, telephone and other communication expenses, professional charges, conveyance and travelling allowances and other debits.

Chapter 3 Page 92 of 233

Comparison of actual O&M expenses incurred by UHBVNL as against the approved expenditure (after deducting the capitalization of expenses), are tabulated in the following table.

O&M Expenses of UHBVNL for FY 2019-20 (Rs. Crore)

Particulars	Approved	Actual	Difference
Employee Expenses	639.87	704.92	65.03
Administration & General Expenses	85.21	105.67	20.46
Repair & Maintenance Expenses	142.82	81.89	(60.93)
Terminal Liabilities	500	396.94	(103.06)
Total	1367.90	1289.42	(78.48)

Actual O&M Expenses are less than approved expenses of FY 2019-20, therefore the petitioner has requested that the Commission may kindly allow the actual O&M expenses to UHBVN for FY 2019-20.

The Commission has examined the true up for the FY 2019-20 proposed by UHBVNL and observes that the total O&M expenditure as per actuals is largely within the approved amount except for the A&G expenses. The petitioner has submitted that the Commission, in Tariff Order dated 07.03.2019, had estimated the employee and A&G expenses for FY 2019-20 by considering the approved cost and indexation factor for FY 2017-18. Further to the request of the petitioner in the said petition, the Commission, in the order dated 22.10.2019 in RA 18 of 2019, stated as under:

"The Commission has considered the arguments put forth by the licensee in support of its claim and observes that at the time of impugned order, values of WPI and CPI were available for FY 2018-19 only upto September, 2018, and therefore inflation factor was calculated for the FY 2017-18. In view of the fact that these expenses are eligible for true up based on actual inflation figures for the FY 2019-20, along with holding cost...."

In view of above and considering the actual CPI-WPI values for FY2019-20, Petitioner has calculated the revised index figure of 6.09% for arriving at normative A&G expenses for FY2019-20 as against the index of 3.04% considered by the commission in order dated 07.03.2019. Hence, the revised normative A&G expenses considering indexation of 6.09% on audited A&G expenses of FY2018-19 (Rs. 106.21 Crs.) may be considered to be Rs. 113.52 Crs. As the Petitioner's actual A&G expenses are less than the normative expenses calculated above, UHBVN has submitted that the Commission may kindly approve the actual A&G Expense for FY 2019-20.

Based on the explanation for the additional expenditure on this account provided by UHBVNL, the Commission approves the true up of O&M expenditure as proposed by

Chapter 3 Page 93 of 233

the licensee after excluding CSR expenditure of Rs. 71.76 lakhs; being a charge on profit. However, the expenses that are in the nature of onetime expenses are excluded while projecting future period expenses.

#### **DHBVNL**

A Comparison of actual O&M expenses against the approved expenses (after deducting the capitalization), are tabulated in the following table.

O&M Expenses of DHBVNL for FY 2019-20 (Rs. Crore)

Particulars	Approved (A)	Actual (B)	Difference (A-B)
Employee Expenses	969.66	918.67	50.99
Administration & General Expenses	81.69	117.92	(36.23)
Repair & Maintenance Expenses	165.34	122.34	43.00
Terminal Liabilities	426.75	442.90	(16.15)
Total	1,643.44	1,601.84	41.60

DHBVNL has requested the Commission to allow the actual O&M expenses to DHBVN for FY 2019-20 being less than approved expenses as per HERC Order.

The Commission has examined the true up for the FY 2018-19 proposed by DHBVNL and observes that the total O&M expenditure as per actuals is lower than that approved by the Commission for the year, even though the A&G Expenses and Terminal benefits are in excess of that approved for the FY 2019-20. Regarding A&G expenses, the petitioner has submitted that the normative expenses approved by the Commission for the FY 2019-20 were on the lower side due to non-availability of appropriate indexation factor as also submitted by UHBVNL.

Based on the explanation for the additional expenditure on this account provided by the licensee, the Commission approves the true up of O&M expenditure as proposed by the licensee. However, the expenses that are in the nature of onetime expenses are to be excluded while projecting future period expenses.

Terminal benefits are uncontrollable expenses as per the MYT Regulations, 2012. Hence, the same are allowed to be trued-up based on the audited accounts of the Discoms.

# 3.1.2 Depreciation

#### **UHBVNL**

UHBVNL has submitted that the Commission allowed a net depreciation Rs. 332.72 Crore to UHBVN for FY 2019-20. As per the audited accounts of UHBVN for FY 2019-20, gross depreciation works out to Rs. 365.16 Crores based on Opening & Closing GFA amounting

Chapter 3 Page 94 of 233

Rs. 7612.04 Crore and Rs. 8196.26 Crore respectively. The gross depreciation is adjusted for the depreciation on assets created by consumer contribution and grants amounting to Rs. 47.96 Crores, leading to a net depreciation expense of Rs 317.20 Crore for UHBVN during FY 2019-20. As the actual depreciation is less than the amount approved by Commission to UHBVN for FY 2019-20, petitioner has requested that Commission may allow the actual depreciation expense to UHBVN for FY 2019-20.

#### **DHBVNL**

DHBVNL has submitted that the Commission had allowed depreciation of Rs. 307.01 Crore after adjusting the depreciation on consumer contribution for FY 2019-20. As per the Audited Accounts for FY 2019-20, gross depreciation works out as Rs 377.99 Crores on the basis of Opening & Closing GFA amounting to Rs. 8,177.10 Crore and Rs. 9,369.56 Crore respectively. The gross depreciation is adjusted further with the depreciation on consumer contribution and grants amounting to Rs. 117.99 Crores, to work out the net depreciation as Rs. 259.99 Crore during FY 2019-20. As the actual depreciation is less than the amount approved by the Commission for FY 2019-20, DHBVNL has requested that the Commission may kindly allow the actual depreciation expense for FY 2019-20.

The Commission, in view of the fact that the calculations are in accordance with the HERC Regulations in this regard, approves the actual expenditure as per the audited accounts for the FY 2019-20.

# 3.1.3 Interest on Consumers Security Deposit

The Commission, vide the ARR Order dated 07.03.2019, had approved interest on consumer security deposit at Rs. 84.58 Crore (UHBVNL) for the FY 2019-20, as proposed by the licensee.

UHBVNL has now intimated that the actual interest paid on consumers' security deposit, as per their audited accounts of the FY 2019-20, is Rs. 82.30 Crore, which is lower than the interest cost already approved by the Commission. Similarly, in the case of DHBVNL, the Commission had approved Rs. 87.12 Crore as interest on consumer security deposit while the actual expenses, as per the audited accounts, is Rs. 58.33 Crore.

The actual expenditure of both the Discoms, being lower than that allowed by the Commission in its ARR Order for the FY 2019-20, is therefore, approved for true- up.

#### 3.1.4 Interest on Capex loans

#### **UHBVNL**

Chapter 3 Page 95 of 233

UHBVNL has submitted that the Commission has allowed Rs. 164.39 Crore towards the interest liability on long term loans for FY 2019-20. However, as per the audited account the gross interest liability towards long term borrowings was Rs.189.81 Crores. On adjusting interest capitalisation of Rs. 63.38 Crore, the net interest expenses of UHBVN on long-term loans works out to Rs. 126.44 Crore for FY 2019-20. As actual interest cost of UHBVN on long term borrowing is lower than the approved amount allowed by the Commission for FY 2019-20, petitioner has requested that the Commission may kindly approve the actual interest cost on long term borrowing to UHBVN for FY 2019-20.

The Commission has examined the interest cost actually incurred by the licensee during the FY 2019-20 as against that approved by the Commission and observes that the same are within the approved limits. Accordingly, the actual interest cost of Rs. 126.44 crore is approved for true up for the FY 2019-20.

# **DHBVNL**

DHBVNL has submitted that the Commission has allowed Rs.140.77 Crore towards the interest liability on long term borrowing for FY 2019-20. However, as per the Audited Accounts the gross interest liability towards long term borrowing is Rs. 239.06 Crore. After adjusting interest capitalisation Rs. 169.86 crores, the net interest cost of DHBVN on long-term loans works out as Rs. 69.21 Crore for FY 2019-20. Actual interest of DHBVN on long term borrowing is less than the amount approved by the Commission, therefore, the petitioner has requested that the Commission may kindly allow the actual interest cost on long term borrowing to DHBVN for FY 2019-20.

The Commission has allowed Rs.140.77 Crore to DHBVN towards the interest liability on long term borrowing for FY 2018-19 net of interest on Jind circle. As the actual interest of DHBVN on long term borrowing is less than the amount approved by the Commission in Tariff Order dated 3<sup>rd</sup> March, 2019 and is in line with actual capital expenditure and its funding thereto; the Commission approves the actual interest cost incurred on long term borrowing by DHBVN i.e. Rs. 69.21 crores for FY 2019-20 on true up.

# 3.1.5 Interest on Working Capital Loan

#### **UHBVNL**

The Commission has allowed interest cost on working capital on normative basis at Rs 91.82 Crores to UHBVN for FY 2019-20. The Commission has worked out the same by considering an interest rate of 9.50% on normative working net capital requirement of Rs. 966.53 Crore of UHBVN for FY 2019-20. However, as per the audited accounts, actual

Chapter 3 Page 96 of 233

interest cost on working capital for UHBVN is Rs. 101.52 Crore for the same year. The interest cost on Cash Credit and Overdraft loans/facility is around Rs. 65.12 Crs and is included in the total interest on working capital borrowing. Hence, it has been submitted that the actual interest cost on working capital corresponds to the operating expenses actually incurred by UHBVN during the FY 2019-20. Therefore, it is requested that the Commission may kindly allow the actual interest on working capital to UHBVN for FY 2019-20.

As the total approved ARR has undergone a change on account of the true- up of expenses that has been approved by the Commission; the admissible working capital loan and interest thereto has been recalculated accordingly in line with the MYT Regulations. Further, while calculating interest on working capital of UHBVNL for the FY 2019-20, the rate of interest has been taken as 9.5% as approved in HERC Order dated 07.03.2019. The revised calculation of approved working capital borrowings and Interest cost thereto, for UHBVNL is as under:

Interest on Working Capital Loan of UHBVNL (Rs. Crore)

Interest on working capital	FY 2019-20
O&M expenses for 1 month	107.39
Maintenance spares 1% of opening GFA	76.12
2 months receivables	2152.26
Uncollected revenue	129.14
Total	2464.90
Less	
ACD, as projected by UHBVNL	1415.52
Net working capital	1049.38
Interest rate	9.50%
Interest cost	99.69

# **DHBVNL**

The Commission has approved interest cost on working capital as Rs 126.70 Crore for FY 2019-20 on normative basis in Tariff Order dated 7th March 2019. The Commission has worked out the same by considering an interest rate of 9.50% on working capital requirement of Rs. 1,707.45 Crore for FY 2019-20. However, as per the Audited Accounts, actual interest cost on working capital of DHBVN is Rs. 108.94 Crore for FY 2019-20.

The actual interest cost on working capital is within permissible limit, therefore, the petitioner has requested the Commission to allow the actual interest on working capital for FY 2019-20.

The Commission has examined the audited accounts and observes that the licensee has included interest on HVPNL bonds and borrowings from UHBVNL while claiming interest on working capital loans. The Commission, after excluding interest on these items, not being in

Chapter 3 Page 97 of 233

the nature of working capital borrowings, allows Rs. 26.06 crores as interest on working capital for DHBVNL for the FY 2019-20, based on actual expenditure incurred.

It needs to be noted that the licensees are allowed to retain certain income i.e. interest on delayed payment surcharge amounting to Rs. 179.98 crores (UHBVNL) and Rs. 148.67 crores (DHBVNL) for the FY 2019-20. Such income is retained by the licensees for setting off the cost of additional working capital that may have been required and the same may also be utilised for the UDAY and HVPNL Bonds so as to reduce the burden on the State Government which is required to fund these through the OFR under UDAY scheme.

#### 3.1.6 Interest on Bonds

# **UHBVNL**

It is submitted that Government of India has notified Ujjwal Discom Assurance Yojana (UDAY) scheme for operational and financial turnaround of power distribution companies (DISCOMs), on 20th Nov 2015 under which State shall take over 75% of Discom debt as on 30th September 2015 over five years. The schedule of takeover of loan has been given as under:

**Break up of State Govt Takeover of Loans** 

Broak up of State Soft Takes ver of Esails									
Particulars	FY 16	FY 17	FY 18	FY 19	FY 20				
Grant (%)	11.25%	11.25%	11.25%	11.25%	11.25%				
Grant (Cr)	3,892.5	3,892.5	3,892.5	3,892.5	3,892.5				
Equity (%)	3.75%	3.75%	3.75%	3.75%	3.75%				
Equity (Cr)	1,297.5	1,297.5	1,297.5	1,297.5	1,297.5				
Debt (%)	35.00%	45.00%	30.00%	15.00%	0.00%				
Debt (Cr)	12,110	15,570	10,380	5,190	0.0				

The Amount taken over by the Government of Haryana has been converted into grant in 5 instalments and in the meantime the interest cost of such bonds which has not been converted into grants by the Govt. of Haryana has to be borne by the Licensee only.

UHBVNL, in the FY 2019-20 has borne interest cost of Rs 108.82 Cr on UDAY bonds and Rs 75.90 Crs has been paid towards HVPN Bonds. The corresponding interest cost on UDAY bonds borne by DHBVNL is Rs. 79.39 crores and on HVPNL Bonds Rs. 58.95 crores.

The Discoms has requested the Commission to kindly allow the above interest cost of UDAY and HVPNL Bonds for FY 2019-20 as these are actual expenditures incurred by the Petitioner.

Chapter 3 Page 98 of 233

The Commission, in its earlier orders, while disallowing interest on UDAY bonds and HVPNL Bonds had, appropriately, discussed the reasons behind such disallowance and the same holds true now. The Commission, in its order dated 07.03.2019, had observed as under:

"In line with the earlier Orders of the Commission, interest on UDAY Bonds shall be met out of OFR available under the UDAY. The Commission, in view of the UDAY, is of the considered view that in the present Order distribution loss trajectory has been pegged at levels specified in the said scheme and has not allowed any additional working capital loan and interest thereto on account of UDAY."

It may be noted that the review on this issue was also not allowed by the Commission taking a consistent stand that the interest on UDAY borrowings are to be met through OFR to be funded by the State Government, in line with the conditions of the UDAY scheme, approved by this Commission.

The Commission, in its Order dated 21.05.2020, on the same subject, had further observed as under:

"The Commission observes that the UDAY scheme, if implemented properly, will result in all round benefit, ultimately resulting in lower tariff to the consumers once the State Government completes the committed infusion of funds by way of equity and grant by the end of five years. However, the Commission observes that as per the terms of MoU dated 11.03.2016, the Operational Funding (OFR) has to be provided by the State Government. The interest on the UDAY bonds, HVPNL Bonds and FRP borrowings as quantified and claimed by UHBVNL & DHBVNL for the FY 2018-19 is Rs. 490.67 Crore & Rs. 287.74 Crore. The Commission has examined the contention of the licensees and observes that all these claims are part of the borrowings that are already covered under the UDAY scheme and are, accordingly, part of such OFR to be funded by the State Government."

"In light of the above discussions, the Commission is of the considered view that interest on UDAY bonds is required to be met from the OFR support available under UDAY in accordance with the modalities of the scheme. However, as discussed earlier, the petitioners, while on one hand have raised claim for interest cost in excess of that allowed as per regulations; on the other hand, they have opted not to pass on the benefit of earnings due to interest on delayed payment surcharge .......

The Commission is of the considered view that instead of going beyond the scope of regulations, some portion of this additional interest cost can be met from the non-

Chapter 3 Page 99 of 233

tariff income retained by the Discoms and the balance to be met in accordance with the terms of MOU; thereby decreasing the ultimate burden on the State Government."

# 3.1.7 Cost of raising Finance and Bank Charges

In addition to the interest cost, the Discoms have also requested for true up of cost of raising finance including guarantee fee and other finance charges as below:

		UHBVNL	DHBVNL
1	Other Interest and Finance charges	46.33	26.09
2	Guarantee Fees		10.00

The Commission, considering the cost to be legitimate, allows the same as proposed.

The summary of interest and finance charge as per the audited accounts vis-à-vis now approved by the Commission for true up for FY 2019-20 is shown in table given as under

Total Interest & Finance Cost for FY 2019-20 (Rs Crores) UHBVNL

Sr. No.	Category	Approved	Actual	Revised Approval
1	Gross Interest on Capex Loans		189.81	
2	Less: Interest Capitalized		63.38	
3	Net Interest on Capex Loans	164.39	126.44	126.44
4	Interest on Working Capital Loans	91.82	166.64	99.69
5	Interest on HVPNL/Other Bonds	-	75.90	•
6	Interest on UDAY Loans & OFR for state govt.	-	108.82	•
7	Interest on Consumer Security Deposits	84.58	82.30	82.30
8	Other Interest and Finance charges		46.33	46.33
9	Guarantee Fees	26.00	•	
	Interest on Jind Loans	-23.99	-	
	Total	342.80	606.42	354.76

Total Interest & Finance Cost for FY 2019-20 (Rs Crores) DHBVNL

Sr. No.	Category	Approved	Actual	Revised
				Approval
1	Gross Interest on Capex Loans		239.06	
2	Less: Interest Capitalized		169.86	
3	Net Interest on Capex Loans	140.77	69.21	69.21
4	Interest on Working Capital Loans	126.70	108.94	26.06
5	Interest on UDAY Loans		79.39	-
6	Interest on Consumer Security Deposits	87.12	58.33	58.33
7	Other Interest and Finance charges including Stamp duty paid to state government on fresh equity	5.00	26.09	26.09
8	Guarantee Fee		10.00	10.00
	Total	359.59	351.96	189.69

# 3.1.8 Expenditure due to other debits

# **UHBVNL**

Chapter 3 Page 100 of 233

The petitioner has submitted that as per the audited accounts, an amount of Rs. 107.53 Crore has been booked as other debits during FY 2019-20. Out of this amount, Rs. 5.80 Cr is on account of written off bad & doubtful debts under the Bill Settlement Scheme. UHBVN has launched Bill Settlement Scheme under which defaulting number of disconnected consumers from the date of default to 31th Jan 2019 was settled as per the HERC Supply Code Regulations, 2014 and its subsequent amendments.

As per Regulation 17.2 of MYT Regulations, 2012 bad and doubtful book debts allowed to be written off are part of Annual Revenue Requirement of Retail Supply business. Petitioner has requested that the Commission may allow the bad debts written off and other debits as per the audited account of UHBVN for FY 2019-20. The element wise details of the same as per the audited account is tabulated as under: -

Other Expense for FY 2019-20 (in Rs. Crore)

Cities Expenses to: 1 1 2010 20 (iii ite)	
Particulars	Amount
Provision for Bad & Doubtful Debts	86.25
Bad & Doubtful debts written off	5.80
Compensation for Injury, death, damage and penalty	4.34
Infructuous Capital Exp. Written off	-
Loss on Obsolescence of Stores/ Scrap & Assets	0.32
Material cost variance- Capital	-
Miscellaneous losses and written off	10.16
Provision for amount recoverable from employee	0.66
Total Expenses	107.53

The Commission has examined the submissions of the petitioner regarding other debits and provisions as above and observes that the only the bad debts, actually written off, that too if case specific details are provided, can be considered. Accordingly, the provision for bad debts as also provision for amount recoverable from employee are disallowed. Further, loss on obsolescence of Stores/ Scrap & Assets and the amount on account of Miscellaneous losses and written off can also not be recovered from consumers in the absence of any specific provisions in the regulations. Compensation for injury, death and damage is allowed in order to enable the licensee to pay these amounts promptly. However, the petitioner is directed to provide details of penalty included in Rs. 4.34 crores so that appropriate decision in this regard can be taken.

The Commission observes that the licensee has not provided complete details of bad debts as directed in the memo no. 4370 dated 06.01.2021. The billed amount written off as part of bill settlement scheme makes it clear that these consumers are still connected. In case such amounts are allowed to be recovered, it amounts to incentivising non-paying consumers at the cost of regular paying consumers. Further, amounts that are written off under the stated HERC Supply Code Regulations, 2014 and its subsequent amendments, would be the

Chapter 3 Page 101 of 233

amounts that were wrongly billed to consumers whose connections were required to be disconnected for non-payment and was not done. Such consumers appear to have been allowed to consume electricity in violation of the HERC Regulations. Allowing such amounts to be recovered from the paying consumers, instead of penalizing the licensee and the erring consumers, would be great injustice to the law-abiding consumers of the state. The Commission makes it clear that in order to claim any bad debts, the licensee is required to demonstrate that the debts were incurred legitimately and there are no further means available to the licensee to recover these amounts. The Commission is not expected to reward the licensee for non-compliance of regulation and best business practices. The licensee must understand that regulations that mandate appropriate ACD and also prompt disconnection of electricity on non-payment are framed in order to avoid bad debts and therefore it is in the interest of the licensee to strictly implement these regulations. The scheme of prepaid metering is also a step in this direction and it is shocking that the Discoms chose to sit on the scheme for more than 7 years even after the regulations were notified, and only now that any action is being taken in this regard. In light of the above observations, the Commission disallows the recovery of any bad debts incurred by the licensees under any bill settlement scheme or otherwise in violation of the regulations of the Commission.

# **DHBVNL**

As per the audited accounts, Rs. 39.43 Crore & Rs 0.80 Crores has been incurred by DHBVN as Other Debits & Prior Period Expenses during FY 2019-20. The major portion of Rs. 39.43 Crores consists of expenditure on account of compensation, revenue amount refunded, miscellaneous losses and rectification. Petitioner has requested that the Commission may kindly allow the expenditure due to Other Debits& Prior Period Expenses as per the audited accounts of DHBVN for FY 2019-20. The details of other debits, as per audited accounts is as given below:

PARTICULARS	NET 19-20
Shortages on physical verification of stock	48,50,449.17
Loss of materials by pilferage etc.	49,68,271.02
Compensation for injuries, death and damage-Staff	4,58,10,340.00
Compensation for injuries, death and damage-Outsiders	10,89,49,958.15
In fructuous capital expenditure written off	9,02,636.94
Misc. Compensations	1,06,47,572.80
Other losses/receivables adjusted & written off	13,57,50,398.00
Loss on obsolescence of fixed assets	10,35,084.50
Loss on obsolescence of stores etc. in stock	2,61,426.05
Loss on sale of fixed Assets	6,84,82,500.45
Sundry debit balances written-off	6,47,313.00
Loss on sale of scrap	93,88,664.60

Chapter 3 Page 102 of 233

Loss on account of Shortage & breakage of damaged distribution Transformer	26,17,281.31
Total	39,43,11,895.99

As observed by the Commission in case of a similar claim by UHBVNL, compensations for injury, death and damages is allowed in order to enable the licensee to pay these amounts promptly. Further, loss on sale of fixed assets and scrap is also allowed. Other debits, being in the nature of write off are not allowed in the absence of any provisions in the MYT regulations in this regard. Prior period expenses are set off against similar amount of prior period income as per audited accounts. The Commission approved debits are as given below:

Other debits allowed to be recovered in ARR	
Compensation for injuries, death and damage-Staff	4,58,10,340.00
Compensation for injuries, death and damage-Outsiders	10,89,49,958.15
Misc. Compensations	1,06,47,572.80
Loss on sale of fixed Assets	6,84,82,500.45
Loss on sale of scrap	93,88,664.60
Total	24,32,79,036.00

The petitioner has further requested that in addition to other debits, the Commission may also allow Bad & doubtful debt amounting to Rs. 66.86 Crores as per Regulation 64 of MYT Regulations, 2012, which is reproduced below:

"Bad and doubtful debts shall be allowed to the extent the distribution licensee has actually written off bad debts subject to a maximum of 0.5% of sales revenue. However, this shall be allowed only if the distribution licensee submits all relevant data and information to the satisfaction of the Commission. In case there is any recovery of bad debts already written off, the recovered bad debts will be treated as other income"

Bad & Doubtful debt for FY 2019-20 (Rs Crores)

	<u> </u>	
Particulars		Amount
Written off bad debt	Α	84.01
Bad & Doubtful Debt as per Regulation (0.5% of sales Revenue)	В	66.86
Bad & Doubtful Debt Claimed	Min (A, B)	66.86

The Commission, while allowing bad and doubtful debts written off as part of Order dated 01.06.2020, had observed as under:

"The Commission observes that although the licensee is unable to provide adequate information as required by the Commission, the amount written off forms part of the audited accounts and accordingly approves the expenditure on account of bad and doubtful debts written off limited to 0.5% of sales revenue from energy sales within the state i.e. 0.5% of Rs. 8800.72 crores, which amounts to Rs. 44 crores. The amount is being allowed strictly as one-time measure only. **The licensee is required** 

Chapter 3 Page 103 of 233

to ensure that non-paying consumers are disconnected within the prescribed time limit after adjusting their security deposit. Further, the licensee must ensure that the amount of security deposit from all the consumers is strictly in line with the current consumption pattern as prescribed under the regulations. The provisions for bad and doubtful debts amounting to Rs. 29.38 Crore is disallowed as the same is just a 'provision' and not actually written of amount".

Further, as already observed by the Commission, while dealing with a similar claim by UHBVNL, that the billed amount written off are part of bill settlement scheme, makes it clear that these consumers are still connected. In case such amounts are allowed to be recovered, it amounts to incentivising non-paying consumers at the cost of regular paying consumers. Further, amounts that are written off under the stated HERC Supply Code Regulations, 2014 and its subsequent amendments, would be the amounts that were wrongly billed to consumers whose connections were required to be disconnected for nonpayment and was not done. Such consumers were also allowed to consume electricity in violation of the HERC Regulations. Allowing such amounts to be recovered from the consumers, instead of penalizing the licensee and the erring consumers, would be great injustice to the law-abiding consumers of the state. The Commission makes it clear that in order to claim any bad debts, the licensee is required to demonstrate that the debts were incurred legitimately and there are no further means available to the licensee to recover these amounts. The Commission is not expected to reward the licensee for non-compliance of regulation and best business practices. The licensee must understand that regulations that mandate appropriate ACD and also prompt disconnection of electricity on non-payment are framed in order to avoid bad debts and therefore it is in the interest of the licensee to strictly implement these regulations. The scheme of prepaid metering is also a step in this direction and it is shocking that the Discoms chose to sit on the scheme for more than 7 years even after the regulations were notified, and only now that any action is being taken in this regard. The Commission, in light of the above observations, disallows the recovery of any bad debts incurred by the licensees under any bill settlement scheme or otherwise in violation of the regulations of the Commission.

# 3.1.9 Return on Equity (RoE)

# **UHBVNL**

UHBVN has considered the opening equity including the share application money pending allotment as per the audited accounts (excluding the equity received under the UDAY

Chapter 3 Page 104 of 233

scheme). As per the Regulation 20.2 of HERC MYT Regulation 2012, equity portion of Opening Capital Work in Progress (i.e. 20% of Opening CWIP) is deducted further to calculate the admissible opening equity eligible of UHBVN for FY 2019-20.

Amount of Rs. 223.60 Crores equity is received by UHBVN from Government of Haryana towards capital expenditure for FY 2019-20. UHBVN has considered a rate of 14% on average admissible equity to work out Return on Equity for FY 2019-20 at Rs. 278.52 Crores against Rs. 215.13 Crores approved by Commission for UHBVN for FY 2019-20.

The Commission has examined the true up of return on equity proposed by UHBVNL for the FY 2019-20 and observes that the Commission had approved the closing equity as on 31.3.2019 as part of the ARR Order dated 21.05.2020 and the same shall form the basis of calculation of RoE for the FY 2019-20. The opening balance shall be increased by the equity contribution relating to the assets added during the year which is @ 25.37% for UHBVNL; being the ratio of equity funding of additional capital expenditure during FY 2019-20 as per information provided by the licensee. The rate of return is the same as approved by the Commission as per the Order dated 07.03.2019.

Detail calculation of proposed and approved Return of Equity of UHBVN for FY 2019-20 is tabulated as under:

Return on Equity for FY 2019-20 (Rs Crores)

Particulars	UHBVNL	HERC Approved
Particulars	Proposal	
Share Capital Opening	12,613.38	
Add: Share Application money pending allotment	68.60	
Less: Equity received under UDAY	10,692.39	
Opening Equity for Distribution & Retail supply assets	1,989.59	
Less: Opening share capital for assets not put of use (20%)	111.95	
Net Eligible Opening Equity for Return on Equity	1,877.64	1876.94
Add: Equity received for Capex	223.60	
Assets put to use during the FY 2019-20		843.34
Equity allocated to the assets put to use @25.37%		213.96
Closing Equity	2,101.24	2090.90
Average Equity eligible for Return on Equity	1,989.44	1983.92
Rate of Return on Equity	14.00%	10%
Return on Equity	278.52	198.39

#### **DHBVNL**

DHBVN has submitted that it has considered the opening equity including the share application money pending for allotment as per the audited accounts and adjusted the same with equity received under UDAY. As per the Regulation 20.2 of HERC MYT Regulations 2012, equity portion of Opening Capital Work in Progress (i.e. 20% of Opening CWIP) is

Chapter 3 Page 105 of 233

deducted further to calculate the admissible opening equity eligible to DHBVN for FY2019-20.

The equity of Rs. 264.22 Crores computed towards capitalisation for FY 2019-20. DHBVN has considered a return rate 14% on average admissible equity to work out Return on Equity for FY 2019-20.

On the basis of above methodology, Return on Equity works out to Rs 225.34 Crores against Rs. 193.15 Crores allowed by the Commission for FY2019-20.

The Commission, starting with the opening balance of Equity as proposed by the licensee, has increased the same with the equity portion of the assets put to use during the FY 2019-20 in the same ratio as the equity added during the FY has with the additional capital expenditure, which comes out to 18.13% for the FY 2019-20. The rate of return on Equity is the same as approved by the Commission for the FY 2019-20 as part of Order dated 07.03.2019. Detailed calculation of proposed and approved Return of Equity for DHBVNL is tabulated as under:

Proposed Return on Equity for FY 2019-20 (Rs Crores)

Particulars	<b>UHBVNL Proposal</b>	HERC Approved
Share Capital Opening	8,768.40	
Add: Share Application money pending allotment	2,410.38	
Less: Equity received under UDAY	9,383.41	
Opening Equity for Distribution & Retail supply assets	1,795.37	
Less: Opening share capital for assets not put of use (20%)	317.91	
Net Eligible Opening Equity for Return on Equity	1,477.45	1477.45
Add: Equity received for Capitalisation	264.22	
Assets Put to use during the FY 2019-20		1232.90
Equity allocated to the assets put to use @18.13%		223.48
Closing Equity	1,741.67	1700.93
Average Equity eligible for Return on Equity	1,609.56	1589.19
Rate of Return on Equity	14.00%	10%
Return on Equity	225.34	158.92

#### 3.1.10 Non-tariff Income

UHBVNL has submitted that Actual Non – Tariff income of UHBVN for FY 2019-20 is Rs. 305.24 Crores against Rs 197.25 Crore approved by the Commission in Tariff Order dated 07.03.2019. Actual Non–Tariff income (including prior period income Rs. 0.85 Crores) of DHBVN for FY 2019-20 is Rs.637.32 Crores against Rs. 469.51 Crore approved by the Commission in Tariff Order dated 7thMarch 2019. Discoms have not considered the delayed payment surcharge & rebate on timely payment of energy charges and Supplier/ Contractor as part of Non-Tariff income for FY 2019-20 as according to them these are to be adjusted

Chapter 3 Page 106 of 233

towards the working capital that must be borne by the Distribution Licensee due to non-payment of energy bill in timely manner by the consumer.

The Commission has considered the submissions of the licensee and finds the same in order, hence, approves Rs. 305.24 crores and Rs. 351.76 crores as non-tariff income for UHBVNL and DHBVNL respectively on true up for the FY 2019-20. The retained income by the licensees may be utilised towards payment of interest on UDAY and HVPNL Bonds in order to reduce the burden on the State Government which is required to bear the same as part of OFR cost.

# 3.1.11 True-up of Power Purchase Quantum and Cost

Petitioners have submitted that Power Purchase for Haryana Discoms is being managed by Haryana Power Purchase Cell (HPPC) which is operated jointly by the representatives of both the Discoms in Haryana. HPPC manages power procurement from long term, short term and other alternative sources for Haryana Discoms. All efforts have been made to optimise the power purchase cost in FY 2019-20.

Power is procured from the generating stations under long term agreements approved by the Commission. Further, Merit Order Dispatch has been complied to meet day to day power requirement in FY 2019-20.

Power purchase agreement of generating station Uri-II has been extended till its useful life vide HERC Order dated 16th October 2019 in Case No HERC/RA-19 of 2019. Accordingly, power was purchased from Uri-II generating plant during FY 2019-20

Surplus power which remained unutilised due to reduction of energy demand during the Off-Peak months (i.e. October to March) was banked with neighbouring states or other power deficit states and availed during the peak season (July to Sep) to avoid the power deficit scenario during paddy season. The remaining Surplus power after banking was sold in power exchange.

Actual power purchase cost along with energy procured as per the Audited Accounts against the approved power purchase cost in Tariff Order dated 7th March 2019 is provided in the following table:

Power Purchase Details for FY 2019-20 for Haryana (in MU) UHBVNL

Particulars	Approved	Actual	Difference
Power Purchase Quantum	59,471.38	55,160.76	(4310.61)

Average power cost excluding of intra-state transmission charges works out to Rs. 4.82 per unit for UHBVNL as per the audited accounts against the approved average power purchase

Chapter 3 Page 107 of 233

cost Rs. 4.58 per unit for the FY 2019-20. Power purchase cost has increased primarily on account of prior period expenses (Rs. 1267.30 Cr) and increase in interstate transmission charges during the FY 2019-20.

The Petitioner prays that the Commission may allow the actual power purchase cost of Rs. 11,269.43 Crores to UHBVN for the FY 2019-20.

Power Purchase Details for FY 2019-20 of Haryana Discoms (in MUs) DHBVNL

Particulars	Approved	Actual	Difference
Power Purchase Quantum	59,471.38	55,442.34	4,029.04

The Average Power Purchase Cost (APPC) with transmission charges works out to Rs. 4.88/kW for DHBVNL as per the Audited Accounts against the APPC of Rs. 4.58/kWh approved by the Commission for FY 2019-20. DHBVNL has requested that the Commission may kindly allow the actual power purchase cost of Rs. 15,291.58 Crores to DHBVN for FY 2019-20.

The Commission observes that the difference in power purchase cost could arise either on account of variation in actual source wise generation or rate of power vis-à-vis those allowed by the Commission on a projected basis. As per the MYT Regulations the Discoms are allowed to automatically recover FSA, without going through the regulatory process subject to a cap, in order to ensure financial viability of the licensees. However, the automatic recovery is subject to a cap and therefore the need to True-up. Also, the actual cost for the year can only be determined after the audited accounts are available.

In view of the aforesaid constraints, the actual power procurement cost is to be trued up based on the normative distribution losses approved by the Commission in the ARR / Tariff Order for the relevant year. Transmission losses are allowed as per actual since the Discoms have no control over the transmission losses.

Further, in light of the fact that AP sales in the state are unmetered and even the metered supply due to large number of dead / defective meters are not accurate, the Commission is constrained to arrive at an estimate of AP sales based on the energy recorded at the 11 kV AP segregated feeders. The Commission estimates and approved AP sales are discussed at "section 4.4 True up of AP Sales for FY 2019-20" of this order and has a major impact on the distribution loss levels of the Discoms, in the FY 2019-20. Based on the approved AP sales and the distribution loss level approved by the Commission in its Order dated 07.03.2019, the excess units purchased by the Discoms is arrived at and treated in terms of the incentive and penalty mechanism of the HERC MYT Regulations, 2012.

Chapter 3 Page 108 of 233

The details of True-up of power purchase cost of the Discoms for the FY 2019-20 is as per the table below.

**True-up of Power Purchase Cost (FY 2019-20)** 

True-up or rower	i aronaco (	<del>, , , , , , , , , , , , , , , , , , , </del>	<i>-</i>	
Particulars		UHBVNL	DHBVNL	Total
Sales as per Audited accounts	MU	17,620.86	25,420.33	43,041.19
Less AP sales included in above	MU	3,983.04	6,302.44	10,285.48
Sales as per audited accounts (net of AP sales)	MU	13,637.82	19,117.89	32,755.71
Add AP sales approved by the Commission	MU	3,999.88	5,091.87	9,091.75
Approved/Audited sales adjusted for AP	MU	17,637.70	24,209.76	41,847.46
Approved Distribution losses	%	14.14%	14.14%	
Sales grossed up for Distribution losses	MU	20,542.39	28,196.79	48,739.18
Actual Interstate sales and banking	MU	841.90	1,237.70	2,079.60
Total power sold including inter-state sale and				
banking	Mu	21,384.29	29,434.49	50,818.78
Intrastate & Interstate transmission losses as				
per audited accounts	MU	805.35	1,115.63	1,920.98
	MU	3.63%	3.65%	52,739.76
Approved power purchase volume (Sales				
grossed up for Intrastate & Interstate				
transmission losses)	MU	22,189.64	30,550.12	52,739.76
Actual Power Purchase Volume	MU	23,404.14	32,038.20	55,442.34
Disallowed Units	Rs. Crore	1,214.50	1,488.08	2,702.58
Cost of disallowed units at actual variable cost				
i.e. @2.64	Rs. Crore	321.08	393.41	714.49
Two third to be borne by the Discoms	Rs. Crore	214.05	262.27	476.33
One third to be borne by the consumers		107.03	131.14	238.16
Thus, out of total power purchase cost incurred	by DISCOMs	, only 2/3rd de	termined above	shall be
disallowed and the remaining actual cost shall be	e allowed			
Actual cost incurred by DISCOMs during the FY				
2019-20 (incl HVPNL and SLDC charges)	Rs. Crore	11269.43	15291.58	26561.01
Less two third cost of losses to be borne by the				
Discom	Rs. Crore	214.05	262.27	476.33
Net power purchase cost admitted by the				
Commission	Rs. Crore	11055.38	15029.31	26084.68
Average per unit rate		4.98	4.92	4.95
Power purchase cost allowed in the ARR order				
07.03.2019				
Approved power purchase cost (incl HVPNL				
and SLDC)	Rs. Crore	9989.26	14746.84	24736.10
Average per unit rate		4.50	4.83	4.69
True up of Power purchase cost	Rs. Crore	1066.12	282.47	1348.58

The Commission, in light of the above calculations, approves the revised power purchase cost of UHBVNL at Rs. 11055.38 Crores and that of DHBVNL at Rs. 15029.31 Crores for the FY 2019-20.

## 3.1.12 Revenue from Sale of Power for the FY 2019-20 (Energy Sales)

#### **UHBVNL**

Chapter 3 Page 109 of 233

UHBVNL has submitted that Energy sales approved in Tariff Order dated 7<sup>th</sup> March 2019 were 16692 MU for UHBVN, whereas the energy sales as per the audited accounts are 17620.86 MU.

And that Energy sales of HT Industry and Domestic category have increased by 15.84% and 0.3% respectively for FY 2019-20 as compared to the approved sales in Tariff Order dated 7th Mar 2019. Primary reason for increase in sales for HT Industry is the increase in HT connections by around 9% (more than 600 new connections). Besides this, the grit shown for strict compliance of Citizen Charter for release of new connections has resulted in increase of actual sales.

Category wise Energy Sales of UHBVNL for FY 2019-20 (In MUs)

Consumer Category	Approved	Audited	Variation/Difference
	(A)	(B)	(A-B)
Domestic	5,418.00	6,392.04	(974.04)
Non- Domestic	3,138.00	3,354.53	(216.53)
HT Industry	7,583.00	6,286.78	1296.22
LT Industry	1,101.00	999.83	101.17
Lift Irrigation	212.00	208.27	3.73
Agriculture	5,404.97	6,302.44	(897.47)
Bulk Supply	952.00	1,011.05	(59.05)
Railways (Metro)	90.00	88.82	1.18
Street Light	106.00	102.84	3.16
Public Water Works	691.00	673.71	17.29
Total	24,695.97	25,420.33	(724.36)

#### **DHBVNL**

DHBVNL has submitted that the category wise energy sales were approved as 25,094.09 MUs for FY 2019-20 in Tariff Order dated 7thMarch 2019 whereas actual sales as per the audited accounts are 25,420.33 MUs.

