Order on Retail Tariff

for

Uttarakhand Power Corporation Ltd.

for

2010-11

April 10, 2010

UTTARAKHAND ELECTRICITY REGULATORY COMMISSION

1st Floor of Institution of Engineers (I) Building,

Near ISBT, Majra, Dehradun - 248002

Table of Contents

List of Tables

Before

UTTARAKHAND ELECTRICITY REGULATORY COMMISSION

Petition No.: 14/2009

In the Matter of:

ARR and Tariff Petition filed by Uttarakhand Power Corporation Limited for determination of Aggregate Revenue Requirement (ARR) and retail tariffs for the Financial Year 2010-11.

AND

In the Matter of:

Uttarakhand Power Corporation Limited ……… Petitioner
Urja Bhawan, Kanwali Road, Dehradun

Coram

Sh. V.J. Talwar	**Chairman**
Sh. Anand Kumar	**Member**

Date of Order: April 10, 2010

Section 64(1) read with section 61 and 62 of the Electricity Act, 2003 (hereinafter referred to as "Act") requires the generating companies and the licensees to file an application for determination of tariff before the Appropriate Commission in such manner and along with such fee as may be specified by the Appropriate Commission through Regulations. In compliance with above provisions of the Act and Regulation 56(4) of UERC (Conduct of Business) Regulations, 2004, Uttarakhand Power Corporation Limited (hereinafter referred to as "UPCL" or "Petitioner" or "licensee") filed a Petition No. 14/2009, giving details of its projected Annual Revenue Requirement (ARR) for the FY 2010-11, on 30th November 2009. Along with above Petition, UPCL also submitted revised retail tariff proposals for different category of consumers so as to meet its projected ARR for the FY 2010-11.

Tariff determination being the most vital function of the Commission, it has been the practice of the Commission to detail the procedure and explain the principles utilized by it in determining the ARR and tariffs. Accordingly, in the present Order also, in line with past practices, the Commission has tried to detail the procedure and principles followed by it in determining the ARR requirement of the licensee. For the sake of convenience and clarity, this Order has further been divided into following Chapters:

Chapter 1 - Procedural History

Chapter 2 - Petitioner's Submissions

Chapter 3 - Stakeholders' Comments and Petitioner's Response

Chapter 4 - Commission's Approach

Chapter 5 - Analysis of Petitioner's Metering, Billing and Collection System

Chapter 6 – Implementation of Hon'ble ATE's judgment dated 06.10.2009 in Appeal No. 85 of 2008

Chapter 7 - Analysis of Aggregate Revenue Requirement

Chapter 8 -Tariff Rationalisation and Design

Chapter 9 - Commission's Directives

1. Procedural History

In accordance with Regulation 56(4) of the UERC (Conduct of Business) Regulations, 2004, the Commission had directed UPCL to submit the Petition for determination of tariff for FY 2010-11 latest by November 30, 2009. The Petitioner filed its Aggregate Revenue Requirement and Tariff application for FY 2010-11 on November 30, 2009, which was provisionally admitted by the Commission. To provide transparency to the process of tariff determination and give all the stakeholders an opportunity to submit their objections/suggestions/comments on the proposals of the licensee, the Commission, through its admittance order, directed UPCL to publish the salient points of its proposals in the leading newspapers. The salient points of the proposal were published by UPCL in the following newspapers:

Table 1.1: Publication of Notice

S.No.	Newspaper Name	Date of publication
1.	Amar Ujala	December 11, 2009
2.	Hindustan Times	December 12, 2009

Through above notice, stakeholders were requested to submit their comments latest by December 31, 2009 (copy of the notice is enclosed at **Annexure 3**).

The Commission sent the copies of salient points of tariff proposals to members of the State Advisory Committee and also made available the details of proposal submitted by the licensee in Commission's office and website.

The Commission received 38 objections/suggestions/comments in writing on the Petitioner's ARR and Tariff Petition for FY 2010-11. The list of stakeholders who have submitted their objections/suggestions/comments is enclosed at **Annexure-4**.

For direct interaction with all stakeholders and public at large so as to give them an opportunity of being heard, the Commission conducted common public hearings on the proposals filed by UJVNL, PTCUL and UPCL at the following places in the State of Uttarakhand:

Table 1.2: Schedule of Hearings

S.No.	Place	Date
1.	Uttarkashi	11.01.2010
2.	Sitarganj	22.01.2010
3.	Pithoragarh	23.01.2010
4.	Dehradun	14.02.2010

The list of participants who attended the Public Hearing is enclosed at **Annexure-5.**

The objections/suggestions/comments, as received from the stakeholders through mail as well as during the course of public hearing were sent to the Petitioner for its response. All the issues as raised by the stakeholders and Petitioner's response on the same are detailed in Chapter 3 of this Order. In this context it is also to underline that while finalizing the Tariff Order, the Commission has, as far as possible, tried to address the issues as raised by the stakeholders.

Meanwhile, after admittance of the ARR/Tariff Petition, based on preliminary scrutiny of the ARR and tariff proposals submitted by the licensee, the Commission vide its letter No. 1775/UERC/UPCL- ARR/2010-11/09 dated December 31, 2009, pointing out certain data gaps in the Petition, sought following additional information/clarification from the Petitioner:

- Clarification regarding estimation of additional sales on account of rural electrification during FY 2010-11.
- Assumptions for increase in number of consumers considered for various consumer categories during FY 2010-11.
- Clarification on data inconsistency in ARR figures for FY 2010-11.
- Basis of projecting sales for Public Water Works for FY 2010-11.
- Monthly CS-3 and CS-4 statements for the period from April 2009 to November 2009
- Details of actual refunds made to steel industries and railway traction category during FY 2007-08 and FY 2008-09 in accordance with the Order of the Hon'ble Appellate Tribunal for Electricity.
- Details of the actual distribution losses during first eight months of FY 2009-10, i.e. for the period from April 2009 to November 2009.
- Monthly Trial Balances (MTB) for FY 2009-10 for the period from April 2009 to November 2009.
- Details of actual employee related expenses for the first eight months of FY 2009-10, i.e., for the period from April 2009 to November 2009.
- Actual R&M and A&G expenses for the first eight months of FY 2009-10, i.e. for the period from April 2009 to November 2009 and estimates for remaining period of FY 2009-10 and FY 2010-11.
- Details of arrears assessed on implementation of Sixth Pay Commission's report and payment made during FY 2009-10 on this account, which has been considered as part of Employee expenses for FY 2009-10 and FY 2010-11.

- Scheme-wise (project-wise) details of the schemes capitalized, segregating LT and HT works respectively, including complete details such as Original Capital Cost, Completed Project Cost, Means of Finance, loan agreements, status of electrical inspector approval, date of energisation and date of actual capitalisation for different schemes during FY 2007-08, FY 2008-09, FY 2009-10 and FY 2010-11.
- Details of capital expenditure proposed during FY 2010-11, across different schemes, viz.,
  - number of 33/11 kV sub-station proposed to be added under various schemes –list of sub-stations with names
  - length of 33 kV lines proposed to be added under various schemes
  - length of 11 kV lines proposed to be added under various schemes
  - length of LT lines proposed to be added under various schemes
  - No. of meters proposed to be added under various schemes
- Year-wise details of amount realised from consumers for releasing new LT connections and the expenditure incurred by the Petitioner in this regard for FY 2007-08, FY 2008-09 and FY 2009-10.
- Updated audited details of opening balances, receipts, payments, interest accrued, interest paid and closing balances of various loans received under different schemes with effect from April 01, 2007 to March 31, 2009.
- Details of new generating stations expected to be commissioned in FY 2009-10 in which UPCL has allocation for firm power.
- Actual power purchase quantum and cost for the period from April 2009 to December 2009.
- Generation plan for generating stations of UJVNL for FY 2010-11.
- Details of banking and UI over/under drawals during FY 2009-10 for the period from April 2009 to November 2009.
- Report on compliance of the Commission's directions

In reply, the Petitioner submitted some information vide letter No. 1770/UPCL/RM/B-7 dated January 7, 2010, and letter No 1830/UPCL/RM/B-7 dated January 19, 2010. So as to have better clarity on data filed by the licensee and to remove inconsistency in data, a Technical Validation Session (TVS) was also held with the Petitioner on January 20, 2010, during which the issues raised in the letter dated December 31, 2009 were discussed. Based on these discussions, the Commission, vide its letter No. 1929/UERC/UPCL ARR (2010-11)/09-10 dated January 22, 2010 sought further information from the licensee. Some of the information as sought by the Commission was submitted by the licensee vide letter No. 1889/UPCL/RM/B-7 dated January 30, 2010.

2. Petitioner's Submissions

This Chapter gives a brief summary of the UPCL's ARR & Tariff Petition for the FY 2010-11. The contents of this Chapter are based on original submissions of the Petitioner and do not incorporate changes in information and data submitted subsequently by the Petitioner. Additional submissions made by UPCL have been considered by the Commission only under Chapter 7 i.e. "Analysis of Aggregate Revenue Requirement".

2.1 Abstract of Aggregate Revenue Requirement (ARR) of UPCL

For the Financial Year 2010-11, UPCL has projected a net ARR requirement of Rs. 2737.78 Crore. Various component of ARR are as detailed below:

Table 2.1: Aggregate Revenue Requirement for FY 2010-11 (Rs. Crore)

S.No.	Item	Projected Expenditure
	Expenditure	
1	Power Purchase Expenses	2,071.95
2	Transmission Charges	199.87
3	O&M expenses	289.25
4	Interest charges	83.99
5	Depreciation	40.62
6	Interest on Working Capital	19.64
	Gross Expenditure	**2,705.32**
	Other Expenses / Appropriations	
7	Provision for Bad & Doubtful Debts	68.28
8	Return on Equity	2.94
	Net Expenditure	**2,776.55**
9	Less: Non Tariff Income	38.77
	Net Annual Revenue Requirement	**2,737.78**

2.2 Revenue Gap and Revised Tariff Proposals

It is the contention of UPCL that at existing tariffs for different category of consumers, it would be able to recover revenues of Rs. 2300.04 Crore only in the FY 2010-11, which would lead to a revenue gap of Rs. 437.74 Crore in the FY 2010-11. To bridge the above revenue gap, UPCL has submitted revised tariff proposals for different category of consumers which are summarised below:

Table 2.2: Existing and Proposed Tariff

S.No.	Category of Consumer	Existing Tariffs	Proposed Tariffs
1.	Domestic Un-metered Metered	Rs. 200/connection/ month FC Rs. 20/month upto 4 kW Rs. 40/month above 4 kW EC- Rs. 2.20/kWh	Rs. 200/kW/month FC- Rs. 24/kW/month EC- Rs. 2.64/kWh
2.	Non-Domestic Govt./Municipal Hospitals, Educational Institution etc. Other Non-domestic	 FC- Rs. 20/kW/month EC upto 25 kW – Rs. 3.10/kWh/ month EC – above 25 kW- Rs. 3.5/kVAh FC- Rs. 20/kW/month EC upto 25 kW – Rs. 3.50/kWh EC above 25 kW – Rs. 3.50/kVAh	 FC -Rs. 24/kW/month EC- Rs. 3.84/kWh/month EC-Rs. 3.48/kVAh/month FC- Rs. 24/kW/month EC-Rs. 4.68/kWh/month EC- Rs. 4.68/kVAh/month
3.	Public Lamps	FC- Rs. 15/kW/month EC-Rs. 3.20/kWh/month	FC-Rs. 18/kW/month EC-Rs. 3.84/kWh/month
4.	PTW Un-metered Metered	 FC- Rs. 130/BHP/month EC-Rs. 0.80/kWh	 FC-Rs. 156/BHP/month ECRs. 0.96/kWh
5.	GIS	FC-Rs. 15/kW/month EC-upto 100 BHP – Rs. 3.2/kWh EC-above 100 BHP- Rs. 3.00/kVAh	FC-Rs. 18/kW EC-Rs. 3.84/kWh EC- Rs. 3.48/kVAh
6.	Public Water Works	FC-Rs. 15/kW/month EC-Rs. 2.90/kVAh	FC- Rs. 18/kW/month EC-Rs. 3.48/kVAh/month
7A	LT Industry Upto 25 kW Above 25 kW	DC- Rs. 80/kW/month EC-Rs. 3.15/kWh EC-Rs. 2.85/kVAh	DC-Rs. 96/kW/month EC-Rs. 3.78/kWh EC-Rs. 3.42/kVAh
7B	HT Industry **A-upto 1000 kVA** Load factor upto 33% Load factor above 33% & upto 50% Load factor above 50% **B-Above 1000 KVA** Load factor upto 33% Load factor above 33% & upto 50% Load factor above 50%	 DC-Rs. 160/kVA/month EC-Rs. 2.50/kVAh EC-Rs. 2.75/kVAh EC-Rs. 3.00/kVAh DC-Rs. 20/kVA/month EC-Rs. 2.50/kVAh EC-Rs. 2.75/kVAh EC-Rs. 3.00/kVAh	 DC-Rs. 192/kVA/month EC-Rs. 3/kVAh EC-Rs. 3.30/kVAh EC-Rs. 3.60/kVAh DC-Rs. 264/kVA/month EC-Rs. 3/kVAh EC-Rs. 3.30/kVAh EC-Rs. 3.60/kVAh
8	Mixed Load	FC-Rs. 20/kW/month EC-Rs. 3/kVAh	FC-Rs. 24/kW/month EC-Rs. 3.60/kWh
9	Railway Traction	DC-Rs. 160/kVA/month EC-Rs. 3/kVAh	DC-Rs. 192/kVA EC-Rs. 3.60/kVAh

Legend : FC – Fixed Charges, DC- Demand Charges, EC- Energy Charges

The Petitioner has further submitted that it has formulated the tariff proposal with an endeavour to keep the impact on the consumers to the minimum possible and at the same time not deferring a large portion of recovery on the tariff in the coming years. The Petitioner has mentioned that section 61(g) of the Electricity Act, 2003 stipulates that the appropriate Commission should be guided by the objective that the tariff progressively reflects the efficient and prudent cost of supply of electricity.

The key changes proposed by the Petitioner in retail tariff structure for FY 2010-11 are as follows:

- In Domestic (Rural) un-metered category, no increase is proposed in the Fixed charges. However, it is proposed to levy these charges on the basis of Rs/kW/Month instead of Rs./Connection/Month.
- In Domestic category where the supply is metered, the rate of fixed charge is proposed to be levied on the basis of Rs./kW/month instead of Rs./connection/month.

The Petitioner has estimated the average tariff to be Rs. 3.54 per unit at the existing tariff and Rs. 4.21 per unit at the proposed tariffs in FY 2010-11. The Table below captures the revenue from existing tariffs and proposed tariffs for various consumer categories alongwith percentage increase in average tariff sought for each category.

Table 2.3: Category-wise revenue at existing and proposed tariff

S.No.	Sub-category/ Category	Existing Tariff			Proposed Tariff		% age increase in Average Tariff
		Sales (MU)	Revenues (Rs. Crore)	Avg. Tariff (Rs./ unit)	Revenues (Rs. Crore)	Avg. Tariff (Rs./ unit)	
1	RTS-1: Domestic	1,272.13	301.89	2.37	363.94	2.86	20.68%
2	RTS-2: Non Domestic	735.94	311.05	4.23	367.62	5.00	18.20%
3	RTS-3: Public Lamps	48.50	15.90	3.28	18.91	3.90	18.90%
4	RTS-4: Private Tube Wells	161.02	10.94	0.68	12.81	0.80	17.65%
5	RTS-5: Govt. Irrigation System	118.41	38.74	3.27	46.18	3.90	19.27%
6	RTS-6: Public Water Works	228.92	74.52	3.26	85.03	3.71	13.80%
7	RTS-7: Industry						
	LT Industry	209.49	82.93	3.96	101.63	4.85	22.47%
	HT Industry	3,600.97	1,424.43	3.96	1,693.17	4.70	18.69%
8	RTS-8: Mixed Load	109.61	33.41	3.05	40.86	3.73	22.30%
9	RTS-9: Railway Traction	15.26	6.23	4.08	7.63	5.00	22.55%
	Total	**6,500.25**	**2,300.04**	**3.54**	**2,737.78**	**4.21**	**18.93%**

2.3 Action Plan for FY 2010-11

It has been submitted by UPCL that it realises the importance of improving efficiency in its operations and is committed to undertake a number of technical and commercial measures in this direction in FY 2010-11 as under:

2.3.1 *Distribution System Improvement*

To improve its distribution system licensee has proposed to take following actions:

a) Construction of Ring Mains in towns to improve reliability in supply,

b) Conversion of single phase lines to three phase lines,

c) Implementation of High Voltage Distribution System (HVDS), and

d) Distribution automation for all 33 kV and 11 kV feeders through a Distribution SCADA System.

Further, the Petitioner has also envisaged data logging, which is aimed at compilation of all technical data in respect of the Distribution System connected to a 33/11 kV sub-station, including the number and durations of tripping, meter readings of all distribution transformers and feeders connected to the sub-stations.

2.3.2 *Loss Reduction Initiatives*

For reduction of losses, the Petitioner submitted that it shall try to ensure complete metering of consumers by:

a) Replacing defective meters,

b) Ensuring total metering of all 11 kV and 33 kV feeders including installation of check meters on all independent/group industrial feeders to facilitate energy accounting,

c) Metering of all distribution transformers (DTs) in towns and loss-prone areas,

d) Consumer indexing and tagging of feeders and DTs to facilitate Energy Audit at feeder and DT level,

e) Implementing Centralized Billing System for high value HT/LT consumers including Automatic Meter-reading of Time of Day (TOD) meters through GSM/GPRS to ensure zero commercial losses in high value consumers,

f) Installing prepaid meters on all Government connections,

g) Installing Any Time Payment (ATP) machines in cities,

h) Replacement of bare LT conductors with aerial bunched conductors,

i) Periodic checking of meters installed at high value consumer's premises through accuchecks, and

j) Providing end-to-end solution (ERP System) with appropriate IT intervention for integrating all key functions of the Corporation, i.e., Commercial, Technical, Finance, HR, Projects, etc., will also be the key areas under such loss reduction efforts.

2.3.3 *Rural Electrification*

Licensee has submitted that it plans to electrify the balance 58 un-electrified / de-electrified villages and 1620 hamlets by March 31, 2010.

2.3.4 *Revenue Collection based Franchisee*

To improve its revenue collections from rural areas the Petitioner plans to bring in revenue collection based franchisee.

2.3.5 *LT System Strengthening*

The Petitioner has initiated a programme with total outlay of Rs. 150.00 Crore for LT System Strengthening and Improvement works for the 11th Plan. During FY 2010-11, the Petitioner has envisaged an outlay of Rs. 50.00 Crore for LT System Strengthening with installation of Ring Main Units (RMU) and Compact Sub-Stations (CSS) located near load centres.

2.3.6 *Segregation of PTW Feeders*

For the segregation of Private Tube-Well (PTW) feeders, the Petitioner has submitted that it would start a project with an investment of approximately Rs. 140.00 Crore, which will be implemented during the 11th Plan. Under this scheme, the Petitioner has envisaged construction of 2727 km of 11 kV line with conversion of existing 2430 km of LT line into HT line. Licensee would also install 2831 Nos. 11/0.4 kV Distribution Transformers of 25 kVA and 95 Nos. Vacuum Circuit Breakers under the scheme. During FY 2010-11, the Petitioner has envisaged an expenditure of Rs. 60.00 Crore for segregation of PTW feeders in Haridwar and U.S. Nagar Districts.

2.3.7 *District Plan*

During FY 2009-10, the Petitioner has proposed an investment of Rs. 21.06 Crore under the District Plan for augmentation and increasing capacity of Distribution Transformers, installation of additional transformers and LT line strengthening and system improvement. The Petitioner has submitted that this system would continue in FY 2010-11 wherein Petitioner has envisaged an outlay of Rs. 35.00 Crore.

2.3.8 *Earthing of Transformers*

It has been submitted by the Petitioner that it shall be completing 100% earthing of 8522 nos. 11/0.4 kV transformers of below 100 kVA rating in the districts of Dehradun, Haridwar and U.S. Nagar and 5446 nos. transformers of above 100 kVA rating in all the 13 districts of Uttarakhand. Petitioner has envisaged a total outlay of Rs. 50 Crore for the purpose.

2.3.9 *CDM Project*

It has been submitted by the Petitioner that a project is being developed by the Ministry of Power, Government of India called Bachat Lamp Yojna (BLY) under which, in selected areas of State, existing incandescent bulbs would be replaced by long life energy efficient compact fluorescent lamps. It shall contribute to energy efficiency and reducing energy shortages during peak hours.

It has further been submitted by the Petitioner that cost of the above project would be borne completely by the developer of the project and there would be no financial implication on the Petitioner and the consumers.

2.3.10 *Commercial Process Improvement*

It has been submitted that the Petitioner has been implementing certain immediate commercial improvement measures in all its revenue division(s)/sub-division(s) such as -

a) MRI based Centralised Billing System for High Value Consumers (>25 kW),

b) Automatic Meter Reading system for all consumers above 4 kW,

c) Energy auditing through independent energy assessors,

d) Installing Any Time Payment Machines in major urban centres,

e) Establishment of Online Billing and Customer Relationship Management (CRM) System,

f) Establishing Key Consumer Cells,

g) Outsourcing of meter reading, bill distribution and bill collection and disconnection activities,

h) Collection through Post Offices. At present, this facility is available at 817 post offices of Uttarakhand for catering to approximately 8 lakh electricity consumers,

i) Cash collection through select branches of Punjab National Bank (PNB) in 15 towns of Uttarakhand,

j) Facility of drop boxes (196 nos.) in the departmental offices/collection centres, and

k) Regular mobile camps in rural/urban areas for greater accessibility of consumers to collection centres.

The Petitioner, in order to facilitate speedy settlement of disputed electricity arrears in respect of industrial consumers, has further constituted a Corporate Level Dispute Settlement Committee in its Head Office. This initiative is aimed at reducing the number of disputed and legal cases without affecting the rights of consumers to seek justice from appropriate courts/forums in the event of non-settlement. Consumers have already started taking benefit of this settlement mechanism. A number of disputed cases have been finalized by the Committee and the consumers have made the full payment of settled outstanding arrears against them.

2.3.11 *Energy Audit and Non-Technical Loss Reduction*

The Petitioner submitted that it has been assessing losses at all 33 kV and some 11 kV feeders and energy audit of all independent feeders is also being done. The Petitioner is putting a dedicated team of officers at the corporate office to continuously analyse the outputs of the energy audit exercise to take specific measures on high loss feeders/distribution transformers.

In order to reduce its non-technical losses, the Petitioner has submitted that it is taking a number of steps like regularisation of unauthorised connections/load, bringing un-ledgerised consumers to the billing fold, replacement of defective meters, ensuring accurate and complete meter reading and billing, vigilance and raid activities, etc.

The Petitioner submitted that it has been negotiating with two meter manufacturers to introduce pre-paid metering on pilot basis in one urban sub-division.

2.3.12 *Metering*

The Petitioner has submitted that since the formation of the Company, the Petitioner has been putting its best efforts to complete metering of all its consumers. The summarised information on metering as of June 30, 2005 as submitted by the Petitioner, is shown in the Table below:

Table 2.4: Status of Metering as on June 20, 2005

Category	Total As on 30th June 2005			
	Metered	**Un-metered**	**% of Metered Consumers**	**Total**
Domestic	805,255	52,489	93.88%	857,744
Commercial	98,801	1,151	98.85%	99,952
Public Lamps	171	47	78.44%	218
Departmental Employees	0	8,153	0.00%	8,153
Public Inst./ Govt. Bodies	2,213	96	95.84%	2,309
State Tube Well	344	337	50.51%	681
Private Tube Well	2,688	15,061	15.14%	17,749
Total	**9,09,472**	**77,334**	**92.16%**	**986,806**

The summarised information on metering as of July 31, 2009, is shown in the Table below:

Table 2.5: Status of Metering as on July 31, 2009

Category	Total As on 31st July 2009			
	Metered	**Un-Metered**	**% of Metered Consumers**	**Total**
Domestic	11,86,040	23,692	98.04%	12,09,732
Private Tube Well	17,530	3,307	84.13%	20,837
Other	1,49,541	-	100.00%	1,49,541
Total Consumers	**13,53,111**	**26,999**	**98.04%**	**13,80,110**

The Petitioner has emphasized that it is putting its best effort possible to achieve 100% metering of its consumers but it is unable to achieve the desired progress in the matter due to stiff resistance from some of the consumers, particularly from domestic rural and private tube-wells consumer categories. The Petitioner submitted that all new connections are released with meters only.

2.3.13 *Strengthening of Distribution System*

The Petitioner is witnessing a considerable growth in demand on account of massive rural electrification programme as well as expected growth in demand from industrial consumers. Energy demand in terms of input of energy is expected to grow in FY 2010-11 in comparison to FY 2009-10 @ 6.05%. Thus, there is a need for significant investments for strengthening as well as expanding the distribution network.

2.3.14 *Funded Distribution Investment Program*

The Petitioner is embarking upon comprehensive Distribution Strengthening Projects (including LT and HT) covering urban areas and already electrified rural areas. The project will also cover segregation of agricultural feeders from mixed rural feeders aimed at reduction of technical losses and improvement in quality and reliability of supply to consumers. The projects also encompass some focussed commercial action plans targeted to reduce distribution losses and reduce AT&C losses and above all bring in responsibility into the distribution system functioning. These projects are envisaged for implementation with funding assistance from Financial Institutions, i.e., REC/PFC/ADB and equity participation from GoU for implementation during the next five years, i.e., FY 2010-11 to FY 2014-15.

2.3.15 *Non-Funded Distribution Investment*

The Petitioner has been investing to improve the sub-transmission and distribution network by up-gradation of sub-stations and lines, replacement of poles and conductors, etc., as a part of a continuous process in order to meet the increasing demand in the LT distribution segment. During FY 2009-10 and FY 2010-11, the Petitioner proposes to undertake internal system improvement/capital works of Rs. 31 Crore and Rs. 90 Crore, respectively, towards this objective and the details of works are given in Table below:

Table 2.6: Non-Funded Schemes

S. No	Non-Funded Scheme	Estimated Cost (Rs. Crore)	
		FY 2009-10	FY 2010-11
1	New 33/11 kV Sub-station	1.10	3.10
2	New 33 kV lines for feeding new 33/11 kV S/s	0.60	1.80
3	Increasing capacity of 33/11 kV Sub-station	3.10	9.30
4	Increasing 33 kV lines from existing S/s	0.50	1.50
5	Renovation of 33 kV Sub-Stations	0.60	1.80
6	New 11 kV Composite Main lines	2.00	6.20
7	11 kV lines upgrading / strengthening	2.60	7.80
8	Installation of new 11/0.4 kV Distribution Transformers	2.00	2.20
9	Increasing capacity of 11/0.4 kV Distribution Transformers	0.60	1.80
10	Construction of New LT Lines	0.90	2.70
11	Strengthening of LT Lines	2.00	6.50
12	Installation of Meters	6.60	19.20
13	Installation of Metering cubicles/CT/PT/AMRS	2.50	7.50
14	Ariel Bunch Conductors	1.70	5.10
15	Civil Works	2.40	7.20
16	Vehicles, Furniture & Fixtures	0.10	0.30
17	Office Equipments & Computers	0.10	1.80
18	Consumer Service Centre	0.50	0.60
19	MCCB/Capacitor/ Insulator	0.20	0.60
20	Replacement of Poles	0.20	0.60
21	Misc. Works (System Studies/Network Improvement & Others)	0.80	2.40
Total		**31.00**	**90.00**

2.4 True Up

As regard truing up of past expenses for the FY 2008-09 and FY 2009-10, it has been submitted by UPCL that truing up of past expenses for the FY 2008-09 has already been carried out by the Commission in the FY 2009-10 and that they shall be submitting the true up proposal for the FY 2009-10 with the ARR/tariff filings for the FY 2011-12.

2.5 Energy sales forecast

2.5.1 *Total Energy Consumption*

The Petitioner has projected sales for different category of consumers based on past trends and information available with it. Based on the above, the Petitioner has projected total sales of 6,500.25 MU for the FY 2011-12. The summary of category-wise number of consumers, connected load and sales for FY 2010-11 as projected by the Petitioner is given in the following Table:

Table 2.7: Sales projection for FY 2010-11 (MU)

Category	Consumers	Connected Load (MW)	Sales (MU)
RTS-1: Domestic	**1,332,587**	**1,426.25**	**1,272.13**
Domestic	*1,311,384*	*1,407.99*	*1,254.01*
Snow Bound Area	*21,203*	*18.26*	*18.12*
RTS-2: Non-Domestic	**150,652**	**563.65**	**734.94**
Educational Institutions	*244*	*3.32*	*15.01*
Others	*150,408*	*560.33*	*719.93*
RTS-3: Public Lamps	421	13.24	48.50
RTS-4: Private Tube Wells/Pumping Sets	22,834	110.42	161.02
RTS-5: Government / Irrigation System	**1,040**	**36.36**	**118.41**
Upto 100 BHP	*1,018*	*33.85*	*113.92*
Above 100 BHP	*22*	*2.51*	*4.49*
RTS-6: Public Water Works	976	56.02	228.92
RTS-7: Industry	**9,949**	**1,428.93**	**3,810.46**
LT Industries	*8,720*	*225.98*	*209.49*
HT Industries	*1,229*	*1,202.95*	*3,600.97*
RTS-8: Mixed Load	52	49.70	109.61
RTS-9- Railway Traction	1	6.80	15.26
Extra State Consumers	6	1.00	1.00
Total	**1,518,518**	**3,692.37**	**6,500.25**

2.6 Efficiency parameters

2.6.1 *Distribution Loss*

The Petitioner has submitted that the Commission had stipulated a loss reduction trajectory for five years directing the Petitioner to reduce distribution losses by 4% every year up to FY 2007-08. There has been, however, large gap in the loss level as approved by the Commission on the basis of such trajectory and the loss level actually achieved by the Petitioner. The Petitioner submitted that the loss reduction trajectory given by the Commission through its very first Order was not based on any in-depth study or logical conclusion. Even as per the Final Report of Financial Restructuring Plan (FRP), which was the basic document of unbundling of erstwhile U.P. State Electricity Board (UPSEB), the energy loss reduction trajectory was given as detailed in the table below:

Table 2.8: Loss Reduction Programme as per FRP of erstwhile UPSEB

Years	FY00	FY01	FY02	FY03	FY04	FY05	FY06	FY07	FY08	FY09
Tech Transmission (%)	4.50	4.50	4.50	4.50	4.50	4.50	4.50	4.50	4.50	4.50
Tech Distribution (%)	16.50	16.50	16.50	16.00	15.50	15.00	14.50	14.00	13.50	13.00
Commercial (%)	20.50	19.50	18.50	17.50	15.50	13.00	10.50	8.00	6.00	5.00
Total (%)	**41.50**	**40.50**	**39.50**	**38.00**	**35.50**	**32.50**	**29.50**	**26.50**	**24.00**	**22.50**

The Petitioner submitted that in its Tariff Petition for FY 2008-09, the Petitioner had requested the Commission to consider a loss level of 26.80% within its distribution network. However, the Commission in the Retail Tariff Order for UPCL for FY 2008-09 approved a loss level of 22.32%, which was further reduced to 20.32% in the Tariff Order for FY 2009-10. The Petitioner submitted that actual distribution loss for FY 2008-09 works out to 28.01% and as the Commission has considered a reduction on the quantum of energy provisionally billed on the basis of NA, NR, IDF, ADF, RDF, etc., the Petitioner has considered further enhanced distribution loss of 31.02% during FY 2008-09.

The Petitioner submitted that since the sales for FY 2009-10 and FY 2010-11 as incorporated in this Petition is after reducing the effect of dubious/spurious sales on account of NA, NR, IDF, ADF, RDF, etc., the actual distribution losses in these years are bound to work out on higher side. It is not possible to achieve the distribution loss levels as approved by the Commission for FY 2008-09 and FY 2009-10.

The Petitioner has highlighted that the distribution network inherited by the Petitioner is overloaded and inadequate to meet the growing demand of electricity within the State. In order to strengthen and augment the distribution network, a number of capital projects/schemes are envisaged for implementation. The Petitioner submitted that bulk of investments are implemented to achieve socio-economic objectives of the State in providing power supply to even remote and far-flung areas under schemes like PMGY, AREP, District Plan, State Plan, MNP, Nalkoop, RGGVY, etc. Implementation of these schemes leads to increase of the LT network of the Petitioner further contributing to distribution losses. The Petitioner has requested the Commission to reconsider the above ground realities, while approving the ARR of the Petitioner by considering an achievable distribution loss target for FY 2010-11. The Petitioner submitted that it would take up the challenge to reduce its distribution losses to the level of 24.00% for FY 2010-11. The summary of the achievable distribution loss as projected by the Petitioner for FY 2009-10 and FY 2010-11 is shown in the Table below:

Table 2.9: Distribution Loss Level

Energy Balance	FY 2009-10		FY 2010-11
	Approved	Estimated	Projected
Power Purchase Requirement (MU)	7490.04	8064.95	8552.96
Demand (MU)	5968.06	5968.06	6500.25
Distribution Loss (MU)	1521.98	2096.89	2052.71
Distribution Loss (%)	20.32%	26%	24%

2.7 Details pertaining to various elements of ARR

The details of various elements of the ARR have been furnished by the Petitioner and the same are detailed in the ensuing paragraphs.

2.7.1 *Availability of Power and Power Purchase Cost*

The Petitioner has estimated power availability during FY 2010-11 from various firm sources on the basis of availability indicated by various Generating Companies, past trends and other available information in the absence of specific indication by some of the Generating Companies. The cost estimates for FY 2010-11 have been made by the Petitioner on the basis of relevant Tariff Orders, recent bills, existing arrangements, notifications, etc. for various individual sources.

For all central generating stations, the Petitioner has considered the annual fixed charges for FY 2010-11 equivalent to the approved annual fixed charges for FY 2008-09 and has not considered the impact of the new Regulations issued by the CERC for Generation Tariff for the period April 1, 2009 onwards, as the CERC Tariff Orders based on the new Regulations are yet to be issued. The Petitioner has requested the Commission to allow recovery of any increase in annual fixed cost due to the new Regulation/Tariff Order of CERC in future years.

It has been submitted that the power purchase cost of FY 2009-10 has been computed based on the actual bills received for the period from April, 2009 to September, 2009. In estimating the optimal power purchase cost likely to be incurred by it for meeting the energy requirements within the State, the Petitioner has followed the methodology adopted by the Commission in the previous Tariff Orders. The Petitioner submitted that since the position of the Uttarakhand State has changed from surplus power State to deficit power State, the methodology of monthly Merit Order Dispatch allocating less costly power to the consumers in the State of Uttarakhand and identifying the costly power for the trading function has been dispensed with, because no surplus power is left for trading.

The Petitioner has not considered any Unscheduled Interchanges (UI) with the regional grid, as by their very nature, the quantum or the rate prevailing in real-time for such interchanges cannot be projected. The Petitioner submitted that it appreciates the Commission's concern regarding maintenance of grid discipline vis-à-vis such unscheduled interchanges with the grid, as highlighted by the Commission in the Tariff Order dated October 23, 2009, and as such, UI overdrawal has been availed by the Petitioner in very exceptional circumstances and that too when the frequency of the Grid had been equal to and above 49.20 Hz.

The projected availability from various firm sources of power and the associated cost estimates are discussed in subsequent paragraphs.

2.7.1.1 Projected Availability from UJVNL

The Petitioner submitted that UJVNL has informed the indicative availability of 9 out of 11 main plants and Maneri Bhali-II. UJVNL has not indicated availability of Small Hydro Plants (SHPs) and 2 other main plants (Mohammadpur and Pathri).

The monthly pattern of availability from various plants considered by the Petitioner is as follows:

- Considered the actual plant-wise energy from April 2009 to September 2009 and worked out the total availability of power from the power stations of UJVNL as approved by the Commission for FY 2009-10.
- The monthly power availability of Maneri Bhali II considered based on the annual and monthly power availability indicated by UJVNL.
- For existing SHPs, the energy availability considered based on the monthly generation pattern over the last one year.

2.7.1.2 Cost of Power from UJVNL

For estimating the power purchase cost for FY 2010-11, the Petitioner has considered the Annual Fixed Costs for the 9 main stations of UJVNL equal to Annual Fixed Cost of FY 2009-10 as approved by the Commission in its Tariff Order dated October 23, 2009 for UJVNL for FY 2009-10 and estimated the primary energy rate based on these fixed costs and the estimated generation. Further, the Petitioner has considered the cess as Rs. 0.30 per unit and royalty as Rs. 0.10 per unit of generation based on the latest GoU notifications. The energy rate for SHPs for FY 2009-10 and FY 2010-11 has been considered in accordance with the Order dated May 19, 2009 issued by the Commission under UERC (Tariff & Other Terms for Supply of Electricity from Non-Conventional & Renewable Energy Sources) Regulations, 2008.

2.7.1.3 Projected Availability from National Thermal Power Corporation Ltd. (NTPC)

The Petitioner has projected the monthly availability from NTPC stations based on firm allocations to Uttarakhand and actual availability of power from the NTPC generating stations during the period from April 2009 to September 2009. For remaining months energy availability as approved by the Commission for FY 2009-10 has been considered. The Petitioner has projected the power availability for FY 2010-11 on the same lines except that expected availability from new Generating Stations of NTPC has been considered as reported from time to time.

2.7.1.4 Cost of power from NTPC

The Petitioner has analysed the variable cost per unit for various stations over April, 2009 to September, 2009. The Petitioner has estimated cost of power purchase from NPTC based on the following assumptions:

- Average month-on-month increase in the rates for these stations has been considered over rates during April 2009 to September 2009 in order to estimate the cost during FY 2010-11.
- The Annual Fixed Charges for these stations have been considered on the basis of CERC Tariff Orders. Since these Tariff Orders have approved Annual Fixed Charges till FY 2008-09, the Petitioner has assumed Annual Fixed Charges for FY 2010-11 as equal to the Annual Fixed Charge for FY 2008-09 for the respective station.
- Other Charges/Adjustments billed to UPCL on account of miscellaneous charges, advance tax, etc., have been considered as average for the period April, 2009 to September, 2009. These charges have been considered along with the fixed charges payable by UPCL for various stations.

2.7.1.5 Availability of Power from NHPC Ltd. (NHPC)

The availability from these stations has been estimated by the Petitioner based on the monthly design energy of the plants, the Petitioner's firm share and unallocated share in FY 2009-10 and FY 2010-11.

NHPC has informed that in FY 2010-11, the new Station Sewa-II is likely to achieve commercial operation on February 1, 2011. The Petitioner has worked out the generation of this power station as per design energy. The Petitioner has assumed the availability of 45% PLF and UPCL's share of 3% for projecting the energy available from this station. For estimating the power purchase cost, the Petitioner has considered the rate as Rs. 4.00 per unit, on the basis of price indicated by NHPC, which is subject to approval by CERC.

2.7.1.6 Cost of Power from NHPC

The Petitioner has estimated cost of power purchase from NHPC based on the following assumptions:

- Annual Fixed Charges on the basis of CERC Tariff Orders. Since these Tariff Orders have approved Annual Fixed Charges till FY 2008-09, the Petitioner has assumed Annual Fixed Charges for FY 2009-10 and FY 2010-11 as equal to the Annual Fixed Charge for FY 2008-09 for the respective station.
- Other Charges/Adjustments as average for the period April 2009 to March 2009. These charges have been considered along with the fixed charges payable for various stations.
- The variable rates of power procurement from these stations are based on CERC norms, benchmarking them to the cost of thermal stations in the region. The Petitioner has also considered the variable rates for these plants in the latest power purchase.
- For projecting the cost of free power for FY 2009-10 and FY 2010- 11, the Petitioner has considered the same rate of Rs. 1.81 per unit as approved by the Commission in the Tariff Order dated October 23, 2009 for FY 2009-10.
- Cost of power from Dulhasti new project of NHPC considered based on the provisional rate approved by CERC.

2.7.1.7 Projected Availability of Power from Other CGS

The Petitioner submitted that it had not received any details from Narora Atomic Power Plant (NAPP) regarding availability from its stations for FY 2010-11 and has, accordingly, considered the average monthly share of UPCL in FY 2008-09 for projecting monthly availability in FY 2009-10 and FY 2010-11.

Uttarakhand has an allocation of 2.7% from Tehri-I station of THDC and an allocation of 12% royalty power from the station. The Petitioner submitted that THDC has informed the availability of Power from Tehri-I Station on the basis of which, the availability of power to UPCL has been projected for FY 2009-10 and FY 2010-11.

2.7.1.8 Cost of Power from Other CGS

The Petitioner has considered the per-unit cost of power from NAPP at the average cost as worked out for the period from April 2009 to September 2009. In case of Tehri-I, the Petitioner has considered the CERC approved tariff.

2.7.1.9 Projected availability of Power from IPPs and UREDA Projects

The monthly availability of power for FY 2010-11 from the Rajwakti station of Himurja has been indicated by them to the Petitioner and the Petitioner has considered the same. The monthly availability of power from Hanumanganga, Debal and new Loharkhet stations has been considered as indicated by the respective stations. The availability of power from UREDA projects of Kandwashram, Bhikuriagad, Ramgad and Solar Interactive has been considered as per UREDA's indications.

The annual availability of power from Co-generating plant, viz., RBNS Sugar Mills has been considered as indicated by them. In the absence of monthly availability pattern, the Petitioner has assumed that generated energy will be same for all the months. Uttarakhand has an allocation of 12% royalty power from the Vishnuprayag station. The Petitioner has projected the availability based on the design energy of the plant and after considering 5% reduction as per the agreement between Uttar Pradesh and Uttarakhand.

2.7.1.10 Cost of Power from IPPs and UREDA Projects

The Petitioner has considered cost of power from Rajwakti (Him Urja) at Rs. 2.50 per unit as per tariff indicated by it. For RBNS Sugar Mills station, cost of power has been taken as Rs. 3.32 per unit based on the tariff approved by the Commission. Similarly, the cost for UREDA stations has been considered as Rs. 2.55 per unit. Cost of power from Hanumanganga has been considered as Rs. 2.65 per unit as per the tariff approved by the Commission. Similarly, the cost of Debal and Loharkhet stations has been considered as Rs. 2.80/Unit.

2.7.1.11 Banking

The Petitioner was having arrangements with the Punjab State Electricity Board (PSEB), Haryana, MP Trading Company, Gujarat and Delhi, for banking surplus energy during certain months and withdrawing the banked energy along with an extra 5% during the months when the

Petitioner faces a deficit energy situation. Settlement for any unbalanced amount takes place at the end of the financial year as per the terms of the arrangement. This practice continued till the Petitioner was having surplus power to bank. However, now the position has changed and the Petitioner has no surplus power to bank.

The Petitioner submitted that it has made arrangements with BRPL and M/s. NTPC Vidyut Vyapar Nigam Ltd. (NVVNL) for getting advance energy during certain months when the Petitioner faces a deficit energy situation and withdrawing the banked energy along with an extra 5% during the months when surplus energy is available with the Petitioner. The Petitioner submitted that settlement for any unbalanced amount takes place at the end of the financial year as per the terms of the arrangement.

The Petitioner submitted that it was having advance banked energy of 9.80 MU from PSEB, 122.354 MU from BRPL, 5.93 MU from GUVVNL and 0.89 MU from M.P. Tradeco at the end of FY 2008-09. The Petitioner has received 0.79 MU from PSEB in April 2009 and thus, the total energy advanced by PSEB including 5% increase thereon amounting to 10.92 MU was returned in June 2009. Similarly, the balance energy of 122.354 taken in advance from BRPL till end of FY 2008-09 and additional energy of 20.986 MU received in April 2009 has been returned to BRPL including 5% extra thereon totalling to 150.71 MU during the period from May, 2009 to September, 2009.

The Petitioner submitted that it has banked with BRPL advance energy to the tune of 16.68 MU during FY 2009-10 which will be got returned back after including 5% extra to the extent of 17.54 MU in FY 2009-10 itself. The Petitioner proposed that it will receive in advance for Banking 168.00 MU from BRPL and 82.80 MU from NVVNL during FY 2009-10, which will be returned along with 5% extra in FY 2010-11. The Petitioner submitted that during FY 2010-11, it will have to return 250.80 MU energy taken in advance in FY 2009-10 from BRPL and NVVNL. The Petitioner further submitted that it will give in advance to PSEB 37.00 MU for banking, which will be returned by PSEB in FY 2011-12.

2.7.1.12 Losses external to UPCL system

The Petitioner submitted that while considering power procurement to meet the State requirement, losses external to its system, i.e. in the Northern Region Power Grid Corporation of India Ltd. (PGCIL) system and PTCUL's transmission system, need to be accounted for. The availability of power for the Petitioner (i.e. at UPCL system boundary) from various sources gets reduced to the extent of these losses and the Petitioner has, accordingly, incorporated them while drawing up the energy balance and merit order dispatch for meeting the State requirement.

The Petitioner submitted that Northern Region Load Despatch Centre (NRLDC) computes the losses in the regional transmission system on a weekly basis and the same are used by it in the scheduling process subsequently. These losses have varied between 3.04% and 5.75%. UPCL has considered an average level of 4% losses for its energy transactions in the Northern Region, i.e. while procuring power from Inter-State Generating Stations, withdrawing banked power from other States and trading (selling/purchasing).

The Petitioner has also considered losses in the PTCUL system at 2.5%. These losses have been considered in all energy transactions except in procurement from SHPs and UREDA stations which are connected directly to the UPCL system.

2.7.1.13 *Total Power Availability*

Based on the availability of power from various sources as discussed above and after considering losses external to UPCL system, the net energy availability to UPCL from various sources for FY 2009-10 and FY 2010-11 is estimated at 7279.77 MU (excluding UI overdrawal/trading) and 7183.28 MU (excluding UI overdrawal/trading) respectively. The net energy required to meet the needs of the State at distribution periphery works out to 8064.95 MU and 8552.96 MU for FY 2009-10 and FY 2010-11 respectively.

2.7.1.14 *Merit Order Dispatch*

The Petitioner submitted that it is having less power than its requirement and has got no surplus for Trading and, therefore, no Merit Order Dispatch mechanism has been applied. However, it has followed the merit order principle in scheduling the cheapest energy first for meeting the State requirement.

2.7.1.15 *Procurement of Deficit Energy*

The Petitioner submitted that availability from firm sources of power is not expected to suffice for meeting the State requirement in the winter months and the Petitioner is in the process of contracting for additional power through various trading agencies.

The Petitioner has projected a deficit of 1369.68 MU at its boundary in FY 2010-11 and proposes to meet the deficit power by entering into short-term power purchase agreement/open market purchase from traders. The Petitioner has assumed a rate of Rs. 5.24 per unit at regional interface, i.e., Rs. 5.60 per unit at distribution boundary for purchase of this deficit power. The Petitioner has also submitted that in case cost of procurement of deficit power goes above Rs. 7.35 per unit, the Petitioner should be either allowed to do load shedding or an appropriate recovery mechanism has to be approved by the Commission to recover the additional cost of power on monthly basis from the consumers as additional surcharge, as it will not be possible for the Petitioner to absorb such additional cost.

2.7.1.16 Trading/UI Underdrawal

The Petitioner submitted that it has done under-drawl of 152.76 MU in FY 2008-09. Higher cost energy, not dispatched for meeting the State requirement, has been considered for UI under-drawal. The cost of these under-drawls has been computed by the Petitioner based on the merit order of dispatch and is Rs. 61.40 Crore and the Petitioner has earned Rs. 66.59 Crore against these under-drawals, implying a profit of Rs. 5.19 Crore thereon, which has been considered under non-tariff income. For FY 2009-10 and FY 2010-11, the Petitioner has estimated no surplus energy as it will bank the surplus energy with the other Utilities.

2.7.1.17 Total Power Purchase Cost

Based on the assumptions and methodology discussed above, the Petitioner has estimated the total power purchase costs for meeting the State demand for FY 2009-10 and FY 2010-11 at Rs. 1728.11 Crore and Rs. 2071.95 Crore respectively.

2.7.2 *Transmission and Load Despatch Centre (LDC) Charges*

The Petitioner has projected the transmission charges payable to NRLDC for the current and ensuing year on account of Short-term Open Access charges for return of banked power. The Petitioner has further projected PGCIL charges for current year based on the bills received from PGCIL for the period from April, 2009 to September, 2009. For FY 2009-10 and FY 2010-11, the Petitioner has considered transmission charges equivalent to the charges for FY 2008-09.

To estimate the transmission charges to be paid to PTCUL for the FY 2009-10, the Petitioner has considered the transmission charges as approved by the Commission for FY 2009-10 in the

Tariff Order dated October 21, 2009 and accordingly projected them to be Rs. 75.81 Crore. For FY 2010-11 also, the Petitioner has considered the same per unit transmission charge as approved by the Commission for the FY 2009-10.

2.7.3 *Operations and Maintenance Expenses*

The Petitioner submitted that the Commission, in the Retail Tariff Order for UPCL for FY 2007-08 and FY 2008-09, has approved a consolidated value of O&M expenses, factoring the effects of inflation, i.e. 4% and the proportionate increase in the number of consumers of the Petitioner.

The Petitioner submitted that due to revision of pay scales of staff based on the recommendations of Sixth Pay Commission, the increase in salary of staff including the payment of arrears pertaining to the period from January, 2006 to March, 2009 in three installments, it was not possible for the Petitioner to afford such additional burden on Operation & Maintenance Expenses through mere 4% increase in all the three components of Operation & Maintenance Expenses. The Petitioner had projected the O&M Expenses in its Petition for FY 2010-11 in three components, i.e. Employee Expenses, Administration & General (A&G) Expenses and Repairs & Maintenance (R&M) Expenses separately, showing the details under each component as under:

2.7.3.1 Employee Expenses

The Petitioner has followed the Commission's approach for projecting the employee expenses, A&G expenses and R&M expenses for FY 2009-10 and FY 2010-11 considering FY 2008-09 as the base year. The Petitioner has estimated additional employee expenses on account of recommendations of Sixth Pay Commission. The Petitioner submitted that it has assumed that employees will start getting revised salary as per Sixth Pay Commission from April 2009 and they will get 40% of the arrears for the period January 2006 to March 2009 in FY 2009-10, 30% in FY 2010-11 and remaining 30% in FY 2011-12.

The Petitioner submitted that all the elements of Employee Cost during FY 2009-10 have been taken into consideration by the Commission in its Tariff Order for FY 2009-10 except the impact of installment of Dearness Allowance, which will become due w.e.f. January 1, 2010. The Petitioner has submitted that since the payment of first installment of arrears is yet to be made, the reimbursement of any variation in payment during FY 2009-10 over and above the amount of Rs. 42.47 Crore will be claimed in the next year along with the ARR and Tariff Petition for FY 2011-12.

The Petitioner has projected employee cost for FY 2010-11 on the same assumptions as adopted by the Commission for FY 2009-10 except that the amount of increase in Dearness Allowance which will fall due on January and July next year has been claimed @ 6%. However, if the rates of these installments are different, necessary adjustment towards such variation will be incorporated by the Petitioner in the truing up submissions.

2.7.3.1.1 Salary

It has been submitted that the Commission in its Tariff Order for FY 2009-10 projected the salaries of the staff as Rs. 96.29 Crore. Assuming that 50% of staff will get increment on July 1, 2010 and 50% on January 1, 2011, the Petitioner has proposed an additional amount of Rs. 1.44 Crore on this account. The Petitioner has further submitted that the Commission has not considered the impact of increase in salary of staff, on account of promotion. Since two increments are allowed simultaneously on promotion, the Petitioner has proposed to increase the overall amount of impact of such promotions from July, 2009 to March, 2011 @ 1% on total Salary. The Petitioner has, accordingly, projected a total salary of Rs. 98.71 Crore for FY 2010-11.

2.7.3.1.2 Dearness Allowance

The Petitioner has submitted that in the pay scales effective from January 1, 2006, the installments of Dearness Allowance are due on 1st January and 1st July of each calendar year. The Petitioner submitted that since increasing trend has been noticed and in calendar year 2009, two installments @ 6% and 5% have already been sanctioned, it is expected that during the period from April 2010 to March 2011, impact of three installments will be due. The Petitioner has assumed two installments of DA, each having impact of 6% for the FY 2010-11. The Petitioner has further submitted that it has also taken into account the impact of Dearness Allowance installment, which has become due on January 1, 2010 and was not taken into consideration while projecting the amount of Dearness Allowance for FY 2009-10.

2.7.3.1.3 Other Factors

The Petitioner submitted that other factors of the Employee Cost, viz., Other Allowances and Ex-gratia have been kept constant except that the same have been increased proportionately to the number of Employees. The Petitioner has projected Employee's Contribution towards leave encashment in proportion to the salary amount and Employee's Contribution towards Pension & Gratuity and EPF has been worked out @ 17.91% on the total sum of Salary and Dearness

Allowance.