DHBVNL has further submitted that the Commission in Tariff Order dated 1st June 2020 has revised the AP sales from 5,803.09 MUs to 5,404.97 MUs in APR for FY 2019-20, hence, the revised energy sales for FY 2019-20 is 24,695.97 MUs against which actual energy sales for FY 2019-20 is 25,420.33 MUs as per the Audited Accounts.

Energy sales to Domestic category has been increased by 17.98% in FY 2019-20 in comparison to sales approved in Tariff Order dated 7<sup>th</sup> March 2019. The primary reason for increase in sales is adherence to the Citizen Charter for timely release of new connections which resulted into increased sales while HT category sales has decreased by 17.09% which is mainly due to increase in Open Access.

Chapter 3 Page 110 of 233

Energy sales to AP consumers has been increased by 16.60% in comparison to sales approved in APR of FY 2019-20 in Tariff Order dated 6th June 2020 which is mainly due to lean monsoon during FY 2019-20.

Category wise actual energy sold to the consumers vis-à-vis that approved by the Commission for FY 2019-20 is tabulated as under: -

Category wise Energy Sales of UHBVNL for FY 2019-20 (In MUs)

Canauman Catagoni	Approved	Audited	Variation/Difference
Consumer Category	(A)	(B)	(A-B)
Domestic	5,418.00	6,392.04	(974.04)
Non- Domestic	3,138.00	3,354.53	(216.53)
HT Industry	7,583.00	6,286.78	1296.22
LT Industry	1,101.00	999.83	101.17
Lift Irrigation	212.00	208.27	3.73
Agriculture	5,404.97	6,302.44	(897.47)
Bulk Supply	952.00	1,011.05	(59.05)
Railways (Metro)	90.00	88.82	1.18
Street Light	106.00	102.84	3.16
Public Water Works	691.00	673.71	17.29
Total	24,695.97	25,420.33	(724.36)

Upon examination of the Audited accounts of the Discoms for the FY 2019-20, the Commission observes that the Discoms have recovered revenue from intrastate sale of power of Rs. 22503.84 Crore as against Rs. 22596.84 Crore estimated by the Commission. The True-up of revenue from intrastate sale of power for the FY 2019-20 is as given in the table below.

Revenue from sale of power for the FY 2019-20 (Rs. Crore)

Revenue for the FY 2019-20	UHBVNL	DHBVNL	TOTAL
Revenue from sale of power as per audited accounts	7897.63	11585.00	19482.63
Revenue from Fixed Charges	746.56	1071.39	1817.95
FSA	489.12	714.14	1203.26
Total	9133.31	13370.54	22503.84

Besides the revenue realised from the intrastate sale of power, the Discoms have also earned Rs. 833.09 crores from interstate sale and banking.

#### 3.1.13 Revised ARR for the FY 2019-20

In view of the above analysis, the Commission approves the revised ARR for UHBVNL and DHBVNL as per the details provided in the table(s) below:

Chapter 3 Page 111 of 233

True-up of UHBVNL for the FY 2019-20 (Rs. Crore)

Sr. No	Particulars	Approved as per Particulars Order dated 07.03.2019		Revised ARR approved by the Commission	
1	Power Purchase Expense	9,989.26	11,269.43	11,055.38	
1.1	Power Purchase Expense	8,471.51	9,766.90		
1.2	Interstate transmission charges	909.25	963.02		
1.3	Intrastate transmission & SLDC charges	608.5	539.5		
2	Operations and Maintenance Expenses	1,367.90	1,289.42	1288.7024	
2.1	Employee Expense	639.87	704.92	704.92	
2.2	Administration & General Expense	85.21	105.67	104.9524	
2.3	Repair & Maintenance Expense	142.82	81.89	81.89	
2.4	Terminal Liability	500	396.94	396.94	
3	Depreciation	332.72	317.2	317.2	
4	Total Interest & Finance Charges	342.8	606.42	354.7612501	
	Net Interest on CAPEX loans	140.4	126.44	126.44	
	Interest on Working Capital Loans	91.82	166.64	99.69	
	Interest on HVPNL/ Other Bonds	0	75.9	0	
	Interest on UDAY Loans and OFR for the State Govt	0	108.82	0	
	Interest on consumer security deposit	84.58	82.3	82.3	
	Other Interest and Finance Charges	26	46.33	46.33	
5	Return on Equity Capital	215.13	278.52	198.39	
6	Other Expenses		107.53	4.34	
7	Total Expenditure	12,247.81	13,868.52	13,218.77	
8	Less: Non-Tariff Income	197.25	305.24	305.24	
9	Net Aggregate Revenue Requirement	12,050.56	13,563.27	12,913.53	

True-up of DHBVNL for the FY 2019-20 (Rs. Crore)

		Approved as per	1101 01010)	Revised ARR
Sr.	Particulars	Order dated	Actual	approved by the
		07.03.2019		Commission
1	Total Power purchase cost	14,746.84	15,291.58	15029.31
1.1	Power Purchase Expenses	12,735.45	13,298.16	
1.2	Interstate transmission charges	1,280.17	1,287.53	
1.4	Intrastate transmission charges and SLDC charges	731.22	705.89	
2	Operations and Maintenance Expenses	1,643.44	1,601.84	1601.83
2.1	Employee Expense (Net of Capitalization)	969.66	918.67	918.67
2.2	Administration & General Expense (Net of Capitalization)	81.69	117.92	117.92
2.3	Repair & Maintenance Expense	165.34	122.34	122.34
2.4	Terminal Liability	426.75	442.9	442.90
3	Depreciation	307.01	259.99	259.99
4	Total Interest & Finance Charges	359.59	351.96	189.69
4.1	Interest on Capex Loans	140.77	69.21	69.21
	Interst on Working capital loans	126.7	108.94	26.06
	Interest on UDAY loans	0	79.39	0.00
	Interest on consumer security deposit	87.12	58.33	58.33
	Other Interest and Finance Charges	5	26.09	26.09
	Guarantee Fee	0	10	10.00
5	Return on Equity Capital	193.15	225.34	158.92
6	Other Expenses (Debits & Prior period Expenses)	-	40.23	24.33
7	Bad & Doubtful Debt		66.86	0.00
7	Total Expenditure	17,250.03	17,837.79	17264.06
8	Less: Non-Tariff Income	469.51	351.76	351.76
9	Net Aggregate Revenue Requirement	16,780.52	17,486.04	16912.30

## 3.1.14 True-up of Subsidy for the FY 2019-20

The petitioners have submitted that the Commission approved Rs. 6854.21 Crore towards Agriculture Subsidy for FY 2019-20. The same has been approved by considering the approved Agricultural Sales, per unit rate of LT Cost of Supply and Revenue recovered from

Chapter 3 Page 112 of 233

AP Consumers. Based on the approved agriculture sales of 9714.45 MU, per unit agriculture subsidy works out as Rs. 7.06 per Unit for FY 2019-20.

As submitted by the petitioners, actual Agriculture sales based on HERC methodology works out to 9091.75 MU for FY 2019-20 (UHBVN-3999.89 MU and DHBVN 5091.86 MU). Based on per unit agriculture subsidy, calculated as above, Agriculture Subsidy gets revised to Rs. 6414.85 Crores for Haryana Discoms during FY 2019-20. Detail calculations of Agriculture Subsidy for FY 2019-20 is tabulated as under:

Proposed True up of RE subsidy for FY 2019-20

Particulars	2019-20
Total RE subsidy allowed by HERC in Tariff order for 2019-20 (Rs Crs)	6,854.21
Total Agricultural sales approved by HERC in tariff order (MUs)	9,714.45
Calculated per unit Subsidy (Rs. /unit)	7.06
Agriculture Sales based on Feeder data minus 16% losses (MUs) UHBVN	3,999.89
Agriculture Sales based on Feeder data minus 16% losses (MUs) DHBVN	5,091.86
Agriculture Sales based on Feeder data minus 16% losses (MUs) for Haryana	9,091.75
Eligibility of subsidy based on actual sales of 2019-20 (Rs. Crs)	6,414.85
Subsidy Outstanding/(Surplus) (Rs. Crs)	(439.36)

The Commission had determined RE subsidy of Rs. 6854.21 Crore payable by the State Government to the Discoms for the FY 2019-20 based on an estimated CoS of Rs. 7.17 (CoS on LT supply) per unit for A.P. supply of 9714.45 MU. As the total ARR has now been revised because of the True-up of the FY 2019-20 and the quantum of power supplied to AP consumers during the FY 2019-20 has also been revised to 9091.75 MUs; the subsidy for AP supply payable by the State Government also needs to be revised to reflect the corresponding changes in the quantum and cost of the AP tube-well consumers.

In addition to the RE Subsidy, the State Government, w.e.f. 1st October, 2018, has also introduced a scheme for providing subsidised supply of power to domestic consumers who consume less than 500 units of power every month. The State Government is also providing subsidy for Industrial Consumers in certain specified areas. As per audited accounts, the subsidy on this account for power supplied by UHBVNL and DHBVNL during the FY 2019-20 is Rs. 66.88 crores and Rs. 68.35 crores respectively.

Accordingly, based on the true-up of expenses for the FY 2019-20 and revised approval of AP sales for the year, the Commission observes that revised subsidy for AP supply works out to Rs. 6581.61 crores. Based on the true up of costs, the Discoms have ended the year with a marginal surplus of Rs. 148.55 crores as determined below: -

Chapter 3 Page 113 of 233

Approved Revenue Gap for FY 2019-20 on true Up

Total ARR for FY 2019-20		As per Order	Revised
UHBVNL	Rs. Crore	12024.56	12913.53
DHBVNL	Rs. Crore	16780.53	16912.30
Total ARR for FY 2019-20	Rs. Crore	28805.08	29825.83
Revenue at current tariff on intrastate sale		22596.84	21300.58
Revenue from FSA from Non- AP consumers			1203.26
Revenue from Interstate sale			833.09
Total Revenue		22596.84	23336.93
Total Sales for FY 2019-20	MU	41786.45	41847.46
Average Cos for 2019-20		6.89	7.13
COS at LT level		7.17	
Adjusted Cost of Supply for AP consumers			7.41
AP sales for the FY 2019-20		9714.45	9091.75
Estimated Revenue from AP sales		111.05	176.28
Subsidy for AP supply at LT COS		6854.21	6563.67
Subsidy for other consumers		0.00	135.23
Total revenue incl Subsidy		29451.05	30035.83
Revenue surplus/(Gap) for FY 2019-20 at current tariff		645.97	210.00

The Commission observes that there is a surplus of Rs. 210 crores on true up for the FY 2019-20. The Commission further observes that the financial impact of Covid Pandemic on the Discoms is yet to be quantified and in the absence of these figures, it would be appropriate to reserve the surplus arising as above for adjustment against the certain financial impact of the decrease in revenue likely to be faced by the Discoms for the FY 2020-21.

#### 3.2 Annual Performance Review for FY 2020-21

#### **Background**

The petitioners have submitted that the Commission on 31st October 2019 notified HERC (Terms and conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 (hereinafter referred as "MYT Regulation 2019") for Second Control Period from FY 2020-21 to FY 2024-25. As per Regulation 11.6 "Mid- Year Performance Review and Tariff Setting" of MYT Regulation 2019, Annual Performance Review (APR) of FY 2020-21 is to be done in accordance with the Tariff Order of the relevant year. The relevant extract of the Regulation is provided as under: -

## 11. Mid -Year Performance Review and Tariff Setting

11.6 "The Commission shall review/consider, during the control period, the application made under this Regulation as also the application for truing up of the ARR of the previous year, as per provision of the Regulation 13, on the same

Chapter 3 Page 114 of 233

principles as approved in the MYT order on the original application for determination of ARR and tariff. The review / true-up for FY 2018-19 and FY 2019-20 shall, however, be done on the same principles as approved in the tariff order for FY 2018-19 and for FY 2019-20..."

Tariff Order on ARR and Retail Supply & Distribution Tariff for FY 2020-21 was issued by the Commission on 01.06.2020.

In line with the above, the Petitioners have submitted Annual Performance Review of ARR for FY 2020-21. Petitioner has considered actual available data for the first half of current financial year, pro-rata projections, and escalations as per principles defined in the MYT Regulations, 2019 to project the revised ARR for FY 2020-21. Projected ARR for APR Year vis-a-vis approved expenses is submitted for the approval of the Commission.

#### **Energy Sales FY 2020-21**

- 1. Energy sales of 15,057.52 MU were approved for UHBVN as per Tariff Order dated 01.06.2020. UHBVN, based on the actual sales of first six months i.e. 8552.79 MU, estimates total energy sales of 16,738.30 MUs for FY 2020-21.
- 2. Discoms have estimated the revised sales for FY 2020-21 based on the actual sales for the first half and projected sales of the second half. Energy sales for the second half have been projected based on either the 2 to 7 years CAGR of actual sales of corresponding period in the past years or the projections considering COVID impact.
- In the first half of FY2020-21, it was noticed that there was a considerable jump in the sales to domestic consumers. Given the lockdown imposed by state and central governments during April 2020 to June 2020, shutting down of shopping malls, eating spaces, tourism, travel, and respective stress on work from home by many private corporations, the increase in domestic sales was imminent. However, as the situation normalizes and as the offices, railways gradually resume operations in the second half, the high growth in domestic consumption in the first half is not expected to sustain. Hence, for projecting domestic consumption in FY 2020-21 H2, 5-year CAGR of 10.11% for UHBVNL and 8.92% for DHBVNL for domestic consumers has been considered.
- 4. With respect to Non-Domestic category, it has observed that the month-wise sales of FY21 Quarter 2 was on an increasing trend and recovering. July 2020 sales of NDS category was ~25% less than that of Jul 2019, whereas Sep 2020 NDS sales was only ~1.5% less than that Sep 2019. It clearly indicates a recovery trend. However,

Chapter 3 Page 115 of 233

considering there is still a considerable addition in consumer load, impact of COVID was not negated on NDS sales as people still prefer to stay at home and avoid going to commercial places such as malls, restaurants, gyms etc. for second half of the year. Hence, a comparatively moderate reduction of 5.8% in sales in considered for H2 of FY2020-21 for NDS category. However, for DHBVNL, a reduction of 27.48% has been considered.

- 5. Though the 7-year CAGR for HT sales is 11%, HT sales were severely affected during Apr-Jun 2020 period when the COVID lockdown was in full force. However, starting July 2020, HT sales started to recover and even surpassed the month-onmonth sales of Sep 2019 in Sep 2020. Considering the recovering trend of HT sales, a moderate COVID impact is considered and hence a muted ~4% increase in HT sales is considered for FY2020-21 H2 which for DHBVNL is -2.35%.
- 6. Though the 7-year CAGR for LT sales is 5.96%, LT sales were severely affected during Apr-Jun 2020 period when the COVID lockdown was in full force. However, starting July 2020, HT sales started to recover and even surpassed the sales of Sep 2019 in Sep 2020 albeit by a meagre 2.32%. Considering substantially reduced sales for LT category in Q1 of FY2020-21 and relatively slow recovery in Q2, an overall reduction of 2.78% is considered in LT sales for H2 for FY2020-21for UHBVNL whereas DHBVNL has considered a CAGR of 0.25% for the same period.
- 7. Sales to lift-irrigation consumers increased in a non-linear fashion. A sudden peak was observed in Aug 2020 sales for this category and weightage average % increase in sales for Aug-Sep 2020 was around ~28%. This increase is also not expected to continue and hence normal 7-year CAGR of 11.75% is considered by UHBVNL and 4.61% by DHBVNL for projecting the lift-irrigation category sales for H2 FY 2020-21.
- 8. Agriculture sales are largely dependent on ground water table, strength of monsoon and urbanisation. In the first half, decrease in AP Sales has been observed due to good monsoon season, therefore a nominal growth rate of 1.46% considered by Commission in Tariff Order dated 01.06.2020, the same has been considered to project sales of H2 of FY 2020-21 by UHBVNL as against 0.10% considered by DHBVNL.
- 9. There was substantial reduction in sales to Bulk supply consumers from May-Jul 2020. There is relatively less recovery in the Bulk supply sales post Aug 2020. As the 5 year and 7-year CAGRs are also negative, and due to the impact of COVID on this

Chapter 3 Page 116 of 233

- category, a moderate reduction of 3.83% and 9.4% in sales for this category is considered by UHBVNL and DHBVNL respectively for H2 of FY2020-21.
- 10. As Railways has shifted its major load into Medium Term Open Access and to include the impact of COVID due to limited running of freight and passenger trains, reduction of 10.56% in sales has been considered by UHBVNL for projecting the sales to Railways for second half of FY 2020-21. DHBVNL has submitted that as metro is not running to its full capacity and sales has not recovered since H1 of FY 2020-21, hence, a 2-year CAGR which is a reduced rate of 3.14% has been considered for H2 of FY2020-21
- 11. As street lights and PWW works were comparatively much less affected by the pandemic and the cumulative number of connections in these categories are expected to grow with time, 7 year CAGR of 10.16% for Street Lighting and 7 year CAGR of 3.74% for PWW is considered to project sales for H2 FY2020-21 by UHBVNL. DHBVNL has considered a 5-year CAGR of 16.07% for Street Lighting and 2-year CAGR of 5.96% for PWW to project sales for H2 FY2020-21.

Category wise energy sales approved vis-a-vis revised projections for FY 2020-21 are tabulated as under: -

Category wise Energy Sales for FY 2020-21 (in MUs) UHBVNL

Category	ory 2019-20 2020-21			1112				
	H1	H2	Total	Approved	Actual (H1)	CAGR	Proj. (H2)	Total
Domestic	2,542.58	2,107.32	4,649.90	4,632.00	2,911.13	10.11%	2,320.28	5,231.41
Non-Domestic	780.37	693.09	1,473.46	1,160.00	692.57	-5.80%	652.91	1,345.49
HT Industry	2,597.84	2,821.01	5,418.85	3,837.00	2,069.30	4.04%	2934.91	5,004.21
LT Industry	546.47	527.09	1,073.56	738.00	435.55	-2.78%	512.44	947.99
Lift Irrigation	29.81	34.24	64.05	62.16	31.61	11.75%	38.26	69.87
Agriculture	2479.35	1510.16	3989.52	3685.56	1973.82	1.46%	1,545.50	3,540.74
Bulk Supply	180.53	150.78	331.31	348	152.52	-3.83%	145.02	297.53
Railways	5.20	4.51	9.72	6.42	4.13	10.56%	4.04	8.17
Streetlight	4.38	0.48	4.86	4.91	0.26	-4.28%	0.45	0.72
MITC	44.46	41.32	85.78	88.21	37.59	10.16%	45.52	83.11
PWW	252.28	259.90	512.18	534.00	244.31	3.74%	269.62	513.93
Total	9,463.28	8,149.91	17,613.18	15,096.26	8,552.79		8,468.95	17,043.15

Category wise Energy Sales for FY 2020-21 (in MUs) DHBVNL

	Category wide Energy Calcord in 1 2020 21 (in mos) Bristine							
Category	FY 2019-20			FY 2020-21				
	H1	H2	Total	Approved	Actual	CAGR	Proj.	Total
					(H1)	1	(H2)	
Domestic	3,613.47	2,778.58	6,392.04	6,392.04	3,648.24	8.92%	3,026.53	6,674.77
Non-Domestic	1,852.12	1,502.41	3,354.53	3,354.53	1,343.20	-27.48%	1,089.59	2,432.79
HT Industry	3,282.20	3,004.59	6,286.78	6,286.78	2,232.31	-2.35%	2,934.07	5,166.38
LT Industry	518.11	481.71	999.83	999.83	416.44	0.25%	482.90	899.34
Lift Irrigation	101.13	107.14	208.27	208.27	96.64	4.61%	112.08	208.71
Agriculture	3,281.69	3,020.75	6,302.44	6,302.44	2,712.25	0.10%	2,203.83	4,916.09
Bulk Supply	546.66	464.39	1,011.05	1,011.05	576.25	9.94%	510.57	1,086.81

Chapter 3 Page 117 of 233

Metro	57.40	31.42	88.82	88.82	11.92	-3.14%	30.43	42.35
Streetlight	46.02	56.82	102.84	102.84	82.85	16.07%	65.95	148.79
PWW	333.36	340.35	673.71	673.71	321.09	5.96%	360.63	681.72
Total	13,632.16	11,788.16	25,420.33	25,420.33	11,441.18		10,816.58	22,257.76

## 3.3 The revised Aggregate Revenue Requirement for the FY 2020-21:

The revised estimate of Aggregate Revenue Requirement of the Discoms, as proposed, for FY 2020-21 is tabulated as under:

UHBVNL Proposed Aggregate Revenue Requirement for FY 2020-21 (Rs. Crores.)

Sr. No	Particulars	Approved	Revise Estimates
1	Total Power Purchase Expense	10,106.80	11831.08
1.1	Power Purchase Expense	8747.54	10471.82
1.2	Interstate transmission Charge	830.4	830.40
1.3	Intrastate transmission charges and SLDC charges	528.86	528.86
2	Operations and Maintenance Expenses	1307.28	1522.45
2.1	Employee Expense	740.76	760.98
2.2	Administration & General Expense	115.6	112.11
2.3	Repair & Maintenance Expense	146.93	149.36
2.4	Terminal Liability	303.99	500.00
3	Depreciation	325.49	367.21
4	Total Interest & Finance Charges	315.42	450.46
4.1	Interest on UDAY bonds payable to the State Government	-	-
4.2	Interest on WC loans including CC/OD limits	98.44	210.32
4.3	Interest on CAPEX loans	136.71	103.19
4.4	Interest Cost on Consumer Security Deposit	70.27	68.51
4.5	Interest on other bonds (HVPNL, FRP)	-	45.44
4.6	Other Interest and Finance charges	10.00	23.00
5	Return on Equity Capital	-	290.92
6	Other Expenses	-	-
7	Total Expenditure	12,054.99	14462.12
8	Less: Non-Tariff Income	221.56	221.56
9	Net Aggregate Revenue Requirement	11,833.43	14,240.56

The revised estimate of Aggregate Revenue Requirement of DHBVN for FY 2020-21 is tabulated as under:

DHBVNL Proposed Aggregate Revenue Requirement for FY 2020-21 (Rs. Crores.)

		APR		
S. No.	Particulars	FY 2020-21	FY 2020-21	
		Approved	Projected	
1.0	Power Purchase Expenses	13,945.86	14,731.47	
1.1	Power Purchase Cost	12,120.16	12,905.77	
1.2	Transmission Charges	1,216.80	1,216.80	
1.3	Transmission Charges & SLDC	608.90	608.90	
2.0	Operation & Maintenance Expenses	1,596.26	1,729.47	
2.1	Employee Expenses (net)	938.93	986.54	
2.2	Administration & General Expenses (net)	121.22	125.10	
2.3	Repair & Maintenance Expenses	176.11	174.93	
2.4	Terminal Benefits	360.00	442.90	
3.0	Depreciation	325.23	334.73	

Chapter 3 Page 118 of 233

		Α	.PR
S. No.	Particulars	FY 2020-21	FY 2020-21
			Projected
4.0	Interest & Finance Charges	442.51	426.10
4.1	Interest on Long Term Loan	181.25	131.16
4.2	Interest on Working Capital	159.30	168.06
4.3	Interest on UDAY Bonds		-
4.4	Interest on Consumer Security Deposit	75.89	91.49
4.5	Other Interest & Finance Charges	16.08	1.00
4.6	HVPNL Bond Charges		0.10
4.7	MDR Charges/ Digital Payment Transaction Cost		7.20
4.8	LC Charges		3.09
4.9	Guarantee Fee	10.00	24.00
5	Return on Equity Capital	-	265.64
6	Prior period expenses & other expenses	4	-
7	Other Debts, (including wealth tax)		-
8	Provisions for bad and doubtful debt		
9	Aggregate Revenue Requirement	16,309.86	17,487.41
10	Less: Non-Tariff Income	307.66	307.66
11	Net Aggregate Revenue Requirement	16,002.20	17,179.75

## 3.4 Revenue Gap Proposed for the FY 2020-21

Based on the revised estimates submitted above, the revenue surplus/(gap) summary for Haryana Discoms for FY 2020-21 is tabulated as under:

Revenue Gap for FY 2020-21(Rs. Crores)

Particulars	Approved	Revise Estimates
UHBVNL	11,833.43	14,240.56
DHBVNL	16,002.20	17,179.75
Total Aggregate Revenue Requirement	27,835.34	31,420.32
Total Revenue	20,241.20	23,090.31
Revenue from Inter-state sales		2,145.03
Revenue from Intra-state sales / Sale of Power		19,804.04
FSA		1,141.23
Revenue Surplus / (Gap)	(994.51)	(8,330.01)
Less: Total Subsidy	6,649.93	7,115.33
AP Subsidy		6,649.93
Domestic Subsidy & Others		465.40
Gap after AP Subsidy	944.51	(1,214.67)
Revenue Surplus/(gap) for FY 2018-19 carried forward	817.09	817.09
Carrying Cost @9.5%	120.72	120.72
Net Revenue Surplus / (Gap)	(6.70)	(276.86)

The Petitioners have submitted that the revenue gap for FY 2020-21 was not appropriately allowed to the Petitioner in the Tariff Order dated 01.06.2020. The revenue gap for FY 2020-21 tantamount to Rs. 1,215 Crores against the allowed amount in the Tariff Order. It pertinent to mention here that the COVID-19 Pandemic has eroded the liquidity of Rs 90,000 Crores from power sector. Liquidity crisis due to COVID-19 has put the distribution licensees into a situation of financial distress. The current situations looming under the COVID-19 will stretch further the financial viability of the Discoms. Therefore, it is requested that the Commission may kindly allow proposed revenue gap for FY 2020-21.

Chapter 3 Page 119 of 233

The Commission has considered the prayer of the Discoms for the revision of ARR for the FY 2019-20 as a consequence of the APR and observes that the expenditure incurred during the APR period does not warrant any upward revision in the ARR for the FY 2020-21. Further, it may be noted that due to the unprecedented economic slowdown due to covid pandemic, the Commission had disallowed any return on Equity. Accordingly, in view of the regulations and also of the fact that the revision in ARR is less than the return on equity calculated by the licensees, the Commission is of the considered view that it would not be appropriate to replace one set of estimated figures with another set of estimates for a small amount. Further, in view of the fact that the year is now almost over and it would be appropriate to examine the financial impact of mid-term performance review for the FY 2020-21 only once the Audited Accounts for the year are available. Hence, at this point of time the Commission is not inclined to revise the ARR for the FY 2020-21.

Chapter 3 Page 120 of 233

## Chapter 4

#### **Determination of ARR for FY 2021-22**

#### **Background**

The petitioner has submitted that the Aggregate Revenue Requirement (ARR) for FY 2021-22 has been prepared as per the approach specified under the Regulation 8.3 of MYT Regulations,2019. The financial components of Aggregate Revenue Requirement for FY 2021-22, had been projected based on the past trend, regulatory norms, activities planned and to be undertaken for the ensuing year.

The petitioner has submitted that the COVID-19 Pandemic has adversely impacted the gross domestic production across the state, this has resulted a significant drop in energy sales and eventually have created a situation of financial distress for the Petitioner. In order to make the realistic projection of financial parameters of Aggregate Revenue Requirement for FY 2021-22 certain deviations from the HERC MYT Regulations, 2019 have been sought and the necessary justification along with rationale have been prayed for in the Petition.

The Capital Investment Plan for second year of MYT Control Period has also been submitted for the approval of the commission along with current ARR Petition for FY 2021-22. The directives issued by the Commission in the Tariff Order dated 01.06.2020 had already been furnished before the Commission.

Accordingly, the detail projections of the financial parameters of the Aggregate Revenue Requirement for FY 2021-22 are elaborated in the subsequent sections.

## 4.1 Assessment of Energy Sales for FY 2021-22

Category wise energy sales is projected by UHBVNL, based on the 3 years to 7 years Compound Annual Growth Rate (CAGR) on energy sales of the true up year and is tabulated as under: -

CAGR for projecting Energy Sales (%age)

Category	2 years	3 years	5 years	7years	Selected CAGR
Domestic	11.26%	12.92%	11.02%	8.95%	11.02%
Non – Domestic	6.02%	5.88%	5.82%	7.37%	5.82%
HT Industry	9.54%	14.39%	9.03%	11.31%	9.03%
LT Industry	6.64%	7.82%	6.42%	6.41%	6.42%
Lift Irrigation	-4.73%	11.69%	3.07%	17.05%	3.07%
Agriculture	0.36%	-0.52%	0.03%	-	1.00%
Bulk Supply	5.08%	3.14%	0.49%	1.12%	3.14%
Railways	-69.54%	-62.25%	-42.48%	-28.74%	1.00%
Streetlight	79.03%	-25.24%	37.89%	-11.12%	1.00%

Chapter 4 Page 121 of 233

Category	2 years	3 years	5 years	7years	Selected CAGR
MITC	0.68%	17.96%	15.03%	10.24%	10.24%
PWW	8.71%	9.18%	3.63%	2.13%	3.63%

- Domestic category has shown significant increase in energy sales over the past years. The increase in domestic category consumption is primarily due to the online citizen services, implementation of Mhara Gaon Jag Mag Gaon Scheme, Urban Feeder Sanitisation Scheme and extensive vigilance drives. In the ensuing year the domestic consumption is also expected to increase due to containment measures undertaken in COVID-19 Pandemic. In the second quarter domestic consumption has increased by 20% over the energy consumption of the corresponding period in the last year. Therefore, domestic consumption of audited year is escalated sales with 5 years CAGR, i.e 11.02% to estimate the domestic sales for the ensuing year.
- Non-Domestic category consumption in second quarter has been recovered upto 95% of energy sales of relevant period in last year. In the ensuing year, the Unlock of COVID-19 lockdown would increase the Non-Domestic category consumption. Therefore, based on the above scenario Non-Domestic energy consumption is increased with 5 years CAGR, i.e. 5.82%, for projecting Non-Domestic Sales for the ensuing year.
- Energy sales of Industry category has been recovered significantly in the second quarter of the current year. HT Industry has shown the recovery of more than 100% whereas LT Industry has been recovered upto the level of 97%. Based on the increase in the number of connections over the period of two years, starting from FY 2019-20, an increase of 9.03% and 6.42% has been expected in the ensuing years for HT & LT industries respectively.
- Petitioner has planned to release a total of 23,000 new agriculture connections in the
  current and ensuing years. This would significantly increase the agriculture
  consumption in the ensuing year. Accordingly, based on the nominal growth of 1%
  allowed by the Commission to UHBVN in Tariff Order dated 01.06.2020 energy
  consumption for AP Category in the ensuing years has been estimated.
- Benefits avail by the Northern Railways on the Medium-Term open Access quantum
  has been withdrawn by the HERC vide its Order dated 17.06.2020. Therefore,
  increase in the consumption of Railways is expected in the ensuing year.
  Accordingly, a nominal increase of 1% is opted in the energy consumption of railways
  in the ensuing year.

Chapter 4 Page 122 of 233

In view of above, the category wise energy sales for the ensuing year, i.e. FY 2021-22 are tabulated as under:

UHBVNL Category wise sales for FY 2021-22 (in MU)

Category	CAGR	FY 2021-22
Domestic	11.02%	5,807.98
Non - Domestic	5.82%	1,423.78
HT Industry	9.03%	5,456.03
LT Industry	6.42%	1,008.82
Lift Irrigation	3.07%	72.01
Agriculture	1.46%	4039.88
Bulk Supply	3.14%	306.88
Railways	1.00%	8.25
Streetlight	1.00%	0.72
MITC	10.24%	91.62
PWW	3.63%	532.58
Total		18,748.55

## 4.2 Assessment of Energy Sales for FY 2021-22 by DHBVNL

Category wise energy sales for FY 2021-22 have been projected by considering Compound Annual Growth Rate (CAGR) of 2-year, 3 year, 5 year & 7 year sales. Keeping in view the category wise load growth, base year sales have been escalated with appropriate CAGR for estimating the sales for FY 2021-22.

CAGR of different years for projecting category wise energy sales is tabulated as under: -

**CAGR for projecting Energy Sales (%) DHBVNL** 

Category	2 years	3 years	5 years	7 years	CAGR
Domestic	13.33%	11.68%	10.39%	11.10%	10.39%
Non – Domestic	7.30%	9.59%	9.19%	8.98%	7.30%
HT Industry	2.68%	11.61%	4.46%	7.08%	2.68%
LT Industry	1.25%	3.61%	4.05%	6.46%	4.05%
Lift Irrigation	2.10%	11.99%	6.48%	5.25%	6.48%
Agriculture	-3.80%	-0.49%	1.06%	-	1.06%
Bulk Supply	13.83%	14.33%	8.57%	10.70%	8.57%
Railway Traction/Metro	8.04%	4.56%	20.10%	21.63%	2.00%
Street Light	7.81%	3.86%	12.92%	13.47%	7.81%
PWW	5.10%	8.68%	8.35%	10.13%	5.10%

• Domestic category has shown significant increase in energy sales over the past years. Increase in energy sale in Domestic Category is primarily due to the launch of online citizen services, implementation of Mhara Gaon Jag Mag Gaon Scheme, Urban Feeder Sanitisation Scheme and extensive vigilance drives. In the ensuing year the domestic consumption is also expected to increase due to containment measures undertaken in COVID-19 Pandemic. Energy sales of domestic category has shown a promising growth in the first half of the current year, therefore an

Chapter 4 Page 123 of 233

increase of 10.39% based on the CAGR of 5 years has been expected in ensuing year

- In the ensuing year, the Unlock of COVID-19 lockdown would increase the Non-Domestic category consumption. Therefore, based on the above scenario Non-Domestic energy consumption is increased with 2 years CAGR, i.e. 7.30%, for projecting Non-Domestic Sales for the ensuing year.
- Energy sales of Industry category has been recovered significantly in the first half of current year. Based on the increase in the number of connections over the period of two years, starting from FY 2019-20, an increase of 2.68% and 4.05% has been expected in the ensuing years for HT & LT industries respectively.
- Agriculture sales have been projected by 5 year of CAGR of 1.06%.
- Further, the Railways has shifted to Medium Term Open Access and due to impact of Covid-19 pandemic, therefore, nominal growth rate of 2.00% has been considered for projecting the sales for Railways/Metro category for FY 2021-22.

In view of above, the following category wise energy sales is projected for FY 2021-22:

Statement of sales for FY 2021-22 (MUs) DHBVNL					
Sr. No.	Category	CAGR	FY 2021-22		
1	Domestic	10.39%	7,056.15		
2	Non - Domestic	7.30%	3,599.26		
3	Industry HT	2.68%	6,455.19		
4	Industry LT	4.05%	1,040.34		
5	Lift Irrigation	6.48%	221.77		
6	AP Sales	1.06%	5,180.81		
7	Bulk Supply	8.57%	1,097.72		
8	Railways/Metro	2.00%	90.60		
9	Street Light	7.81%	110.88		
10	PWW	5.10%	708.04		
	Total		25,560.76		

# 4.3 Agriculture Pump (AP) Sales- FY 2019-20, FY 2020-21 (revised) & FY 2021-22 (projected).

The Commission has examined the submissions of the DISCOMs (UHBVNL and DHBVNL) regarding AP sales for the period mentioned above and decided that in the present Order the Commission shall continue with the same methodology as adopted in its previous Order based on data emanating from segregated AP feeders for assessing AP Sales.

Chapter 4 Page 124 of 233

Accordingly, the Commission has analysed for the true up for FY 2019-20, revised estimated for FY 2020-21 and projected for FY 2021-22 in respect of AP sales of the Petitioners as under: -

#### 4.4 True up of AP Sales for FY 2019-20 (True-up of RE Subsidy).

The Petitioners, based on actual AP sales have prayed for approval of Rs. 6414.85 Crores as revised RE Subsidy for year FY 2019-20. The commission in Tariff order dated 07.03.2019 had approved Rs. 6854.21 Crores towards RE Subsidy for FY 2019-20. The data submitted for AP sales for FY 2019-20 is reproduced as under: -

AP Sales as Submitted by DISCOMs (MU)

Sr. No.	AP sales	FY 2019-20
1	UHBVNL	3999.89
2	DHBVNL	5091.86
3	Total AP Sales of two DISCOMs (1+2)	9091.75

Based on above data submitted by the Petitioners, the AP consumption of the two Distribution Licensees is computed as follows:

AP Sales as Trued up by Commission for FY 2019-20 (MU)

AP consumption	UHBVN	DHBVN
	(2019-20)	(2019-20)
AP units as recorded on segregated AP feeders	4721.80	5864.32
Loss @ 16%	755.49	938.29
Net consumption from AP feeders	3966.31	4926.03
Add AP units on other feeders	47.36	235.25
Less Consumption of other category consumers on segregated AP feeders	13.79	69.41
Total AP consumption	3999.88	5091.87
Total AP consumption of two DISCOMs (rounded off)		9091.75
Total AP consumption approved by Commission in Tariff Order dated 07.03.2019.		9714.45

It is observed from the above table that the actual AP consumption 9091.75MU for FY 2019-20 is lower than the AP consumption approved by the Commission in Tariff Order dated 07/03/2019 for FY 2019-20 (9714.45 MU). Accordingly, the total AP sale in respect of both the DISCOMs is approved as 9091.75MU (UHBVNL- 3999.88MU and DHBVNL-5091.87MU) for FY 2019-20.

Further, the Commission in Tariff Order dated 07.03.2019 had allowed subsidy of Rs. 6854.21 Cr. against 9714.45 MU of AP sales for FY 2019-20 for both DISCOMs and per unit agricultural subsidy works out to be Rs. 7.06/kWh.

For Trueing up of FY 2019-20, the revised subsidy is approved as Rs. 6,414.85 Cr. against the actual AP consumption of 9091.75 MU.

Chapter 4 Page 125 of 233

"The Commission, in its Tariff Order dated 15/11/2018, had directed the Petitioners to engage a third party for authenticating the AP sales data for FY 2017-18 and supply hours vis-a-vis reasons of variance in supply hours and to submit analysis report at the time of next ARR filling. However, the said directive remained un-complied as the requisite report is still awaited. The Commission now directs the Petitioners to include the FY 2018-19 AP Sales data as part of the same scope of work and submit its report within 3 months from the date of this Order. In its absence the Commission shall be constrained to consider true-up of AP sales."

DHBVN vide work order No. 86/EA-57/2019 dated 10.12.2020 has engaged M/s Pranat Engineering Pvt. Ltd. 91, Kiran Vihar, Karkardooma, Delhi for authentication of AP consumption of 11 Nos. selected AP feeders in DHBVN and firm will submit the report within 3 months. UHBVN has already submitted report of M/s EESL engaged for carrying out study of energy consumption data on selected AP feeders and as per study the T&D losses of AP feeders in each circle is approximately 16%, which is sync. with losses allowed by HERC. The Commission observes that UHBVNL in its Note No. 18.1 for Audited Accounts of FY 2019-20 and FY 2018-19 has indicated Sales for Agriculture category as 3983.04 and 3546.20 MU respectively. However, the Agricultural Sales computed as per the Commission's methodology works out as 3999.88 MU and 3572.90 MU for FY 2019-20 and FY 2018-19 respectively. The Commission recognises the fact of various underlying assumptions like loss factor of 16% etc. involved in the computation of AP Sales.

The Commission further observes that the DHBVN Agriculture sales for FY 2019-20 is 6302.44MU as per figures supplied in Petition and 5091.87 MU computed as per Commission's methodology, which indicates a significant difference of 1210.58 MU and appear to be unrealistic and is against the principle of law of physics i.e. energy sold can never be more than the energy/electricity pumped into the system. Therefore, Commission feels that this aberration as observed needs to be investigated. The Commission also observed the similar difference of 999.57 MU in ARR Order dated 01.06.2020 and pained to pointed out that despite issuance of specific directives to this effect in tariff orders, DHBVN did not submit any report /justification to the Commission.