The Petitioner has submitted that while approving the establishment cost for FY 2009-10, the Commission had deducted a sum of Rs. 16.36 Crore towards the contribution for Capital Works, but in fact no capital investment was approved by the Commission for FY 2009-10 and, therefore, the deduction so made was not genuine and proper. The Petitioner has proposed to claim restoration of capital investment through truing-up along with other claims for FY 2009-10, at the time of filing ARR and Tariff Petition for FY 2011-12 in the month of November 2010.

Table 2.10: Employee Cost for FY 2010-11 (Rs. Crore)

S.No	Particulars		Amount
1	Salaries		
	(i) Amount as on 01-04-2010		96.29
	(ii) Increment on 1st July, 2010 to 50% Employees @ 3%		1.44
	(iii) Increment on 1st January, 2011 to 50% Employees @ 3%		1.44
	(iv) Impact of pay fixation on Promotion @ 1% as on July 1, 2010		0.99
	Sub-Total		**100.16**
2	Dearness Allowance (DA)		
	(i) 6% of Rs. 96.29 Crore for 1/2010 to 3/2010		1.44
	(ii) 33% of Rs. 96.29 Crore for the period 4/2010 to 6/2010		7.94
	(iii) 39% on Rs. 97.73 Crore for the period 7/2010 to 12/2010		19.06
	(iv) 39% on Rs. 99.17 Crore for the period 7/2011 to 3/2011		9.67
	Sub-Total		**38.11**
3	Other Allowances		15.62
4	Bonus Ex-gratia		1.62
5	Employer's Contribution towards Leave Salary 100.16 x 13.27/ 96.29		13.80
	Sub-Total		**169.31**
6	Employer's Contribution towards Pension & Gratuity	@ 17.91% on salary & Dearness Allowance	24.76
7	Employer's Contribution towards EPF		
8	2nd installment of VI Pay Commission Arrears		**31.85**
	Gross Employee Cost		**225.92**
9	Less Capitalization		**9.73**
	Net Employee Expenses including Arrears		**216.19**

2.7.3.2 *Repairs & Maintenance (R&M) Expenses*

For the purpose of projecting the requirement of R&M Expenses for FY 2010-11, the Petitioner has distributed the quantum of increase in consumer base as allowed by the Commission amounting to Rs. 2.59 Crore for FY 2008-09 and has reworked the allocation in individual items of R&M Expenses to match with the trend of actual expenses incurred during FY 2008-09. The Petitioner has projected the requirement of R&M expenses for FY 2010-11 by escalating the reworked A&G expenses by 6.51%, which has been considered by the Commission for FY 2009-10. The overall requirement of R&M Expenses projected by the Petitioner after taking the number of consumers as 1420096 and 1518518 in FY 2009-10 and FY 2010-11 respectively, is shown in the Table below:

Table 2.11: R&M Expenses for FY 2010-11 (Rs. Crore)

S.No	Item	FY 2009-10 (Re-allocated)	FY 2010-11 Based on 6.51% increase	FY 2010-11 after including the impact of consumer base
1	Plant & Machinery	10.84	11.55	12.35
2	Building & Civil Works	1.46	1.56	1.66
3	Lines & Cable Network	30.99	33.00	35.29
4	Vehicles	0.03	0.03	0.03
5	Furniture & Fixtures	0.22	0.23	0.25
6	Office Equipments	0.03	0.03	0.03
7	Others	0.02	0.02	0.02
	Total	**43.59**	**46.42**	**49.63**

2.7.3.3 *Administrative & General (A&G) Expenses*

For the purpose of projecting the requirement of A&G Expenses for FY 2010-11, the Petitioner in its Petition, distributed the quantum of increase in consumer base as allowed by the Commission amounting to Rs. 1.32 Crore for FY 2008-09 to individual items of A&G Expenses to match with the trend of actual expenses as were incurred during FY 2008-09. The Petitioner has worked out the A&G Expenses for FY 2010-11 by escalating the reworked A&G expenses by 6.51%, which has been allowed by the Commission for FY 2009-10. The overall requirement of A&G Expenses projected by the Petitioner after taking into account the number of consumers as 1420096 and 1518518 in FY 2009-10 and FY 2010-11 respectively is shown in the Table below.

Table 2.12: A&G Expenses for FY 2010-11 (Rs. Crore)

S.No	Item	FY 2009-10 (Re-allocated)	FY 2010-11 (Based on Escalation)	FY 2010-11 after including the impact of consumer base
1	Rent, Rates & Taxes	0.47	0.50	0.53
2	Insurance	0.11	0.12	0.13
3	Telephone, Postage & Telegram	2.30	2.45	2.62
4	Legal & Professional Charges	3.57	3.80	4.06
5	Audit Fee	0.03	0.03	0.03
6	Fees & Subscription (ROC)	0.39	0.42	0.45
7	Conveyance & Travelling	4.56	4.86	5.20
8	Electricity & Water Charges	2.98	3.17	3.39
9	Printing & Stationary	1.84	1.96	2.10
10	Advertisement & Promotion	1.87	1.99	2.13
11	Licence Fee	0.06	0.61	0.65
12	Other Expenses	4.25	4.53	4.84
	Total	**22.43**	**24.44**	**26.13**
13	Less: Capitalization	1.30	-	2.70
	Total	**21.13**	**24.44**	**23.43**

The Petitioner submitted that while approving the establishment cost for FY 2009-10, the Commission has deducted a sum of Rs. 1.30 Crore towards the Contribution for Capital Work, but in fact no capital investment was approved by the Commission for FY 2009-10 and, therefore, the deduction so made was not genuine and proper. The Petitioner has proposed to claim restoration of capital investment through truing-up along with other claims for FY 2009-10 at the time of filing ARR and Tariff Petition for FY 2011-12 in the month of November, 2010.

2.7.4 *Operations and Maintenance (O&M) Expenses*

The summary of total O&M Expenses projected by the Petitioner for FY 2010-11 based on the above computations is shown in the following Table:

Table 2.13: O&M Expenses for FY 2010-11 (Rs. Crore)

S.No	Item	FY 2008-09	FY 2009-10	FY 2010-11
		Actual	Approved	Projected
1	Employee Cost	130.50	173.42	194.07
2	Arrears of 6th Pay Commission	0.00	42.47	31.85
3	R & M Expenses	38.50	43.59	49.63
4	A & G Expenses	19.33	22.43	26.13
5	**Total**	**188.33**	**281.91**	**301.68**
6	Less: Capitalization			
	(a) Employee Cost	28.74	16.36	9.73
	(b) A & G Cost	4.17	1.30	2.70
7	**Net O & M Expenses**	**155.42**	**264.25**	**289.25**

2.8 Investment Plan

The Petitioner has submitted that it has executed various capital works amounting to about Rs. 364.43 Crore on various projects in FY 2008-09. The investment plans for FY 2009-10 and FY 2010-11 have been drawn up considering the expected investments under various schemes like District Plan, State Plan, RGGVY, APDRP, PMGY and MNP including investment under system improvement works to be carried out by the Petitioner. The funding pattern of these investments has also been identified as per the details of these schemes.

The Petitioner has also proposed to make significant investments in the ensuing year in installation of new sub-stations and distribution transformers, up-gradation of existing sub-stations and distribution transformers, laying of new lines, replacement of poles, etc. The Petitioner submitted that these investments are not covered under the various schemes like R-APDRP, but are essential to ensure quality of supply to the consumers.

These capital investments have been estimated at division level for FY 2009-10 and FY 2010-11. The Petitioner has considered financing of these investments in FY 2010-11 through loans from the State Government, REC or PFC. The Petitioner has also indicated the deficit in expenses incurred and receipt from consumers by it towards releasing new LT connections. The Petitioner has submitted that it has managed this deficit through funding from revenue collection and by cash/liability/credit management mechanism. The Petitioner requested the Commission to approve this deficit as equity invested/loan borrowed by the Petitioner in the business and allow 14% return/interest on loan on the deficit amount. The Petitioner has also projected the receipt of additional equity of Rs. 15 Crore in FY 2010-11 from GoU for financing the capital works in FY 2010-11. The details of the investment plan for FY 2009-10 and FY 2010-11 is presented in the following Tables:

Table 2.14: Investment Plan for FY 2009-10 (Rs. Crore)

S.No.	Item	Grant / Internal Funds	Loan/equity/deposits	Funding Agency
A)	**SCHEME-WISE CAPITAL WORKS**	0.00	21.01	**GoU**
1	District Plan	0.00	0.00	
2	State Plan	0.00	0.00	
3	Rural Electrification	140.00	15.00	REC/GoU
a	RGGVY	0.00	0.00	
4	Private Tubewell	0.00	0.00	
a	Energisation of Private Tubewell	0.00	0.00	
b	Feeder Segregation	0.00	0.00	
5	APDRP	0.00	0.00	
6	PMGY	0.00	0.00	
7	MNP	0.00	0.00	
8	Others	0.00	0.00	
9	R-APDRP	0.00	3.62	PFC
	Sub-Total (A)	140.00	39.63	-
B)	**OTHERS - INTERNAL CAPITAL WORKS**			
1	New 33/11 KV Sub-station	0.00	1.10	
2	New 33 KV lines for feeding new 33/11 KV S/s	0.00	0.60	
3	Increasing capacity of 33/11 KV Sub-station	0.00	3.10	
4	Increasing 33 KV lines from existing S/s	0.00	0.50	
5	Renovation of 33 KV Sub-Stations	0.00	0.60	
6	New 11 KV Composite Main lines	0.00	2.00	
7	11 KV lines upgrading/strengthening	0.00	2.60	
8	Installation of new 11/0.4 KV Distribution Transformers	0.00	2.00	
9	Increasing capacity of 11/0.4 KV Distribution Transformers	0.00	0.60	
10	Construction of New LT Lines	0.00	0.90	
11	Strengthening of LT Lines	0.00	2.00	
12	Installation of Meters	0.00	6.60	
13	Installation of Metering cubical/ CT/PT/AMRS	0.00	2.50	
14	Ariel Bunch Conductors	0.00	1.70	
15	Civil Works	0.00	2.40	
16	Vehicles, Furniture & Fixtures	0.00	0.10	
17	Office Equipments & Computers	0.00	0.10	
18	Consumer Service Centre	0.00	0.50	
19	MCCB/Capacitor/Insulator	0.00	0.20	
20	Replacement of Poles	0.00	0.20	
21	Misc. Works (System Studies/Network Improvement & Others)	0.00	0.80	
	Sub-Total (B)	**0.00**	**31.10**	
	Total	**140.00**	**70.73**	

Table 2.15: Investment Plan for FY 2010-11

S.No.	Item	Grant/Internal Funds	Loan Amount Received	Funding Agency
A)	**SCHEME-WISE CAPITAL WORKS**			
1	District Plan	0.00	35.00	GoU
2	State Plan	0.00	30.00	GoU
3	Rural Electrification	0.00	0.00	
a	RGGVY	90	10.00	REC/GoU
4	Private Tubewell	25.00	0.00	GoU
a	Energization of Private Tubewell	0.00	0.00	
b	Feeder Segregation	0.00	60.00	Financial Institutions/GoU
5	APDRP	0.00	0.00	
6	PMGY	0.00	0.00	
7	MNP	0.00	0.00	
8	Equity	0.00	0.00	
9	Others (REC & NABARD for PTCUL)	0.00	0.00	
10	R-APDRP	0.00	87.48	PFC
	Sub-Total [A]	**115.00**	**222.48**	
B)	**OTHERS- INTERNAL CAPITAL WORKS**			
1	New 33/11 KV Sub-station	0.00	3.10	
2	New 33 KV lines for feeding new 33/11 KV S/S	0.00	1.80	
3	Increasing capacity of 33/11 KV Sub-station	0.00	9.30	
4	Increasing 33 KV lines from existing S/s	0.00	1.50	
5	Renovation of 33 KV Sub-stations	0.00	1.80	
6	New 11 KV Composite Main lines	0.00	6.20	
7	11 KV lines upgrading/strengthening	0.00	7.80	
8	Installation of new 11/0.4 KV Distribution Transformers	0.00	2.20	
9	Increasing capacity of 11/0.4 KV Distribution Transformers	0.00	1.80	
10	Construction of New LT lines	0.00	2.70	
11	Strengthening of LT lines	0.00	6.50	
12	Installation of Meters	0.00	19.20	
13	Installation of Metering cubicles/CT/PT/AMRS	0.00	7.50	
14	Ariel Bunch Conductors	0.00	5.10	
15	Civil Works	0.00	7.20	
16	Vehicles, Furniture & Fixtures	0.00	0.30	
17	Office Equipments & Computers	0.00	1.80	
18	Consumer Service Centre	0.00	0.60	
19	MCCB/Capacitor/Insulator	0.00	0.60	
20	Replacement of Poles	0.00	0.60	
21	Misc. Works (System Studies/Network Improvement & Others)	0.00	2.40	
	Sub-Total [B]	**0.00**	**90.00**	
	GRAND TOTAL	**115.00**	**312.48**	

The details of the investments capitalized and works in progress are shown in the Table below:

Table 2.16: Capital Work in Progress (Rs. Crore)

S.No	Item	FY 2008-09 (Actual)	FY 2009-10 (Revised Estimate)	FY 2010-11 (Projected)
1	Opening Balance	629.41	707.67	309.95
2	*Add: New Investments*			
	Base Expenditure (incl. IDC & Establishment)	388.18	226.20	248.50
3	*Less:*			
	Investment Capitalised	309.92	623.92	452.60
	Adjustments			
4	**Closing balance**	**707.67**	**309.95**	**105.85**

Hence, the Petitioner has projected the total investment capitalisation of Rs. 623.92 Crore and Rs. 452.60 Crore for FY 2009-10 and FY 2010-11 respectively.

2.9 Fixed Assets and Depreciation

The Petitioner submitted that the division of assets and liabilities between the Petitioner and UPPCL as on November 8, 2001 (i.e. the date of transfer determined by the Government of India) was based on the principles/methodology for the same as specified by GoI vide its Order No. 42/7/2000 R&R dated November 5, 2001 under section 63(4) of the Uttar Pradesh Reorganisation Act, 2000. The Petitioner has subsequently considered additions to the gross block based on capitalisation of works under various schemes and projects carried out by it.

The fixed assets of UPCL have been considered after adjusting for removal of PTCUL assets from the books of accounts of UPCL, pursuant to the Transfer Scheme notified by the State Government dated May 31, 2004.

The following Table outlines the fixed assets as proposed by the Petitioner for FY 2009-10 and FY 2010-11.

Table 2.17: Gross Fixed assets for FY 2010-11 (Rs. Crore)

S.No.	Asset Groups	FY 2008-09 (Actual)				FY 2009-10 (Revised Estimates) (Current Year)			FY 2010-11 (Estimated)		
		Opening Balance	Additions during the year	Deductions during the year	Closing Balance	Additions during the year	Deductions during the year	Closing Balance	Additions during the year	Deductions during the year	Closing Balance
1	Land & Rights	6.24	4.54	0.00	10.78	1.60	0.00	12.38	1.60	0.00	13.98
2	Buildings	65.41	7.22	0.00	72.63	9.70	0.00	82.33	9.70	0.00	92.03
3	Hydraulic Works	0.37	0.12	0.00	0.49	0.00	0.00	0.49	0.00	0.00	0.49
4	Other Civil works	1.25	0.26	0.00	1.51	0.92	0.00	2.43	0.40	0.00	2.83
5	Plant & Machinery	256.73	85.77	44.37	298.13	204.70	32.56	470.27	104.70	28.60	546.37
6	Lines & Cable Network	1,544.52	105.15	3.70	1,645.98	403.90	0.00	2,049.88	333.90	2.50	2,381.28
7	Vehicles	2.84	0.03	0.03	2.83	0.00	0.00	2.83	0.20	0.00	3.03
8	Furniture & Fixtures	2.28	1.12	0.00	3.39	0.10	0.00	3.49	0.10	0.00	3.59
9	Office Equipment	10.21	2.31	0.01	12.51	3.00	0.00	15.51	2.00	0.00	17.51
	Total	**1,889.84**	**206.52**	**48.11**	**2,048.25**	**623.92**	**32.56**	**2,639.61**	**452.60**	**31.10**	**3,061.11**

In compliance with the Commission's direction regarding preparation of fixed assets register, the Petitioner submitted that it had invited bids through open tender basis and the assignment has been awarded to the successful bidder(s) to complete the detailed fixed asset registers, including identification, physical verification, valuation of all fixed assets category-wise and location-wise as per the guidelines prescribed in the Companies Act, 1956 in a time-bound period.

Pending the finalisation of the fixed asset registers, depreciation has been computed by the Petitioner based on norms specified in the Regulation 15 of Distribution Tariff Regulations issued by the Commission. The Petitioner submitted that it has also applied for obtaining clearance for all EHT and HT works from Electrical Inspector. The Petitioner will submit the same as soon as the clearances are received from Electrical Inspector.

2.10 Interest on Loans

The Petitioner has estimated the interest and finance charges separately for each loan availed by it under various schemes. As regards loans/liabilities transferred to UPCL under the transfer arrangement based on the Government of India order effective from November 9, 2001, the Petitioner submitted that these liabilities have been transferred to it vide the above mentioned transfer arrangement and pending finalisation of various issues between UPCL and UPPCL, the Petitioner is not claiming any interest charges under the heads of GPF liabilities, CPSU dues, and power purchase dues up to November 08, 2001 in this Petition. The interest charges claimed by the Petitioner for FY 2009-10 and FY 2010-11 are presented in the following Tables:

Table 2.18: Interest and Finance Charges for FY 2009-10 (Rs. Crore)

S.No	Item	Opening Balance	Receipts	Repayment	Closing Balance	Rate of Interest (%)	Interest Payable
A)	**GOU LOAN**						
1	**District Plan**						
a	District Plan-1	13.48	0.00	1.81	11.67	6.50	0.86
b	District Plan-2	3.64	0.00	0.91	2.73	13.50	0.55
c	District Plan-3	10.65	21.01	1.06	30.60	8.50	2.70
2	**PMGY**						
a	PMGY	3.19	0.00	0.23	2.96	12.00	0.36
b	PMGY	0.74	0.00	0.05	0.69	11.50	0.08
c	PMGY	0.65	0.00	0.03	0.62	10.50	0.06
3	**APDRP**						
a	APDRP	3.87	0.00	0.20	3.67	10.50	0.36
b	APDRP	1.52	0.00	0.10	1.42	12.00	0.24
c	APDRP	10.54	0.00	0.90	9.64	11.50	1.44
d	APDRP	1.96	0.00	1.60	0.36	13.50	0.24
e	APDRP	5.40	0.00	0.20	5.20	9.00	0.48
f	R-APDRP	2.44	0.12		2.56	11.00	0.27
4	**MNP**						
a	MNP	57.16	0.00	4.10	53.06	11.50	6.48
b	MNP	2.04	0.00	0.10	1.94	12.00	0.12
5	**STATE PLAN**						
a	State Plan-1	29.09	0.00	3.41	25.68	6.50	1.89
b	State Plan-2	6.61	0.00	1.62	4.99	13.50	0.83
c	State Plan-3	3.61	0.00	0.36	3.25	8.50	0.15
6	**REC -AERP**	65.57	0.00	8.03	57.54	3.00	1.98
7	**Rajiv Gandhi Gramin Yojana**	58.66	9.78	0.00	68.44	5 to 11.50	5.82
	Sub-Total [A]	**280.82**	**30.92**	**24.71**	**287.03**		**24.91**
B)	**Transfer Scheme Loans**					-	
8	REC- OLD	257.03	0.00	8.69	248.34	-	31.35
9	GOUP LOANS	67.73	0.00	0.00	67.73	-	0.00
10	GPF DUES	127.10	0.00	0.00	127.10	-	0.00
11	CPSU DUES	572.00	0.00	0.00	572.00	-	0.00
12	POWER PURCHASE DUES	123.16	0.00	0.00	123.16	-	0.00
13	SECURITY DEPOSIT	178.77	32.32	0.00	211.09	6.00	23.39
	Sub-Total [B]	**1325.79**	**32.32**	**8.69**	**1349.42**	**-**	**54.74**
	TOTAL [A+B]	**1606.61**	**63.24**	**33.40**	**1636.45**	**-**	**79.65**

Table 2.19: Interest and Finance Charges for FY 2010-11 (Rs. Crore)

S. No	Item	Opening Balance	Receipts	Repayment	Closing Balance	Rate of Interest (%)	Interest Payable
A)	**GOU LOAN**						
1	**District Plan**						
a	District Plan-1	11.67	0.00	1.81	9.86	6.50	0.86
b	District Plan-2	3.64	0.00	0.91	2.73	13.50	0.55
c	District Plan-3	30.60	0.00	1.06	29.53	8.50	2.70
2	**PMGY**						
a	PMGY	3.10	0.00	0.23	2.87	12.00	0.36
b	PMGY	0.72	0.00	0.05	0.67	11.50	0.08
c	PMGY	0.64	0.00	0.03	0.61	10.50	0.06
3	**APDRP**						
a	APDRP	3.79	0.00	0.20	3.59	10.50	0.36
b	APDRP	1.48	0.00	0.10	1.38	12.00	0.24
c	APDRP	10.18	0.00	0.90	9.28	11.50	1.44
d	APDRP	1.90	0.00	1.60	0.30	13.50	0.24
e	APDRP	5.32	0.00	0.20	5.12	9.00	0.48
f	R-APDRP	2.56	0.00	0.00	2.56	11.00	0.27
4	**MNP**						
a	MNP	55.52	0.00	4.10	51.42	11.50	6.48
b	MNP	2.00	0.00	0.10	1.90	12.00	0.12
5	**STATE PLAN**						
a	State Plan-1	25.68	0.00	3.41	22.27	6.50	1.89
b	State Plan-2	6.61	0.00	1.62	4.99	13.50	0.83
c	State Plan-3	3.25	0.00	0.36	2.89	8.50	0.15
6	**REC -AERP**	64.19	0.00	8.03	49.52	3.00	1.98
7	**Rajiv Gandhi Gramin Yojana**	68.44	0.00	0.00	68.44	5 to 11.50	5.82
	Sub-Total [A]	**301.29**	**0.00**	**24.71**	**269.93**		**24.91**
B)	**Transfer Scheme Loans**						
8	REC- OLD	248.34	0.00	10.40	237.94	-	30.39
9	GOUP LOANS	67.73	0.00	0.00	67.73	-	
10	GPF DUES	127.10	0.00	0.00	127.10	-	
11	CPSU DUES	572.00	0.00	0.00	572.00	-	
12	POWER PURCHASE DUES	123.16	0.00	0.00	123.16	-	
13	SECURITY DEPOSIT	211.09	25.78	0.00	236.87	6.00	26.88
	Sub-Total [B]	**1349.42**	**25.78**	**10.40**	**1364.80**		**57.27**
	TOTAL [A+B]	**1650.71**	**25.78**	**35.11**	**1634.73**		**82.18**

2.11 Interest on Working Capital

The Petitioner has stated that it has considered working capital and interest cost thereon in accordance with Regulations. Working Capital has been stated to be calculated based on Regulation 14(2) and includes the following components:

(i) One month O&M expenses inclusive of maintenance spares forming part of R&M expenses

(ii) Capital required for financing the shortfall in collections

(iii) Receivables for sale of electricity equivalent to billing cycle suitably adjusted for security given by consumers and credit given by suppliers

The Petitioner has considered collection efficiency of 96% for the current year i.e. FY 2009-10 as well as for the ensuing year i.e. FY 2010-11. Receivables have been estimated by considering 60 days' billing cycle with suitable adjustments for security deposits and credit given by suppliers.

The interest on working capital has been calculated considering the interest rate of 10.25%. The summary of estimated working capital and interest on working capital is given in the following Table:

Table 2.20: Interest on Working Capital (Rs. Crore)

S. No	Particulars	FY 2008-09	FY 2009-10 (Approved)	FY 2010-11 (Projected)
1	O&M Expenses	14.92	22.02	24.10
2	Collection Inefficiency	79.52	82.71	109.14
3	Receivables	261.43	315.62	454.98
	Sub-Total	**355.87**	**420.35**	**588.22**
4	Less: Security Deposit, etc	294.21	302.34	396.64
5	**Net Working Capital**	**61.66**	**118.01**	**191.58**
6	Interest Rate	10.25%	12.25%	10.25%
7	**Interest on Working Capital**	**6.32**	**14.46**	**19.64**

2.12 Provision for Bad and Doubtful Debts

The Petitioner has submitted that it has finalised a suitable policy for provisioning for and writing off bad debts for implementation, which has been approved by the Board of Directors. The Petitioner submitted that annual provisioning towards bad and doubtful debts is an accepted method of accounting and also recognised by other State Electricity Regulatory Commissions. The Petitioner has considered a provision of Rs. 57.56 Crore and Rs. 68.28 Crore for FY 2009-10 and FY 2010-11 respectively, at a conservative level of 2.5% of the revenue to be billed during the current and ensuing year.

2.13 Return on Equity

The Petitioner submitted that the Commission had allowed Return on Equity (RoE) for the assets capitalised under system improvement schemes funded out of equity based on the means of finance. The Petitioner submitted that the Commission has considered the Petitioner's submission in this regard and approved a RoE of Rs. 0.76 Crore at the rate of 14% on the equity of Rs. 5.43 Crore for FY 2007-08 and FY 2008-09. The Petitioner has claimed RoE at the rate of 14% per annum for FY 2009-10 and FY 2010-11. The Petitioner has projected the receipt of additional equity of Rs. 15 Crore in FY 2010-11. Accordingly, it has claimed RoE of Rs. 2.94 Crore on equity base of Rs. 21.03 Crore for FY 2010-11.

2.14 Non-Tariff Income

The non-tariff income for the Petitioner primarily comprises of meter rent, discount/rebate on timely payment of power purchase bills, income from fixed deposits and delayed payment charges from consumers. The Petitioner has submitted that the income from sale of apparatus and scrap has not been considered as the same cannot be estimated. The Petitioner submitted that it has not estimated any surplus power trading during FY 2009-10 and FY 2010-11 and, hence, it has not considered any power trading income from sale of surplus energy. The Petitioner has projected the non-tariff income for FY 2009-10 and FY 2010-11 as Rs. 38.40 Crore and Rs. 38.77 Crore respectively.

2.15 Aggregate Revenue Requirement for FY 2010-11

On the basis of the projected expenses, RoE and Non-Tariff Income for FY 2010-11, the projected ARR for 2010-11 is summarised in following Table.

Table 2.21: Aggregate Revenue Requirement for FY 2010-11 (Rs. Crore)

S.No.	Item	FY 2010-11
		Projected
	Expenditure	
1	Power Purchase Expenses	2,071.95
2	Transmission Charges – PGCIL	91.14
3	Transmission Charges – PTCUL	108.73
4	O&M expenses	289.25
5	Interest charges	83.99
6	Depreciation	40.62
7	Interest on Working Capital	19.64
	Gross Expenditure	**2,705.32**
	Other Expenses / Appropriations	
8	Provision for Bad & Doubtful Debts	68.28
9	Return on Equity	2.94
	Net Expenditure	**2,776.55**
10	Less: Non Tariff Income	38.77
	Net Aggregate Revenue Requirement	**2,737.78**

3. Stakeholder's Responses and Petitioner's Comments

The Commission has received suggestions and objections on ARR and Tariff proposal of UPCL for FY 2010-11. A list of respondents who have submitted these responses are given in **Annexure-4** and the respondents who appeared in the public hearings are enclosed in **Annexure-5**. The Commission has also obtained Responses from UPCL on the Comments received from stakeholders. Since several issues are common and have been raised by more than one respondent, all Comments have been clubbed issue-wise and summarised below. These issues have also been duly considered while analyzing the factors affecting the tariff determination in the later Sections in this Order.

3.1 Domestic Tariff

3.1.1 *Tariff Increase*

3.1.1.1 Stakeholders' Comment

Ms. Geeta Bisht of Mahanagar Congress Seva Dal, Dehradun and several respondents opposed the increase in tariff proposed by the Petitioner and mentioned that the existing tariff for domestic category should not be increased as the tariff was increased recently.

All India Consumers Council (AICC) opposed the proposed increase in the Fixed Demand charges for consumers having load up to 4 kW, from Rs. 20 to Rs. 24 per kW per month and submitted that the concept of fixed charges for domestic category should be abolished and instead of fixed charges, the concept of minimum charges may be approved. AICC further submitted that since there has been no mention about the fixed charges in the proposed tariff for consumers with load more than 4 kW, it is assumed that the fixed charges for consumers with load more than 4 kW is nil. AICC also opposed the proposed increase in energy charges from Rs. 2.20/kWh to Rs. 2.64/kWh.

Shri. Manmohan Kansal from Dak-pathhar Vyapaar Mandal, Dehradun submitted that UPCL is trying to burden the consumers with increased tariff despite its own inefficiencies towards the high transmission & distribution loss and increased power theft. He further added that despite increase in hydro power generation in the State from FY 2007-08 to FY 2008-09, it is unethical to increase the retail tariff. He suggested that UPCL should implement other measures to save electricity as already adopted by the neighbouring State Himachal Pradesh, where State Government has distributed four Compact Fluorescent Lamps (CFL) per household to control the power consumption thereby saving the generated power and selling it to the power deficient states at slightly higher rates. He again submitted that the increase in residential tariff from Rs. 2.20/kWh to Rs. 2.64/kWh is completely unjustifiable. Moreover, it was further submitted that the increase in commercial tariff in the range of Rs. 0.64/kWh to Rs.0.78/kWh over the existing tariff is completely unjustifiable.

Shri R.N.Mathur, President, Mussoorie Hotel Association submitted that the proposed increase of 64 Paisa/kWh from Rs. 2.00/kWh to Rs. 2.64/kWh, within a span of six months is exorbitant and the domestic consumers will be overburdened. He also opposed the proposed increase of fixed charges from Rs. 20 to Rs. 24 per connection as the same would put additional burden on the consumers, who have already taken up higher loads based on their requirement. Further, he suggested that the fixed charges should be based on per connection instead of per kW of load as proposed by UPCL.

State Licensee Electrical Contractors Association, Uttarakhand submitted that BPL and 'Kutir Jyoti' consumers are availing the advantage of the subsidy given by the Government and requested that these categories should not be provided the benefit of reduced tariff.

Shri Narendra Pal Singh, Consumer Care Consultancy, Rishikesh, submitted that there should not be any increase in tariff as it has been recently increased in the month of October 2009.

Lok Seva Samiti submitted that the proposed requirement for increase in tariff is towards the unreal revenue losses incurred by UPCL by its dishonest corporation staff.

Shri Gopal Singh Rawat, MLA, Uttarkashi submitted that the tariff for Snow bound consumers should be further reduced. Several other objectors also submitted that in Snow bound areas, due to extreme climate conditions (due to heavy snow there are various disturbances such as tripping of lines, etc.), power supply is effectively available for only 6 months in a year. Hence, the minimum charges and fixed charges for consumers in Snow bound areas should be waived for six months of the year.

Several Objectors from Uttarkashi submitted that electricity should be given free of cost to consumers in Uttarkashi area and if it is not possible to provide free electricity, then tariff should be reduced to 50% of the existing tariff. They also added that under the earlier UPSEB tariff structure, consumers in hilly areas were getting a Hill Rebate and as most of the hydel power generation is located in Uttarkashi, the consumers of Uttarkashi should get some benefit in tariff, since they have had to be re-settled and sacrifice their land at low rates and currently staying in an earthquake prone area due to construction of dams.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. supported the Petitioner's proposal for provision of fixed charges in RTS-1 category on the basis of contracted load.

3.1.1.2 Petitioner's Response

As regards the contention raised by several objectors that since the tariff has been revised recently, the same should not be increased again, the Petitioner submitted that due to delay in the submission of the Petition for the determination of ARR and retail tariff for FY 2009-10, the revised tariff rates had been applicable for only six month time period starting from October 01, 2009 vide Tariff Order dated October 23, 2009. Moreover, in accordance with the provisions of the Electricity Act, 2003, the tariff has to be determined each year and the increase in tariff has been proposed to meet the projected revenue gap during FY 2010-11.

As regards the suggestions of the objectors regarding distribution of CFL, UPCL submitted that the scheme of distribution of CFL is under consideration and sincere efforts are being taken to implement the scheme as soon as possible. The Petitioner further added that instead of distribution of CFL free of cost, CFL should be purchased and used as this would be beneficial to consumers as well as it would reduce the power consumption thereby reducing the electricity bills.

As regards the contention raised regarding the connection and subsidy to BPL and 'Kutir Jyoti' consumers and misuse of electricity by them, the Petitioner submitted that the connections to consumers of this category are released only when the consumers under BPL and 'Kutir Jyoti' satisfy the Government notified norms. Moreover, if any misuse of these benefits is observed, the same may be informed to the Petitioner by the Association. The Petitioner will take the necessary immediate actions and for consumers found to misuse the benefits, the concerned consumers will be disqualified for such benefits.

As regards the contention raised by Shri Gopal Singh Rawat, MLA, Uttarkashi, the Petitioner submitted that no increase has been proposed in Snow bound areas and also no fixed charge or minimum charge has been proposed for this consumer category. However, only energy charge has been proposed and hence in case of no energy consumption for the period of six months, consumers will not be liable to pay any charges.

As regards the contention raised by AICC regarding the increase in fixed charges, the Petitioner submitted that in accordance with section 45(3) of the Electricity Act, 2003, the Distribution Licensee is entitled to charge a fixed charge in addition to the energy charges. The Petitioner further submitted that it has proposed two part tariff for FY 2010-11 considering its ARR for the year and the proposed increase in tariffs is required to meet the expenses essential for carrying out various activities related to the distribution of electricity in the State. In case, fixed charges are reduced, rate of energy charges per unit shall be increased. The Petitioner further clarified that the fixed charges for domestic consumers having load above 4 kW have also been proposed at Rs. 24/kW/month.

As regards the contention raised by Mussorrie Hotel Association, the Petitioner submitted that the load in domestic category typically varies mainly from 0.5 kW to 10 kW and considering the same, fixed charges in domestic category has been proposed on per kW of load basis, so that the consumer using more load should pay more fixed charge.

3.1.2 *Special Tariff*

3.1.2.1 Stakeholders' Comment

Shri Gopal Singh Rawat submitted that the consumers who are residing at border areas and who have provided their land for hydel power plants should be provided electricity without any charge.

3.1.2.2 Petitioner's Response

The Petitioner submitted that it is an organisation which has to optimise its expenditure from the revenue earned by way of tariff rates. Tariff rates are decided under the provisions of the Electricity Act, 2003. Moreover, it submitted that in accordance with the decisions taken by the State Government, the tariff rates applicable for PWD, residential as well as Government employee consumers have been considered at lower level.

3.1.3 *Categorisation of consumers*

3.1.3.1 Stakeholders' Comment

Some of the objectors submitted that categorisation of the consumers on the basis of purpose is unjustifiable, even though the product being sold is the same. They further submitted that in all other businesses, the products are different, but the same product is sold at the same rate to all the consumers and, accordingly, requested the Commission that there should be a single tariff category, with higher tariff for higher consumption.

3.1.3.2 Petitioner's Response

The Petitioner has not submitted any comment on this issue.

3.1.4 *Miscellaneous*

3.1.4.1 Free Electricity in border areas in Uttarkashi area

3.1.4.1.1 Stakeholders' Comment

Shri Gopal Singh Rawat, MLA, Uttarkashi, submitted that some villages from Uttarkashi area are on China and Tibet border area and the people in those areas live in extreme conditions as border guards. So, these selected villages should be provided electricity free of cost.

3.1.4.1.2 Petitioner's Response

The Petitioner submitted that in accordance with decisions taken by the State Government, the tariff rates applicable for PWD, residential as well as the Government employee consumers have been considered at lower level.

3.1.4.2 Reduction in Load Shedding

3.1.4.2.1 Stakeholders' Comment

Shri Gopal Singh Rawat, MLA, Uttarkashi submitted that the monthly maximum consumption of Uttarkashi is 8 MW to 9 MW. As, there are no heavy industries in this area and the electricity consumption is only for the essential purpose, the load shedding in this area should be abolished. Vidyut Upabhokta Sangh, Pachhwadun also supported that there should be no load shedding.

3.1.4.2.2 Petitioner's Response

As regards the contention raised by objectors regarding load shedding, the Petitioner submitted that it is continuously trying for reliable and quality power supply to its consumers. However, during deficit situations, it has to purchase power from the Grid under UI mechanism and other sources in the open market and the purchase rate for this power is around Rs. 7.35/kWh. Accordingly, in case of unavailability of power from the Grid during deficit situations, load shedding is carried out sometimes. The Petitioner further submitted that the load shedding protocols are being approved by the Commission from time to time which is being adhered by the Petitioner and in the current load shedding protocols, load shedding in the hilly area has been approved at minimum level.

3.1.4.3 Street Light Operation

3.1.4.3.1 Stakeholders' Comment

Shri Arun Kumar, President, RTI Club, Uttarakhand submitted that the street lights should be operated from a single source. He submitted that street lights are often found in switch on mode and also objected the practice of switching off by the employees of UPCL in such case on pole by pole basis. To prevent such practices, he suggested that that UPCL should ensure that street lights of every area should be operated from the sub-station directly to prevent losses.

3.1.4.3.2 Petitioner's Response

The Petitioner submitted that in accordance with the Order issued by the Commission, a sum of Rs. 10/light point per month is chargeable from Local Bodies (Nagar Nigams) for operation and maintenance of street lights. However, in cases where the operation and maintenance of street lights is being done by local bodies, no maintenance charge is being charged from them by the Petitioner.

As regards the contention raised by the objector regarding finding street lights in switch on condition, the Petitioner submitted following reasons:

- Nagar Nigams switch on the light for replacement of bulbs and for testing purposes etc.
- Nagar Nigams have installed street lights on some colonies/places. The responsibility to switch-off these street lights was with the residents on whose request Nagar Nigam have installed these lights however these residents do not switch off the same in time and therefore, sometimes the lights are found in switch-on condition during day time also.

3.1.4.4 Distribution System Improvement

3.1.4.4.1 Stakeholders' Comment

Galwalia Ispat Udyog Ltd. as well as Khatema Fibres Ltd. submitted that the current Petition filed by the Petitioner does not indicate whether any concrete/innovative steps have been taken by the Licensee for distribution system improvement.

3.1.4.4.2 Petitioner's Response

The Petitioner submitted that it has provided all the necessary details with action plan for distribution system improvement in the ARR and Tariff Petition for FY 2010-11.

3.1.4.5 Faulty Meters

3.1.4.5.1 Stakeholders' Comment

Shri Satpal Maharaj, Member of Parliament (Lok Sabha) and Shri Virendra Singh Kandari, Aagrakhal pointed that on account of non-replacement of the faulty meters by UPCL, consumers are getting incorrect and exorbitant bills and further suggested that the consumers should be allowed to change the meters themselves and for such consumers, the meter rents should be exempted from respective electricity bill.

Shri Narendra Singh Kandari, Rudraprayag stated that the consumers of the rural area either have not been provided meters or have been provided with inferior quality of energy meters and, hence, they have to pay around Rs. 400 to 500 per month on account of meters Not Read (NR). Apart from this, consumers also have to pay Rs. 30 per bill as meter rent, which is unjustifiable. He also submitted that UPCL should be held responsible and electricity court/camp should be held on panchayat level and the amount charged towards NR should be returned to the poor consumers and monthly rent should also be abolished.

3.1.4.5.2 Petitioner's Response

As regards the contention raised by Shri Narendra Singh Kandari, the Petitioner submitted that in accordance with the prevalent rules, there is a provision of regular meter reading to all the consumers. However, on account of insufficient staff for meter reading in some of the areas, sometimes the meter reading of some of the consumers cannot be done. Further, the Petitioner submitted that additional manpower has been employed on contract basis to carry out 100% meter reading and moreover, in case of receipt of any such complaint of non-reading of meter, the meter reading is carried out in the same month only. In case of non-reading of meter, the bills are being prepared in accordance with prescribed rule of the Commission.

As regards the contention raised by Shri Narendra Singh Kandari regarding abolishment of meter rental, the Petitioner submitted that in accordance with the prevalent tariff as approved by the Commission, meter rental is not payable and, hence, the same is also not being charged in the monthly electricity bill. The Petitioner further submitted that it has also not proposed any meter rent charge for FY 2010-11.

The Petitioner further submitted that the Regulation 3.1.1(2) of UERC (The Electricity Supply Code) Regulations, 2007, has made following provision:

> *"The Licensee shall use meters complying with CEA regulations referred at sub-regulation (1) above for energising new connection or for replacement of meter. The consumer, if he so desire, may procure meter conforming to the CEA regulations referred in sub-regulation (1) above but the Licensee shall test, install and seal the meter."*

In accordance with the above provision, the consumer can purchase its own meter in conformity with the standards laid down by the CEA and submit it to UPCL for installation in its own premises. The Petitioner further clarified that there is no such provision of providing any reduction in the consumer bill in case the meter is made available by the consumer.

3.1.4.6 Free Power to the UPCL Departmental Employees

3.1.4.6.1 Stakeholders' Comment

Shri B.P. Verma, Chief Electricity Distribution Engineer from Northern Railway submitted that all the departmental employees of UPCL are un-metered and free power is being given to them at the cost of general public which is unjustified.

Shri Arun Kumar, President, Resident Welfare Association, Uttarakhand submitted that whereas the normal consumer is paying heavily for the electricity tariffs, the employees of UPCL are being charged bare minimum of Rs. 65 to Rs. 425 per month irrespective of their electricity consumption. He also suggested that the employees of UPCL should be given some benefit only for first 100 units per month and consumption of more than 100 units per month should be charged at normal tariff applicable for residential category.

Lok Seva Samiti submitted that the almost free and limitless electricity to UPCL employees should be abolished.

Shri R.N. Mathur, President, Mussoorie Hotel Association submitted that the employees of Himachal Pradesh Electricity Board are treated as normal consumers and if same pattern is followed in Uttarakhand, it also will increase the revenue and will reduce the burden on all categories of consumers in the State.

3.1.4.6.2 Petitioner's Response

The Petitioner submitted that it does not agree with the contention raised regarding metering for departmental employees and further clarified that 100% metering of departmental connection has been achieved. Further, on the issue of free supply to employees, UPCL submitted that employees are being charged at normative rates for their consumption. However, it is in process to evolve a mechanism to reimburse the cost of electricity consumed by the employees.

As regards the contention raised by Shri Arun Kumar, the Petitioner submitted that the employees of UPCL are being given the facility of departmental electricity connection since U.P. State Electricity Board (UPSEB) was in existence and under this facility, a fixed lump-sum amount is charged from the employees according to their designation towards electricity charges for electricity supplied to them. UPCL added that erstwhile UPSEB was unbundled under the provisions of Uttar Pradesh Electricity Reforms Act, 1999 and section 23(7) of the said Act provides "terms and conditions of service of the personnel shall not be less favourable to the terms and conditions which were applicable to them before transfer" and the same spirit has been echoed under first proviso of section 133(2) of the Electricity Act, 2003. The benefits for employees/pensioners as provided in section 12(b)(ii) of the Uttar Pradesh Reform Transfer Scheme, 2000 include concessional rate of electricity to the extent it is not inferior to what existed before January 14, 2000. The rates and charges indicated above for this category are strictly in adherence of above statutory provisions. UPCL further added that as it is the successor entity of UPPCL (formed as a result of unbundling of UPSEB), the above legal provisions are also applicable on it. UPCL also submitted the electricity charges schedule for departmental employees as under:

Table 3.1: Electricity Charges Schedule for Employees

Sr. No.	Category/Status of Employees/Pensioners	Rate of Charge (Rs. per Month)
1	Class-IV employees & Operating Staff	65
2	Class-III employees	100
3	Junior Engineers & equivalent posts	180
4	Assistant Engineers/ Executive Engineers & equivalent posts	250
5	Deputy General Manager & equivalent posts	350
6	General Manager & equivalent posts and above	425
7	Additional Charges for Air Conditioner (payable for the period from May to August every year)	200/Installed A.C.

3.2 Non Domestic Tariff

3.2.1 *Stakeholders' Comment*

Shri Ram Kumar of Mussoorie Hotel Association, Mussoorie (MHAM), Shri G.S. Manchanda of Hotel India and others submitted that the Minimum Consumption Guarantee (MCG) of 75 units per kW per month as approved by the Commission for RTS-2 category consumers (for load > 25 kW) is unjustifiable as neither UPCL has demanded for the same nor the consumers in turn were provided an opportunity to comment on this charge.

MHAM further submitted that under RTS-2 consumers (who have load more than 25 kW) are mostly hoteliers catering to the tourism industry in the State and have submitted the resentment letter dated November 25, 2009 on which the necessary action is yet to take place.

Shri R.N. Mathur, President, Mussoorie Hotel Association submitted that the proposed MCG of 75 units per kW per month for RTS-2 consumers as mentioned on UPCL website as "All units exceeding 200 units". The same fact is nowhere mentioned in the Public Notice issued by UPCL in newspapers which tantamounts to concealment of certain facts from the consumers. Therefore, the proposed MCG by UPCL in this category should not be considered. Further, he submitted that the increase in tariff would directly affect the tourism industry of the State and make the industry incompetent.

MHAM submitted that the State being a hill State, the hoteliers have the seasonal business, with peak season for only two months in a year and for rest of the year the utilisation of hotels are around 0% to 40%. MHAM further submitted that on account of MCG and during the off-peak season, hoteliers will have no other alternative than to misuse and waste the available power which is available to it @ Rs. 3.90/kWh, whereas UPCL has to purchase the same quantum from outside agencies @ Rs. 6.22/kWh.

Hotel Association, Srinagar, Pauri Garhwal submitted that the tourism season is for the month of May and June only in Uttarakhand and after that in off-season, it is very difficult for consumers to pay the electricity bill. It also added that the increase in per unit rate and at the same time levying MCG charge is not justifiable, so MCG charge levied on Commercial Establishments should be abolished.

MHAM further submitted that the Commission in the past has approved a rebate of Rs. 75/month per 100 Litre capacity of solar system installed by the consumer. It was further submitted that the consumers who have spent large amount on the installation of solar system have been deceived, as their investment on the system has become infructuous.

3.2.2 *Petitioner's Response*

As regards the contentions raised by several objectors regarding MCG charge as a fixed charge, the Petitioner submitted that in accordance with section 45(3) of the Electricity Act, 2003, the Distribution Licensee may charge a fixed charge for electricity supply in addition to the charges for actual electricity supplied.

As regards the contention raised regarding MCG charge in non-domestic category, the Petitioner submitted that the same has been proposed at very low level of consumption i.e., at 10% load factor. In case during certain months, actual consumption is less than MCG, MCG is charged in those months. But the months, in which actual consumption is more than MCG, the charges due to MCG in other months of the year are adjusted from such excess consumption over actual consumption.

3.3 Industrial Tariff

3.3.1 *Categorisation of Atta Chakki as LT Industry*

3.3.1.1 Stakeholders' Comment

Smt. Veena Rani Goyal submitted that categorization of *Atta Chakki* under LT Industry category is not appropriate as it is a very small commercial unit and generally owned by middle class traders. *Atta Chakki* should not be kept under the LT industry category and should be brought under commercial category. She further submitted that there should be only single part tariff charging actual consumption for *Atta Chakki* and there should not be any other charges and levies.

3.3.1.2 Petitioner's Response

As regards the contention raised by the objector regarding categorisation of consumers, the Petitioner submitted that in accordance with section 62(3) of the Electricity Act, 2003, consumers can be differentiated according to the consumers' 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. Accordingly, fixation of separate tariff for LT industry is in accordance with the provisions of law. The Petitioner submitted that since the *Atta Chakkis* are of processing/industrial nature, it is appropriate to keep it under Industrial category. Moreover, it submitted that two part tariff i.e. fixed charges along with energy charges has been in force for LT industrial consumers since long-time and fixed and energy charge were also applicable in erstwhile UPSEB and UPPCL in undivided Uttar Pradesh.

3.3.2 ***Tariff for Industries***

3.3.2.1 Stakeholders' Comment

Shri Rajiv Ghai, President, KGCCI submitted that as regards the current ARR and Tariff Petition is concerned, the rate schedule of RTS-7 is not in conformity with and in compliance to the statutory provisions of section 61 of the Electricity Act, 2003, UERC Tariff Regulations, Tariff Policy and the directions given in the Judgments of Hon'ble ATE dated June 2, 2006, June 6, 2007 and October 6, 2009.

He also submitted that the current Petition is deficient in many areas and quoted that the Hon'ble ATE in its Judgment dated June 2, 2006 had directed to determine the category-wise loss data for determining the cost of supply to RTS-7 and must be furnished in future filings of ARR. He further quoted that inspite of lapse of more than four and half years, UPCL has not furnished the category-wise loss data in any of the ARR and Tariff Petitions.

Shri Rajiv Ghai, President, KGCCI submitted that tariff determination continues to be faulty as the actual cost of supply is not known and the direct consequence thereof is that the consumers falling under RTS-7 are penalised as they have been burdened with the exorbitant rates which are disproportionately high. Moreover, the technical and commercial losses in case of HT industries are only marginal and they cannot be equated with the losses of other categories. He further submitted that the Commission should consider the above aspect of low T&D losses for industrial category, which are around 5%, while determining the tariff for FY 2010-11.

Khatema Fibres Ltd. submitted that the proposed higher flat fixed charge tariff on unmetered supply connections in RTS-1 and RTS-4 categories should be considered to discourage the unmetered supply which is resulting into uncontrolled use of electricity on such categories. It further submitted that the existing provision of allowing the additional process of rice huller and cane crusher in RTS-4 categories should be reviewed as in the name of additional process, industrial use is being made by certain consumers avoiding payment of high electricity charges and also electricity duty to the Government on the consumption. Moreover, it has been submitted that the process of rice huller and cane crusher are exclusively industrial processes and should be covered in tariff schedule RTS-7 only instead of RTS-4 category.

Vidyut Upabhokta Sangh, Pachhwadun submitted that legitimate tariff should be fixed for rice mills as it is a seasonal business.

Prantiya Industries Association (PIA), Uttarakhand, submitted that the Commission should consider providing the incentives to the small industrial units which are already burdened with the high cost of production.

3.3.2.2 *Petitioner's Response*

As regards the contention raised by the objector that the RTS-7 category is not in conformity with the statutory provisions of section 61 of the Electricity Act, 2003 and UERC Regulations, the Petitioner submitted that the ARR and Tariff Petition for FY 2010-11, submitted by it, is in accordance with the provisions of Electricity Act, 2003 and Rules and Regulations made thereunder.

As regards the contention raised regarding category-wise loss data, the Petitioner submitted that presently, it is not in a position to compute the voltage-wise losses and, therefore, it uses overall system losses for all categories of consumers. Going forward, UPCL has taken steps to evolve a mechanism to compute the voltage-wise losses and determine voltage-wise cost of supply/service. Based on evaluation of such system, losses and cost of supply shall be computed accordingly.

As regards the contention raised regarding losses considered for HT industries, the Petitioner submitted that it has considered 15% distribution losses for HT categories and 33.46% distribution losses for LT categories, in accordance with figures approved by the Commission in its Order dated October 23, 2009.

As regards the contention raised regarding categorisation of rice huller and cane crusher under RTS-7 only instead of RTS-4 category, the Petitioner submitted that the Commission may consider the same.

As regards the request for seasonal tariff for rice mills, the Petitioner submitted that the rice mills have been categorised under RTS-7 (seasonal industries) category in its Petition for tariff for FY 2010-11 and some reliefs have already been provided to seasonal industries in off-season like previous year provision.

3.3.3 *Exorbitant Tariff Increase*

3.3.3.1 Stakeholders' Comment

Kashi Vishwanath Steels Ltd. (KVSL) as well as Flex Foods Limited submitted that the proposed increase of 20% in demand charges and in energy charges is not justifiable. The industries are not in a position to sustain any financial burden on this account. The respondent requested the Commission not to accept any increase in tariff in case of HT industries.

Doon Valley Distillers, Dehradun submitted that the UPCL's proposal to increase the industrial tariff by 20% in FY 2010-11 is unjustifiable, when the quality of service is still poor. The proposed tariff for industries will definitely ruin the financial conditions of industries in Uttarakhand and with this increase in industrial tariff, already burdened industries will be forced to quit the businesses in the State. It was further suggested that UPCL should take firm and strict actions against the theft of power.

Star Diagnostics Pvt. Ltd. (SDPL) submitted that the proposed increase of about 20% in the electricity tariff from last year is not justified considering the regional and industrial development. Since the industries are facing the recession from last year, the increase in the tariff will increase the production cost of industries thereby weakening the Uttarakhand industries in the Industrial Market Competition. SDPL also added that for the development of Uttarakhand, UPCL should work on operational efficiency and controlling the electricity wastage.

KGCCI submitted that whatever approach may be taken; there is no justification of revising/increasing the present tariff for RTS-7 category. KGCCI further submitted that it would be case of reduction of existing rates when the Appeal of KGCCI against the Tariff Order dated October 23, 2009 is finally heard and considered by the Hon'ble ATE.

Shri Pankaj Gupta, President, Industries Association of Uttrakhand submitted that the power tariff cannot be subjected to cyclic ups and down. It is a very important parameter of growth and many projections and plans are based on steady cost of power.

Shri S.K. Singh of Shivalik Rasayan Ltd. submitted that UPCL has already increased the tariff in past one year by 30% to 35% increasing the cost of production and further tariff increase in such a short span of time will make the industry unviable since the industry has biggest competition from Chinese manufacturers where there has been no price increase on their product in past two years except due to the change in US Dollar exchange rate.

Prantiya Industries Association (PIA), Uttarakhand, submitted that the proposed increase in power tariff just after six months does not find feasibility of acceptance and is being strongly opposed for its implementation. However, PIA suggested that the Power Tariff may be increased by 5% if it becomes inevitably necessary.

Shri Shubham Maheshwari, Director, Shashwat Cables Pvt. Ltd., Dehradun submitted that he is operating a Small Scale Industry (SSI) unit in the State of Uttarakhand and since the inception of its production it has been facing the problems of the non-availability of power and low voltage. He also submitted that being an SSI Unit it has to operate on very thin margin. He further submitted that the last tariff increase of 15% in October 2009 took care of the revenue gap of earlier 6 months period also and an additional cushion of 7.5% has already been created in the tariff.

Vidyut Shakti Upabhokta Sangh, Dehradun requested the Commission not to increase the tariff for industries.

3.3.3.2 Petitioner's Response

As regards the contention raised by several objectors regarding frequent revision in the industrial tariff, the Petitioner submitted that the tariff increase in FY 2009-10 were implemented w.e.f. October 1, 2009 due to delay in submission of ARR Petition and that increase has been approved by the Commission for the period up to March 31, 2010. It is, therefore, necessary to propose the new rates applicable from April 01, 2010. The Petitioner further submitted that the tariffs for FY 2010-11 have been proposed considering its projected ARR and revenue gap for the year. The proposed increase in tariffs is required to meet the expenses essential for meeting the power purchase expenses and genuine expenses for running various activities related to the distribution of electricity in the State. The Petitioner further submitted that it has designed the category-wise tariffs on the basis of average cost of supply (maintaining cross-subsidy level as per law) and also keeping in view the Policy Directions issued by the State Government under section-108 of the Electricity Act, 2003.

3.3.4 *Peak/ Off Peak Hour Tariff*

3.3.4.1 Stakeholders' Comment

KVSL submitted that morning peak hours of 6:00 AM to 9:30 AM in winter season should be abolished. The additional charge to the extent of 50% during peak hours consumption should be reduced to 25% only.

As regards the peak hour tariff, Industries Association of Uttarakhand submitted that UPCL has under-estimated the revenue from peak hour surcharge, continuous supply charge and MCG charge at Rs. 68.89 Crore. The revenue from these components of tariff will be around Rs. 150 Crore.

3.3.4.2 Petitioner's Response

The Petitioner submitted that during winters, the State Generation reduces substantially and the heating load in the evening as well as in the morning enhances substantially. To overcome this deficit situation, it is necessary to have morning peak during winter season.

As regards the contention raised by several objectors regarding peak hour charges, the Petitioner submitted that it is continuously trying for the reliable and quality electricity supply to its consumers but during deficit situations, the Petitioner purchases power from the Grid under UI mechanism and the rate of this power is up to Rs. 7.35/kWh and after incorporating the losses, this rate amounts to Rs. 10/kWh. Accordingly, higher energy charges of 50% during peak hours are justified.

As regards the contention raised regarding the revenue estimation from peak hour surcharge, continuously supply charge and MCG charge, the Petitioner submitted that it is in the process to submit the desired data to the Commission in the matter.

3.3.5 *Power Supply Rebate*

3.3.5.1 Stakeholders' Comment

KVSL submitted that the proposed rebate of 1.5% should be increased to 2.5% for the consumers receiving supply at 33 kV. Further, the proposed rebate of 2.5% should be increased to 5% for the consumers receiving supply at 66 kV and 132 kV considering the fact that the investment for construction of 132 kV line is done by the consumers, which subsequently becomes the property of the Petitioner and on this supply, the line losses amounts to less than 1% (one percent) as against average line losses of 24% as proposed by the Petitioner.

3.3.5.2 Petitioner's Response

The Petitioner submitted that the rebates for availing supply at voltage higher than the base voltages have been proposed keeping in view the estimated losses between the levels of supply voltages. The tariff of various categories is fixed according to average cost of supply (maintaining cross-subsidy level as per law) and considering the Policy Directions issued by the State Government under section 108 of the Electricity Act, 2003. The Petitioner further added that in case, quantum of rebate is enhanced, the base prices of tariff would have to be increased.

3.3.6 Demand Projections for HT Industries

3.3.6.1 Stakeholders' Comment

Shri Rajeev Ghai, President, Kumaun Garhwal Chamber of Commerce & Industry (KGCCI), Uttarakhand submitted that the assumption of increase in projected demand for HT industries by 12.28% is arbitrary and misleading. He submitted that the Commission in the Tariff Order dated October 23, 2009 has also stipulated that the rate of addition of new industries is expected to go down since the concessional package of incentives for industries in the State of Uttarakhand is going to expire on March 31, 2010 and, accordingly, approved the growth rate of 7%. Therefore, there is hardly any scope of growth rate even at 7%. Accordingly, it was submitted that even considering the growth rate as 7%, the energy requirement would be 3354.70 MU leaving a surplus of 165.55 MU resulting in surplus in revenue. Further, due to the increase in power tariff w.e.f. October 01, 2009, the consumption of electricity by the industries has reduced substantially in the recent past.

3.3.6.2 Petitioner's Response

The Petitioner submitted that the annual growth in consumption of HT industry during FY 2008-09 has been registered at 31%. Keeping in view the various factors including those mentioned by the stakeholders, the Petitioner in its ARR and Tariff Petition has proposed only 12% growth in this category during FY 2010-11.

3.3.7 *Monthly Demand/ Fixed charges*

3.3.7.1 Stakeholders' Comment

Shri Lakhiram Singh Sajwan submitted that fixed charges are charged from the consumers even if no electricity is supplied to those units. The respondent requested that LT and HT industries should only be charged energy charges on the basis of the units consumed. Further, the amount recovered from LT and HT industries by levy of fixed charges and MCG charges should be refunded.

KVSL submitted that the proposed 20% increase in Demand Charges in completely unjustifiable and requested the Commission to disallow the same in view of the weak economic conditions of the industries in the State.

Shri Virendra Singh Kandari stated that small scale industries like *Atta chakki* and other continuous industries should be exempted from the fixed charges and should be billed according to the actual consumption only.

PIA, Uttarakhand submitted that the concept of imposing fixed charge is not very clear and the same should be abolished.

Vidyut Upabhokta Sangh, Pachhwadun submitted that consumers having load between 10 HP to 15 HP should not be charged any fixed charge.

Several objectors in Uttarkashi also submitted that in any other business, there is no fixed charge and only if the product is sold, there is payment; hence, there should be only energy charges.

3.3.7.2 Petitioner's Response

As regards the contentions raised by several objectors regarding fixed charge, the Petitioner submitted that in accordance with section 45(3) of the Electricity Act, 2003, the Distribution Licensee may charge a fixed charge for electricity supply in addition to the charge for actual electricity supplied.

The Petitioner further added that around 50% of its total costs are fixed in nature including the capacity/fixed charge of power purchase, which should be recovered to a certain extent through fixed charge to ensure revenue stability and in the absence of fixed charge, energy charges will have to be increased substantially.

3.3.8 *Minimum Consumption Guarantee (MCG) charges*

3.3.8.1 Stakeholders' Comment

Smt Veena Rani Goyal submitted that there is no justification for MCG charges as there is no surplus electricity with UPCL and no electricity should be wasted. The fixed charges were abolished in the past and these charges should be abolished as there is no justification for levy of these charges.

Shri Lakhiram Singh Sajwan submitted that MCG charge of Rs. 200 per kW per month levied to the small industries is completely unjustifiable and should be abolished and they should be reimbursed with the previously paid MCG charge.

Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that from the scrutiny of UPCL's Petition, it is observed that no data has been provided in respect of MCG charge. Moreover, details of revenue collected have also not been provided. Accordingly, Industries Association of Uttarakhand requested the Commission to remove MCG as this amounts to moving back to the era prior rationalisation.

Bhagwanpur Industries Association has submitted that due to load shedding of about 6 hours per day and the tripping from 10 am to 12 noon on regular basis, industrial consumers are not even able to recover the complete MCG. It has also asked the Commission to link MCG with the availability of the power to the industrial consumers. If UPCL is able to provide the power for 24 hours then complete MCG should be charged, otherwise it should be charged on pro-rata basis according to the availability of supply.

PIA, Uttarakhand submitted that the industries in Uttarakhand are already facing the financial burden due to the sluggish market conditions and are operating below minimum guarantee levels but are managing to pay the minimum guarantee tariff. Therefore, in view of the precarious condition of industries, the MCG charges should be reduced.

Syncom Healthcare Ltd. submitted that despite the daily power cut of 4 to 5 hours, the excess charges by way of MCG are not justified and it further submitted that it has to run the Diesel Generator (DG) set during power cut and, hence, incurring the diesel cost to run DG set and paying MCG charge simultaneously is completely unjustified.

Hotel India, Mussoorie submitted that to economise the use of power it has installed Solar System at the cost of Rs. 2.00 Lakh and also use CFL bulbs however, all such efforts to save power has been nullified by imposing MCG. It was further submitted that in addition to fixed charges of Rs. 20/kW, MCG @ 75 units per kW of contracted load (in excess of 25 kW) is a double charge for the same cause.

Hotel India, Mussoorie also suggested some amendments in the decisions regarding MCG charge as under:

- Benefits of exemption of 25 kW load to be extended to all the stakeholders;
- Consumers having load more than 25 kW load to be charged only for the additional load;

Vidyut Shakti Upabhokta Sangh, Dehradun submitted that small industries should be kept free from MCG charge.

Shashwat Cables Pvt. Ltd. submitted that since the power load has to be in accordance with the installed machine capacity, which is more than the regular demand, it is resulting in penalty of MCG charge in addition to the Fixed Demand Charges. They requested the Commission to review the tariff rates and MCG charges for the SSI.

Shri Joshi of Tata Motors submitted that normally MCG charge is suitable, while single tariff is utilised like agreement between Independent Power Producers and consumers. In such cases, MCG charge is adopted by the generating company to recover fixed component cost even though power is not utilised by consumers. He submitted that the concept of MCG charge in two part tariff structure is against the provisions of the Electricity Act, 2003 and National Electricity Policy, 2005 (NEP), which stipulates to encourage open access and captive generation. Presence of MCG in tariff structure restricts the utilisation of open access as it is essential for consumers to pay fixed amount towards energy charges whether energy is utilised or not and requested the Commission to abolish the MCG charge.

3.3.8.2 Petitioner's Response

As regards the contention raised by the several objectors including Shri Sudhir Naithani, President, Vyapar Sangh and Hotel Association, Srinagar, Pauri Garhwal, regarding MCG, the Petitioner submitted that in accordance with section 45(3) of the Electricity Act, 2003, the

Distribution Licensee may charge for electricity supply, a fixed charge in addition to the charge for actual electricity supplied.

The Petitioner further added that around 50% of its total costs are fixed in nature including the capacity/fixed charge of power purchase, which should be recovered to a certain extent to ensure revenue stability. In case of low consumption, below certain level, fixed expenditures are not recoverable from consumers. Under these circumstances levy of MCG charge is a way of ensuring minimum revenue to the Licensee from the consumers.

As regards the contention raised regarding MCG charge in LT industry, the Petitioner submitted that the same has been proposed at very low level of consumption, i.e. at 10% load factor. In case during certain months, actual consumption is less than MCG, MCG is charged in those months. But the months, in which actual consumption is more than MCG, excess consumption charged due to MCG in other months of the year are adjusted from such excess consumption over actual consumption.

As regards the contention raised regarding MCG charge by Bhagwanpur Industries Association, the Petitioner submitted that it is continuously trying for the reliable and quality electricity supply to its consumers but during deficit situations, the Petitioner purchases power from the Grid under UI mechanism at the rate of Rs. 7.35/kWh. Accordingly, in case of unavailability of power from the Grid during deficit situations, load shedding is carried out sometimes. The Petitioner has further submitted that the load shedding protocols are being approved by the Commission from time to time, which is being adhered to by the Petitioner and, accordingly, considering the prevalent load shedding protocols, load shedding in the hilly area has been approved at minimum level.

3.3.9 ***Continuous power to industries***

3.3.9.1 Stakeholders' Comment

KVSL submitted that levy of 10% higher charges for supply during restricted hours/load shedding is against the spirit of the Electricity Act, 2003. Section 62(3) of the Electricity Act, 2003 specifies that the Appropriate Commission shall not show undue preference to any consumer for electricity. The respondent submitted that the Petitioner cannot differentiate between consumers subject to load shedding and consumers exempted from load shedding and charge differential tariff.

Khatema Fibres Ltd. submitted that the provision in RTS-7 for continuous supply option now appears reasonable as it is really discouraging for intentional use of higher load during restricted hours without opting for continuous supply.

3.3.9.2 Petitioner's Response

UPCL submitted that the "Continuous supply option" is at the choice of the consumers, which is an extra service to the consumers and such choice has been provided only to the industrial consumers. Other categories are not provided with this option. UPCL further added that for ensuring the continuous power supply to the industrial consumers, who have opted for it, UPCL is required to contract the capacity with generating stations and for which the fixed charges for the entire year are payable. If the capacity is not contracted to ensure continuous supply, the additional energy required during the load shedding period will have to be procured through short-term trading or from non-firm sources at very high rates. If the power is procured on short-term basis and the impact of the same is to be passed on to only those consumers, who have opted for continuous supply during the period of load shedding, the additional charges to be levied will be more than 100% of normal energy charges considering the prevalent short-term trading rates in the market. UPCL further submitted that in addition to ensure the continuity of supply to these consumers in deficit periods, it has also to make bilateral arrangements for ensuring power supply throughout the year, which involves additional power procurement costs, but difficult to be apportioned to consumers opting continuous power supply due to various factors, mentioned hereinabove.

As regards the charges for continuous supply, the Petitioner referred para-5.7 of the Commission's Review Order dated January 23, 2009, which stipulates as under:

"5.7 Levy of 20% higher charges for supply during restricted hours / load shedding

A: Commission's View

5.7.1 The provisions of the Clause under "restriction in usage" stipulated in the impugned Order were same as the provisions in previous Tariff Orders right from the first Tariff Order dated 08.09.2003 and continued to be applicable till 29.02.2008. The said provisions were never challenged *and in the present Tariff Order, the Commission only clarified the provision with regard to the period of applicability of 20% higher charges. These provisions were never invoked till 2006-07, when restriction in usage was approved by the Commission for the first time for the period 09.01.2007 to 15.03.2007. Five industries that opted for continuous supply during this period have been billed and also have paid 20% higher charges for the entire year 2007-08 including the period when there was no restriction. No industrial consumer challenged this provision.*

5.7.2 Commission would like to emphasize that getting continuous supply by paying 20% higher charges is optional. Out of 154 industries that had opted for continuous supply as on February 2008 only about 40 industries opted out when option was given. Commission, in its order on penalty for excess usage of power during restricted period of 2007-08 dated 24th July 2008, again permitted such industries to opt out and only 07 industries opted out and 117 industries have still opted for continuous supply by paying 20% higher energy charges. Commission would also like to impress upon the fact that many industries which are operating in single shift and do not have continuous process have also opted for continuous power and are paying 20% higher energy charges amply demonstrates that 20% higher charges are not for getting continuous supply during restriction period only but for getting premium supply throughout the year. The Commission has also amplified the rational for charging reasonable premium in energy charges throughout the year in para 8.3.6 of the Impugned Order.

5.7.3 Further, the conditions under "restriction in usage" stipulated in the Impugned Order was provisional and subject to revision by the Commission at a later date as was discussed by the Commission in Section 8.4.6 of the Impugned Order.

5.7.4 Subsequently, the Commission initiated a suo-moto proceeding to finalise Clause-6 of RTS-7 in the tariff order and after hearing all the stakeholders and UPCL issued a separate Order dated December 5, 2008 finalizing Clause 6 of RTS 7 of the Tariff Order.

5.7.5 The Commission would, however, like to reiterate its view that in order to motivate the licensee to make long term arrangements for continuous supply of power and to avoid higher impact on consumers during load shedding period, there is merit for charging reasonable premium in energy charges throughout the year. Moreover, the option of taking continuous supply is with the consumer and if the consumer perceives these charges are on higher side, he is free to opt out and pay only normal tariff."

3.3.10 *Power Factor Surcharge*

3.3.10.1 Stakeholders' Comment

Smt Veena Rani Goyal submitted that there is no clarity as to how the low power factor charges are levied.

3.3.10.2 Petitioner's Response

The Petitioner submitted that the existing Tariff Order stipulates as under regarding the applicability of low power factor surcharge:

"Low Power Factor Surcharge (not applicable to Domestic, PTW and categories having kVAh based Tariff)

In respect of the consumers without Electronic Tri Vector Meters, who have not installed shunt capacitors of appropriate ratings and specifications, a surcharge of 5% on the current energy charges shall be levied.

For consumers with Electronic Tri Vector Meters, a surcharge of 5% on current energy charges will be levied for having power factor below 0.85 & a surcharge of 10% of current energy charges will be levied for having power factor below 0.80."

The Petitioner submitted that it may be clear from the above extract of the Tariff Order that cases where the billing is not based on kVAh Tariff, power factor surcharge is charged on the current energy charges for the relevant period.

The Petitioner further submitted that the power factor may be improved by having the good quality motors and by installing shunt capacitors of appropriate ratings and specifications. Accordingly, the Petitioner submitted that in such way levy of power factor surcharge is justified.

3.3.11 *Minimum load to Furnaces*

3.3.11.1 Stakeholders' Comment

Some of the respondents including Galwalia Ispat Udyog Ltd., Khatema Fibres Ltd. and Kashi Vishwanath Steels Ltd. submitted that in Tariff Rate Schedule, RTS-7 the condition of minimum required load of 600 kVA per ton capacity of furnace is irrelevant in the present context of the Supply Code Regulations and tariff structure to the industries. It was further submitted that the Regulations provide that the consumers having maximum demand indicators can connect load in excess of contracted load without any limit and with the advent of new technology, the manufacturers now supply the furnaces with power load requirement of only 400-425 kVA/ton capacity. Accordingly, it was requested that the Commission should dispense with this condition in RTS-7 consumer category (HT Industry).

3.3.11.2 Petitioner's Response

The Petitioner submitted that the objectors have not submitted any supporting document in support of their claims. The Petitioner further added that on production of any documentary evidence in this regard, decision may be taken by the Commission accordingly.

3.4 Railway Traction tariff

3.4.1.1 Stakeholders' Comment

As regards the Railway Traction Tariff for FY 2010-11, Northern Railway submitted that the Commission should determine the tariff in accordance with the directives of Hon'ble Appellate Tribunal for Electricity (ATE). Accordingly, the traction tariff should be at a level lower than the industrial tariff as railways avail power supply from UPCL at 220 kV and is bearing all the cost of infrastructure including 220 kV transmission line as well as maintenance of 220/25 kV substation, which is owned by railways.

UPCL should work out the category-wise cost of supply and should link the same with tariff based on the provisions of Tariff Policy. They also submitted that the traction tariff should be based either on cost of generation or cost of purchase of CGS with reasonable additional charges for wheeling. The proposed traction tariff of Rs 5.00/unit is far in excess of CGS tariff even if reasonable wheeling and administrative charges are added. Northern Railway further submitted that the increase in average cost of power purchase is 13% whereas increase in tariff has been proposed @ 19%, which is illogical. Increase in tariff should be commensurate with increase in power purchase cost.

The billable demand should be 65% of the contracted demand or recorded demand during the month, whichever is higher for railway traction based on the similar clause existing in traction tariff levied by Haryana Vidyut Prasaran Nigam Ltd. The tariff for railways should be based either on the cost of generation or cost of purchase from Central Generating Stations with reasonable additional charges for wheeling of power.

The revision of Contracted Demand should be made effective from the date of application without linking it with other issues. It was further submitted that special considerations should be provided for newly electrified sections as adopted by other utilities such as KSEB.

As regards the load violation charges, Northern Railway submitted that Sometimes in case of incoming supply failures, it has to extend the feed of Roorkee Traction Substation (TSS) being fed by UPCL in the feeding zone of failed TSS being fed by HVPN/UPPCL and has to pay load violation charges for exceeding the sanctioned contract demand for the circumstances which are beyond its control. Northern Railway further submitted that in case of supply failure from HVPN/UPPCL, then during such supply failure, the instances of maximum demand exceeding contract demand (due to feed extension of Roorkee TSS being fed by UPCL and vice-versa) should be ignored and no 'load violation charges' should be levied for that period. It was further submitted that metering for the railway traction should be done at the consumer premises i.e. railway traction sub-station instead of UPCL grid sub-station.

3.4.1.2 Petitioner's Response

The Petitioner submitted that the tariff of Railway Traction has been proposed in accordance with the directives of Hon'ble ATE. The average cost of supply for HT industries and other HT categories including Railway Traction is Rs. 4.62/kWh and the average tariff for railways comes to Rs. 4.00/kWh only. It further submitted that in accordance with the provisions of the Electricity Act, 2003, tariff for various categories has to be determined based on average cost of supply (maintaining cross-subsidy level as per law). Policy Directions issued by the State Government under section-108 of the Electricity Act, 2003 regarding allocation of the State Generation have also to be complied with while determining the Tariff.

The Petitioner further added that it has proposed tariffs for FY 2010-11 considering its ARR of the year and the proposed increase in tariffs is required to meet the expenses essential for running various activities related to the distribution of electricity in the State. The Petitioner submitted that it has not discriminated Railways and the tariff charged from Railways is lower than that charged from industrial consumer as is evident from the details shown as under:

Table 3.2: Comparison of Tariff for HT Industry & Railways

Industry	Energy Charge	Demand Charge
HT Industries	Rs. 3.30/ kVAh (LF 33% - 50%)	Rs. 264/kVA
Railways	Rs. 3.60/ kVAh	Rs. 192/kVA

As regards the contention raised by the objector that increase in tariff should be in proportion to the increase in power purchase cost, the Petitioner submitted that the proposed increase in tariff is justified considering the estimated revenue gap to the tune of Rs. 330.25 Crore in FY 2010-11. Moreover, the request for increase in tariff is also justified based on the increase in other costs like employee cost, which has been increased in all the departments throughout the country due to implementation of recommendations of the Sixth Pay Commission. Accordingly, the Petitioner submitted that the tariff should not be only linked to power purchase cost, it should be linked to cost of supply.

As regards the Northern Railways' contention regarding metering at consumer premises, the Petitioner submitted that meter can be installed at the premises of the consumer in case it provides space, etc. for the same based on the Rules and Regulations.

As regards the contention raised regarding the load violation charges, the Petitioner submitted that the consumer is entitled to consume power within the limit of load sanctioned to it. In such cases where the power demand is made over and above the sanctioned load, the consumer has to pay penal charges in the form of additional demand charges. To avoid the payment of additional demand charges, the consumer can enhance its contracted load with UPCL.

3.5 Public Water Works (PWW)

3.5.1 *Stakeholders' Comment*

Shri K.G. Behl, President, AICC submitted that the increase in tariff in RTS-6 PWW is also unjustified and should not be allowed as it indirectly affects domestic users.

3.5.2 *Petitioner's Response*

The Petitioner submitted that the tariffs for FY 2010-11 have been proposed considering its projected ARR and revenue gap for the year. The proposed increase in tariffs is required to meet the expenses essential for meeting the power purchase expenses and genuine expenses for operating various activities related to the distribution of electricity in the State. The Petitioner further submitted that it has designed the category-wise tariffs on the basis of average cost of supply (maintaining cross-subsidy level as per law) and also keeping in view the Policy directions issued by the State Government under section 108 of the Electricity Act, 2003.

3.6 Public Process

3.6.1 *Stakeholders' Comment*

Several of the objectors submitted that more publicity should be given for Public Hearing process in future and suggested as under:

a. The District Magistrate should be informed, and he can inform further locally;
b. Public Announcements should be made through travelling vehicles;
c. District Information officer of Government should be informed, so that he can inform the media.

3.6.2 *Petitioner's Response*

The Petitioner has not submitted any comment on this issue.

3.7 Cost of Supply and Cross-subsidy

3.7.1 *Stakeholders' Comment*

Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that cross-subsidy should be examined in accordance with the stipulation of $\pm$ 20% and the tariff should be brought under that limit.

KVSL submitted that the Petitioner in its ARR Petition while proposing the revised tariff has erred in arbitrarily increasing the amount of cross-subsidy with the consumers disregarding the provisions of the Electricity Act, 2003 and the Tariff Policy. Hon'ble ATE in its number of judgments has held that no particular category can be burdened with costly power.

Shri Joshi of Tata Motors submitted that the tariff should be based on the voltage-wise cost of supply.

Northern Railways submitted that UPCL should work out the category-wise/voltage-wise cost of supply and cross-subsidy and then link the traction tariff with the cost of supply for railway traction. Moreover, in accordance with the provisions of the Tariff Policy there should be gradual reduction in cross-subsidy for railway traction.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that the existing tariff to the industries is subsidising to other categories and actually the tariff should reflect the cost of supply to the consumers and in any case it should be within ±20% of the cost of supply and requested the Commission to keep the tariff, accordingly, for different categories of consumers.

Shri Joshi of Tata Motors submitted that the consumption of EHV consumers must be deducted while working out net energy available at distribution periphery. Since these consumers are directly connected to transmission network (i.e. 1.36% loss level) and do not contribute in distribution network losses of around 10%, their tariff should be differentiated from other consumers of distribution network and, accordingly, this method can be used to reduce the cross-subsidy level of EHV consumer.

KGCCI submitted that UPCL, in its Petition, has not explained in what manner the provisions of section 61(g) of the Electricity Act, 2003 and the provisions of 8.3.2 of the Tariff Policy have been followed namely in achieving the goal of reducing/elimination of cross-subsidies.

3.7.2 *Petitioner's Response*

As regards the contention raised regarding the determination of cost of supply voltage-wise, the Petitioner submitted that presently, it is not in a position to compute the voltage-wise losses and therefore, considered the overall system losses for all consumer categories. However, the Petitioner has taken steps to evolve a mechanism to compute the voltage-wise losses and determine voltage-wise cost of supply/service in future. On evaluation of such system, the Petitioner will compute the voltage-wise losses and cost of supply.

As regards the contention raised by other objectors regarding cross-subsidy, UPCL submitted that while proposing the tariff on the basis of cost of supply and maintaining the level of cross-subsidy and also complying with the Policy Directions issued by the State Government under section-108 of the Electricity Act, 2003, it has relied on the provisions of the Electricity Act, 2003 and the Regulations made thereunder and National Electricity Policy and Tariff Policy issued by Ministry of Power, Government of India.

3.8 Multi Year Tariff Regime

3.8.1 *Stakeholders' Comment*

Northern Railways submitted that in accordance with the Tariff Policy, the Multi Year Tariff

(MYT) regime was to be adopted and the same has not been proposed by UPCL. The Commission should direct the UPCL suitably.

Shri R.N. Mathur, President, Mussoorie Hotel Association submitted that UERC should also adopt the MYT regime as implemented in the State of Himachal Pradesh and the tariff and consumer categories should be considered in accordance with the State of Himachal Pradesh considering the similarity in power generation (i.e. hydro power) in both the States.

Petitioner's Response

As regards the contention raised by the objector regarding the MYT framework, the Petitioner submitted that the Commission is yet to issue the MYT Regulations and upon issuance of the same, tariff filing shall be done accordingly.

3.9 Revenue Gap

3.9.1 *Stakeholders' Comment*

Northern Railways submitted that the cumulative revenue gap estimated by UPCL for FY 2009-10 and FY 2010-11 is Rs. 767.99 Crore. This revenue gap should be supported by Government subsidy and tariff of Railways should not be increased.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that the UPCL has projected a deficit of Rs. 438 Crore for FY 2010-11 in the Petition as against the revenue from approved tariff and proposed tariff increase of 19%. Further, UPCL, in the Petition has proposed distribution loss of 24% for computation of power requirement, which appears to be difficult to achieve considering the existing level of the losses of the Company. Moreover, UPCL has further submitted that the impact of Hon'ble ATE's Judgment on the appeal of Polyplex Corporation Ltd. will further widen the revenue gap. Further, the allowance of investments by the Commission for previous years on account of non-inspection/certification by the Electrical Inspector and consequent effect on depreciation will further enhance the gap. Accordingly, they requested the Commission to allow only prudent expenses/reasonable provision in the ARR to minimise the revenue gap.

3.9.2 *Petitioner's Response*

As regards the contention raised by the objector regarding subsidy, the Petitioner submitted that it is a matter of the State Government to provide the subsidy.

The Petitioner submitted that in its Petition, it has proposed to meet the revenue gap for FY 2010-11 by way of increasing Tariff @ 19-20%. The Petitioner submitted that the proposed increase in tariffs is required to meet the expenses essential for meeting the power purchase expenses and genuine expenses for operating various activities related to the distribution of electricity in the State. The Petitioner further added that it has not added the gap of FY 2009-10 and the same shall be claimed during the truing-up exercise of expenses and revenue.

3.10 Incentive for timely Payments

3.10.1 *Stakeholders' Comment*

Shri B.P. Verma, Chief Electricity Distribution Engineer from Northern Railway submitted that incentives should be provided to railways for making timely payment to UPCL.

3.10.2 *Petitioner's Response*

The Petitioner submitted that the Commission has to approve any incentive for timely payment by the consumers.

3.11 Time Limit for Contract Demand Revision

3.11.1 *Stakeholders' Comment*

Shri B.P. Verma, Chief Electricity Distribution Engineer from Northern Railway submitted that the contract demand should be revised by UPCL within 30 days from the date of application by Railways and revision of contract demand should be made effective from the date of application without linking it to other issues. Minimum time should be fixed for release/enhancement of connections.

Petitioner's Response

UPCL submitted that the Commission has already issued UERC (Release of HT and EHT New Connections, Enhancement and Reduction of Loads) Regulations, 2008, wherein procedure and time limits have been clearly specified for enhancement of load and the same has been adopted by the Petitioner.

3.12 Power Purchase Expenses

3.12.1 *Stakeholders' Comment*

As regards the power purchase expenses, Mussoorie Hotel Association, Mussoorie (MHAM) submitted that the Commission while approving the power purchase expenses for FY 2009-10, reduced the expenses by 37.19% as against the projections made by UPCL in the previous Tariff Order dated October 23, 2009 and suggested that by adopting the same philosophy the power purchase expenses will reduce to Rs. 1301.39 Crore for FY 2010-11 as against power purchase expenses of Rs. 2071.95 Crore projected by UPCL.

As regards the power purchase expenses, Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that since UPCL is envisaging maximum increase in the demand for industries due to upcoming industries in Uttarakhand and as the power is supplied to industrial consumers at high voltage due to which the losses incurred in supplying the power to industrial consumers are much lower as compared to the technical losses for supply of power at low voltage, the overall distribution loss for FY 2010-11 should be much lower than the earlier years. Industries Association of Uttarakhand submitted that if this is factored, the power requirement would be on lower side than that projected by UPCL and the power purchase cost will reduce accordingly.

AICC submitted that the power purchase of UPCL should be properly planned to purchase at the lowest rate rather than purchase as and when required at the highest rates. The Commission's suggestion to purchase back unused electricity at premium from States to whom UPCL supply based on the agreement is laudable. It was further submitted that there may be shortages on account of usage of bulk share of available power by steel industry and in such cases poor domestic consumers will be the sufferers as they will also have to bear the power cuts. The industries may be able to procure power by paying more but the domestic consumer will have nothing but to suffer as the cost of such additional power would be more than their paying capacity.

PIA, Uttarakhand submitted that UJVNL provides electricity at very nominal rate to UPCL, which is the lowest as compared to purchase rate of other distribution licensees in India and further suggested that UPCL should add reasonable amount of expenses to its power purchase price, so that the tariff is reasonable and at par with adjoining States.

Shri Joshi of Tata Motors Ltd. submitted that the information provided in the Tariff Petition is not reliable and trustworthy. He further added that he has referred the following documents while working out the revised availability of power for FY 2009-10 and FY 2010-11:

- CEA Report for allocation of power from Central Generating Stations as on November 30, 2009;
- CEA report on energy-wise performance status of all India-Region-wise for FY 2009-10 (i.e. actual data for the period from April to November, 2009);
- PTCUL Petition for ARR for FY 2010-11;

Shri Joshi submitted that he has considered the actual power purchase quantum for the period from April to November 2009 and projected for the remaining period of FY 2009-10 on pro-rata basis. Accordingly, he submitted that as against the estimated power purchase quantum of 7827.76 MU by UPCL, the available power quantum would be 9415.10 MU during FY 2010-11.

Shri Joshi further submitted the following:

- UPCL has considered very low purchase from NTPC and NHPC stations and requested the Commission to examine the reasons for such a low projections;
- Requested the Commission to disallow the purchase from costly power sources;
- Requested the Commission that any revenue earned from sale of power to open market should be considered as part of non-tariff income;
- Requested the Commission to reject the Petition and reconsider the same only after the authentic data is made available to the Commission and public.

3.12.2 *Petitioner's Response*

As regards the contention raised by several objectors including MHAM and Shri Joshi of Tata Motors, the Petitioner submitted that in support of its claim of power purchase expenses, UPCL has provided all the relevant/desired data to the Commission and other additional information as sought by the Commission from time to time and the Commission would approve the said expenses after prudence check. Moreover, UPCL submitted that according to the methodology adopted by the Commission in its Order dated October 23, 2009, it has taken 15% losses for HT categories and 33.46% for LT categories.

As regards the suggestion made regarding power banking, the Petitioner submitted that it always tries for Power Banking continuously and is also looking forward to tie-up with other States for power banking.

As regards the contention raised by PIA regarding power purchase expenses, the Petitioner submitted as under:

i. It purchases power from the Central Generating Stations based on the allocation approved by the Central Government and from State Generating Stations and a very small portion from IPPs.

ii. Purchase from the Grid and short-term purchase from market in case availability of such power is less than the demand of electricity.

iii. The availability of energy from UJVNL is less than half of the total requirement.

The tariffs for FY 2010-11 have been proposed considering its ARR for the year. The proposed increase in tariffs is required to meet the expenses essential for meeting the power purchase expenses and genuine expenses for running various activities related to the distribution of electricity in the State.

3.13 Policy Direction dated September 25, 2009 issued by Government of Uttarakhand and Principle of Average Pooled Power Purchase cost

3.13.1 *Stakeholders' Comment*

KVSL submitted that in accordance with the provision of the Electricity Act, 2003, while formulating the tariff it is mandatory to take average pooled power purchase cost as a benchmark. The UERC (Terms & Conditions of Determination of Distribution Tariff) Regulations, 2004 vide Regulation 10 of Chapter IV and Regulation 20 of Chapter VI categorically stipulates that average cost of supply shall be used as the benchmark for determining tariffs. Further, both Para 8.3.2 of the Tariff Policy and Para 5.2.2 of the National Electricity Policy emphasize on the concept of average cost of supply. The Appellate Tribunal of Electricity formed under section 110 of the EA, 2003 has reiterated in its various judgments, the need of formulating the Tariff on the basis of pooled power purchase cost. The respondent submitted that the determination of Tariff is exclusive prerogative and in the domain of the State Electricity Commission as has been declared by the Hon'ble Supreme Court of India in its leading decision in the matter of West Bengal Electricity Regulatory Commission (2002 8 SCC 715) wherein it was held that the Commission alone is authorised to determine the tariff. The Commission is the expert body which is specially created and solely entrusted with the responsibility of determining the tariff. The Supreme Court, subsequently has reaffirmed in its latest decision in LML Ltd. [(2008) 3 SCC 128] by observing that the Commission is the sole authority for fixing the tariffs.

KVSL submitted that notwithstanding the statutory provisions giving the final mandate of formulation and determination of tariff to the Regulatory Commission, section 108 of the EA, 2003 carves out a limited area wherein intervention of the State Government is permitted for giving direction in tariff formulation if so required in the public interest. The respondent submitted that the public interest being the governing criteria and the provision being an exception to the general rule of the Tariff formulation, the concerned Government Authority is obliged to apply its mind and only after scrutiny of all the facts and figures it is permissible for the Government to issue Policy Directions by evenly balancing out the conflicting interest of all the consumers. The respondent submitted that apart from the various legal infirmities which are indicated in the abovementioned para, the Policy Directions were based on totally wrong and misleading figures related to HT and LT industries. If accurate facts and figures were taken into consideration by the State Government, it would not have issued the Policy Directions at all and the public interest would have stood served in a better way. The respondent requested the Commission to have a detailed scrutiny of the facts and figures supplied by the Petitioner before accepting any increase in power tariff for HT industries for FY 2010-11.

3.13.2 *Petitioner's Response*

The Petitioner submitted that section 61(g) of the Electricity Act, 2003 provides that the State Commission shall be guided by the factor that the tariff progressively reflects the cost of supply of electricity and also reduces cross-subsidies in the manner specified by the Appropriate Commission. Simultaneously, section 108 of the Electricity Act, 2003 also provides that in the discharge of its functions, the State Commission shall be guided by such directions in matters of Policy involving public interest as the State Government may give to it, in writing.

Further in this regard, the State Government has issued Policy Directions to the State Commission that the electricity generated by UJVNL and the Share of free power of the State made available to UPCL shall be allocated to consumers in the following order of priority:

(i) Private Tube-well;
(ii) Domestic Consumers;
(iii) Government Categories;
(iv) Other Consumers.

The State Government has further directed to compute the tariff for the different categories by considering the cost of power based on the above allocation. The Petitioner submitted that as may be observed from the above submissions, the State Government is fully empowered to issue Policy direction regarding allocation of cost of power among various categories of consumers and accordingly, the Petitioner has computed the cost of supply of various categories considering the Policy directions issued by State Government.

3.14 Distribution Losses/ Line Losses

3.14.1 *Stakeholders' Comment*

KVSL, Galwalia Ispat Udyog Ltd., MHAM, Tata Motors, Khatema Fibres Ltd. and others submitted that the Petitioner has proposed distribution loss of 24% during FY 2010-11, while the Commission has approved Distribution loss of 20.32% for FY 2009-10, which should have been reduced to 16.32% by the Petitioner for FY 2010-11. This clearly shows that there is no improvement on the part of the Petitioner in this context. The respondents suggested that the proposed Distribution loss should not be approved by the Commission. The respondent further submitted that the losses in other States are merely in the range of 12% to 13% while the losses for UPCL are 31%. Khatema Fibers further submitted that the proposed measures indicated by the Licensee are just assurance never to be met or fulfilled.

KGCCI submitted that previous years T&D loss of 20.32% when rationally reduced at least by 2%, the T&D loss is to be taken at 18.32% for working out the entire tariff proposal and the revenue gap of Rs. 434.74 Crore as projected by UPCL would reduce to Rs. 224.24 Crore.

The respondents submitted that the Commission in its Tariff Order dated October 23, 2009 has clearly laid down the limit of line loss to the extent of 3% in case of steel units where supply is to be made through a dedicated individual feeder only. However, the respondents indicated that they are receiving power supply at 132 kV and the line loss works out to less than 1%. The respondent suggested that the lower rate of Distribution Loss should be kept in mind while deciding the power tariff for HT industries. They requested the Commission that any operational inefficiency of UPCL should not be allowed to be passed in the ARR for FY 2010-11.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that to reduce overall AT&C losses, UPCL has indicated a number of schemes which appears to be just assurance which would be never met or fulfilled. Also the losses should be allowed on the basis of the approved losses of 20.32% for FY 2010-11 and targeted reduction in the same.

Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that the Commission is empowered to investigate under section 128 of the Electricity Act, 2003 and suggested the Commission to appoint an agency for investigating losses and get energy audit done. Industries Association of Uttarakhand submitted that above investigation can be made on account of the fact that if HT consumers are consuming more than 50%, whose losses should not be more than 5-6% then how the overall distribution losses are so high, which implies that in other consumer categories the losses are more than 45%.

State Licensee Electrical Contractors Association, Uttarakhand submitted that although it is natural to increase the electricity tariff for FY 2010-11, it is not logical for UPCL considering the major inefficiency of UPCL in controlling of power theft.

Shri Joshi of Tata Motors submitted that the consumers should not be burdened with the tariff hike on account of UPCL's inefficiencies, mismanagement and un-willingness to reform. He further added that EHV consumers should not be burdened with distribution losses as EHV consumers are already contributing heavily to cross-subsidy and are facing extreme competition in the global market, which does not allow them to increase the cost of their production. He further submitted that UPCL has not provided any detailed information regarding distribution losses like zone/circle-wise distribution loss levels, losses for different rural and town areas, segregation between technical and commercial losses etc. and requested the Commission to direct UPCL to reduce the distribution loss @ 18.32% in FY 2010-11. He submitted that this basic data is essential to evaluate the improvements as claimed by UPCL in its Petition.

AICC submitted that, although the losses have been taken as 24% but it appears that the actual losses are much higher and are being reflected in other expenditure.

Shri S.K.Singh of Shivalik Rasayan Ltd. suggested UPCL to control the line losses by taking effective measures and proper maintenance.

3.14.2 *Petitioner's Response*

As regards the contention raised by the objectors regarding reduction of distribution losses, the Petitioner submitted that in order to reduce non-technical losses, it has initiated several steps like regularization of unauthorized connections/load, bringing un-ledgerised consumers to the billing fold, replacement of defective meters, ensuring accurate and complete meter reading and billing.

As regards the contention raised by several objectors regarding the targets for distribution loss for FY 2010-11, the Petitioner submitted that the Commission has not stipulated/approved any target for FY 2010-11. The Petitioner has proposed a loss level of 26% for FY 2009-10 and 24% for FY 2010-11 as against loss level of 28.01% for FY 2008-09. However, the Petitioner is making efforts to reduce the line losses and to achieve loss levels as approved by the Commission.

The Petitioner further submitted that:

i. The Commission has not stipulated any target for the losses for the FY 2010-11.

ii. It has proposed loss level of 24% for 2010-11 as against loss level of 28.01% for 2008-09.

iii. It is making efforts to reduce the line losses and to achieve loss levels as approved by the Commission.

As regards the contention raised regarding the detailed information of distribution losses to evaluate the improvement, the Petitioner submitted that it has submitted division-wise details of losses to the Commission. UPCL further submitted that it is determined to achieve its targets proposed by it in the ARR and Tariff Petition for FY 2010-11.

As regards the contention raised regarding the limit of line losses, the Petitioner submitted that the contentions of the consumers are not correct. The Commission in its Tariff Order dated October 23, 2009 (Rate Schedule RTS-7, Para-2(iii)) has stipulated as under:

"Supply to Steel Units shall be made available at a voltage of 33 kV or above through a dedicated individual feeder only with check meter at sub-station end. Difference of more than 3%, between readings of check meter and consumer meter(s), shall be immediately investigated by the licensee and corrective action shall be taken."

As may be observed from the relevant extract of the Tariff Order that limit of 3% as stipulated in the Tariff Order is towards the difference of readings in check meter and consumer meter and not the limit of loss level allowed for Steel Units.

As regards the contention raised regarding the higher losses for UPCL, the Petitioner provided the comparison of line losses with the distribution licensees in other States for FY 2005-06 and FY 2006-07, as shown in the Table below:

Table 3.3: Comparison of Losses with Other States

State	Company	FY 2005-06	FY 2006-07
Uttar Pradesh	UP Madhya	35.78%	31.52%
	UP Poorv	41.37%	41.51%
	UP Paschim	36.00%	34.53%
	UP Dakshin	50.03%	44.35%
Rajasthan	JVVN	37.31%	33.45%
	JdVVN	43.64%	32.86%
	AVVN	42.60%	35.38%
Orissa	CESU	49.00%	47.00%
	SESCO (REL)	46.00%	48.00%
	NESCO (REL)	42.20%	38.74%
	WESCO (REL)	37.82%	38.69%
Madhya Pradesh	MP Purvanchal	42.23%	41.24%
	MP Paschim	46.91%	43.68%
	MP Madhya	53.25%	49.35%
Kerala	KSEB	24.59%	23.43%
Karnataka	BESCOM	33.17%	26.85%
	MESCOM	22.13%	15.37%
	HESCOM	47.41%	37.33%
	GESCOM	37.03%	35.52%
	CHESCOM	42.33%	35.62%
Delhi	BYPL	43.88%	39.03%
	BRPL	35.53%	29.92%
	NDPL	26.50%	23.70%
Andhra Pradesh	APCPDCL	18.14%	17.40%
	APEPDCL	12.95%	12.16%
	APNPDCL	19.94%	18.80%
	APSPDCL	15.80%	12.66%
Source: Power Line Magazine (September, 2007)			

Moreover, the Petitioner also submitted that it has provided all the relevant /desired data to the Commission in support of the Petition.

3.15 Power Theft

3.15.1 *Stakeholders' Comment*

As regards the power theft in the State of Uttarakhand, Shri Manmohan Kansal from Dakpathhar Vyapaar Mandal, Dehradun and Smt Geeta Bisht, Mahanagar Congress Seva Dal, Dehradun and others have submitted that the theft of power should be controlled rigorously.

State Licensee Electrical Contractors Association, Uttarakhand suggested to hold common meetings with public representatives by UPCL engineers for discussion and suggestions for curbing power theft in the State.

Shri Joshi of Tata Motors submitted that UPCL has not provided any action plan to reduce losses under theft and suggested following measures to curb theft:

- Mass theft control drives;
- Formation of vigilance department and speedy disposal of vigilance cases;
- Strict actions against defaulters

Shri Joshi of Tata Motors further requested the Commission to direct UPCL to provide information to the public regarding the efforts/actions taken by UPCL in following terms to arrest theft:

- Number of First Information Reports (FIRs) filed;
- Number of Panchnamas;
- Number of people arrested;
- Number of cases filed in Court of Law;
- Number of cases decided by the Court of Law;
- The organisation structure created by UPCL to drive the movement to arrest theft;
- Amounts received

3.15.2 *Petitioner's Response*

As regards the contention raised regarding controlling the power theft, the Petitioner submitted that it has taken following steps in this regard:

a. Replacement of Aluminium Conductor Steel Reinforced (ACSR) conductors with Aerial Bunch (AB) conductor for the distribution of power in the power theft prone areas;
b. Regular inspection of consumer premises for power theft;
c. Conducting Vigilance Raids and lodging of complaints for power theft under section 126 and section 135 of the Electricity Act, 2003;
d. Preparation of the work plan for supply to the new PTW consumers at High Voltage (HV) distribution scheme/AB conductors.

As regards the actions suggested to prevent theft, the Petitioner submitted that it has taken following steps in this regard:

a. In case any employee is found involved in theft of electricity, disciplinary action is being taken against such employee;
b. Vigilance Cell has already been established for checking of premises to detect theft of electricity;
c. In case any person is found involved in theft of electricity, action against him is taken under the provisions of Electricity Act, 2003.

As regard the efforts/actions taken by UPCL, the Petitioner submitted that the desired information is made available to the authorities as and when required.

As regards the suggestion to hold common meetings with consumers, the Petitioner submitted that such kind of suggestions are always welcome and assured that UPCL officers would like to have meeting with public representatives to discuss the schemes to control power theft on submission of detailed schemes by them.

3.16 Return on Equity

3.16.1 *Stakeholders' Comment*

As regards the Return on Equity (RoE) of Rs. 2.94 Crore claimed by UPCL, MHAM submitted that since this data has not been verified by independent agency/outside auditors, the Commission should get the data audited by an independent agency, before finalizing the tariff for FY 2010-11.

Galwalia Ispat Udyog Ltd. (GIUL) and Khatema Fibres Ltd. submitted that since UPCL has not submitted any documentary proof/assurance from GoU for the claim of projected infusion of additional equity of Rs. 15 Crore during FY 2010-11, RoE should be allowed only for the existing equity of UPCL.

3.16.2 *Petitioner's Response*

As regards the contention raised regarding RoE, UPCL submitted that in support of its claim of RoE, it has claimed the RoE in accordance with the Regulations framed by the Commission and UPCL has provided all the relevant/desired data to the Commission in the Petition. The Petitioner further added that the Commission may like to peruse the data submitted by it and take appropriate decision in approving the said expenses.

3.17 Interest Charges

3.17.1 *Stakeholders' Comment*

As regards the interest charges of Rs. 83.99 Crore claimed by UPCL for FY 2010-11, MHAM submitted that based on the philosophy adopted by the Commission in approving the interest charges of Rs. 62.89 Crore as against Rs. 81.55 Crore estimated by UPCL for FY 2009-10, the interest charges for FY 2010-11 will be reduced to Rs. 64.73 Crore.

3.17.2 *Petitioner's Response*

As regards the contention raised regarding the interest charges, the Petitioner submitted that it has provided all the relevant/desired data to the Commission in the Petition. The Petitioner further added that the Commission may like to peruse the data submitted by it and take appropriate decision in approving the said expenses.

3.18 Depreciation

3.18.1 *Stakeholders' Comment*

As regards the depreciation of Rs. 40.62 Crore for FY 2010-11 claimed by UPCL, MHAM submitted that this abnormal increase in depreciation from Rs. 21.70 Crore as approved by the Commission for FY 2009-10 should be analysed on following grounds:

a) Whether UPCL has increased its assets to such an extent or intend to increase during FY 2010-11?

b) Depreciation should be analysed on the basis of principle of Income Tax Rules, which is based on reducing balance method, and if the fixed assets value is taken at par as that of FY 2009-10 the amount of depreciation shall reduce.

c) Depreciation amount has not been audited by an independent agency and, hence, cannot be relied upon.

MHAM added that going by the same philosophy of depreciation approved by the Commission in its Order for FY 2009-10, the depreciation for FY 2010-11 should be reduced to Rs. 27.06 Crore.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that based on UPCL's submissions, the GFA of Rs. 1058 Crore proposed by the Petitioner is not reasonable and the work of maintenance of asset registers and its audit is still not completed, even for more than three years since the Commission has directed to do so and, accordingly, requested the Commission to consider GFA of Rs. 508 Crore as approved in the Tariff Order dated July 12, 2006 for approving the depreciation.

Shri K.G. Behl, President, AICC objected on the increase in the depreciation charges, which have almost been doubled.

3.18.2 *Petitioner's Response*

As regards the contention raised regarding depreciation, the Petitioner submitted that while computing the depreciation, it has adopted the principles and depreciation rates as specified in the Tariff Regulations. The Petitioner further added that in accordance with the provisions of the Tariff Regulations, while computing the depreciation, it has reduced the amount of subsidy or grant received. Further, the Petitioner submitted that it has provided all the relevant/desired data to the Commission in the Petition. The Petitioner further added that the Commission may like to peruse the data submitted by it and take appropriate decision in approving the said expenses.

3.19 Provision for Bad and Doubtful Debts

3.19.1 *Stakeholders' Comment*

Galwalia Ispat Udyog Ltd., Khatema Fibres Ltd., MHAM, KGCCI and others submitted that UPCL has sought bad and doubtful debts considering 2.5% of the revenue assessment for FY 2009-

10 and FY 2010-11 as against the provision of 1.5% as approved by the Commission, which is not justifiable. They further submitted that before allowing any provision in the current ARR, the Commission should obtain the quantum of bad and doubtful debts actually written-off against the provisions already approved by the Commission and if the approved provision has been exhausted then only the provision in the current ARR should be approved.

Industries Association of Uttarakhand submitted that it is common practice to take utmost care to realise the money due from its consumers and nowhere a provision as a percentage is allowed for bad debts. Industries Association of Uttarakhand requested the Commission to consider the treatment made in this regard in the last Tariff Order.

Shri Manmohan Kansal from Dak-pathhar Vyapaar Mandal, Dehradun submitted that the Commission had approved Rs. 19.67 Crore for FY 2007-08 and Rs. 20.28 Crore for FY 2008-09 against the bad and doubtful debts but UPCL has again projected the same as Rs. 72.89 Crore.