In view of the above, the Commission again directs DHBVN to analyse the aberration pointed out above and submit the report to Commission within one month of this order. Also, a report of third party engaged for analysing and authenticating its AP sales of FY 2017-18, FY 2018-19 and FY 2019-20 as directed in previous Tariff Orders need to be submitted within 3 months from the date of this order and to examine the AP sales data meticulously for the FY 2020-21.

Chapter 4 Page 126 of 233

#### 4.5 AP Sales Estimation for FY 2020-21.

UHBVN has submitted that AP sales for FY2020-21 have been projected by taking into consideration the actual sales of first half and nominal growth rate of 1.46% for sales of the second half of FY 2019-20. In the ensuing years, UHBVN proposed the release of pending as well as new AP Tube well connections and therefore taken nominal growth rate of 1.46 to project the AP Sales for FY 2020-21.

DHBVN has submitted that agriculture sales largely depend on ground water table, strength of monsoon and urbanisation. In the first half of 2020, decrease in AP sale has been observed due to good monsoon season, therefore, reduced rate of 0.10 % has been taken to project sales of the FY 2020-21.

The DISCOMs have submitted their projected Agriculture consumption for FY 2020-21 and FY 2021-22 as mentioned below:

AP Sales Projected by DISCOMs for FY 2020-21& FY 2021-22 (MU)

Sr. No.	AP sales	FY 2020-21	FY 2021-22
1	UHBVNL	3540.74	4039.88
2	DHBVNL	4916.09	5180.81
3	Total AP Sales of DISCOMs (1+2)	8456.83	9220.69

Subsequently, the Discoms, vide letter dated 10.02.2021 have submitted the following AP Sales for the FY 2020-21 estimated on the basis of actual consumption from April 2020 – Jan 2021 and projected date from Feb. 21 to March 21.

Name of Discoms	Actual (Apr20 to	Projected (Feb21	FY 2021-22
	Jan21) MUs	to Mar21) MUs	(Projected) MUs
UHBVNL	3587.00	263.68*	3850.68
DHBVNL	4443.87	802.81**	5246.08
TOTAL			9096.76

<sup>\*</sup> Input energy on segregated feeders for February and March 2021 has been projected as booked during the corresponding months of 2020.

The Discoms have submitted that the Commission may consider a realistic growth in AP Consumption of 5% during the FY 2021-22.

The Commission, however, for maintaining parity in projections for both the Discoms, has computed / projected AP Consumption for the FY 2020-21 considering the actual

Chapter 4 Page 127 of 233

<sup>\*\*</sup> The AP Sales data is actual till January 2021 and for Feb and March it is the average of corresponding months during the last 3 years.

consumption up to January 2021 and projection for Feb & march 2021 as booked in Feb and March 2020 as under:

AP Sales Projection FY 2020-21 (MU)

Name of Discoms	Actual (Apr20 to	Projected (Feb21	FY 2021-22
	Jan21) MUs	to Mar21) MUs	(Projected) MUs
UHBVNL	3587.00	263.68	3850.68
DHBVNL	4443.87	683.00	5126.87
TOTAL			8977.55

The Commission has considered appropriate to consider an annual growth of 5% as proposed by the Discoms for projecting AP Sales for the FY 2021-21.

Accordingly, the Commission allows following AP Sales for the Discoms for the FY 2021-22.

AP Sales Projection FY 2021-22 (MU)

Name of Discoms	HERC approved AP Sales for FY 2021-22 (MU)
UHBVNL	4043.21
DHBVNL	5383.21
TOTAL	9426.42

### 4.6 Sales Projections (Other Consumer Categories)

The Commission has considered the sales projection methodology adopted by the Discoms and observes that the quantum of consumer category wise sales has returned to the normal levels post COVID – 19. Hence, continuing with the CAGR methodology, as also proposed by the Discoms, is expected to yield fairly reliable estimates of sales during the ensuing year i.e. FY 2021-22. As against the total sales of 44,309.31 MUs, the Commission has approved 43,238.49 MUs i.e. a reduction of 1070.82 mostly due to lesser AP Sales allowed by the Commission as per the methodology of AP sales projection adopted by the Commission and some reduction in the DS sales. Accordingly, the sales projected by the Discoms and that approved by the Commission in line with the methodology followed by the Commission till the FY 2019-20 (FY 2020-21 being an exceptional year) is tabulated below: -

	UHBVNL		DHBVNL		<b>Total Discoms</b>
	Proposed	Approved	Proposed	Approved	HERC Approved
	FY 2021-22				
•	MU	MU	MU	MU	MU
Domestic	5,807.98	5,260.78	7,056.15	7,085.55	12,346.33
Non - Domestic	1,423.78	1,551.77	3,599.26	3,532.12	5,083.89
HT Industry	5,456.03	5,456.03	6,455.19	6,425.24	11,881.27
LT Industry	1,008.82	1,134.42	1,040.34	999.87	2,134.29
Lift Irrigation	72.01	66.2	221.77	208.33	274.53
Agriculture*	4039.88	4043.21	5,180.81	5383.21	9426.42
Bulk Supply	306.88	340.65	1,097.72	1,104.18	1,444.83

Chapter 4 Page 128 of 233

Railways	8.25	8.25	90.60	90.60	98.85
Streetlight	0.72	86.61	110.88	114.46	201.07
MITC	91.62	0.72	0.00	0.00	0.72
PWW	532.58	542.23	708.04	708.48	1,250.71
Total	18,748.55	18,490.87	25,560.76	25,652.04	44,142.91

Note: Discoms revised proposal (combined) is 9551.58 MUs for FY 2021-22.

#### 4.7 Power Purchase volume

## Projections by UHBVNL / DHBVNL (FY 2021-22)

The Discoms, in its MYT Petitions(s) have submitted that Haryana Power Purchase Centre (HPPC) (the designated agency) procures power on their behalf from long-term tied up generating plants approved by the Commission i.e. Central Power Generating Plant like NTPC, NHPC, NPCIL and UMPP, shared power projects like HPGCL, BBMB, SJVNL, THDC and IPPs like Adani Power, Lanco Amarkantak, GMR and others. Further, it has been submitted that under Govtt. of India ambitious plan to set up 175 GW of renewable capacity by 2022, HPPC has tied up renewable capacity from SECI and other sources through competitive bidding route.

That the power purchase cost for the FY 2021-22 has been projected by assuming that the overall demand shall only be met from long term sources approved by the Commission.

Availability from such sources has been projected as per the respective actual annual PLF of during the last three years. Further, the must -run status has been retained for projecting energy availability from RE Sources and merit order dispatch has been kept in view for other sources / thermal generating plants. In the case of thermal power plants, the energy availability considered at the technical minimum threshold for balancing demand and supply for the relevant month. Power surrender has been restricted to the backing down capacity of the respective generation station. Surplus power available in certain months has been first balanced with the energy requirement in the balance months. The balance surplus quantum post adjusting the deficit is treated as interstate sales / sales to market.

#### 4.8 Commission's Estimate of Power Purchase Quantum:

The Commission has taken note of the methodology for projecting availability of power by the Discoms for the FY 2021-22 as mentioned in the preceding paragraph. It is observed that average of actual PLF may not necessarily replicate in the ensuing year. Hence, it would be appropriate to use more recent generation data. Resultantly, the Commission, as per past practice, is of the considered view that each year the Central Electricity Authority (CEA) publishes annual generation programme i.e. Gross Generation Program from conventional

Chapter 4 Page 129 of 233

sources (Thermal, Hydro and Nuclear) stations which is also available in the public domain. The power plant wise monthly Generation Programme is prepared by CEA, based on the actual generation by the Stations during previous years, R&M of Units, annual overhaul / boiler, capital overhaul, units likely to be commissioned and other maintenance works furnished by the Generators. Despite the fact that there could be variations in the actual month wise actual generation vis-à-vis the targets due to various factors including forced shutdowns and changes in individual Station's actual maintenance schedules as well as actual commissioning of new capacities and constraints in availability of specific sources like hydro or gas etc. The Commission believes that the generation programme determined by the CEA is the most reliable option for estimating power availability in the present case and has also stood test of time. Hence, for estimating the power availability in Haryana for both the distribution licensees (UHBVNL and DHBVNL) in the FY 2021-22, the Commission has considered the following: -

- (a) Available CEA's generation targets net of normative auxiliary energy consumption for the FY 2020-21 with appropriate adjustments wherever considered appropriate.
- (b) Allocated share of Haryana in the respective generating stations.
- (c) Past trend of actual generation achieved vis-a-vis CEA's generation targets.
- (d) HPGCL's generation targets as approved by the Commission for FY 2021-22.
- (e) Expected power availability from new generating stations as proposed by the Discoms.
- (f) Availability of power from RE Sources as proposed by the Discoms.

It is presumed that the Discoms have a valid PPA duly approved by the Commission for all the proposed sources of power for which approval has been sought. Hence, in no manner should the sources, as considered by the Commission, in its present Order, be construed as approval of PPA unless the Commission, vide a specific order, has accorded approval to the PPAs.

In line with the broad methodology set out above, the Commission, for the FY 2021-22, has proceeded as follows.

Chapter 4 Page 130 of 233

## i) Availability of power from HPGCL

The Commission has considered power availability at the bus bar from HPGCL sources as per its Order dated 18.02.2021 (HERC / PRO 76 / 2020) in the matter of HPGCL's Petition on determination of HPGCL's Generation Tariff for the FY 2021-22. The details / assumptions of the same are mentioned in the said Order. Hence, for the sake of brevity, they are not being re-produced here. The power availability (ex-bus energy in MUs) from HPGCL's Power Plants as determined by the Commission in ibid Order is presented in the table below: -

Particulars	HERC Approval (MU)
HPGCL	14,914

## ii) Availability of Power from Faridabad (FGPP)

The Discoms Power Purchase Agreement (PPA) with 432 MW Faridabad gas-based power station of NTPC expired on 31.12.2015. On the petition filed by the HPPC the Commission passed the Order dated 5.10.2016 as under: -

- "....the Commission considers it appropriate to approve the PPA with Faridabad Gas Power Plant (NTPC) up to 31<sup>st</sup> December, 2025, as proposed by the HPPC/NTPC subject to the following conditions:-
- i) Draft PPA for the above period shall be amended suitably as per the observations communicated by the Commission in the matter.
- ii)HPPC/Discoms shall schedule power on APM Gas only.
- iii) NTPC shall be free to sell, to a third party outside Haryana, any power that may be generated by NTPC using fuel other than APM Gas. To that extent, the fixed cost liability of HPPC shall be accordingly reduced. The condition 4.0 (para 4) of the PPA shall be modified suitably".

Subsequently, vide order dated 25.06.2020, the Commission approved purchase of power from FGPP i.e. bundled fuel or spot RLNG or APM gas for the remaining useful life of the project i.e. up to 31.12.2025.

As FGPP is a generating station dedicated to Haryana, the Commission, based on generation target finalized by CEA netted of for Auxiliary Energy Consumption, has considered 290 MUs to be available from this source during the FY 2021-22. The Commission's approved volume of power from FGPP is as under: -

Chapter 4 Page 131 of 233

NTPC- Faridabad Gas (CCPP)

Particulars	HERC Approval MU
Faridabad Gas CCPP	290

## iii) Availability of power BBMB (Bhakra, Dehar & Pong)

The Discoms have share (to the extent of shares owned by HVPNL) in capacity entitlement to the extent of 33.02% in Bhakra, 32.02% in Dehar, 16.67% in Pong (all BBMB stations). The Commission has considered the CEA's generation targets for the BBMB Stations, adjusted for auxiliary energy consumption, available separately for Bhakra & Upratings, Dehar and Pong, Accordingly, the Commission, for the FY 2021-22 approves availability of 2578 MU from this source i.e. same as projected by the Discoms: -

Power Availability from BBMB

Particulars	HERC Approval MU
BBMB	2578

# iv) Availability of power from NTPC Power Stations

The Commission has considered the station wise gross generation targets fixed by the CEA and reduced the same by normative auxiliary energy consumption. Accordingly, corresponding to the allocated share of Haryana in the various power stations of NTPC, with a few adjustments for the actual drawl in the preceding years, the Commission, for the FY 2021-22 approves the quantum of power as under: -

**Power Purchase Volume from NTPC** 

NTPC	HERC Approval (MU)
Singrauli STPS	1307
Rihand STPS I	409
Rihand STPS II	359
Rihand STPS III	353
Unchhahar TPS I	53
Unchhahar TPS II	111
Unchhahar TPS III	60
Unchhar TPS IV	195
Anta CCPP	19
Auraiya CCPP	19
Dadri CCPP	71
Farakka STPS	83
Kahalgaon I STPS	109
Kahalgaon II STPS	331
Kol Dam HPS	138
Tanda TPS Stage -2 (Unit-1)	89

Chapter 4 Page 132 of 233

The total availability of power in the FY 2020-21 from the aforesaid NTPC sources works out to 3706 MU.

# v) Availability of Power from NHPC Power Plants

The Commission, for projecting power availability from NHPC sources in the FY 2021-22 has relied upon generation targets fixed by the CEA after adjusting the same for auxiliary energy consumption and home State share. The generating station wise details are as under: -

## Power purchase volume from NHPC (Hydro)

NHPC	HERC Approval (MU)
Salal I HPS	507
Bairasiul HPS	127
Tanakpur HPS	25
Chamera I HPS	337
Chamera II HPS	49
Chamera-III HPS	80
Dhauliganga HPS	56
Dulhasti HPS	105
Uri HPS	137
Uri-II HPS	69
Sewa II HPS	25
Parbati-III HPS	58

The total availability of power from NHPC as estimated by the Commission for the FY 2021-22 is 1575 MUs.

## vi) Availability of Power from NPCIL sources

The Commission observes that the CEA also determines generation targets for the power stations of the Nuclear Power Corporation. Hence, power availability from NPCIL (NAPP and RAPP) have been accordingly approved as under: -

Power Purchase Volume from NPCIL

Particulars	HERC Approval (MU)
NAPP	195
RAPP	545

The total quantum of power available from NPCIL sources in the FY 2021-22 works out to 740 MUs.

Chapter 4 Page 133 of 233

## vii) Power Purchase from Other Sources

(a) Power Procurement from a few other sources proposed by the Discoms include CGPL, Mundra (UMPP), Sasan UMPP, APCL, DVC (Mejia B, Koderma & Raghunathpur), Adani Power Ltd., Mundra, THDC, MGSTPS (CLP), Lanco Amarkantak,etc. The Commission has considered the CEA generation targets for the wherever available. In cases where generation targets are not available the proposals of the Discoms adjusted for the past trend have been approved.

## (b) Availability of Power from Independent Power Producers/PTC

In addition to the power available from Central Sector, State Sector and Shared Utilities, the Discoms have projected availability of power from PTC Tala, PTC J&K, PTC Karcham Wangtoo and Lanco Amarkantak etc. The Commission has estimated availability of power from these sources as per the generation targets fixed by CEA. In case the same is not available for any generating station(s) the same has been taken as per Discoms projections / adjusted for the past trend. The generating station wise details approved by the Commission for the FY 2021-22 is as per the following table.

Availability of Power from PTC & Other Long-Term Sources

Particulars	HERC Approval (MU)
PTC J&K (Baglihar HEP)	272
PTC Lanco Amarkantak TPS (Unit – 2)	1818
PTC JSW Karcham Wangtoo HEP	1399
PTC GMR Kamalanga TPS	1842
Tala HPS	40
DVC Mejia	438
DVC Koderma	417
DVC Raghunathpur	689
CGPL Mundra UMPP	2510
Sasan UMPP	3278
IGSTPP (Aravali) Jhajjar	2406
Adani Power Ltd.	8545
MGSTPS (CLP) Jhajjar	3441
SJVNL – Nathpa Jhakri HEP	287
SJVNL – Rampur HEP	69
Hydro New (Sikkim & HP)	1287
THDC - Tehri	211
THDC - Koteshwar	48
Pragati Power CCPP	156
Parbati II (Hydro) NHPC	71
Tanda TPS Stage – 2 (Unit II) NTPC	72

Chapter 4 Page 134 of 233

The total power availability in the FY 2021-22 from the above-mentioned sources, estimated by the Commission, is 29,296 MUs.

## viii) Availability of Power from Renewable Energy Sources

The Commission is committed to encourage cogeneration and non-conventional fuel-based generation including solar generation projects. Hence, the power purchase volume from such sources has been determined keeping in view the power availability from renewable sources in the FY 2021-22 for which the Commission has approved PPAs. The Discoms should, however, meet the solar and non-solar RPO as provided in the HERC RE Regulations in vogue. The power availability from renewable energy sources approved by the Commission is per details provided below:

# **Availability from Renewable Energy Sources (MUs)**

	, ,
Bhoruka HPS	29
P&R Gogripur HPS	10
Puri Oil Mill HPS	14
Shahbad Sugar Mill	81
Naraingarh Sugar Mill	140
Ch Devi Lal Sugar Mill	9
Haryana Co. Sugar Mill	54
Hafed Sugar Mills	9
Meham Sugar Mill	0
Starwire Biomass	66
Gemco Biomass	54
AB Grains	34
Sri Jyoti Biomass	64
Mor Bio (Biogas)	8
SDS Solar	2
C&S Solar	2
Chandraleela Solar	1
Sukhbir Solar	2
Zamil Solar	2
Siwana Solar	8
H.R. Mineral Solar	2
Tayal & Co. Solar	2
VKG Solar	2
Utrecht Solar	2
Subhash Solar	2
Balarch Solar	2
JBM Solar	33
HPGCL Solar	17
SECI Solar	133
	•

Chapter 4 Page 135 of 233

SECI Wind (1000 MW)	298
Paddy Stubble (New)	314
Amplus Sun Solutions – solar	83
KUMSUM projects – solar	25
ISTS Solar	489
HPGCL Solar (New)	90
Solar (competitive bidding route)	232
ISTS Wind P ii&III	1235
ISTS Wind & HYbrid	2902
JBM (WtE)	43
Sainson Paper Indust.	20
RSL Distilleries	17
Cleantech Power	9
Eco green Energy	82

The total RE Power as per the aforesaid approval for the FY 2021-22 works out to 6623 MUs.

### 4.1 Total Approved Power Purchase Quantum

In view of the above source wise approvals of quantum of power expected to be available in the FY 2021-22, the Commission determines power availability both from inter-state and intra-state generators of 59,720 MUs as compared to 60,958 MUs projected by the Discoms.

#### **4.2 Power Purchase Cost**

The cost of power purchased by the Discoms is mostly a known parameter as the same is governed by the Power Purchase Agreement(s) with the IPPs/electricity traders. In the case of Central Power Sector Units (CPSU's) or generators supplying power to more than one State, the tariffs as approved by the Central Electricity Regulatory Commission (CERC) are applicable. While in the case of State Projects, i.e. HPGCL the generation tariff is determined by the HERC. Most of the elements constituting the total cost of generation i.e. capacity charges, base energy related charges, adjustment of base energy charges for cost of fuel and other factors, taxes, duties, incentive payments etc. are well defined and can be estimated with a fair degree of accuracy.

In view of the above, the cost of allowed power purchase for the FY 2021-22 has been determined largely keeping in view the provisions of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019.

Chapter 4 Page 136 of 233

- Generating Station wise fixed cost of power is based on the actual fixed cost incurred by the Discoms in the FY 2020-21.
- ii. Generating Station wise Fuel / Variable Cost is based on the average of the actual variable charges / energy charges incurred by the Discoms.
- iii. The cost of power purchase from HPGCL has been considered as per the Commission's Generation Tariff Order for the FY 2021-22.

The details of approved power purchase rates (Rs/kWh), cost (Rs. Million) and quantum (Million Units), from various sources for the FY 2021-22 are presented in the table that follows. It is observed that the average fixed cost as per the quantum and cost projected by the Discoms is about Rs. 1.33 / kWh and fuel cost Rs. 2.77 / kWh (Average Power Purchase Cost- APPC being Rs. 4.10 / kWh). While as per the quantum and cost projected by the Commission the same works out to Rs. 1.17 / kWh and Rs. 2.67 / kWh (APPC being Rs. 3.84 / kWh without Transmission charges. In accordance with the source wise volume and cost of power purchase approved by the Commission as indicated in the table that follows, the total volume of power available in the FY 2021-22 is approved at 59,720 million units (kWh) rounded off at a fixed cost of Rs. cost of Rs. 70056 million and variable cost of Rs 159343 million (rounded off). Hence, the allowed total cost of power purchase in the FY 2021-22 is pegged at Rs. 229399 million (rounded off).

## The average rate of power purchase (APPC), without transmission charges, for the FY

It is reiterated that the Discoms should ensure that power is procured only from those sources for which the Commission has approved PPA's. Additionally, any power from Central Generating Stations, beyond the quantum for which the PPA has been signed and specifically approved by the Commission must be surrendered in case the Discoms have to back down any approved long-term source of power. It is made clear that any power procured from sources not specifically approved by the Commission and/ or excess quantum vis-à-vis the approved PPA purchased by the Discoms shall be disallowed by the Commission.

In addition to the above and keeping in view the surplus power availability scenario obtaining in Haryana, the Commission directs that the Discoms shall not procure any additional power over and above the quantum approved in the PPA that may be available to it from the unallocated share / share relinquished by any other State in the Central Generating Power

Chapter 4 Page 137 of 233

Stations. The Commission thereto shall disallow all such power procurements and the cost thereto.

# Summary of source wise power purchase quantum and cost approved by the Commission is presented in the table below: -

NTPC   NAME	HERC APPROVED POWER PURCHASE QUANTUM AND COST FOR FY 2021-22							
MU	SOURCE	Quantum			Cost	Total Cost	Average Cost	
NTPC								
Singrauli STPS   1307	NITOC	MU	Rs/ kWh	Rs. Million	Million	Rs. Million	Rs / kWh	
Rihand STPS I 409 1.54 631 402 1033 2. Rihand II TPS 359 1.54 552 300 852 2. Rihand II TPS 353 1.52 535 624 1159 3. Unchahar TPS II 53 3.28 175 89 263 4. Unchahar TPS III 60 3.37 202 121 329 5. Unchahar TPS III 60 3.37 202 121 329 5. Anta CCPP 19 2.75 52 135 186 9. Auraiya CCPP 19 2.77 52 202 254 13. Dadri CCPP 71 2.69 192 225 416 5. Faridabad CCPP 290 2.78 804 2508 3312 11. Farakka STPS 83 2.80 234 102 336 4. Kahalgaon I STPS 109 2.29 249 193 442 4. Kahalgaon I STPS 138 2.57 356 943 1299 9. Tanda TPS Stage - 2 (Unit - I) 89 2.74 245 53 298 3. NHPC Salal I HPS 507 0.65 328 900 1228 2. Bairasiul HPS 127 0.80 101 297 398 3. Tanakpur HPS 337 1.19 403 326 729 2. Chamera II HPS 49 1.01 50 2.29 303 299 601 5. Chamera II HPS 56 1.28 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 3. Dulhasti HPS 137 0.86 128 72 104 176 6. SIVNL (Nathpa Jhakri) HPS 287 1.19 343 406 748 2. Rampur HPS 48 2.43 117 134 251 5. Nuclear Power Corp. (NPC) NAPP (Narora) 195 3.16 617 0 617 3. RAPP 545 3.65 1988 0 1988 3.		1207	1 40	1024	071	2005	2 22	
Rihand II TPS         359         1.54         552         300         852         2.           Rihand III TPS         353         1.52         535         624         1159         3.           Unchhahar TPS II         133         3.28         175         89         263         4.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         3.37         202         121         329         5.           Unchhahar TPS III         60         2.75         52         202         254         13           Anta CCPP         19         2.77         52         202         254         13           Barl CCPP         71         2.69							2.22	
Rihand							2.32	
Unchhahar TPS							3.28	
Unchhahar TPS II							4.95	
Unchhahar TPS III							4.93	
Unchhahar TPS IV							5.49	
Anta CCPP 19 2.75 52 135 186 9.  Auraiya CCPP 19 2.77 52 202 254 13.  Dadri CCPP 71 2.69 192 225 416 5.  Faridabad CCPP 290 2.78 804 2508 3312 11.  Farakka STPS 83 2.80 234 102 336 4.  Kahalgaon I STPS 109 2.29 249 193 442 4.  Kahalgaon II STPS 331 2.17 719 568 1287 3.  Kol Dam HPS 138 2.57 356 943 1299 9.  Tanda TPS Stage - 2 (Unit - I) 89 2.74 245 53 298 3.  NHPC Salal I HPS 507 0.65 328 900 1228 2.  Bairasiul HPS 25 1.73 44 61 105 4.  Chamera I HPS 337 1.19 403 326 729 2.  Chamera I HPS 49 1.01 50 52 102 2.  Chamera II HPS 80 2.07 165 212 378 4.  Dhauliganga HPS 56 1.28 72 104 176 3.  Dulhasti HPS 105 2.89 303 299 601 5.  Uri I HPS 137 0.86 118 198 316 2.  Uri I HPS 69 2.24 154 238 392 5.  Sewa II HPS 69 2.24 154 238 392 5.  Sewa II HPS 58 1.62 94 276 371 6.  SIVNIL (Nathpa Jhakri) HPS 69 2.43 168 199 367 5.  THDC  Tehri (THDC) HPS 211 2.15 453 578 1031 4.  Koteshwar HPS 48 2.43 117 134 251 5.  NAPP (Narora) 195 3.16 617 0 617 3.  RAPP 545 3.65 1988 0 1988 0 1988 3.							5.30	
Auraiya CCPP							9.87	
Dadri CCPP							13.53	
Faridabad CCPP 290 2.78 804 2508 3312 11.  Farakka STPS 83 2.80 234 102 336 4.  Kahalgaon I STPS 109 2.29 249 193 442 4.  Kahalgaon II STPS 331 2.17 719 568 1287 3.  Kol Dam HPS 138 2.57 356 943 1299 9.  Tanda TPS Stage - 2 (Unit - I) 89 2.74 245 53 298 3.  NHPC  Salal I HPS 507 0.65 328 900 1228 2.  Bairasiul HPS 127 0.80 101 297 398 3.  Tanakpur HPS 25 1.73 44 61 105 4.  Chamera II HPS 337 1.19 403 326 729 2.  Chamera II HPS 80 2.07 165 212 378 4.  Dhauliganga HPS 56 1.28 72 104 176 3.  Dulhasti HPS 137 0.86 118 198 316 2.  Uri I HPS 69 2.24 154 238 392 5.  Sewa II HPS 58 1.62 94 276 371 6.  SIVNL (Nathpa Jhakri)  SIVNL (Nathpa Jhakri)  SIVNL (Nathpa Jhakri)  SIVNL (Nathpa Jhakri)  SIVNL (Nathpa Jhakri) HPS 48 2.43 117 134 251 5.  NAPP (Narora) 195 3.16 617 0 617 3.  RAPP 545 3.65 1988 0 1988 0 1988 3.							5.83	
Farakka STPS							11.43	
Kahalgaon I STPS       109       2.29       249       193       442       4.         Kahalgaon II STPS       331       2.17       719       568       1287       3.         Kol Dam HPS       138       2.57       356       943       1299       9.         Tanda TPS Stage - 2 (Unit - I)       89       2.74       245       53       298       3.         NHPC       Salal I HPS       507       0.65       328       900       1228       2.         Salar Siul HPS       127       0.80       101       297       398       3.         Tanakpur HPS       127       0.80       101       297       398       3.         Chamera I HPS       25       1.73       44       61       105       4.         Chamera II HPS       337       1.19       403       326       729       2.         Chamera II HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Uri I HPS							4.03	
Kahalgaon II STPS       331       2.17       719       568       1287       3.         Kol Dam HPS       138       2.57       356       943       1299       9.         Tanda TPS Stage - 2 (Unit - I)       89       2.74       245       53       298       3.         NHPC         Salal I HPS       507       0.65       328       900       1228       2.         Bairasiul HPS       127       0.80       101       297       398       3.         Tanakpur HPS       25       1.73       44       61       105       4.         Chamera II HPS       337       1.19       403       326       729       2.         Chamera-III HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dullasti HPS       56       1.28       72       104       176       3.         Uri I HPS       137       0.86       118       198       316       2.         Uri-I HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhak							4.03	
Rol Dam HPS   138   2.57   356   943   1299   9.     Tanda TPS Stage - 2 (Unit - I)   89   2.74   245   53   298   3.     NHPC							3.89	
Tanda TPS Stage - 2 (Unit - I)       89       2.74       245       53       298       3.         NHPC       Sor       0.65       328       900       1228       2.         Bairasiul HPS       127       0.80       101       297       398       3.         Tanakpur HPS       25       1.73       44       61       105       4.         Chamera I HPS       337       1.19       403       326       729       2.         Chamera III HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         SJVNL (Nathpa Jhakri)       8       1.62       94		4					9.40	
NHPC							3.34	
Salal I HPS         507         0.65         328         900         1228         2.           Bairasiul HPS         127         0.80         101         297         398         3.           Tanakpur HPS         25         1.73         44         61         105         4.           Chamera II HPS         337         1.19         403         326         729         2.           Chamera III HPS         49         1.01         50         52         102         2.           Chamera-III HPS         80         2.07         165         212         378         4.           Dhauliganga HPS         56         1.28         72         104         176         3.           Dulhasti HPS         105         2.89         303         299         601         5.           Uri-II HPS         137         0.86         118         198         316         2.           Uri-II HPS         69         2.24         154         238         392         5.           Sewa II HPS         25         2.78         71         105         176         6.           Parbati-III HPS         58         1.62         94         276		83	2.74	243	- 33	238	3.34	
Bairasiul HPS         127         0.80         101         297         398         3.           Tanakpur HPS         25         1.73         44         61         105         4.           Chamera II HPS         337         1.19         403         326         729         2.           Chamera III HPS         49         1.01         50         52         102         2.           Chamera-III HPS         80         2.07         165         212         378         4.           Dhauliganga HPS         56         1.28         72         104         176         3.           Dulhasti HPS         105         2.89         303         299         601         5.           Uri I HPS         137         0.86         118         198         316         2.           Uri-II HPS         69         2.24         154         238         392         5.           Sewa II HPS         25         2.78         71         105         176         6.           Parbati-III HPS         58         1.62         94         276         371         6.           SJVNL (Nathpa Jhakri)         287         1.19         343		507	0.65	228	900	1228	2.42	
Tanakpur HPS       25       1.73       44       61       105       4.         Chamera I HPS       337       1.19       403       326       729       2.         Chamera II HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THOC       Tehri (THDC) HPS       211       2.							3.13	
Chamera I HPS       337       1.19       403       326       729       2.         Chamera II HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       8       2.87       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THOC       Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS <t< td=""><td></td><td></td><td></td><td></td><td></td><td></td><td>4.15</td></t<>							4.15	
Chamera II HPS       49       1.01       50       52       102       2.         Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri) HPS       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS       48 <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>2.16</td>							2.16	
Chamera-III HPS       80       2.07       165       212       378       4.         Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri) HPS       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       Thick         Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS       48       2.43       117       134       251       5.				+			2.06	
Dhauliganga HPS       56       1.28       72       104       176       3.         Dulhasti HPS       105       2.89       303       299       601       5.         Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       7       7       134       251       4.         Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       7							4.72	
Dulhasti HPS         105         2.89         303         299         601         5.           Uri I HPS         137         0.86         118         198         316         2.           Uri-II HPS         69         2.24         154         238         392         5.           Sewa II HPS         25         2.78         71         105         176         6.           Parbati-III HPS         58         1.62         94         276         371         6.           SJVNL (Nathpa Jhakri)         8         1.62         94         276         371         6.           SJVNL (Nathpa Jhakri)         8         1.19         343         406         748         2.           Rampur HPS         69         2.43         168         199         367         5.           THDC         THDC           Tehri (THDC) HPS         211         2.15         453         578         1031         4.           Koteshwar HPS         48         2.43         117         134         251         5.           Nuclear Power Corp. (NPC)         195         3.16         617         0         617         3.           RAPP<							3.11	
Uri I HPS       137       0.86       118       198       316       2.         Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       SJVNL (Nathpa Jhakri) HPS       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC         Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       NAPP (Narora)       195       3.16       617       0       617       3.         RAPP       545       3.65       1988       0       1988       3.							5.74	
Uri-II HPS       69       2.24       154       238       392       5.         Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       8       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       8       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       8       2.11       2.15       453       578       1031       4.         Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       8       2.43       117       134       251       5.         NAPP (Narora)       195       3.16       617       0       617       3         RAPP       545       3.65       1988       0       1988       3							2.31	
Sewa II HPS       25       2.78       71       105       176       6.         Parbati-III HPS       58       1.62       94       276       371       6.         SJVNL (Nathpa Jhakri)       8       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       7       100       10							5.69	
Parbati-III HPS         58         1.62         94         276         371         6.           SJVNL (Nathpa Jhakri)           SJVNL (Nathpa Jhakri) HPS         287         1.19         343         406         748         2.           Rampur HPS         69         2.43         168         199         367         5.           THDC         Tehri (THDC) HPS         211         2.15         453         578         1031         4.           Koteshwar HPS         48         2.43         117         134         251         5.           Nuclear Power Corp. (NPC)         NAPP (Narora)         195         3.16         617         0         617         3.           RAPP         545         3.65         1988         0         1988         3.							6.92	
SJVNL (Nathpa Jhakri)       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       NAPP (Narora)       195       3.16       617       0       617       3.         RAPP       545       3.65       1988       0       1988       3.							6.35	
SJVNL (Nathpa Jhakri) HPS       287       1.19       343       406       748       2.         Rampur HPS       69       2.43       168       199       367       5.         THDC       Tehri (THDC) HPS       211       2.15       453       578       1031       4.         Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       NAPP (Narora)       195       3.16       617       0       617       3.         RAPP       545       3.65       1988       0       1988       3.		30	1.02	3-1	270	371	0.55	
Rampur HPS       69       2.43       168       199       367       5.         THDC       Company of the properties		287	1 19	343	406	748	2.60	
THDC         Control of the contro	• • • •						5.32	
Tehri (THDC) HPS         211         2.15         453         578         1031         4.           Koteshwar HPS         48         2.43         117         134         251         5.           Nuclear Power Corp. (NPC)	•		2.43	100	133	307	3.32	
Koteshwar HPS       48       2.43       117       134       251       5.         Nuclear Power Corp. (NPC)       Secondary Corp. (NPC)		211	2 15	453	578	1031	4.89	
Nuclear Power Corp. (NPC)         9         617         0         617         3.6           RAPP         545         3.65         1988         0         1988         3.				+			5.20	
NAPP (Narora)         195         3.16         617         0         617         3.           RAPP         545         3.65         1988         0         1988         3.			25		<u> </u>	231	3.20	
RAPP 545 3.65 1988 0 1988 3.		195	3.16	617	n	617	3.16	
	, ,	1		+			3.65	
							4.47	
Shared Project			3.32	32303		30,03	11.17	

Chapter 4 Page 138 of 233

BBMB HPS	2578	0.00	0	1812	1812	0.70
DVC						0.7.0
Mejia TPS	438	2.90	1268	968	2235	5.11
Koderma TPS	417	2.62	1092	1259	2351	5.64
Raghunathpur TPS	689	3.26	2246	1024	3270	4.75
UMPP	003	3.20	2240	1024	3270	4.73
CGPL Mundra UMPP TPS	2510	1.92	4815	2189	7005	2.79
Sasan UMPP TPS	3278	1.30	4253	553	4805	1.47
Others (Long Term Sources)	3278	1.30	4233	333	4803	1.47
PTC Tala, HPS	40	2.27	90	0	90	2.27
	1842	1.29		2548		
PTC GMR Kamalanga TPS			2376		4924	2.67
PTC Baglihar HPS J&K	272	3.91	1061	0	1061	3.91
PTC Lanco Amarkantak TPS	1818	1.96	3561	2651	6212	3.42
PTC Karchamwangtoo HPS	4200	4.03	2554	2005	55.40	2.07
376 MW	1399	1.83	2554	2995	5548	3.97
PTC Karchamwangtoo HPS						
New	2.425	2.50	2447	05.55	15000	7.00
IGSTPP, Jhajjar (Aravali) TPS	2406	3.50	8417	8565	16982	7.06
Pragati Power CCPP	156	2.52	394	1404	1798	11.53
Adani Power Ltd. Mundra TPS	8545	2.49	21295	8394	29689	3.47
Teesta III HPS	0	0.00	0	0	0	0.00
MGSTPS, CLP, Jhajjar TPS	3441	3.60	12388	9113	21501	6.25
RE Power						
Bhoruka HPS	29	3.49	102	0	102	3.49
P&R Gogripur HPS	10	4.26	41	0	41	4.26
Puri Oil Mill HPS	14	3.67	50	0	50	3.67
Shahbad Sugar Mill	81	4.04	326	0	326	4.04
Naraingarh Sugar Mill	140	5.13	719	0	719	5.13
Ch. Devi Lal Sugar Mill	9	4.04	36	0	36	4.04
Haryana Co. Sugar Mill	54	6.39	344	0	344	6.39
Hafed Sugar Mill	9	4.04	36	0	36	4.04
Meham Sugar Mill	0	0.00	0	0	0	0.00
Starwire (biomass)	66	8.85	587	0	587	8.85
Gemco (biomass)	54	8.85	474	0	474	8.85
AB Grain (Biomass Co-gen)	34	8.97	301	0	301	8.97
Sri Jyoti (biomass)	64	8.97	571	0	571	8.97
Mor Bio (biogas)	8	7.18	59	0	59	7.18
Solar Projects				0		
SDS Solar (JNNSM)	2	5.66	9	0	9	5.66
C&S Solar (JNNSM)	2	5.66	9	0	9	5.66
Chandraleela Solar (JNNSM)	1	5.71	8	0	8	5.71
Sukhbir Solal (JNNSM)	2	5.66	9	0	9	5.66
Zamil Solar (JNNSM)	2	5.66	9	0	9	5.66
Siwana Solar	8	6.01	50	0	50	6.01
H.R. Mineral Solar (JNNSM)	2	5.66	9	0	9	5.66
Tayal & Co Solar (JNNSM)	2	5.66	9	0	9	5.66
VKG Solar (JNNSM)	2	5.66	9	0	9	5.66
Utrecht Solar (JNNSM)	2	5.66	9	0	9	5.66
Subhash Solar (JNNSM)	2	5.66	9	0	9	5.66
Balarch Solar (JNNSM)	2		9		9	
		5.66		0		5.66
JBM Solar	33	5.68	189	0	189	5.68
HPGCL Solar	17	4.89	81	0	81	4.89
SECI Solar	133	5.50	730	0	730	5.50
Wind Power (SECI) 1000 MW	298	2.71	807	0	807	2.71

Chapter 4 Page 139 of 233

Paddy Stubble PP (New						
Projects)	314	5.38	1691	0	1691	5.38
Amplus Sun Solutions Pvt Ltd	83	2.99	248	0	248	2.99
PM KUSUM Solar	25	3.34	85	0	85	3.34
ISTS Solar	489	2.47	1209	0	1209	2.47
HPGCL Solar (New)	90	2.99	268	0	268	2.99
Solar Power (Compt Bidding)	232	2.99	695	0	695	2.99
ISTS Wind Projects P II & III	1235	2.52	3111	0	3111	2.52
ISTS Wind & Hybrid)	2902	2.70	7836	0	7836	2.70
Gati/Dans/Shiga/IA HPS	1287	3.97	5104	0	5104	3.97
Parbati II NHPC	71	1.60	113	0	113	1.60
JBM (WtE)	43	8.47	367	0	367	8.47
Sainson Paper Indust.	20	4.15	84	0	84	4.15
RSL Distilleries	17	6.77	117	0	117	6.77
Cleantech Power	9	7.24	62	0	62	7.24
Ecogreen Energy	82	8.47	692	0	692	8.47
Tanda TPS Stage - 2 (Unit - II)						
NTPC	72	2.75	198	0	198	2.75
TOTAL	59720	2.67	159336	70056	229399	3.84

#### 4.9 Interstate Transmission Charges & SLDC Charges

Inter State transmission charges for ARR year FY 2021-22 has been projected by the petitioners by escalating the approved transmission cost of the FY 2020-21 with CERC annual escalation rate of 7.27% published on 05.10.2020. The Commission has considered the proposal and finds the same in order and accordingly approves interstate transmission charges for UHBVNL at Rs. 890.77 crores and for DHBVNL at Rs. 1305.26 crores as proposed.