Shri K.G. Behl, President, AICC submitted that the provision for doubtful debts is not clear and if something bad has happened it can be compensated but making provisions for those is not correct.

3.19.2 *Petitioner's Response*

As regards the contention raised regarding the provision for bad and doubtful debts, the Petitioner submitted that in an electricity distribution retail business of UPCL's magnitude, spanning in both urban and largely rural areas, it is normal that a small proportion of debtors turning bad and doubtful. Any non-recognition of this in tariff determination would lead to a revenue gap for the Petitioner.

The Petitioner further added that other State Regulatory Commissions have also recognised this fact and have permitted 2.5% of gross billing for distribution utilities in their respective States, as bad and doubtful debts.

Moreover, in accordance with the directive of the Commission, the Petitioner submitted that it has finalised the policy for provisioning of and writing-off bad debts, which has been approved by UPCL's Board of Directors and the same has been submitted to the Commission for approval.

The Petitioner further added that even in Financial Restructuring Plan (FRP), which was the basic document for unbundling of erstwhile UPSEB, the maximum scale of realization of dues from consumers was fixed at 96%. Against the above provision, the Petitioner projected the realization efficiency slightly on higher site at 97.5% and has projected for bad and doubtful debt at 2.5% only. The Petitioner submitted that the balance of provision for bad and doubtful debts as on March 31, 2009 amounts to Rs. 589.43 Crore.

3.20 Capital Expenditure

3.20.1 *Stakeholders' Comment*

As regards the system strengthening and other capital expenditure schemes, GIUL and Khatema Fibres Ltd. submitted that considering the past experience of UPCL, it does not appear feasible that UPCL will be able to execute the work to the tune of Rs. 200 Crore. Accordingly, GIUL requested the Commission to scrutinize and allow the proposed capital expenditure of Rs. 200 Crore by UPCL on a reasonable and prudent basis.

3.20.2 *Petitioner's Response*

The Petitioner submitted that it is determined to achieve its targets as given in the ARR and Tariff Petition for FY 2010-11.

3.21 Interest on Working Capital

3.21.1 *Stakeholders' Comment*

All India Consumers Council (AICC) submitted that the increasing Working Capital should be reduced by UPCL by recoveries of revenue from defaulters and UPCL should try to settle old cases even by forgoing some of the interests accrued there on.

Shri S.K.Singh of Shivalik Rasayan Ltd. suggested that the various electricity dues on various Departments should be recovered which may solve the cashflow problem of UPCL.

3.21.2 *Petitioner's Response*

UPCL submitted that it is taking the following steps to recover its revenue arrears:

(i) Defaulting consumers are constantly followed up to pay their electricity dues;

(ii) The electricity connections of the consumers who are not paying their electricity dues, are being disconnected;

(iii) Recovery proceedings are being initiated under the provisions of U.P. Government Electrical Undertakings (Dues Recovery) Act, 1958.

3.22 Employee Expenses

3.22.1 *Stakeholders' Comment*

As regards the Employee Expenses projected by UPCL, Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that the basis considered by UPCL for projecting the Employee Expenses is not in line with the Commission approved values in the previous Tariff Order. He further submitted that projected increase of consumers is high and the same is not inline with past. It was further submitted that UPCL has also not taken any step to carry out the study on manpower requirement and it has proposed to increase the manpower employed.

Some of the objectors submitted that UPCL should justify the outsourcing of all meter reading and billing activities although the employees are still there and their cost is being borne by the consumers and, therefore, the profit of the billing agents is also being loaded onto the consumers.

3.22.2 *Petitioner's Response*

The Petitioner submitted that while projecting the expenses for FY 2010-11, the actual expenses for FY 2008-09 have been considered and the escalation has been proposed as per the methodology adopted by the Commission in its Tariff Order dated October 23, 2009.

As regards the manpower study, the Petitioner submitted that in accordance with the Directions given by the Commission, the manpower study has been carried out by National Productivity Council and the report on the same study has already been submitted to the Commission.

3.23 Other Expenses

3.23.1 *Stakeholders' Comment*

As regards the other expenses projected by UPCL, Industries Association of Uttarakhand submitted that the explanations for variance of other expenses from the Commission approved values should be given by UPCL.

3.23.2 *Petitioner's Response*

The Petitioner has not submitted any comment on this issue.

3.24 Energy Conservation Plan

3.24.1 *Stakeholders' Comment*

Shri Joshi of Tata Motors submitted that it is appreciated that UPCL have also started energy conservation actions in accordance with the Directions of the Commission. He further requested the Commission to introduce certain tariff principles and practices towards achieving the energy conservation and further suggested following:

- 100% metering should be ensured;
- Regular energy audits to be carried out at every section/circle/division level to explore the energy conservation;
- Generation plants should operate at higher Plant Load Factors;
- Incentive in tariff for industrial consumers having higher load factor;
- Reactive power management and power factor based incentive.

3.24.2 *Petitioner's Response*

The Petitioner has not submitted any comment on this issue.

3.25 Open Access

3.25.1 *Stakeholders' Comment*

Shri Joshi of Tata Motors submitted the following w.r.t. open access:

- A procedure for intra-State transmission capacity for short-term and long-term open access should be made available on its website;
- Role of related entities (i.e. distribution licensee, transmission licensee, State Load Despatch Centre), operating charges and time-frame for them should be defined to have hassle free system to consumer;
- Various charges e.g., wheeling/UI imbalance/Reactive/Cross-subsidy surcharge for utilisation of infrastructure of distribution licensee should be available on the website of the Commission and distribution/transmission licensee;

- Distribution licensee should put up essential required documents, fees for processing the application, essential metering arrangement, etc., on its website.

3.25.2 *Petitioner's Response*

The Petitioner submitted that no application has been received for open access from any consumer so far, while Regulations for the same have already been issued by the Commission.

3.26 CDM Project

3.26.1 *Stakeholders' Comment*

As regards the CDM project, Industries Association of Uttarakhand submitted that UPCL has been only discussing the CDM project without making progress in this direction. Industries Association of Uttarakhand further submitted that UPCL should move one step ahead in the technological development and should take up Light Emitting Diode (LED) lamps for replacing normal incandescent lamps, which would save more electricity for UPCL.

3.26.2 *Petitioner's Response*

The Petitioner submitted that the suggestion of the consumer is welcomed and shall be considered by UPCL in due course of time.

3.27 Recovery of Arrears

3.27.1 *Stakeholders' Comment*

KGCCI submitted that the Commission, in its Tariff Order dated October 23, 2009 has stated that the Government dues are to the tune of Rs. 521 Crore. Moreover, Hon'ble ATE has also directed to realise/adjust these outstanding arrears against electricity duty/payment for free power and if such arrears are recovered, it would negate the need for any tariff increase.

3.27.2 *Petitioner's Response*

The Petitioner has not submitted any comment on this issue.

3.28 KCC Data

3.28.1 *Stakeholders' Comment*

Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that UPCL has done a good work by compiling data in KCC cell. Though the compilation is excellent, it seems that enough benefit is not being derived from scrutiny of this data. Industries Association of Uttarakhand suggested that the Commission should set up one cell either in its own office or in UPCL's office for scrutiny of this data. Further, such cell should be independent and should not be reporting to UPCL.

3.28.2 *Petitioner's Response*

The Petitioner has not submitted any comment on this issue.

3.29 Directives

3.29.1 *Stakeholders' Comment*

As regards the directives given by the Commission in previous Orders to UPCL, Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that UPCL has not mentioned anything about the action taken to comply with the directives of the Commission. Industries Association of Uttarakhand requested the Commission to consider this issue seriously and to follow up on these directives.

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that the Commission may direct the Petitioner to include technical, commercial and other performance parameters of the licensee in their future ARR and Tariff Petitions.

3.29.2 *Petitioner's Response*

UPCL submitted that it has separately submitted a compliance report to the Commission on compliance to directives issued by the Commission.

As regards the contention raised by several objectors regarding compliance to directives, UPCL submitted that it has submitted its ARR and Tariff Petition for FY 2010-11 in accordance with the Regulations framed by the Commission for the same.

3.30 Revised Tariff

3.30.1 *Stakeholders' Comment*

Shri Pankaj Gupta, President, Industries Association of Uttarakhand submitted that the Commission in the Tariff Order dated October 23, 2009 designed the tariffs to recover the entire revenue gap during the remaining six months, i.e. from October 2009 to March 2010 for which the revised tariff would be applicable. Accordingly, the average increase to bridge the entire revenue gap during six months was around 15%. Industries Association of Uttarakhand submitted that, therefore, there is already a cushion of 7.5% in the last revision of tariff and also the Truing-up for last two years i.e. FY 2007-08 and FY 2008-09 has already been done in the previous Tariff Order and, hence, there should be no need to increase the tariff for FY 2010-11.

3.30.2 *Petitioner's Response*

The Petitioner submitted that the tariff increase in FY 2009-10 were implemented w.e.f. October 1, 2009 due to delay in submission of ARR petition and that increase has been approved by the Commission for the period up to March 31, 2010. It is, therefore, necessary to propose the new rates applicable from April 01, 2010. Further it submitted that the tariffs for FY 2010-11 have been proposed considering the projected ARR and revenue gap for the year. The proposed increase in tariffs is required to meet the expenses essential for meeting the power purchase expenses and genuine expenses for running various activities related to the distribution of electricity in the State. The Petitioner further submitted that it has designed the category-wise tariffs on the basis of average cost of supply (maintaining cross-subsidy level as per law) and also keeping in view the Policy Directions issued by the State Government under section 108 of the Electricity Act, 2003.

3.31 Functions of UPCL

3.31.1 *Stakeholders' Comment*

Kumari Swaraj Vidwan, President, BJP stated that billing and collection of bills should not be outsourced and should be carried out by UPCL and the persons involved for such activities should be trained properly. Also UPCL should prepare the list of such consumers in rural areas, whose electricity connections have been cut from many years and still such consumers are getting the electricity bills amounting to thousands of rupees.

PIA, Uttarakhand submitted that the Government and UPCL had not come out with any short term or long term plans for the future energy requirements in the State and also it should take the appropriate actions to improve the quality of power and services provided to its consumers.

Several consumers in Uttarkashi submitted that the camps organised by UPCL were of no use. Even if agreed during the camp that bills will be reduced, the consumer ledger maintained is not updated and the same bills with arrears are continued to be sent. They further submitted that UPCL and its officers should be made accountable for the quality of distribution infrastructure.

Shri Pankaj Gupta, submitted that UPCL should, on pilot programme basis, make one or two sub-stations as profit centres and appropriate incentives may be stipulated so as to set an example for improvements in power supply.

3.31.2 *Petitioner's Response*

As regards the suggestions given by Kumari Swaraj Vidwan, President, BJP, the Petitioner submitted that the suggestions have been carefully noted.

As regards the contention regarding the quality of supply to RTS-7 consumers, the Petitioner submitted that UPCL is making efforts to provide its consumers with uninterrupted power supply and has tied up all available sources of power to meet the State demand. UPCL is also in process to procure power through long term power purchase arrangements.

3.32 Rebate from Government

3.32.1 *Stakeholders' Comment*

Kumari Swaraj Vidwan, President, BJP stated that for the consumers of Uttarkashi rebate of 70% should be provided in the energy by the Government.

Doon Valley Distillers, Dehradun submitted that UPCL is making available the subsidised electricity for some sectors like agriculture and at the same time industries are being charged around 4 to 5 times the actual power production expenditure.

3.32.2 *Petitioner's Response*

As regards the contention raised regarding the rebate, the Petitioner submitted that the residential consumers as well as PWD and Government organisation consumers are being supplied from existing hydro power plants (excluding Maneri Bhali-II) generated power which is generated at comparatively lower cost as per the Uttarakhand Government specified guidelines. The power produced from Maneri Bhali-II hydro power plant and power availed from other sources is being supplied to the industrial and other category consumers at higher rates. Also due to unexpected increase in the consumer base after in creation of the separate Uttarakhand State, power is being purchased at upto Rs. 7.35 per unit to fulfil the increased demand and which is why the increase in tariff is justifiable.

UPCL further added that the proposed tariff for industrial category for FY 2010-11 is almost same as that of the actual tariff the industrial consumers were paying in FY 2002-03, in Uttarakhand. The tariffs applicable for LT industrial category and HT industrial category was Rs. 5.61 per unit and Rs. 4.62 per unit respectively as against the proposed tariff of Rs. 4.85 per unit and Rs. 4.70 per unit for FY 2010-11.

3.33 Energy Sales Forecast

3.33.1 *Stakeholders' Comment*

Galwalia Ispat Udyog Ltd. and Khatema Fibres Ltd. submitted that the Licensee has made sales forecast of 6500 MU for FY 2010-11 in the Table 4.16 of its Petition and the proposed sales for FY 2010-11 have been wrongly indicated as approved sales, which need to be corrected. The sales forecast has been made considering the approved growth rate of last Tariff Order. The assumption for RTS-7 category for FY 2010-11 may not be correct due to expiry of Industrial Package on March 31, 2010.

3.33.2 *Petitioner's Response*

The Petitioner submitted that the word 'approved' was wrongly written in place of proposed at last column of the Table-9 of ARR Petition.

The Petitioner also added that the growth in power consumption of HT industry during FY 2008-09 has been registered @ 31% and keeping in view the various factors including as mentioned by the stakeholder, it has proposed only 12% growth rate for this category during FY 2010-11.

3.34 Views of Advisory Committee

During the Advisory Committee meeting held on 13.01.2010, the Members made the following suggestions on the Petitioner's tariff proposals:-

- Slab-wise tariff should be introduced for all categories of consumers including domestic consumers having heavy consumption
- Morning peak hours should be done away with as industries having single shift, eight hours specified as normal hours are not sufficient for them
- Concessional tariff may be given to the persons who have been displaced/affected by setting up of hydro projects in their areas
- Tariff design should be such that it is easily understood by one and all
- MCG should be abolished as it is leading to wasteful use of electricity and as it is a source of easy revenue, UPCL officials are becoming complacent
- Members suggested that sub-stations be made profit centers and the officials attached to the sub-stations should be held responsible for bring down the losses of the area catered by the sub-station
- Industries assured that they would give all necessary help to UPCL in their drive to check the industries resorting to power theft or any malpractice which is detrimental to it
- Members suggested that load factor of 10% envisaged for fixing the MCG of LT industries is on the higher side and it should be reduced for the benefit of honest consumers
- Members suggested that cane crushing and rice hulling are not incidental agriculture activities but manufacturing process, hence should not be included in RTS-4 category

3.35 Commission's Views

The Commission has taken note of the various suggestions/objections made and appreciates the keen interest and participation by various stakeholders to provide feedback to the Commission on various issues. The Commission has also realised that the foundation stone of any meaningful Regulation of the utilities is to have an effective platform for exchange of operational and performance related information with the Utilities throughout the year, rather than the interactions being limited to year-end submission of filings. In certain cases, the Commission also undertook actual ground verification of the information being submitted by the utilities and made the utilities aware of the shortcomings in their information systems and processes.

The Commission has addressed the issues raised by the stakeholders on the aspects of tariff rationalisation and category-wise tariffs such as increase in tariffs, fixed charges, Minimum Consumption Guarantee charges, ToD Tariffs, Continuous Supply Surcharge, Customer Service Surcharge, Slab-wise Tariffs, Reduction in Cross Subsidy, etc. in Chapter 8 (Tariff Rationalisation and Design) of the Order. Several respondents from consumer categories have opposed the increase in tariff proposed by the Petitioner and submitted that the existing electricity tariffs in the State of Uttarakhand are reasonable. The Commission, while designing the category-wise tariffs has considered the issues raised and attempted to strike a balance between the interests of the consumers and the Licensee.

As regards the concerns raised by the respondents relating to expenses and ARR projections of the Petitioner for 2010-11 such as Power Purchase Cost, O&M expenses, capital related expenditure, Non-Tariff Income, provision for bad debts, Interest on Working Capital, etc. the Commission has carried out the detailed analysis of each element of ARR and Revenue as elaborated in Chapter 7 (Analysis of Annual Revenue Requirement).

The Commission's views on other issues raised by the stakeholders in writing as well as during Public hearings are discussed in subsequent paragraphs.

3.35.1 *Public Process*

As regards the suggestions made by the stakeholders regarding vide publicity of the public hearings. As mentioned in Chapter 1 of the Order, the Petition was provisionally admitted for public process and the Commission directed UPCL to host the detailed Petition and formats in on its website for easy download by interested stakeholders. Further, the Public Notice regarding the Petitioner's proposals were published on 11th & 12th December 2009 in leading newspapers and the public hearings were held at various places. The Commission also ensured the wide publicity of the date of the public hearings through print and electronic media. The Commission had also informed DMs & District Information Officirs regarding public hearing.

3.35.2 *Compliance to the Directives of the Commission*

As regards the contention raised by the objectors regarding the action taken by the Petitioner on the directives of the Commission, it may be noted that the Commission obtained the details of the same during the Technical Validation Session. Moreover, the Commission has detailed the submission of the Petitioner on the action taken by it towards the various directives and the Commission's views on the same in Chapter 9.

3.35.3 *Distribution System Improvement and Metering and Billing*

Regarding the improvement in distribution system, the Commission has carried out the detailed analysis of the metering, billing and collection in the Chapter 5 of this Order.

3.35.4 *Misuse of Electricity by Staff*

Regarding the issue of misuse of electricity by the staff of the Petitioner, the Commission in its last Tariff Order had directed the Petitioner to take appropriate steps on the issues raised by the respondents to avoid the misuse of electricity by UPCL's staff. **The Commission directs the Petitioner to act appropriately as per the direction givens by the Commission in the last Tariff Order.** Further, the Commission clarifies that it considers consumption by employees equal to average consumption of domestic category at normal tariff. The cost of energy consumed over and above normative consumption is to be borne by the Petitioner, i.e. it is not being passed on to other consumers.

3.35.5 *Reduction in Load Shedding*

The Commission clarifies that in considering the power availability and demand, the Commission issues roastering protocols. Recently a fresh proposal for load shedding was received from UPCL, which indicated the shortages are expected to continue in April 2010, and, accordingly, the Commission had to extend the approved scheduled load shedding period till 30th April 2010. The Commission will again review the power supply position on any further request for extension of load shedding period beyond 30th April 2010.

3.35.6 *Distribution Losses/ Line Losses*

As regards the concerns raised by the respondents relating to high distribution losses for FY 2010-11, the Commission has specified the loss reduction target as elaborated in Section 4 (Commission's Approach) and Chapter 7 (Analysis of Annual Revenue Requirement) of the Order.

3.35.7 *Sales Forecast*

The Commission would like to highlight that it has carried out an exhaustive exercise of compilation and analysis of the UPCL's billing system in its last year Tariff Order. The Commission has duly scrutinized and analysed the sales projected by the Petitioner and has approved the category-wise sales based on past trends and considering the other factors submitted by the Petitioner.

3.35.8 *Multi Years Tariff*

The Commission is fully conscious of the fact that the Tariff Policy mandates it to adopt Multi-year tariff (MYT) framework for determination of tariff. The Commission is in the process of revising its Tariff Regulation under which, the Commission would consider implementing MYT framework.

3.35.9 *Depreciation*

As regards the suggestion made by the objectors that the depreciation should be computed on the principle of Income Tax Rules, which is based on reducing balance method, the Commission clarifies that depreciation for the distribution licensee has to be computed in accordance with the rates stipulated in the Tariff Regulations. Depreciation under these Regulations is based on straight line method as against the written down value method specified under Income Tax Rules.

Further, as regards the concern raised regarding the preparation of the fixed asset registers, the Commission has already given direction to the Petitioner and the Petitioner has stated to have taken steps for preparation of detailed fixed asset registers, including identification, physical verification, valuation of all fixed assets; category-wise and location-wise in accordance with the guidelines prescribed in the Companies Act, 1956.

3.35.10*Recoveries of Electricity dues*

The Commission agrees with the concern raised by the objectors regarding electricity dues on various department and private consumers should be recovered and, accordingly, the Commission has been consistently directing the Petitioner to make concerted efforts to recover its dues and improve its financial position by identifying such consumers and writing off ghost consumers in its records through a system of writing off bad debts and initiating recovery of its dues from other consumers.

3.35.11*Functioning of UPCL*

As regards the concern raised by respondents that the Petitioner has not come up with any short and long term plans for future requirement, **the Commission directs the Petitioner to submit detailed short and long-term plans for future energy requirements and submit the same within 6 months from the date of this Order.**

The suggestions of respondents are well accepted and **the Commission directs the Petitioner to take appropriate action for implementing the suggestions of the respondents to improve the quality of power and services to its consumers.** UPCL must submit baseline data for quality indices specified in the Supply Code within 3 months alongwith action taken report on this direction.

The Commission agrees with the concerns raised by the respondents that despite agreement with officials during the camps regarding errors in the bills, bills are sent again with same arrears. It may be noted in this regard that the Commission has stipulated in its Supply Code that if arrears appear in a bill for which payment has been made within due date, the consumer can get compensation for the same at specified rates while making the payment for the bill. The Commission has taken serious note of the issue raised by stakeholders of harassment of consumers for bill corrections even after assurance given during camps or making them run around several times to its offices. In the first place, the billing of NA/NR/ADF/IDF etc. should be avoided and if at all there is billing deficiency, the same should be attended with utmost priority. **The Commission hereby directs the Licensee that when the consumer approaches for bill correction whether in its office or camps, his bill should be got rectified the same day else he should be informed in writing on the same day, the time within which rectification shall be done or the reasons for not doing it. Necessary instructions authorising appropriate levels for such corrections on the spot should be immediately issued by the Petitioner. Actual meter reading as given by the consumer may be relied upon for this purpose which may be suitably incorporated in next bill based on proper meter reading by the Licensee.**

Further, to improve the billing system to eliminate such anomalies, the Commission in previous Order had directed the Petitioner to raise only computerized bills for all the categories of consumers w.e.f. January 01, 2010, thereafter, no bill shall be raised manually, to which the Petitioner submitted that it has taken steps in this regard and is expected to computerise the bills for all consumers categories w.e.f. April 01, 2010 and requested the Commission to allow extension of time upto April 01, 2010 for this work. **The Commission has noted the steps taken by the Petitioner for computerisation of the bills and also accepted the request of the Petitioner to allow it to extend the time limit. Hence, the Commission directs the Petitioner to raise only computerized bills for all the categories of consumer's w.e.f. May 01, 2010, thereafter, no bill shall be raised manually. Also, the Petitioner should submit the status report in this regard within one month from the date of this Order.**

Further, the Commission agrees with the suggestion made by the respondents that one-or two sub-stations should be made as profit centres on pilot program basis to set example for improvement in power supply and **directs the Petitioner to submit a detailed plan in this regard for approval of the Commission within a period of three months.**

3.35.12*Revenue Gap and Subsidy*

As regards the contention raised by the respondents that the revenue gaps should be supported by the Government through subsidy, the Commission clarifies that the Government has not indicated any subsidy for FY 2010-11.

3.35.13*Exemption of meter rent for own meters*

As regards the concern raised by the respondents regarding installation of own meters and abolishment of meter rent, the Commission clarifies that under the prevalent tariff meter rental is not payable. The consumers can also install their own meters subject to the standards laid down in the Regulation 3.1.1(2) of UERC (The Electricity Supply Code) Regulations, 2007.

3.35.14*Minimum Load to Furnace*

As regards the concern raised by the respondents to remove the condition of minimum required load of 600 kVA per ton capacity of furnace considering the advent of new technology, the manufacturers now supply the furnaces with power load requirement of only 400-425 kVA/ton capacity, the Commission clarifies that the consumers may approach the Commission with documentary evidence and the same may be considered under the appropriate Regulations.

3.35.15*Power Factor Surcharge*

As regards the concern raised by the respondents regarding the applicability of the power factor surcharge, the Commission clarifies that:

- low power factor surcharge shall not be applicable on Domestic and PTW categories;
- Further, low power factor surcharge shall also be not applicable on consumer categories having kVAh based tariff.

For further clarity, the provision in this regard has also been slightly modified as follows:

"For consumers with Electronic Tri Vector Meters, a surcharge of 5% on current energy charges will be levied for having power factor between 0.80 and 0.85 & a surcharge of 10% of current energy charges will be levied for having power factor below 0.80"

3.35.16 *Loss level for industrial consumers*

On the issue that the tariff of industries is fixed on the basis of overall losses in UPCL system, which is in range of 25-30% while the losses in the feeders supplying power to the industries are around 1-3%, the Commission would like to refer to the Hon'ble ATE's Judgment dated 02.06.2006 in Appeal No. 124, 125, 177 of 2005 & 18 of 2006, which on this issue decided as under:

"(v) Is the transmission and distribution loss level of 20% for PIUs consumers far too high and should it be in the range of 1%?

………….

(d) In our view, appellant's contention that loss level is just 1% is not sustainable at all. The loss level in the system from the point of purchase to the consumer premises, is what is relevant and not only loss in the 33 kV feeder. UPCL has to pay for the energy purchases at the point of purchase and all system, including 400 kV, 220 kV, 132 kV, 33 kV lines, transformation losses have to be taken into account and paid for by UPCL. To enable the Commission to use category-wise loss data for determining cost of supply for the concerned category, UPCL must furnish the data to the Commission in its future filings of ARR.

(e) The Commission, in the absence of precise category-wise data has, according to its estimation, assumed a loss level figure of 20%. We do not intend to interfere in this decision of the Commission as, in the absence of required category-wise loss data it has kept the interests of both the appellants and the UPCL in mind."

Further, the Commission while determining the tariff for FY 2010-11 has considered the differential losses at LT & HT level as elaborated in Chapter 8 of this Order.

4. Commission's Approach

4.1 General

To provide clarity and better understanding, the Commission, in its past various Tariff Orders, had been detailing the approach adopted by it in determining various components of the ARR as well as tariff. Continuing with the above practice, the Commission is once again detailing the various principles and practices adopted by it in determining the ARR as well as Tariff in this Tariff Order.

4.2 Statutory Requirements

Section 64 of the Act requires generating companies and the licensees to file an application for determination of tariff under section 62 in such manner and accompanied by such fee as may be specified through regulations by the appropriate Commission. Section 61 of the Act further requires appropriate Commission to specify the terms and conditions for determination of tariff in accordance with the provisions of the Act. The Act also provides that while framing regulations the Commission shall be guided by, among other things, the principles & methodologies specified by the Central Commission, the National Electricity Policy and the Tariff Policy.

In the light of the above provisions of the Act, the Commission has specified the Uttarakhand Electricity Regulatory Commission (Terms & Conditions for Determination of Distribution Tariff) Regulations, 2004 (hereinafter referred as Tariff Regulations, 2004), on May 14, 2004, which were valid for a period of 5 years i.e. upto 13th May 2009. The Commission has already initiated the process of revising above regulations in view of the changes taking place in the power sector and changes made by CERC in the tariff regulations for transmission and generation. However, the same may take some time as framing of regulations is a long drawn consultative process. The Commission had, accordingly, extended the applicability of above regulations first upto December 31, 2009 vide Order dated June 17, 2009 and thereafter upto June 30, 2010 vide Order dated December 29, 2009. For the purposes of this Tariff Order, therefore, the Commission shall be guided by the above Regulations only, i.e. UERC (Terms & Conditions for Determination of Distribution Tariff) Regulations, 2004, subject to relaxations granted by the Commission in the previous Tariff Orders for various valid reasons as recorded in the respective Tariff Orders. The

Commission proposes to continue with the same approach, unless it comes across convincing reasons for doing otherwise.

By and large, under the existing Regulations, the Commission had been following the cost plus approach subject to specified operational norms wherein expenses are allowed to be recovered through tariff subject to prudence check by the Commission. The Commission shall follow the same approach for this Tariff Order also.

4.3 Sales Forecast, Energy Losses and Power Purchase Requirement

For past many years the Commission had been receiving numerous complaints about arbitrary/irregular billing by UPCL from consumers of almost all categories. In absence of any initiative on the part of the Petitioner to clear this billing related mess, the Commission decided to analyse the billing related data of the Petitioner on its own. Based on the in-house analysis, the Commission observed that for large number of consumers billing was being done on normative basis on the grounds such as Meter Appears Defective (ADF), Meter Identified as Defective (IDF), Reading Defective (RDF) Cases, Meter Not Read (NA) etc. The Commission also found that there exists substantially large number of consumers who have huge unpaid arrears against them for periods more than 24 months and whose connections have not been permanently disconnected by the Petitioner. The Commission, accordingly, took the view that some of these consumers may be ghost consumers who in reality do not exist. Since sales booked on such consumers artificially reduces the loss levels of the Licensee, the Commission took a serious view in the matter and decided not to allow such dubious/spurious sales in the Tariff Order for the FY 2009-10. The Commission is of the view that unless the Petitioner initiates some serious action in this matter it would not be able to set-right the commercial maladies affecting its system.

However, for projecting the sales for the FY 2010-11, the Commission has analysed the past trends on the actual sales till FY 2008-09 as reported by UPCL without deducting any dubious/spurious sales. The Commission, thereafter, added the sales lost due to load shedding for FY 2008-09 to arrive at unrestricted sales while carrying out the trend analysis. The Commission, accordingly, before projecting the category-wise sales for FY 2010-11, first re-estimated the sales for FY 2009-10 by applying the growth on actual sales for FY 2008-09 including sales lost due to load shedding. The Commission has projected the category-wise sales for FY 2010-11 based on past trends and has then reduced the fictitious/dubious sales from the projected sales for FY 2010-11 for some of the categories in line with the approach adopted in the previous Tariff Order. The approach adopted by the Commission for projecting category-wise sales is discussed in detail under Chapter 7 of this Order.

As regard loss levels considered by the Commission for the FY 2010-11 for projecting the total power procurement requirement of the Petitioner, the Commission would like to mention that the loss reduction trajectory for UPCL was initially fixed at a time when UPCL was looking after both the transmission and distribution functions. Further, the trajectory for reduction of losses by 4% every year specified by the Commission was applicable for an initial period of 5 year only i.e. upto FY 2007-08. Therefore, while determining the UPCL's ARR and Retail Supply Tariff for FY 2007-08 and FY 2008-09, the Commission directed UPCL to submit a loss reduction trajectory from FY 2008-09 onwards. The Commission, in its Tariff Order for the FY 2007-08 and FY 2008-09, however, in absence of any study conducted by UPCL for realistic assessment of losses, rejected the request of UPCL to review the opening level of losses. The Commission in line with past trend further specified a distribution loss target of 22.32% for UPCL for the FY 2008-09.

The Commission during the last year tariff exercise had directed the Petitioner to reduce the distribution losses of 22.32% fixed for FY 2008-09, by a modest 2% to achieve the distribution loss target of 20.32% for the FY 2009-10. Further, in line with the recommendations of task force (Abraham Committee) set up by Ministry of Power, Government of India on APDRP Programme, that licensee with distribution losses in the range of 20 to 30% should be given a loss reduction target of 2% per annum. However, considering Petitioner's submissions regarding difficulties faced by it in reducing the losses, the Commission has set a loss reduction target of only 1.32% for the FY 2010-11 for UPCL. UPCL has, accordingly, to bring down its distribution loss level to 19.00% during the FY 2010-11.

Based on above loss level targets of 19% fixed for the FY 2010-11 from existing 20-32% for 2009-10 given in previous order and considering the sales projected for the FY 2010-11 based on past trends, the Commission has estimated the total power purchase requirement of the Petitioner for the FY 2010-11. The same is discussed in detail under Chapter 7 of this Order.

4.4 Capital Cost of Transferred Assets

The original cost of the Petitioner's capital assets is important as it determines crucial cost elements like Depreciation, Interest and Return on Equity. The Petitioner's assets were originally created by the erstwhile Uttar Pradesh State Electricity Board (UPSEB), which were then transferred to its successor transmission and distribution company in the State of Uttar Pradesh i.e., Uttar Pradesh Power Corporation Limited (UPPCL). After creation of State of Uttarakhand, part of the assets owned by UPPCL (i.e. transmission and distribution assets falling within the geographical territory of Uttarakhand) were transferred to State's new transmission and distribution company namely Uttaranchal Power Corporation Limited (UPCL). The above company (UPCL) was again unbundled into a Transmission Company (PTCUL) and a Distribution Company (UPCL) on 01.06.2004 and only the distribution assets remained with UPCL, i.e. the Petitioner company which is now looking after only the distribution function within the State. For tariff determination, what is relevant is the original cost of acquisition/creation of such assets and not the values that may have been assigned to them during each such transfer. The original cost of these assets is not known and they have been given different values at the time of each such transfer. Their value as per the Transfer Scheme notified by UP Government at the time of unbundling of UPSEB is substantially different from the value agreed to between the concerned companies for the purposes of their transfer from UPPCL to UPCL. The Commission in its earlier Tariff Orders has already detailed upon the approach followed by it for considering the opening value of GFA as Rs. 508 Crore. As the Transfer Scheme is yet to be finalized, the Commission continues with the above approach adopted in previous Orders with respect to opening GFA of UPCL. Upon finalization of Transfer Scheme, the Commission may consider the opening value of assets transferred to UPCL as per Transfer Scheme subject to prudence check.

4.5 Capitalisation of New Assets

The Commission in the previous tariff exercise while determining the ARR and tariff for FY 2009-10, obtained the details of scheme-wise assets capitalized and completed during each of the years from FY 2004-05 till FY 2008-09 including scheme-wise (project-wise) details of the assets capitalized such as Original Capital Cost, Completed Project Cost, Means of Finance, loan agreements, Clearance given by Electrical Inspector, date of energisation and date of actual capitalisation. The Commission analysed the details of actual asset capitalization for FY 2007-08 and FY 2008-09 as well as for previous years and observed that the mandatory Electrical Inspector's clearance had been obtained for very few HT/EHT schemes capitalized by the Petitioner. The

Commission in its Order highlighted that the certificate of Electrical Inspector are mandatorily required to ensure safety of personnel & equipments and as per the statutory provisions, HT/EHT schemes which do not have the clearance of the Electrical Inspector cannot be energised and, hence, capitalised. Accordingly, for determining the ARR for FY 2009-10, the Commission considered the actual asset capitalisation for FY 2007-08 and FY 2008-09 of only such HT/EHT schemes which had the Electrical Inspector's clearance. The Commission further directed the Petitioner to obtain the Electrical Inspector's certificate for all the HT schemes capitalised till FY 2008-09 and submit a copy of the same to the Commission within 3 months from the date of issuance of the Tariff Order for the FY 2009-10.

As regard capitalization of different assets, the Commission had further clarified in its Order for the FY 2006-07 that:

> *"For determining capital related expenditure, in the last tariff Order the Commission had accepted and taken into account Petitioner's projections for commissioning and capitalisation of new assets. It has been noticed that this approach is being misused and there is wide gap between the value of assets projected to be capitalized and the value actually capitalized. Over-projection on this account results in inflating capital related costs and in turn the current tariffs. Therefore, the Commission is accepting only the capital cost of assets actually commissioned and capitalised and ignoring the value of assets projected for capitalisation. Further, additions in value of capital assets, if any, will be taken into account in the next tariff determination exercise with such truing up of related costs as may be warranted."*

The Commission has, accordingly, been considering the cost of only such assets which have been commissioned and put to use by the Petitioner for allowing capital cost related expenses. The Commission, accordingly, in its Tariff Order for the FY 2009-10 directed UPCL to submit the scheme-wise (project-wise) details of the assets capitalized such as Original Capital Cost, Completed Project Cost, Means of Finance, loan agreements, status of Electrical Inspector approval, date of energisation and date of actual capitalisation during the FY 2007-08, FY 2008-09 and FY 2009-10.

Continuing with the approach adopted in the previous year Tariff Order, the Commission, for determining the ARR and tariff for FY 2010-11, has considered the actual asset capitalisation for FY 2007-08, FY 2008-09 and FY 2009-10 of all LT schemes and only those HT/EHT schemes for which the Electrical Inspector's certificates have been obtained and submitted to the Commission.

The Commission in its previous Tariff Order dated October 23, 2009 also mentioned that in case of non-compliance of direction with respect to obtaining approval of Electrical Inspector for all the schemes capitalised till FY 2008-09, the Commission would disallow the capitalizations allowed for the previous years till FY 2006-07. However, in view of steps taken by the Petitioner, the Commission is granting one more opportunity to the Petitioner and not disallowing any capitalizations of past HT/EHT schemes which have already been capitalized upto the FY 2006-07, in this Tariff Order. **The Commission, however, once again directs the Petitioner to obtain the Electrical Inspector's certificate for all the HT schemes capitalised till FY 2009-10 and submit a copy of the same to the Commission alongwith next ARR & Tariff Petition.**

In case necessary steps are not taken by the Petitioner for complying with the above direction of the Commission, it may consider re-determining the ARR for the past years by disallowing all such capitalizations allowed for the past years, i.e. upto FY 2006-07. However, in case the Petitioner complies with the above direction and submits the certificates from the Electrical Inspector for all the schemes capitalised till FY 2009-10, the Commission will consider the actual asset capitalization for FY 2007-08, FY 2008-09 and FY 2009-10 for all the HT/EHT schemes which have not been considered in this Order and approve the capital related expenses such as depreciation, interest, etc. from the retrospective effect, i.e. actual date of capitalization in the next year's tariff.

In its present ARR & Tariff filing, it has been mentioned by the Petitioner that it had incurred a deficit towards actual expenses incurred and receipt from consumers by it towards releasing new LT connections at charges specified by the Commission in its New LT Connection Regulations during FY 2007-08, FY 2008-09 and FY 2009-10. The Petitioner submitted that it had managed this deficit through funding from revenue collection and by cash/liability/credit management mechanism and requested the Commission to consider the deficit amount as equity invested/loan borrowed by the Petitioner in the business. The Petitioner also submitted that these assets have been capitalized by it and added to the asset base. In view of the above submissions, the Commission asked the Petitioner to submit the complete details. In response to the same, the Petitioner submitted the division-wise amounts received from consumers and amount released by it during the period from FY 2007-08 to FY 2009-10. However, other details, as required by the

Commission, such as number of consumers, load released etc. were not given. Since LT schemes do not require Electrical Inspector's clearance, the Commission has allowed capitalization of all such works and also capex related expenses such as depreciation, return on equity and interest in accordance with the Regulations. Accordingly, the Commission has considered the deficit amount funded by UPCL for release of LT connections.

4.6 Interest on Loans

In this regard, Regulation 14(1) stipulates that:

"Interest on loan capital shall be computed loan-wise including on loans arrived at in the manner indicated in regulation 13(4)".

For the purposes of this Tariff Order, the Commission has accordingly considered interest only on that component of a loan that pertains to assets capitalised till 31.12.2009. However, in accordance with prudent accounting practices, the interest paid during construction (IDC) needs to be capitalised and recovered through capital cost related expenses. Interest, therefore, can be allowed only on that part of any loan which remains to be paid after the date of capitalization of an asset.

4.7 Depreciation

The principles to be followed for calculating the depreciation and the rates applicable for it have already been spelt out in the Commission's Regulations. An important feature of these Regulations is that while calculating the value of capital assets, any subsidy or grant received for this purpose is to be reduced from the value of the asset. The Commission proposes to abide by and follow the Regulations on the subject and exclude the assets created by way of grants/subsidies etc., for the purposes of estimating depreciation to be allowed as part of Annual Revenue Requirement. This is important in view of the fact that large number of capital assets have been created by the Petitioner through consumer contributions and further Plan Assistance is flowing by way of 90% grant and 10% loan.

4.8 Truing up for Previous Year

The Commission is required to carry out truing up of approved expenses and revenues of the Petitioner as per UERC (Terms and Conditions for Truing Up of Tariff) Regulations, 2008. In this regard, the Petitioner submitted that since the data of actual expenses and revenue for FY 2009-10 would be available after March 31, 2010 only, therefore, the truing-up for FY 2009-10 would be put up before the Commission along with the ARR & Tariff Petition for FY 2011-12.

Accordingly, considering the request of the Petitioner and considering the fact that the Commission recently issued the previous Tariff Order in October 2009 in which the Commission has carried out the truing up for FY 2007-08 and FY 2008-09, the Commission in this Order has not carried out the provisional true up of the expenses and revenues for FY 2009-10 and would consider the same during the proceedings for determination of ARR & Tariff for FY 2011-12, provided the Petitioner submits all the required details as part of the Petition.

4.9 Operation & Maintenance (O&M) Expenses

Regulation 11 stipulates that for the tariff year O&M expenses shall be computed on the basis of historical costs and the prevailing norms with appropriate validated changes in the same subject to prudence check by the Commission.

Prior to separation of its transmission business, UPCL's operations had been with UPSEB, UPPCL and then UPCL, each one of them being the combined utility of transmission and distribution functions. Subsequently, UPCL got unbundled into UPCL, the distribution licensee, and PTCUL, the transmission licensee. Proper apportionment of O&M expenses between the distribution and transmission operations was not available. Therefore, while determining the Petitioner's distribution tariff for FY 2005-06, the Commission had relaxed the relevant Regulations and determined the O&M expenses for FY 2005-06 after such validation and prudence check as was possible. Having once fixed the base O&M expenses for the distribution licensee for FY 2005-06, the Commission in its previous Tariff Orders for FY 2006-07, FY 2007-08 and FY 2008-09 approved the O&M expenses considering the approved O&M expenses for FY 2005-06 as base value and factoring the changes in the scale of operation and inflation. The Commission in these years has also increased the base value of O&M expenses by percentage increase in number of consumers to capture the increase in scale of operation and then escalated the increased base to account for inflation.

However, for FY 2009-10, considering the impact of salary revision due to implementation of Sixth Pay Commission recommendations, the Commission in its previous Tariff Order dated

October 23, 2009 had computed the O&M expenses for FY 2009-10 for each head i.e., Employee, A&G and R&M expenses separately based on past trends and separately considering the impact of salary revision including arrears. In the present Tariff Order also the Commission shall follow the same approach as followed in the previous Tariff Order. The detailed methodology of the same has been explained in Chapter 7 of this order.

4.10 Tariff Design

Regulation 20 specifies in this regard that:

"20. Cost standard

The tariffs for various categories/voltages shall be benchmarked with and shall progressively reflect the cost of supply based on costs that are prudently incurred by the distribution licensee in its operations. Pending the availability of information that reasonably establishes the category-wise/voltage-wise cost to supply, average cost of supply shall be used as the benchmark for determining tariffs. The category-wise/voltage-wise cost to supply may factor in such characteristics as the load factor, voltage, extent of technical and commercial losses etc.

> *"Provided that for protecting interest of other consumers, tariff for any category of consumers could be evolved in a manner that prevailing market conditions get reflected in it suitably."*

21. Rationalization of the tariff structure

Suitable mergers of categories and of sub categories may be done to evolve a simple, easy to comprehend and logical tariff structure.

22. Peak and Off-peak Tariffs

A differential tariff for peak and off-peak hours may be designed to promote demand side management."

The Government of Uttarakhand on September 25, 2009 has issued the following Policy Directions under section 108 of the Electricity Act, 2003 to the Commission for consideration during the determination of retail supply tariff for consumers in the State:

"The electricity generated by UJVNL and the share of free power of the State made available to UPCL shall be allocated to the State consumers in the following order of priority:

> *i. Private Tube Well*

ii. Domestic Consumers

iii. Government Category Consumers

iv. Other Consumers.

The tariff for different categories of consumers shall be calculated by considering the cost of power as per the above allocation. The Commission may, however, apply merit order in the above priority on State and outside purchases as it deems fit".

Accordingly, the Commission has designed tariff for various categories of consumers considering the provisions of Regulations and Policy Directions issued by the Government of Uttarakhand as elaborated in detail in Chapter 8 of the Order.

Further, the Commission has taken stock of the state of present metering and billing system after issuance of directions in this regard in detailed Chapter in the previous Tariff Order, the results of which have been used in conjunction with the above approach in designing the tariffs in Chapter 8.

5. Review of Petitioner's Metering, Billing and Collection System and its AT&C Losses

5.1 Background

As done in previous years, this Chapter deals with the analysis of performance of the Distribution Licensee, Uttaranchal Power Corporation Limited, in terms of accomplishment of given tasks measured against preset standards. In the distribution business, the important parameters are reduction in Aggregate Technical and Commercial (AT&C) losses, better services and improvement in Consumers' Satisfaction Index.

In order to reduce the Aggregate Technical and Commercial (AT&C) losses, utility needs to set its metering, billing and collection system in order. In this direction, the Commission had already issued number of directives in its previous Tariff Orders to the Distribution Licensee for reducing its AT&C losses by minimizing the percentage of billing on the basis of normative consumption. The Commission had also interacted with Petitioner's Board of Directors and senior management and highlighted that if stern steps were not taken by the Petitioner, it would go deeper into losses and its commercial viability shall be threatened. The Commission feels that to make the system viable and efficient, concerted efforts should be made by the Licensee.

The Commission has, like in previous years, again carried out detailed analysis of UPCL's recent billing database of LT consumers and consumers covered under KCC billing. On analysis of Petitioner's metering and billing data, it was observed that only few divisions have made a little progress but there are still a large number of cases of Meter Not Read (NR), Meter Appears Defective (ADF), Meter Identified Defective (IDF), Reading Defective (RDF), Meter Not Accessible (NA), etc. and consumers with huge pending arrears.

5.2 Commission's Analysis and Directions

5.2.1 *Meter Reading - LT Billing Database*

The Petitioner had, at different occasions, given written assurances to the Commission for curtailing the cases of Meter Not Read (NR), Meter Appears Defective (ADF), Meter Identified Defective (IDF), Reading Defective (RDF) and Meter Not Accessible (NA). However, Petitioner had shown its difficulty to attend all these deficiencies in a short time due to shortage of Meter Readers and bill distributors. The Petitioner has already taken steps in this direction by empowering divisional Engineers to outsource the job of meter reading and bill distribution. At division's level, about 1100 personnel have been appointed for this purpose. However, from the MIS reports submitted by Petitioner, the Commission observed that no substantial improvement has been made in this regard. The Commission expresses its dissatisfaction that despite deployment of around 1100 personnel for meter reading and billing purpose, there is no appreciable reduction in the percentage of NA/NR cases.

In order to highlight the current status of affair in the billing system of the Licensee, the Commission has examined the latest available billing database of about 12.5 lakh domestic consumers of the State, having less than 25 kW load. After examination, the results of billing percentage on actual meter readings, NA, NR etc. were compared with the similar records of 2008-09 and tabulated. To make inter-zone comparison within the Licensee's area, the records were tabulated for Garhwal and Kumaon Zone respectively which are given in Table 5.1:

Since this is a sample analysis and is based on the records of one billing cycle, i.e. November and December 2009, the results cannot become the true representative of the performance of the Licensee. However, this will at least give the trend of the performance of the different divisions of UPCL.

In Garhwal zone, except Uttarkashi, Srinagar, Gopeshwar, Rishikesh and Dehradun (R), all divisions have marginally improved the billing on actual meter readings for domestic consumers. Similarly, the cases of NR were also reduced from the previous year in many divisions. But the present results are still far behind the satisfactory level. Even in Dehradun, having all metered consumers, only 85% consumers are being billed on actual meter reading. Similarly, the number of cases of defective meters had also deteriorated from the previous year. For example, in Uttarkashi cases of defective meters have been increased from 22% to 26%. In Haridwar (R), defective meter cases have increased by 12% from the previous year. Even in Dehradun, there are about 8% of the total consumers having defective meters. The present status of billing in Garhwal Zone is very dismal and needs attention of the management to make immediate concerted efforts to improve the billing on actual meter reading basis and bring down the cases of NA, NR and IDF. If we compare these results with efficient utilities, at least 97% consumers should be billed on actual meter reading.

Table 5.1: Division-wise cases of Actual Reading, NA/NR, ADF, IDF & RDF (Domestic)

Sr. No	Division	Total Consumers	Actual Reading (%)		Not Read (NR) (%)		NA (%)		ADF (%)		IDF (%)		RDF (%)	
			2008-09	2009-10 (Nov-Dec, 10)	2008-09	2009-10	2008-09	2009-10	2008-09	2009-10	2008-09	2009-10	2008-09	2009-10
A-Garhwal Zone														
1	Haridwar (R)	32471	17.60	31.69	73.54	44.97	2.13	4.09	0.31	0.18	5.96	18.15	0.45	0.92
2	Haridwar (U)	41097	66.48	71.48	16.56	2.36	7.25	15.01	1.52	0.98	6.01	8.57	2.18	1.59
3	Roorkee (R)	37063	32.66	42.19	50.72	39.17	0.79	1.07	1.89	1.14	12.26	15.19	1.68	1.25
4	Roorkee (U)	51382	58.73	65.71	25.73	14.27	2.69	7.41	0.38	0.35	8.85	10.28	3.63	1.97
5	Pauri	34970	39.73	62.79	49.10	26.84	0.44	1.60	0.21	0.30	7.29	6.74	3.23	1.73
6	Tehri	54496	42.70	60.71	39.91	18.42	1.11	7.07	10.64	8.48	4.97	4.51	0.66	0.81
7	Uttarkashi	24092	58.91	53.37	13.72	16.23	1.23	1.87	0.70	0.48	21.97	25.64	2.84	1.76
8	Rudraprayag	39246	60.98	89.36	27.99	2.36	1.14	0.38	1.14	0.49	5.91	6.44	2.85	0.96
9	Srinagar	27358	62.01	59.28	27.83	29.8	1.38	3.32	1.04	1.13	6.64	4.90	1.10	1.56
10	Kotdwar	60621	67.14	75.16	23.54	16.53	1.37	1.39	0.16	0.07	6.97	6.31	0.82	0.54
11	Vikasnagar	27992	69.90	77.05	16.81	9.01	0.65	1.14	0.08	0.06	12.11	11.74	0.46	1.00
12	Gopeshwar	46417	77.92	71.15	8.90	13.4	0.98	2.03	3.41	4.83	6.76	6.25	2.04	2.34
13	Rishikesh	42533	79.93	77.40	9.66	9.46	3.46	4.60	0.33	0.28	5.99	7.80	0.63	0.45
14	Dehradun (S)	44868	82.41	84.98	4.88	4.24	4.31	3.31	0.28	0.20	6.02	5.60	2.10	1.67
15	Dehradun (N)	57786	83.34	84.19	4.11	3.85	4.59	2.93	0.29	0.15	6.14	7.87	1.52	1.02
16	Dehradun (R)	57786	85.36	84.19	2.87	3.85	2.71	2.93	0.11	0.15	7.94	7.87	1.01	1.02
17	Dehradun (C)	36929	87.11	89.02	2.34	2.54	2.86	2.27	0.17	0.14	6.82	5.51	0.70	0.53
B-Kumaon Zone														
18	Almora	31767	54.06	66.17	29.04	20.01	2.83	1.95	1.30	0.90	11.90	10.06	0.68	0.74
19	Sitarganj	39027	55.67	55.76	23.62	23.70	4.94	3.44	2.11	2.23	12.12	13.91	1.53	0.95
20	Bazpur	78570	59.86	66.37	19.22	13.13	5.47	6.73	2.33	1.22	12.46	11.95	0.49	0.59
21	Rudrapur	44215	62.05	60.76	17.13	18.20	7.50	6.55	1.39	0.59	10.82	13.37	1.01	0.53
22	Ranikhet	48334	68.91	73.72	25.85	17.74	0.87	0.94	0.20	0.13	3.36	5.94	0.68	0.60
23	Bageshwar	34772	70.54	81.17	16.47	8.63	2.59	0.03	0.80	0.72	8.74	8.46	0.77	0.60
24	Pithoragarh	68849	71.66	71.87	7.81	7.09	7.67	7.94	0.33	0.21	11.06	11.12	1.35	1.51
25	Kashipur	42429	73.56	71.06	14.33	15.82	5.03	4.80	1.00	1.03	5.22	6.31	0.67	0.81
26	Champawat	25699	73.90	81.25	13.28	3.53	1.01	0.72	0.12	0.16	10.97	13.70	0.66	8.53
27	Haldwani (U)	41097	74.90	71.48	9.70	2.36	6.58	15.01	0.17	0.98	8.20	8.57	0.44	1.59
28	Ramnagar	24592	75.47	78.56	11.32	3.69	3.95	4.68	0.06	0.02	8.96	12.10	0.17	0.95
29	Nainital	37270	79.77	81.89	5.98	2.61	6.18	4.64	0.27	0.13	7.62	10.28	0.18	0.43
30	Haldwani (R)	32471	85.60	31.69	3.83	44.97	2.58	4.09	0.08	0.18	7.42	18.15	0.48	0.92

Similarly, in Kumaon Zone, the status of billing is not satisfactory and needs serious attention of the management to take immediate steps in improving the billing. On analysis of the sample data, it is clear that there is slight improvement in some of the divisions in Kumaon Zone in cases of billing on actual meter reading. Bageshwar, Champawat and Almora divisions have improved their performance in terms of billing where cases of actual meter reading have increased and NA/NR cases have reduced. However, almost all divisions have less than 80% billing on actual meter reading, which is highly alarming and should be improved immediately. Similarly, number of cases of defective meters are still very high in Almora, Sitarganj, Bazpur, Rudrapur, Pithoragarh, Champawat, Ramnagar, Nainital and Haldwani (R). In order to improve the billing system, it is absolutely necessary to chalk out a time bound program at division level for reducing the number of defective meters and reading the meters regularly. It is the responsibility of the management to enforce such time bound programmes and monitor the results at least in each quarter of the year.