#### 4.10 Intrastate Transmission Charges & SLDC Charges

The proposal of the petitioners for the Intra-state transmission charges for ARR year FY 2021-22 is based on the 5% escalation on the approved transmission cost for FY 2020-21.

However, the Commission, vide its Order dated 9<sup>th</sup> March, 2021 on HVPNL's Transmission Tariff and SLDC charges petition for the FY 2021-22, has approved Transmission tariff and SLDC charges to be recovered by HVPNL from UHBVNL and DHBVNL. The intrastate transmission charges approved include the unitary charge arising out of transmission project commissioned through Public Private Partnership (PPP) between HVPNL and M/s Jhajjar KT Transco Private Limited. The details including monthly recovery of the transmission and SLDC charges from various beneficiates including the Discoms are given in the ibid order. Hence, the same is not being reproduced here. The transmission and SLDC Charges, as determined by the Commission in the ibid Order, shall form part of the ARR of the Discoms for the FY 2021-22.

Chapter 4 Page 140 of 233

#### 4.11 Transmission losses

The petitioners have based their power purchase cost projections based on Interstate transmission losses of 3.82% and Intrastate transmission loss trajectory specified in Regulation 45.4 of MYT Regulation 2019 for ensuing year.

The Commission observes that for past many years, the Commission has been considering the interstate transmission losses as proposed by the licensees. However, in light of objections raised by various interveners, the Commission thought it appropriate to reexamine the issue in light of actual transmission losses incurred by the licensee as per audited accounts. The Commission observes that UHBVNL has lost 3.63% and DHBVNL 3.65% of its energy towards transmission losses, both interstate and intrastate, during the FY 2019-20 as per the audited accounts and this is less than the proposed loss on account of interstate transmission losses for the FY 2021-22. Accordingly, the Commission has based its calculations of power purchase cost after considering the total transmission losses (interstate and intrastate) at the level of 3.63%. In view of the fact that the intrastate transmission losses level for the FY 2021-22 is set at 2.10% for the FY 2021-22 as per the MYT regulations, as against 2.15% in the FY 2019-20, the intrastate transmission losses, tentatively, are pegged at 1.80% for the purpose of calculations of power purchase cost. It may be noted that the transmission losses are allowed at actual at the time of true up of the Distribution licensees.

## 4.12 Energy Balance

Based on the above projections, energy balance for the ensuing year is tabulated as under:

Energy available for Sale to the Distribution Licensees for the FY 2021-22							
Sr.	Particulars	Units	UHBVNL	DHBVNL	Total		
No.							
1	Gross energy procured from outside the state sources	MUs	12084.04	16763.96	28848.00		
2	Interstate sale / banking	MUs	2625.04	3641.67	6266.72		
3	Energy procured from outside the state sources net of	MUs	9458.99	13122.29	22581.28		
	interstate sale / banking						
4	Inter-state transmission losses	%	1.80%	1.80%	1.80%		
5	Inter-state transmission losses	MUs	170.26	236.20	406.46		
6	Net energy available from outside the state	MUs	9288.73	12886.09	22174.82		
7	Add energy generated within the state	MUs	12931.86	17940.14	30872.00		
8	Net energy available for use in Haryana/ Total energy	MUs	22220.60	30826.22	53046.82		
	at Haryana Boundary						
9	Intra-state transmission losses	%	2.10%	2.10%	2.10%		
10	Intra-state transmission losses	MUs	466.63	647.35	1113.98		
11	Energy at Discom Boundary	MUs	21753.96	30178.87	51932.84		
12	Distribution loss	%	15.00%	15.00%	15.00%		
13	Distribution loss units	MU	3263.09	4526.83	7789.93		
14	Units available for sale by DISCOMS/ Discom approved	MU	18490.87	25652.04	44142.91		

Chapter 4 Page 141 of 233

	sales				
	Total energy purchase		25015.90	34704.10	59720.00
	Power purchase cost	Rs. Mil	96089.22	133302.78	229392.00
15	Average rate		3.84	3.84	3.84
	Total power purchase cost				
	Fixed cost				70056.00
	Total Variable cost of sold units by DISCOMS				142616.08
16	Total Cost of Power		89085.47	123586.61	212672.08
17	Total Transmission and SLDC Charges		17620.20	23381.59	41001.80
18	Total Cost		106705.67	146968.20	253673.87
	Units purchased for units sold by Discoms		22220.60	30826.22	53046.82
19	Average Power purchase rate		4.80	4.77	4.78
20	Average Bulk Supply Rate at Discom Boundary		4.91	4.87	4.88

In addition to the above and keeping in view the surplus power availability scenario prevailing in Haryana, the Commission directs that the Discoms shall not procure any additional power over and above the quantum approved in the PPA that may be available to it from the un-allocated share / share relinquished by any other State in the Central Generating Power Stations in case it does not fall in the merit order despatch. The Commission thereto shall disallow all such power procurements and the cost thereto. Additionally, while resorting to bidding or calling for expression of interest for power procurement the Discoms must ensure that the power under PPAs already approved by the Commission materialises and also the intra-State generator i.e. HPGCL's power plants are scheduled at least up to the critical minimum threshold before considering backing down.

The DISCOMs are directed to perform cost benefit analysis including trade-off between purchase of REC and RE Power before considering proposal to procure RE Power.

As per Commission estimates, the availability of energy is considerably in excess of the estimated requirement during the FY 2021-22, thereby leading to an additional cost of more than Rs.800 crores on account of stranded fixed cost. In view of the above observation, the Discoms must gear up their power purchase procurement planning and strengthen its trading activities for disposal of surplus power. It would be appropriate for the licensee to closely monitor, on daily basis, the surplus capacity, which could neither be backed down nor sold off even at variable cost and is therefore leading to trading losses. The Discoms must fine tune their projection models and ensure that surplus energy available is disposed of in a cost-effective manner.

Chapter 4 Page 142 of 233

#### 4.13 Operation & Maintenance Expenses

The operation and maintenance expenses comprise Employee Expenses, Repair & Maintenance expenses and Administration & General expenses. O&M expenses for MYT Control Period are projected as per Regulation 57.4 of MYT Regulations 2019. The relevant extract of the Regulations is reproduced as under:

"The actual audited O & M expenses for the financial year preceding the base year, subject to prudence check, shall be escalated at the escalation factor of 4% to arrive at the Employee costs and Administrative and General Costs for the base year of the control period. The O&M expenses for the nth year of the control period shall be approved based on the formula given below".

$$O&M_n = (R&M_n + EMP_n + A&G_n)^* (1-Xn) + Terminal Liabilities$$

Where,

 $R&M_n$  – Repair and Maintenance Costs of the Distribution Licensee(s) for the nth year;

 $EMP_n$  – Employee Costs of the Distribution Licensee(s) for the nth year excluding terminal liabilities;

 $A&G_n$  – Administrative and General Costs of the Distribution Licensee(s) for the nth year:

The above components shall be computed in the following manner.

(a) 
$$R&M_n = K * GFA * INDX_n/INDX_{n-1}$$

Where,

'K' is a constant (expressed in %) governing the relationship between O&M costs and Gross Fixed Assets (GFA) for the nth year. The value of K will be 1.65% for DHBVN and UHBVN respectively for the entire control period;

'GFA' is the average value of the gross fixed asset of the nth year.

' $INDX_n$ ' means the inflation factor for the nth year as defined herein after.

(b) EMP<sub>n</sub> (excluding terminal liabilities) +  $A&G_n = (EMP_{n-1} + A&G_{n-1})^* (INDX_n/INDX_{n-1})$ 

Where,

 $INDX_n$  – Inflation Factor to be used for indexing the Employee Cost and A&G cost. This will be a combination of the Consumer Price Index (CPI) and the Wholesale Price Index (WPI) for immediately preceding year and shall be calculated as under:

Chapter 4 Page 143 of 233

$$INDX_n = 0.55*CPI_n + 0.45*WPI_n$$

**Note 1:** For the purpose of estimation, the same INDXn value shall be used for all years of the control period. However, the Commission shall consider the actual values of the INDXn at the end of each year during the annual performance review exercise and true-up the employee cost and A&G expenses on account of this variation.

**Note 2:** Any variation in employee cost and A&G cost on account of reasons beyond variation in INDXn shall be subject to the incentive and penalty framework specified in regulation 12.

**Note 3:** As and when any material price index specific to power sector or a more relevant Index becomes available, the same shall replace the Index used for working out R&M cost.

**Note 4:** Terminal liabilities shall be approved as per actual expenditure incurred by the distribution licensee or established through actuarial valuation for the ensuing year.

**Note 5:** O&M expenses made on account of extraordinary situations (if any) shall be submitted to Commission for its approval. Such expenses shall be filed separately and will not be subjected to incentive and penalty framework. The approved amount by the Commission shall be trued up in the annual performance review.

**Note 6:** Changes in the pay scales of employees necessitated on account of pay revision by Pay Commission or by the State Government orders shall be considered by the Commission for true-up during the annual performance review.

Note 7: Source for CPI and WPI calculation as under:

Wholesale Price Index numbers as per Office of Economic Advisor of Government of India in the previous year

Consumer Price Index for Industrial Workers (all India) as per Labour Bureau, Government of India in the previous year

## (c) $X_n$ is an efficiency factor for nth year

The Value of  $X_n$  will be determined by the Commission in the MYT order for the control period.

Chapter 4 Page 144 of 233

#### 4.14 Computation of Inflation Factor

Operation and Maintenance expenses of APR year are escalated with inflation factor to project the O&M expenses of ARR year FY2021-22. Inflation factor is calculated as per Regulation 57.4 of MYT Regulation, 2019. Values of relevant Indices is tabulated as under:

#### Inflation factor for WPI & CPI

#### **WPI Inflation**

Month/Year	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Avg.
FY 2020-21	119.2	117.5	119.3	121.0	121.7	122.9							120.3
FY 2019-20	121.1	121.6	121.5	121.3	121.5	121.3	122.0	122.3	123.0	123.4	122.2	120.4	121.8
FY 2018-19	117.3	118.3	119.1	119.9	120.1	120.9	122.0	121.6	119.7	119.2	119.5	119.9	119.8
FY 2017-18	113.2	112.9	112.7	113.9	114.8	114.9	115.6	116.4	115.7	116.0	116.1	116.3	114.9

#### **CPI Inflation**

Month /	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Avg.
Year													
FY 2020-21	329	330	332	336	338								333.0
FY 2019-20	312	314	316	319	320	322	325	328	330	330	328	326	322.5
FY 2018-19	288	289	291	301	301	301	302	302	301	307	307	309	299.9
FY 2017-18	277	278	280	285	285	285	287	288	286	288	287	287	284.4

As the index's values are available only till Sep 2020 for FY2020-21, inflation factor hence is calculated considering value for CPI and WPI indices till FY2019-20. Based on above values for indices, inflation factor for ARR period works out as 6.09%. Detailed calculation for determination of Inflation factor is tabulated as under:

Inflation Factor for ARR year FY2021-22

Particulars	WPI	СРІ	Total
Weightage	0.45	0.55	1.00
Avg Indexation for FY19-20	121.80	322.50	
Avg Indexation n (Index * Wt.)	54.81	177.38	232.19
Avg Indexation for FY18-19	119.79	299.92	
Avg Indexation n-1 (Index * Wt.)	53.91	164.95	218.86
Combined Inflation (Indxn/Indxn-1)		6.09%	•

The Commission has examined the calculations and approves as the same being in line with the MYT Regulations in vogue.

#### 4.15 Employee Expenses

#### **Employee Expenses of UHBVN**

UHBVNL has submitted that the projected employee expenses of APR year FY 2020-21 are escalated with the combined inflation calculated above, i.e. 6.09%, to estimate the employee expenses of ARR year. Further, as per recruitment plan of UHBVN, approximately 2,000 new employees were expected to join during the 1st year of MYT Control Period i.e. the APR

Chapter 4 Page 145 of 233

year of FY 2020-21. However, currently the pace of recruitment is relatively slow. In order to include the cost of these new recruitments, 25% of 2000 new employees were already considered to be recruited in FY2020-21 and 75% in ARR year FY2021-22. Considering the average basic salary and applicable dearness allowance, employee cost for these planned new recruitments is included over and above the employee cost estimation explained in previous point.

Terminal benefits for ARR year is kept equivalent to the values approved by the commission for true-up year FY2019-20 in tariff order dated 07.03.2019. Summary of Proposed employee expenses is tabulated as under: -

**Employee Expenses for FY2021-22 (In Cr.)** 

Particulars	FY 2021-22
Salaries	672.98
Dearness Allowance	80.44
Other Allowances	118.45
Terminal benefits	500.00
Gross Employee Expense	1,371.87
Less Expenses Capitalised	11.05
Net Employee Expenses	1,360.83

UHBVN has requested that the Commission may kindly allow the projected employee cost for ARR year FY2021-22.

# **Employee Expenses of DHBVN**

DHBVNL, in its projections have also escalated the employees Expense of APR year FY 2020-21 as computed in above sections by indexation factor of 6.09% to project the Employee Expenses for FY 2021-22. Further, as per the recruitment plan of DHBVN, approximately 1099 new employees may join during the FY 2021-22. Considering the basic salary of Rs. 25,500/- and dearness allowance of Rs. 4,335/- the employee expense for FY 2021-22 has been projected. Considering the average basic salary and applicable dearness allowance, employee cost for these planned new recruitments is included over and above the employee cost estimation explained in previous point.

Terminal benefits for FY 2021-22 have been retained at the level of actual expense of FY 2019-20. The summary of employees cost proposed by DHBVNLis given in the below table: -

**Employee Expenses for FY 2021-22 (Rs Crores)** 

Employee Expenses for 1 1 2021-22 (NS Offics)				
Particulars	FY 2021-22			
Salaries	590.03			
Dearness Allowance	92.06			
Expenditure on Employees Engaged on Contractual Basis	273.32			
Other Allowances	141.35			
Terminal Benefits	442.90			

Chapter 4 Page 146 of 233

Gross Employee Expense	1,539.66
Less Expenses Capitalised	11.21
Net Employee Expenses	1,528.45

The Commission has examined the projections of the employee cost by UHBVNL and DHBVNL for the FY 2021-22 and observes that the proposed cost on account of employee cost are higher as compared to the MYT proposal submitted by the licensees. The Commission has approved the employee cost for the FY 2021-22 by escalating the true up cost approved for the FY 2019-20 by the proposed escalation factor. However, the number of new employees is required to be reduced by the number of normal retirees each year, the impact of which has not been reflected by the licensees in projecting the employee cost for the FY 2021-22 and accordingly the projected addition of new employees, net of retirees, is estimated to be 1000 for UHBVNL and 700 for DHBVNL. In line with the above observation, the Commission approves Rs. 829.39 crores for UHBVNL and Rs. 1059.17 crores for DHBVNL as employee cost for the FY 2021-22. The cost on account of terminal benefits is approved as proposed. The Commission directs the licensee to ensure that the amount approved to be recovered in the ARR must be paid out in the same year itself and before the close of the Financial Year. A compliance report to this effect must be filed with the ARR petition each year. The petitioners are also directed to calculate and submit the projected per employee cost in future so as to ensure that each component of cost receives due attention.

# 4.16 Repair & Maintenance (R&M) Expenses

R&M expenses are projected by the petitioners in accordance with Regulation 57.4 of MYT Regulations, 2019 for ARR year FY 2021-22 by indexing 1.65% of Average GFA with the applicable inflation factor.

R&M Expenses for ARR year FY2021-22 (Rs Crores) UHBVNL

,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	(
Particulars	FY 2021-22
Average GFA	9,271.64
K factor	1.65%
Indexation %	6.09%
Less: expenses capitalized	0.00
R&M Expenses	162.30

R&M Expenses for FY 2021-22 (Rs Crores) DHBVNL

Particulars	FY 2021-22
Average GFA	11,206.76
K factor	1.65%
Indexation %	6.09%
R&M Expenses	196.17

The Commission has examined the proposed R&M expenses and finding the calculations in accordance with the MYT regulations, approves the same.

Chapter 4 Page 147 of 233

## 4.17 Administration & General (A&G) Expenses

### **A&G Expenses of UHBVN**

The petitioners have proposed A&G expenses for FY 2021-22 by escalating the expenses of APR year FY 2020-21 with the combined inflation calculated in Section 4.11. The summary of A&G Expenses for ARR year is tabulated as under:

A&G Expenses for FY2021-22 (Rs Crores) UHBVNL

Particulars	FY 2021-22
Gross A&G Expenses	116.82
Less: Expenses Capitalised	2.26
Net A&G Expenses	114.56

A&G Expenses for FY 2021-22 (Rs Crores) DHBVNL

Particulars	FY 2021-22
Gross A&G Expenses	127.97
Indexation (%)	6.09%
A&G Expenses	135.76
Less: Expenses Capitalised	3.04
Net A& G Expenses	132.71

The Commission has examined the projections of A&G expenses by UHBVNL and DHBVNL for the FY 2021-22 and observes that the escalation and indexation factors used by the licensees are in order and accordingly approves the A&G expenses as proposed.

## 4.18 Summary of O&M Expenses

As discussed in the preceding paragraphs, the proposed and approved O&M expenses for UHBVNL and DHBVNL for the FY 2021-22 are summarised in the following table: -

Summary of O&M Expenses for ARR year FY2021-22 (Rs Crores)

Particulars	Prop	osed	Approved		
	UHBVNL	DHBVNL	UHBVNL	DHBVNL	
Employee Expense	860.83	1085.55	829.39	1059.17	
A&G Expense	114.56	132.71	114.56	132.71	
R&M Expense	162.30	196.17	162.30	196.17	
Terminal Benefits	500.00	442.90	500.00	442.90	
Total O&M Expenses	1637.69	1857.33	1606.25	1830.95	

The Commission observes that various stakeholders have been raising the issue of efficiency factor that has not been determined by the Commission till date, even after the start of the second control period. It may be noted that the O&M expenses for MYT Control Period are projected as per Regulation 57.4 of MYT Regulations 2019. The relevant extract of the Regulations is reproduced as under:

"The actual audited O & M expenses for the financial year preceding the base year, subject to prudence check, shall be escalated at the escalation factor of 4% to arrive at the Employee

Chapter 4 Page 148 of 233

costs and Administrative and General Costs for the base year of the control period. The O&M expenses for the nth year of the control period shall be approved based on the formula given below".

$$O\&M_n = (R\&M_n + EMP_n + A\&G_n)^* (1-Xn) + Terminal Liabilities$$

Where.

# (d) $X_n$ is an efficiency factor for nth year

The Value of  $X_n$  will be determined by the Commission in the MYT order for the control period.

The Commission is of the considered view that it would be appropriate to introduce efficiency factor for determining the O&M expenses for the balance period of the control period, as sufficient time has elapsed since the MYT regime was introduced in the State. The Commission accordingly directs the petitioner to propose an appropriate efficiency factor after studying similar provisions in other states and submit the same along with the next ARR.

#### 4.19 Approved Capital Expenditure and additions to GFA

The Commission, after careful examination of the proposed capital expenditure for the FY 2021-22, has approved Rs. 950 crores and Rs. 1125 crores as the capital expenditure for UHBVNL and DHBVNL respectively which is inclusive of deposit works on account of tubewell connections of Rs. 100 crores and Rs, 90 crores respectively. Since the deposit works are neither included in the final GFA nor are required to be funded through equity or loans, the same are excluded from the calculations of ARR. The capitalization/ transfer to GFA is in the same ratio as proposed by the licensees i.e. 60:40. The retirement/ disposal of assets is also in the same ratio as proposed by the respective licensees as part of the MYT petition.

The Commission has limited the consumer contribution to the amount proposed by the respective Discoms as part of the MYT petition; Equity is pegged at 20% of the approved capital expenditure for each licensee and the remaining balance of capital expenditure is assumed to be funded by long term loan. The calculation of approved capital expenditure, additions to GFA and funding thereto is given in the following tables:

Approved Capital Expenditure, GFA and Funding for the FY 2021-22 (Rs. Crores)

Capital Work in Progress (CWIP)	UHBVNL	DHBVNL
Opening CWIP	745.41	1497.64
Addition	850.00	1035.00
Capex Capitalized	1255.41	1101.00
Closing CWIP	340.00	1431.64
Gross Fixed Assets (GFA)		

Chapter 4 Page 149 of 233

Opening GFA	8874.71	10476.70
Add: Trf from CWIP	1255.41	1101.00
Less: Retirement/Disposal of Assets	284.06	59.96
Closing GFA	9846.16	11517.74
Average GFA	9360.48	10997.22
Source of Funding for additions and IDC		
Consumer Contribution	50.00	124.58
Equity	170.00	207.00
Debt	630.00	703.42
Total	850.00	1035.00

#### 4.20 Interest & Finance Charges

Interest on capex loans for ARR year is projected by the petitioners as per Regulation 21 of MYT Regulations 2019. Interest on long-term borrowing is computed on loan-wise basis as per the applicable interest rate. The relevant excerpt of the MYT Regulations, 2019 is reproduced as under:

#### Existing loans

- (i) Interest on loan capital shall be computed loan-wise for existing loans arrived in a manner specified in Regulation 19 and shall be as per the rates approved by the Commission.
- (ii) The loan outstanding as on 1st April of each financial year shall be worked out as the gross loan in accordance with Regulation 19 by deducting the cumulative repayment as admitted by the Commission up to 31st March of previous financial year from the gross normative loan;
- (iii) The rate of interest shall be the weighted average rate of interest on institutional loans calculated on the basis of the actual loan portfolio at the beginning of each year applicable to the project. In case the weighted average rate is not available, the interest rate approved by the Commission in its earlier tariff order shall be allowed.

Provided that if there is no actual loan for a particular year but normative loan is still outstanding, the last available weighted average rate of interest shall be considered;

Provided further that if the generating plant/project does not have actual loan, then the weighted average rate of interest of the generating company/licensee as a whole shall be considered.

- (iv) The interest on loan shall be calculated on the normative average loan of the year by applying the weighted average rate of interest;
- (v) The generating company and the licensee shall from time to time review their capital structure i.e. debt and equity and make every effort to restructure the loan

Chapter 4 Page 150 of 233

portfolio as long as it results in net savings on interest. The costs associated with such re-financing shall be borne by the beneficiaries and the net savings (after deducting the cost of re-financing) shall be subjected to incentive / penalty framework as mentioned in the Regulation 12 which shall be dealt with at the time of mid-year performance review/true-up.

(vi) The changes to the loan terms and conditions shall be reflected from the date of such re-financing and benefit passed on to the beneficiaries;

(vii) In case of any dispute relating to re-financing of loan, any of the parties may approach the Commission with proper application along with all the relevant details. During the pendency of any dispute, the beneficiaries shall not withhold any payment on account of orders issued by the Commission.

(viii) In case any moratorium period on repayment of loan is availed of by the generating company or the licensee, depreciation provided for in the tariff during the years of moratorium shall be treated as repayment during those years and interest on loan capital shall be calculated accordingly.

Provided that the repayment for each year of the control period shall be deemed to be equal to the depreciation allowed for the corresponding year.

# Interest on Long Term Loan of UHBVN

Long term borrowings for Capital Expenditure Plan of ARR year are assumed to be met primarily from REC loans. Accordingly, the interest cost on new receipts in Capex loan for FY2021-22 is calculated by considering interest rate of 10.6% and for existing loans, relevant interest rates for individual loans are considered. Repayment of CAPEX Loan for ARR period is proposed to be equivalent to the projected repayment schedule of the individual loan during respective year. Capitalization of interest cost for ARR year FY2021-22 is projected on average capital work in progress and average interest rate on capex loans.

The Commission has considered the opening balance of loan, interest rate on existing borrowings and percentage of IDC (Interest During construction) as per the audited accounts for the FY 2019-20. Additional borrowings are based on the approved capital expenditure. And Interest on these loans is as proposed by the licensee @10.6%. The Commission observes that the interest on term loan, as proposed by the Licensee is in Order. Hence, the Commission approves interest on long term loan at Rs. 149.28 Crore.

Chapter 4 Page 151 of 233

#### Interest on Long Term Loan of DHBVN

- 1. Long term borrowings for Capital Expenditure Plan for ARR year FY 2021-22 is mainly from REC loans. Accordingly, the interest cost on Capex loan is projected by considering the interest rate of 10.41% & 7.20% on REC & FI/Banks respectively on new receipts and average interest rate on existing loans. After adjusting IDC, the interest cost on long term borrowing has been worked out for FY 2021-22.
- 2. Normative repayment of CAPEX Loan for ARR year FY 2021-22 is proposed as per tentative repayment schedule during the year.
- Capitalization of interest cost is projected on average capital work in progress and average interest rate on capex loans.

The Commission has considered the opening balance of loan, interest rate on existing borrowings and percentage of IDC (Interest During construction) as per the audited accounts for the FY 2019-20. Additional borrowings are based on the approved capital expenditure. And Interest on these loans is as proposed by the licensee @10.41%. the Commission approved interest on long term loans is as given in table below:

# HERC approved interest on Long Term Loans of DHBVNL for the FY 2021-22 (Rs. Crores)

	Opening Balance	Receipts	Repayments	Closing Balance
Existing borrowings				
FY 2020-21	2587.18	0	325.23	2261.95
FY 2021-22	2261.95	0	355.02	1906.93
Interest @9.75 % being the average rate of interest as per audited accounts for the FY 2019-20 (A)				203.23
New Loans				
FY 2020-21	0	807.25	0	807.25
FY 2021-22	807.25	703.42	0	1510.67
Interest @ 10.41% as proposed (B)				120.65
Total Interest (A+B)				323.88
Less IDC	71.05%			230.13
Net Interest Expense on CAPEX				93.75

Chapter 4 Page 152 of 233

#### 4.21 Interest on Consumer Security Deposit:

# Interest on consumer security deposits

 Interest on consumer security deposits for ARR year FY2021-22 is calculated in accordance to Regulation 21.4 of MYT Regulations 2019. The relevant excerpt of the regulation is reproduced as under:

"Interest shall be allowed on the amount held as security deposit held in cash from Transmission System Users, Distribution System Users and Retail consumers, at the Bank Rate as on 1st April of the financial year in which the petition is filed provided it is payable by the transmission/distribution licensee.

- 2. Hence, as per the bank rate notified by RBI for 1st of April 2020, interest on consumer security deposit is calculated at 4.65%.
- 3. Receipt of consumer security deposit for ARR year FY2021-22 is projected by the petitioners escalating the receipt of consumer security deposit during the previous year with the growth in consumer load considered for the respective year. Details of interest on consumer security deposit for ARR year FY2021-22 is tabulated as under:

Interest on Consumer Deposit for ARR year FY2021-22 (Rs Crores)

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Particulars	UHBVNL	DHBVNL
Opening balance	1,527.03	2,119.95
Receipt during the year	110.97	323.63
Closing balance	1,638.00	2,443.58
Average security deposit	1,582.51	2,281.77
Interest rate	4.65%	4.65%
Interest on CSD	73.59	106.10

The Commission has examined the calculations of interest on consumer security deposit for the FY 2021-22 as proposed by the Discoms and approves the same.

#### 4.22 Interest on Working Capital Loan

Interest on working capital loans of UHBVN

- 1. Interest on working capital loans is projected for ARR year FY2021-22 in accordance with the estimated receipt and repayment of working capital loans.
- 2. Guarantee fees for ARR year FY2021-22 is projected @ 2% on the loan receipt for working capital loans during the year.

Chapter 4 Page 153 of 233

Net Interest & Finance Charges for FY2021-22 (Rs Crores) (UHBVNL

Particulars	FY 2021-22
Gross Int. on Capex loans	224.52
Less: Interest Capitalized	75.24
Net Int. on Capex Loans	149.28
Interest on WC loans	309.06
Interest on Security Deposits	73.59
Guarantee Fees/Other Interests	-
Net Interest & finance charges	531.92

 UHBVN has requested that the total interest cost as projected in the table above including interest paid on the working capital borrowings during ARR year FY2021-22 may kindly be allowed by the Commission.

#### Interest on working capital loans of DHBVN

- 1. Interest on working capital loans is projected for ARR year FY2021-22 in accordance with the estimated receipt and repayment of working capital loans.
- 2. Further, in addition to the working capital interest expenses, other interest and finance charges on account of payment of guarantee fee to the State Govt. for new loans, HVPNL bond issuance/maintenance charges, MDR/digital payment transaction charges and LC issuance charges, etc. have also been considered in the ARR for MYT control period on the basis of expenses incurred during FY 2019-20.
- 3. The summary of net Interest & Finance charges for FY 2021-22 is tabulated as under:

**Net Interest & Finance Charges (in Crores)** 

Particulars	FY 2021-22
Gross Int. on Capex loans	293.67
Less: Interest Capitalized	115.16
Net interest on Long Term CAPEX loans	178.51
Interest on WC loans	213.17
Interest Cost on Consumer Security Deposit	106.10
Other Interest & Finance Charges	1.00
HVPNL Bond Charges	0.10
MDR Charges/ Digital Payment Transaction Cost	8.00
LC Charges	4.00
Guarantee Fee	10.00
Net Interest & Finance Charges	520.88

DHBVN has requested that the projected interest cost for ARR year FY 2021-22 may kindly be allowed by the Commission in the ARR of the relevant year.

The Commission has examined the interest on working capital borrowings as projected by the licensee and observes that the same are not in accordance with the MYT Regulations,

Chapter 4 Page 154 of 233

2019, which provides for a specific methodology for calculation of interest on working capital borrowings for the Distribution and retail supply business as given below:

#### 22. INTEREST ON WORKING CAPITAL

## 22.1 Components of working capital:

#### Distribution licensee

#### I. Wheeling of electricity:

- *a)* Normative O&M expenses for wheeling business for 1 (one) month;
- b) Maintenance spares for 1 (one) month based on annual requirement considered at 1% of GFA (wire business) at the end of the previous year;
- c) Receivables equivalent to 1(one) month of wheeling charges. less

Amount held as security deposits in cash from Distribution System Users:

Provided further that for the purpose of Truing-up for any year, the working capital requirement shall be re-computed on the basis of the values of components of working capital approved by the Commission in the Truing-up before sharing of gains and losses

# II. Retail supply of electricity:

- a) Normative O&M expenses for retail supply business for 1 (one) month;
- b) Maintenance spares for 1 (one) month based on annual requirement considered at 1% of the GFA at the end of the previous year;
- c) Uncollected revenue to be calculated as: Revenue billed for the relevant year \* (1 Normative Collection efficiency)
- *d)* Receivables equivalent to 1 (one) month of billing less consumers' security / advance consumption deposit.

Provided that for the purpose of Truing-up for any year, the working capital requirement shall be recomputed on the basis of the values of components of working capital approved by the Commission in the Truing-up before sharing of gains and losses;

# 22.2 Rate of Interest

Rate of interest on working capital shall be equal to the MCLR of the relevant financial year plus a maximum of 150 basis points. However, while claiming any spread, the generator and the licensees shall submit loan sanction letter from the banks/lending institutions, indicating the applicable rate of interest.

The Commission has calculated the amount of allowed working capital borrowings in accordance with the MYT regulations. The petitioners have not provided any sanction letter, indicating the applicable rate of interest as required under the regulations. However, as per the loan sheet submitted as part of the petition, the average rate of interest on working capital borrowings is 8.13% for UHBVNL and 7.7% for DHBVNL. Since the rate of interest proposed by the petitioners is lower than the maximum rate allowed under the MYT regulations (MCLR rate to 7%, w.e.f. 10.01.2021 plus a maximum margin of 150 basis point), the Commission approves the rate of interest as proposed at 8.13% for UHBVNL and 7.7% for DHBVNL. The calculation of approved working capital and interest cost thereto for the FY 2021-22 is given in tables below:

Chapter 4 Page 155 of 233

# Approved interest on working capital for UHBVNL for the FY 2021-22 (Rs. Crores)

Interest on working capital	2021-22
O&M expenses for 1 month	133.85
Maintenance spares 1% of opening GFA	88.75
2 months receivables	2151.84
Uncollected revenue	64.56
Total	2439.00
Less	
ACD, as projected by UHBVNL	1638.00
Net working capital	801.00
Interest rate	8.13%
Interest cost	65.12

## Approved interest on working capital for DHBVNL for the FY 2021-22 (Rs. Crores)

Interest on working capital	FY 2021-22
O&M expenses for 1 month	152.58
Maintenance spares 1% of opening GFA	104.77
2 months receivables	2845.88
Uncollected revenue	85.38
Total	3188.61
Less	
ACD, as projected by UHBVNL	2443.58
Net working capital	745.03
Interest rate	7.70%
Interest cost	57.37

The Discoms have also proposed to recover certain other finance charges, guarantee fee, MDLR charges and maintenance charges for HVPNL bonds and the same are allowed as proposed, in the original petition, subject to true up. In light of the above discussion, the approved interest cost of UHBVNL and DHBVNL for the FY 2021-22 is summarised as below:

## Summary of Approved Interest cost of UHBVNL and DHBVNL for the FY 2021-22 (Rs. Crores)

Particulars	UHBVNL	DHBVNL
Gross Interest on Capex Loans	127.0728	203.23
Interest on new loans (net of repayments)	101.8194	120.65
Less: IDC	76.43	230.13
Net Interest on CAPEX Loan/ Interest on Long Term Loan	149.28	93.75
Interest on Security Deposit	73.59	106.10
Other Interest & Finance Charges	-	1.00
HVPNL Bond Charges	-	0.08
MDR Charges	-	8.00
LC Charges	-	4.00
Guarantee Fee	-	10.00
Interest on Working Capital Loan	65.12	57.37
Total Interest & Finance charges	287.99	280.30

Chapter 4 Page 156 of 233

#### 4.23 Depreciation

Depreciation for the MYT Control Period is projected in accordance with Regulation 23 of the MYT Regulation 2019. The relevant excerpt is reproduced as under: -

"

- (a) The value base of asset shall be the historical capital cost of the asset as admitted by the Commission. The historical capital cost shall include additional capitalization including foreign exchange rate variation, if any already allowed by the Commission up to 31st March of the relevant year.
- (b) The residual value of the asset shall be considered as 10% and depreciation shall be allowed up to maximum of 90% of historical capital cost of the asset;

Provided that the salvage value for IT equipment and software shall be considered as NIL and 100% value of the assets shall be considered depreciable.

(c) Depreciation shall be calculated annually over the useful life of the asset at the rates specified in Appendix II up to 31st March of the 12th year from the date of commercial operation of the asset. From 1st April of 13th year from the commercial date of operation of the asset, the remaining depreciable value if any out of the 90% of the capital cost of the asset shall be equally spread over the balance useful life of the asset.

The deprecation rates given in Appendix-II will be applicable w.e.f. 1.04.2020 only. The depreciation, in case of existing assets, up to 31.03.2020 shall be considered as already allowed and shall not be re– visited. The deprecation rates as per Appendix-II for such assets shall be applicable w.e.f 1.04.2020 up to 12th year from the date of COD.

Provided that the rate provided in Appendix II, are the upper ceiling of the rate of depreciation to be provided up to 12th year from the date of COD and the developer shall have the option of indicating, while seeking approval for tariff, lower rate of depreciation, subject to the aforesaid ceiling.

- (d) Land shall not be considered as a depreciable asset and cost shall be excluded from the capital cost while computing depreciable value of asset.
- (e) Depreciation shall be chargeable from the first year of commercial operation. In case of commercial operation of the asset for part of the financial year, then the depreciation shall be charged on pro rata basis;
- (f) Depreciation shall not be allowed on assets (or part of assets) funded by consumer contribution (i.e., any receipts from consumers that are not treated as revenue) and capital subsidies / grants. Provision for replacement of such assets shall be made in the capital investment plan."
- Depreciation for ARR year FY2021-22 is projected as per asset class wise depreciation rates on Opening GFA of respective year. Depreciation on assets created out of consumer contribution is reduced from the gross depreciation for projecting net depreciation expense for ARR year FY2021-22.

Chapter 4 Page 157 of 233

2. Detail calculation of depreciation for ARR year FY2021-22 is provided in the tables below:

Proposed Depreciation for FY 2021-22 UHBVNL (Rs Crores)

Particulars	Opening	Accumulated	Rate of	Depreciation	Total
	GFA	depreciation at	dep. (%)	during the	depreciation
		the beg. of the		year	at the end of
		year			the year
Land & Land Rights	60.58	-		-	-
Buildings & Civil Structure	497.85	114.81	3.34	16.63	131.44
Plant & Machinery	8,097.59	3,035.71	5.28	427.55	3,463.26
Vehicles	13.74	13.47	9.50	1.31	14.77
Furniture & Fixture	182.03	30.48	6.33	11.52	42.00
Software	17.20	5.50	15.00	2.58	8.08
Less: Depreciation on assets				63.14	
contributed by Consumers and					
grants					
Total	8,868.99	3,199.96		396.44	3,659.55

Proposed Depreciation for FY 2021-22 DHBVNL (Rs Crores)

Particulars	Accumulated	Additions during the year		Balance
	Depreciation	Rate of	Depreciation	Depreciation
	as on (1st Apr	depreciation	during the year	(31st Mar
	2021)	(%)		2022)
Land & Rights	-	0.00%	-	-
Buildings & Civil Structure	86.28	3.34%	12.02	98.30
Plant & Machinery	3,674.18	5.28%	537.76	4,211.93
Vehicles	16.40	9.50%	1.85	18.24
Furniture & Fixture	15.85	6.33%	1.58	17.43
Less: Dep. on assets from Consumers			154.37	
Contribution				
Total	3,792.70		398.84	4,345.91

The Commission has examined the calculations of depreciation for the FY 2021-22 submitted by the Discoms and observes that the Discoms have assumed that the additions to different class of assets in the MYT period would be in the same ratio as additions in the FY 2019-20. The Commission, however, observes that the additions to individual class of fixed assets in a particular year may not be fully representative of the total requirement of assets for the Discom and therefore it would be more appropriate to use total fixed assets as on 31.3.2019 as a composite base and accordingly has assumed that the additions to fixed assets and consequently the depreciation in the MYT period would also be in the same ratio. The depreciation calculations for the FY 2019-20 are used to arrive at a composite depreciation rate which is applied on the estimated opening GFA of the FY 2021-22 to arrive at estimated depreciation for the year. The rate of depreciation on the assets funded through consumer contribution is also based on the rate as per audited accounts for the FY 2019-20. Based on the approved capital expenditure for the FY 2020-21, the approved depreciation for the FY 2021-22 is given in table below:

Chapter 4 Page 158 of 233

HERC Approved Depreciation for the FY 2021-22 (Rs Crores)

	UHBVNL	DHBVNL
Depreciation Particulars		
Opening GFA	8874.81	10476.70
Rate of Depreciation	4.80%	4.62%
Total Depreciation	425.74	484.28
Less: Depreciation on assets contributed by Consumers and grants	72.03	129.26
Approved Depreciation cost	353.71	355.02

#### 4.24 Return on Equity

Return on Equity for MYT Control Period is projected in accordance with the Regulation 20 of MYT Regulations 2019. The relevant excerpt of the MYT Regulations is reproduced as under: -

#### "20. RETURN ON EQUITY

- **20.1** The rate of return on equity shall be decided by the Commission keeping in view the incentives and penalties and on the basis of overall performance subject to a ceiling of 14% provided that the ROE shall not be less than the net amount of incentive and penalty.
- **20.2** Return on equity shall be allowed on equity employed in assets in use considering the following and subject to Regulation 20.1 above:
- i. Equity employed in accordance with Regulation 19.1 and 19.2 on assets (in use) commissioned prior to the beginning of the year; plus
- ii. 50% of equity capital portion of the allowable capital cost for the assets put to use during the year.
- Provided that for the purpose of truing up, return on equity shall be allowed from the COD on pro-rata basis based on documentary evidence provided for the assets put to commercial operation during the year.
- Provided further that assets funded by consumer contributions, capital subsidies/Govt. grants shall not form part of the capital base for the purpose of calculation of Return on Equity
- **20.3** Return on equity invested in work in progress shall be allowed from the actual date of commercial operation of the assets.
- 20.4 There shall be no Return on Equity for the equity component above 30%."