In this connection, it is necessary to bring out the targets submitted by the Licensee to the Commission for reducing its cases of NA/NR, IDF etc. by end of FY 2008-09 with reference to the levels at the end of FY 2007-08. UPCL had earlier given actual figures for NA/NR, IDF, ADF, RDF etc. as on March 2008 and further submitted its target, division-wise to reduce these figures by the end of financial year 2008-09. Against the targets, the actual levels achieved are given in the following Tables:

Table 5.2: Division-wise Targets committed by Licensee for NA/NR Cases for FY 2008-09

S.No.	Division	NR% (Avg of Feb & March 08)- Base	March-2009-Target	Nov-Dec, 2009 Actual
1	Roorkee (Urban)	33	12	21
2	Roorkee (Rural)	54	20	41
3	Haridwar(Urban)	30	10	17
4	Haridwar(Rural)	71	20	49
5	Dehradun (North)	9	3	7
6	Dehradun(Central)	6	3	5
7	Dehradun (South)	10	3	7
8	Dehradun (Rural)	5	3	7
9	Rishikesh	16	6	15
10	Uttarkashi	13	5	18
11	Vikasnagar	11	4	10
12	Rudraprayag	8	4	3
13	Gopeshwar	5	3	15
14	Kotdwar	20	6	18
15	Srinagar	39	12	33
16	Tehri	34	12	25
17	Kashipur	23	5	20
18	Bazpur	24	5	20
19	Rudrapur	24	5	25
20	Sitarganj	37	10	26
21	Almora	18	5	22
22	Bageshwar	26	6	9
23	Pithoragarh	14	6	15
24	Ranikhet	28	8	19
25	Champawat	13	6	4
26	Haldwani (Rural)	6	3	49
27	Haldwani (Urban)	16	5	17
28	Nainital	7	3	7
29	Ramnagar	16	5	8
	Total (UPCL)	**21**	**7**	**18**

Table 5.3: Division wise Targets for Defective Meter (IDF/ADF/RDF) Cases for FY 2008-09

S.No.	Division	NR% (Avg of Feb & March 2008)- Base	March 2009 - Target	Nov-Dec, 2009 Actual
1	Roorkee (Urban)	10	4	13
2	Roorkee (Rural)	11	7	18
3	Haridwar(Urban)	10	4	11
4	Haridwar(Rural)	6	3	19
5	Dehradun (North)	10	4	9
6	Dehradun(Central)	9	4	6
7	Dehradun (South)	10	4	8
8	Dehradun (Rural)	6	3	9
9	Rishikesh	7	3	9
10	Uttarkashi	20	7	28
11	Vikasnagar	11	7	13
12	Rudraprayag	9	4	8
13	Gopeshwar	11	7	13
14	Kotdwar	8	4	7
15	Srinagar	10	4	8
16	Tehri	17	6	14
17	Kashipur	6	3	8
18	Bazpur	13	5	14
19	Rudrapur	11	7	15
20	Sitarganj	14	4	17
21	Almora	11	6	12
22	Bageshwar	14	5	10
23	Pithoragarh	4	2	13
24	Ranikhet	11	4	7
25	Champawat	10	4	22
26	Haldwani (Rural)	7	3	19
27	Haldwani (Urban)	8	3	11
28	Nainital	11	3	11
29	Ramnagar	9	6	13
	Total	**10**	**4**	**13**

From the above Tables, it has been observed that although UPCL has reduced these cases (particulary NA/NR cases) from March 2008 to March 2009, yet it is far behind the targets set and submitted to the Commission. None of the divisions, except EDD Rudraprayag and Champawat (NA/NR Cases only), have reached the targets submitted by UPCL to the Commission.

From the results, it is obvious that UPCL has not chalked out any drive or monitoring mechanism to reduce these figures which are of utmost importance in reduction of its AT&C losses. **UPCL is hereby directed to make a time bound action plan, division-wise to achieve its targets already set as above within 6 months from the date of issuance of this Order. UPCL is also directed to submit its action taken report and progress on the above by 10th of each month regularly clearly showing the number of cases and %age attained for each parameter during preceding month.**

Although, UPCL has shown some improvement in billing parameters, it has not been able to achieve target improvement for reducing IDF, ADF & IDF cases. The Commission has analysed the data for the month of Nov-Dec 2009 for domestic category and division-wise consumer-wise status of billing parameters are being sent to individual Divisional Engineers to attend to these cases on priority. They are being asked to submit an action taken report by 15.05.2010. The Commission shall now regularly monitor division-wise progress on all the above parameters on its own.

The Commission has further examined the billing database of domestic consumers of the State and found that there are number of other issues that require immediate attention of the Licensee. These are:

(a) Consumers with less than 1 unit per day consumption

(b) Meters not read for more than 6 billing cycles

(c) Defective meters not replaced for more than 6 billing cycles

Table given below shows that there are large number of consumes having less consumption, defective meters having not replaced for more than 6 billing cycles, etc. in each division of UPCL.

Table 5.4: Cases of Low Consumption, NR/ADF in Nov-Dec 2009

Sr. No.	Division	Total Consumers	Consumers having consumption less than one unit per day	Meter Not Read Cases	Defective meters not replaced
1	Haridwar (R)	32471	4200	14600	1400
2	Haridwar (U)	41097	6300	900	1600
3	Roorkee (R)	37063	8000	14500	2000
4	Roorkee (U)	51382	9300	7300	2000
5	Pauri	34970	24200	9400	800
6	Tehri	54496	25200	10000	1700
7	Uttarkashi	24092	9000	3900	1200
8	Rudraprayag	39246	26900	8000	6000
9	Srinagar	27358	12000	8000	500
10	Kotdwar	60621	26000	10000	1800
11	Vikasnagar	27992	9800	2500	1600
12	Gopeshwar	46417	22700	6200	600
13	Rishikesh	42533	6400	4000	2000
14	Dehradun (S)	44868	3500	1900	300
15	Dehradun (N)	57786	3700	850	750
16	Dehradun (R)	57786	9000	2200	2600
17	Dehradun (C)	36929	2700	930	1100
18	Almora	31767	16000	6400	825
19	Sitarganj	39027	8200	9200	4300
20	Bazpur	78570	10600	10300	9300
21	Rudrapur	44215	2900	8000	6000
22	Ranikhet	48354	28000	8500	1800
23	Bageshwar	34772	23300	3000	1000
24	Pithoragarh	68849	42000	4800	2000
25	Kashipur	42429	3800	6700	2700
26	Champawat	25699	13400	900	1200
27	Haldwani (U)	41097	6300	900	1300
28	Ramnagar	24592	6200	900	3000
29	Nainital	37270	20000	900	3000
30	Haldwani (R)	32471	2500	1800	2550
Total		**1266219**	**392100**	**167480**	**66925**

From the above Table, it is clear that 31% consumer of the State in domestic category are consuming less than 1 unit per day, 13% meters are not being read and there are more than 5% meters lying defective. It is, therefore, necessary that Licensee should prepare an action plan for each division separately and implement the same. **The Licensee is hereby directed to chalk out a time bound programme on the priority basis taking those divisions first where defective meters, low consumption and not read cases are high and submit the same within three months.** It should take each division in order of priority based on magnitude of such deficacy, for example as per the above Table the priority for low consumption cases could be Pithoragarh, Tehri, Pauri, Ranikhet, Rudraprayag, Srinagar, Kotdwar, Gopeshwar and then Champawat.

Further analysis reveals that there is very low average consumption in few divisions in hill areas where average consumption in domestic category is also very low even in peak winter season like in the month of December. These divisions are Almora, Bageshwar, and Champawat where average domestic consumption is lower than 50 units per month. Since these areas have chilly cold conditions in winter months and are situated at attitude of more than 2000 meter from mean sea level, it is suspected that consumption of less than 50 units per month is not correct. Similarly, analysis also shows that there are 10 divisions out of 30 divisions of UPCL where load factor of more than 2/3rd consumers are as low as 5%. The Commission expects the Licensee to look into the matter and take appropriate steps to improve their metering system. **The Commission directs the Licensee to carry out the exercise of meter checking of the divisions indicated above and send the report to the Commission within 6 months.**

5.2.2 *Analysis of all Industries having load more than 1000 kVA and load factor less than 15%*

The Commission had issued directions to the Petitioner to submit details of all KCC consumers having load factor less than 10% alongwith MRI reports, Load Survey Reports, Tamper Reports, Phasor Diagrams etc. by 25th day of each month. However, Petitioner is not submitting these reports for all the divisions regularly inspite of vigorous pursuances which shows casual approach being adopted by UPCL on such important issue. It is deeply regretted that despite Commission's untiring efforts in highlighting and providing division-wise list of KCC consumers, having low load factor, to the Petitioner for thorough checking of their installations and meters, there are still consumers in "HT industry with contracted load more than 1000 kVA" category having load factor less than 15%. **The Petitioner is directed to keep a close watch on them and**

take appropriate steps wherever required.

Like previous year, this year also, the Commission has examined the database of KCC consumers having load above 1000 kVA for December 2009 and found that even in these high revenue consumers, about 20% consumers are having load factor less than 15%. Division-wise data of these consumers is given below. **UPCL is directed to check the meters of such consumers physically and submit its report within 1 month from the date of this order.**

Table 5.5: Industries Above 1000 kVA having LF less than 15% in the Month of Dec 09

Name of Division	No. of Consumers
EDD (R) Roorkee	2
EDD (R) Haridwar	5
EDD Bazpur	4
EDD Kashipur	3
EDD Kotdwar	1
EDD Rudrapur	3
EDD Sitarganj	3
Total	**21**

5.3 Replacement of Electro-mechanical Meters by Electronic Meters

The Commission, in its last Tariff Order for the FY 2009-10, directed the Petitioner to replace all old Electro-mechanical Meters with Electronic Meters as specified in CEA's Regulations on metering and submit division-wise Action Plan giving reasonable time frame for replacement of these meters by 31.12.2009 and further to educate the general public regarding features of Electronic Meters and its advantages.

The Petitioner also admitted in various meetings that the existing Electro-mechanical Meters are either slow/defective/sluggish or stuck and, therefore, mere replacement of these Electro-mechanical Meters may enhance the revenue of UPCL by 25% to 30%. It has also been observed that Petitioner does not have proper system in place for checking of meters either on its own or through complaints of the consumers as it does not have enough "Accu-check" instruments to check the accuracy of meters at site. The Licensee has given to the Commission the details of consumers in different Circles of UPCL who have electro-mechanical meters which is given in the Table below:

Table 5.6: Status of pending Electro-mechanical Meters as on 31.03.2010

Name of Circle	Balance Electro-mechanical Meters to be replaced by Electronic Meters
Electricity Distribution Circle (Urban), Dehradun	38500
Electricity Distribution Circle (Rural), Dehradun	41743
Electricity Distribution Circle, Srinagar	51817
Electricity Distribution Circle, Roorkee	27620
Electricity Distribution Circle, Hardwar	15763
Garhwal Zone	**175443**
Electricity Distribution Circle, Haldwani	49933
Electricity Distribution Circle, Rudrapur	44837
Electricity Distribution Circle, Ranikhet	65857
Kumaon Zone	**160627**
Total	**336070**

From these details, it is found that the Licensee has still about 25% of total meters in the State which are electro-mechanical. The Licensee has proposed to replace such electro-mechanical meters with electronic meters by the end of this year. The Commission expects that the Licensee shall adhere to its commitment and complete the replacement work by the end of this year.

In order to get correct revenue from sale of energy, it is necessary that the metering system of the Licensee is accurate so as to measure the consumption of electricity correctly. As per Regulations 3.1.3 of Supply Code Regulations notified by the Commission on 22.04.2007, the Petitioner is required to test every bulk supply meter every year and LT meters atleast once in five years. Therefore, all the LT and HT meters should have been tested by now but there is no report from the Petitioner in this regard. It shows that the Licensee is not showing serious concern towards maximizing its revenue by charging correct bills from its consumers.

The Commission understands that testing of all meters at one go is not possible and it shall take some time. Therefore, to begin with, it has been decided by the Commission to start the testing of those meters where consumption is at a very low load factor. The Petitioner, through the last Tariff Order for FY 2009-10, was directed to undertake testing of meters of all such consumers in domestic, non-domestic and industrial categories whose monthly load factor is less than 10% within six months and report compliance alongwith result of such testing by the following month end. However, no such report on the issue has been submitted by the Petitioner till date. In the present analysis of database of KCC consumers, there are large number of HT consumers who are consuming less than 10% of their load.

5.4 Billing

The total number of consumers having contracted load of 25 kW or above is around 4500 only which account for more than 60% of consumption and more than 70% of revenue and, therefore, their billing data need strict monitoring to get much better results. The Commission earlier has analysed the billing data of these consumers from May 2009 onwards in its earlier Tariff Order and provided the list of following consumers with a direction to the Petitioner to physically examine each and every consumer installation :-

(a) Consumption pattern of several consumers changed abruptly and, in some cases, dropped to less than 1/3rd in some of the months;

(b) Multiplying factor of several consumers changed without change in contracted load;

(c) Multiplying factor of large number of consumers was far less than required as per the contracted load;

(d) Load factor of large number of consumers was less than 10% and some of these consumers have three shift operation.

No compliance report on the above direction has been submitted by Petitioner till date. **Petitioner is hereby directed to examine all such cases and send the compliance report within one month from the date of this Order.**

Through its Tariff Order for the FY 2009-10, the Commission had directed the Petitioner to raise only computerized bills for all the category of consumers w.e.f. 01.02.2010, thereafter no bill shall be raised manually. However, it has been observed that bills of some LT categories such as Government Irrigation System, Public Lighting etc. are still being issued manually.

Petitioner is again directed that no bill, under any circumstance, shall be raised manually w.e.f. 01.05.2010.

The Commission further directs the Petitioner to issue bills on meter reading basis for all the LT and HT consumers and no bill shall be issued provisionally for more than two consecutive billing cycles under any circumstances w.e.f. 01.05.2010.

5.5 Fictitious Meter Cases

In the last Tariff Order for FY 2009-10, the Commission had flagged the issue of large number of fictitious meters in Licensee's database. Even the Commission had adjusted the spurious consumption of such fictitious consumers. As regards elimination of fictitious meters wrongly shown as unmetered consumers or as metered one with fictitious meter numbers, the Petitioner was directed earlier vide Commission's Order dated 05.04.2007 to provide correct meters in all such installations within three months, issue of wrong reporting including fictitious purchases and installation of meters to be properly investigated immediately and fix the responsibility of these misreportings. However, the Petitioner has not taken any concrete step even after the lapse of three years in this regard and about 46,000 consumers with fictitious meter numbers still exist. The Petitioner through the last Tariff Order for FY 2009-10 was directed to initiate the exercise of identifying such "ghost" consumers and writing them off from its accounts under a transparent policy adopted for identifying and writing off bad debts so that true and correct position of losses could emerge by the end of the financial year. However, no concrete progress has been shown by the Petitioner in this regard also.

5.6 Collection System

The whole process of reduction of AT&C losses may go waste in case proper collection process for recovery of outstanding dues is not in place. During the field visits conducted by Commission's officers, it has been revealed that delivery of bills to the consumers are not being acknowledged neither there is any mechanism to countercheck that bills have been delivered to the consumers. **The Petitioner is hereby directed to evolve some mechanism for counter-checking that bills have been delivered to the consumers and submit compliance report thereon within three months.** It has further been observed that long queues of consumers at the Cash Collection Centres have been seen for deposition of the bills and, therefore, the Petitioner is directed to explore the other possibilities to get the bills deposited through other modern means such as banks, credit/debit card and internet banking which can now be easily implemented with the development of IT.

It has also been observed that outstanding dues of the defaulting consumers are not monitored throughout the year resulting into accumulation of dues and thrust is given by the Field Engineers only in last months of the financial year.

The Petitioner is hereby directed to monitor the recovery of outstanding dues regularly throughout the year and submit a regular report by 10th of each month, division-wise showing

the collections against billed amount, number of defaulters against outstanding amount of more than Rs. 1 lakh.

5.7 Energy Audit/AT&C losses

The aim of energy audit is to monitor the energy flow within and beyond the various transformation levels of LT distribution network which helps to identify areas where system efficiencies can be improved and theft can be controlled. This data can be developed for study of load curve after DTs provided with ToD meters. The Commission, therefore, in its last Tariff Order for FY 2009-10 had directed the Licensee to report to the Commission an Action Plan for doing energy audit at DT level for the areas where loss level is in the range of 30% or more within 45 days which should have included total number of DTs in each division, number of DTs provided with energy meters and list of DTs where loss level is in the range of 30% or more. However, the Licensee has not submitted any action plan in this regard. During the field visits conducted by Commission's officers, it has been observed that DTs have not been provided with meters and in some places, if provided, these are lying defective/not read for months/years together. The Licensee should appreciate that DT is the basic level of supply to assess/ascertain the level of losses, which can, hence, be controlled DT wise. Therefore, this exercise of DT metering and reading should be taken on top priority. **The Petitioner is, therefore, directed to provide DT meters at all the distribution transformers, as directed earlier within three months from the date of issuance of this Order and submit its first report within two months immediately after the completion of these three months indicating the current level of loss at each DT. The Commission also directs UPCL to identify six highly theft prone DTs in each division as "Divisional Pilot Project" and carry out its energy audit after completing indexing/tagging of the consumes and installing DT meters, within one month and submit its first report on current level of losses on these DTs within three months from the date of this Order.**

The Commission had also sought the details of energy input/billed/collected and AT&C losses from UPCL. UPCL has submitted these details upto November 2009. The analysis of top 10 divisions having highest losses (more than 50%) has been carried out as per details given below:

Table 5.7: Analysis of top ten Divisions having highest AT&C losses in UPCL

Division			Pithoragarh	Vikasnagar	Haldwani (U)	Champawat	Bageshwar	Srinagar	Rudra Prayag	Roorkee (U)	Ram Nagar	Nainital	Total
November 2008 viz-a-viz 2009	2008	I/P	9.43	7.22	10.64	4.20	3.97	4.47	4.00	30.91	7.49	8.03	**90.36**
		T&D	47.28	55.77	28.06	34.43	44.54	31.19	54.04	49.16	32.31	27.20	
		AT&C	69.59	55.19	42.45	41.92	33.74	51.93	58.77	52.28	47.41	53.06	
	2009	I/P	10.42	7.72	10.53	4.42	4.29	6.38	4.18	28.74	7.85	9.05	**93.58**
		T&D	46.53	45.10	16.16	39.42	40.20	9.14	52.09	29.95	24.20	16.97	
		AT&C	76.67	73.66	56.06	58.84	56.86	52.89	56.62	50.68	33.54	72.18	
October	2008	I/P	8.33	7.24	11.64	4.43	3.84	4.63	3.99	31.98	7.44	7.33	**90.85**
		T&D	38.65	52.16	32.96	36.66	23.71	25.48	40.58	44.00	36.99	33.33	
		AT&C	67.02	59.51	53.35	56.58	29.26	49.16	58.06	52.07	54.49	51.98	
	2009	I/P	9.54	8.88	11.83	4.62	4.19	5.99	4.08	30.14	8.10	8.15	**95.52**
		T&D	43.33	55.91	31.63	43.02	34.75	18.25	43.18	18.70	18.60	15.34	
		AT&C	66.37	60.55	43.36	58.39	65.61	48.05	55.26	33.20	37.70	45.30	
August	2008	I/P	8.17	7.27	12.39	4.45	3.55	4.90	3.35	37.26	8.57	6.85	**96.76**
		T&D	37.64	54.09	37.94	37.40	18.32	25.49	45.05	48.84	47.26	29.83	
		AT&C	60.17	83.19	49.66	57.63	20.15	49.23	58.43	63.78	52.67	55.71	
	2009	I/P	8.62	7.94	14.29	4.62	4.64	6.25	3.88	35.37	9.97	7.14	**102.72**
		T&D	43.26	48.48	44.76	43.24	44.51	34.07	40.92	33.54	35.74	24.81	
		AT&C	67.46	62.84	59.52	64.20	67.93	58.42	51.23	45.58	55.46	49.75	
September	2008	I/P	7.69	6.93	11.77	4.17	3.45	4.42	3.39	35.06	8.29	6.34	**91.51**
		T&D	30.62	46.25	33.92	38.55	26.08	29.17	50.74	57.10	44.62	15.41	
		AT&C	65.16	62.29	48.37	44.96	23.18	49.87	63.13	63.59	49.11	51.45	
	2009	I/P	8.33	7.92	12.98	4.48	3.95	5.69	3.94	34.03	9.63	7.13	**98.08**
		T&D	40.33	48.76	33.86	44.47	37.59	-8.57	48.81	30.32	30.05	1.84	
		AT&C	51.37	50.58	57.09	51.62	47.12	27.98	57.20	41.90	48.22	32.35	
YTD	Nov. 2008	AT&C	66.48	66.74	55.27	55.30	39.26	51.95	59.66	61.14	58.66	51.09	
	Nov. 2009	AT&C	65.33	65.16	57.58	57.30	56.31	52.99	52.13	50.83	50.38	50.03	

**T&D and AT&C losses are in %age*
**I/Ps are in MUs*

From the above, it has been observed that out of such 10 divisions, AT&C losses in 4 divisions namely EDD Haldwani(U), Champawat, Bageshwar and Srinagar have increased whereas in other 6 divisions, the losses have been reduced marginally. It appears that no focused effort is made by Licensee for reduction of AT&C losses inspite of the fact that AT&C losses are required to be brought within 15% by the end of FY 2011-12 failing which the Central Government's grant to be received under APDRP (II) would be converted into loan and cost of carrying such loan may not be pass through as it would be entirely due to inefficiency on the part of the Petitioner's company.

The Petitioner is, therefore, again directed to identify those divisions where distribution losses are high and get a complete energy audit done in those divisions, distribution transformer-wise and submit thereupon a report within six months from the date of issue of this Order.

For reduction of AT&C losses effectively, the Petitioner is required to focus on elimination of cases of IDF, ADF, RDF, NA/NR, billing without any basis, not billed, recovery of huge arrears, liquidation of fictitious meter cases, energy audit of each DT to identify the high loss areas and taking corrective actions, in addition to bringing the unmetered consumers into metering/billing net on priority.

It is a matter of grave concern that industries on Independent feeders are also having low load factors and the Petitioner is turning a blind eye to them. **The Petitioner is directed to carry out MRI of both the sending as well as the consumer end meters and send its analysis alongwith the MRI report to the Commission within 3 months of this Order**. The Petitioner is also advised that it should adopt the practice of taking MRI at both end of the independent feeder on regular basis and study the same for any discrepancies. The Petitioner should also conduct regular testing/calibration of sending end meters, so as to ensure that these meters are accurate.

Further, it was stipulated in the Tariff Order for FY 2009-10 that supply to steel industries shall be made available at voltage of 33 kV or above through a dedicated individual feeder only with check meter at sub-station end and difference of more than 3% between reading of check meter and consumer meter(s) shall be immediately investigated by the Licensee and corrective action shall be taken. However, no report in this regard has ever been received by the Commission. **The Petitioner is hereby directed to install meters at sending end to all such consumers who have been given supply on HT/EHT voltage level through a dedicated independent feeder. Petitioner is further directed to incorporate the readings of sending end meter in the monthly bills of such consumers to reflect the difference of readings between sending end meter and consumer meter as per format of bill given in the Teble below, showing the difference is more than 3%, such cases need to be immediately investigated and Action Taken Report on such cases should be submitted to the Commission by 10th of every month**.

Table 5.8: Format of Bill for Checking Meter Accuracy

Reading Slot	Last Reading		Current Reading		MF		Unit Consumed		Unit Adjusted		Unit Assessed		Total Unit		Diff. in M1 & M2 (%)
	M1 (Sub-Station	M2 (Consumer)	M1	M2	M1	M2	M1	M2	M1	M2	M1	M2	M1	M2	
C1															
C2															
C3															
C4															
Total															
Cum. Max. Demand															

Further, on sample examination of industries having load more than 1000 kW, it has been observed that there are 3 connections in EDD-Rudrapur, 2 connections in Roorkee (R) and 7 connections in EDD-Kotdwar where meters have been replaced without changing its MF. It is not known why meters of such consumers have been replaced when they are not shown defective. **The Petitioner is directed to submit a comprehensive report of all such connections where meters have been replaced during last one year with the reasons for the replacement alongwith their sealing reports and consumption for last one year latest by 15.07.2010.**

5.8 Conclusion

After analyzing the data related to Uttaranchal Power Corporation Limited's metering, billing and collection system, it has been concluded that there is an urgent need of performance improvement at all levels in the organization. The performance improvement can be done by modifying the existing practices at the field level so as to improve the metering, billing and collection which in turn will help in effectively reducing the losses and increasing the revenue. The concept of performance improvement should be applied not only at individual level but at organization level too. For improving the performance at organization level, UPCL's management will have to put into place and manage a program which accurately measures the current level of performance at field level and generate innovative ideas for modifying the current practices to achieve higher revenue and better results. This can be achieved by inculcating a culture of human resource development in the organization. Training and development activity aims at bettering the performance of individual and groups and to get the better results. The Commission has always put forth the idea of the man power development and training programs at all levels in the Utilities.

6. Implementation of Hon'ble ATE's judgment dated 06.10.2009 in Appeal No. 85 of 2008

M/s Polyplex Corporation Limited filed an Appeal No. 85 of 2008 before the Hon'ble ATE against the Commission's Tariff Order for FY 2007-08 and FY 2008-09 dated March 18, 2008. The Hon'ble ATE issued its Judgment on Appeal No. 85 of 2008 and IA No. 114 of 2008 on October 6, 2009. Hon'ble ATE, in the above-said Judgment, has directed as under:

"In view of the above, we allow the appeal and set-aside the impugned order to the extent of tariff fixed for the category of the appellant, namely, HT Industry with contracted load above 1000 kVA and load factor above 50% and subjected to additional supply surcharge for continuous supply without adversely affecting the tariff of any other category. ***The Commission shall re-determine the tariff for this category keeping in view the observations made in this judgement.*** *The respondent No. 2 shall refund the amount found to have been recovered from the consumers of the aforesaid category on account on the re-determined tariff. Such refund will be made by adjustment against the electricity bills of the next 12 months. It will be open to the respondents to create regulatory assets, if necessary, to meet this liability."*

The Commission is, thus, required to re-determine tariff for the set of HT Industry consumers with contracted load above 1000 kVA and load factor above 50% and subjected to additional supply surcharge for continuous supply ('set of consumers') keeping in view the observations made by Hon'ble Tribunal in the above judgment. The important observations that need to be considered for re-determination of tariff are Cross-subsidy and Tariff Shock. The Commission obtained the actual monthly billing data for the set of HT consumers with contracted load above 1000 kVA and load factor above 50% and subjected to additional supply surcharge for continuous supply for the period FY 2008-09. Based on the actual billing data for this set of consumers, the extent of cross subsidy for this set of consumers works out to around 25%, while the cross-subsidy for entire HT Industry category at the tariffs approved in the Order dated March 18, 2008 works out to 17%.

The Tariff Policy stipulates the follows as regards the cross-subsidy:

"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 subsidised 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-subsidising categories*** *should not go beyond Rs 3.60 per unit* ***(emphasis added)****."*

From the above provision of the Tariff Policy, it is clear that the category-wise tariffs have to be within ± 20% of average cost of supply by the end of year 2010-11 and not the tariff for each and every consumer. Further, the Tariff Policy by way of illustration clearly stipulates that the tariff for cross-subsidising categories can be up to 20% higher than the average cost of supply. It also implies that where tariff for subsidizing categories is already within 120% of cost of supply, cross subsidy need not to be reduced further.

Considering that cross-subsidy for this set of consumers being 25% slightly higher than limit of 20% prescribed for the entire category in the tariff policy to be attained by 2010-11 and tariff increase of 40% for this set of consumers, the Commission has re-determined the tariff as elaborated in the following Section.

For re-determination of tariff for the above said set of consumers, the Commission has examined the options of modifying (i) the demand charge, (ii) the energy charge and (iii) the continuous supply surcharge.

As uniform Demand charges are payable by all HT consumers with contract load above 1000 kVA, any reduction in demand charges for HT consumers with contract load above 1000 kVA and load factor above 50% would lead to discrimination vis-a-vis the other consumers with contract load above 1000 kVA but with load factor below 50% and hence, it will not be appropriate to reduce the demand charges only for specific consumers with load factor above 50%.

The energy charges for HT consumers vary based on the load factor and energy charges for a particular load factor are same irrespective of the Contracted Load. Therefore, if the energy charges are modified for HT Consumers with load factor above 50%, it will be applicable to both sub-categories i.e. upto 1000 kVA and above 1000 kVA. Hence, charging the same only for consumers above 1000 kVA would lead to discrimination vis-a-vis the consumers with contracted load below 1000 kVA but with load factor above 50%.

The Continuous Supply surcharge of 20% was applicable for all the consumers within RTS 7 Category who had willfully opted for continuous supply. Therefore, any reduction in Continuous Supply Surcharge only for set of consumers having load above 1000 kVA and load factor of more 50% would again result into discrimination. Further, if the Continuous Supply Surcharge is modified only for set of consumers having load above 1000 kVA and load factor of more 50%, the effective tariff of this set of consumers will be lower than some of the consumers having load above 1000 kVA and load factor between 33% to 50%. Further, in such scenario, the effective tariff of this set of consumers will also be lower than the some of the consumers having load below 1000 KVA and load factor more than 50%.

Considering the above aspects, the Commission is of the view that the re-determination of tariff can be best achieved by reducing the continuous supply surcharge for all the consumers who had opted for continuous supply and paid the continuous supply surcharge @ 20% of energy charges. Accordingly, the Commission reduces the continuous supply surcharge and approves the same as 10% of energy charges for all the consumers under RTS 7: LT and HT Industry Category who had opted for continuous supply.

In accordance with the ATE Judgment, the Commission directs the UPCL to compute the amount to be refunded to all the consumers under RTS 7: LT and HT Industry Category who had opted for continuous supply for the period March 1, 2008 to September 30, 2009 based on continuous supply surcharge of 10% approved in this Order and refund the amount to respective consumer within 12 equal monthly instalments from April 2010 to March 2011.

At re-determined tariffs, the cross-subsidy for the Set of Consumers with contracted load above 1000 kVA and load factor above 50% and subjected to additional supply surcharge for continuous supply reduces to around 16% and the tariff impact also reduces to around 30%.

Based on the actual data, the impact of re-determination and amount to be refunded to consumers who had opted for continuous supply, works out to around Rs. 30 Crore. The Commission has added this estimated refund amount of Rs. 30 Crore to UPCL's ARR for FY 2010-11. **The Commission directs UPCL to submit the consumer-wise amount to be refunded to the Commission within two months from the date of this Order.**

7. Analysis of Annual Revenue Requirement

This Chapter deals with the determination of projected ARR of the Petitioner for the FY 2010-11. To determine the ARR of the Petitioner for the FY 2010-11, the Commission has first projected the monthly power purchase requirement of the Petitioner by estimating the category wise sales based on past trends and considering the normative distribution losses fixed for the FY 2010-11. After determining the monthly power purchase requirement, the Commission has determined the overall power purchase cost of the Petitioner for the FY 2010-11 by running monthly merit order. The Commission has thereafter, estimated the other elements of ARR such as Depreciation, O&M expenses, Interest and Finance Charges, Working Capital requirement and Return on Equity to project the total ARR of the Petitioner for the FY 2010-11. The submissions of the Petitioner and analysis of different components of the ARR are discussed in detail in the subsequent paras of this Chapter.

7.1 Sales forecast for 2010-11

As discussed in the Commission's Approach in Chapter 4, the Commission has scrutinized Petitioner's projections for category-wise sales during FY 2010-11 based on the past trends.

The Commission has projected category-wise un-restricted sales for FY 2010-11 considering re-estimated sales for FY 2009-10 as base and applying a growth rate equivalent to Compounded Annual Growth Rate (CAGR) of annual sales for past years. For most of the categories, the Commission has considered 5 years' CAGR. In cases of deviation from this approach, the reasons for the same have also been recorded.

Upon analysis of the billing data, the Commission found that consumption of around 12% for domestic category and 9% for non-domestic and LT industrial category had been booked on normative basis and, hence, is on account of dubious/spurious sales to ghost/non-existent consumers. The Commission, while projecting the sales for FY 2010-11, has reduced such dubious/inflated sales from the sales projected on past trends for different consumer categories.

7.1.1 *Domestic (RTS-1)*

The Petitioner has considered a growth rate of 5.46% in respect of sales to domestic consumers other than Snow Bound Area Consumers and growth rate of 6.49% for sales to Snow

Bound Area Consumers and accordingly projected energy sales to domestic consumers and Snow Bound Area Consumers during FY 2010-11 as 1,223.31 MU and 18.51 MU, respectively. The total consumption for domestic category for FY 2010-11 is projected at 1241.82 MU.

For projecting sales for FY 2010-11, the Commission has considered five years' Compounded Average Growth Rate (CAGR) of 5.91%. As discussed above, the Commission has further reduced the sales of Domestic Category by 12% on account of fictitious sales from the sales figures arrived for FY 2010-11 after applying the growth rate. Hence, the sales for domestic Category for FY 2010-11 works out to 1215.10 MU.

For snowbound consumers, the Commission has projected the sales by considering the growth rate of 6.49% equivalent to two years CAGR on the approved sales for FY 2009-10 as the data for snowbound consumers is not available for last 5 years only.

Based on these assumptions, the total consumption of domestic consumers as estimated by the Commission for FY 2010-11 works out to 1232.79 MU against 1241.82 MU projected by the Petitioner.

7.1.2 *Non-Domestic (RTS-2)*

The Petitioner has estimated sales to Non-Domestic Consumers on the basis of growth rate of 5.44%. Thus, the Petitioner has projected a total sale of 717.42 MU for FY 2010-11 in this category.

For projecting sales for FY 2010-11 the Commission has considered five years' Compounded Average Growth Rate (CAGR) of 6.54%. As discussed above, the Commission has further reduced the sales of Non-Domestic Category by 9% on account of fictitious sales from the sales figures arrived for FY 2010-11 after applying the growth rate. Based on these assumptions, the total consumption of non-domestic consumers as estimated by the Commission for FY 2010-11 works out to 697.69 MU against 717.42 MU projected by the Petitioner.

7.1.3 *Public Lamps (RTS-3)*

The Commission has applied a 5 year CAGR of 6.24% for projecting the consumption for FY 2010-11. With these assumptions, the total consumption of public lamps as estimated by the Commission for FY 2010-11 works out to 47.35 MU, which is the same as estimated by the Petitioner.

7.1.4 *Private Tube-Wells (RTS-4)*

The Petitioner has recasted the consumption for un-metered private tube wells using specific consumption @ 85.95 units per BHP per month. The Petitioner has considered a growth rate of 12.61% based on 6 year CAGR and has projected consumption for Private Tube-Wells as 157.42 MU for FY 2010-11.

The Commission has considered average connected load for FY 2010-11 as submitted by the Petitioner. Further, the Commission has applied the actual load factor of the metered consumers which works out to 78.31/BHP/month for FY 2008-09. On the basis of the connected load and load factor, the Commission has estimated sales of 142.24 MU for FY 2010-11 for this category against 157.42 projected by the Petitioner.

7.1.5 *Government Irrigation Systems (RTS-5)*

The Commission has applied a 5 year CAGR of 6.68% for projecting the consumption for FY 2010-11. With these assumptions, the total consumption of public lamps as estimated by the Commission for FY 2010-11 works out to 112.44 MU against 115.70 projected by the Petitioner.

7.1.6 *Public Water Works (RTS-6)*

The Commission has applied a 5 year CAGR of 9.16% for projecting the consumption for FY 2010-11. With these assumptions, the total consumption of public lamps as estimated by the Commission for FY 2010-11 works out to 244.55 MU against 223.15 projected by the Petitioner.

7.1.7 *Industry (RTS-7)*

The Petitioner has projected sales for industrial consumers at 3724.79 MU in FY 2010-11. The Petitioner has projected the sales to LT Industry category during FY 2010-11 by considering a growth rate of 6.40% on approved sales for FY 2009-10. The Petitioner has, accordingly, projected consumption of LT Industrial consumers as 204.54 MU for FY 2010-11. For HT Industrial consumers, the Petitioner has applied a growth rate of 12.28% on approved sales for FY 2009-10 for working out sales for FY 2010-11 and has projected the sales to HT Industrial consumer as 3520.25 MU.

Commission's approach towards projecting sales for LT Industries and HT Industries is discussed below:

7.1.7.1 LT Industries

For projecting sales for FY 2010-11, the Commission has considered five years' Compounded Average Growth Rate (CAGR) of 19.01%. The Commission has reduced the sales of LT Industrial category by 9% on account of fictitious sales from the sales figures arrived for FY 2010-11. Based on above, the total consumption of LT Industries as estimated by the Commission for FY 2010-11 works out to 231.49 MU.

7.1.7.2 HT Industries

The Commission has considered a nominal growth rate of 10% on sales to HT industries for projecting the sales under this category. With this assumption, the Commission has estimated the consumption of HT industry as 3448.76 MU for FY 2010-11.

7.1.8 *Mixed Load*

For mixed load, the Commission has accepted the projections made by the Petitioner for increase in sales during FY 2010-11 and approved the same as 106.86 MU.

7.1.9 *Railway Traction*

The Petitioner has projected sales under this category to be 14.94 MU in FY 2010-11 considering an estimated increase of 20% on account of expected growth in traffic. The Commission has accepted the projections made by the Petitioner for increase in sales during FY 2010-11 and approved the same as 14.94 MU.

The Summary of the category-wise sales projected by the Petitioner and as accepted by the Commission for FY 2009-10 is given in the Table below:

Table 7.1: Category-wise Sales for FY 2010-11 (MU)

S.No.	Category	Proposed by Petitioner	Accepted by Commission
1	Domestic (RTS - 1)	1,223.31	1,215.10
2	Concessional Snowbound Area (RTS - 1A)	18.51	17.69
	Sub-Total (Domestic)	1,241.82	1,232.79
3	Non-domestic, incl. Commercial (RTS - 2)	717.42	697.69
4	Public Lamps (RTS - 3)	47.35	47.35
5	Private Tubewell/Pump Sets (RTS - 4)	157.42	142.24
6	Government Irrigation System (RTS - 5)	115.70	112.44
7	Public Water Works (RTS - 6)	223.15	244.55
8	Industrial Consumers (RTS - 7)	3724.79	3680.25
	LT Industrial	204.54	231.49
	HT Industrial	3520.25	3448.76
9	Mixed Load (RTS - 8)	106.86	106.86
10	Railway Traction (RTS - 9)	14.94	14.94
11	Extra State Consumers	1.00	1.00
Total		**6,350.45**	**6,280.12**

7.2 Distribution Losses

The Petitioner has proposed to reduce its distribution losses to the level of 24% in the FY 2010-11. The Petitioner has further submitted that actual distribution losses for FY 2008-09 were 28.01% and as the Commission has considered reduction of sales on account of provisional billing under NA, NR, IDF, ADF, RDF, cases, the distribution losses would further increase to 31.02% during FY 2008-09. The Petitioner highlighted that the distribution network inherited by the Petitioner is overloaded and inadequate to meet the growing demand of electricity within the State. The Petitioner has submitted that it is trying to achieve socio-economic objective by providing power supply to even remote and far-flung areas under the schemes like RGGVY, PMGY, AREP etc. which leads to increase in LT network length and thereby increased distribution losses.

The Commission has considered the distribution loss level of 44.32% for FY 2002-03, and further set the loss reduction target as 4% p.a. for next five years, on the basis of which the target of distribution losses set for FY 2007-08 was 24.32%. However, for FY 2008-09, the Commission considered a reasonable loss reduction target of 2%. The Commission in its Tariff Order for FY 2009-10 has adopted the same approach followed in the previous Tariff Order while approving the losses for FY 2009-10.

As discussed in Chapter-4 of this Order, the Commission has set an even more reasonable target of loss reduction of only 1.32% for the FY 2010-11. Accordingly, the estimated energy requirement at distribution periphery and approved loss level for FY 2010-11 are given in the Table below:

Table 7.2: Approved Energy Input Requirement at Distribution Level (MU)

Particulars		FY 2010-11
Distribution Sales		6,280.12
Loss Level for Energy Input		20.32%
Energy Input Requirement at T-D Interface		7881.68
Commercial Loss Reduction	%	1.32%
	MU	104.04
Total Sales with Efficiency Improvement		6384.16
Overall Distribution Loss (%)		19.00%

Thus, after considering the transmission loss of 1.86% for PTCUL system, the total energy requirement of UPCL at State boundary, works out to be 8031.06 MU and total sales with efficiency improvement as6374.16 MU for FY 2010-11.

7.3 Power Purchase Requirement for 2010-11

7.3.1 *Sources of Power*

UPCL has four primary sources of firm power, viz.,

- Generating Stations of UJVNL
- Central Generating Stations (CGS)
- Share of 12% free power of the State Government of Uttarakhand
- Independent Power Producers (IPPs) and Other generating stations in the State of Uttarakhand

In addition to the above sources, UPCL has Banking arrangements with Utilities in other States and it also procures power on short term basis from trading licensees/power exchange.

7.3.2 *Energy Availability from UJVNL*

The Commission has considered the availability of UJVNL generating stations for 2010-11 as under:

- For 9 main generating stations and Pathri and Mohammadpur stations of UJVNL, monthly availability of individual stations as projected by UJVNL
- For existing SHPs, based on the monthly projections submitted by UJVNL

- For Maneri Bhali-II, monthly availability as projected by UJVNL

The Commission has estimated the energy sent out from these generating stations after considering the normative auxiliary consumption. Accordingly, the availability of power from UJVNL stations to UPCL for FY 2010-11 after excluding Himachal Pradesh's (HP) share works out to be 4252.02 MU.

The summary of the energy availability for FY 2010-11 from UJVNL stations as approved by the Commission is shown in the Table below:

Table 7.3: Energy from UJVNL Stations during FY 2010-11 (MU)

Particulars	Approved
UJVNL-Main Stations	2,857.87
Maneri Bhali-II	1,188.00
UJVNL-SHPs	73.49
Pathri	94.05
Mohammadpur	38.61
Total	4,252.02

7.3.3 *Energy Availability from Central Generating Stations*

The Commission in its previous Tariff Orders has been considering the annual generation targets as specified by the Central Electricity Authority (CEA). However, for FY 2010-11, CEA has specified generation targets of Central Sector Generating Stations are not yet available. In the absence of annual generation targets specified by the CEA for FY 2010-11, the Commission has considered average generation of previous three years for estimating the energy availability during FY 2010-11 from generating stations of National Thermal Power Corporation Ltd (NTPC). However, for Kahalgaon Stage-II, the Commission has considered the Plant Load Factor (PLF) of 85% for estimating the energy availability as this is a new station and the last three years' actual generation data is not available. Further, the Commission has considered the average of last three years monthly generation pattern from these stations for projecting the monthly energy availability for FY 2010-11. The energy sent out from these stations has been estimated considering the normative auxiliary consumption as specified by CERC in the respective Tariff Orders.

For estimating the energy availability from hydel generating stations of NHPC, in absence of annual generation target specified by CEA for the 2010-11, the Commission has considered the station-wise details of the estimated generation as submitted by NHPC to UPCL for FY 2010-11 and has considered the average of last three years monthly generation pattern from these stations for projecting the monthly generation availability for the FY 2010-11. In addition to the energy availability from existing generating stations, the Commission has also considered the energy availability from Sewa during the FY 2010-11 based on the energy estimation made by NHPC and conveyed to UPCL.

For estimating the energy availability from Tehri hydel generating station, in absence of the annual generation target as specified by CEA for FY 2010-11, the Commission has considered the details of the estimated generation as submitted by THDC to UPCL for FY 2010-11 and has considered the monthly generation pattern as submitted by THDC to UPCL for projecting the monthly generation for FY 2010-11.

UPCL has a firm allocation of share of power from generating stations of National Thermal Power Corporation (NTPC), National Hydro Power Corporation (NHPC) and Nuclear Power Corporation (NPC) stations. In addition to the firm share allocation, most of these stations have 15% unallocated power. The distribution of this unallocated power among the constituents of Northern Region is decided from time to time based on the power requirement and power shortage in different States. For projecting the energy availability from Northern Region Central Generating Stations during FY 2010-11, the Commission has considered the actual weighted average allocation of power (firm share of UPCL as well as unallocated power) for the period from April to December 2009. The Commission has also considered the northern region transmission losses of 4% (except for Kahalgaon Stage-II, where additional 2.6% Eastern Region losses have been considered) based on the submission of UPCL, for purchase of power from Central Generating Stations and other sources outside the State.

The summary of the energy availability to UPCL from CGS as estimated by the Commission for FY 2010-11 is shown in the Table below:

Table 7.4: Energy Available from CGS during FY 2010-11 (MU)

Particulars	Gross Generation	ESO	State Share	Availability after Inter-State Transmission loss
NHPC				
Salal	3,118.50	3,087.32	1.21%	35.86
Tanakpur	460.50	455.90	3.89%	17.02
Tanakpur Free Power			12.00%	52.52
Chamera-I	1,727.30	1,706.57	3.53%	57.83
Chamera-II	1,526.00	1,507.69	0.33%	4.82
Uri	2,683.80	2,651.59	3.48%	88.58
Dhauliganga	1,121.40	1,107.94	4.35%	46.25
Dhauliganga free power			12.00%	127.64
Dulhasti	1,939.90	1,916.62	4.39%	80.74
Sewa-II				15.35
Sub-Total	**12,577.40**	**12,433.63**	**0.00%**	**526.62**
THDC				
Tehri-I	2,741.28	2,708.38	2.93%	76.27
Free Power - Tehri I			12%	312.01
Sub-Total	**2,741.28**	**2,708.38**		**388.27**
NTPC				
Anta	2,735.55	2,653.48	4.14%	105.58
Auraiya	4,105.75	3,982.57	4.08%	156.10
Dadri Gas	5,350.05	5,189.55	3.58%	178.14
Unchahar-I	3,546.41	3,235.39	8.68%	269.66
Unchahar-II	3,546.41	3,227.23	3.95%	122.52
Unchahar-III	1,773.20	1,613.62	6.54%	101.24
Rihand-1	8,424.63	7,708.54	4.28%	316.88
Rihand-2	8,424.63	7,792.79	3.75%	280.89
Singrauli	16,005.87	14,765.42	5.17%	733.50
Kahalgaon	7,446.00	6,887.55	2.19%	140.96
Sub-Total	**61,358.51**	**57,056.14**		**2,405.47**
NAPP	**701.95**	**554.31**	**3.70%**	**19.69**
Total	**77,379.14**	**72,752.46**		**3,340.06**

7.3.4 *Energy Availability from Satluj Jal Vidyut Nigam Ltd.-Naptha Jhakri Hydro Electric Project*

In absence of the annual generation target as specified by the CEA for FY 2010-11, the Commission has considered the average generation of previous three years for estimating the energy availability during FY 2010-11 from SJVNL. Further, the Commission has considered the average of last three years monthly generation pattern from this station for projecting the monthly energy availability for FY 2010-11. The energy sent out from SJVNL has been estimated considering the normative auxiliary consumption. For projecting the energy availability from SJVNL during FY 2010-11, the Commission has considered the actual weighted average allocation of power (firm share of UPCL as well as unallocated power) for the period from April to December 2009. The Commission has also considered the northern region transmission losses of 4% based on the submission of UPCL external to the State for purchase from Central Generating Stations and other sources outside the State. With these assumptions, the total energy available from this station during FY 2010-11 is estimated at 11.57 MU.

7.3.5 *Energy Availability from Vishnu Prayag Hydro Electric Project*

In absence of the annual generation target as specified by the CEA for FY 2010-11, the Commission has considered the details of the estimated generation as submitted by Vishnu Prayag to UPCL for FY 2010-11 and has considered the monthly generation pattern as submitted by the station to UPCL for projecting the monthly generation for FY 2010-11. The auxiliary consumption has been considered on normative basis. For projecting the energy available to UPCL, the Commission has considered the free power of 12% available to the State of Uttarakhand. With these assumptions, the total energy available from this station during FY 2010-11 is estimated at 192.31 MU.

7.3.6 *Energy Availability from SHPs in the Independent Power Producers (IPPs) category and UREDA Stations*

The Commission has considered the availability from existing and upcoming stations based on the projections made by these stations and submitted by UPCL. The total availability from these sources, thus, works out to 290.23 MU.

7.3.7 *Banking*

The Petitioner has already taken power through advance banking from BRPL and NVVNL which has to be returned by them in FY 2010-11. Accordingly, the Commission has considered the details as submitted by UPCL in this regard and considered 317.93 MU towards banking during FY 2010-11. Further, any variations in the quantum shall be trued up next time.

7.3.8 *Merit Order*

The Commission in previous Tariff Orders till FY 2008-09 has been approving the projected power purchase expenses for the ensuing year by applying the merit order principles. However, the Commission in its tariff order for FY 2009-10 dated October 23, 2009 approved the power purchase quantum and costs for 2009-10 on annual basis considering the total energy available to meet the demand of the State and for meeting the banking requirements for current year. The Commission in its tariff order for FY 2009-10 opined that

> *"In such circumstances when the State is in power deficit situation and UPCL is trying to procure power from all available sources to meet the energy requirement, it is not necessary to adopt the monthly merit order approach when the Petitioner is required to purchase entire quantum of power available"*.

The detailed analysis of the demand supply position of UPCL, however, reveals that though on an annual basis it has a power deficit it also has surpluses during few months particularly summer months. The Commission, accordingly, feels it appropriate to apply monthly merit order principle for projecting the power purchase expenses for ensuing year 2010-11. Further, the Commission is of the view that for applying the monthly merit order principle, it needs to break the UPCL's annual energy requirements into monthly energy requirements based on past years' profiles of power received at State periphery which then needs to be compared with the energy availability estimates on the monthly basis as discussed earlier. The Commission is of the view that this approach would help UPCL to plan its monthly power requirement better.

However, the energy to be purchased from small hydro generating plants, cogeneration plants and other non-conventional/renewable energy sources need to be excluded from the merit order as these are must run plants. Accordingly, purchases from Nuclear Power Corporation (NPC) also need to be excluded from the merit order, as these plants are also must run plants.

The Commission, however, recognizes that the actual off take from a generating station and associated costs for the Petitioner might be different from that determined in the merit order above. The Commission would, accordingly, review these differences at the time of carrying out the true up exercise, subject of course to application of economic principles.

7.3.9 *Power Purchase Cost from Generating Stations of UJVNL*

The Commission has approved the primary energy rate for FY 2010-11 for ten major generating stations of UJVNL vide its Tariff Order dated April 5, 2010 and, accordingly, the power purchase cost to UPCL has been estimated from these generating stations based on its percentage share in these generating stations. Power purchase cost from Pathri and Mohammadpur stations and other SHPs with capacity above 1 MW and upto 25 MW of UJVNL has been considered based on the rates approved by the Commission in its Order dated May 19, 2009 in the matter of determination of final tariff for UJVNL's SHPs of capacity above 1 MW and upto 25 MW in accordance with the UERC (Tariff and Other Terms for Supply of Electricity from Non-Conventional and Renewable Energy Sources) Regulations, 2008.

In accordance with the GoU Notification No. 1632/I(2)/2009-04(3)/22/2008 dated October 26, 2009, while estimating the power purchase cost of the Petitioner, the Commission has considered rate of cess imposed by GoU for the purposes of Power Development Fund as 30 paise/unit instead of 40 paise/unit applicable earlier. The above cess is, however, not applicable in case of energy generated from Maneri Bhali-I and Maneri Bhali-II Generating Station, in accordance with the Government of Uttarakhand Notification No. 1632/I(2)/2009-04(3)/22/2008 dated October 26, 2009 read with Notification No. 2837/I/2004-05-13/2003 dated June 20, 2005 and Notification No. (6604/03)/567/IX-3-Urja/Power Fund/03, as its approved primary energy rate (tariff) for the FY 2010-11 is more than 80 paise/unit. The relevant extract of the said Notification No. 6604/03)/567/IX-3-Urja/Power Fund/03 dated January 20, 2004 regarding applicability of the duty is reproduced as under:

> *"... the Governor is pleased to submit the permission and collection of thirty three (33) paise per unit duty on the saleable energy generated from the existing Hydro Power Projects of the State Government under Uttaranchal Jal Vidyut Nigam Ltd. which are under commercial operation for more than ten years and whose cost of electricity generation is not more than eighty (80) paise per unit."*

In addition to above, the Commission has also considered 10 Paisa per unit towards the royalty to the State Government for the purchase of power from UJVNL's 10 main generating stations excluding MB-I & MB-II in accordance with the GoU Notification as their tariffs have increased beyond the ceiling of 80 paise/unit stipulated in the Notification.

7.3.10 *Power Purchase Cost from Central Generating Stations*

The latest approved Annual Fixed Charges (AFC) for Central Generating Stations are for FY 2008-09. The Commission observes that while CERC has notified the CERC (Terms and Conditions of Tariff) Regulations, 2009 for the period FY 2009-10 to FY 2013-14 on January 19, 2009, however, CERC is yet to approve the tariff for most of the Central Generating Stations as per the new Regulations. NTPC and NHPC have already filed Petitions for determination of tariff for its generating stations for the period FY 2009-10 to FY 2013-14. The analysis of the Petitions filed by

NTPC and NHPC indicate that, the average increase in the AFC proposed for FY 2010-11 with respect to approved AFC for FY 2008-09 is around 22%. In the absence of Tariff Orders for individual stations, it is difficult to accurately estimate the increase in fixed charges for the CGS based on new Regulations. Hence, for projection of power purchase cost for FY 2010-11, for all the existing stations, the Commission has considered an escalation of 20% on the approved fixed charges for FY 2008-09 and apportioned these charges to UPCL based on the estimated State's share allocation in these generating stations for FY 2010-11 as discussed above.

Further, while projecting the variable cost for FY 2010-11, the Commission has considered, based on past trends, an escalation of 5% on the actual variable charges including Fuel Price Adjustment (FPA) Charges from April to December 2009.

The Commission observed that NHPC has already started billing for its generating stations based on capacity charge rate and energy charge rate in accordance with the principles approved by CERC under CERC (Terms and Conditions of Tariff) Regulations, 2009. The Commission has, accordingly, considered the same mechanism while projecting the power purchase cost from NHPC stations.

Further, the Commission has also considered an escalation of 5% on the average rate of other charges actually paid for FY 2009-10 till December 2009 for projection purposes for FY 2010-11.

7.3.11 *Power Purchase cost from IPPs and UREDA Projects*

The cost of power from IPPs and UREDA projects has been taken considered as per the approach adopted by the Commission in the last Tariff Order dated 23.10.2009.

7.3.12 *Power Purchase Rate for Free Power*

In accordance with the approach adopted by the Commission in the previous Order dated October 23, 2009, the Commission has considered rate for free power equivalent to the average power purchase rate for purchase from all other firm sources except free energy. Based on above the approach, the rate of free power has been worked out as Rs. 2.14/kWh.

Table 7.5: Rate of Free Power

Source of Power	Power Purchase (MU)	Total Cost (Rs. Crore)	Average Rate (Rs. /kWh)
From all others sources excluding Free Power	7,379.39	1,580.88	2.14

7.3.13 *Power Purchase through UI*

Based on the monthly demand and supply position, the Commission identified the months during which the Petitioner has surplus energy available with it. The Commission has, accordingly, applied the merit order principle on the power to be purchased for these months so as to minimise the cost of power procured during these months. The Commission has further assessed quantum of the shortages during the remaining months. As per the calculations of the Commission, this shortage comes to around 725.43 MU for the entire year. For meeting this deficit, the Petitioner would be required to purchase additional power from the market. For projecting the cost of this additional power, the Commission has considered the actual expenses for drawal through UI and short-term purchase from open market, incurred by the Petitioner during the period from April to December 2009. The above rate works out to be Rs. 4.82/unit. The Commission has utilised this rate for projecting the cost of additional energy to be procured by the Petitioner. The Commission recognises that actual expenses incurred by the licensee for procurement of power during the FY 2010-11 may be different from those assessed by the Commission. The Commission, shall true up the expenses incurred by the licensee based on actuals, subject to prudency check in accordance with the provisions of Tariff Regulations/Orders/ Directions of the Commission from time to time.

As regards the purchase under UI overdrawal, the Commission's Order dated October 23, 2009 stipulates as under:

> *"...The Commission, therefore, directs UPCL to* ***"restrict the net drawal from the grid within its drawal schedules whenever the system frequency is below 49.2 Hz"***

The Commission, therefore, clarifies that as per the recommendation of the Forum of Regulators, only the additional UI Charges imposed on the utilities under the UI Regulation of CERC for overdrawal during the period when grid frequency is below 49.2 Hz will not be allowed while truing up the ARR for the year 2010-11.

7.3.14 *Transmission Charges Payable to PGCIL and PTCUL*

The Commission observes that while CERC has notified the CERC (Terms and Conditions of Tariff) Regulations, 2009 for the period FY 2009-10 to FY 2013-14 on January 19, 2009, however, CERC is yet to approve the tariff for various transmission lines of PGCIL. In the absence of Tariff Orders for PGCIL Networks, it is difficult to accurately estimate the increase in PGCIL charges based on new CERC Regulations. Hence, for projection of transmission charges payable to PGCIL, the Commission has considered an escalation of 20% on the actual PGCIL charges for FY 2009-10 till 2010.

The Commission considering the applicable transmission charges for Northern Region transmission capacity allocated to UPCL for existing capacities and additional capacity has estimated the transmission charges payable to Power grid as Rs. 107.95 Crore for FY 2010-11.

The annual fixed charges for State Transmission Utility (PTCUL) have been determined as Rs. 101.74 Crore by the Commission for FY 2010-11 vide its Order dated April 06, 2010. As the Petitioner is the sole beneficiary, the same have been allocated to it and included in its ARR.

7.3.15 *Total Power Purchase Cost for FY 2010-11*

Based on the above, the total power purchase cost for the Petitioner for FY 2010-11 has been estimated as Rs. 1720.49 Crore. The summary of the power to be procured from different generating stations by the Petitioner during the FY 2010-11 and corresponding costs are shown in the Table below.

The Commission has approved the total power purchase requirement for the State as 8031.06 MU and approved the banking requirement as 317.93 MU for FY 2010-11. Thus, the Commission has approved total power purchase cost at Rs. 1720.49 Crore for FY 2010-11.

Table 7.6: Power Purchase Cost for the FY 2010-11

Source of Power	Power Purchase (MU)	Total Cost (Rs. Crore)	Average Rate (Rs./kWh)
UJVNL			
UJVNL-Main Stations	2,857.87	261.26	0.91
Maner Bhali-II	1,163.07	282.31	2.43
UJVNL-SHPs	73.49	15.42	2.10
Pathri	94.05	9.88	1.05
Mohamadpur	38.61	4.63	1.20
Sub-Total	**4227.09**	**573.50**	**1.36**
NHPC			
Salal	35.86	3.87	1.08
Tanakpur	17.02	3.39	1.99
Chamera-I	55.60	9.32	1.68
Chamera-II	4.21	1.34	3.19
Uri	85.07	16.13	1.90
Dhauliganga	46.25	10.66	2.31
Dulhasti	34.31	29.23	8.52
Sewa-II	6.62	2.76	4.17
Dhauliganga free power	127.64	27.43	2.14
Tanakpur Free Power	52.52	11.25	2.14
Sub-Total	**465.08**	**115.29**	**2.48**
THDC			
Tehri-I	54.62	30.27	5.54
Free Power - Tehri I	301.77	64.65	2.14
Sub-Total	**356.39**	**94.91**	**2.66**
NTPC			
Anta	72.63	22.74	3.13
Auraiya	126.90	34.85	2.75
Dadri Gas	103.03	33.14	3.22
Unchahar-I	224.11	57.67	2.57
Unchahar-II	94.13	26.60	2.83
Unchahar-III	60.12	19.24	3.20
Rihand-1	316.88	65.10	2.05
Rihand-2	260.05	65.43	2.52
Singrauli	733.50	109.69	1.50
Kahalgaon	96.44	26.58	2.76
Sub-Total	**2087.76**	**461.03**	**2.21**
NAPP	**19.69**	**4.02**	**2.04**
Vishnu prayag (free power)	**169.74**	**36.36**	**2.14**
SJVNL	**7.57**	**2.28**	**3.01**
Others- IPPs	**290.33**	**83.40**	**2.87**
Firm Energy Available	**7623.56**	**1370.79**	**1.80**
Additional purchase for meeting deficit	725.43	349.70	4.82
Power Purchase cost including additional purchase to meet deficit	**8,348.99**	**1720.49**	**2.06**
Return Banking	(317.93)		
Power Purchase for State Requirement	**8031.06**	**1720.49**	**2.14**

7.4 Cost of Assets & Financing

7.4.1 *Capital Cost of Original Assets*

The Petitioner has submitted that it has considered the opening value of the Gross Fixed Assets as Rs. 1058.18 Crore transferred to it by UPPCL, as on November 8, 2001 based on the principles/methodology specified by Government of India (GoI) vide its Order No. 42/7/2000 R&R dated 5th November 2001 under section 63(4) of the Uttar Pradesh Reorganisation Act, 2000.

The issue of original value of fixed assets for the Petitioner was examined in detail in Paras 5.3.1 and 5.3.2 of the Order dated April 25, 2005. For reasons provided in the said Order, the original value of GFA as on November 09, 2001 was fixed at Rs. 508 Crore for the Petitioner, instead of the value of Rs 1058.18 Crore assigned in the Provisional Transfer Scheme. The Commission has already recorded the reasons for the same in its previous Tariff Orders. Since, there is no change in the factual position, the Commission feels it unnecessary to revisit the above issue. The Commission, therefore, has considered the original value of the Petitioner's GFA, on November 09, 2001 as Rs. 508 Crore.

7.4.2 *Capitalisation of Assets*

In its submissions for the FY 2010-11, the Petitioner has submitted the details of capitalisation done during the previous years as well as its plans for the ensuing financial year under various schemes like District Plan, State Plan, RGGVY, APDRP, PMGY, MNP and system improvement works.

In the Tariff Order for the FY 2009-10, dated October 23, 2009, highlighting the importance of Electrical Inspector's Certificates from the safety point of view of personnel and equipment, the Commission had disallowed capitalization of all such works carried out during the FY 2007-08, FY 2008-09 for which Electrical Inspector Clearance Certificate were not made available. The Commission had further directed UPCL to submit the Electrical Inspector's Clearance Certificate for all the HT works completed upto FY 2008-09 within 3 months of issuance of above tariff Order.

In the above context, it has been submitted by UPCL that it has completed all the formalities and requested the Electrical Inspector, for inspection and issuance of clearance certificates as required under the law. UPCL has further submitted that it has also apprised the GoU that due to inadequate staff, the Electrical Inspector is not in a position to test all the installations of UPCL. It has also been mentioned by UPCL that it has also requested the GoU to appoint the officers of PTCUL to assist the Electrical Inspector for testing of all the HT/EHT installations of UPCL which have been energised on or after November 09, 2001, as per the Electricity Rules, 1956, for which written approval of Electrical Inspector has not been issued. However, no clearance certificate from the Electrical Inspector has been submitted by the Petitioner along with the current filings for the FY 2010-11.

The Commission in its previous Tariff Order dated October 23, 2009 had also stated that in case of non-compliance of direction with respect to obtaining approval of Electrical Inspector for all the schemes capitalised till FY 2008-09, the Commission would disallow the capitalizations allowed for the previous years till FY 2006-07 also. However, in view of the steps taken by the Petitioner, the **Commission, while not disallowing any capitalizations of past HT/EHT schemes capitalized upto the FY 2006-07, directs the Petitioner to submit all the pending Electrical Inspector's Clearance Certificates upto FY 2009-10 within 6 months of issuance of this Order.**

In its present ARR & Tariff filing, it has been mentioned by the Petitioner that the actual expenses incurred by it in release of new LT connections are much higher than the normative expenses allowed by the Commission under Release of New LT Connection Regulations. The Petitioner has further submitted that it has been managing this deficit through funding from revenue collection and by cash/liability/credit management mechanism. Petitioner has, accordingly, requested the Commission to consider this deficit amount as equity invested/loan borrowed by the Petitioner in the business. It has also been indicated by the Petitioner that these assets have already been capitalized by it and added to the asset base. The details of deficit as submitted by the Petitioner during the FY 2007-08, FY 2008-09 and FY 2009-10 are as given below:

Table 7.7: Expenses incurred in release of LT Connections (Rs. Crore)

Particulars	FY 2007-08			FY 2008-09			FY 2009-10		
	Service connection charges from consumers	Expenses incurred by UPCL	Net Expenses by UPCL	Service connection charges from consumers	Expenses incurred by UPCL	Net Expenses by UPCL	Service connection charges from consumers	Expenses incurred by UPCL	Net Expenses by UPCL
Garhwal	5.43	20.97	15.54	6.71	28.64	21.93	5.05	22.71	17.66
Kumaon	2.00	15.36	13.36	2.46	20.74	18.29	2.60	24.57	21.97
Total	**7.43**	**36.33**	**28.90**	**9.17**	**49.38**	**40.22**	**7.65**	**47.29**	**39.63**

Based on the submissions made by the Petitioner, the Commission has considered capitalization of the above deficit in the respective years considering the fact that clearance of Electrical Inspector is not required for LT works. The Commission has, accordingly, re-determined the Gross Fixed Assets for different years, the details of which are provided in the Table given below.

Table 7.8: GFA and Additional Capitalisation approved by the Commission (Rs. Crore)

Particulars	FY 2007-08		FY 2008-09		FY 2009-10	
	Approved in Tariff Order dated 23.10.2009	Approved in this Order	Approved in Tariff Order dated 23.10.2009	Approved in this Order	Approved in Tariff Order dated 23.10.2009	Approved in this Order
Opening GFA	1132.5	1,132.51	1082.31	1,111.22	1088.38	1,110.75
Addition in:						
APDRP	4.49	4.49	3.97	3.97	-	-
Others	1.34	30.24	2.09	43.68	-	39.63
Total Addition during the year	**5.83**	**34.74**	**6.06**	**47.65**	**-**	**39.63**
Deletion during the year	56.03	56.03	-	48.11	-	-
Closing GFA	**1082.31**	**1,111.22**	**1088.38**	**1,110.75**	**1088.38**	**1,150.38**

While recasting the GFA balance for the FY 2007-08, FY 2008-09 and FY 2009-10, the Commission has, however, not considered the HT/EHT schemes as Electrical Inspector's Clearance Certificate have not been provided by the Petitioner. In case the Petitioner submits the scheme-wise details of various HT/EHT works under taken by it during the above financial years along with the Electrical Inspector's Clearance Certificate, the Commission may consider the same for capitalization subject to prudence check. Further, the Petitioner was also asked to submit the details of LT works carried by it and capitalised during FY 2007-08 to FY 2009-10. However, the Petitioner failed to furnish such details before the Commission, due to which the Commission was unable to allow the capitalisations of LT works during those years, which did not require mandatory clearances from the Electrical Inspector.

7.5 Financing of Capital Assets

Regulation 13(4) on financing of projects, stipulates that:

"(5) (a) In case of all projects, debt-equity ratio as on the date of commercial operation shall be 70:30 for determination of tariff. Where equity employed is more than 30%, the amount of equity for the purpose of tariff shall be limited to 30% and the balance amount shall be considered as the normative loan.

Provided that in case of the projects where actual equity employed is less than 30%, the actual debt and equity shall be considered for determination of tariff.

(b) The debt and equity amounts arrived at in accordance with clause (a) shall be used for calculating interest on loan, return on equity, Advance Against Depreciation and Foreign Exchange Rate Variation."

The value of capital cost, which is to be considered for calculating depreciation, is defined in

Regulation 15(1)(a) as follows:

> *"The value base for the purpose of depreciation shall be the historical cost, excluding capital Subsidy/grant, of the asset capitalized."*

Financing of an asset (i.e. debt, equity and grants components) is required to ascertain the capital related expenses such as Interest, Depreciation and Return on Equity of a licensee. The Commission has estimated the financing of the Petitioner's GFA as on 31.03.2009 in its previous Order dated 23.10.2009. The Commission has, however, reworked the above GFA balance of the Petitioner from FY 2007-08 onwards and its financing in view of the submissions made by the Petitioner that it has incurred deficit on account of release of new LT connections at normative rates specified by the Commission under Release of New LT Connection Regulations. The said financing has been stipulated to be made through the internal resources of the Petitioner and also through management of its cash resources. Hence, the Commission has allowed a normative debt-equity ratio of 70:30 on the same.

Further, in line with the approach taken in the last Tariff Order, the Commission has not allowed capitalization of any HT/EHT works in absence of Electrical Inspector Certificates. Based on the above, the revised means of finance as considered by Commission for different assets allowed to be capitalized for the FY 2007-08, FY 2008-09 FY 2009-10 is as given below:

Table 7.9: Means of Financing of Assets for FY 07-08, FY 08-09 and FY 09-10 (Rs. Crore)

Particulars	FY 2007-08				FY 2008-09				FY 2009-10			
	Grant etc.	Loan	Internal Resources	Total	Grant etc.	Loan	Internal Resources	Total	Grant etc.	Loan	Internal Resources	Total
Opening value GFA	**535.84**	**545.67**	**51.00**	**1,132.51**	**509.20**	**520.78**	**81.24**	**1,111.22**	**486.42**	**499.42**	**124.92**	**1,110.75**
Additions												
APDRP	4.05	0.45	-	4.49	3.57	0.40	-	3.97	-	-	-	-
Others	-	-	30.24	30.24	-	-	43.68	43.68	-	-	39.63	39.63
Total additions during the year	**4.05**	**0.45**	**30.24**	**34.74**	**3.57**	**0.40**	**43.68**	**47.65**	**-**	**-**	**39.63**	**39.63**
Deletions during the year	30.69	25.34	-	56.03	26.35	21.76	-	48.11	-	-	-	-
Closing value of GFA	**509.20**	**520.78**	**81.24**	**1,111.22**	**486.42**	**499.42**	**124.92**	**1,110.75**	**486.42**	**499.42**	**164.55**	**1,150.38**

7.6 Interest and Finance Charges

The Petitioner has estimated interest and finance charges separately for each loan availed by UPCL under various schemes. The Commission has worked out the Interest and Finance Charges considering the loan amount corresponding to assets capitalised in the year based on approved means of finance.

The interest rate and charges for loans under various schemes has been discussed in the following paragraphs.

7.6.1 *Transfer Scheme Loans*

7.6.1.1 REC Old Loan

The Petitioner in its Petition has claimed Rs. 30.39 Crore as interest payments towards REC Old Loan for FY 2010-11.

The Commission in its Tariff Order dated March 18, 2008 has dealt with the issue of REC Old loan in detail and after considering the Memorandum of Agreement towards the new package for the outstanding loan, had approved the interest charges on the basis of actual repayment schedule. The same approach was followed in the last Tariff Order dated October 23, 2009 also. In accordance with the above approach, the Commission has computed the interest burden for FY 2010-11 as Rs. 30.40 Crore (Rs. 23.56 Crore plus Rs. 6.84 Crore) for REC Old loan.

7.6.1.2 Government of Uttar Pradesh (UP) Loan

The Petitioner has not considered the loans/liabilities transferred to it under the transfer arrangement as per Government of India order effective from 9th November 2001. The Petitioner has further submitted that pending finalisation of various issues between UPCL and UPPCL it is not claiming and interest charges under the head of GPF liabilities, CPSU dues, and power purchase dues up to 08.11.2001. It has, however, prayed that in case the Petitioner needs to service these liabilities after resolution of these issues, the same may appropriately be considered for pass through in tariffs by the Commission in future. The Commission has, accordingly, not considered this issue. **The Commission, however, once again directs the Petitioner to approach the State Government for early finalization of the transfer scheme with all the necessary details/assistance in this regard. The Petitioner is also directed to submit an updated report on steps taken by it and the status of transfer scheme to the Commission with 6 months of issuance of this Order.**

7.6.1.3 Government of Uttarakhand Loans

Under this head UPCL has projected a total outstanding loan of Rs. 301.29 Crore as on March 31, 2010. After taking into account, the receipts and repayments during the year, the closing balance of the loan has been determined as Rs. 269.93 Crore for FY 2010-11. The Petitioner has further claimed an interest of Rs. 24.91 Crore on the above loan for the FY 2010-11.

Since the Regulations specify that interest on only those loans would be considered which have been used for financing of capitalised assets & not on the total amount of loans received. Accordingly, interest on only those loans have been considered which have been utilized for asset capitalisation by the Commission.

Under this head the Petitioner has once again claimed an interest of Rs. 1.98 Crore on AREP loans for FY 2010-11. In the past Tariff Orders the Commission has disallowed interest liability on account of this loan stating that:

> *"The Petitioner has claimed interest on AREP loans which is actually not payable. According to the terms and conditions of the above mentioned loan, no interest is to be paid by UPCL if works are completed within stipulated time and only the penal interest of 2.75% is to be paid when the loan is not repaid according to the terms. Both the above eventualities would be on part of any lapse by UPCL and cannot be passed on to consumers. Thus, the Commission has not allowed any interest on AREP loans."*

Since, the Petitioner has not submitted any documents to justify payment of interest against this loan the Commission is once again disallowing interest claimed by the Petitioner on this loan. However, if the Petitioner is able to justify to the Commission that the interest on AREP loan is actually due and payable and that the Petitioner has not committed any lapse, the Commission may consider the same.

As regard other GoU loans, the Commission noted that interest rates for various tranches of loans under different schemes differ based on years of release. Since the Petitioner has not been able to give linkages of capitalized loans with applicable interest rates, the Commission has considered one interest rate for each scheme. The same shall, however, be trued up when actual liabilities of interests are made available. Interest rate on normative loans have been taken as the weighted average rate of interest of the loans considered by the Commission.

Further, the Commission has considered the average interest rates based on interest rate applicable on various loan tranches. Accordingly, the different interest rates considered by the Commission for different schemes are as follows:

- APDRP : 11.07%
- District Plan : 9.74%
- PMGY : 11.72%

- State Plan : 7.63%
- MNP : 11.52%
- RGGVY : 4.72%
- Others : 9.99%

Based on the above the Commission has worked out the interest liability against various GoU loans for FY 2010-11 as shown in the Table below:

Table 7.10: Interest on Government of Uttarakhand Loans (Rs. Crore)

Particulars	Proposed	Approved Loans			Interest
		Opening Balance	Repayment	Closing Balance	
APDRP	3.03	15.05	1.71	13.38	1.57
District Plan	4.11	28.82	2.63	26.19	2.68
PMGY	0.50	3.65	0.25	3.40	0.41
State Plan	2.87	42.93	2.90	40.03	3.16
MNP	6.60	79.48	2.13	77.35	9.03
AREP	1.98	78.13	0.00	78.13	-
RGGVY	5.82	6.97	0.00	6.97	0.33
Sub-Total	**24.91**	**255.04**	**9.60**	**245.44**	**17.19**
Others	-	44.45	7.95	36.50	4.04
Total	**24.91**	**299.50**	**17.55**	**281.95**	**21.23**

7.6.2 *Interest on Security Deposit*

The Petitioner has taken the closing value of security deposit as on March 31, 2010 as opening value for FY 2010-11 and has projected a receipt of Rs. 25.78 Crore during FY 2010-11. The Petitioner has further estimated the interest liability on consumers' security deposits for FY 2010-11 by considering the interest rate @ 6% per annum.

The Commission has computed the value of security deposit as on March 31, 2010 considering the closing value of security deposit as in March 31, 2009 based on the provisional Audited Accounts for FY 2008-09. Further, the Commission has considered receipt of Rs. 32.32 Crore and Rs. 25.78 Crore as submitted by the Petitioner during FY 2009-10 and FY 2010-11 respectively.

As regard to the interest rate towards security deposit, the Commission has issued an Order in the matter of rate of interest of security deposit of consumers dated July 27, 2007. Para 1 of the said Order stipulate as follows:

"With effect from 1st April 2007, the distribution licensee shall pay interest on Security Deposit of consumer, both consumption and material security, at the Bank Rate as on 1st April of the financial

year for which interest is due. Bank Rate shall mean the Rate as notified by Reserve Bank of India u/s 49 of the RBI Act, 1934."

Accordingly, the Commission has considered interest rate @ 6% per annum for computing interest on security deposit which works out to Rs. 13.44 Crore for FY 2010-11.

7.6.3 *Government Guarantee Fee*

The Petitioner in its Petition claimed an amount of Rs. 1.81 Crore towards the guarantee fee payable to GoU for FY 2010-11 considering guarantee payable towards State counter guarantee against L/C opened in PNB for payment of electricity bills and State counter guarantee of REC Old loan.

A Guarantee fee @ 1% p.a. is payable to the Government on the outstanding loans taken by Petitioner for which counter-guarantee has been provided by the Government. The Commission directed the Petitioner to submit the details of such fees payable.

The Commission validated the Petitioner's claim in accordance with the approach adopted in previous years and approved the Guarantee Fee for FY 2010-11 as Rs. 2.73 Crore as given in the Table below.

Table 7.11: Calculation of Guarantee Fees (Rs. Crore)

Particulars	Approved FY 2010-11
Letter of Credit	35.00
REC Old loans	237.94
Total	**272.94**
Government Guarantee Fees	**2.73**

Thus, the Commission has allowed the total interest and financial charges of Rs. 67.80 Crore including guarantee fees as against the projected claim of Rs. 83.99 Crore for FY 2010-11. The summary of the interest charges as submitted by the Petitioner and as approved by the Commission is shown in the Table below:

Table 7.12: Interest on Loans (Rs. Crore)

Particulars	FY 2010-11	
	Proposed	Approved
APDRP	3.03	1.57
District Plan	4.11	2.68
PMGY	0.50	0.41
State Plan	2.87	3.16
MNP	6.60	9.03
Kuteer Jyoti		-
AREP	1.98	-
RGGVY	5.82	0.33
Sub-Total	**24.91**	**17.19**
Others	-	4.04
REC-Old Loan	30.39	30.39
Guarantee Fee	1.81	2.73
Interest on Security Deposit	26.88	13.44
Total	**83.99**	**67.80**

7.7 Depreciation

The Petitioner in its Petition has stated that it has computed depreciation on the rates provided for in the Regulations and has projected a depreciation of Rs. 40.62 Crore for FY 2010-11 on the value of opening assets as on 01.04.2010 claimed by it to be Rs. 2639.61 Crore. In its subsequent submissions, the Petitioner has given the breakup of its fixed assets based on the classification specified in the Regulations and has applied depreciation rates as provided in the regulations for different class of assets.

The Commission in its Tariff Order dated October 23, 2009 had directed the Petitioner to prepare and maintain fixed assets registers so as to clearly define assets in the classes specified in the Regulations alongwith their respective ages and to present correct picture of assets.

In this regard, UPCL submitted that steps have been taken for preparation of detailed fixed asset registers, including identification, physical verification, valuation of all fixed assets; category-wise and location-wise based on the guidelines prescribed in the Companies Act, 1956.

UPCL submitted that it had invited bids through open tender for the above assignment after making a detailed study of the activities and scope of this work being undertaken by other distribution utilities in other States. The assignment has been awarded to successful bidder in June, 2008, who has completed the identification, physical verification of all fixed assets. The valuation of the fixed assets is in progress and on the request of the contractor, the time for completion of the assignment has been extended upto March 31, 2010.

The Commission has noted the steps taken by the Petitioner in this regard and would, however, suggest UPCL to expedite the process and upon completion of the work submit a copy of the report to the Commission. Further, **the Commission directs the Petitioner that during the next ARR and Tariff filing for FY 2011-12, UPCL should compute the depreciation based on the fixed asset register and the allowable depreciation rates as stipulated in the Regulations.**

The Petitioner has submitted the class-wise asset details and calculated the depreciation based on applicable rates for FY 2008-09. Hence, in absence of fixed registers and classification of assets, the Commission has allowed depreciation at weighted average rate of 3.77% in line with the approach adopted by it in the last Tariff Order. The opening value of Petitioner's Depreciable GFA for FY 2010-11 works out to Rs. 663.97 Crore. The Commission has, accordingly, approved the depreciation of Rs. 25.03 Crore for FY 2010-11. The table below shows the depreciation charges approved by the Commission for FY 2010-11:

Table 7.13: Depreciation for FY 2010-11 (Rs. Crore)

Particulars	Claimed	Approved
GFA	2,639.61	1,150.38
Grant		486.42
Depreciable GFA		663.97
Rates		3.77%
Depreciation	**40.62**	**25.03**

7.8 Return on Equity

The Petitioner submitted that it has computed the return on equity at the rate of 14% for FY 2010-11 and has claimed a return of Rs. 2.94 Crore for FY 2010-11. The Petitioner in the Petition projected receipt of additional equity of Rs. 15 Crore for FY 2010-11. As regards receipt of additional equity of Rs. 15 Crore from the GoU, the Petitioner, in its additional submission submitted that an outlay of Rs. 50 Crore has been envisaged for LT System Strengthening with installation of Ring Mains Units (RMU) and compact sub-stations. Since this expenditure is proposed to be incurred under State Plan, the GoU has assured UPCL to provide finance through debt as well as equity. Accordingly, 30% of the outlay, i.e. Rs. 15 Crore has been considered by the Petitioner as equity and the balance 70% amount as loan from the State Government/Finance Institution.

Subsequently, UPCL vide its letter dated March 15, 2009 submitted that based on the Transfer Scheme agreed between UPCL and UPPCL, a liability of Rs. 572.00 Crore was transferred to it against the power purchase dues on UPPCL towards Central Power Sector Utilities. The said liability of Rs. 572 Crore was taken over by GoU by issuing the power bonds. UPCL submitted that the GoU vide its Order No. 258/I(2)/2010-05/81/2006 dated February 9, 2010 has accorded for conversion of the above said liability into share capital of UPCL. UPCL further submitted that since the GoU has accorded the conversion of the liability of Rs. 572 Crore into share capital of UPCL, it is entitled for 14% return on the above amount of share capital and requested to consider the same while approving the ARR for FY 2010-11.

As regards the claim of considering the GoU's approval for conversion of power bonds of Rs. 572 Crore into share capital and allowing return on the same for FY 2010-11, the Commission would like to highlight that this is a new issue raised by UPCL after completion of the public process on UPCL's ARR and Tariff Petition for FY 2010-11 and it would not be appropriate to address this issue in the current year tariff exercise without giving a chance to stakeholders' to express their views on this issue. Further, it is to be noted that converting the power bonds into share capital would amount to increase in equity base of UPCL. However, as per Regulations, only that equity which is invested in creaction of fixed assets is entitled for Return. The Commission has considered all the means of finance including equity for the approved asset base and, hence, no further financing through equity of current asset base can be considered. Also, this is an issue related to the finalisation of Transfer Scheme and this issue can be best examined alongwith the other aspects such as opening value of Gross Fixed Assets upon finalisation of Transfer Scheme. In view of this, the Commission in this tariff exercise has not considered the UPCL's claim of conversion of power bonds into share capital and allowing return on the same.

Further, the Petitioner has submitted that it would be receiving an additional equity of Rs. 15 Crore. In this regard, the Regulations stipulate that only the equity utilised for funding of a project would be eligible for return. Mere projected receipt of equity does not entitle it for the return and the Commission has already considered the entire equity required for financing approved asset base as per Regulations. Hence, the Commission is not allowing return on the equity of Rs. 15 Crore as claimed by UPCL. The return would only be allowed if the licensee justifies the utilisation of the amount in creation of an asset.

The Commission has, therefore, considered the equity base of Rs. 5 Crore as on 31.03.2007 and has added to it the equity portion of the assets capitalised through internal resources during FY 2007-08, FY 2008-09 and FY 2009-10 for which funding has been done in accordance with the

Regulations. The Commission has considered return at the rate of 14%. Hence, the Commission has worked out RoE of Rs. 5.47 Crore on the equity of Rs 39.06 Crore for FY 2010-11.

7.9 Operation & Maintenance (O&M) Expenses

O&M expenses comprising of expenditure on staff, administration and repairs and maintenance are to be determined in accordance with Regulation 11 of UERC (Terms and Conditions for determination of Distribution Tariff) Regulations, 2004. The Commission in its previous Tariff Order, had estimated the O&M Expenditure for FY 2009-10 factoring in the inflation, increase in salary on account of recommendation of Sixth Pay Commission as well as increase in total number of consumers.

The Petitioner has estimated the total O&M expenses for FY 2010-11 on the basis of the Commission's approach adopted in the previous Order considering FY 2009-10 as base year. In addition, the Petitioner has estimated additional employee expenses on account of recommendations of Sixth Pay Commission. The Petitioner has assumed that employees would be getting 30% of the arrears for the period January 2006 to April 2009 (39 months) in FY 2010-11.

In accordance with approach adopted in the previous Tariff Order dated October 23, 2009, the Commission has approved each element of O&M expenses separately rather than approving the total O&M expenses. The approach adopted by the Commission for approving the various components of O&M expenses of FY 2010-11 is discussed below:

7.9.1 *Employee Expenses*

The Petitioner has submitted employee expenses of Rs. 184.34 Crore for FY 2010-11. The Petitioner has also considered arrears of Rs. 31.85 Crore for FY 2010-11 on account of impact of Sixth Pay Commission report.

The Commission has analysed the employee expenses submitted by the Petitioner for the first nine months of FY 2009-10, i.e. April, 2009 to December, 2009 and has estimated the total employee expenses for FY 2009-10 based on actual employee expenses provided by the Petitioner for the period from April 2009 to December 2009. For the remaining period of the year i.e. January 2010 to March 2010, the Commission has assumed an increment of 3% in the basic pay to be applicable on 50% of the employees on 1st January 2010. DA rate has been considered as 35% for the period from January 2010 to March 2010.

For FY 2010-11, the Commission has computed the employee expenses by assuming an annual increment of 3% in the basic pay of the employees during FY 2010-11. The Commission has computed DA at the DA rate of 35% for first three months & 45% for the balance nine months of FY 2010-11. Regarding the submission of the Petitioner to allow the impact of enhanced DA rate for the last quarter of FY 2009-10, the Commission has noted the point & would allow the same during true-up for that year. The same would hold good for last quarter of FY 2010-11. The Commission has considered escalation rate of 6.51% for computation of employee expenses under the heads namely house rent allowance, bonus, other allowances, medical expenses reimbursements. Earned leave encashment and leave salary contributions have been considered in the same proportion of actual contribution made during FY 2008-09. Employee contribution towards pension and gratuity has been considered at the same proportion of 17.91% of Basis Salary and DA considered in the last Tariff Order dated 23.10.2009.

The Commission has considered the capitalisation of employee expenses in proportion of actual capitalisation for FY 2008-09. In this regard, the Petitioner has submitted that since the Commission had not allowed any capital investment for FY 2009-10, hence, the deduction made was not genuine and proper. It would be relevant to point out that the components of the ARR are revenue in nature and no capital expenses are included while determining the ARR. AS 10 on Accounting for Fixed Assets and AS 16 on Borrowing Costs clearly stipulates that the cost of an item of fixed asset comprises its purchase price, including duties and other non-refundable taxes or levies and any directly attributable cost of bringing the asset to its working condition for its intended use. Thus, irrespective of the fact that whether an asset is capitalized or not, all the expenses incurred in construction of an asset are booked into the Capital Works in Progress (CWIP) from where the assets capitalized are transferred to the Fixed Assets. Thus, it is a prudent accounting practice to transfer the employee costs, interests on loan and other overheads incurred for construction of an asset to CWIP. Recognizing a fixed asset, entitles the same for depreciation, interest and return on equity, however, non-recognition of the fixed asset does not convert the capital expense into revenue. Till such time, an asset is ready for use, all the expenses incurred towards its erection and construction would be treated as capital expense. In simple words, the total expenses under employee and A&G head comprise of two components viz. (i) for creation of capital assets and (ii) for operation and maintenance. Clearly, part (i) is not related to O&M (i.e. of capital nature) and only part (ii) related to O&M (i.e. revenue nature) needs to be considered for ARR purposes. Thus, the Commission had deducted the employee costs and A&G expense transferred to CWIP during FY 2009-10 from the total expenses and is doing so again in this Order.

During the last year tariff exercise, the Commission had estimated the salary arrears for the Petitioner as Rs. 106.17 Crore and apportioned 40% of the same for FY 2009-10. The Commission has further apportioned 30% of the above arrears amount, i.e. Rs. 31.85 Crore towards arrears in line with GoU orders on the adoption of Sixth Pay Commission's recommendations.

The Commission would like to highlight that the impact of salary revision on account of Sixth Pay Commission recommendations is projected based on certain assumptions. Accordingly, variation, if any, in actual employee expenses vis-a-vis approved employee expenses for FY 2010-11 shall be trued up on the basis of actuals subject to prudence check. The following table shows the summary of the approved employee expenses for the FY 2010-11:

Table 7.14: Employee Expenses for FY 2010-11 (Rs. Crore)

Particulars	Amount
Salaries	102.04
Dearness Allowance	43.37
Other allowances	12.11
Employer's Contribution towards leave encashment	13.17
Sub-total (1 to 12)	**170.68**
Employer's contribution towards pension & gratuity Employer's contribution towards EPF	26.05
Gross Employee cost	**196.73**
Less: Capitalization	*(21.66)*
Net Employee Expenses	**175.07**
Arrears of Salary (VI Pay Commission)	31.85
Total Eemployee Expenses including Arrears	**206.92**

7.9.2 *Repairs and Maintenance (R&M) Expenses*

The Petitioner has claimed R&M expenses of Rs. 49.63 Crore for FY 2010-11. The Commission while estimating the R&M expenses for FY 2010-11 has analysed the actual R&M expenses submitted by the Petitioner for the first six months of FY 2009-10, i.e. April 2009 to September 2009. The actual R&M expenses for first six months as submitted by Petitioner are Rs. 21.46 Crore, which when annualised gives a figure of Rs. 42.91 Crore as R&M expenses for the FY 2009-10. The Commission, in its Tariff Order for the FY 2009-10, has approved R&M expenses of Rs. 43.59 Crore for the FY 2009-10. Since there is no material difference between the R&M expenses approved by the Commission and annualised R&M expenses for the FY 2009-10, the Commission has considered the approved R&M for the FY 2009-10 for estimating the R&M expenses for the FY

2010-11.

The Commission has, accordingly, escalated the approved R&M expenses for FY 2009-10 by the escalation factor of 6.51% approved for the FY 2009-10 for projecting the R&M expenses for the FY 2010-11. Based on the above, projected R&M expenses for FY 2010-11 works out to Rs. 46.43 Crore as shown in the Table below:

Table 7.15: Approved R&M Expenses for FY 2010-11 (Rs. Crore)

S.No.	Item	FY 2009-10			FY 2010-11	
		Approved	Impact of increase in Consumer Base	Total Approved	Proposed	Approved
1	Plant & Machinery	10.20	0.64	10.85	12.35	11.55
2	Buildings & Civil Works	1.11	0.07	1.18	1.66	1.25
3	Lines & Cable Network	28.97	1.83	30.80	35.29	32.81
4	Vehicles	0.50	0.03	0.54	0.03	0.57
5	Furniture & Fixtures	0.01	0.00	0.01	0.25	0.01
6	Office equipment	0.20	0.01	0.22	0.03	0.23
7	Others	-	0.00	-	0.02	0.00
	Total	**41.00**	**2.59**	**43.59**	**49.63**	**46.43**

7.9.3 *Administrative and General (A&G) Expenses*

The Petitioner has submitted the A&G expenses of Rs. 23.43 Crore for FY 2010-11. The Commission while approving the A&G expenses for FY 2010-11 has analysed the actual A&G expenses submitted by the Petitioner for the first six months of FY 2009-10 i.e. April 2009 to September 2009. The actual A&G expenses for first six months as submitted by Petitioner are Rs. 10.29 Crore which when annualised gives a figure of Rs. 20.57 Crore as A&G expenses for the entire FY 2009-10.

The Commission, in its Tariff Order for the FY 2009-10, had approved A&G expenses of Rs. 21.13 Crore for the FY 2009-10. Since there has been no material difference in the A&G expenses approved by the Commission and annualised A&G expenses for the FY 2009-10, the Commission has considered the approved A&G for the FY 2009-10 for estimating the A&G expenses for the FY 2010-11.

The Commission has, accordingly, escalated the approved A&G expenses (excluding licence fee) for FY 2009-10 by the escalation factor of 6.51% as approved for the FY 2009-10 in accordance with the UERC (Terms and Conditions for Determining Escalation Factor) Regulations, 2007, for projecting the A&G expenses for the FY 2010-11.

The Commission has further capitalised A&G expenses in the proportion of actual capitalisation for the year FY 2008-09. The contention of the Petitioner that since the Commission has not allowed the investments proposed by it, hence, the capitalised A&G expenses should also not be deducted, has already been dealt with in the preceeding paragraphs. The Commission has, thus, estimated A&G expenses for FY 2010-11 as Rs. 21.63 Crore. The following table shows the summary of the approved A&G expenses for FY 2010-11:

Table 7.16: Approved A&G Expenses for FY 2010-11 (Rs. Crore)

S.No.	Item	FY 2009-10			Proposed by the petitioner for FY 2010-11	FY 2010-11
		Approved	Impact of increase in Consumer Base	Total Approved		Approved
1	Rent, Rates & Taxes	0.37	0.03	0.40	0.53	0.42
2	Insurance	0.09	0.01	0.09	0.13	0.10
3	Telephone postage & Telegrams	1.83	0.12	1.95	2.62	2.08
4	Legal & Professional Charges	1.77	0.12	1.89	4.06	2.01
5	Audit Fees	0.01	0.00	0.01	0.03	0.01
6	Fees & Subscriptions (ROC)	0.02	0.00	0.02	0.45	0.03
7	Conveyance & Travelling	3.55	0.23	3.78	5.20	4.03
8	Electricity & water charges	2.38	0.15	2.53	3.39	2.69
9	Printing & Stationery	1.47	0.10	1.57	2.10	1.67
10	Advertisement & promotion	1.49	0.10	1.59	2.13	1.69
11	License Fee	0.77		0.77	0.65	0.99
12	Other expenses	7.36	0.48	7.84	4.84	8.35
	Total expenses	**21.12**	**1.32**	**22.43**	**26.13**	**24.07**
Less :	*Capitalised*	*(1.30)*		*(1.30)*	*(2.70)*	*(2.44)*
	Net expenditure	**19.81**	**1.32**	**21.13**	**23.43**	**21.63**

7.9.4 *O&M Expenses*

Based on separately approved Employee expenses, R&M expenses and A&G expenses and the approach adopted by the Commission in its last Tariff Order dated 23.10.2009, the overall approved O&M cost works out to Rs. 279.85 Crore. The details of the same are indicated in the table below:

Table 7.17: Approved O&M Expenses (Rs. Crore)

S.No	Particulars	FY 2009-10	FY 2010-11	
		Approved	Proposed	Approved
1	Employee Cost	173.42	194.07	196.73
2	Arrears of 6th Pay Commission	42.47	31.85	31.85
3	Administrative & General Expenses	21.11	26.13	24.07
4	Repairs & Maintenance Expenses	41.00	49.63	46.43
5	*Less: Capitalisation*	*(17.67)*	*(12.43)*	*(24.10)*
6	Increase in consumer base	3.91	-	4.87
6.1	On A&G Expenses	1.32	-	1.66
6.2	On R&M Expenses	2.59	-	3.22
	Total	**264.25**	**289.25**	**279.85**

7.10 Interest on Working Capital

Regulation 14(2) of UERC (Terms and Conditions for Determination of Distribution Tariff) Regulations, 2004, states that interest on working capital should be computed as under:

"(a) Working capital shall be worked out to cover

i. *Operation and Maintenance expenses, which includes Employee costs, R&M expenses and A&G expenses, for one month; (estimated spares cost for a period approved as minimum inventory period but normally not exceeding one quarter shall be allowed in R&M expenses)*

ii. *Capital required to finance such shortfall in collection of current dues as may be allowed by the Commission.*

iii. *Receivables for sale of electricity for a period equivalent to billing cycle plus one month suitably adjusted for security given by consumers and credit given by suppliers.*

(b) Rate of interest on working capital shall be the short-term Prime Lending Rate of State Bank of India as on 1st April of the tariff period."

In accordance with the provisions of the Regulations, the Petitioner has estimated Working Capital requirement for FY 2010-11 as Rs. 191.58 Crore. The Petitioner has further worked out the interest burden for above Working Capital Requirement as Rs. 19.64 Crore by considering interest rate of 10.25%. The Commission has, however, worked out the working capital requirement of the Petitioner for the FY 2010-11 based on the provisions of the Tariff Regulation as below:

7.10.1 *One Month O&M Expenses*

The annual O&M expenses approved by the Commission are Rs. 279.85 Crore for FY 2010-11. Based on above approved O&M expenses, one month's O&M expense, works out as Rs. 23.32 Crore for FY 2010-11.

7.10.2 *Capital required to finance shortfall in collection of current dues*

The Petitioner has considered the collection efficiency of 96% for FY 2010-11. Considering the collection efficiency of 96% as submitted by the Petitioner for FY 2010-11, the Commission has worked out the revenue shortfall as Rs. 94.24 Crore for FY 2010-11.

7.10.3 ***Receivables for sale of electricity for a period equivalent to billing cycle plus one month suitably adjusted for security given by consumers and credit given by suppliers.***

The Commission has worked out the receivables for sale of electricity of two months (60 days) based on the revenue estimated by the Commission for FY 2010-11 and has adjusted the same by the amount of security deposit extended by consumers and also the credit available to the Petitioner from the suppliers, including suppliers of electricity.

The net Working Capital Requirement of the Petitioner, thus, works out as Rs. 120.02 Crore after deducting security deposits & credit by power suppliers. The Commission has further worked out the interest liability for the working capital requirement by considering SBI Short Term Prime lending rate of 11.75%. The Commission has, thus, allowed Rs. 14.10 Crore as interest on working capital of Rs. 120.02 Crore for FY 2010-11 as per details given in the Table below:

Table 7.18: Interest on Working Capital for FY 2010-11 (Rs. Crore)

S.No.	Item	Proposed	Approved
1	O&M expenses	24.10	23.32
2	Collection inefficiency	109.14	94.24
3	Receivables	454.98	387.29
	Sub-Total	**588.22**	**504.85**
4	*Less*:		
A	Adjustments for security deposits & credit by power suppliers	396.64	384.83
	Net Working Capital	**191.58**	**120.02**
5	Interest Rate (Short term PLR)	10.25%	11.75%
	Interest on Working Capital	**19.64**	**14.10**

7.11 Non-Tariff Income

As Per Regulation 18(2) of UERC (Terms and Conditions for Determination of Distribution Tariff) Regulations, 2004, Non-Tariff Income shall comprise of:

"The non-tariff income shall comprise of:

(a) Delayed Payment Surcharge,

(b) Meter Rent,

(c) Income from investments,

(d) Miscellaneous receipts from consumers, and

(e) Any other income"

The Petitioner has submitted that non-tariff income primarily comprises meter rent, discount/rebate on timely payment of power purchase bills, income from fixed deposits and delayed payment charges from consumers. The Petitioner has not considered the sale of apparatus and scrap as non-tariff income as the same cannot be estimated at this stage. The Petitioner has estimated the values for non-tariff income for FY 2010-11 at Rs. 38.77 Crore.

The Commission has considered the Non-Tariff income of Rs. 38.77 Crore for FY 2010-11 as proposed by the Petitioner.

7.12 Provision for Bad & Doubtful Debts

UPCL has requested for a provision of Bad & Doubtful Debts of Rs. 68.28 Crore for FY 2010-11. The Petitioner has submitted that it has finalised a suitable policy for provisioning for and writing off bad debts and the same has been approved by the Board of Directors. The Petitioner further submitted that it has considered a provision of Rs. 68.28 Crore at a conservative level of 2.5% of the revenue to be billed during the ensuing year.

The Petitioner has further submitted that even in the Financial Restructuring Plan (FRP), which was the basic document for the unbundling of erstwhile UPSEB, the maximum scale of realization of dues from consumers was fixed at 96%. Against the above provision, the Petitioner has projected the realization efficiency slightly on higher side at 97.5% and has projected for Bad and Doubtful Debt at 2.5% only. The Petitioner further submitted that in the Tariff Order dated October 23, 2009, the Commission had allowed the provision of Bad & Doubtful Debts at lower percentage of 1.5%, which is not sufficient and requested the Commission to allow the same at the 2.5%.

In this regard, the Commission in Para 6.4.6 of its Tariff Order dated 23.10.2009 had directed the Petitioner to frame guidelines and procedures for identifying, physically verifying and writing off the bad debts and also to fix responsibility of its employees in this regard. The compliance on the same was expected within a month. However, the Petitioner in its submission had stated that it is in the process of preparing an action plan on the same and sought time upto 31.03.2010 to submit the same before the Commission. Hence, **the Commission again directs the Petitioner to report the compliance within three months failing which no further provisioning would be allowed in the subsequent Tariff Orders until the Petitioner exhausts the existing available provisions with it in writing off the bad debts.**

However, in absence of any concrete plan for actual identification of recalcitrant consumers with arrears and procedure for writing off bad debts the Commission is allowing a provision for bad debts and doubtful debts @ 1.5% of revenue at approved tariffs based on prudent practices. On the projected revenue of Rs. 2355.98 Crore the above amount works out to be Rs. 35.34 Crore for the FY 2010-11. This provisioning of bad debts during FY 2010-11 shall be trued up further with actual bad debts written off by the Petitioner subject to prudence check.

7.13 Annual Revenue Requirement (ARR)

The Petitioner has projected Annual Revenue Requirement of Rs. 2737.78 Crore for FY 2010-11.

However, based on the various elements of the ARR as discussed and approved above, the net Annual Revenue Requirement estimated by the Commission works out as Rs. 2348.99 Crore for FY 2010-11 as summarised in the Table below:

Table 7.19: Annual Revenue Requirement for FY 2010-11 (Rs. Crore)

S.No.	Item	FY 2010-11	
		UPCL Petition	Approved
A	Expenditure		
1	Power Purchase Expenses	2,071.95	1720.49
2	Transmission Charges-PGCIL	91.14	107.95
3	Transmission Charges-PTCUL	108.73	101.74
4	O&M expenses	289.25	279.85
5	Interest charges	83.99	67.80
6	Depreciation	40.62	25.03
7	Interest on Working Capital	19.64	14.10
B	**Gross Expenditure**	**2,705.32**	**2316.85**
8	Other Expenses / Appropriations		
i	Provision for Bad & Doubtful Debts	68.28	35.34
ii	Return on Equity	2.94	5.47
9	Impact of Refund to industries	0.00	30.00
C	**Net Expenditure**	**2776.54**	**2387.76**
1	*Less: Non Tariff Income*	38.77	38.77
D	**Net Annual Revenue Requirement**	**2,737.77**	**2348.99**

7.14 Revenue at Existing Tariffs and Revenue Gap

By applying the existing tariff rates applicable for different categories of consumers including the impact of ToD tariffs and additional 10% charge for the industries who have opted for continuous supply, the Commission has estimated the total revenue at existing tariffs. Further, the Commission has considered additional revenue on account of Revenue from efficiency gains (commercial loss reduction at average tariff).

The summary of total revenue estimated by the Commission for FY 2010-11 is given in following Table:

Table 7.20: Revenue at Existing Tariffs

S.No.	Category	FY2010-11	
		Sales	Revenue
		MU	Rs. Crore
1	Domestic	1,232.79	290.75
2	Non Domestic	697.69	287.87
3	Public Lamps	47.35	15.41
4	Private Tubewells	142.24	13.21
5	GIS	112.44	36.57
6	PWW	244.55	75.69
7	Industrial	3680.25	1491.67
8	Railway Traction	14.94	6.09
9	Mixed Load	106.86	33.31
	Sub-Total	**6,280.11**	**2,250.57**
11	Efficiency Gains (Commercial Loss reduction)	**104.04**	**37.29**
	Total	**6384.16**	**2287.86**

The revenue at existing tariffs leaves a revenue gap of Rs. 61.13 Crore for FY 2010-11.

8. Tariff Rationalisation and Design

8.1 Tariff Rationalisation

Before proceeding with the exercise of determining the category-wise tariffs to meet the approved Annual Revenue Requirement of the Petitioner for FY 2010-11 as elaborated in Chapter 7 of this Order, the Commission considers it appropriate to first of all take a view in this Chapter on the tariff rationalisation measures suggested by the Petitioner and the concerns voiced by other stakeholders.