Chapter 4 Page 159 of 233

#### **Return on Equity of UHBVN**

The petitioners have proposed return on equity at a rate of 14% on the average equity during ARR year FY2021-22. Detailed calculations of Return on Equity for ARR year FY2021-22 is tabulated as under:

UHBVNL proposed Return on Equity for FY2021-22 (Rs Crores)

Particulars	FY 2021-22
Opening Share Capital eligible for RoE	2,172.09
Less: Equity in Opening CWIP (20%)	140.54
Net Op. Share Capital	2,031.55
Add: Equity for Capex	219.58
Closing Equity	2,251.12
Average Equity for RoE	2,141.33
Rate of Return on Equity	14.00%
Total Return on Equity	299.79

DHBVNL Proposed Return on Equity for FY 2021-22 for (Rs Crores)

Bribant I reposed Rotain on Equity for 1 1 2021 21	1101 (110 010100)
Particulars	FY 2021-22
Opening Equity	2,318.58
Less: 20% of Opening CWIP for assets not put to use	242.66
Net Opening Equity	2,075.92
Add: Equity addition in capitalisation	245.60
Closing Equity	2,321.51
Average Equity	2,198.71
Rate of Return on Equity	14.00%
Return on Equity	307.82

The Commission has considered the submissions made by the licensee and observes that as per the MYT Regulations, 2019, ROE upto 14% can be allowed on the eligible Equity Capital in use. The Commission, in FY 2020-21, given the unprecedented situation emanating from the COVID-19 pandemic and the resulting restriction/lockdown ordered by Central Government/State Government, impacting the ability to pay of all categories of consumers, had decided not to allow any return on equity. However, the Commission, in light of present economic scenario and considering the requirement of restoring the licensee to the status, prior to the pandemic, approves the rate of Return on Equity at 10% of average equity utilized in licensed business during the FY 2021-22 to the two Discoms. The Commission further directs that the RoE shall be adjusted against the subsidy to be provided by the State Government in view of the fact that the State Government holds the entire equity capital deployed in the Discoms. The calculation of approved return on equity considering the approved capital expenditure and its funding thereto and the estimated retirement of assets, is given in the following tables:

Approved Return on Equity for FY2021-22 UHBVNL (Rs Crores)

Average Equity for RoE as proposed	2141	2141
Rate of Return on Equity	14%	10%

Chapter 4 Page 160 of 233

Return on Equity	299.74	214.1
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Approved Return on Equity for FY2021-22 DHBVNL (Rs Crores)

Average Equity for RoE as proposed	2198.71	2198.71
Rate of Return on Equity	14%	10%
Return on Equity	307.8194	219.871

#### 4.25 Decapitalisation or retirement or replacement of assets

The Commission would like to draw the attention of the licensee on the provisions of the MYT regulation 19.3 regarding reduction of equity on account of decapitalisation or retirement or replacement of assets as reproduced below:

"In case of de-capitalisation or retirement or replacement of assets, the equity capital approved as mentioned above, shall be reduced to the extent of 30% (or actual equity component based on documentary evidence, if it is lower than 30%) of the original cost of the de-capitalised or retired or replaced asset, and the debt capital approved as mentioned above, shall be reduced to the extent of actual debt component, based on documentary evidence, of the original cost of the decapitalised or retired or replaced asset:

In case of Generating Station or a transmission system or distribution system, which has completed its useful life as on or after 1.4.2020, the accumulated depreciation as on the completion of the useful life less cumulative repayment of loan shall be utilized for reduction of the equity and depreciation admissible after the completion of useful life and the balance depreciation, if any, shall be first adjusted against the repayment of balance outstanding loan and thereafter shall be utilized for reduction of equity.

In view of the above provisions, the Commission directs the licensee to provide appropriate information in order to enable the Commission to adjust the equity component, if required, along with the next true up petition.

#### 4.26 Non-Tariff Income

As per projections by the petitioners, Non-Tariff Income for ARR year FY 2021-22 is kept equivalent to the non-tariff income as approved by the Commission for FY 2020-21 in Tariff Order dated 01.06.2020. The Commission finds the proposed amounts appropriate and approves the same.

Chapter 4 Page 161 of 233

# 4.27 Aggregate Revenue Requirement

Based on the Commission's approved estimates of various components of the ARR as discussed in the previous paragraphs, the HERC Approved Revenue Requirement for the FY 2021-22 for the two Discoms is as given in the following tables:

HERC Approved ARR of UHBVNL for the FY 2021-22 (Rs Crores)

Sr. No	Particulars	Proposed	Approved
1	Total Power Purchase Expense	12,312.79	10670.57
1.1	Power Purchase Expense	10,871.70	8908.55
1.2	Interstate transmission Charge	890.77	890.77
1.3	Intrastate transmission & SLDC	550.31	871.25
2	Operations and Maintenance Expense	1,637.69	1606.25
2.1	Employee Expense	860.83	829.39
2.2	Administration & General Exp.	114.56	114.56
2.3	Repair & Maintenance Expense	162.3	162.30
2.4	Terminal Liability	500	500.00
3	Depreciation	396.44	353.71
4	Total Interest & Finance Charges	338.57	287.99
4.1	Interest on Working Capital incl. CC	277.95	65.12
4.2	Interest on CAPEX loans	149.28	149.28
4.3	Interest on Consumer Security Deposit	73.59	<i>73.59</i>
4.4	Interest on other bonds	31.11	0.00
5	Return on Equity Capital	299.78	214.10
6	Other Expenses	-	
7	Total Expenditure	15,178.62	13132.62
8	Less: Non-Tariff Income	221.56	221.56
9	Net Aggregate Revenue Requirement	14,957.06	12911.06

HERC Approved ARR of DHBVNL for the FY 2021-22 (Rs Crores)

S.No.	Particulars	Proposed	Approved
1	Power Purchase Expenses	16,065.68	14696.82
1.1	Power Purchase Cost	14,116.08	12358.66
1.2	Transmission Charges	1,305.26	1305.26
1.3	Transmission Charges & SLDC	644.33	1032.90
2	Operation & Maintenance Expenses	1,857.33	1830.95
2.1	Employee Expenses (net)	1,085.55	1059.17
2.2	Administration & General Expenses (net)	132.71	132.71
2.3	Repair & Maintenance Expenses	196.17	196.17
2.4	Terminal Benefits	442.9	442.90
3	Depreciation	398.84	355.02
4	Interest & Finance Charges	520.88	280.30
4.1	Interest on Long Term Loan	178.51	<i>93.75</i>
4.2	Interest on Working Capital	213.17	57.37
4.3	Interest on Consumer Security Deposit	106.1	106.10
4.4	Other Interest & Finance Charges	1	1.00
4.5	HVPNL Bond Charges	0.1	0.08
4.6	MDR Charges/ Digital Payment Transaction Cost	8	8.00
4.7	LC Charges	4	4.00
4.8	Guarantee Fee	10	10.00

Chapter 4 Page 162 of 233

S.No.	Particulars	Proposed	Approved
5	Return on Equity Capital	307.82	219.87
6	Aggregate Revenue Requirement	19,150.55	17382.96
7	Less: Non-Tariff Income	307.66	307.66
8	Net Aggregate Revenue Requirement	18,842.89	17075.30

#### 4.28 Revenue from inter-state sales

The Discoms have proposed to garner revenue from inter-state sale of power for the FY 2021-22 on the basis of average variable power purchase cost and the quantum of surplus power available during the respective year and the same is estimated to be Rs. 546.54 Cr for UHBVNL and Rs. 709.64Cr for DHBVNL.

The Commission has considered the proposal and observes that as per the demand and supply projections approved by the Commission, the available power would be in surplus by around 12% during the FY 2020-21 as against the expected demand. The Commission is of the considered view that in case the Merit Order Dispatch principle is strictly followed and the energy which is surplus is contracted to be sold at its variable cost/ ECR, the revenue generated would be higher than the average variable power purchase cost and would ultimately go towards reducing the power purchase cost. The Commission, instead of calculating revenue from interstate sale separately as a line item in the ARR, has preferred to calculate the power purchase cost only for the energy required for sale to the electricity consumers of Haryana. i.e. fixed cost for long term PPA's is considered to be pass through and the projected power purchase volume is allowed at the average variable cost.

# 4.29 Agriculture Subsidy

The Commission has observed that the Discoms have projected Agriculture Subsidy for the FY 2021-22 equivalent to the subsidy allowed for the FY 2020-21 in Tariff Order dated 01.06.2020 and also that there is no projections for estimated subsidy for power supplied to either the domestic consumers or the Industrial consumers.

Based on the ARR and sales projections approved by the Commission in the preceding portion of this order, the Commission has, based on the sample voltage vise losses submitted by the Discoms, arrived at the estimated cost of service for supply at HT and LT voltage levels as below:

Cost of Service for FY 2021-22 as per National Tariff Policy

_				
	Cost of Service as per National Tariff Policy 2021-22			
ſ		Elements of cost of service		
Ī	1	Per Unit Weighted average cost of power per unit at State/ Discom periphery	446	
I	2	Aggregate of transmission, distribution and wheeling charges applicable to the		

Chapter 4 Page 163 of 233

	relevant voltage level	
	Intrastate Transmission cost at consumers end (Paise/kWh) (Transmission and SLDC	
	cost/ sales)	50
	Distribution (net of power purchase cost) and Wheeling cost at consumers end	
	(Paise/kWh)	105
	Aggregate of transmission distribution and commercial losses applicable to the	
3	relevant voltage level	
	HT	11.16%
	LT	16.62%
4	Cost of Service	
	C/(1-L/100)+D+R	
	HT	657
	LT	690
	Average	679

Based on the cost of service of LT consumers as given above and the approved estimate of sales to AP consumers, the calculation of AP subsidy is as given below:-

	Subsidy calculation for AP supply	unit	value
1	Total units supplied to AP	MU	9426.42
2	Cost/ Tariff per unit	Rs/kWh	6.90
3	Estimated cost of service	Rs. Crores	6503.29
4	Revenue at subsidized tariff	Rs. Crores	109.82
5	Subsidy required to keep the tariff at current levels = 3-4	Rs. Crores	6393.47

The petitioners are directed to ensure that supply of power to all categories of consumers, where the State Government has committed a subsidized tariff, is strictly in accordance with section 65 of the electricity act, 2003. This would include the AP supply, certain categories of Domestic and Industrial supply, and power supplied to Gaushalas. Any violation of section 65 of the EA, 2003, may be brought to the notice of the Commission in addition to action mandated under the Act.

# 4.30 Revenue Gap for ARR year FY 2021-22

Based on proposed and approved Aggregate Revenue Requirement and Revenue from sale of Power and AP Subsidy, revenue (gap)/surplus for ARR year FY 2021-22 for Haryana Discoms is detailed as under:

Revenue Surplus/(Gap) for ARR year FY 2021-22 (Rs Crores)

Particulars	Proposed	<b>HERC Revenue Gap</b>
Aggregate Revenue Requirement	32,543.78	29986.36
-UHBVN	14410.52	12911.06
-DHBVN	18133.26	17075.30
Total Revenue	24,173.08	23051.79
-Revenue from Interstate sale	1,256.17	0
-Revenue from Intrastate sale	22,916.90	23051.79
Total Sales for FY 2021-22 (MUs)	44309.31	44142.91
Revenue Gap	(9,626.88)	6638.01
CoS at LT level		6.90
AP sales for the FY 2021-22 MU		9426.42

Chapter 4 Page 164 of 233

Particulars	Proposed	HERC Revenue Gap
Estimated revenue from AP sales		109.82
AP Subsidy at LT CoS	6,649.93	6393.47
Domestic & other Subsidy	1,181.88	460.00
Total revenue including subsidy	30748.71	29910.34
Total Revenue surplus/(Gap) for FY 2021-22 at current tariff	(1795.07)	(76.01)
Distribution loss	20.00%	15.00%

Note: The Commission has allowed Rs. 195.261 Crore as RoE to HPGCL (Case No. HERC / PRO – 76 of 2020 Order dated 18.02.2021, Rs. 256.592 Crore to HVPNL (Case No. HERC /PRO 75 of 2020 Order dated 9.03.2021 and Rs. 433.97 Crore to the Discoms in the present Order. Hence, a total of Rs. 885.823 Crore has been allowed to the Haryana Power Utilities as ROE to be adjusted against subsidy payable by the State Govtt. in view of the fact that the Haryana power utilities are fully owned by the State Government.

Chapter 4 Page 165 of 233

# Chapter 5

# **Capital Expenditure and Technical parameters**

#### 5.1 Capital Expenditure

# True-up of Capital Expenditure for the FY 2019-20

#### A. UHBVNL

The Petitioner in its petition for true-up of FY2019-20, APR of FY 2020-21 and ARR for FY 2021-22 submitted that the Commission had approved a Capital Expenditure of Rs. 1028 Cr. for UHBVN for FY2019-20 as per tariff Order dated 07.03.2019. As per the audited accounts of UHBVN for FY2019-20; the Capital Expenditure of UHBVN for FY 2019-20 is Rs.864.57Cr. The Licensee i.e. UHBVN, thus requests the Commission to approve the same.

The Commission observes that vide its Order dated 01.06.2020 on ARR for FY 2020-21 and Annual Performance Review for the FY 2019-20, on the request of the petitioner, it had approved a revised capital expenditure of Rs. 980 Cr. against its approved Capital expenditure of Rs. 1028 Cr. for FY 2019-20. The licensee has submitted work wise details vide his letter no. CH-45/RA/F-168 Dated 27.07.2020. A perusal of the same revealed that the audited capital expenditure incurred during FY 2019-20 is Rs. 864.57 Cr. Accordingly, the details of the Capex approved for the Financial Year 2019-20 by the Commission as under:

Capital Expenditure for FY 2019-20 (UHBVNL).

Sr. No.	Name of the Scheme	Revised CAPEX as per approval of HERC (Rs. in Cr.)	Expenditure incurred up to 31.03.2020 (Rs. in Cr.)	Funding Agency
Α	PD&C Wing			
1	Creation of new 33 kV sub-stations along-with associated 33 kV & 11 kV lines including civil works	100.00	96.78	REC/JICA
2	Augmentation of existing 33 kV sub-stations including civil works	37.80	57.43	REC/JICA
3	Augmentation of existing 33 kV lines	6.00	11.65	REC/JICA
4	Bifurcation/Trifurcation of overloaded 11 kV feeders	15.00	-	JICA
5	Release of tube well connections	62.50	51.67	Consumer Cost / Deposit work
6	Construction of UHBVN Buildings	30.00	9.88	REC
7	Civil Works other than substation buildings	5.00	6.89	REC
8	Works to be carried out under DDUGJY scheme for system strengthening including SAGY	86.39	69.59	DDU

Chapter 5 Page 166 of 233

9	Works to be carried out under IPDS scheme for system strengthening including 2 Nos. GIS substations	30.00	14.21	IPDS
10	LRP works to be carried out under MGJG scheme and urban feeder sanitization Scheme on Turn Key Basis (Uday) & Misc. works	143.26	152.00	REC/ Nigam's Funding
11	Shifting of 11 kV lines passing over residential areas under UHBVN	28.45	5.90	State Fund
12	Shifting of HT line (33 kV), passing over authorized/un-authorized colonies under jurisdiction of UHBVN	11.58	3.69	State Fund
13	Strengthening of 11 kV lines and augmentation of DTs			
	Zone-1	5.00	6.59	REC
	Zone-2	9.50	12.10	REC
	Total A (PD&C Wing)	570.48	498.38	
В	IT Wing			
14	Smart City <b>Karnal</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	72.00		
15	Smart City <b>Panchkula</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	46.00	-	Nigam's Funding
16	Smart City <b>Panipat</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	41.00		
	Scaling of IT project to Non-R-APDRP areas	5.47		
	covering the following: -	2.61		
17	<ol> <li>Establishment of IT infra in SDO &amp; Other offices and its connectivity with Data Centre.</li> <li>Data Migration (IPDS &amp; Balance Areas)</li> <li>GIS Indexing (IPDS &amp; Balance areas)</li> </ol>	6.86	2.26	IPDS
18	RT-DAS SAIFI/SAIDI Measurement System in Non- SCADA, R-APDRP, Non- RAPDRP and IPDS Towns of UHBVN	11.63	-	PFC
19	AMR of HT Industrial consumers	2.00	1.42	Nigam's Funding
	Total B (IT Wing)	187.57	3.68	
С	MM Wing			
20	Procurement of single phase meters for replacement of defective meters & release of new connections.	6.83		REC
21	Procurement of three phase meters for replacement of defective meters & release of new connections.	10.12	362.51	REC
22	Material required for release of Non-AP connections & replacement of old assets	253.00		REC
23	Procurement of Power Transformers along with allied equipment, APFC	0.00	-	REC
	Total C (MM Wing)	269.95	362.51	
	Gross proposed investment (Total A+B+C)	1,028.00	864.57	

Regulation 9.9 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 specifies as under: -

Chapter 5 Page 167 of 233

"In case the capital expenditure is required due to Force Majeure events for works which have not been approved in the capital investment plan or for works that may have to be taken up to implement new schemes approved by the State/Central Govt., the generating company or the licensee shall submit an application containing all relevant information along with reasons justifying emergency nature of the proposed work seeking approval by the Commission. In the case of works or schemes, other than those required on account of Force Majeure events, the Commission shall consider to give approval only in those cases where the works/schemes are wholly/substantially financed by the State/Central Government or, in view of the Commission, shall benefit a large mass of consumers of the State. The generating company or the licensee may take up the work prior to the approval of the Commission only in case the delay in approval will cause undue loss and such emergency nature of the scheme has been certified by the Board of the Directors and intimated to the Commission".

Further, as per Regulation 8.3.3 (b) of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019, capital expenditure is a controllable item. As such the licensee should have exercised proper control over the item wise capital expenditure approved by the Commission.

Regulation 9.10 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 further specifies as under: -

"In case the capital expenditure incurred for approved schemes exceeds the amount as approved in the capital expenditure plan, the generating company or the transmission or the distribution licensee, as the case may be, shall file an application with the Commission at the end of control period for truing up the expenditure incurred over and above the approved amount. After prudence check, the Commission shall pass an appropriate order on case to case basis. The True-up application shall contain all the requisite information and supporting documents".

Provided that any additional capital expenditure incurred on account of time over run and / or on unapproved schemes not covered under Regulation 9.9 or unapproved changes in scope of approved schemes shall not be allowed by the Commission unless the generating company or the licensee, as the case may be, is able to give adequate justification for the same".

Chapter 5 Page 168 of 233

It has been observed that the licensee has not been able to start 4 (four) works at Sr. No. 4,14,15 & 16 during the year for which an amount of Rs. 170.63 Cr. was approved by the commission. Further, in respect of the works mentioned at Sr. No.2, 7,10 & 13, the expenditure has been incurred more than the approved expenditure. It has been further observed that out of 187.57 Cr. amount approved for scaling up of IT based infrastructure to Non-RAPDRP Areas, only minuscule amount of Rs. 3.68 Cr. have been spent for the same.

The licensee has incurred only 84.10 % expenditure of the approved Capex for FY 2019-20. It is a matter of concern that the licensee has not been able to utilize the capital expenditure even when the focus is primarily on system strengthening and creation of based IT infrastructure under IPDS and DDUGJY schemes. Such scenario defeats the very purpose of capital expenditure approved and objective of providing reliable and quality power to the consumers. There seems to be lack of proper planning and execution of the Capital works on the part of the licensee. The licensee needs to exercise proper monitoring of execution of capital works and control over the item wise expenditure approved by the Commission.

#### B. DHBVNL

The licensee i.e. DHBVN in its petition for true-up of FY2019-20, APR of FY 2020-21 and ARR for FY 2021-22 submitted that the Commission had approved a Capital Expenditure of Rs. 1220 Cr. for DHBVN for FY2019-20. As per the audited accounts of DHBVN for FY2019-20; the actual Capital Expenditure incurred for FY 2019-20 is Rs.1101.61 Cr. The DHBVN, thus requests the Commission to approve the same. The commission approves the actual expenditure for FY 2019-20 as per details provided by the Licensee in the following table:

	Capital Expenditure for FY 2019-20 (DHBVNL)					
S. No.	Categories	Provision as per approved CAPEX of FY 2019-20	Expenditure incurred during FY 2019-20	Funding Agency		
1	AT&C loss sustainable reduction plan					
а	Procurement of single phase meters for replacement of defective meters & release of new connections and procurement of Smart Meters.	44.43	35.37	REC		
b	Procurement of three phase meters for replacement of defective meters & release of new connections and procurement of Smart Meters.	20.25	8.4	REC		
С	Power Factor Improvement (Providing automatic power factor correctors)	16	9.4	REC		
d	Providing of LT Capacitors on 400 KVA and above Distribution Transformers	10	0	-		
	Total	90.68	53.17			
2	Load Growth schemes	<u>-                                    </u>				
а	Creation of new 33 kV sub-stations alongwith associated 33 kV & 11 kV lines	90	116.01	REC/JICA		

Chapter 5 Page 169 of 233

h	Augmentation of existing 22 layout stations	1 Γ	15 76	DEC
b	Augmentation of existing 33 kV sub-stations	15	15.76	REC
С	Augmentation of existing 33 kV lines  Bifurcation of 11 kV feeders (Work of bifurcation of	1.4	1.38	REC
٨	·	38.73	36.85	REC/JICA
d	feeders, augmentation of ACSR).  Material required for release of Non-AP connections &		1	
	·	175	193.69	REC
е	replacement of old assets			Consumor
	Release of Tube well connection on turnkey basis and segregation of AP load from Rural Urban feeders.	75	73.55	Consumer Cost/Deposit
f	segregation of AF load from Kurai orbain leeders.	73	75.55	Work
	Procurement of power transformers and allied			VVOIK
	equipment such as 33 kV CTs, 33 kV PTs, 33 kV and 11	28	25.75	REC
σ	kV VCBs, 33 kV Control and Relay Panels etc.	20	25.75	NEC
g h	11 KV Lines			REC/PFC
i i	Distribution Transformer (25, 63,100, 200 kVA)			RECITIE
i	LT line with ABC/XLPE Armoured Cable			
	Augmentation- DTR, Existing line on conductor to	123.85	108.55	
k	ABXLPE, Augmentation of 11kV lines	123.03	100.55	
1	Metering (3 phase) , Solar Energy Meter			
m	Solar Project			
	Total	546.98	571.54	\
3	Other works	340,30	371.34	
	Maintenance free earthling using 'Ground Enhancing			
	Material/ Conventional earthing for Distribution	3	2.5	REC
а	Transformers, Meter Pillar Boxes and H-pole etc.		2.3	1120
	Civil Works			Departmenta
b		10	7.76	
	Shifting of HT line (33 kv), passing over authorized/un-			
	authorized colonies under jurisdiction of DHBVN.			REC
	Note:-Hon'ble Chief Minister has made an			
	announcement on the floor of Haryana Vidhan Sabha			
	that all dangerous wires of 33 KV and above levels			
	passing over the various colonies shall be removed.	_	2.42	
	Accordingly, Worthy ACS/Power, Govt. of Haryana,	5	2.43	
	Power Deptt. directed to prepare the detailed scheme			
	in this regar. Also, Worthy ACS/Power, Govt. of			
	Haryana, Power Deptt. has desired that it may be			
	made part of the CAPEX Plan and approval of HERC			
С	be obtained.			
	Mahara gaon jagmag gaon scheme for rural area and			
	feeder sanitization for Urban area/LRP/Replacement	125	124.73	REC
d	of iron pole.			
	Other works for system improvement - Procurement	3	0	Departmenta
е	of IT Equipment & Softwares			I
	Smart City Gurgaon ( HT & LT Lines, DTs, U/G Cables,			non = /= :
	RMUs and FRTUs Etc.) including SCADA Project, IMT,	300	288.59	PSDF/Bank
f	Manesar (Rs. 24 Crores)		1	
	Smart City (Hisar & Rewari (HT & LT Lines, DTs, U/G	25.71		-
g	Cables, RMUs and FRTUs Etc.)			
I.	Shifting of 11 lines passing over residential areas under	49.6	35.94	REC
h	DHBVN.			
_	Total	521.31	461.95	DEC
4	R-APDRP Part-A (IT) Project	34.97	10	PFC
	Scaling of IT project to Non R-APDRP areas covering			PFC/REC
	the following:-	17.65	1.89	
_	1. Establishment of IT infra in SDO & Other offices and			
5	its connectivity with Data Center.		I	

Chapter 5 Page 170 of 233

	2. AMR for HT consumer meters.			
	3. Engagement of an Agency for GPS based field survey			
	activities & data digitization.			
	4. Engagement of SI for DM			
	5. Procurement of Computer Furniture (Computer			
	chair & table) for office under IPDS town and in			
	balance non R-APDRP areas			
6	Implementation of ERP application	3.38	0	
	Laying of Infrastructure in Gurgaon(Sector-58 to 115	40	3.06	REC
7	and Faridabad (Sector-75 to 89)	40	3.00	NEC
	Total	61.03	4.95	
	Grand Total	1220.00	1101.61	

The Commission observed that the DHBVNL could able achieve the capax targets during FY 2019-20 to the tune of 90.30% of its approved capital expenditure for FY 2019-20.

From the details of Capital expenditure incurred during FY 2019-20, it is observed that no work has been started on some important work given at Sr. 1(d), 3(g), 3(e) and 6. Further only minuscule expenditure of Rs. 3.38 Cr out of 40 Cr. has been incurred for lying of Infrastructure in Faridabad and Gurugram. It has been further observed that in respect of the works mentioned at Sr. No.2(a), 2(b) & 2(e), the expenditure has been incurred more than the approved expenditure. The Licensee has not specified any reason for the deviations made from the approved Capex.

Further, as per Regulation 8.3 (b) of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019, capital expenditure is a controllable item. As such the licensee should have exercised proper control over the item wise Capital Expenditure approved by the Commission.

Regulation 9.10 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 further specifies as under: -

"In case the capital expenditure incurred for approved schemes exceeds the amount as approved in the capital expenditure plan, the generating company or the transmission or the distribution licensee, as the case may be, shall file an application with the Commission at the end of control period for truing up the expenditure incurred over and above the approved amount. After prudence check, the Commission shall pass an appropriate order on case to case basis. The True-up application shall contain all the requisite information and supporting documents".

Chapter 5 Page 171 of 233

Provided that any additional capital expenditure incurred on account of time over run and / or on unapproved schemes not covered under regulation 9.9 or unapproved changes in scope of approved schemes shall not be allowed by the Commission unless the generating company or the licensee, as the case may be, is able to give adequate justification for the same". The licensee is directed to adhere to the Regulations.

# 5.2 Review of Capital Investment Plan in Progress for FY 2020-21:

Regulation 9.7 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019, specifies that in the normal course, the Commission shall not revisit the approved capital investment plan during the control period. However, during the mid-year performance review and True-up, the Commission shall monitor the year wise progress of the actual capital expenditure incurred by the generating company or the licensee vis-à-vis the approved capital expenditure and in case of significant difference between the actual expenditure vis-a-vis the approved expenditure, the Commission may True-up the capital expenditure, subject to prudence check, as a part of annual True-up exercise on or without an application to this effect by the generation company/licensee. The generating company and the licensee shall submit the scheme-wise actual capital expenditure incurred along with the mid-year performance review and True-up filing.

Accordingly, both the distribution licensees, through filing of their Annual Performance Review petitions for FY 2020-21 and subsequent submissions, revised their capital investment plan for FY2020-21. After examining these, the Commission allows following revised capital investment plans.

### **UHBVNL:**

The licensee i.e. UHBVN submitted that the Commission in Tariff Order dated 01.06.2020 has approved Capital Expenditure Plan Rs. 980 Crores for UHBVN for the year FY 2020-21. The Petitioner has considered the approved Capital Expenditure Plan to calculate revised estimates of ARR for the year.

	Capital Investment Plan for FY 2020-21 (UHBVNL)(Rs. in Cr.)					
Sr. No.	Name of the Scheme	Capex approved by HERC	Expenditure incurred upto 30.09.2020 (i.e. 01.04.2020 to 30.09.2020)	Likely CAPEX to be incurred from 01.10.2020 to	Funding Agency	

Chapter 5 Page 172 of 233

				31.03.2021	
				during FY 2020-21	
Α		PD&C Wing		2020-21	
1	Creation of new 33 kV sub-stations along with Spill Over and associated 33 kV & 11 kV lines including civil works/ Normal development (33 kV & 11 kV)	95.00	66.07	28.93	REC= 55 JICA = 40
2	Augmentation of existing 33 kV sub-stations including civil works	36.00	21.00	15.00	REC= 34 JICA = 2
3	Augmentation of existing 33 kV lines	4.00	2.50	1.50	REC= 3 JICA = 1
4	Bifurcation/Trifurcation of overloaded 11 kV feeders	25.00	4.00	15.29	JICA
5	Release of tube well connections on Turn Key Basis*	159.50	14.70	75.30	Consumer Cost / Deposit work
6	Construction of UHBVN Head office Buildings	17.00	9.50	7.50	REC
7	Civil Works other than substation buildings	3.00	0.37	2.63	REC
8	Works to be carried out under IPDS scheme for system strengthening including 2 Nos. GIS substations	20.00	0.75	19.25	IPDS
9	LRP works (Urban sanitization) and works to be carried out under MGJG scheme	30.00	48.57	10.00	REC/ Nigam's Funding
10	Shifting of 11 kV lines passing over residential areas under UHBVN	10.00	8.64	1.36	State Fund (Grant)
11	Shifting of HT line (33 kV), passing over authorized/un-authorized colonies under jurisdiction of UHBVN	10.00	6.15	3.85	State Fund (Grant)
12	AMC for 33 kV substations	1.00	0.00	1.00	Nigam's Funding
13	Capacitor Bank	30.00	0.00	5.00	REC/ Nigam's Funding
14	Strengthening of 11 kV lines, 11 kV Ring-main System, New DTs & normal development	20.00	18.32	1.68	REC
15	Creation of double supply source for 33 kV substations, 33 kV Ring-main / Scada	10.00	0.00	10.00	REC
16	DDUGJY Scheme*	28.00	11.63	16.37	DDU
	Total A	498.50	211.91	214.66	
	*Initially expenditure under DDUGJY scheme vincurred/ intimated under this scheme, hence to				
	and corresponding fund under Tube well conne		•		10 111 F1 20-21
В	and somespeciality raise arises rane well collife	IT Wing	Seen dille	· <del></del> -	
17	Smart City <b>Karnal</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	22.00	0.00	0.00	Nigam's Funding
18	Smart City <b>Panchkula</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	5.00	0.00	0.00	
19	Smart City <b>Panipat</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc)	3.00	0.00	0.00	
20	SCADA Implementation Industrial Area Kundli (HT & LT lines, DTs, U/G Cables, RMUs and FRTUs etc.)	7.40	0.00	0.00	
21	Scaling of IT project to Non-R-APDRP areas	1.80	0.00	0.00	IPDS

Chapter 5 Page 173 of 233

	covering the following: -				
	1. Establishment of IT infra in SDO & Other		0.03	0.03	
	offices and its connectivity with Data Centre.				
	2. Commercial Data Migration (IPDS & Balance Areas)	0.36	0.00	0.36	
	3.GIS Indexing (IPDS & Balance areas)	3.37	0.28	3.09	
22	RT-DAS SAIFI/SAIDI Measurement System in Non- SCADA, R-APDRP, Non- RAPDRP and IPDS Towns of UHBVN	9.30	0.00	0.00	PFC
23	ERP Implementation	20.00	0.00	0.00	PFC/ REC/ Nigam's Funding
24	Smart Metering	168.27	0.00	0.00	REC/ Nigam's Funding
25	AMR of HT Industrial consumers	1.15	0.29	0.86	Nigam's Funding
	Total B	241.65	0.60	4.34	
С		MM Wing			
26	Procurement of single-phase meters for replacement of defective meters & release of new connections. **	22.50			REC/ NABARD etc
	Material required for release of New AD				
27	Material required for release of Non-AP connections & replacement of old assets / system improvement & normal development**	212.00	141.37	140.13	REC/ NABARD etc
27	connections & replacement of old assets / system improvement & normal	5.35	141.37	140.13	-
	connections & replacement of old assets / system improvement & normal development**  Procurement of Power Transformers - 10 No. along with allied equipment such as 33 kV CTs		141.37	140.13 140.13	NABARD etc
	connections & replacement of old assets / system improvement & normal development**  Procurement of Power Transformers - 10 No. along with allied equipment such as 33 kV CTs - 30 No.	5.35 239.85 ters was propund 300000 S	141.37 posed in CAPEX b	140.13 ut now expendi	NABARD etc  REC/ NABARD etc  ture has been
	connections & replacement of old assets / system improvement & normal development**  Procurement of Power Transformers - 10 No. along with allied equipment such as 33 kV CTs - 30 No.  Total C  **Initially expenditure 60000 Single Phase Meincurred/ intimated under this scheme for around the system of the syste	5.35 239.85 ters was propund 300000 S	141.37 posed in CAPEX b	140.13 ut now expendi	NABARD etc  REC/ NABARD etc  ture has been
28	connections & replacement of old assets / system improvement & normal development**  Procurement of Power Transformers - 10 No. along with allied equipment such as 33 kV CTs - 30 No.  Total C  **Initially expenditure 60000 Single Phase Meincurred/ intimated under this scheme for aroumaterial at Sr. No. 27 have been reduced according to the system.	5.35 239.85 ters was propund 300000 Silingly.	141.37 posed in CAPEX b ingle Phase Mete	140.13 ut now expendi rs. However, CA	NABARD etc  REC/ NABARD etc  ture has been

The Commission has observed that no expenditure has been indicated for scheme at Sr. No. 17-24 for which an amount of Rs. 236.77 Cr. was approved by the commission. Further expenditure incurred/proposed for the scheme at sr. no. 9 is indicated more than the approved expenditure. The licensee is required to give reasons for nil program against these works during FY 2020-21. In addition, Licensee vide remarked at Sr. 16 & 27 submitted as under:

Initially expenditure under DDUGJY scheme was not proposed in CAPEX but now expenditure has been incurred/ intimated under this scheme, hence the scheme have been incorporated at Sr. No. 16 in FY 20-21 and corresponding fund under Tube well connection scheme have been utilized.

Chapter 5 Page 174 of 233

Initially expenditure 60000 Single Phase Meters was proposed in CAPEX but now expenditure has been incurred/ intimated under this scheme for around 300000 Single Phase Meters. However, CAPEX for other material at Sr. No. 27 have been reduced accordingly.

In view of above MYT Regulation 2019 specifies that in the normal course, the Commission shall not revisit the approved capital investment plan during the control period. However, during the mid-year performance review and True-up, the Commission shall monitor the year wise progress of the actual capital expenditure incurred by the generating company or the licensee vis-à-vis the approved capital expenditure and in case of significant difference between the actual expenditure vis-a-vis the approved expenditure, the Commission may True-up the capital expenditure, subject to prudence check, as a part of annual True-up exercise on or without an application to this effect by the generation company/licensee. The generating company and the licensee shall submit the scheme-wise actual capital expenditure incurred along with the mid-year performance review and True-up filing.

Licensee is directed to adhere the Regulation meticulously.

### **DHBVNL:**

The licensee i.e. DHBVN submitted that the Commission in Tariff Order dated 1st June 2020 had approved Capital Expenditure Plan of Rs. 1200 Cr. for FY 2020-21. The Petitioner has considered the revised Capital Expenditure of Rs. 1050 Cr. for FY 2020-21 for computing the revised estimate of ARR for FY 2020-21.

DHBVNL in its instant Petition for Annual Performance Review of FY2020-21 has submitted the total capital expenditure Rs. 1050 Cr. out of which of Rs. 368.27Cr.incurred during FY 2020-21 Up to ending Sept,2020 and Rs. 681.73 Cr. is likely to be incurred in second half i.e. ending March, 2020, the detail of which is as indicated in following table: -

Capital Investment Plan for FY 2020-21 (DHBVNL)

Sr. No.	Description	CAPEX as per approval of HERC (Rs. in Cr.)	Expenditure (Rs. in Cr) incurred during current FY upto 30.09.2020 (i.e. from 01.04.2020 to 30.09.2020)	Likely CAPEX to be incurred from 01.10.20 to 31.03.21 during FY 2020- 21	Funding Agency
1	AT&C loss sustainable reduction plan				
а	Procurement of single-phase meters for replacement of defective meters & release of new connections and procurement of Smart Meters.	32	7.78	14.04	REC

Chapter 5 Page 175 of 233

	Τ		T		г
b	Procurement of three phase meters				
	for replacement of defective meters	10	5.7	3.22	REC
	& release of new connections and	10	5.7	3.22	NLC
	procurement of Smart Meters.				
С	Power Factor Improvement				
	(Providing automatic power factor	5	3.4	1.6	REC
	correctors)	-			
	Sub Total	47	16.88	18.86	
2	Load Growth schemes				
<u>-</u> а	Creation of new 33 kV sub-stations				
a	alongwith associated 33 kV & 11 kV	100	38.38	45.61	REC/JICA
	1	100	30.30	45.01	REC/JICA
la	lines				
b	Augmentation of existing 33 kV sub-	16	1.44	8.86	REC
	stations	_			
С	Augmentation of existing 33 kV lines	4	4.46	0.86	REC
d	Bifurcation of 11 kV feeders (Work of				_
	bifurcation of feeders, augmentation	40	14.04	30.96	REC/JICA
	of ACSR).				
е	Material required for release of Non-				
	AP connections & replacement of old	180	58.96	114.96	REC
	assets				
f	Release of Tube well connection on				Consumer Cost/
	turnkey basis and segregation of AP	70	22.31	50.98	i
	load from Rural Urban feeders.				Deposit Work
G	Procurement of power transformers				
	and allied equipment such as 33 kV				
	CTs, 33 kV PTs, 33 kV and 11 kV	28	7.42	4.93	REC
	VCBs, 33 kV Control and Relay Panels				
	etc.				
Н	11 KV Lines				
i	Distribution Transformer (25, 63,100,				
•	200 kVA)				
J	LT line with ABC/XLPE Armoured				
J	Cable				
K	Augmentation- DTR, Existing line on	138.18	18.96	120.21	REC/PFC
K	conductor to ABXLPE, Augmentation	136.16	18.50	120.21	KEC/TTC
	_				
-	of 11kV lines				
L	Metering (3 phase), Solar Energy				
	Meter				
М	Solar Project		407.0-	<b>6</b> 6-	
	Sub Total	576.18	165.97	377.37	
	Other works		_		
3	Civil Works	14.85	2.56	12.66	Departmental
4	Shifting of HT line (33 kv), passing				
	over authorized/un-authorized	10	4.66	3.22	REC
	colonies under jurisdiction of			3.22	
	DHBVN.				
	Note:-Hon'ble Chief Minister has ma	de an announce	ment on the floor	of Haryana Vidha	ın Sabha that all
	dangerous wires of 33 KV and above	levels passing or	ver the various col	onies shall be remo	ved. Accordingly,
	Worthy ACS/Power, Govt. of Haryand	a, Power Deptt. o	directed to prepare	the detailed scher	ne in this regard.
	Also, Worthy ACS/Power, Govt. of Ha	ryana, Power De	ptt. has desired the	at it may be made <sub>l</sub>	part of the CAPEX
	Plan and approval of HERC be obtaine				
5	Mahara gaon jagmag gaon scheme				
	for rural area and feeder sanitization				
	for Urban area/LRP/Replacement of	110	45	65	REC
	iron pole.				
1		l .	l	l	1

Chapter 5 Page 176 of 233

6	Other works for system				
	improvement - Procurement of IT Equipment & Software	3	0.07	0	Departmental
7	Smart City Gurgaon (HT & LT Lines, DTs, U/G Cables, RMUs and FRTUs				
	Etc.) including SCADA Project, IMT,	310	118.29	139.05	PSDF/Bank
	Manesar				
8	Shifting of 11 lines passing over	15.79	9.15	13.3	REC
	residential areas under DHBVN.				
9	Double Source of 33 KV Supply	10	2	4	REC
10	Muffing of existing poles of 11 KV	2.65	1	1.65	REC
	Lines Sub Total	476.29	182.73	238.88	
	IT Projects	470.23	102.73	230.00	
11	R-APDRP Part-A (IT) Project	24.97	0	24.97	PFC
12	Scaling of IT project to Non-R-APDRP	21.37		21.37	110
	areas covering the following: -				
	1. Establishment of IT infra in SDO &				
	Other offices and its connectivity				
	with Data Center.				
	2. AMR for HT consumer meters.				
	3. Engagement of an Agency for GPS	19.53	2.49	17.04	
	based field survey activities & data	15.55	2.43	17.04	
	digitization.				PFC/REC
	4. Engagement of SI for DM				
	5. Procurement of Computer				
	Furniture (Computer chair & table)				
	for office under IPDS town and in				
42	balance non-R-APDRP areas	46.00	0	2.20	
13	Implementation of ERP application	16.88	0	3.38	
14	RT-DAS (Real Time Data Acquisition System)	6.15	0	1.23	
15	Laying of Infrastructure in Gurgaon				
13	(Sector-58 to 115 and Faridabad	25	0.2	0	REC
	(Sector-75 to 89)		0.2		0
16	SCADA for 33 KV Substations	3	0	0	
17	SCADA for 11KV lines in Urban Areas				
	comprising of 11 KV Urban, Urban	5	0	0	
	Mix, Industrial Feeders, etc.				
	Sub Total	100.53	2.69	46.62	
	Grand Total	1200.00	368.27	681.73	

The Commission observes in case of DHBVN that there is no indication of expenditure on the works mentioned in CIP at Sr. No. 11, 11(b) (c) for first half for which an amount of Rs. 53.00 Cr. was approved. Further No expenditure neither in first half nor in 2nd half has been shown for the projects at Sr. No. 11 (e), (f). The licensee is required to give the reasons for nil progress against these works during FY 2020-21.