8.2 Petitioner's Proposals

8.2.1 *Fixed Charges for Un-metered Domestic Category*

UPCL has proposed fixed charges for rural un-metered domestic category on the basis of Rs./kW/month instead of Rs./connection/month. UPCL submitted that the existing tariff for this sub-category is Rs. 120/connection/month in hilly areas and Rs. 200/connection/month in other areas and as a result the small consumers are coming forward to get their connection metered, while the rural domestic consumers having higher load and consuming more electricity are strongly resisting metering of their connections inspite of best efforts of UPCL. UPCL submitted that until this anamoly is corrected, metering of consumers in the rural domestic category would not be possible inspite of serious efforts of UPCL to achieve 100% metering. UPCL has proposed to introduce fixed charges of Rs. 120/kW/month for hilly areas and Rs. 200/kW/month for other areas for un-metered supply (domestic) in rural areas.

8.2.2 *Fixed Charges for Metered Domestic Category*

UPCL has proposed fixed charges for metered domestic category on the basis of Rs./kW/month instead of Rs./connection/month. UPCL submitted that as the energy charges are uniform across the category, the consumers with higher load and consuming more power are getting benefited. UPCL has further submitted that if the structure of energy charges is made telescopic, requiring the consumers having more consumption to pay at a higher rate over and above a specific slab, the rate of fixed charge per connection is justified.

8.3 Commission's Views on Tariff Rationalisation Measures

Several respondents have appreciated the tariff rationalisation measures taken by the Commission in the previous Tariff Orders. The Commission believes that tariff rationalisation is a dynamic and continuous process and is essential to accommodate the socio economic and technical changes taking place in the environment over a period of time. The Commission has, therefore, carefully examined the measures proposed by the Petitioner and also considered the suggestions given by the respondents.

8.3.1 *Fixed Charges, Minimum charges and Minimum Consumption Guarantee*

The analysis of ARR for FY 2010-11 approved in this Order reveals that around 54% of UPCL's costs are fixed in nature including the capacity/fixed charges of power purchase. At the same time, the revenue from fixed charges and demand charges at the current tariffs works out to 12% only. The Commission in its previous Tariff Orders including Tariff Order for FY 2009-10 dated October 23, 2009 has elaborated on the concept of levy of fixed/demand/charges. Without repeating the entire concept, the Commission would just like to clarify that the Electricity Act, 2003 itself provides for recovery of electricity charges in the form of fixed and energy charges, and that the fixed/demand charges are levied basically to recover the fixed nature of expenses of licensee incurred on creation of infrastructure for providing supply to the consumers and its operation and maintenance.

The Commission in its Tariff Order dated March 18, 2008 mentioned that ideally, the fixed charges should be levied on the basis of contracted/sanctioned load for all the categories, however, for domestic category, considering the quality of metering and billing data and malpractices prevailing in the system, the Commission introduced the fixed charges on per connection basis. The Commission in its previous Tariff Order dated October 23, 2009, however, specified different fixed charges for consumers having contracted/sanctioned load upto 4 kW and consumers having contracted/sanctioned load above 4 kW.

Since there is marginal improvement in the billing system of the Petitioner, the Commission, for the reasons stated in the Tariff Order dated March 18, 2008, is continuing with the levy of fixed charges on per connection basis. However to address the concern of UPCL to some extent, the Commission is introducing slab-wise tariff structure for Domestic Category of consumers in this Tariff Order. The same is discussed subsequently in this Order.

The Commission in its Tariff Order dated March 18, 2008 had re-introduced the Minimum Consumption Guarantee (MCG) Charges for the industrial category and in its Tariff Order dated October 23, 2009 re-introduced the Minimum Consumption Guarantee (MCG) Charges for the Non-Domestic Category. Further, the Commission in its Order dated October 23, 2009 had modified the MCG mechanism as follows:

"The Commission has specified the Minimum Consumption Guarantee in terms of units of electricity consumption/kW/month and not on the basis of charges/kW/month. The minimum consumption guarantee charges shall be computed by considering the applicable base energy charges for the relevant category of consumer alongwith specified MCG and will be adjusted only towards the energy charges. However, considering the fact that the consumption of various industries and high end non-domestic consumers may not be uniform during various months and it may vary based on the business cycle of industries and more particularly due to market conditions, the Commission has specified the minimum consumption guarantee on monthly basis as well as on annual basis. The minimum consumption guarantee charges will be levied on monthly basis when monthly consumption is less than the units specified for monthly minimum consumption guarantee (MCG). In case Cumulative actual consumption from the beginning of financial year exceeds the units specified for annual minimum consumption guarantee (MCG) no further billing of monthly MCG shall be done".

Considering the fact that the MCG had been re-introduced for Non-Domestic Category and the MCG mechanism for Industrial category was modified in October, 2009, its impact on Non-Domestic and Industrial category as well as the incremental revenue from MCG for one full year is yet to be assessed. Further, as the metering system of UPCL is still below the acceptable level, the Commission is constrained to continue with MCG charges inspite of some of its drawbacks as pointed out by various stakeholders. The Commission is, accordingly, retaining the provision of MCG for above categories in the present Order. The Commission is, however, in the process of appointing an independent agency for checking the pitfalls in the metering and billing system of the Licensee for KCC consumers. The Commission would, accordingly, consider reviewing this provision in the next tariff exercise based on report submitted by an independent agency. Further, considering request from *Atta Chakkis*, the Commission has reduced their MCG to 40 kWh/kW/month from existing 75 kWh/kW/month.

8.3.2 *Time of Day Tariff*

The Commission in its Tariff Order dated October 23, 2009 approved the peak hour rate as 50% higher than the normal hour rate for Industrial Category. Further, in case of HT industries, the Commission has specified the peak hour rate as 50% higher than the normal hour rate applicable for highest slab i.e. consumers with load factor above 50% for all the HT industrial consumers. The Commission also increased the rebate during off peak hours from 5% to 10% to incentivise the shift in consumption from peak hours to off peak hours.

Considering the fact that the demand supply situation in the State has worsened during and the shortage during peak hours has increased substantially due to which the Petitioner has to either resort to load shedding in peak hours or the Petitioner has to purchase the power at very high price during peak hours, the Commission in the present Order is continuing with the peak hour surcharge and off peak hour rebate approved in its Order dated October 23, 2009. Although, the Commission had removed the ToD tariffs from Non-domestic category earlier, considering the power shortages scenario, the Commission will review this position next year and is continuing with the same this year also.

8.3.3 *Slab system for Domestic Category*

UPCL in its ARR and Tariff Petition for FY 2007-08 and FY 2008-09 had proposed slab-wise tariff for Domestic consumers. The Commission in its Order dated March 18, 2008 opined that with the kind of deficiencies in the billing system, it will not be appropriate to change the tariff structure, as it will add more billing problems. As discussed in Chapter 5 of the Order, there has been some improvement in metering and billing system of the Petitioner and the Commission has now initiated division-wise monitoring of critical parameters interacting directly with field level officers and proposes fix responsibility, the billing system is expected to improve significantly.

UPCL in its Petition has proposed the fixed charges on the basis of Rs./kW/month and mentioned that as the energy charges are uniform across the domestic category, the consumers with higher load and consuming more power are benefited. Considering the supply shortage scenario as brought out in preceding paras and a scope for reducing non essential consumption, the Commission agrees with the views of the Petitioner that the consumers with higher load and consuming more power should pay either higher average tariff or shall reduce their consumption. The Commission has, therefore, introduced the telescopic slab structure for the domestic category as per the following slabs with increasing tariff for consumption in higher slabs:

- Slab 1 : Upto 100 units per month
- Slab 2 : 101-200 units per month
- Slab 3 : More than 200 units per month

8.3.4 *Prohibitive Tariff for unmetered consumers*

UPCL while suggesting measures for tariff rationalisation has proposed introduction of prohibitive tariff for un-metered consumers to encourage metering of connections.

While the Commission agrees with the view of the Petitioner that flat rate based tariff encourages wasteful consumption, it is not in favour of increasing the tariff of any category suddenly as the same may cause tariff shock for that category. The Commission would also like to highlight that the introduction of prohibitive tariff for unmetered consumers is not the only solution to encourage metering. Moreover, metering of consumers is the responsibility of the licensee. The Commission has, therefore, decided to increase the tariff of un-metered domestic consumers from existing tariff of Rs. 200/connection/month to Rs. 250/connection/month. This increase in tariff, however, shall not apply to consumers in hilly areas of the State.

8.3.5 *Continuous Supply*

The Commission, in its previous Tariff Order dated October 23, 2009, had approved continuous supply surcharge @ 10% of the Energy Charge for consumers opting for supply during restricted hours (continuous). Further all the consumers had this option to opt for continuous supply irrespective of whether they are on dedicated independent feeder or on mixed feeder. In accordance with above provision even if a single consumer connected through mixed feeder opted for continuous supply, its benefit got extended to all the consumers on the mixed feeder. This was a sort of discrimination amongst the consumers who had opted for continuous supply on mixed feeder and those who have not opted for continuous supply on mixed feeder as both enjoyed the benefit of continuous supply irrespective of the fact that they were paying any continuous supply surcharge or not. On the other hand, if the supply of the mixed feeder is required to be cut during roastering, the continuous supply consumers were also unintentionally cut.

The Commission in order to rectify this anomaly has taken a view that the option of continuous supply should be made available only to consumers who are connected through dedicated independent feeder or industrial feeder provided that all the industrial consumers on such feeder opt for continuous supply option. The Commission is also of the view that considering the supply shortage position, this option needs to be provided only to the continuous process industries requiring continuous supply due to continuous nature of their process.

In this connection, the Commission would like to highlight Regulation 3(2) of UERC (Release of new HT & EHT Connections, Enhancement and Reduction of Loads) Regulation, 2008, which provides that loads for all HT consumers having Continuous Processes, irrespective of load applied for, shall be released through independent feeder only. Further, considering the fact that the demand supply situation in the State has worsened and for supplying the power to consumers who opts for continuous supply, UPCL will have to procure the additional power at very high prices, the Commission has increased the continuous supply surcharge to 15%.

The Commission has, therefore, decided that with effect from May 1, 2010, the option of continuous supply shall remain available only to Continuous Process Industries operating twenty four hours a day and for seven days in a week without any weekly off. Further, this option will only be available to continuous process industries connected through an independent feeder or industrial feeder provided that all the industrial consumers on such feeder opt for continuous supply option and for availing such an option, they need to pay 15% extra energy charges at revised tariff with effect from May 1, 2010 or from the date of connection whichever is later till 31st March 2011 irrespective of actual period of continuous supply option. The eligible consumers can revise/give their options by 26th April 2010 to the licensee.

The Industrial consumers connected on mixed feeder who have opted for continuous supply will be able to avail continuous supply option only till April 30, 2010. The consumers already availing continuous supply shall also have to pay 10% extra energy charges till April 30, 2010 at revised tariff w.e.f. 1st April 2010.

Further, currently consumers not opting for continuous supply are allowed to use power upto 15% of their contracted demand during restricted hours

of the period of restriction and for usage in excess of 15% of contracted load during the restricted hours, penalty is leviable. Some of the stakeholders raised the issue that this is discrimination amongst various categories of consumers as some consumers are allowed to use power upto 15% of contracted load without any penalty and above 15% of contracted load with penalty, while other consumers do not get power at all during restricted hours, even if they are willing to pay the penalty. Moreover, the penalty mechanism has lead to a number of disputes related to days of applicability of penalty, communication date and time of scheduled load shedding and amounts of penalty. Further, considering the severe shortage supply situation and to avoid any kind of discrimination, the Commission is of the view that the load shedding should be applicable for all the consumer categories except continuous process industries availing continuous supply option and hence the Commission has abolished the mechanism of allowing utilisation of power upto 15% of contracted load by industrial consumers who have not opted for continuous supply and the corresponding penalty mechanism with effect from the date of issue of this Order. In order to avoid further disputes and complications in billing for penalty w.e.f. 01.04.2010, no penalty shall be applicable for the month of April 2010 on non-continuous industries for violation of 15% limit during presently applicable schedule of restriction/power cut.

8.3.6 *Categorisation of HT Industries and Load Factor based Tariff*

The Commission has considered the stakeholders'/industries' views and observed that some of the consumers have again raised the issue of load factor based tariff for HT Industries. The Commission in its previous Tariff Order for FY 2009-10 dated October 23, 2009 has elaborated in detail the relevant provisions of the Act as well as Regulations, and explained the rationale for introducing load factor based tariff on economic principles with the help of examples and graphs. The Commission in this Order is not altering the tariff structure of HT Industries and is continuing with the load factor based tariff introduced in the Order for FY 2007-08 and FY 2008-09 and continued in FY 2009-10.

8.3.7 *Utilisation of PTW Connections for Incidental Agricultural Processes*

Some of the stakeholders submitted that the existing provision of allowing the incidental process of rice huller and cane crusher is being mis-used by certain consumers.

The Commission would like to clarify that the tariff applicable to RTS-4 : PTW/Pumping Sets is applicable for private tube-wells/pumping sets for irrigation purposes alongwith its incidental agricultural processes confined to chaff cutter, thrasher, cane crusher and rice huller only. Thus, the tariff applicable for RTS-4 shall only be applicable if such incidental agricultural processes are being carried out for agricultural produce of the connection sanctioned for irrigation purposes.

8.4 Treatment of Revenue Gap

As concluded in Chapter 7 of the Order, the revenue at existing tariffs leaves a revenue gap of Rs. 61 Crore to meet the ARR for FY 2010-11. As discussed in Chapter 6, reveals that revenue gap of around Rs. 30 Crore is arising primarily due to the amount to be refunded pursuant to re-determination of tariff for the period March 1, 2008 to September 30, 2009 in accordance with the Hon'ble ATE Judgement.

The average increase to bridge the entire revenue gap of Rs. 61 Crore on annual basis works out to around 3% or around 10 paise/unit. The Petitioner has proposed to bridge part of the revenue gap proposed by it through increase in tariff among different consumer categories.

Several respondents from various consumer categories have opposed the increase in tariff proposed by the Petitioner and submitted that the tariffs were increased recently in October 2009 by average increase of 15% to meet the entire revenue gap of FY 2009-10 in 6 months and, thus, the tariff increase of around 7.5% is already available to meet the ARR for FY 2010-11.

The Commission would like to highlight that the estimated average cost of supply for total sales of UPCL without considering the effect of Policy Directions for FY 2010-11 works out to Rs. 3.68/kWh as against the average cost of supply of Rs. 3.30/kWh approved in the Tariff Order for FY 2009-10. Thus, there is an increase of around 11% in the projected average cost of supply with respect to the approved average cost of supply of Rs. 3.30/kWh for FY 2009-10.

The Commission has designed the tariffs to recover the projected revenue gap during FY 2010-11. The average increase to bridge the revenue gap works out to around 3% in addition to 7.5% already available in existing tariffs. The approved tariff will be applicable only from April 1, 2010 and will be effective till revised by the Commission.

8.5 Policy Directions issued by GoU

Government of Uttarakhand, Department of Energy issued Policy Directions to the Commission under Section 108 of Electricity Act, 2003 on September 25, 2009 for its consideration during the determination of retail tariff for different consumer categories in the State.

8.5.1 *Estimation of Cost of Supply as per Policy Directions*

The Commission in its previous Tariff Order dated October 23, 2009 has elaborated on the methodology adopted by the Commission for estimating the cost of supply for different categories as per Policy Directions and the same methodology has been adopted for computing the cost of supply as per Policy Directions. In accordance with the Policy Directions, the Commission has worked out the allocation of power and its purchase cost as per the GoU directions for the FY 2010-11 by allocating the power purchase cost. For estimating the energy input requirement, the Commission has considered the differential losses at HT and LT level in line with the methodology adopted in the previous Tariff Order. Further, the Commission has allocated the power purchase cost to different categories by applying the merit order dispatch principles on monthly basis for each category separately.

The Commission in its previous Tariff Order dated October 23, 2009 had directed UPCL to work out actual voltage-wise, category-wise losses and submit the same to the Commission within a period of 6 months. However, UPCL has not complied with this direction of the Commission and has not submitted the voltage-wise and category-wise losses.

In the absence of data with respect to voltage-wise losses, the Commission has assumed the losses of 15% at HT level to arrive at the cost of power purchase at HT level for each consumer category getting supply at HT in accordance with the Policy Directions. Based on the pooled average system losses of 19% approved by the Commission for FY 2010-11 and considering the losses at HT level as 15%, the losses at LT level work out to 23.63%. The Commission has, thus, considered the loss levels of 15% and 23.63% for arriving at the power purchase costs for various HT and LT Categories. **The Petitioner is, however, directed to work out actual voltage-wise, category-wise losses and submit the same to the Commission within a period of 6 months.**

In accordance with the Policy Directions, the summary of power purchase costs from UJVNL, free power and from other sources is given in the Table below:

Table 8.1: Summary of Power Purchase Costs

S.No.	Source	Quantum (MU)	Total Cost (Rs. Crore)	Avg. Rate (Rs./kWh)
1	UJVNL-Main	2,857.87	261.26	0.91
2	Pathri	94.05	9.88	1.05
3	Mohammadpur	38.61	4.63	1.20
4	Maneri Bhali II	73.49	15.42	2.10
4	SHPs	651.67	139.61	2.14
5	Free Power	1,163.07	282.31	2.43
6	Other Sources	3,152.30	1,007.39	3.20
	Total	**8,031.06**	**1,720.49**	**2.14**

Based on the category-wise sales considered by the Commission, assumed loss levels at LT and HT and considering the total power purchase quantum approved by the Commission including banking of energy, the allocation of power purchase quantum amongst various categories is given in Table below:

Table 8.2: Summary of Category-wise Power Purchase Quantum

S.No.	Category	Sales (MU)	Efficiency improvement (MU)	Total Sales (MU)	Distribution losses	Energy input at distribution periphery (MU)	Transmission losses	Power Purchase requirement at State Periphery (MU)
1	PTW	142.24	4.35	146.60	23.63%	191.94	1.86%	195.58
2	Domestic	1232.79	37.73	1270.52	23.63%	1663.55	1.86%	1695.08
3	Government Categories	404.34	12.38	416.72	23.63%	545.63	1.86%	555.97
	Sub-total	**1779.38**	**54.46**	**1833.84**		**2401.12**		**2446.63**
4	LT Industrial and Non Domestic	929.18	28.44	957.62	23.63%	1253.86	1.86%	1277.62
5	HT Industries and Other HT Categories	3571.56	21.13	3592.70	15.00%	4226.70	1.86%	4306.81
	Sub-total	**4500.75**	**49.57**	**4550.32**		**5480.56**		**5584.43**

Table 8.3: Summary of Category-wise Power Purchase Costs

S.No	Category	Power Purchase	Average Rate	Total PP Costs
		(MU)	(Rs./kWh)	(Rs. Crore)
1	PTW	195.58	0.91	17.88
2	Domestic	1695.08	0.91	154.98
3	Government Categories	555.97	1.13	62.93
4	LT Industrial and Non Domestic	1277.62	2.66	339.67
5	HT Industrial and Other HT Categories	4306.81	2.66	1145.03

After allocating the power purchase costs to various consumer categories in accordance with the Policy Directions issued by GoU, the Commission has added average other cost of UPCL which mainly includes the employee expenses, A&G expenses, R&M expenses, Interest, Depreciation, Return etc. for computing the category-wise cost of supply. The average other cost of UPCL based on various elements of expenses approved by the Commission for FY 2010-11 works out to 98.45 paise/unit of sales. Based on these principles, the category-wise cost of supply considered by the Commission for designing the tariffs is given in the following Table:

Table 8.4: Category-wise Average Cost of Supply

S.No.	Category	Sales	Total PP Costs	Other Costs	Total Cost	Cost of Supply
		(MU)	(Rs. Crore)	(Rs. Crore)	(Rs. Crore)	(Rs./kWh)
1	PTW	142.24	17.88	14.43	32.31	2.27
2	Domestic	1232.79	154.98	125.08	280.06	2.27
3	Government Categories	404.34	62.93	41.02	103.96	2.57
4	LT Industrial and Non Domestic	929.18	339.67	94.28	433.95	4.67
5	HT Industrial and Other HT Categories	3571.56	1145.03	353.65	1498.72	4.20

8.6 Category-wise Tariff Design

The Commission has designed the category-wise tariffs for full recovery of approved Annual Revenue Requirement for 2010-11. The category-wise tariffs approved by the Commission are discussed below and are also shown in the Approved Rate Schedule placed at **Annexure-1.** These rates shall be effective from April 1, 2010 and shall continue to be applicable till further revised by the Commission.

8.6.1 *RTS-1: Domestic Tariff*

As the Petitioner has sought time for metering unmetered rural domestic consumers, the Commission is permitting to retain this sub-category, while the tariff for unmetered rural domestic consumers has been marginally increased. The tariff for lifeline consumers has been retained at existing level. For other domestic metered consumers, the fixed charges have been retained at existing level and three slabs have been introduced for energy charges. The energy charges for lowest slab i.e. consumption upto 100 units/month have been retained at existing level of Rs. 2.20/kWh. The energy charges for the second slab i.e. for consumption between 101-200 units/month have been fixed as Rs. 2.40/kWh and the energy charges for the third slab i.e. for consumption above 200 units/month, have been fixed as Rs. 2.60/kWh. For single point bulk supply connections, the energy charges have been increased to Rs. 2.35/kWh assuming consumption of 400 units per consumer per month and 5% rebate for single point supply and billing margin.

Based on the analysis of the actual data for FY 2008-09, the Commission observed that the average consumption of domestic metered consumers is around 90 units/month with around 80% consumers consuming less than 100 units per month. Thus, the introduction of slab-structure has no implication for 80% low end consumers as their fixed and energy charges remain same.

As the slab-wise tariff for domestic category is introduced in this Order, the exact revenue impact of the slab-wise tariff for domestic category will be known at the end of the year based on the actual data. However, the additional revenue from this category due to introduction of slab-wise tariff is expected to be around 3% required for bridging the revenue gap during FY 2010-11. Accordingly, no separate increase of 10 paise/unit is required for this category. The Commission for time-being has considered a revenue impact of around 10 Crore towards introduction of slab-wise tariffs and the Commission will carry out the truing up of revenue based on actual data.

A comparison of the tariff i.e. existing, proposed by the licensee and that approved by the Commission, is given in the Table below:

Table 8.5: Tariff for Domestic Consumers

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed Charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./Month	Rs./kWh	Rs./kW/ month	Rs./kWh	Rs./ Month	Rs./kWh
1	Domestic Unmetered (Rural)	200	Nil	200	Nil	250	Nil
2	Domestic Metered						
2.1	Life line consumers- Below poverty line and Kutir Jyoti having load upto 1 kW and consumption upto 30 units/month	Nil	1.50	Nil	1.50	Nil	1.50
2.2	Other Domestic Consumers – Metered	i) Load upto 4 kW- 20 ii) Load above 4 kW- 40		24		i) Load upto 4 kW- 20 ii) Load above 4 kW- 40	
	Upto 100 units/month		2.20		2.64		2.20
	101-200 units/month		2.20		2.64		2.40
	Above 200 units/month		2.20		2.64		2.60
3	Single point bulk supply	20/kW	2.10	20/kW	2.52	20/kW	2.35

8.6.2 *RTS 1-A: Concessional Snowbound Area Tariff*

The Commission has not changed the tariffs for domestic and non-domestic consumers in snow bound areas considering the difficulties faced by this category of consumers and erratic supply position as the maintenance of lines and sub-stations is difficult in these areas. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Table below:

Table 8.6: Concessional Tariff for Snowbound Areas

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed Charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./month	Rs./kWh	Rs./kW/ month	Rs./kWh	Rs./month	Rs./kWh
1.1	Domestic	Nil	1.50	Nil	1.50	Nil	1.50
1.2	Non Domestic						
	Upto 1 kW	Nil	1.50	Nil	1.50	Nil	1.50
	1-4 kW	Nil	2.00	Nil	2.00	Nil	2.00
	Above 4 kW	Nil	3.00	Nil	3.00	Nil	3.00

8.6.3 *RTS-2: Non-Domestic Tariff*

For Non-Domestic consumers, the tariff for concessional sub-category of educational institutions, hospitals and charitable institutions has been increased marginally by 10 paise to meet the projected ARR for FY 2010-11. The above mentioned tariff shall, however, be applicable to the following category of consumers only:

- Government/Municipal Hospitals;

- Government/Government Aided Educational Institutions; and
- Charitable Institutions registered under the provisions of Income Tax Act, 1961 and whose income is exempted from tax under this Act.

For other non-domestic users also, the tariff has been increased marginally by 10 paise/unit to meet the projected ARR for FY 2010-11.

As discussed above in tariff rationalisation measures, the Commission has retained the MCG of 75 units/kW/month and 900 units/kW/annum for non-domestic consumers having load above 25 kW. The minimum consumption guarantee charges will be levied on monthly basis when monthly consumption is less than the units specified for monthly minimum consumption guarantee (MCG). In case, cumulative actual consumption from the beginning of financial year exceeds the units specified for annual minimum consumption guarantee (MCG) no further billing of monthly MCG shall be done. In such cases, differential paid in excess of actual billing shall be adjusted in the bill for month of March 2010. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Table below:

Table 8.7: Tariff for Non-domestic consumers

S.No.	Category	Existing Tariff		Proposed Tariff		Approved Tariff		
		Energy Charges (Rs./kWh)	Fixed charges (Rs./kW/ month)	Energy Charges (Rs./kWh)	Fixed charges (Rs./kW/ month)	Energy Charges (Rs./kWh)	Fixed charges (Rs./kW/ month)	Minimum Consumption Guarantee (kVAh / kW of contracted load)
1.1	Government/Municipal Hospitals; Government/Government Aided Educational Institutions; and Charitable Institutions registered under the provisions of Income Tax Act, 1961 and whose income is exempted from tax under this Act							
(i)	a. Upto 25 kW	3.20	20	3.84	24	3.30	20	
(ii)	b. Above 25 kW	3.10/kVAh	20	3.48	24	3.00/kVAh	20	75 kVAh /k W/ month 900 kVAh /kW/annum
1.2	Other non-domestic users							
(i)	a. Upto 25kW	2.90	20	4.68	24	4.00	20	
(ii)	b. Above 25 kW	3.90/kVAh	20	4.68/kVAh	24	4.00/kVAh	20	75 kVAh /kW/ month 900 kVAh /kW/annum
1.3	Single Point Bulk Supply					3.80/kVAh	20	75 kVAh /kW/month 900 kVAh /kW/annum

8.6.4 *RTS-3: Public Lamps*

The fixed charges for the unmetered category have been retained at existing level of Rs. 115/100 W Lamp. The Commission has increased the energy charges for metered category of public lamps by 10 paise/kWh i.e. from Rs. 3.20/kWh to Rs. 3.30/kWh, while keeping the fixed and maintenance charges same. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Tables below:

Table 8.8: Tariff for Public Lamps

Sl. No	Category	Existing			Proposed			Approved		
		Fixed Charges	Maint. Charges	Energy Charges	Fixed Charges	Maint. Charges	Energy Charges	Fixed Charges	Maint. Charges	Energy Charges
		Rs./kW/ month	Rs./point/ Month	Rs. /kWh	Rs./kW/ month	Rs./point/ month	Rs. /kWh	Rs./kW/ month	Rs. /point/month	Rs. /kWh
1	Public Lamps	15	10	3.20	18	12	3.84	15	10	3.30

8.6.5 *RTS-4: Private Tube Wells/Pump sets*

The Commission has designed the tariff for PTW consumers after duly considering the Policy Directions issued by GoU. The Commission has increased the tariff for PTW consumers to gradually reduce the cross-subsidy. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Table below:

Table 8.9: Tariff for Private tube Wells/ Pump Sets

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./BHP/ month	Rs./kWh	Rs./BHP/month	Rs./kWh	Rs./BHP/ month	Rs./kWh
1	Unmetered	130	Nil	156	Nil	150	Nil
2	Metered	Nil	0.80	Nil	0.96	Nil	0.90

8.6.6 *RTS-5: Government Irrigation System*

The tariff has been approved based on the policy directions issued by the GoU. The Commission has increased the tariff for GIS by 10 paise/kWh in order to bridge the revenue gap of the Petitioner. The energy charges have been increased from Rs. 3.20/kWh to Rs. 3.30/kWh for GIS upto 100 BHP and from Rs. 3.00/kVAh to Rs. 3.10/kVAh for GIS above 100 BHP. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Tables below:

Table 8.10: Tariff for Government Irrigation System

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed Charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./BHP/ Month	Rs./kWh	Rs./kW	Rs./kWh	Rs./month	Rs./kWh
1	GIS upto 100 BHP	15/kW	3.20	18	3.84	15/kW	3.30
2	GIS above 100 BHP	15/kVA	2.90/kVAh	18/kVA	3.48/kVAh	15/kVA	3.00/kVAh

8.6.7 *RTS-6: Public Water Works*

The Commission has increased the tariff marginally i.e. by 10 paise/kWh for this category in order to recover the ARR of the Petitioner. The fixed charges have been kept at the same level while the energy charges have been increased from the existing level of Rs. 2.90/kVAh to Rs. 3.00/kVAh. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Tables below:

Table 8.11: Tariff for Public Water Works

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed Charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./kW/ Month	Rs./kVAh	Rs./kW/ month	Rs./kVAh	Rs./kW/ Month	Rs./kVAh
1	Public Water Works	15	2.90	18	3.48	15	3.00

8.6.8 *RTS-7: Industry*

For Industrial category, the fixed charges have been retained at existing level and the energy charges have been increased by 10 paise/unit to meet the projected ARR during FY 2010-11 as well as keeping in view the rise in average cost of supply to these industries calculated in line with the policy direction of the Government. As discussed above on tariff rationalisation aspects, the Commission has retained the tariff structure on the basis of the load factor. The Commission has retained the peak hour rate as 50% higher than the normal hour rate applicable for highest slab i.e. with load factor above 50% for all the HT industrial consumers. Further, consumers opting for continuous supply as per eligibility given in this Order shall have to pay 15% additional energy charges as continuous supply surcharge.

As discussed above in tariff rationalisation measures, the Commission has retained MCG on monthly basis with adjustment on annual basis. The minimum consumption guarantee charges will be levied on monthly basis when monthly consumption is less than the units specified for monthly minimum consumption guarantee (MCG). In case, cumulative actual consumption from the beginning of financial year exceeds the units specified for annual minimum consumption guarantee (MCG) no further billing of monthly MCG shall be done. In such cases, differential paid in excess of actual billing shall be adjusted in the bill for month of March 2011. The existing tariff, tariff proposed by the licensee and that approved by the Commission for LT Industry is given in Table below:

Table 8.12: Tariff for LT Industries

S. No.	Category	Existing Tariff			Proposed Tariff			Approved Tariff		
		Fixed Charges	Energy Charges	MCG	Fixed Charges	Energy Charges	MCG	Fixed Charges	Energy Charges	MCG
		Rs./kW/ month	Rs./kWh	Rs./kW/ month	Rs./kW/ month	Rs./kWh	Rs./kW/ month	Rs./kW/ month	Rs./kWh	kWh/kW or kVAh/kW of contracted load
1	Upto 25 kW	80	3.15/kWh	75/kWh/ kW/month 900/kWh /kW/annum	96	3.78/ kWh	75/kWh/ kW/month 900/kWh /kW/annum	80	3.25	*75 kWh/ kW/month 900 kWh /kW/annum
2	Above 25 kW	80	2.85/kVAh	75/kVA/ kVA/month 900/kVAh /kVA/ annum	96	3.42/ kVAh	75/kVA/ kVA/month 900/kVAh /kVA/ annum	80	2.95/ kVAh	75 kVAh/ kW/month 900 kVAh /kW/ annum

**40 kWh/kW/month and 480 kWh/kW/annum for Atta Chakkis.*

The existing tariff and tariff proposed by the licensee for HT Industry is given in Table below:

Table 8.13: Tariff for HT Industries

S. No.	Category		Existing Tariff			Proposed Tariff		
			Energy Charges	Fixed Charges	MCG Charges	Energy Charges	Fixed Charges	MCG Charges
			Rs./kVAh	Rs./kVA		Rs./kVAh	Rs./kVA	
1	HT Industry having contracted load above 88kVA/75 kW (100 BHP)	Load Factor						
1.1	Contracted Load up to 1000 kVA	Upto 33%	2.50	Rs. 160/kVA of the billable demand	110 kVAh /kVA/ month 1320 kVAh /kVA/ annum	3.00	Rs. 192/kVA of the billable demand	110 kVAh /kVA/ month 1320 kVAh /kVA/ annum
		Above 33% and upto 50%	2.75			3.30		
		Above 50%	3.00			3.60		
1.2	Contracted Load More than 1000 kVA	Upto 33%	2.50	Rs. 220/kVA of the billable demand		3.00	Rs. 264/kVA of the billable demand	
		Above 33% and upto 50%	2.75			3.00		
		Above 50%	3.00			3.60		

The approved tariff for HT Industry is given in Table below:

Table 8.14: Approved Tariff for HT Industry

S.No	Category	Energy Charges		Fixed Charges	MCG
		Rs./kVAh		Rs./kVA/ month	kVAh/kVA of contracted load
1	HT Industry having contracted load above 88kVA/75 kW (100 BHP)	Load Factor			
1.1	Contracted Load up to 1000 kVA	Upto 33%	2.60	160 of the billable demand	110 kVAh/kVA/ month 1320 kVAh /kVA/annum
		Above 33% and upto 50%	2.85		
		Above 50%	3.10		
1.2	Contracted Load More than 1000 kVA	Upto 33%	2.60	220 of the billable demand	
		Above 33% and upto 50%	2.85		
		Above 50%	3.10		

8.6.9 *RTS-8: Mixed Load*

For single point bulk supply connections having mixed load with domestic and non-domestic usage, the Commission has approved the fixed charges of Rs. 20/kW and has specified the uniform energy charge of Rs. 3.10/kWh. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Table below:

Table 8.15: Tariff for Mixed Load

Sl. No.	Category	Existing		Proposed		Approved	
		Fixed Charges	Energy Charges	Fixed Charges	Energy Charges	Fixed Charges	Energy Charges
		Rs./kW/ month	Rs./kWh	Rs./kW/ month	Rs./kWh	Rs./kW /month	Rs./kWh
1	Mixed Load	20	3.00	24	3.60	20	3.10

8.6.10 *RTS-9: Railway Traction*

Energy charges for Railway Traction had been arrived at by adding 10% surcharge towards continuous supply of power and 8% impact of ToD tariff on HT Industry Tariff applicable for load factor below 33%. Considering that Railways has very low load factor, the Demand Charges were kept at same level as applicable to HT Industry consumers upto 1000 kVA though their contracted demand exceeds 1000 kVA. The Commission has now increased only energy charges by 10 paise/kWh to meet the revenue gap. The existing tariff, tariff proposed by the licensee and that approved by the Commission is given in Tables below:

Table 8.16: Tariff for Railway Traction

Sl. No.	Category	Existing		Proposed		Approved	
		Demand Charges	Energy Charges	Demand Charges	Energy Charges	Demand Charges	Energy Charges
		Rs./kVA/ month	Rs./kVAh	Rs./kVA/ month	Rs./kVAh	Rs./kVA/ month	Rs./kVAh
1	Railway Traction	160	3.00	192	3.60	160	3.10

8.7 Revenue at Approved Tariffs

Based on the tariffs as approved above, the Commission has computed the revenue at projected revenue at approved tariffs from each category for 2010-11. The summary of category-wise projected revenue for FY 2010-11 is given in the following Table:

Table 8.17: Revenue at Approved Tariffs

S.No	Category	Sales (MU)	Total Revenue for the Year (Rs. Crore)
1	Domestic	1,233	300.75
2	Non-Domestic	698	294.95
3	PTW	142	14.97
4	GIS	112	37.70
5	Public Lamps	47	15.88
6	PWW	245	78.26
7	LT-Industrial	231	93.85
8	HT-Industrial	3,449	1440.55
9	Railway Traction	15	6.25
10	Mixed Load	108	34.38
	Efficiency Gains	104	38.45
	Total	**6,384**	**2355.98**

The estimated revenue for 2010-11 works out to Rs. 2356 Crore against the ARR of Rs. 2349 Crore leaving a surplus of Rs. 7 Crore.

8.8 Cross-subsidy

Due to issuance of Policy Directions by GoU, the entire exercise of cross-subsidy reduction has to be carried out on the revised cost of supplies considering differential cost of power as mentioned earlier. The extent of category-wise cross-subsidy at approved tariffs is computed at allocated average cost of supply in accordance with GoU Policy Directions and is given in Table below:

Table 8.18: Cross Subsidy at Allocated Cost of Supply as per GoU Policy Directions

Category	Average Tariff	Allocated Cost of Supply	Average Tariff/Cost of Supply	Cross Subsidy
	Rs./kWh	Rs./kWh	%	%
Domestic	2.46	2.27	108%	8%
PTW	1.05	2.27	46%	-54%
Public Lamps	3.35	2.57	130%	30%
PWW	3.04	2.57	124%	24%
GIS	3.35	2.57	130%	30%
Non Domestic	4.23	4.67	91%	-9%
LT Industrial	4.17	4.67	89%	-11%
HT Industrial	4.18	4.20	100%	0%
Railway	4.18	4.20	100%	01%
Mixed Load	3.22	4.20	77%	-23%

The Commission has also assessed the cross-subsidy at approved tariffs on average cost of supply for the Petitioner as a whole without considering effect of Policy Directions. The extent of category-wise cross subsidy at approved tariffs computed at average cost of supply is given in Table below:

Table 8.19: Cross Subsidy at Average Cost of Supply*

Category	Average Tariff	Average Cost of Supply*	Average Tariff/Average Cost of Supply*	Cross Subsidy
	Approved		Approved	Approved
	Rs./kWh	Rs./kWh	%	%
Domestic	2.46	3.68	67%	-33%
PTW	1.05	3.68	29%	-71%
Public Lamps	3.35	3.68	91%	-9%
PWW	3.04	3.68	87%	-13%
GIS	3.35	3.68	91%	-9%
Non Domestic	4.23	3.68	115%	15%
LT Industrial	4.17	3.68	113%	13%
HT Industrial	4.18	3.68	114%	14%
Railway	4.18	3.68	114%	14%
Mixed Load	3.22	3.68	87%	-13%

** For Petitioner as a whole without considering GoU Policy Direction*

The above Table clearly indicates that at the approved tariffs, the cross-subsidies for different category of subsidizing consumers is within the range of 20% of average Cost of Supply as specified in the tariff policy to be attained by FY 2010-11.

The Tariff Policy stipulates the follows as regards the cross-subsidy:

"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 subsidised 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-subsidising categories*** *should not go beyond Rs 3.60 per unit* ***(emphasis added)****."*

Thus, the cross-subsidy has to be worked out and brought at the desired levels for all the consumers of the entire category taken together. In this regard the Commission would like to highlight that with the approved tariffs the average tariff for all the subsidised categories is within the range of +20% of average cost of supply. Further, once the cross-subsidy level has been reduced to within +20% there is no mandate under the Act or Tariff Policy to reduce it further. However, the criteria of ± 20 % of the average cost of supply for all the categories including subsidised categories depend upon the consumption mix of the Licensee. However, in case of Petitioner, the consumption mix is skewed towards subsidising categories with subsidising categories constituting 72% of total sales while the consumption by subsidised categories is around 28% of the total consumption. Therefore, in case of Petitioner though the tariff for all the subsidising categories have been within 120% of overall average cost of supply of Petitioner without considering the GoU Policy Directions, the average tariff for some of the subsidised categories is less than 80% of overall average cost of supply of Petitioner even without considering the GoU Policy Directions.

9. Commission's Directives

The Commission in its previous Orders had issued a number of specific directions to the Petitioner with an objective of attaining operational efficiency, efficient manpower deployment and streamlining the flow of information, which would be beneficial for the Sector and the Petitioner both in short and long term perspective. These directions aim at creating a conducive, competitive and healthy environment for the Petitioner to provide good quality of electricity supply and service to the consumers of Uttarakhand at optimum and affordable costs.

This Chapter deals with the compliance status and Commission's views thereon as well as the summary of new directions (given in preceding Chapters of this Order) for compliance and implementation by the Petitioner.

9.1 Compliance of Directives Issued in Tariff Order for FY 2009-10

9.1.1 *Multi Year Tariffs*

The Petitioner is hereby directed to start maintaining its database for reliable and concrete historical data as well as future data in the manner specified in the Regulations and also to submit its Business Plan for ensuing five years so that the same may be utilized by the Commission while framing MYT Regulations.

Petitioner's Submissions

As regards the directive for maintaining historical data and to submit Business Plan, the Petitioner requested the Commission to prescribe the formats in which the data is required for determining the Multiyear Tariffs/framing Multiyear Tariffs Regulations. Moreover, the Petitioner submitted that it has taken steps to prepare its Business Plan for ensuing five years and the same shall be submitted to the Commission on preparation.

The Commission is in the process of framing the Tariff Regulations and under which, the Commission would consider implementing MYT framework. Upon finalisation of the Tariff Regulations, the Commission would provide the formats in which the data would be required for determining the Multiyear Tariffs.

9.1.2 *Contribution towards Pension and Gratuity*

The Commission in its previous Tariff Orders directed the Petitioner to get the actuarial calculation updated since considerable time has elapsed after division of staff between UPPCL and UPCL.

Petitioner's Submissions

During the previous ARR and Tariff determination exercise for FY 2009-10, the Petitioner had submitted that it was in the process of getting the revised actuarial valuation done through a certified actuary. However, the Petitioner has not submitted any further information on the same.

The Commission once again directs the Petitioner to submit the updated actuarial valuation report to the Commission within 3 months of the issuance of this Order.

9.1.3 *Consumer Servicing*

The Commission directs the Petitioner to take appropriate action for implementing the suggestions of the respondents to improve the services to its consumers.

Petitioner's Submissions

As regards the directive regarding implementation of the suggestions of the respondent, the Petitioner quoted the suggestions of stakeholders as under:

> *"Several respondents objected to the consumer services being provided by UPCL and highlighted that various consumer related issues like Load Sanction, release of connections, reduction of loads etc., takes abnormal time thus causing hardship to the consumers. The Commission should review the prevailing systems of licensee and issue suitable directions to UPCL for facilitating the consumers. The bills received by consumers are exorbitant and the consumers are not educated for understanding of bills. The consumers are receiving high number of bills for NA/NR cases."*

The Petitioner submitted as under regarding the compliance in this regard:

(i) The Commission has issued Regulations for release of New Connections, Enhancement and Reduction of Loads, Procedure for Release of Connections, amount to be deposited by the consumer and time frame has been specified in the

Regulations. The Petitioner submitted that it has already implemented these Regulations and has been complying with the provisions of these Regulations while disposing off the applications of New Connections/Reduction of Loads, etc.

(ii) Bills for electricity consumption are issued on actual reading/assessment basis based on tariff approved by the Commission. In case there is any error in the electricity bill, the consumers have been provided facility to approach sub-division/division office for correction of the same. Moreover, the Petitioner has also constituted Forums for Redressal of Grievances of consumers, separately for Garhwal and Kumaon Zone. Consumers can also get Redressal of their Grievances in these Forums.

(iii) Further, the Petitioner has directed its field officers to eliminate NA/NR cases.

The Commission has considered the response of the Petitioner and feels that steps taken by the Petitioner are not sufficient. The Commission accordingly directs the Petitioner to think in terms of some other forward lookings steps such as creation of call centres for fault handling, providing additional facilities for collection of bills, preparing & circulating booklets for educating the consumers about various provisions of Act and Regulations framed by the Commission, automation of billing system etc.

9.1.4 *Sales forecast, energy losses and power purchase requirement*

The Commission directs UPCL to reduce the distribution losses by a modest target of 2% in FY 2009-10 and, hence, specifies the distribution loss target of 20.32% for FY 2009-10.

Petitioner's Submissions

The Petitioner submitted the details of the distribution loss for past years as under:

Year-wise Distribution Losses in UPCL

Year	Approved by UERC	Actual Estimated by UERC	Actual as per UPCL record
FY 2003-04	40.32%	35.55%	29.52%
FY 2004-05	36.32%	36.63%	26.66%
FY 2005-06	32.32%	33.38%	28.37%
FY 2006-07	28.32%	32.84%	29.73%
FY 2007-08	24.32%	30.98%	29.65%
FY 2008-09	22.32%	31.02%	28.01%

The Petitioner submitted that the Commission in its Tariff Order dated October 23, 2009 has specified the loss reduction target of 2% during FY 2009-10. Further, the Petitioner, in its ARR and Tariff Petition for FY 2010-11 has proposed the distribution losses @ 26% and 24% for FY 2009-10 and FY 2010-11 respectively, targeting to reduce losses @ 2% p.a. in accordance with the direction of the Commission.

The Commission has observed that the Petitioner's progress is not focussed on the said direction as the quantative progress attained (in %) against the given target for loss reduction has, not been significant. The Commission, accordingly, directs the Petitioner to analyse the findings of the Commission as given in Chapter 5 of this Order and take corrective actions as required.

9.1.5 *Certificate of Electrical Inspector*

The Commission directs the Petitioner to obtain the Electrical Inspector's certificate for all the HT schemes capitalised till FY 2008-09 and submit a copy of the same to the Commission within 3 months from the date of issue of this Order.

Petitioner's Submissions

As regards the directive regarding obtaining certificate from Electrical Inspector, the Petitioner submitted that it has completed all the formalities and thereafter requested Electrical Inspector, Government of Uttarakhand, for inspection and issuance of clearance certificates as required under law, however the Petitioner is yet to receive necessary clearance certificates from Electrical Inspector.

The Petitioner further submitted that it has also apprised the Government of Uttarakhand that due to inadequate staff, the Electrical Inspector is not in position to test all the installations of UPCL. The Petitioner further submitted that it has requested GoU to appoint the officers of PTCUL as officers to assist the Electrical Inspector in accordance with Rule-4A of the Indian Electricity Rules, 1956 for testing of all the New HT/EHT installation of UPCL which are energized on or after November 09, 2001 and written approval of Electrical Inspector has not been issued for the same.

The Commission has noticed that the Petitioners has taken steps for obtaining the certificate from the Electrical Inspector, however, the same needs to be expedited for early clearances. Hence, the Petitioner is hereby directed to obtain the Electrical Inspector's certificate for all the HT schemes capitalised till FY 2008-09 and submit a copy of the same to the Commission within 6 months from the date of issue of this Order.

9.1.6 *Compliance of HT/EHT Regulation*

Infact, the Commission in Regulation 10(2) of UERC (Release of new HT & EHT Connections, Enhancement and Reduction of Loads) Regulations, 2008 has also specified as under:

> *"The distribution licensee (UPCL) shall display by 31st March 2009, at the places listed in sub-regulation (1) above, the list of defaulters (with HT & EHT connections) with complete details namely name, address, amount of default, date of disconnection etc., whose connections have either been permanently disconnected or whose electricity dues of more than Rs. 1 lac are pending for more than 3 billing cycles. Distribution licensee shall update the list of defaulters every month."*

The Petitioner is hereby directed to comply with the above stipulation of the Regulation.

Petitioner's Submissions

As regards the directive regarding display of default consumers, the Petitioner submitted that the list of defaulting consumers whose connections have either been permanently disconnected or whose electricity dues of more than Rs. one Lakh are pending for more than three billing cycles has been hosted on its website.

The Petitioner further submitted that the Executive Engineers of the Distribution Divisions have been directed to display the list of all defaulting consumers whose connections have either been permanently disconnected or whose electricity dues are of more than Rs. one Lakh and are pending for more than three billing cycles at their offices.

9.1.7 *Billing of LT Consumers*

The Commission hereby directs the Petitioner to raise only computerized bills for all the categories of consumer's w.e.f. 01.01.2010, thereafter no bill shall be raised manually.

Petitioner's Submissions

As regards the directive regarding raising computarised bills, the Petitioner submitted that it has taken steps to comply with the above direction and it assured that only computerized bills would be released to all consumers w.e.f. April 01, 2010. Accordingly, UPCL requested the Commission to allow extension of time upto April 01, 2010 for this work.

The Commission has noted the steps taken by the Petitioner.

9.1.8 *Billing Status – Commission's Observations and Directions*

The Petitioner is directed to fix responsibility of concerned divisional head for dismal performance and for not being able to control provisional billing as per MoU signed by them. Petitioner is also directed to explain why the performance got worsened despite outsourcing the function of meter reading and employing 1100 personnel at a monthly salary of Rs 7000/-.

The Commission directs the licensee to report to the Commission an action plan for doing energy audit at DT level for the areas where loss level is in the range of 30% or more within 45 days. This report should give total numbers of DTs in each division, number of DTs provided with energy Meters and list of DTs where loss level is in the range of 30% or more.

The Commission hereby directs the Petitioner to replace all old electromechanical meters with new electronic meters as specified in CEA's Regulations on metering. The Petitioner is further directed to submit division-wise action plan giving reasonable time frame for replacement of these meters by 31st December 2009.

The Petitioner is hereby directed to educate the general public regarding features of electronics meter and its advantages.

Petitioner's Submissions

The Petitioner submitted that in accordance with the direction of the Commission, Hardwar and Udhamsinghnagar Districts have been identified under first phase, where loss level is high. The Petitioner submitted that it is in the process to prepare the action plan for carrying out energy audit at Distribution Transformer (DT) level in these areas. The said plan is likely to be prepared by March 31, 2010. The Petitioner further submitted that upon preparation of the report on the same, it shall be submitted to the Commission.

As regards the replacement of old electromechanical meters, the Petitioner submitted that there were about 3.50 Lakh electromechanical meters installed in different categories of consumers. Out of these 3.50 Lakh meters, 0.50 Lakh meters have been replaced with electronic meters. The Petitioner further submitted that the quantum of installed electromechanical meters is very high and replacement of all individual meter will take considerable time. Therefore, replacement of balance electromechanical meters will take some more time. Accordingly, the Petitioner requested the Commission to allow time upto March 31, 2011 for replacement of these meters.

As regards the direction regarding educating consumers about the benefits of the electronic meter, the Petitioner submitted that some consumers and consumer associations have opposed the replacement of electromechanical meters with electronic meters. Considering such opposition, Deputy General Manager from Corporate Office was deputed to educate them regarding features of electronic meters and its advantages.

9.1.9 *Very Poor Load Factor – Commission's observations and Directions*

The Petitioner is hereby directed to undertake testing of meters of all such consumers in Domestic, Non-domestic and Industrial categories whose monthly load factor is less than 10% within six months from issue of this order and report compliance along with results of such testing by the following month end.

The Petitioner is further directed to identify those divisions where distribution losses are high and to get a complete energy-audit in those divisions distribution transformer wise and submit thereon the report of the same along with the next ARR filing.

Petitioner's Submissions

As regards the Commission's observation on the poor load factor, the Petitioner submitted that it has taken steps to undertake testing of meters of all such consumers in domestic, non-domestic and industrial categories, whose monthly load factor is less than 10%.

The Petitoner further submitted that Hardwar and Udhamsinghnagar Districts have been identified under the first phase where loss level is high. The Petitioner further submitted that it is in process to prepare the action plan for distribution transformers-wise complete energy audit in these areas. The said plan is expected to be completed by March 31, 2010 and upon preparation, the same shall be submitted to the Commission.

9.1.10 *Fictitious Meters*

The Petitioner is directed to initiate the exercise of identifying such 'ghost' consumers and writing them off from their accounts under the transparent policy adopted for identifying and writing off bad debts so that true and correct position of losses can emerge.

Petitioner's Submissions

The Petitioner submitted that it has identified about 46000 consumers in the domestic consumers which have fictitious meters from its billing database and steps have been taken to verify the actual status of these meters. On verification of meters of such consumers, actual meter number would be mention in the bills of the consumers in such cases where it has been wrongly mentioned. However, for ghost consumers who does not have any connection, the Petitioner proposes to delete the connection from the books. The Petitioner has further submitted that for waiver of fictitious arrears, transparent policy would be evolved providing for writing off of such arrears as bad debts. The Petitioner further submitted that the said exercise is expected to be completed by June, 2010.

The Commission has noted the steps taken by the Petitioner in this regard and also accepted the request of the Petitioner to extent the time limit till June 2010. The Petitioner should submit the status report in this regard within one month from the date of this Order.

9.1.11 *Additional Capitalization*

The Petitioner is also directed to get an independent audit of the value of assets capitalized since 09-11-2001 which should cover the date of capitalization, cost of assets including IDC and its financing, segregating the capital cost into loan, equity and grants/consumer contribution and submit the same within a period of six months.

Petitioner's Submissions

The Petitioner submitted that it has taken steps for valuation of asset capitalized year-wise after November 9, 2001 audited by an independent firm of Chartered Accountants and one of the Chartered Accountant firm had also agreed to take up the assignment during preliminary discussions. Later the Chartered Accountants firm backed out. The Petitioner further submitted that it is currently looking for a CA firm for the aforesaid exercise. On completion of the same, a detailed report will be submitted to the Commission.