Chapter 5 Page 177 of 233

## 5.3 Capital investment plan for FY 2021-22

The licensees through their Petitions for true up of FY2019-20, annual performance review for FY 2020-21 and ARR for FY 2021-22 has submitted the capital investment plan for FY 2021-22 as per following details: -

# **UHBVNL**

UHBVNL has submitted that in order to achieve the load growth activities, strengthening of distribution network, reduction of distribution losses, improvement of system reliability, release of AP tube well connections, implementation of smart metering, SCADA and others the loss targets & strengthening the power system, UHBVN proposes to incur a Capital Expenditure of Rs 1125.27 Cr. In the FY 2021-22. Licensee further submitted that a significant portion of capital expenditure plan is planned to be deployed on load growth activities, system strengthening, feeder sanitisation and smart metering.

The Capital Expenditure Plan for FY 2021-22 is being funded from the equity infused by Nigam, debt funded by agencies like REC and NABARD and consumer contribution paid for release of new connection

The details of Scheme wise CAPEX for the FY 2021-22 has been given in the table below:

Capital Expenditure Plan for FY 2021-22 (UHBVNL)

Sr. No.	Name of the Scheme	Qty	Cost
1	Creation of new 33 kV sub-stations along with Spill Over and associated 33 kV & 11 kV lines including civil works /Normal development (33 kV & 11 kV)	28 Nos.	133.00
2	Augmentation of existing 33 kV sub-stations including civil works along with Spill Over	66 Nos.	59.40
3	Augmentation of existing 33 kV lines	98 km	7.11
4	Bifurcation/Trifurcation of overloaded 11 kV feeders along with Spill Over	150	28.50
5	Release of tube well connections on Turnkey Basis*	8000 Nos	100.00
6	Construction of UHBVN office/residential Buildings		5.00
7	Civil allied Works other than substation buildings		2.00
8	Works to be carried out under IPDS scheme for system strengthening including 2 Nos. GIS substations		2.00
9	LRP works (Urban sanitization) and works to be carried out under MGJG scheme		50.00
10	AMC for 33 kV Sub-stations		0.00
11	Capacitor Bank (APFC)		50.00
12	Strengthening of 11 kV lines, augmentation of HT line,11 kV Ring main System, New DTs & normal development		100.00
13	Creation of double supply source for 33 kV substations, 33 kV Ring main	50Kms	20.00
14	Smart City <b>Karnal</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc.)		19.00

Chapter 5 Page 178 of 233

Sr.	Name of the Scheme	Qty	Cost
No.	Name of the Scheme	Qty	Cost
15	Smart City <b>Panchkula</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc.)		29.00
16	Smart City <b>Panipat</b> (HT < Lines, DTs, U/G Cables, RMU and FRTUs etc.)		29.00
18	ERP Implementation		18.00
19	Smart Metering		225.00
20	AMR of HT Industrial consumers		1.35
21	Procurement of single-phase meters for replacement of defective meters & release of new connections.		4.50
22	Material required for release of Non-AP connections & replacement of old assets / system improvement & normal development		236.90
23	Procurement of Power Transformers -10 Nos. along with allied equipment such as 33 kV CTs - 30 Nos.		5.51
	TOTAL		1125.27

#### **DHBVNL**

DHBVNL has submitted that Capital Expenditure Plan for FY 2021-22 is proposed with a focused approach to strengthen the distribution network, reduce distribution losses and increase IT implementation. Major expenditure is proposed towards creation of new substations, bifurcation/trifurcation of 11 KV feeders, feeder sanitisation, IT Implementations such as SCADA and other works. CAPEX would be funded mostly through debt sourced from REC & PFC, equity support from the State Govt. and consumer contribution. Scheme Wise Capital Expenditure Plan of DHBVN for is tabulated as under:

Capital Expenditure Plan for FY 2021-22 (DHBVNL)

Sr. No.	Description	Quantity (In Nos.)	Proposed CAPEX for FY 2021-22
1.	AT&C loss sustainable reduction plan		
Α	Procurement of single phase meters for replacement of defective meters & release of new connections and procurement of Smart Meters.	440000	34.55
В	Procurement of three phase meters for replacement of defective meters & release of new connections and procurement of Smart Meters.	64000	10.81
С	Power Factor Improvement (Providing automatic power factor correctors)		15.00
	Sub Total		60.36
2.	Load Growth schemes		
Α	Creation of new 33 kV sub-stations along with associated 33 kV & 11 kV lines	30	156.41
В	Augmentation of existing 33 kV sub-stations	40	25.00
С	Augmentation of existing 33 kV lines (In KMs)	100	10.00
D	Bifurcation of 11 kV feeders (Work of bifurcation of feeders, augmentation of ACSR).		75.00
E	Material required for release of Non-AP connections & replacement of old assets		190.00
F	Release of Tube well connection on turnkey basis and segregation of AP load from Rural Urban feeders.		90.00
G	Procurement of power transformers and allied equipment such as 33 kV CTs, 33 kV PTs, 33 kV and 11 kV VCBs, 33 kV Control and Relay Panels etc.		30.00

Chapter 5 Page 179 of 233

Sr. No.	Description	Quantity (In Nos.)	Proposed CAPEX for FY 2021-22
	Sub Total		576.41
3.	Other works		
Α	Civil Works		20.00
	Shifting of HT line (33 kv), passing over authorized/un-authorized colonies under jurisdiction of DHBVN.		0.68
	Note: -Hon'ble Chief Minister has made an announcement on the floor of Haryana Vidhan Sabha that all dangerous wires of 33 KV and above		
В	levels passing over the various colonies shall be removed. Accordingly, Worthy ACS/Power, Govt. of Haryana, Power Deptt. directed to prepare		
	the detailed scheme in this regar. Also, Worthy ACS/Power, Govt. of Haryana, Power Deptt. has desired that it may be made part of the		
	CAPEX Plan and approval of HERC be obtained.		
С	Mahara gaon jagmag gaon scheme for rural area and feeder sanitization for Urban area/LRP/Replacement of iron pole.		90.00
D	Other works for system improvement - Procurement of IT Equipment & Software		5.00
E	Smart City Gurgaon ( HT & LT Lines, DTs, U/G Cables, RMUs and FRTUs Etc.) including SCADA Project, IMT, Manesar		450
F	Shifting of 11 lines passing over residential areas under DHBVN.		10.00
G	Double Source of 33 KV Supply		5.00
	Sub Total		580.68
4.	Implementation of ERP application		23.63
5.	RT-DAS (Real Time Data Acquisition System)		4.92
6.	Laying of Infrastructure in Gurugram (Sector-58 to 115 and Faridabad (Sector-75 to 89)		4.00
	Sub Total		32.55
	Grand Total		1250.00

Licensees have not submitted details regarding financial tie ups to carry out the proposed Capital Expenditure plan and has not given the status of NITs/ tenders and activities undertaken to implement the CIP during FY 2021-22.

UHBVNL, has proposed a capital expenditure plan of Rs. 1125.27 Cr. The Commission feels it is on higher side in view of their past experience/progress. As UHBVNL had only been able to incur an expenditure of Rs. 518.86 Cr., Rs.887.11 Cr. and Rs. 864.57 Cr. during, FY 2017-18, FY 2018-19 and FY 2019-20 respectively and expected to incur an expenditure Rs. 713.01 Cr. during FY 2020-21. The Commission, however, feels that adequate capital expenditure shall be required to meet the loss reduction targets and to strengthen the distribution system. The Commission also observes that proposed expenditure to tune of 225 Cr. (at Sr. No. 19) for Smart metering and Rs. 67 Cr. (at Sr. No. 14-16) for smart city IT infrastructure in Karnal, Panipat and Panchkula, and creation/augmentation of 33 KV Sub-Station and release of Tube well connection appears to be optimistic targets. Keeping in view of the above facts, the Commission approves an overall Capital Expenditure plan of Rs. 950 Cr. for UHBVNL for FY 2020-21.

Chapter 5 Page 180 of 233

The Licensee is directed to revised its Capital expenditure plan accordingly and submit the scheme wise details of the proposed expenditure to the Commission within one month of the Order.

Further, in DHBVNL the actual capital expenditure for FY 2017-18, FY 2018-19 and FY 2019-20 has been 808.63 Cr., 839.30 Cr. and Rs.1101.61 Cr. respectively. The Commission approved the overall capital expenditure plan for Rs. 1200 Cr. for FY2020-21 wherein the Licensee has indicated in its petition that expenditure of Rs.368.27 only has been incurred in first half of FY 2020-21 ending to Sept, 2019 and further Rs. 681.73 Cr. are likely to be spent during Oct, to Mar, 2020. In view of the licensees' past performance on Capital expenditure, Commission approves the Capital expenditure of Rs. 1125Cr. for FY 2021-22 and further directs the licensee to revise its capital expenditure plan accordingly and submit the scheme wise details of proposed expenditure to the Commission within one month from the date of issue of the Order.

Both the licensees are further directed that they shall regulate their capital expenditure plans for FY 2021-22 as per Regulations 9.7 to 9.12 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019.

## 5.4 Review of Technical Parameters

The Commission has reviewed the performance of distribution system of the Haryana DISCOMs based upon the details made available for FY 2019-20 & FY 2020-21 and examined the projections for FY 2021-22 based upon filing of their True up for FY 2019-20, Revised Aggregate Revenue Requirement of 2020-21 & proposed Aggregate Revenue Requirement for FY 2021-22 including subsequent submissions thereof as per Multi Year Tariff Regulations. The observations of the Commission in this regard are as follows: -

#### 5.5 Distribution Losses

The year-wise position of Distribution Losses as per the information provided by the Petitioners is tabulated below:

Financial Year	UHBVNL	DHBVNL
2014– 2015	30.58%	24.47%
2015–2016	31.49%	24.47%
2016–2017	29.86%	21.14%
2017–2018	24.81%	19.16%
2018– 2019	22.04%	15.34%
2019– 2020	19.01%	14.37%
2020–2021 (Projected)	21.23%	16.53%

Chapter 5 Page 181 of 233

The Commission observes that Distribution Loses of UHBVN & DHBVN have decreased from FY 2015-16 onwards. The Commission observes that distribution losses reduction is one of the key factors for financial turnaround of Distribution Licensees. The Commission expects from the Distribution Licensees to make out all efforts to achieve the Distribution Loss targets as prescribed by the Commission by capital expenditure on system strengthening/up gradation, energy meters, IT interventions etc. The Commission appreciates the efforts made by UHBVN & DHBVN for decreasing the Distribution Loss in the last few years and hopes that Distribution Licensees will achieve the Distribution Loss targets fixed by the Commission every year. The year-wise position of the line losses on 11kV Rural and Urban feeders of the licensees, as per the information provided by UHBVN and DHBVN, is as tabulated below: -

# a) Urban Feeders -Losses

Year	FY 2018-19		018-19 FY 2019-20		FY 2019-20 (Apr-Sept.)		FY 2020-21 (Apr-Sept.)	
DISCOM Total Feeders	<b>UHBVN</b> 726	<b>DHBVN</b> 779	<b>UHBVN</b> 738	DHBVN 854	UHBVN 737	DHBVN 817	<b>UHBVN</b> 753	<b>DHBVN</b> 912
Feeders with losses > 25%	68	82	42	63	84	106	63	107
Feeders with losses > 25% (in %age)	9.37	10.53	5.69	7.38	11.39	12.97	8.36	11.73

#### b) RDS Feeders -Losses

Year	FY 2018-19		FY 2019-20		FY 2019-20 (Apr-Sept.)		FY 2020-21 (Apr-Sept)	
DISCOM	UHBVN	DHBVN	UHBVN	DHBVN	UHBVN	DHBVN	UHBVN	DHBVN
Total Feeders	933	983	971	1029	971	1006	995	1049
Feeders with losses >50%	612	432	463	380	536	394	353	384
Feeders with losses >50% (in %age)	65.59	43.95	47.68	36.93	55.20	39.17	35.48	36.61

Above data reveals that percentage of urban feeders having losses more than 25% and rural feeders having losses more than 50% for the FY 2020-21 vis-a-vis the corresponding period of FY 2019-20 have reduced in both DISCOMs for which they deserve to be complimented.

Chapter 5 Page 182 of 233

In 23rd meeting of State Advisory committee held on August 7, 2020 it was suggested to stack high loss feeders in separate category of 40-50%, 30-40%, 20-30% for feeders having loss below 50% and similarly stacking of feeders in 50-60, 60-70 & above 70 for feeders having loss above 50% to have proper monitoring and strategy thereof to reduce the loss level.

The DISCOMs have submitted the status of feeders having loss above 25% in Urban and 50% in Rural. The high loss feeders are reducing every year by implementation of Loss Reduction Plan (LRP) in urban areas and MJGY in Rural areas.

The Commission further observes that although DISCOMs have shown significant improvement, yet, are far behind the targets set by the Commission vide Tarff Order dated 01.06.2020 in spite of incurring huge capital expenditure on system strengthening schemes/activities and Mhara Gaon Jagmag Gaon (MGJG) scheme, still there are significant nos. of feeders having loss above 25% in Urban & 50% in Rural. The Commission again directs the DISCOMs to reduce AT&C losses of all urban feeders below 25% and that of Rural feeders below 50% in FY 2021-22. DISCOMs shall submit details of feeders as per above suggestions of SAC along with detailed action plan to achieve the target within two months of issuance of orders. Any slippage on account of the target shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder.

# 5.6 Loss Reduction Trajectory

The DISCOMs in their Petitions for Tariff Determination for FY 2021-22, True Up for FY 2019-20 and Annual Performance Review (APR) Petition for FY 2020-21 as per Multi Year Tariff mechanism, submitted the Progress (actual/projections) of distribution loss, collection efficiency (CE) and AT&C loss as under: -

DISCOM	UHBVNL			DHBVNL			
V	Distribution	Collection Efficiency (in	AT& C Loss	Distribution	Collection Efficiency (in	AT& C Loss	
Year	Loss (in %)	%)	(in %)	Loss (in %)	%)	(in %)	
2017-18							
(Actual)	24.81	98.91	25.62	19.16	101.55	17.90	
2018-19							
(Actual)	22.04	100.21	21.88	15.34	100.53	14.90	
2019-20							
(Actual)	19.01	99.26	19.61	14.37	98.79	15.41	
2020-21							
(Projected)	21.23	98.00	22.81	16.53	98.00	18.20	
2021-22							
(Projected)	20.00	99.00	20.80	16.00	99.00	16.84	

Chapter 5 Page 183 of 233

Further, the Regulation 57.2 of HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2012 and the HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 specify the following norms for Collection Efficiency for the Distribution Licensees.

Norms for Collection Efficiency specified by the Commission

Distribution Licensee	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21	FY 2021-22
UHBVNL	99%	99%	99%	99.5%	99.5%
DHBVNL	99%	99%	99%	99.5%	99.5%

The Commission in Tariff Order dated 01/06/2020 had considered the Collection Efficiency as 99.5% for FY 2020-21. The norms for Collection Efficiency for the distribution licensee(s) shall be 99.50% for the Control Period form FY 2020-21 to FY 2024-25 as per *Regulation 57.2* of the HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019. It has been specified in Regulation 12 of HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 that any over achievement or under achievement in respect of Collection Efficiency, distribution loss etc. shall be subject to incentive and penalty framework. From the perusal of information on Collection Efficiency submitted by the Distribution Licensees in their True-up Petitions for FY 2019-20, the Commission observes that UHBVN and DHBVNL both have achieved the normative level of Collection Efficiency during the FY 2019-20 i.e. 99.26% and 98.79% respectively.

The Commission had sought actual AT&C Loss and actual Collection Efficiency along with the details of net Input Energy and net Billed Energy for FY 2019-20 from the Petitioners. Accordingly, the Petitioners had submitted the said information as follows:

AT&C Loss Calculation for FY 2019-20

Particulars	UHBVNL	DHBVNL		
Net Input Energy (In MU)	21756.89	29684.90		
Net Billed energy (In MU)	17620.86	25420.30		
Distribution Loss	19.01%	14.37%		
Collection Efficiency	99.26%	98.79%		
AT&C Losses	19.61%	15.41%		

Further, the petitioners have submitted unaudited figures of AT &C loss and collections efficiency from April to September, 2020 as under: -

Chapter 5 Page 184 of 233

AT&C Loss Calculation for FY 2020-21 (1st half Yr. i.e. April to September)

Particulars	UHBVNL	DHBVNL
Net Input Energy (In MU)	10760.82	14252.53
Net Billed energy (In MU)	8552.78	11633.29
Distribution Loss	20.52%	18.38%
Collection Efficiency	91.98%	92.32%
AT&C Losses	26.89%	24.65%

The Commission in T.O dated 01.06.2020 for limited period i.e. FY 2020-21, has considered the distribution loss of 18.50% based on revised proposal filed by the DISCOMs due to the un-precedented situation arising out of COVID – 19 Pandemic leading to change in sales mix.

It has been observed that the AT & C loss figures of DISCOMs for the first half (H1) is on higher side. Whereas, in general also, trends for AT& C loss in first half (H1) always remain on higher side as compared to 2<sup>nd</sup> half (H2). As per the trends reflected in above AT & C loss for first half of 2020-21, the overall AT&C loss for FY-2020-21 is expected to be higher side due to overall impact of COVID-19 on relevant performance parameters of DISCOMs even though the situation is likely to improve in 2<sup>nd</sup> half of the year. Interveners during Public hearing has also submitted that as the impact of Covid-19 has already diminished and economy is back on rail, losses should be fixed on the actual figure of FY 2019-20 with usual reduction. Under such circumstances, the Commission considers it appropriate to peg the DISCOMs' losses for FY 2021-22, assuming the FY-2020-21 as a zero year, as per HERC (Terms and Conditions for Determination of Tariff for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019 and approved for MYT control period as per table below:

Distribution and AT&C Loss for FY 2021-22

DISCOM	UHBVNL	DHBVNL
Distribution Loss (in %)	16.00	14.00
Collection Efficiency (in %)	99.50	99.50
AT&C Loss (in %)	16.42	14.43

Further the Commission retains Distribution, Collection Efficiency & AT&C loss for FY 2020-21 as approved vide T.O. dated 01.06.2020. However, the Commission may consider revisit at the time of true up based on audited figures.

# 5.7 Distribution Transformers (DTs) failure rate:

HERC vide its Regulation (Standards of Performance for Distribution Licensee) Regulations 2004, had specified the failure rate of distribution transformers as maximum 5% for urban area DTs and maximum 10% for rural area DTs. Further ibid Regulation has been amended and re-notified on 24.04.2020 as HERC, (Standards of Performance of Distribution

Chapter 5 Page 185 of 233

Licensees and Determination of Compensation) Regulations,2020 which interalia vide its Regulation (6.1.e) specified that Licensee shall also maintain the transformer damage rate below 3% p.a. in urban area and 6% p.a. in rural area.

The year-wise status of damage rate of distribution transformers, as per the information provided by UHBVNL and DHBVNL is given as under: -

#### **Distribution Transformers Failure Rate**

Sr.	Yea	ır	UHI	BVNL	DH	IBVNL
No.			Failure Rate	Failure Rate	Failure Rate	Failure Rate
			excluding	including	excluding	including
			transformers	transformers	transformers	transformers
			damaged within	damaged within	damaged	damaged within
			warranty period	warranty period	within	warranty period
			(%)	(%)	warranty	(%)
					period (%)	
	2016-17	Urban	1.69	4.62	3.26	4.96
1		Rural	3.67	7.53 6.67		10.53
		Overall	3.50	7.27	6.31	9.95
2	2017-18	Urban	5.28	7.06	3.35	4.65
		Rural	6.65	9.84	5.90	9.41
		Overall	6.52	9.59	5.58	8.82
3	2018-19	Urban	3.96	5.64	3.90%	5.66%
		Rural	6.68	10.19	6.00%	9.80%
		Overall	6.43	9.77	5.74%	9.28%
4	2019-20	Urban	4.00	5.62	2.47%	3.44%
		Rural	6.48	9.60 3.56%		5.45%
		Overall	6.24	9.22	3.42%	5.20%
5	2020-21*	Urban	3.07	3.85	4.54%	6.53%
		Rural	4.64	6.90	2.52%	3.43%
		Overall	4.48	6.61	4.27%	6.13%

<sup>\*</sup> till Sep'

The DT damage rate is to be analysed on the basis of total number of DTs damaged, irrespective of the fact whether the transformer damaged was within warranty period or not, as all these DTs were part of the system. The high level of transformer damage rate not only affects the continuity of supply adversely but also reflects upon poor monitoring and maintenance of distribution system which in turn also impacts the finances of the distribution licensees,

From the analysis of the data indicated in the above table, it is observed that Failure Rate of DTs in urban and rural area of UHBVNL during FY 2019-20 is **5.62**% and **09.60**% respectively i.e. more than limits prescribed by the Commission in the prevailing Standard of Performance Regulations. However, in DHBVN, the Failure Rate of DTs in urban area and rural are within the limits prescribed by the Commission.

Chapter 5 Page 186 of 233

The Commission has analysed the submissions of the Petitioners and observed that in FY 2019-20, overall transformer damage rate of UHBVN and DHBVN has come down as compared to FY2018-19, however, it still requires further efforts to bring it on lower side.

The transformer damage rate in the first half (H1) i.e. April to sept 2020 for both DISCOMs is on higher side. The percentage is 3.85% in Urban and 6.90 % in rural area of UHBVN and it is 6.53% in urban and 3.43 % in rural area of DHBVN respectively. The higher rate of damage indicates mainly poor maintenance, application of higher size fuses and improper earthing of transformer.

The Commission again directs the licensees to bring down the distribution transformer damage rate below the prescribed limits in FY 2020-21 and FY 2021-22. Any slippage on account of the timeline shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder. Further Commission directs the licensee to provide the action plan to reduce rate DT damage during FY 2020-21 and FY 2021-22.

As per MYT Regulations the distribution licensee shall maintain a proper record of failure of the distribution transformers and submit the same in the quarterly report to the Commission. The DISCOMs are again directed to ensure that quarterly reports be submitted regularly without fail and to host the circle wise information on its website regularly.

## 5.8 Non-replacement of defective energy meters by the Distribution Licensees:

The two Distribution Licensees, in their Petitions for True up for FY 2019-20 and revised ARR for FY 202-21, have subsequently submitted the following details with regard to defective energy meters.

Meter category	No. of defective meters (ending March, 2020)			No. of defective meters (ending Sept. '20)		
	Rural	Urban	Total	Rural	Urban	Total
		UHBV	NL			
Single Phase Meters	57,523	5005	62,528	51,026	10,728	61,754
Three Phase Meters	1,982	522	2,504	1,008	478	1,486
Total	59,505	5,527	65,032	52,034	11,206	63,240
		DHBV	NL			
Single Phase Meters	64,561	8,452	73,013	62,642	6,747	69,389
Three Phase Meters	51,717	2,222	53,939	64,928	2,378	67,306
Total	1,16,278	10,674	1,26,952	1,27,570	9,125	1,36,695
<b>Grand Total</b>	1,75,783	16,201	1,91,984	1,79,604	20,331	1,99,935

The Commission observes that the total number of defective meters of both licensees have increased to 1,99,935 (ending Sept,2020 from the last year figures of 1,91,984 (ending

Chapter 5 Page 187 of 233

March, 2020). In case of DHBVN, number of defective meters in both rural and urban areas are very high and overall figures have increased even from last year in the corresponding period which reveals that no concrete steps have been taken by DHBVN to clear the backlog of defective meters.

It is needless to mention that accurate metering is an important aspect of distribution business since it ensures revenue realization by sale of electricity. This not only causes harassment to the consumers but also reflects on poor performance of licensee.

The Commission in Tariff Order dated 01/06/2020 had observed as under:

"The Commission is of considered view that that despite issuance of directives almost in each tariff order distribution licensees have not been able to get the meters replacement of defective energy meters as per the norms fixed by the Commission. The licensees should ensure availability of energy meters at Nigam's stores, empower its officials and plan its activities suitably in order to achieve the envisaged targets. The Discoms ought not to lose sight of Section 55 (1) of the Electricity Act, 2003 i.e. "No licensee shall supply electricity, after the expiry of two years from the appointed date, (emphasis added) except through installation of a correct meter in accordance with the Regulations to be made in this behalf by the Authority"

DISCOMs are once again directed to clear the backlog of defective metering and to ensure the compliance of relevant provision of HERC, (Standards of Performance of Distribution Licensees and Determination of Compensation) Regulations,2020 wherein the Distribution Licensee shall ensure that at no point of time the percentage of defective meters to the total number of meters in service exceeds 2% Limit.

## 5.9 Non-replacement of Electro-mechanical Meters

The commission in tariff order dated 01/06/2020 had directed to replace all the electromechanical meters before filing of next year's ARR/Tariff Petition. DISCOMs have submitted that earnest efforts for replacement of electromechanical meters are made and the status as on ending May 2019 and March 2020 as under:

Meter Category	Ending May 31, 2019			Ending	March 31,	2020			
	Rural Urban				Urban	Total			
	UHBVN								
Single Phase Meters	2,08,515	4,656	2,13,171	2,09,688	23,636	2,33,334			
Three Phase Meters	-	-	-	994	4,377	5,371			
Total	2,08,515	4,656	2,13,171	2,10,682	28,013	2,38,705			
	DHBVN								
Single Phase Meters	82,391	5,648	88,039	81,865	1,630	83,495			

Chapter 5 Page 188 of 233

Meter Category	Ending May 31, 2019			Ending	March 31,	2020			
Three Phase Meters	23140	155	23,295	32,255	88	32,343			
Total	1,05,531	5,803	1,11,334	1,14,120	1,718	1,15,838			
HARYANA									
G. TOTAL	3,14,046	10,459	3,24,505	3,24,802	29,731	3,54,543			

Further, DISCOMs have submitted status of pending electromechanical meters ending September 2020 as under:

Motor Catagory	UHBVNL				Grand		
Meter Category	Rural	Urban	Total	Rural	Urban	Total	Total
Single Phase Meters	192551	10040	202591	74748	499	75247	277838
Three Phase Meters	580	842	1422	31743	17	31760	33182
Total	193131	10882	204013	106491	516	107007	311020

The Commission observes that as per the standing Instructions, no electrotechnical meters are allowed to be installed on consumers premises beside specific directions of Commission to replace all existing electromechanical meters, even then in case of UHBVN, the singlephase electromechanical meters pending for replacement increased from 2,13,171 to 2,33,334 whereas count of three phase electromechanical meters also jumped from nil to 5371 for a period of May, 2019 to March, 2020. Further, in case of DHBVN, count of three phase electromechanical meters also jumped from 23,295 to 32,343 for the same period. DISCOMs, submitted that the pendency in replacement of single-phase electromechanical meters is prominent in rural areas primarily due to high public resentment for replacement of electromechanical meters. Presently, DISCOMs have taken MGJG Scheme for loss reduction in rural areas under which works like relocation of meters outside the premises and replacement of defective meters are being carried out in phase manner. In such a scenario where, special drives by DISCOMs for shifting of consumers meters have been driven in Rural area, large quantum of electromechanical meters expected to be replaced with electronic meters under MGJG schemes but nowhere explained the reason of increasing the count of electromedical meters from ending May 2019 to ending March 2020 beside the facts that use of electromechanical meters has totally banned since last few years. The Commission directs DISCOMs to submit justification for increase in no. of electromechanical meters shown in March, 2020 within three months of issue of this order and to replace all the electromechanical meters at least in urban area before filing of next Tariff Petition.

Chapter 5 Page 189 of 233

# 5.10 Implementation of Smart metering Projects in Haryana:

In compliance of Commission's directives to expedite the Installation of Smart Meter with associated features and submit year-wise detailed plan of three years to replace conventional energy meters by prepaid smart meters, DISCOMs vide their letters dated 14.10.2020 and15.10.2020 have submitted that 2,00,131 smart meters have been installed up to 30.09.2020. It was further mentioned that timelines given by EESL to install 1 million smart meters was by 31<sup>st</sup> March, 2021 but due to Covid-19 situation and communication challenges in Genus and ITI-Sciknow meters, the progress of meter supply and installations was held up and has delayed the overall timelines. Now, fresh timelines have been received from EESL and revised target date for installations of 1 million smart meters proposed by EESL is up to 30<sup>th</sup> Sept., 2021.

The DISCOMs have submitted the progress of installation of smart meters as on 23<sup>rd</sup> November 2020 as follows: -

a. Karnal : 71254
 b. Panchkula : 21078
 c. Panipat : 20023
 d. Gurugram : 106200
 Total : 218555

NIT for two million Smart meters (One million for each Discom) is under process and likely to be published by the end of February, 2021.

The Commission observes that the progress is dismal on account of fact that smart meters are not available and EESL is in process of fresh procurement of smart meters.

DISCOMs are directed to submit year-wise detailed plan to replace conventional energy meters by prepaid smart meters within three months of issuance of the Order.

## 5.11 Pending electricity connection/load

DISCOMs have submitted information pertaining to connection/load pending for release as under:

Chapter 5 Page 190 of 233

Status of Pending Applications at the end of FY 2019-20

Discom	Applications pending as on 31.03.2019 (1)		Applications received during 2019-20 (2)		connections released during 2019-20 (3)		Pending applications as on 01.04.2020 (1+2-3-Cancelled)	
	Nos.	Load (KW)	Nos.	Load (KW)	Nos.	Load (KW)	Nos.	Load (KW)
UHBVN	46841	576329.06	222567	1611521.89	168037	745656.58	49353	575101.41
DHBVN	17768	469834.4	294420	3747406.66	229466	1498420.64	12552	604859.09
TOTAL	64609	1046163.5	516987	5358928.55	397503	2244077.22	61905	1179960.5

Status of Pending Applications in the mid of FY2020-21 (up to Sept, 2020)

Discom	Pending applications as on 01.04.2020 (1)		Applications received during 01.04.2020 to 30.09.2020 (2)		connections released during 01.04.2020 to 30.09.2020 (3)		Pending applications as on 01.10.2020 (1+2-3- Cancelled)	
	Nos.	Load (KW)	Nos.	Load (KW)	Nos.	Load (KW)	Nos.	Load (KW)
UHBVN	49353	575101.41	115870	837532.64	72298	276618.02	60857	667592.98
DHBVN	12552	604859.09	153154	1739645.4	102754	633646.2	24058	734317.8
TOTAL	61905	1179960.5	269024	2577178.04	175052	910264.22	84645	1401910.78

The Commission observes that as on 31.03.2019 there was 46841 applications of different categories with applied load of 516329.06 kW were pending in UHBVN. Further, 222567 new applications with applied load of 1611521.89 kW were added in FY 2019-20, whereas UHBVN has released total load of 745656.58 kW against 168037 applications during the year. From April 2020 to Sept.2020, UHBVN has released total load of 276618.02 kW against total application of 72298 under various categories, however still 60587 applications with applied load of 667592.98 kW shown as pending for release as on 01.10.2020.

Similarly, in DHBVN, 17768 applications with applied load of 469834.4 kW were pending on 31.03.2019. Further, 294420 new applications with applied load of 3747406.66 kW were added in FY 2019-20, whereas DHBVN has released total load of 1498420.64 kW against 229466 applications during the year. From April 2020 to Sept.2020, DHBVN has released total load of 633646.20 kW against total application of 102754 under various categories, however still 24058 applications with applied load of 733417.8 kW shown as pending for release as on 01.10.2020.

The Commission observes that in both the DISCOMs, the total pending load for release works out to 1401010.78 kW or 1401 MW as on 01.10.2020. However, the DISCOMs after public hearing held on 28.01.2021 have submitted the status of pending application as on ending Jan 2021 as under:

Discom	Pending applications as on ending Jan.2021				
Discom	Nos.	Load (KW)			
UHBVN	50097	646506			
DHBVN	71264	891139			
TOTAL	121361	1537645			

Chapter 5 Page 191 of 233

The above data as submitted by the DISCOMs reveals that there are 121361 applications with load of 1537.65 MW are pending for release as on ending Jan, 2021 however, during the Public hearing, DISCOMs have claimed that connection release timeline (No. of days) has been remarkably reduced in FY 2019-20 and FY 2020-21.

The Commission has taken serious note of the fact that on the one hand the Discoms are projecting surplus power during most of the year while on the other hand there are pending applications for release of new connections. **DISCOMs** are therefore directed to make all stern efforts to release all the pending applications/loads within the time frame as specified in various law/regulations in-vogue.



#### **CHAPTER 6**

# Wheeling Charges for the FY 2021-22

# 6.1 Wheeling Charges for the FY 2021-22

At the onset the Commission observes that segregated accounts including voltage wise assets and losses for the distribution and retail supply business are a pre —requisite for determination of wheeling charges and cross-subsidy surcharge. The petitioners have submitted segregated costs for the FY 2021-22. The Commission observes that the network establishment and operation cost as distinct from retail supply business including the power purchase cost is about 9.56% of the net ARR of the Discoms based on the allocation parameters proposed by the Discoms. Accordingly, the same has been considered by the Commission for working out the wheeling tariff for the FY 2020-21. Further, the Commission, in light of objections raised by various stakeholders on the calculations of wheeling charges in the Order dated 01.06.2020, has decided to revisit the methodology of calculation. The Commission observes that the open access consumers at different voltage levels impose different costs on the distribution system, mainly in the form of losses. Accordingly, the Commission, in a considered departure from its earlier orders, has opted to calculate different wheeling charges for the HT and LT consumers as under: -

HERC appoved Wheeling Charges for the FY 2021-22

4 N	turning charges for the F1 2021-2	<u> </u>
	twork expenses (per kWh)	
a.	Network establishment and operation cost [9.56% of the net ARR (Rs.	28672.85
	29986 Crore)] of the distribution licensees for the FY 2021-22	
b.	Allowed gross volume of power purchase by the Discoms at Discom	51932.74
	Periphery (MUs) excluding inter-state sales.	
c.	Expenses (Rs / kWh) (a/b)	0.55
2.1 C	ost of losses in the system HT	
а	Approved Energy available for sale to Discoms (MU)	51932.84
b	Distribution system losses (HT) (technical) %	6.39%
С	Losses (MU) (2.1a X 2.1b))	3318.27
d	Bulk supply power purchase rate for the Discoms (Rs. / kWh)	4.88
е	Total cost of losses (2.1dx2.1c) Rs. million	16193.08
f	Cost per unit of losses (Rs. /unit) (2.1e/1b)	0.31
2.2 C	ost of losses in the system LT	
а	Approved Energy available for sale to Discoms (MU)	51932.84
b	Distribution system losses (technical) %	12.16%
С	Losses (MU) (2.2a X 2.2b))	6314.08
d	Bulk supply power purchase rate for the Discoms (Rs. / kWh)	4.88
е	Total cost of losses (2.2dx2.2c) Rs. million	30813
f	Cost per unit of losses (Rs. /unit) (2.2 e/1b)	0.59
3.1 W	Vheeling Charges HT (Rs. / kWh) (1c+2.1f) rounded off	0.86
3.2 V	Vheeling Charges LT (Rs. / kWh) (1c+2.2f) rounded off	1.15

Chapter 6 Page 193 of 233

The Commission observes that the embedded open access consumers of the Discom's drawing power at 66kV or above imposes cost which is being borne by the Discoms. Hence besides the intra state transmission loss as determined by the Commission for FY 2021-22 in the ARR/Tariff order of HVPNL, such open access consumers shall also be liable to pay the distribution system network cost as determined above i.e. Rs. 0.32 per Unit, till such time they are consumers of the Distribution Licensees.

# 6.2 Cross-Subsidy Surcharge (CSS)

The MYT Regulations, 2019 (regulation 63) provides that the cross-subsidy surcharge shall be payable by all intra-State open access consumers except those persons who have established captive generating station and are availing open access for carrying the electricity to a destination for their own use. Cross-subsidy surcharge shall also be payable by such Open Access consumer who receives supply of electricity from a person other than the distribution licensee in whose area of supply he is located, irrespective of whether he avails such supply through transmission/distribution network of the licensee or not. The consumers located in the area of supply of a distribution licensee but availing Open Access exclusively on inter-State transmission system shall also pay the cross-subsidy surcharge as determined by the Commission.

Section 42 of the Electricity Act, 2003 provides that the surcharge and the cross-subsidies shall be progressively reduced. The Commission has worked out CSS in line with the formula provided in the National Tariff Policy, 2016. The National Tariff Policy dated 28.01.2016 provides as under: -

"SERCs may calculate the cost of supply of electricity by the distribution licensee to consumers of the applicable class as aggregate of (a) per unit weighted average cost of power purchase including meeting the Renewable Purchase Obligation; (b) transmission and distribution losses applicable to the relevant voltage level and commercial losses allowed by the SERC; (c) transmission, distribution and wheeling charges up to the relevant voltage level; and (d) per unit cost of carrying regulatory assets, if applicable".

The above is subject to the proviso that the surcharge shall not exceed 20% of the tariff applicable to the category of the consumers seeking open access.

The Commission has considered the methodology prescribed by the National Tariff Policy dated 28.01.2016, while working out cross-subsidy surcharge in the present Order. The relevant provision of the NTP is reproduced below: -

"Surcharge formula:

Chapter 6 Page 194 of 233

$$S = T - [C/(1-L/100) + D+ R]$$

Where

S is the surcharge

T is the tariff payable by the relevant category of consumers, including reflecting the Renewable Purchase Obligation.

C is the per unit weighted average cost of power purchase by the Licensee, including meeting the Renewable Purchase Obligation.

D is the aggregate of transmission, distribution and wheeling charge applicable to the relevant voltage level.

L is the aggregate of transmission, distribution and commercial losses, expressed as a percentage applicable to the relevant voltage level.

R is the per unit cost of carrying regulatory assets (emphasis added).

Above formula may not work for all distribution licensees, particularly for those having power deficit (emphasis added), the State Regulatory Commissions, while keeping the overall objectives of the Electricity Act in view, may review and vary the same taking into consideration the different circumstances prevailing in the area of distribution licensee.

Provided that the <u>surcharge shall not exceed 20%</u> (emphasis added) of the tariff applicable to the category of the consumers seeking open access.

Provided further that the Appropriate Commission, in consultation with the Appropriate Government, shall **exempt levy of cross subsidy charge on the Railways**, as defined in Indian Railways Act, 1989 being a deemed licensee, on electricity purchased for its own consumption.

No surcharge would be required to be paid in terms of sub-section (2) of Section 42 of the Act on the electricity being sold by the generating companies with consent of the competent government under Section 43(A)(1)(c) of the Electricity Act, 1948 (now repealed) and on the electricity being supplied by the distribution licensee on the authorisation by the State Government under Section 27 of the Indian Electricity Act, 1910 (now repealed), till the current validity of such consent or authorisation.

The surcharge may be collected either by the distribution licensee, the transmission licensee, the STU or the CTU, depending on whose facilities are used by the consumer for availing electricity supplies. In all cases the amounts collected from a particular consumer should be given to the distribution licensee in whose area the consumer is located. In case

Chapter 6 Page 195 of 233

of two licensees supplying in the same area, the licensee from whom the consumer was availing supply shall be paid the amounts collected".

The Commission has, in the absence of consumer category cost of service submitted by the Discoms, considered it appropriate to estimate cost of service based on the above formula, relying upon the indicative voltage wise losses submitted by the two licensees got the HT and LT supply.

The voltage wise technical losses filed by the Discoms as part of the additional information is as under: -

Voltage level losses submitted by the Discoms

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	UHBVNL	UHBVNL	UHBVNL	DHBVNL	DHBVNL	DHBVNL		
	as per order dated 1.06.2020	upto upto 31.3.2020 30.11.2020		as per order dated 1.06.2020	upto 31.3.2020	upto 30.11.2020		
Voltage Levels	%	%	%	%	%	%		
33 kV line losses	0.42	0.42	0.41	0.42	0.38	0.48		
33 kV Transformation Losses	0.27	0.31	0.31	0.19	0.19	0.25		
11 kV line losses	5.35	5.10	5.03	6.04	4.36	5.39		
11 kV Transformation Losses	0.98	1.12	1.10	0.97	0.94	1.20		
LT Line Losses	5.23	7.02	6.77	4.93	7.22	8.96		
Total Losses upto LT Level	11.80	13.40	13.07	12.41	12.60	15.52		

The Commission observes that the voltage wise losses now submitted by the licensee are much higher than those provided earlier and the technical losses of the DHBVNL at 15.52% are much higher than the 14.37% distribution losses (Technical + Commercial) claimed by the petitioner as per the audited accounts for the FY 2019-20. One reason for this may be the change in consumption pattern on account of lockdown necessitated on account of Covid Pandemic. Since the consumption pattern is likely to be restored to normal in the FY 2021-22, the Commission is of the considered view that it would not be appropriate to work out the cost of service based on these losses. Accordingly, the Commission has based its calculations on the voltage wise technical losses used in its order dated 01.06.2020.

Based on the voltage-wise loss calculations based on the data submitted by the Discoms, it is possible to work out the total losses up to 11 kV level and overall losses at LT levels. However, working out losses at different HT voltage levels i.e. 66 kV, 132 kV, 220 kV etc. is not possible till such time similar data is made available at these voltages by the Utilities. Hence, for calculating voltage wise losses, the Commission has broadly considered only two categories i.e. HT (11 kV level and above) and LT voltage levels. In line with the National Tariff Policy, the Commission has calculated the voltage wise CoS and Cross Subsidy Surcharge. The difference between technical losses so determined and actual total distribution system losses are considered to be on account of reasons other than technical

Chapter 6 Page 196 of 233

losses and are therefore taken as commercial losses. The commercial losses so determined have been apportioned between HT and LT voltage levels in proportion to annual gross energy sales at these voltage levels. The annual gross energy sales at the given voltage levels has been taken as the sum of energy consumption of all consumer categories connected at that voltage plus the technical distribution losses corresponding to that voltage level as worked out in the voltage wise loss calculations as per the details provided in the table below: -

Calculation of Voltage wise losses for the FY 2021-22

	Calculation of Voltage wise losses			Tatal
_		UHBVNL	DHBVNL	Total
1a	HT sales	5871.13	7828.35	13699.48
1b	LT sales	12619.74	17823.69	30443.43
1	Total Sales	18490.87	25652.04	44142.91
2	Losses %			
2a	HT	6.04	6.65	
2b	LT	11.80	12.41	
3	Loss units			
3a	HT	377.41	557.67	935.08
3b	LT	1688.36	2525.31	4213.67
4	Sales grossed up by Technical losses (1+3)			
4a	HT	6248.54	8386.02	14634.56
4b	LT	14308.10	20349.0	34657.10
5	Combined Technical losses			
5a	HT			6.39%
5b.	LT			12.16%
5	Total			10.45%
6	Total Distribution Losses	3263.09	4526.83	7789.93
7	Total Commercial losses (6-3)	1197.33	1443.85	2641.18
	Commercial losses allocated to HT and LT based on grossed			
8	up units (4)			
8a	HT HT	363.95	421.37	785.32
8b	LT	833.38	1022.48	1855.86
9	Total Voltage level distribution losses (3+8)			
9a	HT	741.36	979.04	1720.40
9b	LT	2521.73	3547.79	6069.52
36	Combined Technical and Commercial losses at Distribution	2321.73	3347.73	0003.32
10	level			
10a	HT			11.19%
10b	LT			16.62%
100	Total			15.00%
10	Units sent out after accounting for Technical and			13.00%
11	Commercial Losses			
11a	HT	6612.49	8807.39	15419.88
11a	LT	15141.47	21371.48	36512.95
110	Total	21753.96	30178.87	51932.84
		21/33.90	301/0.0/	31332.04
12	Transmission Losses	170.36	226.20	406.46
	Inter state	170.26	236.20	406.46
	Intra state	466.63	647.35	1113.98
	Total Transmission Losses	636.89	883.55	1520.45

Chapter 6 Page 197 of 233

Accordingly, based on the voltage level distribution losses as worked out above, the calculations for CSS as per National Tariff Policy formula for the FY 2021-22 is as under: -

Cost of Service for FY 2021-22 as per National Tariff Policy methodology

	Cost of Service as per National Tariff Policy 2021-22						
	Elements of cost of service						
1	Per Unit Weighted average cost of power per unit at State/ Discom periphery	446					
2	Aggregate of transmission, distribution and wheeling charges applicable to the relevant voltage level						
	Intrastate Transmission cost at consumers end (Paise/kWh) (Transmission and SLDC cost/sales)	50					
	Distribution (net of power purchase cost) and Wheeling cost at consumers end (Paise/kWh)	105					
3	Aggregate of transmission distribution and commercial losses applicable to the relevant voltage level						
	HT	11.16%					
	LT	16.62%					
4	Cost of Service						
	C/(1-L/100)+D+R						
	HT	657					
	LT	690					
	Average	679					

The above loss allocation is reflected in the energy allocators at HT and LT voltage levels i.e. lower cost attributed to the HT consumers and higher cost attributed to the LT Consumers. Thus, the Cost of Service in the case of HT Consumers is comparatively lower than that of the consumers receiving electricity supply at LT voltage. The CSS has been worked out as the difference between the average consumer category-wise average revenue realisation per unit and the voltage-wise CoS of HT or LT as the case may be. The Cross-subsidy surcharge for the FY 2021-22 as per the NTP formula shall be as per the table that follows: -

Cross-subsidy surcharge for FY 2021-22 (Rs/kWh)

		CoS	Tariff (FC +	Cross Subsidy	Limited
		(Rs./kWh)	EC)	Surcharge	to 20%
			(Rs./kWh)	(Rs./kWh)	of Tariff
		1	2	3= 2-1	
1	HT industry	6.57	7.59	1.02	1.02
2	Bulk Supply (other than DS)	6.57	7.38	0.81	0.81
3	Railways (Traction)	6.57	7.24	0.67	0.67
4	LT Industry	6.90	7.63	0.73	0.73
5	NDS (HT)	6.57	7.71	1.14	1.14

The applicable CSS worked out above is within 20% (+/-) limit in accordance with the National Tariff Policy.

Chapter 6 Page 198 of 233

#### **CHAPTER 7**

# RENEWABLE PURCHASE OBLIGATION (RPO)

Section 86 (1) (e) of the Electricity Act, 2003 cast statutory obligation on the Commission to promote cogeneration and generation of electricity from renewable sources of energy by providing suitable measures for connectivity with the grid and sale of electricity to any person, and also specify, a percentage of the total consumption of electricity in the area of distribution licensee, for mandatory purchase of electricity from such sources.

In pursuance to the above statute, the Commission notified the Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017, on 24.07.2018. Regulation 54 of the ibid Regulations, has specified the RPO obligation, as under: -

FY	Minimum RPO (%) of Total Consumption Excluding Hydro				
	Non-Solar	Solar			
2016-17	2.75	1.00			
2017-18	2.75	2.50			
2018-19	3.00	4.00			
2019-20	3.00	5.50			
2020-21	3.00	7.00			
2021-22	3.00	8.00			

As per data provided by the State Nodal Agency vide memo 1762 dated 16.05.2019, the shortfall in meeting the RPO for the aforesaid years has been as under: -

				(In Mus)
<b>RE source</b>	RPO backlog till FY	Shortfall FY 2017-18	Shortfall (excess)	Total Shortfall
	2016-17		FY 2018-19	
Solar	377	271	1202	1850
Non-Solar	405	582	-76	911
Total	782	853	1126	2761

Further, the State Nodal Agency, vide its Memo no. 2186 dated 02.07.2020, has intimated the RPO compliance status of DISCOMs till FY 2019-20, wherein shortfall of 3623 MUs (Backlog till 31.03.2019: 1850 Mus & shortfall for the FY 2019-20: 1773 Mus) & 1190 MUs (Backlog till 31.03.2019: 911 Mus & shortfall for the FY 2019-20: 279 Mus) has been reported, for Solar RPO and Non-solar RPO, respectively.

The Commission noted that the shortfall in meeting RPO obligations of the DISCOMs was continuing over the past years. Accordingly, the Commission in its Order dated 22.03.2018 in case nos. HERC/PRO-26 of 2015 & HERC/PRO-28 of 2015 after examining the

Chapter 7 Page 199 of 233

compliance report filed by the Nodal Agency (HAREDA) observed that "there have been instances when the mandated reports have not been filed with the Commission in compliance of the RPO Regulations. The Commission directed HAREDA and the obligated entities to strictly comply with the RPO through purchase of RE power and / or REC in case of power surplus scenario and also the filing requirements. Further, HAREDA was also directed to ensure that its website is kept upto-date with the information filed by the obligated entities. The Commission further directed that HPPC and other obligated entities shall assess the shortfall in meeting RPO for the FY 2016-17 and take suitable action to meet at least 50% of the shortfall so determined by purchase of REC's. DISCOMs are directed to file the compliance report of the same within 45 days from the date of issue of this Order."

The above decision of the Commission was reiterated in the Order of the Commission dated 07.03.2019, to ensure compliance. The Commission had also issued Show Cause Notice (SCN) to DISCOMs under section 142 and 146 of the Electricity Act, 2003, vide letter no. 2116-17/HERC/Tariff dated 02.03.2020 and directed them to explain within 15 days their position for continuous non-compliance in meeting the current year RPO as well as back log as per Commission's various Orders.

In reply to the SCN dated 02.03.2020, HPPC on behalf of both the DISCOMs, filed vide memo no. Ch-56/CE/HPPC/SE/C&R-I/RE Power dated 19.03.2020, has requested to drop the show cause notice. HPPC further submitted that they will be able to meet its yearly RPO targets by FY 2021-22 in respect of Non-Solar and Solar in spite of the sharp increase in solar RPOs in July, 2018, as tabulated below: -

Year	Estimated energy consumption by the	RPO targets in Mus as per HERC		Mus envisaged from tie-ups		% age RPOs achieved/ to be achieved	
	Discoms eligible for RPOs	Solar	Non-solar	Solar	Non-solar	Solar	Non- solar
2018-19	38232	1529	1147	327	1229	0.83	3.21
2019-20	39538	2175	1186	546	986	1.38	2.49
2020-21	40997	2870	1230	1321	1631	3.22	3.98
2021-22	42510	3401	1275	4934	5220	11.61	12.28

Subsequently, UHBVNL filed supplementary ARR Petition, vide memo no. Ch-36/RA-F-25/Vol-76 dated 05.05.2020, on behalf of both the DISCOMs. Considering the impact of lockdown due to COVID-19 pandemic, it has been submitted that outbreak of corona pandemic has further added to the delay in commissioning of Renewable Energy Projects, resulting in shortfall in the yearly RPOs and requested to waive off solar and non-solar RPO backlog as on 31.03.2020.

In view of the above, the Commission, in its ARR Order dated 01.06.2020, considering the unprecedented situation caused by COVID-19 pandemic, decided to waive off the current

Chapter 7 Page 200 of 233

backlog of RPOs and allowed DISCOMs to carry forward RPO deficit of FY 2020-21, up to 31.03.2022. The relevant part of the Order of the Commission dated 01.06.2020, is reproduced hereunder: -

"......the Commission has decided to waive off the current backlog of RPO in view of unprecedented circumstances due to Covid-19 Pandemic as a onetime measure. The Commission is of the view that the decision to waive off the current backlog of RPO has been taken at a time which falls in rarest of rare category and the same should not be set as a precedent. The Commission directs the Discoms to make every possible endeavour to meet the RPO targets as has been given to them by the Commission in timely manner in true letter and spirit." (Chapter 7: RPO, page 263)

# "15. Renewable Purchase Obligation

The Commission is not imposing any penalty on the DISCOMs for non-compliance of its earlier orders regarding achievement of RPO targets/purchase of REC. Further, DISCOMs are allowed to carry forward the shortfall, if any, in the achievement of RPO targets for the FY 2020-21 to FY 2021-22. The DISCOMs are required to clear the carried forward backlog of the FY 2020-21, if any, along with the FY 2021-22 targets of RPO by 31.03.2022 and no further carry forward beyond 31.03.2022 shall be allowed. The Discoms and other obligated entities are directed to provide requisite information to the State Agency on monthly basis by 10th of every month for the previous month to enable the State Agency to submit quarterly report to the Commission." (Chapter 10: Directives, page 282, 283)

The Commission in its Order dated 01.06.2020 had approved RPO for the FY 2020-21 is as under:-

Energy Consumption for	%age of Non-solar RPO of energy	Non-solar RPO (MU)	Solar RPO as %age of	Solar RPO	Total renewable energy required to
2020-21 (MU)	Consumption		energy sales	(MU)	be purchased (MU)
36320.04	3.00%	1089.60	7.00%	2542.40	3632.00

UHBVNL has filed supplementary submissions, vide memo no. Ch-68/RA/F-25/Vol-(78) dated 03.03.2021, on behalf of both the DISCOMs. DISCOMs have submitted that sincere efforts are being made in achieving RPO targets. However, the outbreak of Corona Virus pandemic had resulted into unprecedented conditions across the world which inter alia resulted in imposition of various restrictions across all sectors. The supplies from China and local manpower constraints during the COVID pandemic situation has severely affected the

Chapter 7 Page 201 of 233

commissioning of Renewable Power Projects. Despite the fact that the Discoms have sufficient tie up for Renewable energy Power for meeting its RPOs, the power from RE power against various PPAs/PSAs signed by Discoms/HPPC could not commenced due to delay in Commissioning of renewable energy projects. Besides the above, non-trading of RECs in Energy Exchanges on account of APTEL orders and the limited availability of short-term power has posed further challenges in meeting RPOs during the current FY 2020-21. It may be noted that the REC trading stands suspended since July, 2020, whereas limited Renewable power is being traded in energy exchanges. Against all challenges the Discoms/HPPC has made sincere all out efforts and shall be able to achieve the following levels of RPO during FY 2020-21: -

	Achieved in MUs				
RPO Description	FY 2019-20	FY 2020-21			
KPO Description	FY 2019-20	Upto November, 2020 Expected during remaining FY 2020-21		Total	
Solar	401	938	250	1188	
Non-Solar	902	632	600	1232	

DISCOMs have submitted that Non-solar RPOs are expected to be achieved whereas shortfall in solar RPOs shall be there during the FY 2020-21. In order to fulfil solar RPOs Discoms/HPPC is exploring options of purchasing RECs and solar energy on short term basis. The shortfall is however attributed to following reasons: -

- a) Delay in commissioning of RE project due to COVID/force majeure situation.
- b) Limited availability of solar power on short term basis.
- c) Suspension of REC trading in lieu of APTEL orders since June, 2020.

The delay in RE projects due to COVID situation/force majeure has led to slippage of solar and non-solar RE power in FY 2020-21 to the tune of 562 MUs and 2976 MUs respectively. The delay in Commissioning of renewable Projects would also impact the RPO planning of FY 2021-22. Slippage of solar and non-solar RE power to the tune of 1549 MUs and 808 MUs respectively is further expected during FY 2021-22 due to delay in RE projects amidst COVID pandemic/force majeure conditions. The details are as under: -

Slippage of S	Solar Energy du	e to COVID-19/For	rce Maj	eure (Unit	s in MUs)			
FY	Energy	envisaged	as	Energy	envisaged	as	per	Slippage
	per Schedu	iled COD (in MUs)		Revised S	SCOD (in MUs)			
2020-21	582			20				562
2021-22	3002			1453				1549
2022-23	3804			3804				0
Slippage of Non-Solar Energy due to COVID-19/Force Majeure (Units in MUs)								
FY	Energy	envisaged	as	Energy	envisaged	as	per	Slippage

Chapter 7 Page 202 of 233

	per Scheduled COD (in MUs)	Revised SCOD (in MUs)	
2020-21	3609	633	2976
2021-22	4974	4166	808
2022-23	5005	4970	35

Discoms have prayed that they may not be penalized for non-compliance of RPOs for reasons beyond their control. Equivalent purchase of RECs in due course in lieu of this shall adversely impact the tariff and consumers at large. Generation loss due to delay in commissioning of renewable energy projects in lieu of force majeure for may be considered for the purpose of RPO compliance of Discoms. SECI vide letter dated 01.10.2020 has also proposed similar relaxation to MNRE.

DISCOMs have further submitted that the load curve of Haryana is not apt for accommodating the solar energy above a certain level owing to the limited flexibility of thermal generation. Whereas, the wind generation suits better in comparison to solar generation. The Commission, as per the provisions of the Act, may prudently decide the RPOs for obligated entities including Discoms in such a way that would not impact the electricity consumers of the State adversely besides meeting its overall objective of reducing carbon foot prints in line with national objectives. It will be prudent that solar and non-solar RPO be merged to one so as Obligated Entities/Discoms/HPPC may consider sourcing renewable power compatible to demand curve of the State. The State is in receipt of 20.10.2020 from Shri Piyush Goyal Ld. Minister of Railways, Minister of Commerce and Industry and Minister of Consumer Affairs, Food and Public Distribution to the Government of India whereby inter alia intervention of State has been sought for merging of solar and non-solar RPOs so as Indian railways may install additional solar power capacity on its own land rather arranging/installing non-solar power plants due to technical constraints. Accordingly, the Commission may consider to allow interchangeability between solar and non-solar RPOs so as resources could be best utilized as per need besides meeting the overall objective of reducing carbon footprints.

## DISCOMs have made the following prayers: -

- i) To allow accounting of generation loss/slippage of solar and non-solar power against the PPAs/PSAs due to delay in commissioning of renewable energy projects in lieu of force majeure/non-execution of project by the developers/conditions beyond the control of developer/change in law/Policy etc. for the purpose of RPO compliance.
- ii) To allow accounting of generation loss/slippage of solar and non-solar power amidst COVID/force majeure situation to the tune of 468 MUs and 2776 MUs respectively for RPO compliance with respect to FY 2020-21.

Chapter 7 Page 203 of 233

iii) To allow interchangeability between solar and non-solar RPOs so as resources be best utilized as per need besides meeting the overall objective of reducing carbon footprints.

The Commission has examined the submissions of DISCOMs in light of the Office Memorandum dated 09.03.2021, issued by Ministry of New & Renewable Energy, Government of India (MNRE), wherein SERCs have been requested not to levy penalties on DISCOMs due to shortfall in RPO compliance, where it is attributed to delayed RE projects, due to extension of schedule commissioning date (SCOD), on account of Force Majeure/Government delays etc. as per the contract conditions. The Commission observes that in the ARR Order dated 01.06.2020, the backlog of RPOs upto FY 2019-20 was waived off and shortfall in complying with RPO obligations in the FY 2020-21 was allowed to be carry forward to FY 2021-22. Thus, the concerns of the DISCOMs regarding slippage of tied up solar and non-solar energy, to next financial year due to revised SCOD has already taken care by the Commission in its ARR Order dated 01.06.2020. Further, the issue of interchangeability between Solar and Non-Solar RPO shall be addressed by the Commission in its RE Regulations, 2021, which is in an advanced stage of finalisation.

In accordance with the provisions of the HERC RE Regulations in vogue, the RPO for the FY 2021-22 is 11% of the total energy consumption of the Discoms. The approved RPO for the FY 2021-22 is as under:-

Energy Consumption for	%age of Non-solar RPO of energy	Non-solar RPO (MU)	Solar RPO as %age of energy	Solar RPO	Total renewable energy required to
2021-22 (MU)	Consumption		sales	(MU)	be purchased (MU)
36272.81*	3.00%	1088.18	8.00%	2901.82	3990.01

<sup>\*</sup> Energy available for sale by DISCOMs has been taken net of intra-state transmission losses, excluding energy purchased from RE sources and Hydro.

The volume of energy to be purchased from renewable energy sources as per above table is the total RPO of the Discoms for the financial year 2021-22. Therefore, the volume of renewable energy purchased as approved by the Commission as above shall be adjusted against the total RPO of the Discoms. Further, RPO backlog for the FY 2020-21 shall form part of total power purchase volume approved by the Commission for the FY 2021-22 and set off against the costliest power in the merit order. DISCOMs are advised to ensure that the Solar RPO data provided by them to HAREDA includes energy generated by Rooftop solar Power also.

The State Nodal Agency i.e. HAREDA shall continue submitting quarterly status of RPO met by the obligated entities for the last quarter, separately for overall RPO and solar RPO, in

Chapter 7 Page 204 of 233

accordance with the provisions of regulations 56 (3) of the Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 in the format given below:-

Total no. of units generated/Purchased through Open Access (MTOA, LTOA)	1 MUs	-
Total No. of units utilized for captive consumption	2	-
Total	3=1+2	-
RPO Required (Solar %)	4	1
RPO Required (Non Solar %)	5	1
RPO Required (Solar - Units)	6 = 3*4/100	1
RPO Required (Non Solar - Units)	7 = 3*5/100	1
No. of units generated/purchased from solar renewable energy sources	8	1
No. of units generated/purchased from Non-solar renewable energy sources	9	1
Balance Units (Solar)	10= 6-8	1
Balance Units (Non Solar)	11=7-9	1
No. of RE unit purchased (Solar)	12	-
No. of RE unit purchased (Non-Solar)	13	-
No. of REC purchased (Solar)	14	-
No. of REC purchased (Non-Solar)	15	-
Shortfall (Solar) Units	16=10-12-14	-
Shortfall (Non Solar) Units	17=11-13-15	-

Note: Details of Solar RPO and Other RPO and compliance to be reported separately.

The State Agency may suggest appropriate action to the Commission for non-compliance of the renewable purchase obligation by the obligated entities.

The Discoms and other obligated entities are directed to provide requisite information to the State Agency on monthly basis by 10th of every month for the previous month to enable the State Agency to submit quarterly report to the Commission.

Chapter 7 Page 205 of 233

#### **CHAPTER 8**

#### TIME OF DAY / USE TARIFF

(Avoid Power Peaking and save Money)

# 8.1 Objective and Need

If cost variations warrant and metering is cost-effective, seasonal and time-of-use tariffs may be instituted for wholesale and retail sales. It encourages to change the way we use electricity. Time of Use tariff allow customers some flexibility to choose when they use electricity. Electricity consumed in the Low Rate period will be cheaper than usage in the High Rate period. When choosing a Time of Use Tariff, customers need to consider the time and application of power usage in order to achieve the lowest cost option.

The cost differences during different time blocks over a period of 24 hours are currently large enough to warrant time differentiated prices for electricity at both the bulk and retail levels. Such a change in tariff design would increase the efficient use of electricity in Discoms service territory i.e. UHBVNL & DHBVNL. Marginal cost principles also establish that sufficient differences exist in the cost of power across the hours of the day to warrant the institution of time-differentiated prices for bulk service and retail service to large supply customers, where meters are already in place. Further, the Grid Frequency based UI charges in the Northern Region also establishes the fact that in 96-time blocks of 15 minutes each the UI rates shows wide intra –day variations.

The Time of Use (TOU) tariff is designed to encourage large consumers of electricity to use more during the off-peak period than the peak period. The off-peak period is during the night, when our generating system has capacity that is not being used. Hence, by opting for ToD both the Discoms as well as the Consumers stand to gain. The Discoms can avoid purchase of expensive power during the peak period as well as save on Capex on expansion / augmentation of the distribution system while the consumer can lower the average cost of power being consumed by them.

# 8.2 Proposal by DHBVNL and UHBVNL for revised ToD / ToU Tariff / Night-time Concessional Tariff for FY 2021-22

That the Commission approved the night-time concessional tariff as proposed by the Discoms in PRO-55 of 2019 via order dated 13.12.2019. The approved concessional tariff for HT Industrial consumers on 11/33 KV was Rs. 5.25/kVAh and on 66 KV and above was Rs. 4.85/kVAh.

Chapter 8 Page 206 of 233

Further, in Tariff Order dated 01.06.2020, the Commission stated as under:

"The ToD and Concessional Tariff as determined above shall continue unless the same, by a specific Order and after holding consultation with the stakeholders, is amended / withdrawn by the Commission"

That during the month of Nov 2020 and Dec 2020, only a few consumers opted for concessional tariff. In view of such low adoption by the HT consumers, Discoms have submitted a proposal to revise the concessional tariff for the period of **Nov 2021 to March 2022** keeping in view the following factors:

As per the information obtained from the IEX, the landed price Rs/kWh at Haryana periphery of power procured from power exchange from Jul 2020 to Dec 2020 has been as under:-

Month	Price at IEX Rs/kWh	Price at Haryana periphery Rs/kWh
Jul'20	2.47	2.54
Aug'20	2.43	2.50
Sep'20	2.69	2.76
Oct'20	2.73	2.80
Nov'20	2.73	2.80
Dec'20	2.83	2.90

The average price at Haryana periphery for November 2020 to December 2020 works out to be Rs 2.85/kWh. Accordingly, average price at consumers end for procuring power from IEX through Open Access works out as under:-

Particular	Landed price at Consumer end		
	At 11/33KV Rs/kWh	At 66KV and above Rs/kWh	
Landed Price at Haryana Periphery	2.85	2.85	
Intrastate Transmission losses @2.15%	0.06	0.06	
Intrastate Transmission charges	0.24	0.24	
Wheeling Charges	1.00	0.47	
Cross Subsidy Surcharge	0.62	0.62	
Additional Surcharge	1.01	1.01	
Landed Price at consumer end	5.78	5.25	

The details of sale of power through Power Exchange by the Discoms from April 2020 to Dec 2020 are as follows:-

Month	Unit in LU's	Amount (Rs. Cr.)	Rate per Unit (Rs/kWh)
2020-21			
Apr-20	856.24	16.80	1.96
May-20	100.61	1.91	1.90
Jun-20	0.92	0.02	2.08
Jul-20	83.20	1.96	2.36
Aug-20	7.97	0.15	1.83
Sep-20	22.34	0.56	2.49
Oct-20	68.14	2.07	3.04

Chapter 8 Page 207 of 233

Nov-20	154.23	4.53	2.94
Dec-20	105.48	3.07	2.91

From the table given above, it can be observed that the weighted average rate for a total of approximately 26 MUs of power sold through Power Exchange during Nov 2020 to Dec 2020 works out to Rs 2.93/kWh. This is equivalent to selling power to a consumer at 66kV and above at Rs 2.99/kWh and to 11/33kV consumer at Rs 3.17/kWh after considering intrastate losses @ 2.15 % and distribution losses (technical) @ 6%. So, if this power is offered to HT consumers at a revised concessional tariff for incremental consumption, it would incentivize the HT consumers in consuming more during night-time and be a win-win situation for the Discoms as well as consumers.

That the Energy charges for the HT Consumers at 11KV are Rs 6.65/kVAh whereas at 33 kV, 66/132kV, 220kV, and 400 kV, the Energy charges are Rs.6.55, Rs.6.45, Rs.6.35 & Rs. 6.25/kVAh respectively. Besides, the transmission/distribution losses are much lower in case of consumers at 66 kV and above. It is, therefore, considered prudent that distinction is made between the concessional tariff offered to HT Industrial Consumers on 11/33 kV and that offered to HT Consumers at 66 kV and above.

# **Proposed Tariff for FY 2021-22:**

- i) Concessional Tariff for power drawn during off peak hours i.e. 21:00 to 05:30 hours in excess of normal consumption during the corresponding month in the preceding year will be optional and will be available only to HT Consumers, including furnaces, who opt for the scheme, during the period November to March.
- ii) The HT Consumer, desirous of availing this tariff as per the terms and conditions proposed by the Discoms, shall submit the application to the Chief Engineer / Commercial of respective Discom.
- iii) The Committee comprising of Chief Engineer/Commercial and SE / Metering & Protection shall clear the applications, as far as possible, within the same day. However, the decision shall in no case be delayed beyond three working days from the date of receipt of the application.
- iv) The Tariff, as given below, which shall be exclusive of FSA, ED and M. Tax, would be applicable for the energy drawn during off peak hours i.e. 21:00 to 05:30 hours over and above normal consumption in the corresponding month of the preceding

Chapter 8 Page 208 of 233

year. The energy drawn over and above the normal consumption, on which concessional tariff would apply, would be equal to lesser of  $\Delta x$  and  $\Delta y$ , where

- ∆x= Cumulative change in consumption during night hours (21:00 Hrs to 05:30 Hrs) over the entire billing cycle.
- ∆y=Cumulative change in total consumption during the 00:00 to 24:00 hours over the entire billing cycle.
- v) The base consumption for working out the change in consumption would be decided by the Nigam on case to case basis keeping in view the factors like seasonality, load/CD extension etc.
- vi) The concessional tariff from November 2021 to March 2022 (for time slot of **21:00 to 05:30**) shall be as under:

# **Concessional Tariff**

a)	HT Consumers on 11/33 kV	: Rs 4.25/kVAh
b)	HT Consumers on 66 kV and above	: Rs 3.75/kVAh

- vii) Once opting to avail concessional tariff, the consumer would continue to be charged concessional tariff for the entire duration of the Scheme from November to March. The billing under concessional tariff shall commence from start of billing period immediately following the date of acceptance of the application of the consumer.
- viii) Other terms & conditions of this tariff shall remain as per the ongoing approved concessional tariff scheme.

That, as on date, there are two Schemes, ToD/ToU Tariff and night time concessional tariff, that are available for consumers which are similar in nature. In both the schemes, there is a rebate/concession in tariff on the incremental consumptions during night time from November to March. The objectives of both the schemes are to shift the load from peak hours to off peak hours and to utilize surplus power available in off peak hours during these months.

The petitioners, have, therefore proposed to merge the schemes of ToD/ToU Tariff and night time concessional tariff and to launch ToD/ToU Tariff scheme from November, 2021 to March, 2022 for HT categories of consumers i.e. HT industry (including Arc furnace) HT NDS, Bulk Supply (other than Bulk Domestic). The proposed ToD/ToU Tariff is as under:-

Chapter 8 Page 209 of 233

Period	Charge	Time
Off-Peak Demand	For incremental consumption: -	09:00 P.M to 05:30 A.M
(Nov. to March)	HT Consumers on 11/33 kV- Rs 4.25/kVAh	
	HT Consumers on 66 kV & above- Rs 3.75/kVAh	
Peak Demand	Normal Energy charges and applicable PLEC charges	5:30 P.M to 09:00 P.M
(Nov. to March)		
Normal Demand	Normal Energy charges	05:30 A.M to 5:30 P.M
(Nov. to March)	determined by the Commission	
Demand Charges	As determined by the Commission - shall be the sa	ame for all categories of
	consumers.	

# **Promotional Scheme for Smart Metering:**

That the Discoms are implementing installation of smart meters across selected cities. ToU/ToD tariff can be easily implemented through smart meters. Hence, in line with the night-time concessional tariff scheme for HT consumers, Discoms have also proposed concession for LT consumer category (up to 20 kW) where the smart meters are being installed wherein it is proposed to allow a concession of Rs. 0.50/kWh for electricity consumed from 21:00 Hrs to 05:30 Hrs during the month of November'21 to March'22 for consumers having load up to 20kW under DS, NDS & LT industry categories.

# 8.3 Comments/Suggestions made by Stakeholders on ToD

## 8.3.1 Comments by Faridabad Industries Association.

# **Peak Load Exemption Charges (PLEC):**

PLEC on Open Access consumers was introduced vide HERC 1st Amendment dated 3<sup>rd</sup> December 2013 due to overloading of the power infrastructure during peak load hours.

The basis of levying PLEC during peak load which may call for scheduling of expensive power and impose burden on the system requiring further investments which largely remains un-utilized during the off-peak hours / months of the year, may not hold good now because of the fact that power infrastructure in Haryana has been considerably upgraded and there is no constraint on HVPNL/DISCOM infrastructure. Further the DHBVN is duty bound to manage the system constraint and its failure to do so cannot be compensated by the levy of PLEC which would only breed the inefficiency in its work culture. In the present scenario, levy of PLEC on all consumers including Open Access consumers is unjustified.

Hence Commission is requested to discontinue levy of PLEC on all consumers including Open Access consumers.

Chapter 8 Page 210 of 233

## **Reply of DHBVN:**

It is submitted that the issue raised by the objector are devoid of merit, as levy of Peak Load Exemption Charges is primarily due to high cost of energy available in Energy Exchange during peak load hours (PLHs). PLEC is levied keeping in view two factors i.e. to compensate the licensee for scheduling costlier power during PLHs and secondly to contain the demand within available peak capacity. As Open Access Consumers purchase power through energy exchange contributing loading on the system, even licensee is forced to back down the generating stations, still the power drawn by open access contributes in the load. Therefore, PLEC charges must be recovered from open access consumers.

# 8.4 Comments filed by M/s Jindal Stainless Steel

#### Time of Use Tariff:

The Commission has recognized the need for giving surplus power during off-peak hours 09:00 PM to 05:30 AM and a rebate of 15% is given to the consumers availing ToU/ToD tariff. The Foot Note (b) of the ARR order reads as under,

b) The off-peak discount under ToD tariff shall be applicable for power drawn during off peak hours in excess of the normal consumption during the off peak of the corresponding month in the preceding year.

The net effect is that hardly any consumer is able to derive any benefit from this provision. We would urge the Commission to allow this rebate on the entire power consumed during off-peak load hours. By doing so it would be possible to use the surplus power available with the Utility during night hours and benefit the consumers. The Commission may like to align the off-peak rebate accordingly.

## Reply of DHBVN:

Nigam submits that it is prerogative of the Commission to determine the Schedule of Tariff under the MYT Regulation, 2019 and recovery of the same from consumers is binding for the Nigam.

#### Commission's View:

The Commission has considered the submissions of the Intervener relating to the levy of peak load charges as also the justification of the licensee on the issue. The Commission is of the considered view that the peak load charges were introduced almost a decade ago. Subsequently, there has been tremendous growth in the

Chapter 8 Page 211 of 233

distribution system and it would be in the fitness of things to verify whether the CAPEX in the last 10 years has met its target or not. It may be that the supply constraints may now be restricted to a few areas only. Accordingly, the Discoms are directed to conduct a study of the area wise load constraints being faced by them which would help in restricting the peak load charges to appropriate areas of operation only. This would also help in additional revenue generation in case there are no load constraints as more energy could be supplied, thereby leading to improved consumer satisfaction and also higher energy security. Till such time PLEC in vogue shall continue.

# 8.5 Legal and Policy Framework for ToD Tariff

The section 62 (3) of the Electricity Act 2003 says that:

"The Appropriate Commission shall not, while determining the tariff under this Act, show undue reference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required"

The provision no 5.4.9 of the National Electricity Policy also advocates the ToD tariff *which* says that

"The Act requires all consumers to be metered within two years. The SERCs may obtain from the Distribution Licensees their metering plans, approve these, and monitor the same. The SERCs should encourage use of prepaid meters. In the first instance, TOD meters for large consumers with a minimum load of one MVA are also to be encouraged. The SERCs should also put in place independent third-party meter testing arrangements"

NTP (8.4 Definition of tariff components and their applicability) envisages explicitly the emphasis on the ToD *Tariff*.

"Two-part tariffs featuring separate fixed and variable charges and Time differentiated tariff shall be introduced on priority for large consumers (say, consumers with demand exceeding 1 MW) within one year. This would also help in flattening the peak and implementing various energy conservation measures"

Chapter 8 Page 212 of 233

## Earlier orders related to ToD Tariff

1. The ToD tariff was introduced for the first time by the Commission vide its ARR/Tariff Order for Discoms dated 11.07.2017 on optional basis. This option was available to the H.T Industry including Furnace, L.T. Industry, H.T. Non-Domestic, Bulk Supply consumers (Excluding Bulk DS), Public Water Works and Lift Irrigation during October to March, the low demand winter period of the year. The ToD tariff approved by the Commission was as under: -

Time of Day (ToD) Tariff

Period	Charge	Time
Off-Peak (October to March)	15 % rebate on the normal energy charges as approved by the Commission.	From 10 P.M to 05.30 A.M
Peak (October to March)	19% premium over the energy charges determined by the Commission	From 06.30 P.M hours to up to 10.00 P.M
Normal demand Hours (October to March)	Normal Tariff	From 05.30 A.M to 06.30 P.M
Demand Charges	As determined by the Commission - shall be the same for all categories of consumers including ToU. PLEC shall continue to be applicable for Open Access Power.	

2. In the ARR/ Tariff Order for Discoms dated 15.11.2018, the Commission decided that the Time of Use/ Time of Day (ToD) tariff introduced by the Commission vide ARR Order dated 11.07.2017 shall continue till further Orders except that the rebate for energy drawl during Off Peak hours shall be @10% (instead of 15% earlier) as per Tariff Order dated 11.07.2017. The ToD tariff was accordingly approved as under:

Time of Use (ToU) Tariff

Timo or obe (100) Tarin				
Period	Charge	Time		
Off-Peak Demand (October to March)	10 % rebate on the normal energy charges as approved by the Commission. *	From 10:00 P.M to 05.30 A.M		
Peak Demand (October to March)	19% premium over the energy charges determined by the Commission	From 06.30 P.M to 10.00 P.M		
Normal Demand (October to March)	Normal Tariff	From 05.30 A.M to 06.30 P.M		
Demand Charges	As determined by the Commission - shall be the same for all categories of consumers including ToU. PLEC shall continue to be applicable for Open Access Power.			

- 3. In the ARR/ Tariff Order dated 07.03.2019 for FY 2019-20 the Commission continued the ToD tariff as approved vide ARR/Tariff Order dated 15.11.2018
- 4. Vide tariff orders dated 01.06.2020, the ToD Tariff revises by the Commission for HT Industry (including Arc Furnace), LT Industry, NDS, Bulk Supply (other than Bulk (DS) is as under: -

Chapter 8 Page 213 of 233

Period	Charge	Time	
Off-Peak Demand	15% rebate on the normal energy	From 9:00 P.M to 05.30	
(November to March)	charges as approved by the Commission.	A.M	
Peak Demand	22% premium over the energy charges	From 5.30 P.M to 9.00 P.M	
(November to March)	determined by the Commission		
Normal Demand	Normal Energy charges	From 05.30 A.M to 5.30	
(November to March)	determined by the Commission	P.M	
	As determined by the Commission - shall be the same for all categories		
Demand Charges	of consumers including ToU. PLEC shall continue to be applicable for		
	Open Access Consumer.		

- 5. It is observed that the cost of power purchase during peak hours is quite high. Time of Day (ToD) tariff is an important Demand Side management (DSM) measure to flatten the load curve and avoid such high cost peaking power purchases. Accordingly, the Commission had introduced Time of Day (ToD) tariff wherein peak hour consumption is charged at higher rates which reflect the higher cost of power purchase during peak hours. At the same time, a rebate is being offered on consumption during off-peak hours. This is also meant to incentivise consumers to shift a portion of their loads from peak time to off-peak time, thereby improving the system load factor and flatten the load curve. The ToD tariff is aimed at optimizing the cost of power purchase, which constitutes over 80% of the tariff charged from the consumers. It also assumes importance in the context of propagating and implementing DSM and achieving energy efficiency.
- 6. Introduction of higher peak hour tariff would initially generate additional revenue which would compensate for the reduction in revenue on account of lower tariff during off-peak hours. In the long run, this would provide signals to the consumers to reduce load during peak hours and, wherever possible, shift this consumption to off-peak hours. Any loss of revenue to the utility on account of shifting of load from peak to off-peak hours in the long run would by and large get compensated by way of reduction of off-peak surplus to the extent of increase in off-peak demand.
- 7. The ToD Tariff would thus have immediate as well as long term benefits for both, consumers as well as the utility and contribute towards controlling the rise in power purchase costs.
- 8. However, the Commission observes that the petitioners, without disclosing any specific cause, have proposed to exclude LT Industry and NDS consumers from the purview of ToD Tariff, already allowed by the Commission vide Order dated 01.06.2020. The Commission, is of the considered view that instead of eliminating consumers from the purview of the ToD tariff, more consumers ought to be brought into this umbrella and the Commission appreciates the proposal to extend the ToD

Chapter 8 Page 214 of 233

- tariff to consumers having load up to 20kW under DS, NDS & LT industry categories and having smart meters.
- 9. The petitioners have proposed to merge the schemes of ToD/ToU Tariff and night time concessional tariff and to launch ToD/ToU Tariff scheme from November, 2021 to March, 2022 for HT categories of consumers i.e. HT industry (including Arc furnace) HT NDS, Bulk Supply (other than Bulk Domestic).
- 10. The Commission approves the merger of ToD and concessional tariff scheme as proposed by the Discoms. The Commission also grants approval to the ToD/ ToU tariff as proposed by the licensee.
- 11. The Commission also approves the proposed concession of Rs. 0.50/kWh for electricity consumed from 21:00 Hrs to 05:30 Hrs during the month of November'21 to March'22 for consumers having load up to 20kW under DS, NDS & LT industry categories from November, 2021 to March, 2022.

The operative part of ToD / ToU Tariff shall be as per the Order of the Commission in the following chapter.

Chapter 8 Page 215 of 233

#### **CHAPTER 9**

#### **DISTRIBUTION & RETAIL SUPPLY TARIFF**

9.1 The Discoms / Distribution Licensees (UHBVNL and DHBVNL) have projected a combined revenue gap of Rs. 3041.32 Crore for the FY 2021-22 after considering A.P. Subsidy of Rs. 6649.93 Crore and Domestic and other subsidy of Rs. 1181.88 Crore. The Discoms have proposed that they may be allowed to continue with the current levels of Tariff and Charges.

The Commission observes that despite projecting a revenue gap at the existing tariff, the Licensees have not proposed any methodology to bridge the said gap vis-à-vis the projected revenue requirement and revenue expected to be available at the current tariff and charges. Further, the Licensees have also not submitted any calculation of the cost of delivered energy to different consumer categories, which is a building block for rationalisation of tariff and charges as well as the tariff design.

Additionally, it is observed that the Commission, vide its Memo No. 5012/HERC/Tariff/SV/2021/337 dated 25.02.2021, sought commitment of the State Government through ACS / Power for payment of subsidy, if any, as per the provisions of Section 65 of the Electricity Act, 2003. The operating part of the said letter is re-produced below: -

"Section 65 of the Electricity Act, 2003 provides that "if the State Government requires the grant of subsidy to any consumer or class of consumers in the tariff determined by the State Commission under section 62, the State Government shall, notwithstanding any direction which may be given under section 108, **pay in advance** and in such manner as may be specified, the amount to compensate the person affected by the grant of subsidy in the manner the State Commission may direct .....".

As per the information provided by the Distribution Licensee(s) It has been observed that visà-vis the subsidy quantified by the Commission for the FY 2020-21 there is a shortfall of Rs. 2498.27 Crore (AP & DS) in release of subsidy by the State Government in the first three quarters. This has led to additional working capital borrowings by the Discoms of Rs. 1250 Crore. Since the HERC Regulations in vogue do not permit additional working capital borrowings and interest cost thereto, such additional expenditure would only add to the financial losses of the Discoms and inhibit the very objective of UDAY implemented in Haryana. Needless to point out that non-release / delayed release of subsidy, as quantified by the Commission, is also in violation of Section 65 of the Electricity Act, 2003.

Chapter 9 Page 216 of 233

The Discoms have reported that they have taken-up the matter for release of un-paid subsidy for the FY 2020-21, however, the matter, so far, has not been resolved.

In view of the above the Commission would request that the un-paid subsidy along with accrued interest @ interest rate on working capital borrowings of the Discoms may be released at the earliest.

Additionally, the Commission is in an advance stage of finalizing the ARR / Tariff Order(s) of the Discoms for the ensuing financial year i.e. FY 2021-22. Hence, the State Government may like to intimate in-principle commitment to provide subsidy on the tariff as determined u/s 62 of the Act to AP Tube-well consumers and DS Consumers (up to 500 Units / month) as per past practice or to any other consumer category for that matter".

However, neither the Discoms nor the State Government has intimated the Commission regarding commitment of the State Govtt. on the issue of subsidy. Nonetheless, the Commission observes that in the FY 2021-22 budget of the State Government a provision of Rs. 5600 Crore has been made towards RE subsidy and Rs. 460 Crore towards subsidy for subsidized tariff to the Domestic Consumers.

Hence, in view of the past practice, the Commission has considered the aforesaid budgetary provisions while reckoning with the tariff for the A.P. Tube-well consumers and DS consumers in addition to already adjusted approved ROE of HPGCL, HVPNL and the Discoms. Additionally, the Commission has also approved subsidised tariff for the Gaushalas as under:

- "The XEN / RA UHBVN, vide Memo No. Ch-67/RA/F-25/Vol (78) dated 02.03.2021 has intimated as under: -
- i. That the State Govtt. has decided to grant subsidised electricity supply to Gaushala in Haryana @ Rs. 2.0 / kWh.
- ii. The subsidy will be provided directly to the Discoms as envisaged u/s 65 of the Electricity Act, 2003.
- iii. Subject to the following conditions:
  - Gaushalas should be registered.
  - Subsidy will be provided on actual consumption based on meter readings.
- iv. It has been submitted that the proposed concessional / subsidized tariff will be revenue neutral as the revenue loss will be compensated by way of subsidy.

Chapter 9 Page 217 of 233

v. Section 65 of the Electricity Act, 2003 provides that "if the State Government requires the grant of subsidy to any consumer or class of consumers in the tariff determined by the State Commission under section 62, the State Government shall, notwithstanding any direction which may be given under section 108, **pay in advance** and in such manner as may be specified, the amount to compensate the person affected by the grant of subsidy in the manner the State Commission may direct .....".

The Commission has considered the proposal including Memo No. 2/15/2018-1 Power dated 23.02.2021 from the Additional Chief Secretary to Govt. Haryana and approves the same subject to payment of subsidy as quantified by the Commission".

In view of the above, the tariff for the eligible Gaushalas shall be Rs. 2.0 / kWh subject to payment of subsidy by the State Government. The Discoms are directed to provide the number of such Gaushalas in their licensed are including their connected load and energy consumption as well as revenue realised in the FY 2020-21 and estimated revenue loss before subsidy.

**9.2** The Commission, after the aforesaid preliminary observations has proceeded to examine the current tariff structure in view of the revenue requirement and revenue available at the current tariff, in order to rationalise the same wherever considered necessary.

#### 9.3 Tariff Approach

The primary objectives of the Electricity Act, 2003 includes that the generation, distribution and supply of electricity are conducted on commercial principles as well as safeguarding of consumers interest and at the same time, recovery of the cost of electricity in a reasonable manner. Hence, the Commission has to strike a fine balance between the Distribution Licensee(s) as well as the electricity consumers so that quality power is delivered at a reasonable cost. The Commission, while rationalising the consumer category wise tariff, has kept in mind the principles of tariff determination as per Sections 61 and Section 62 of the EA, 2003, the Tariff Policy, 2016 including the limits of Cross – Subsidy surcharge and the MYT Regulations in vogue, and also taken into consideration objections filed by the stakeholders including feedback from the electricity consumers special NDS (HT) and HT Industrial Consumers w.r.t harassments faced by them.

Chapter 9 Page 218 of 233

The Commission is conscious of the fact that the Discoms have not proposed any change in the rates or in the tariff design per.se. However, as also upheld by the Hon'bel APTEL that the Commission has the power to design the tariff as per its own wisdom and the Commission need not, before issuing the actual order, publicly announce the tariff it proposed and call for public comments. (Cf. Appeal No. 106 of 2008). Hence, the Commission has simplified the tariff structure as well as introduced new tariff structure for Electricity Vehicle Charging Station, Electric Crematorium / burial grounds as well as Advocate's Chamber in the Court premises and Bulk Supply (Domestic) Tariff. Further, the Commission feels that progressively the tariff / billing ought to be based on kVA / kVAh instead of kW / kWh wherever feasible. The Discoms are directed to examine the feasibility of introducing kVA / kVAh based billing for such consumer category where kW/kWh-based billing exists as per the schedule of tariff approved by the Commission. Additionally, the Commission is of the considered view that the MMC is redundant as well as counterproductive. Hence, MMC ought to be replaced by an appropriate demand charge. It has also been brought to the notice of the Commission that instead of applying the charges determined by the Commission in terms of Rs. / kW or kVA per month the same is being interpreted in terms of 30 days, whereas different months may have different number of days. It is also observed that in the present schedule of tariff there are large number of consumer categories / sub-categories, the Commission intends to reduce the categories and hence the need to identify categories / sub-categories that can be merged without significantly disturbing the revenue balance. The Discoms shall examine the aforesaid issues and submit a report to the Commission within three months of the present Order.

# 9.4 Domestic Supply Tariff (DS)

As per the existing schedule of tariff there are three sub- categories comprising of seven slab rates. The Commission intends to simply the tariff design by merging the slabs without disturbing the average revenue realisation from the DS consumers.

Accordingly, the first category (category I shall remain un-changed comprising mostly of small DS consumers. Category II & III shall be merged and the applicable Energy Charges shall be re-aligned while MMC shall remain un-changed i.e. at the existing levels. Provided that the benefit of telescopic tariff shall be available up to the consumption of 800 Units / month. It is clarified that for consumption of 801 Units and above / month, the entire consumption shall be billed at a flat rate of Rs. 7.10 / Unit.

Chapter 9 Page 219 of 233

**9.5 Non-Domestic Tariff (NDS)** (including independent hoarding / Decorative Lighting / Temporary Supply):

This category of consumers comprises of five sub-categories and hence needs to be rationalised on the basis of connected load up to 50 kW (LT) and above 50 kW (HT). The NDS (HT) supply shall be merged with HT Industry and renamed as HT supply instead of HT Industry (above 50 kW). Further, the NDS up to 50 kW shall be merged with LT Industry and the said category shall be renamed as LT Supply (up to 50 kW) instead of LT Industry – up to 50 kW. The tariff shall be accordingly re-aligned.

**9.6** Agro Industries / FPO (up to 20 kW) **shall be merged with LT supply tariff**, the tariff and charges for this category of consumers shall remain un-changed.

#### 9.7 Railways Traction / DMRC

The electricity supply to the Railways for 'traction has different tariff for voltage levels ranging from 11 kV to 220 kV. It is observed that there is a difference of 10 Paisa / Unit in traction supply vis-à-vis HT Supply up to the voltage level of 66/132 kV and demand charges are lower by Rs. 10 / kVA per months as compared to the HT Supply. Hence, the Commission has considered it appropriate to merge the Railway Traction Supply / DMRC with the HT supply at the relevant voltage level.

#### 9.8 Bulk Supply (Domestic)

It has been observed that the usage of electricity in this category is primarily residential besides other load for common area and other facilities as per the single point supply regulations. Additionally, no subsidy, as extended to the DS consumers is available to this category of consumers. Hence, to give some relief to the Bulk (DS) Consumers, the fixed charges has been reduced from Rs. 100 / kW per month of the recorded demand to Rs. 90/kW/Month.

#### 9.9 Temporary Supply Tariff

It is observed that temporary supply as the nomenclature itself suggest ought not to be correlated to any particular end usage. Hence, it can only be associated with the respective / existing consumer category for which temporary supply is required i.e. DS, NDS or Industrial etc. Given the nature of supply i.e. 'temporary' some difference in tariff / charges are

Chapter 9 Page 220 of 233

essential vis-à-vis 'permanent' supply tariff. Resultantly, the tariff and charges for 'temporary' supply shall be 1.2 times fixed charges and 1.5 time the energy charges of the relevant category for which 'temporary' supply has been sought. While releasing electricity supply on temporary basis the Discoms must mention the period for which temporary supply has been sought and given. In case the said period gets extended for whatever reasons the multiplication factor for both Fixed Charge and Energy Charge shall be 2 times.

#### 9.10 Crematorium / burial grounds

Though no data is available regarding the number of crematories / burial grounds including their load profile and actual consumption. It can be safely presumed that the quantum and revenue realised would be marginal. Further, such usage is does not strictly fall in any category as such. Hence, the Commission decides that the lowest energy charges of the LT Supply or HT Supply, as the case may be, shall be the tariff. No fixed charges shall be levied in such cases.

#### 9.11 Advocate's Chamber (Court premises)

The Commission observes that the Chamber of a litigation lawyer in the court premises are used for livelihood purposes as understood in the common parlance as neither the Electricity Act, 2003 nor the rules framed there under defines what would constitute DS, NDS supply. Hence, for the Advocate's Chamber within the Court Complex shall be charged at the CoS of LT Supply i.e. Rs. 6.90 / kWh as determined in the present Order.

#### 9.12 Time of Day Tariff & Night Time Concessions

As per the supplementary submissions made by UHBVNL & DHBVNL Vide Memo no. Ch-154/SE/RA-682 dated 16.03.2021, the TOD / TOU and concessional tariff in vogue was availed by only a few consumers during the months of November 2020 and December 2020. Hence, in order to absorb surplus power available and also to smoothen the load curve to the extent possible, the Commission has accepted the proposal of the Petitioner for the FY 2021-22 (applicable for both the Discoms) as under: -

i) Concessional Tariff or power drawn during off peak hours i.e. **21:00 to 05:30 hours** in excess of normal consumption during the corresponding month in the preceding year will be optional and will be available only to HT Consumers, including furnaces, who opt for the scheme, during the period **November to March**.

Chapter 9 Page 221 of 233

- ii) The HT Consumer, desirous of availing this tariff as per the terms and conditions proposed by the Discoms, shall submit the application to the Chief Engineer / Commercial of respective Discom.
- iii) The Committee comprising of Chief Engineer/Commercial and SE / Metering & Protection shall clear the applications, as far as possible, within the same day. However, the decision shall in no case be delayed beyond three working days from the date of receipt of the application.
- iv. The Tariff, as given below, which shall be exclusive of FSA, ED and M. Tax, would be applicable for the energy drawn during off peak hours i.e. 21:00 to 05:30 hours over and above normal consumption in the corresponding month of the preceding year. The energy drawn over and above the normal consumption, on which concessional tariff would apply, would be equal to lesser of  $\Delta x$  and  $\Delta y$ , where
  - ∆x= Cumulative change in consumption during night hours (21:00 Hrs to 05:30 Hrs) over the entire billing cycle.
  - Δy= Cumulative change in total consumption during the 00:00 to 24:00 hours over the entire billing cycle.
- v) The base consumption for working out the change in consumption would be decided by the Nigam on case to case basis keeping in view the factors like seasonality, load/CD extension etc.
- vi) The concessional tariff from November 2021 to March 2022 (for time slot of **21:00 to 05:30**) shall be as under:

#### TOD / TOU Tariff

a)	HT Consumers on 11/33 kV	: Rs 4.25/kVAh
b)	HT Consumers on 66 kV and above	: Rs 3.75/kVAh

- vii) Once opting to avail concessional tariff, the consumer would continue to be charged concessional tariff for the entire duration of the Scheme from November to March. The billing under concessional tariff shall commence from start of billing period immediately following the date of acceptance of the application of the consumer.
- viii) Other terms & conditions of this tariff shall remain as per the ongoing approved concessional tariff scheme.

Chapter 9 Page 222 of 233

In view of the fact that TOD/TOU and Night time concessional tariff serves the same purpose, the two shall be merged for HT categories of consumers i.e. HT industry (including Arc furnace) HT NDS, Bulk Supply (other than Bulk Domestic). The approved ToD/ToU Tariff shall be as under:-

Period	Charge	Time		
Off-Peak Demand	For incremental consumption as worked out in para iv.: -	09:00 P.M to 05:30 A.M		
(Nov. to March)	HT Consumers on 11/33 kV- Rs 4.25/kVAh	,		
	HT Consumers on 66 kV & above- Rs 3.75/kVAh			
Peak Demand (Nov. to March)	Normal Energy charges and applicable PLEC charges	5:30 P.M to 09:00 P.M		
Normal Demand	Normal Energy charges	05:30 A.M to 5:30 P.M		
(Nov. to March)	determined by the Commission			
Demand Charges As determined by the Commission - shall be the same for categories of consumers.				

# 9.13 Electric Vehicles Charging Station

The Commission has considered the submissions of the Petitioner(s) regarding the need for promoting faster adoption of Electric Vehicles in Haryana and approves the concessional tariff for Electric Vehicles Charging Station of Rs. 5.55 / kWh or Rs. 5.00 / kVAh. The Fixed Charges shall be Rs. 100 / kW / kVA per month as proposed. Additionally, the energy charges as per TOD / TOU tariff shall also be applicable during the off-peak demand period (November to March) between 9.00 P.M. and 05.30 A.M as applicable to the HT Supply consumers on the total consumption, instead of incremental consumption, during the said time period.

#### 9.14 Net Metering and gross metering

Haryana Discoms have proposed that Net Metering be allowed only for Domestic and Agricultural consumers and to be limited upto 10 KW as per Electricity (Rights of Consumers) Rules 2020. For all remaining consumers, Gross Metering mechanism as mentioned in the Electricity (Rights of Consumers) Rules 2020 be adopted.

The Discoms have also proposed that any kind of generation-based incentive for the consumers opting for Net Billing mechanism be discontinued. As currently in Haryana, an

Chapter 9 Page 223 of 233

incentive of Rs. 1.00/unit is given to the Domestic and Bulk Domestic consumers under net metering mechanism, which has been proposed to be discontinued.

The Commission has considered the submission of the petitioners and is of the considered view that the rules notified by the Central Govtt. are required to be complied with and the relevant provisions of the regulations, already notified by the Commission, that are in conflict with the above rules, are required to be modified accordingly. The Commission has initiated the process of amending the existing Regulations and net metering regulations will come into force after completion of the requisite procedure. The Commission Orders that till such time the net metering regulations are appropriately amended, the existing net metering regulations will be applicable. The Commission has already determined tariff for solar power projects under KUSUM scheme @ Rs. 3.11 / kWh. Till such time feed in tariff is determined by the Commission the same shall be applicable once Net / gross metering Regulations are notified.

The petitioners have also requested that the incentive of Rs. 1.00/unit, given to the Domestic and Bulk Domestic consumers under net metering mechanism, be discontinued. The Commission observes that the incentive was given to encourage the consumers having lower tariffs to actively participate in installing rooftop solar power plants as the net metering regime was not sufficiently attractive for such consumers. The Commission is of the considered view that the cost of setting up Solar Power project is continuously declining and net metering facility is available to small consumers, hence there is no necessity of continuing with the incentive of Rs. 1.0 / Unit to such consumers. Therefore, the Commission decides to discontinue the said incentive.

# 9.15 Revenue neutral tariff for "places of worship"

The Discoms, further, have prayed for reduction in tariff for "places of worship" in the state on revenue neutral basis, in view of the fact that the State Government is not able to provide additional financial support for the same.

The Commission, in view of the important role played by places of worship in providing support to their followers in difficult times like the covid pandemic, and also that the places of worship play a significant role in cultural reformation. The innate vibrations, cultural complexion and spiritual qualities resonate all around the devotee. The Commission is also of the opinion that more than places of worship, they are cultural rendezvous centres for traditional community activities. **Accordingly, the Commission approves, the** 

Chapter 9 Page 224 of 233

relaxations / concession on revenue neutral basis. Henceforth, the applicable tariff shall be a flat rate of Rs. 6.90 / kWh i.e. equivalent to CoS of LT Supply.

# 9.16 Agro – Industries

The Commission, vide Order dated 01.06.2020, after considering the requirement of promoting agro based industries in the MSME sector, introduced a new category of consumers including Pack House, Grading, Packing, Pre-Cooling and Ripening Chamber, Honey Bee, Honey Processing, Tissue culture, Zinga and Fish Farming, Poultry Farm, Pig Farm, Milk Chilling Plant and Cold Storage, Mushroom Farming up to 20 kW load and determined their single part tariff of Rs. 4.75 / kWh. The MMC shall be Rs. 235 / kW in such cases and no Fixed Charge is to be levied.

### 9.17 Revised Tariff - Applicability

The Tariffs and charges determined in the present Order has been tabulated in the Schedule of Tariff and Charges in the present Order. The same shall be applicable w.e.f 1<sup>st</sup> April, 2021.

It is added that in case billing cycle of a consumer is different with respect to the date of applicability of the revised tariffs, they should be made applicable for the consumption on a pro rata basis.

Chapter 9 Page 225 of 233

# ANNEXURE - A SCHEDULE OF TARIFF AND CHARGES

Cr		Tariff for 2020	21 /W E E 01 06 202		F TARIFF AND CHARGES  Tariff for 2021 22 (W.E.E. 01 04 2021)				
Sr. No.	Tariff for 2020-21 (W.E.F. 01.06.2020)				Tariff for 2021-22 (W.E.F. 01.04.2021)				
	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)	
1	Domestic Supp	lv	indicated		Domestic Suppl	  V			
		-	n up to 100 units per n	nonth)	Category I: (Total consumption up to 100 units per month)				
	0 - 50 units per month	200/kWh	Nil	Rs. 115 up to 2 kW and Rs. 70	0 - 50 units per month	200/kWh	Nil	Rs. 115 up to 2 kW and Rs. 70 above 2	
	51-100	250/kWh	Nil	above 2 kW	51-100	250/kWh	Nil	kW	
			on more than 100 units	/month and up		tal consumption	more than 100 units/month and u	p to 800	
	0-150	250/kWh	Nil	Rs 125 upto 2 kW and Rs.75 above 2 kW	units/month)) 0-150	250/kWh	Nil	Rs. 125 up to 2 kW	
	151-250	525kWh	Nil		151-250	525/kWh	Nil	and Rs. 75 above 2	
	251-500	630/kWh	Nil		251-500	630/kWh	Nil	kW	
	501-800	710/kWh	Nil		501-800 and above	710/kWh	Nil		
	Category III:						ff shall be restricted up to 800 Units h shall be applicable for the entire		
	801 Unit and above	710/kWh (Flat rate no telescopic benefit	Nil	Rs 125 upto 2 kW and Rs.75 above 2 kW					
2	Lightning) / Decothers)	corative Lightn	pendent Hoarding / Doing / Temporary Mete	red supply and			endent Hoarding / Decorative Light supply and others)	ning / Decorative	
	Upto 5 kW (LT)	635/kWh	Nil	Rs. 235/kW					
	Above 5 kW and Up to 20 kW	705/kWh	Nil						
	Above 20 kW and upto 50 KW (LT)	660/kVAh	160 / kW	Nil	Merged with LT Supply Tariff				
	Existing consumers above 50 kW upto 70 kW (LT)	695/kVAh	160 / kW	Nil	Merged with HT	Supply Tariff			
	Consumers above 50 kW (HT) New	675/kVAh	160 / kW	Nil	Merged with HT	Supply Tariff			
3	HT Industry (ab	ove 50 kW)			HT Supply (abo	ve 50 kW) inc. Tr	action and DMRC		
	Supply at 11 KV	665/kVAh	170/kVA	Nil	Supply at 11 KV including NDS existing consumers above 50 kW and up to 70 kW (LT)	665 / kVAh 738 / kWh in case of supply continues to be at LT	165/kVA	Nil	
	Supply at 33 KV	655/kVAh	170/kVA	Nil	Supply at 33 KV	655/kVAh	165/ kVA	Nil	
	Supply at 66 kV or higher	645/kVAh	170/kVA	Nil	Supply at 66 kV or higher	645/kVAh	165 / kVA	Nil	
	Supply at 220 kV	635/kVAh	170/kVA	Nil	Supply at 220 kV	635/kVAh	165/ kVA	Nil	
	Supply at 400	625/kVAh	170/kVA	Nil	Supply at 400	625/kVAh	165/ kVA	Nil	

Chapter 9 Page 226 of 233

Sr. No.		Tariff for 2020	0-21 (W.E.F. 01.06.2020	0)	Tariff for 2021-22 (W.E.F. 01.04.2021)				
	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)	
	kV Arc furnaces/ Steel Rolling Mills also applicable to Open Access	695 Paisa per kVAh if supply is at 11 kV (See note 3 below)	170/kVA	Nil	kV Arc furnaces/ Steel Rolling Mills also applicable to Open Access	695 Paisa per kVAh if supply is at 11 kV (See note 1 below	165 / kVA	Nil	
4	LT Industry - up		T	T	LT Supply - up t			_	
	Upto 10 KW	635/kVAh	Nil	Rs. 185/kW	Upto 10 KW	635/kVAh or 705/kWh	Nil	Rs. 185/kW	
	Above 10 KW & upto 20 kW	665/kVAh	Nil	Rs. 185/kW	Above 10 KW & upto 20 kW	665/kVAh or 738/kWh	Nil	Rs. 185/kW	
	Above 20 KW and upto 50 KW	640/kVAh	Rs 160 on 80% of CL	Nil	Above 20 KW and upto 50 KW	640/kVAh	Rs. 160 / kW of 80% of the Connected Load	Nil	
	Existing consumers above 50 kW upto 70 kW (LT)	665/kVAh	Rs 160 on 80% of CL	Nil	Existing consumers above 50 kW upto 70 kW (LT)		Merged with HT Supply		
5					475 / kWh Nil Rs. 235/kW				
6	Agriculture Tube-well Supply				Agriculture Tube-well Supply				
	Metered: (i) with motor upto 15 BHP (ii) with motor above 15 BHP	10/kWh 8/kWh	Nil	Rs. 200 / BHP per year	Metered: (i) with motor upto 15 BHP (ii) with motor above	10/kWh 8 / kWh	Nil Nil	Rs. 200/BHP/Year	
	Un-metered (Rs. / Per BHP / Month): (i) with motor upto 15 BHP	Nil	Rs. 15 / Per BHP / Month	Nil	15 BHP  Un-metered (Rs. / Per BHP / Month): (i) with motor upto 15 BHP	Nil	Rs. 15 / BHP / Month	Nil	
	(ii) with motor above 15 BHP	Nil	Rs. 12 / Per BHP / Month	Nil	(ii) with motor above 15 BHP	Nil	Rs. 12 / BHP / Month	Nil	
7	Public Water Works / Lift Irrigation / MITC / Street Light	735/kWh	180/kW or BHP except street Light	Nil	Public Water Works / Lift Irrigation / MITC / Street Light	735 / kWh	Rs. 180 / kW or BHP except Street Light	MMC of Rs. 165/kW/Month only for Street Light	
8	Railway Traction			Railway Tractio		T-0 1 T-155 11			
	Supply at 11 KV Supply at 33	655/kVAh 645/kVAh	160/kVA 160/kVA	Nil Nil	Supply at 11 KV Supply at 33	Merged with H	IT Supply Tariff at the respective vol	Itage of supply	
	KV Supply at 66	635/kVAh	160/kVA	Nil	KV Supply at 66	-			
	or 132 kV Supply at 220	625/kVAh	160/kVA	Nil	or 132 kV Supply at 220	_			
	kV				kV	_			
9	DMRC	625 /11	450 // 20	A.01	DMRC	-			
	Supply at 66 kV or 132 kV	625/kVAh	160/kVA	Nil	Supply at 66 kV or 132 kV	Merged with H	IT Supply Tariff		

Chapter 9 Page 227 of 233

Sr. No.		Tariff for 2020	0-21 (W.E.F. 01.06.2020	0)	Tariff for 2021-22 (W.E.F. 01.04.2021)			
	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)	Category of consumers	Energy Charges (Paisa / kWh or/ kVAh)	Fixed Charge (Rs. per kW per month of the connected load / per kVA of sanctioned contract demand (in case supply is on HT) or as indicated	MMC (Rs. per kW per month of the connected load or part thereof)
	Supply at LT	650/kVAh	160/kW or Rs.	Nil	Supply at LT	650/kVAh	160/kW or Rs. 160/kVA as	Nil
	Supply at 11 kV	640/kVAh	160/kVA as applicable (see	Nil	Supply at 11 kV	640/kVAh	applicable (see note 3)	Nil
	Supply at 33 kV	630/kVAh	note 5)	Nil	Supply at 33 kV	630/kVAh		Nil
	Supply at 66 or 132 kV	620/kVAh		Nil	Supply at 66 or 132 kV	620/kVAh		Nil
	Supply at 220 kV	615/kVAh		Nil	Supply at 220 kV	615/kVAh		Nil
11	Bulk Supply (Domestic)				Bulk Supply (Domestic)			
	For total consumption in a month not exceeding 800 units/ flat/dwelling unit (DU).	525 /kWh	Rs. 100 /kW of the recorded demand	Nil	For total consumption in a month not exceeding 800 units/ flat/dwelling unit (DU).	525/kWh	Rs. 90 / kW / month of the recorded demand	Nil
	For total consumption in a month exceeding 800 units/flat/ DU.	620 /kWh	Rs. 100 /kW of the recorded demand	Nil	For total consumption in a month exceeding 800	620/kWh		
					units/flat/ DU.			

#### Notes:

- 1. In case of Arc furnaces/ Steel Rolling Mills for supply at 33 kV and above, the HT Industrial tariff at the corresponding voltage level shall be applicable.
- 2. Fixed charges for HT supply and Bulk Supply category are in Rs./kVA of Contract Demand. For Railways and DMRC, the fixed charges shall be Rs./kVA of the billable demand.
- 3. In case of Bulk Supply Consumers (other than Bulk Supply DS), the fixed charges are in Rs./kW of the connected load where contract demand is not sanctioned and in Rs./kVA of contract demand where contract demand is sanctioned.
- 4. Under Bulk Supply (Domestic) category no benefit of lower slab shall be admissible in the higher consumption slabs. Total consumption shall be charged at a single tariff depending upon the average consumption/flat/residential unit for that month.
- 5. The surcharge of 45 paise/ per unit for arc furnace/ steel rolling mills shall also be applicable on Open Access power as well.
- 6. The schedule of tariff and charges does not include Electricity Duty, Municipal Tax (being levied as per the notifications issued by the State Government) and FSA as per MYT Regulations in vogue.

Chapter 9 Page 228 of 233

#### **CHAPTER 10**

#### **DIRECTIVES**

### 1. Expenditure due to other debits- FY 2019-20

UHBVNL: Compensation for injury, death and damage is allowed in order to enable the licensee to pay these amounts promptly. However, the petitioner is directed to provide details of penalty included in Rs. 4.34 crores (Compensation for injury, death and damage and penalty) so that appropriate decision in this regard can be taken.

#### 2. AP Sales Third Party Authentication

DHBVNL: The Commission again directs DHBVN to analyse the aberration pointed out in AP consumption data and submit the report to Commission within one month of this order. Also, a report of third party engaged for analysing and authenticating its AP sales of FY 2017-18, FY 2018-19 and FY 2019-20 as directed in previous Tariff Orders need to be submitted within 3 months from the date of this order and to examine the AP sales data meticulously for FY 2020-21.

#### 3. Power Procurement Plan

- i. The Commission directs that the Discoms shall not procure any additional power over and above the quantum approved in the PPA that may be available to it from the un-allocated share / share relinquished by any other State in the Central Generating Power Stations in case it does not fall in the merit order despatch. The Commission thereto shall disallow all such power procurements and the cost thereto. Additionally, while resorting to bidding or calling for expression of interest for power procurement the Discoms must ensure that the power under PPAs already approved by the Commission materialises.
- ii. The DISCOMs are directed to perform cost benefit analysis including trade-off between purchase of REC and RE Power before rushing with proposal to procure RE Power.

#### 4. Employee Expenses for FY 2021-22:

The Commission directs the licensees to ensure that the amount approved to be recovered in the ARR must be paid out in the same year itself and before the close of the Financial Year. A compliance report to this effect must be filed with the ARR petition each year. The petitioners are also directed to calculate and submit the projected per employee cost in future so as to ensure that each component of cost receives due attention.

Chapter 10 Page 229 of 233

#### 5. Proposal to submit an appropriate efficiency factor to calculate O&M expenses:

The Commission is of the considered view that it would be appropriate to introduce efficiency factor for determining the O&M expenses for the balance period of the control period, as sufficient time has elapsed since the MYT regime was introduced in the State. The Commission accordingly directs the petitioner to propose an appropriate efficiency factor after studying similar provisions in other states and submit the same along with the next ARR.

#### 6. Return on Equity

The Commission further directs that the RoE shall be adjusted against the subsidy to be provided by the State Government.

# 7. Reduction of equity on account of decapitalization or retirement or replacement of assets:

In view of the above provisions, the Commission directs the licensee to provide appropriate information in order to enable the Commission to adjust the equity component, if required, along with the next true up petition.

# 8. Supply of power at subsidized tariff strictly in accordance with section 65 of the electricity act, 2003

The petitioners are directed to ensure that supply of power to all categories of consumers, where the State Government has committed a subsidized tariff, is strictly in accordance with section 65 of the electricity act, 2003. This would include the AP supply, certain categories of Domestic and Industrial supply, and power supplied to Gaushalas. Any violation of section 65 of the EA, 2003, may be brought to the notice of the Commission in addition to action mandated under the Act.

# 9. Capex

- i. The licensee is directed to adhere to the Regulations.
- ii. The Licensee is directed to revised its Capital expenditure plan 2021-22 accordingly and submit the scheme wise details of the proposed expenditure to the Commission within one month of the Order.
- iii. Both the licensees are further directed that they shall regulate their capital expenditure plans for FY 2021-22 as per Regulations 9.7 to 9.12 of the Haryana Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff

Chapter 10 Page 230 of 233

for Generation, Transmission, Wheeling and Distribution & Retail Supply under Multi Year Tariff Framework) Regulations, 2019.

### 10. Aggregate Technical & Commercial Loss of Feeders

The Commission again directs the DISCOMs to reduce AT&C losses of all urban feeders below 25% and that of Rural feeders below 50% in FY 2021-22. DISCOMs shall submit details of feeders as per above suggestions of SAC along with detailed action plan to achieve the target within two months of issuance of orders. Any slippage on account of the target shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder.

#### 11. DT Damage Rate

- i. The Commission again directs the licensees to bring down the distribution transformer damage rate below the prescribed limits in FY 2020-21 and FY 2021-22. Any slippage on account of the timeline shall lead to penalty as deemed fit and appropriate by the Commission as per various provisions of the Act and Regulations framed thereunder. Further Commission directs the licensee to provide the action plan to reduce DT damage during FY 2020-21 and FY 2021-22.
- ii. As per MYT Regulations the distribution licensee shall maintain a proper record of failure of the distribution transformers and submit the same in the quarterly report to the Commission. The DISCOMs are again directed to ensure that quarterly reports are submitted regularly without fail and to host the circle wise information on its website regularly.

#### 12. Non-replacement of defective energy meters by the Distribution Licensees

DISCOMs are once again directed to clear the backlog of defective metering and to ensure the compliance of relevant provision of HERC, (Standards of Performance of Distribution Licensees and Determination of Compensation) Regulations,2020 wherein the Distribution Licensee shall ensure that at no point of time the percentage of defective meters to the total number of meters in service exceeds 2% Limit.

#### 13. Non-replacement of Electro-mechanical Meters

The Commission directs DISCOMs to submit justification for increase in no. of electromechanical meters shown in March, 2020 within three months of issue of this order and to replace all the electromechanical meters at least in urban area before filing of next Tariff Petition.

Chapter 10 Page 231 of 233

#### 14. Implementation of Smart metering Projects in Haryana

DISCOMs are directed to submit year-wise detailed plan to replace conventional energy meters by prepaid smart meters within three months of issuance of the Order.

### 15. Pending electricity connection/load

DISCOMs are directed to make all stern efforts to release all the pending applications/loads within the time frame as specified in various law/regulations in-voque.

#### 16. Renewable Purchase Obligation

The State Nodal Agency i.e. HAREDA shall continue submitting quarterly status of RPO met by the obligated entities for the last quarter, separately for overall RPO and solar RPO, in accordance with the provisions of regulations 56 (3) of the Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 in the prescribed format.

The Discoms and other obligated entities are directed to provide requisite information to the State Agency- HAREDA on monthly basis by 10th of every month for the previous month to enable the State Agency to submit quarterly report to the Commission.

# 17. Conduct a study to justify peak load charges

The Commission is of the considered view that the peak load charges were introduced almost a decade ago, the Discoms must now justify its continuation with fresh data. There has been tremendous growth in the distribution system and it would be in the fitness of things to verify whether the CAPEX in the last 10 years has met its target or not. It may be that the supply constraints may now be restricted to a few areas only. Accordingly, the Discoms are directed to conduct a study of the area wise load constraints being faced by them which would help in restricting the peak load charges to appropriate areas of operation only. This would also help in additional revenue generation in case there are no load constraints as more energy could be supplied, thereby leading to improved consumer satisfaction and also higher energy security.

#### 18. Sales Circulars

All sales circulars/commercial circulars shall be issued by both the Distribution Licensees uniformly and in consonance with each other and shall necessarily be in line with the relevant Regulations / Orders of the Commission. Further, any sales circular having financial

Chapter 10 Page 232 of 233

impact on the electricity consumers shall be issued with prior approval of the Commission unless the same is inline with the relevant Regulations / Orders.

19. A serious issue was flagged by various HT/LT industrial consumers/Gurugram Industrial Association that various notices have been issued by the Discoms to deposit huge amounts on account of fractional use of power for NDS activity in HT industrial premises. In a nutshell, the grievance is summed up that the connection has been released in the industrial estate for HT industry consumers, however, some of the consumers have also established either offices or packaging unit ancillaries to their production houses. These ancillary activities carried out in the industrial estate having HT Industrial connection are being treated as unauthorised use of power because there is different category for HT NDS. The Commission has deliberated upon the issue and in furtherance of the policy of the Government for ease of doing business and no litigation policy, it has been decided to merge HT industry category and HT NDS category into one category i.e. HT supply as well as LT industry category and LT NDS category into one category i.e. LT supply. The Commission is of the view that two categories having been merged, the mandate given to the Commission for reducing the number of categories is also served. Since, during these testing times Covid-19 pandemic where the industrial consumers are fighting as Corona Warriors to revive the economy, such small steps would go a long way in strengthening the backbone of the industry and revival of the economy. Having said that it has been observed that there are large number of such cases across Haryana, the Commission has decided that as a one-time measure, this issue be settled by charging difference in the applicable tariff without levy of penalty on the date of issuance of notice. The Discoms are directed that list of all such cases, in which notices have been issued, for recovery of amount on this account, be prepared and report regarding settlement of the same be sent within 2 months of this order.

All the directives contained in the various chapters of the present Order shall be complied with by the Discoms within the time line specified for the purpose.

This Order is signed dated and issued by the Haryana Electricity Regulatory Commission on 30<sup>th</sup> March, 2021.

Date: 30.03.2021 Naresh Sardana Pravindra Singh Chauhan Place: Panchkula Member Member

Chapter 10 Page 233 of 233