The Commission has noted the steps taken by the Petitioner in this regard and once again directs the Petitioner get an independent audit of the value of assets capitalised since November 9, 2001 and submit the report in this regard within a period of six months.

9.1.12 *Government of Uttar Pradesh (UP) Loan*

The Petitioner is, therefore, directed to approach the State Government for early finalization of the transfer scheme and to provide them all necessary details/assistance in this regard. The Petitioner is directed to submit a report on steps taken by it and the status of transfer scheme within 3 months of the issuance of this Tariff Order.

Petitioner's Submissions

The Petitioner submitted that it has been constantly requesting the Government of Uttarakhand to take steps for finalization of Transfer Scheme executed between UPPCL and UPCL on October 12, 2003. UPCL and Government of Uttarakhand are also in process of restructuring the liabilities and equity structure of UPCL to resolve the pending issues of liabilities and loans on account of the transfer scheme.

The Commission accordingly directs UPCL, one more time, to get the Transfer Scheme finalized within the ensuing financial year.

9.1.13 *Depreciation*

The Commission once again directs the Petitioner to prepare and maintain fixed assets registers so as to be able to clearly define assets in the classes specified in the Regulations alongwith their respective ages and to present correct picture of assets in the next filing, failing which the Commission will have no choice but to totally disallow Petitioner's claims in this regard.

Petitioner's Submissions

As regards the direction of the Commission regarding preparation of the fixed assets registers, the Petitioner submitted that it has taken steps for preparation of detailed fixed asset registers, including identification, physical verification, valuation of all fixed assets; category-wise and location-wise in accordance with the guidelines prescribed in the Companies Act, 1956.

The Petitioner submitted that it had invited bids through open tender basis for the above work after undertaking a detailed study of the activities and scope of this work being undertaken by other Distribution Utilities in other States. The work has been awarded successful bidder in June 2008, who has completed the identification, physical verification of all fixed assets; category-wise and location-wise in accordance with the guidelines prescribed in the Companies Act, 1956. The Petitioner further submitted that the valuation of the fixed assets is in progress and on the request of the contractor; the time for completion of the assignment has been extended upto March 31, 2010**.**

The Petitioner submitted the following sample reports as submitted by the consultant:

- Valuation of fixed assets of all the divisions pertaining to Srinagar Circle.
- Assets of all the divisions pertaining to Srinagar Circle for the period from 09-11-2001 to 31-03-2006.
- Valuation of fixed assets of all the divisions pertaining to Haldwani Circle.
- Assets register of all the divisions pertaining to Haldwani Circle for the period from 09-11-2001 to 31-03-2006.

The Commission has noted the progress in this regard. As the Petitioner has submitted that the work is likely to be completed by March 31, 2010, the Commission directs the Petitioner to submit a copy of Fixed Asset Register to the Commission within a period of three months.

9.1.14 *Operation and Maintenance Expenses*

The Petitioner is directed to file alongwith with its next ARR full details of the employee contribution towards pension and gratuity segregating the current contributions and actual payments made towards terminal benefits to the retiring employees failing which any extra expenditure allowed on this head would be disallowed and recovered from the Petitioner. The Petitioner is also directed to settle its claims with UP in this regard.

Petitioner's Submissions

The Petitioner submitted that the details of employer contribution towards pension and gratuity, etc. The Petitioner further submitted that,, Government of Uttarakhand is also in process of restructuring the liabilities and equity structure of UPCL to resolve the pending issues of liabilities and loans arising from the Transfer Scheme executed between UPPCL and UPCL.

9.1.15 *Provision for Bad and Doubtful Debts*

The Petitioner is directed to frame appropriate guidelines and procedure for identifying, physically verifying and writing off the bad debts and should issue them to its field officers, specifying the responsibilities of its employees in this regard so that the continuing menace of irrecoverable dues including the dues against fictitious consumers is done away with as per fixed time schedule. These guidelines and time schedule should be submitted by the Petitioner to the Commission within a period of one month.

Petitioner's Submissions

The Petitioner submitted that policy and guidelines for writing of bad debts and provisioning for bad and doubtful debts have been approved by Board of Directors of UPCL, which were submitted to the Commission vide UPCL's letter No.-1657/UPCL/ UERC/B-5/DF, dated March 15, 2008. The Petitioner further submitted that it has taken steps to evolve a detailed procedure to implement these policies and guidelines, which is expected to be finalized by the end of March 2010.

The Commission fails to understand when the policy and guidelines for writing of bad debts has been finalised in March 2008, why it is taking so much time for framing the procedures for identifying, physically verifying and writing off the bad debts by the field officers.

9.1.16 *Impact of Re-determination of Tariff for Steel Units and Railway Traction*

The Commission directs UPCL to submit the consumer-wise details of actual refund made by UPCL to the steel units and Railways during FY 2007-08 and FY 2008-09, alongwith the details of interest paid to the Commission within 3 months from the date of this Order.

Petitioner's Submissions

As regards the refund to be made to steel units and railways, the Petitioner submitted that in accordance with the tariff determined by the Commission vide its Tariff Order dated March 18, 2008, it has refunded an amount to Rs. 1,34,91,600.00 to Indian Railways. Further, it has refunded an amount of Rs. 18,42,60,764 on account of principal amount and Rs. 3,63,11,727 on account of interest to Steel Units

9.1.17 *Sales Forecast for 2009-10 - Domestic*

The Commission expresses its displeasure on slow progress in releasing new connections under RGGVY Scheme and directs UPCL to accelerate this process and meets its own targets.

Petitioner's Submissions

As regards the direction to achieve targets of new connection, UPCL submitted as under:

- Target of release of new connections under RGGVY – 2,24,531
- Connections released for the period upto 31-03-2009 – 1,76,223
- Balance connections targeted to be released during FY 2009-10 – 48,308
- Connections released upto November, 2009 – 23,105
- Balance connections to be released upto March, 2010 - 25,203

Accordingly, the Petitioner submitted that out of total target of 2,24,531, 1,99,328, BPL connections have already been released by UPCL under RGGVY Scheme and the balance 25,203 number of connections shall be released by March 2010. However, the Petitioner submitted that it is facing the following problem in releasing connection under RGGVY Scheme:

(i) Some BPL families hesitate in taking electricity connections.

(ii) Many consumers are not traceable as per certified list of BPL families provided by concerned District Magistrates.

The Commission has noted the steps taken by the Petitioner in this regard and directs the Petitioner to submit the updated status report within one month from the date of this Order.

9.1.18 *Power Purchase through UI*

The Commission, therefore, directs UPCL to "*restrict the net drawal from the grid within its drawal schedules whenever the system frequency is below 49.2 Hz*".

Petitioner's Submissions

The Petitioner submitted that in accordance with the direction of the Commission, Managing Director, PTCUL and DGM (SLDC) have been requested by UPCL to restrict the net drawal from the grid within its drawal schedules whenever the system frequency is below 49.2 Hz.

9.1.19 *Estimation of Cost of Supply as per Policy Directions*

The Petitioner is, however, directed to work out actual voltage-wise, category-wise losses and submit the same to the Commission within a period of 6 months.

Petitioner's Submissions

The Petitioner submitted that it is in the process to evolve the mechanism to work out actual voltage-wise and category-wise losses. On evolving the same, losses shall be computed in accordance with the direction of the Commission.

The Commission has noticed that the Petitioner has not made any significant progress on this important direction, while a specific time frame had been given in the direction. The Commission directs that the Petitioner to submit the action plan to work out actual voltage-wise, category-wise losses within one month from the date of this Order. The Commission further directs the Petitioner to complete this exercise and submit the actual voltage-wise, category-wise losses alongwith next ARR Petition.

9.1.20 *Fixed Charges, Minimum Charges and Minimum Consumption Guarantee*

The licensee is directed to check the reasons, including by testing of meters, for extremely low load factors for high value consumers in these categories.

Petitioner's Submissions

The Petitioner submitted that it has taken steps for testing of meters of consumers whose monthly load factor is less than 10% in domestic, non-domestic and industrial categories and submitted that it is targeting to complete the exercise within time frame as directed by the Commission.

The Petitioner is hereby once again directed to intimate the Commission about the status of progress in the matter of checking reasons including by testing of meters for extremely low load factors for high value customers within three month of issue of this order.

9.1.21 *Time of Day (ToD) Tariff*

The Petitioner is hereby directed to appropriately set the meters for recording the energy consumption during morning peak hours and evening peak hours separately within 3 months from the date of this Order.

Petitioner's Submissions

The Petitioner submitted that in accordance with the direction of the Commission, it has initiated action for setting the meters for recording the energy consumption during morning peak hours and evening peak hours separately and the said work is expected to be completed by June, 2010.

The Commission has noted the steps taken by the Petitioner in this regard and also accepted the request of the Petitioner to extend the time limit till June 2010. Accordingly, the Petitioner should submit the status report to the Commission in the matter in by end of June 2010.

9.2 Fresh Directives

9.2.1 *Misuse of Electricity by Staff*

The Commission directs the Petitioner to act appropriately as per the direction givens by the Commission in the last Tariff Order. (Ref. Section 3.35.4)

9.2.2 *Functions of UPCL*

The Commission directs the Petitioner to submit detailed short and long-term plans for future energy requirements and submit the same within 6 months from the date of this Order.

The Commission directs the Petitioner to take appropriate action for implementing the suggestions of the respondents to improve the quality of power and services to its consumers.

The Commission hereby directs the Licensee that when the consumer approaches for bill correction whether in its office or camps, his bill should be got rectified the same day else he should be informed in writing on the same day, the time within which rectification shall be done or the reasons for not doing it. Necessary instructions authorising appropriate levels for such corrections on the spot should be immediately issued by the Petitioner. Actual meter reading as given by the consumer may be relied upon for this purpose which may be suitably incorporated in next bill based on proper meter reading by the Licensee.

The Commission has noted the steps taken by the Petitioner for computerisation of the bills and also accepted the request of the Petitioner to allow it to extend the time limit. Hence, the Commission directs the Petitioner to raise only computerized bills for all the categories of consumer's w.e.f. May 01, 2010, thereafter, no bill shall be raised manually. Also, the Petitioner should submit the status report in this regard within one month from the date of this Order.

Further, the Commission agrees that one-or two sub-stations should be made as profit centres on pilot program basis to set example for improvement in power supply and directs the Petitioner to submit a detailed plan in this regard for approval of the Commission within a period of three months.

(Ref. Section 3.35.11)

9.2.3 *Capitalisation of New Assets*

The Commission, however, once again directs the Petitioner to obtain the Electrical Inspector's certificate for all the HT schemes capitalised till FY 2009-10 and submit a copy of the same to the Commission alongwith next ARR & Tariff Petition.

(Ref. Section 4. 5)

9.2.4 *Meter Reading - LT Billing Database*

UPCL is hereby directed to make a time bound action plan, division-wise to achieve its targets already set as above within 6 months from the date of issuance of this Order. UPCL is also directed to submit its action taken report and progress on the above by 10th of each month regularly clearly showing the number of cases and %age attained for each parameter during preceding month.

The Licensee is hereby directed to chalk out a time bound programme on the priority basis taking those divisions first where defective meters, low consumption and not read cases are high and submit the same within three months.

The Commission directs the Licensee to carry out the exercise of meter checking of the divisions indicated above and send the report to the Commission within 6 months.

(Ref. Section 5.2.1)

9.2.5 *Analysis of all Industries having load more than 1000 kVA and load factor less than 15%*

The Petitioner is directed to keep a close watch on them and take appropriate steps wherever required.

UPCL is directed to check the meters of such consumers physically and submit its report within 1 month from the date of this order.

(Ref. Section 5.2.2)

9.2.6 *Billing*

Petitioner is hereby directed to examine all such cases and send the compliance report within one month from the date of this Order.

Petitioner is again directed that no bill, under any circumstance, shall be raised manually w.e.f. 01.05.2010.

The Commission further directs the Petitioner to issue bills on meter reading basis for all the LT and HT consumers and no bill shall be issued provisionally for more than two consecutive billing cycles under any circumstances w.e.f. 01.05.2010.

(Ref. Section 5.4)

9.2.7 *Collection System*

The Petitioner is hereby directed to evolve some mechanism for counter-checking that bills have been delivered to the consumers and submit compliance report thereon within three months.

The Petitioner is hereby directed to monitor the recovery of outstanding dues regularly throughout the year and submit a regular report by 10th of each month, division-wise showing the collections against billed amount, number of defaulters against outstanding amount of more than Rs. 1 lakh.

(Ref. Section 5.6)

9.2.8 *Energy Audit/AT&C losses*

The Petitioner is, therefore, directed to provide DT meters at all the distribution transformers, as directed earlier within three months from the date of issuance of this Order and submit its first report within two months immediately after the completion of these three months indicating the current level of loss at each DT. The Commission also directs UPCL to identify six highly theft prone DTs in each division as "Divisional Pilot Project" and carry out its energy audit after completing indexing/tagging of the consumes and installing DT meters, within one month and submit its first report on current level of losses on these DTs within three months from the date of this Order.

The Petitioner is, therefore, again directed to identify those divisions where distribution losses are high and get a complete energy audit done in those divisions, distribution transformer-wise and submit thereupon a report within six months from the date of issue of this Order.

The Petitioner is directed to carry out MRI of both the sending as well as the consumer end meters and send its analysis alongwith the MRI report to the Commission within 3 months of this Order.

The Petitioner, is hereby directed to install check meters at sending end to all such consumers who have been given supply on 33 kV or 11 kV through a dedicated individual feeder and incorporate the reading of check meter in the monthly bills of such consumers to reflect the difference of readings between check meter and consumer meter as per format of bill given in the Table below, which should see whether the difference is more than 3%. Such cases need to be immediately investigated and Action Taken Report on such cases should be submitted to the Commission by 10th of every month.

The Petitioner is directed to submit a comprehensive report of all such connections where meters have been replaced during last one year with the reasons for the replacement alongwith their sealing reports and consumption for last one year latest by 15.07.2010.

(Ref. Section 5.7)

9.2.9 *Impact of Refund to Industries*

The Commission directs UPCL to submit the consumer-wise amount to be refunded within three months from the date of this Order.

(Ref. Section 6)

9.2.10 *Capitalisation of Assets*

The Commission, while not disallowing any capitalizations of past HT/EHT schemes capitalized upto the FY 2006-07, directs the Petitioner to submit all the pending Electrical Inspector's Clearance Certificates upto FY 2009-10 within 6 months of issuance of this Order.

(Ref. Section 7.4.2.)

9.2.11 *Government of Uttar Pradesh (UP) Loan*

The Commission, however, once again directs the Petitioner to approach the State Government for early finalization of the transfer scheme with all the necessary details/assistance in this regard. The Petitioner is also directed to submit an updated report on steps taken by it and the status of transfer scheme to the Commission with 6 months of issuance of this Order.

(Ref. Section 7.6.1.2.)

9.2.12 *Depreciation*

The Commission directs the Petitioner that during the next ARR and Tariff filing for FY 2011-12, UPCL should compute the depreciation based on the fixed asset register and the allowable depreciation rates as stipulated in the Regulations.

(Ref. Section 7.7)

9.2.13 *Provision for Bad & Doubtful Debts*

The Commission again directs the Petitioner to report the compliance within three months failing which no further provisioning would be allowed in the subsequent Tariff Orders until the Petitioner exhausts the existing available provisions with it in writing off the bad debts.

(Ref. Section 7.12)

9.2.14 *Estimation of Cost of Supply as per Policy Directions*

The Petitioner is, however, directed to work out actual voltage-wise, category-wise losses and submit the same to the Commission within a period of 6 months.

(Ref. Section 8.5.1)

9.2.15 *Computerisation of Records*

For easy accessibility to records and for faster analysis/monitoring of various performance parameters, it is important that the manually prepared registers are now kept in soft form by computerization of all such new registers including the following:

(i) Release of new connection

(ii) Billing ledgers

(iii) Commercial ledgers

(iv) Fixed assets registers

9.2.16 *ToD Meters for Non-domestic and LT Industrial Category*

The Commission directs the Petitioner to install the ToD Meters (capable of recording kVAh and maximum demand) for all Non-domestic and LT Industry consumers having load above 4 kW within a period of three months from the date of this Order.

9.2.17 *Demand Side Management Measures*

In the present power shortage scenario prevailing in the State, where the Commission, on the request of the Petitioner, had to approve severe scheduled power cuts throughout the State, the implementation of DSM programmes in true and earnest manner has become all the more essential. The implementations of DSM programmes do not involve heavy expenditure, but bring instant reduction in the demand of the system. However, setting up of power plants, for meeting the increased demand of the consumers, require not only costly capital investment but also have a long gestation period. Therefore, in the interest of the State, its people and country at large, it has now become imperative that Petitioner takes implementation of DSM programmes at the earliest. With this objective, the Commission in its last Tariff Order devoted a complete Chapter on Demand Side Management highlighting some of the common DSM programmes which the Petitioner could undertake and also suggested means as to how the Petitioner can go about in arranging the finances/subsidies required for implementing these programmes. The Commission had also directed the Petitioner to set aside and utilize the surplus of Rs. 3.00 Crore left unadjusted in the last Tariff Order for implementing the directions of the Commission on DSM measures.

In order to facilitate the implementation of the DSM programmes, the Petitioner was directed:

1. To immediately form DSM cells.

2. To prepare DSM plans as directed by the Commission.

3. To give a schedule for segregation of feeders having agriculture pump load and domestic/other load.

4. To formulate a project/scheme for implementing DSM measures as suggested by the Commission.

Further, the Petitioner was asked to submit DPRs of at least three of the DSM measures suggested by the Commission for its approval within a period of 45 days from the date of last Order so as to implement the same latest by 31.03.2010.

It is a matter of great concern that Petitioner has not complied with any of the directives issued in the matter and has overlooked such an important aspect which cannot only improve its financial health but can also save the consumers of the State from the ordeal of heavy power cuts to a great extent.

The Petitioner is hereby once again directed to comply with all the directions issued in the last Tariff Order in this regard and submit compliance report within three month of the issuance of the Order. Non-compliance of this direction on the presently burning issue of meeting power shortages may invite punitive action against the licensee and its management.

Petitioner's Submissions

The Petitioner submitted that in accordance with the direction of the Commission, it has initiated the steps to prepare the action plan to comply with this direction and submitted that on preparation of the action plan, it would submit the same to the Commission.

The Commission has noticed that the Petitioners is complying with the direction in a very sluggish manner while time frame had been given in the direction. Hence, the Petitioner is hereby directed to comply with the above direction and should submit the action plan within one month from the date of this Order.

While the Commission is not taking any view on compliance of each directive, the Commission feels that the status reported by the Petitioner shows marginal movement towards the desired objective of these directives. The Commission is of the view that still a lot needs to be done with due concentrated efforts. The Commission is conscious of the fact that improvement in each area of Petitioner operation would be necessary. However, the Petitioner should take rigrous steps to drive towards improvement without fail. The Petitioner shall prioritise these works and set realistic targets and monitor the same on continuous basis. The Commission has not been able to carry out detailed analysis of compliance of all the directions in this Order, the Commission would take up this exercise separately and, if necessary, use its powers u/s 142 of the Electricity Act, 2003 for ensuring compliance.

9.3 Conclusion

Having considered the submissions made by the Petitioner, the responses of various stakeholders and the relevant provisions of the Electricity Act, 2003 and Regulations of the Commission, the Commission hereby approves that:

(i) Uttarakhand Power Corporation Ltd., the distribution and retail supply licensee in the State will be entitled to charge the tariffs from consumers in its licensed area of supply as given in the Rate Schedule annexed hereto as **Annexure 1**. These Tariffs will be effective from 01.04.2010.

(ii) Uttarakhand Power Corporation Ltd., the distribution and retail supply licensee in the State will realize from consumers of Electricity in the State, miscellaneous charges as listed out in **Annexure 2** of this Order and shall not recover any other charge, fee, deposit etc., unless approved by the Commission.

(iii) The above tariffs shall continue to be applicable till revised by the Commission.

(iv) The Petitioner shall forward a report on compliance of the directions given in this Order within one month of time stipulated for compliance.

(Anand Kumar) **Member**	**(V.J. Talwar)** **Chairman**

10. Annexures

10.1 Annexure 1: Rate Schedule Effective from 01.04.2010

A. General Conditions of Supply

1. Character of Service

i) Alternating Current 50 Hz., single phase, 230 Volts (with permissible variations) up to a load of 4 kW.

ii) Alternating Current 50 Hz, three phase, 4 wire, 400 Volts or above (with permissible variations) for loads above 4 kW depending upon the availability of voltage of supply.

2. Conditions for New Connections

i) Supply to new connections of more than 75 kW (88 kVA) and up to 2550 kW (3000 kVA) shall be released at 11 kV or above, loads above 2550 kW (3000 kVA) and upto 8500 kW (10000 kVA) shall be released at 33 kV or above and loads above 8500 kW (10000 kVA) shall be released at 132 kV or above.

ii) All new connections shall be given with meter conforming to CEA Regulations on Installation and Operation of Meters.

iii) All new 3 phase connections above 4 kW shall be released with Electronic Tri-vector Meter having Maximum Demand Indicator.

iv) Consumers having motive loads of more than 5 BHP shall install Shunt Capacitor of appropriate rating and conforming to BIS specification.

v) All new connections at HT/EHT should be released only with 3 phase 4 wire meters.

3. Point of Supply

Energy will be supplied to a consumer at a single point.

4. Billing in Defective Meter (ADF/IDF), Meter Not Read/Not Accessible (NA/NR) and Defective Reading (RDF) Cases

In NA/NR cases, the energy consumption shall be assessed and billed as per average consumption of last one year average consumption (as per Regulations 3.1.2 (3) of the Electricity Supply Code) which shall be subject to adjustment when actual reading is taken. Such provisional billing shall not continue for more than two billing cycles at a stretch. Thereafter, the licensee shall not be entitled to raise any bill on provisional basis. In case of defective meter (ADF/IDF) and defective reading (RDF) cases, the consumers shall be billed on the basis of the average consumption of the past three billing cycles immediately preceding the date of the meter being found or being reported defective (as per Regulations 3.2(1) of the Electricity Supply Code). These charges shall be leviable for a maximum period of three months only during which time the licensee is expected to have replaced the defective meter. Thereafter, the licensee shall not be entitled to raise any bill without correct meters.

The checking and replacement of defective meter cases namely IDF and ADF and defective reading cases namely RDF shall be done by the licensee in accordance with Regulation 3.1.4 of the Electricity Supply Code.

5. Billing in New Connection or conversion from unmetered to metered Cases

For cases such as new connections or conversion of unmetered to metered connection, where past reading is not available, the provisional billing shall be done at the normative levels of consumption as given below, which shall be subject to adjustment when actual reading is taken.

Category	Normative Consumption
Domestic (Urban)	100 kWh/kW/month
Domestic (Rural)	50 kWh/kW/month
Non-domestic (Urban)	150 kWh/kW/month
Non-domestic (Rural)	75 kWh/kW/month
Private Tube Wells	70 kWh/BHP/month
Industry	
LT Industry	150 kWh/kW/month
HT Industry	150 kVAh /kVA /month

For this purpose, the contracted load shall be rounded off to next whole number. Billing on this basis shall continue only for a maximum period of 2 billing cycles, during which the licensee is supposed to have taken actual reading. Thereafter, the licensee shall not be entitled to raise any bill without correct meter reading. In all other categories 1st bill shall be raised only on actual reading.

6. Delayed Payment Surcharge (DPS) (for all categories except PTW)

In the event of electricity bill rendered by licensee, not being paid in full within 15 days' grace period after due date, a surcharge of 1.25% on the principal amount of bill which has not been paid shall be levied from the original due date for each successive month or part thereof until the payment is made in full without prejudice to the right of the licensee to disconnect the supply in accordance with section 56 of the Electricity Act, 2003. The licensee shall clearly indicate in the bill itself the total amount, including DPS, payable for different dates after the due date, after allowing for the grace period of 15 days, taking month as the unit as shown exemplified below:

EXAMPLE:

Amount payable by Due date	Rs. 100/-	
Due Date	1st April 2010	
	Amount Payable	
On or Before 16th April 2010 **Rs. 100/-**	**After** 16th April 2010 **Rs. 101.25**	**After** 1st May 2010 **Rs. 102.50**

7. Solar Water Heater rebate

If consumer installs and uses solar water heating system, rebate of Rs. 75/- p.m. for each 100 litre capacity of the system or actual bill for that month whichever is lower shall be given subject to the condition that consumer gives an affidavit to the licensee to the effect that he has installed such system, which the licensee shall be free to verify from time to time. If any such claim is found to be false, in addition to punitive legal action that may be taken against such consumer, the licensee will recover the total rebate allowed to the consumer with 100% penalty and debar him from availing such rebate for the next 12 months.

8. Rebate/surcharge for availing supply at voltage higher/lower than base voltage

(i) For consumers having contracted load upto 75 kW/88 kVA - If the supply is given at voltage above 400 Volts and upto 11 kV, a rebate of 5% would be admissible on the Rate of Charge. Similarly, supply above 11 kV shall be eligible for rebate of 7.5% on the Rate of Charge.

(ii) For consumers having contracted load above 75 kW/88 kVA – In case the supply is given at 400 Volts, the consumer shall be required to pay an extra charge of 10% on the bill amount calculated at the Rate of Charge.

(iii) For consumers having contracted load above 75kW/88 kVA – In case of supply at 33 kV the consumer shall receive a rebate of 1.5% on the Rate of charge.

(iv) For consumers having contracted load above 75 kW/88 kVA and receiving supply at 66 kV or 132 kV, the consumer shall receive a rebate of 2.5% on the Rate of charge.

(v) For consumers having contracted load above 75 kW/88 kVA and receiving supply at 220 kV, the consumer shall receive a rebate of 5% on the Rate of charge.

(vi) All voltages mentioned above are nominal rated voltages.

9. Low Power Factor Surcharge (not applicable to Domestic, PTW categories and other categories having kVAh based Tariff)

(i) In respect of the consumers without Electronic Tri Vector Meters, who have not installed shunt capacitors of appropriate ratings and specifications, a surcharge of 5% on the current energy charges shall be levied.

(ii) For consumers with Electronic Tri Vector Meters, a surcharge of 5% on current energy charges will be levied for having power factor between 0.80 to 0.85 & a surcharge of 10% of current energy charges will be levied for having power factor below 0.80.

10. Excess Load/Demand Penalty (Not applicable to Domestic, Snow bound and PTW categories)

In case of consumers where electronic meters with MDI have been installed, if the maximum demand recorded in any month exceeds the contracted load/demand, such excess load/demand shall be levied twice the normal rate of fixed/demand charge as applicable. Such excess load penalty shall be levied only for the month in which maximum demands exceeds contracted load.

Example:

(i) For consumers where fixed charges on the basis of contracted load/demand have been specified:

Contracted load 30 kW, Maximum Demand 43 kW,

Excess Demand 43-30=13 kW, Rate of Fixed Charges= Rs. 20/kW

Fixed Charges for contracted load = 30 x 20=Rs. 600

Fixed Charges for excess load = 13x (2 x20) =Rs. 520

Total Fixed Charges = 600+520= Rs. 1120

(ii) For industrial consumers billed on billable demand:

Contracted demand 2500 kVA, Maximum Demand 2800 kVA, Billable Demand =2800 kVA

Excess Demand =2800-2500=300 kVA, Rate of Demand Charges= Rs. 220/kVA

Demand Charges for contracted demand =2500 x 220=Rs. 550000

Demand Charges for excess demand = 300x (2 x 220) =Rs. 132000

Total Demand Charges = 550000+132000= Rs. 682000

11. Minimum Consumption Guarantee (MCG)

The minimum consumption guarantee (MCG) charges shall be applicable to all non-domestic consumers having load above 25 kW and all industrial consumers for their consumption in kWh (where kWh tariff is applicable) and kVAh (where kVAh tariff is applicable). The Commission has specified the minimum consumption guarantee on monthly basis as well as on annual basis. The minimum consumption guarantee charges will be levied on monthly basis when monthly consumption is less than the units specified for monthly minimum consumption guarantee (MCG). In case Cumulative actual consumption from the beginning of financial year exceeds the units specified for annual minimum consumption guarantee (MCG) no further billing of monthly MCG shall be done. In such cases differential paid in excess of actual billing shall be adjusted in the bill for month of March 2011.

Example:

Illustrative case for Contracted load – 10 kW/kVA

Month	Actual consumption (kWh/kVAh)	Cumulative Actual Consumption (kWh/kVAh)	Billed Consumption (kWh/kVAh)	Cumulative Billed Consumption (kWh/kVAh)
Apr-09	700	700	750	750
May-09	610	1310	750	1500
Jun-09	540	1850	750	2250
Jul-09	1210	3060	1210	3460
Aug-09	690	3750	750	4210
Sep-09	1535	5285	1535	5745
Oct-09	2560	7845	2560	8305
Nov-09	910	8755	910	9215
Dec-09	570	9325	570	9785
Jan-10	340	9665	340	10125
Feb-10	865	10530	865	10990
Mar-10	210	10740	0	10990
Apr-10	710	710	460	

12. Single Point Bulk Supply for Domestic, Non Domestic and Mixed Load Categories

(i) Domestic/Non-domestic- Buildings/Malls/Cooperative Group Housing Societies/ Colonies having total load above 50 kW can avail connection at single point with single point metering for further distribution. However, this shall not restrict the individual owner/occupier from applying for individual connection.

(ii) The person who has taken the single point supply shall be responsible for all payments of electricity charges to the licensee and collection from the end consumer as per applicable tariff for them.

(iii) The person who has taken the single point supply shall also be deemed to be an agent of Licensee to undertake distribution of electricity for the premises for which single point supply is given under seventh proviso to section 14 of the Electricity Act, 2003 and distribution licensee shall be responsible for compliance of all provisions of the Act and Rules & Regulations thereunder within such area.

13. Rounding off

(i) The contracted load/demand shall be expressed in whole number only and fractional load/demand shall be rounded up to next whole number.

Example:

Contracted/Sanctioned Load of 0.15 kW shall be reckoned as 1 kW for tariff purposes. Similarly, contracted/sanctioned load of 15.25 kW/kVA shall be taken as 16 kW/kVA.

(ii) All bills will be rounded off to the nearest rupee.

14. Other Charges

Apart from the charges provided in the Rate of Charge and those included in the Schedule of Miscellaneous Charges, no other charge shall be charged from the consumer unless approved by the Commission.

B. Tariffs

RTS-1: Domestic

1. Applicability

This schedule shall apply to:

Residential premises for light, fan, power and other domestic purposes including single point bulk supply above 50 kW for residential colonies, residential multi-storied buildings where energy is exclusively used for such purpose.

(This rate schedule shall also be applicable to consumers having contracted load upto 2 kW and consumption upto 200 kWh/month using some portion of the premises mentioned above for business/other purposes. However, if contracted load for such premises is above 2 kW or consumption is more than 200 kWh/month, then the entire energy consumed shall be charged under the appropriate Rate Schedule unless such load is segregated and separately metered.)

2. Rate of Charge

(A) Un-Metered Supply (Domestic) in Rural Areas

Description	Fixed Charges
1) Hilly Areas*	Rs. 120/connection/month
2) Other Areas	Rs. 250/connection/month

** Hill areas for this purpose shall be district Pithoragarh, Almora, Bageshwar, Chamoli, Uttarkashi, Tehri, whole tract of Rudraprayag. Apart from above, Chakarata and Mussoorie tehsil of Dehradun district, Nainital tehsil of Nainital district, part of Ram Nagar tehsil after leaving remaining regularized region of Ram Nagar, part of Tanakpur municipality limit after leaving remaining part of Champawat district and part of Kotdwar municipal limit after leaving remaining part of Pauri district are also included.*

(B) Metered Supply

Description	Fixed Charges	Energy Charges
1) Domestic Metered		
1.1) Life line consumers		
Below Poverty Line and Kutir Jyoti having load upto 1 kW and consumption upto 30 units per month	Nil	Rs. 1.50/kWh

1.2) Other domestic consumers	Upto 4 kW - Rs. 20/connection/month More than 4 kW – Rs. 40/connection/month	• For Consumption Upto 100 units/month – Rs 2.20/kWh • For Consumption between 101-200 units/month – Rs 2.40/kWh • For Consumption above 200 units/month – Rs 2.60/kWh
2) Single Point Bulk Supply	Rs. 20/kW/month	Rs. 2.35/kWh

RTS-1A: Snowbound

1. Applicability

(i) Domestic and non-domestic consumers in snowbound areas.

(ii) This Schedule applies to areas notified as snowbound/snowline areas by the concerned District Magistrate.

2. Rate of Charge Supply

Description	Fixed Charges	Energy charges
1) Domestic	Nil	Rs. 1.50/kWh
2) Non-domestic upto 1 kW	Nil	
3) Non-domestic more than 1 & upto 4 kW	Nil	Rs. 2.00/kWh
4) Non-Domestic more than 4 kW	Nil	Rs. 3.00/kWh

3. All other conditions of this Schedule shall be same as those in RTS-1.

1. Applicability

1.1 (i) Government/Municipal Hospitals
(ii) Government/Government Aided Educational Institutions
(iii) Charitable Institutions registered under the Income Tax Act, 1961 and whose income is exempted from tax under this Act

1.2 Other Non-Domestic/Commercial Users including single point bulk supply above 50 kW for shopping complexes/multiplex/malls.

2. Rate of Charge

Metered Category

S. No.	Description	Fixed Charges	Energy charges	MCG (kVAh/kW of contracted load)*
1.1	(i) Government/Municipal Hospitals (ii) Government/Government Aided Educational Institutions (iii) Charitable Institutions registered under the Income Tax Act, 1961 and whose income is exempted from tax under this Act			
	(a) Upto 25 kW	Rs. 20/kW/Month	Rs. 3.30/kWh	
	(b) Above 25 kW	Rs. 20/kW/Month	Rs. 3.00/kVAh	75 kVAh/kW/ month & 900 kVAh/kW/ annum
1.2.	Other Non Domestic/Commercial Users			
	(a) Upto 25 kW	Rs. 20/kW/Month	Rs. 4.00 /kWh	
	(b) Above 25 kW	Rs. 20/kW/Month	Rs. 4.00/kVAh	75 kVAh/kW/ month & 900 kVAh/kW/ annum
1.3	Single Point Bulk Supply	Rs. 20/kW/Month	Rs 3.80/kVAh	75 kVAh/kW/ month & 900 kVAh/kW/ annum

** For consumers having contracted load in kW, the contracted load for MCG purposes shall be calculated by considering a power factor of 0.85.*

The Minimum Consumption Guarantee Charge shall be in addition to fixed/demand charge and shall be levied if Consumption during a month is less than MCG and will be subject to adjustment on annual basis

(i) ToD Meters shall be read by Meter Reading Instrument (MRI) only with complete dump with phasor diagram, Tamper Reports, full load survey reports etc. shall be downloaded for the purpose of complete analysis.

(ii) All consumers above 25 kW shall necessarily have ToD Meters.

(iii) No meter shall be read at zero load or very low load. Licensee shall carry appropriate external load and shall apply the same wherever necessary to take MRI at load

(iv) Copy of MRI Summary Report shall be provided alongwith the Bill. Full MRI Report including load survey report shall be provided on demand and on payment of Rs. 15/ Bill.

1. Applicability

This schedule shall apply to public lamps including street lighting system, traffic control signals, lighting of public parks, etc. The street lighting of Harijan Bastis and villages are also covered by this Rate Schedule.

2. Rate of Charge

Category	Fixed Charges	Energy Charge
Metered	Rs. 15/kW/month	Rs. 3.30/kWh
Unmetered Rural	*Rs. 115/100 W lamp or part thereof / month	Nil

** For every 50 W or part thereof increase over and above 100W lamp additional Rs. 60/month shall be charged*

3. Maintenance Charge

In addition to the "Rate of Charge" mentioned above, a sum of Rs. 10/- per light point per month shall be charged for operation and maintenance of street lights covering only labour charges where all material required will be supplied by the local bodies. However, the local bodies will have the option to operate and maintain the public lamps themselves and in such case no maintenance charge will be charged.

4. Provisions of Street Light Systems

In case, the maintenance charge, as mentioned above, is being charged then the labour involved in the subsequent replacement or renewals of lamps shall be provided by the licensee but all the material shall be provided by the local bodies. If licensee provides material at the request of local body, cost of the same shall be chargeable from the local body.

The cost involved in extension of street light mains (including cost of sub-stations if any) in areas where distribution mains of the licensee have not been laid, will be paid for by the local bodies.

RTS-4: Private Tube Wells/ Pumping Sets

1. Applicability

This schedule shall apply to all power consumers getting supply for private tube-wells / pumping sets for irrigation purposes and for incidental agricultural processes confined to chaff cutter, thrasher, cane crusher and rice huller only. However, the tariff applicable for RTS-4 shall only be applicable if such incidental agricultural processes are being carried out for agricultural produce of the connection sanctioned for irrigation purposes.

2. Rate of charge

Category	Fixed Charges Rs./BHP/Month	Energy Charges Rs./kWh
Unmetered	*150	Nil
Metered	Nil	0.90

**Plus Rs. 20/connection/month for lighting load of not more than two lamps.*

3. Payments of bills and Surcharge for Late Payment

The bill shall be raised for this category twice a year only i.e. by end of December (for period June to November) and end of June (for period December to May). The bill raised in December may be paid by the consumer either in lump-sum or in parts (not more than four times) till 30th April next year for which no DPS shall be levied. Similarly, bill raised in June may be paid by 31st October without any DPS. In case consumer fails to make payment within the specified dates, a surcharge @ 1.25% per month for the period (months or part thereof) shall be payable on the outstanding amount.

1. Applicability

This schedule shall apply to:

(i) Supply of power for State Tubewells, World Bank Tubewells, Pumped Canals and Lift irrigation schemes, Laghu Dal Nahar etc., having a load upto 75 kW (100 BHP).

(ii) Irrigation system owned and operated by any Government department.

2. Rate of charge

Description	Fixed Charges	Energy Charges
1. Upto 75 kW	Rs. 15/kW/month	Rs. 3.30/kWh
2. More than 75 kW	Rs. 15/kVA/month	Rs. 3.00/kVAh

RTS-6: Public Water Works

1. Applicability

This Schedule shall apply to Public Water Works, Sewage Treatment Plants and Sewage Pumping Stations functioning under Jal Sansthan, Jal Nigam or other local bodies and Plastic Recycling Plants.

2. Rate of charge

Fixed Charges	Energy Charges
Rs. 15/kW/month	Rs. 3.00/kVAh

1. Applicability

This schedule shall apply to:

(i) All consumers of electrical energy for industrial and /or processing or agro- industrial purposes, power loom as well as to Arc/Induction Furnaces, Rolling/Re-rolling Mills, Mini Steel Plants and to other power consumers not covered under any other Rate Schedule

(ii) The Vegetable, Fruits, Floriculture & Mushroom integrated units farming, Processing, storing and Packaging shall also be covered under this Rate schedule.

2. Specific Conditions of Supply

(i) All connections shall be connected with MCB (Miniature Circuit Breaker) or Circuit Breaker / Switch Gear of appropriate rating and BIS Specification.

(ii) The supply to Induction and Arc Furnaces shall be made available only after ensuring that the loads sanctioned are corresponding to the load requirements of tonnage of furnaces. The minimum load of 1 Tonne furnace shall in no case be less than 600 kVA and all loads will be determined on this basis. No supply will be given for loads below this norm.

(iii) Supply to Steel Units shall be made available at a voltage of 33 kV or above through a dedicated individual feeder only with check meter at sub-station end. Difference of more than 3%, between readings of check meter and consumer meter(s), shall be immediately investigated by the licensee and corrective action shall be taken.

(iv) Supply to all new connections with load above 1000 kVA should be released on independent feeders only with provisions as at (iii) above.

<table>
<tr><th>Description</th><th colspan="2">Energy Charge</th><th>Fixed /Demand Charge per month</th><th>Minimum Consumption Guarantee (MCG) **</th></tr>
<tr><td>1. LT Industry having contracted load upto 75kW (100 BHP)</td><td colspan="2"></td><td></td><td></td></tr>
<tr><td>1.1 Contracted load up to 25 kW</td><td colspan="2">Rs. 3.25/kWh</td><td rowspan="2">Rs. 80/ kW of contracted load</td><td>$75 kWh/kW of contracted load / month
900 kWh/kW of contracted load / annum</td></tr>
<tr><td>1.2 Contracted load more than 25 kW</td><td colspan="2">Rs. 2.95/kVAh</td><td>75 kVAh/kW of contracted load / month
900 kVAh/kW of contracted load / annum</td></tr>
<tr><td>2. HT Industry having contracted load above 88kVA/75 kW (100 BHP)</td><td>Load Factor#</td><td>Rs./ kVAh</td><td></td><td></td></tr>
<tr><td rowspan="3">2.1 Contracted Load up to 1000 kVA</td><td>Upto 33%</td><td>2.60</td><td rowspan="3">Rs. 160/kVA of the billable demand*</td><td rowspan="6">110 kVAh/kVA of contracted load / month
1320 kVAh/kVA of contracted load / annum</td></tr>
<tr><td>Above 33% and upto 50%</td><td>2.85</td></tr>
<tr><td>Above 50%</td><td>3.10</td></tr>
<tr><td rowspan="3">2.2 Contracted Load More than 1000 kVA</td><td>Upto 33%</td><td>2.60</td><td rowspan="3">Rs. 220/kVA of the billable demand*</td></tr>
<tr><td>Above 33% and upto 50%</td><td>2.85</td></tr>
<tr><td>Above 50%</td><td>3.10</td></tr>
</table>

$ 40 kWh/kW/month and 480 kWh/kW/annum for Atta Chakkis.

** Billable demand shall be the actual maximum demand or 80 % of the contracted load whichever is higher.*

*** The Minimum Consumption Guarantee Charge shall be in addition to fixed/demand charge and shall be levied if Consumption during a month is less than MCG and will be subject to adjustment on annual basis*

#For tariff purposes Load Factor (%) would be deemed to be =

$$\frac{\text{Consumption during the billing period}}{\text{Maximum Demand or Contracted Demand whichever is less x No. of hours in the billing period}} \times 100$$

3. Time of Day Tariff

(i) The rates of energy charge given above for LT industry with load more than 25 kW and HT industry shall be subject to ToD rebate/surcharge.

(ii) ToD Meters shall be read by Meter Reading Instrument (MRI) only with complete dump with phasor diagram, Tamper Reports, full load survey reports etc. shall be downloaded for the purpose of complete analysis and bills shall be raised as per ToD rate of charge.

(iii) No meter shall be read at zero load or very low load. Licensee shall carry appropriate external load and shall apply the same wherever necessary to take MRI at load

(iv) Copy of MRI Summary Report shall be provided along with the Bill. Full MRI Report including load survey report shall be provided on demand and on payment of Rs. 15/ Bill

(v) ToD Load shall be as under:

Season/Time of day	Morning Peak hours	Normal hours	Evening Peak hours	Off-peak Hours
Winters 01.10 to 31.03	0600-0930 hrs	0930-1730 hrs	1730-2200 hrs	2200-0600 hrs
Summers 01.04 to 30.09	--	0700-1800 hrs	1800-2300 hrs	2300-0700 hrs

The, ToD Rate of Energy Charges shall be as under:

For LT Industry

Rate of Charge during		
Normal Hours	**Peak Hours**	**Off-peak Hours**
Rs. 2.95/kVAh	Rs. 4.42/kVAh	Rs. 2.65/kVAh

For HT Industry

Load Factor*	Rate Charge during		
	Normal Hours	**Peak Hours**	**Off-peak Hours**
Less than 33 %	Rs. 2.60/kVAh	Rs. 4.65/kVAh	Rs. 2.34/kVAh
Above 33% and upto 50 %	Rs. 2.85/kVAh	Rs. 4.65/kVAh	Rs. 2.57/kVAh
Above 50%	Rs. 3.10/kVAh	Rs. 4.65/kVAh	Rs. 2.79/kVAh

** Load Factor shall be as defined in Clause 3 above*

4. Seasonal Industries

Where a consumer having load in excess of 18 kW (25 BHP) and ToD meter and avails supply of energy for declared Seasonal industries during certain seasons or limited period in the year, and his plant is regularly closed down during certain months of the financial year, he may be levied for the months during which the plant is shut down (which period shall be referred to as off-season period) as follows.

(i) The tariff for 'Season' period shall be same as "Rate of Charge" as given in this schedule.

(ii) Where actual demand in 'Off Season' Period is not more than 30% of contracted load, the energy charges for "Off-Season" period shall be same as energy charges for "Season" period given in Rate of Schedule above. However, the contracted demand in the "Off Season" period shall be reduced to 30%.

(iii) During 'Off-season' period, the maximum allowable demand will be 30% of the contracted demand and the consumers whose actual demand exceeds 30% of the contracted demand in any month of the 'Off Season' will be denied the above benefit of reduced contracted demand during that season. In addition, a surcharge at the rate of 10% of the demand charge shall be payable for the entire 'Off Season' period.

Terms and Conditions for Seasonal Industries

(i) The period of operation should not be more than 9 months in a financial year.

(ii) Where period of operation is more than 4 months in a financial year, such industry should operate for at least consecutive 4 months.

(iii) The seasonal period once notified cannot be reduced during the year. The off-season tariff is not applicable to composite units having seasonal and other categories of loads.

(iv) Industries in addition to sugar, ice, and rice mill shall be notified by Licensee only after prior approval of the Commission.

5. Factory Lighting

The electrical energy supplied under this schedule shall also be utilised in the factory premises for lights, fans, coolers, etc. which shall mean and include all energy consumed for factory lighting in the offices, the main factory building, stores, time keeper's office, canteen, staff club, library, creche, dispensary, staff welfare centres, compound lighting, etc.

6. Continuous and Non-continuous supply

(i) Consumers who have already opted for continuous supply shall be exempted from load shedding during scheduled/unscheduled power cuts and during restricted hours of the period of restriction in usage, till 30th April 2010, except load shedding required due to emergency breakdown/shutdown. Such consumers shall pay 10% extra energy charges till April 30, 2010 at revised Energy Charge w.e.f. 1st April 2010. Demand charge and other charges remain same as per rate of charge given above.

(ii) From May 1, 2010, only Continuous Process Industry consumers operating 24 hours a day for 7 days of a week without any weekly off connected on either independent feeders or industrial feeder can only opt for continuous supply. For industrial feeder, all connected industries will have to opt for continuous supply and in case any one consumer on industrial feeder does not wish to opt for continuous supply, all the consumers on such feeder will not be able to avail continuous supply. Such Continuous Process Industry consumers who opt for continuous supply shall be exempted from load shedding during scheduled/unscheduled power cuts and during restricted hours of the period of restriction in usage approved by the Commission from time to time, except load shedding required due to emergency breakdown/shutdown. Such consumers shall pay 15% extra energy charges with effect from May 1, 2010 or from the date of connection whichever is later till 31st March 2011 irrespective of actual period of continuous supply option. Demand charge and other charges remain same as per rate of charge given above. The eligible consumers can revise/give their options and enter into agreement for continuous supply with the Licensee by 26th April 2010.

(iii) The Licensee should show the energy charges and continuous supply surcharge thereon separately in the bills.

RTS 8: Mixed Load

1. Applicability

This schedule applies to single point bulk supply connection of more than 50 kW where the supply is used predominantly for domestic purposes (with more than 60% domestic load) and also for other non-domestic purposes. This schedule also applies to supply to MES, a deemed licesee.

2. Rate of Charge

The following rates shall apply to consumers of this category

Fixed Charges	Energy Charges
Rs. 20/kW/month	Rs. 3.10/kWh

3. Other conditions

Apart from the above, other conditions of tariff shall be same as those for RTS-1 consumers. However, excess load penalty shall be applicable as per clause 10 of General Conditions of Supply.

1. Applicability

This schedule applies to Railways utilizing power for traction purposes.

2. Rate of Charge

The following rates of energy and demand charge shall apply to this category:

Demand Charges	Energy Charges
Rs./kVA/month	Rs./ kVAh
160/-	Rs. 3.10

3. Other conditions

Apart from the above, other conditions of tariff shall be same as those for General HT Industries under RTS-7 consumers except applicability of ToD tariff and surcharge for continuous supply.

RTS-10: Temporary Supply

(A) Temporary Supply for Illumination & Public Address Needs

1. Applicability

This schedule shall apply to temporary supply of light & fan up to 10 kW, public address system and illumination loads during functions, ceremonies and festivities, temporary shops not exceeding three months.

2. Rate of Charge

Description	Fixed Charges
(1) For Illumination / public address/ ceremonies for load up to 15 kW	Rs. 850 per day
(2) Temporary shops set up during festivals / melas and having load upto 2 kW	Rs. 50 per day
(3) Other Temporary shops/ Jhuggi /Jhopris for load upto 1 kW	
3.1) Rural	Rs. 80/month/connection
3.2) Urban	Rs. 165/month/connection

The amount of Fixed Service Charge as specified in 2 above shall be taken in advance.

(B) Temporary Supply for Other Purposes

1. Applicability

(i) This schedule shall apply to temporary supplies of light, fan and power loads for the purposes other than mentioned at (A) including illumination/public address/ceremonies for load above 15 kW.

(ii) This schedule shall also apply for power taken for construction purposes including civil work by all consumers including Government Departments. Power for construction purposes for any work / project shall be considered from the date of taking first connection for the construction work till completion of the work / project.

However, a permanent connection sanctioned for premises being used for construction, repair or renovation of building, whether existing or new shall not be considered as unauthorised use of electricity as long as the intended purpose/use of the building/appurtenants being constructed is same/permissible in the sanctioned category of the connection.

(iii) This schedule shall also apply for drawl of power by captive generating plants connected to grid, but not a consumer of the licensee, normally injecting power into the grid. However, grid connected captives, which are consumers of licensee, shall be billed for drawal of power under the appropriate rate schedule.

2. Rate of Charge

The rate of charge will be corresponding rate of charge in appropriate Schedule Plus 25%. The appropriate rate schedule for the temporary supplies for cane crusher upto 15 BHP given for maximum period of four (4) months will be RTS-7.

10.2 Annexure 2: Schedule of Miscellaneous Charges

Sl. No	Nature of Charges	Unit	Rates (RS.)
1	**Checking and Testing of Meters**		
	a. Single Phase Meters	Per Meter	35.00
	b. Three Phase Meters	Per Meter	40.00
	c. Recording Type Watt-hour Meters	Per Meter	170.00
	d. Maximum Demand Indicator	Per Meter	335.00
	e. Tri-vector Meters	Per Meter	1000.00
	f. Ammeters and Volt Meters	Per Meter	65.00
	g. Special Meters	Per Meter	335.00
	h. Initial Testing of Meters	Per Meter	NIL
2	**Subsequent testing and installation other than initial testing**	Per Meter	80.00
3	**Disconnection and Reconnection of supply for any reason, whatsoever, (for any disconnection or reconnection) the charge will be 50%**		
	a. Consumer having load above 100 BHP/75 kW	Per Job	400.00
	b. Power consumers upto 100 BHP/75 kW	Per Job	300.00
	c. All other categories of consumers	Per Job	200.00
4	**Replacement of Meters**		
	a. By higher capacity Meter	Per Job	25.00
	b. Installation of Meter and its subsequent removal in case of Temporary Connections	Per Job	50.00
	c. Changing of position of Meter Board at the consumer's request	Per Job	75.00
5	Ser vice of Wireman :		
	a. Replacement of Fuse	Per Job	20.00
	b. Inserting and Removal of Fuse in respect of night loads.	Per Job	15.00
	c. Hiring of services by the consumer during temporary supply or otherwise.	Per wireman/Day of 6hours	50.00
	d. If inspector is obstructed/prevented by the consumer deliberately or otherwise	Per Trip	150.00
6	Resealing of Meters on account of any reason in addition to other charges payable in terms of other provision of charging of penalties, etc	Per Meter	55.00
7	Checking of Capacitors (other than initial checking) on consumer's request:		
	a. At 400 V / 230 V	Per Job	100.00
	b. At 11 kV and above	Per Job	200.00

10.3 Annexure 3: Public Notice on UPCL's Proposals

Uttarakhand Power Corporation Limited

उत्तराखण्ड पावर कारपोरेशन लि.

Urja Bhawan, Kanwali Road, Dehradun

Public Notice

INVITING COMMENTS ON UPCL'S PETITION FOR APPROVAL OF ARR AND PROPOSED ELECTRICITY TARIFFS FOR FY 2010-11

Uttarakhand Power Corporation Limited (UPCL), Distribution licensee in the State of Uttarakhand has filed a Petition with Uttarakhand Electricity Regulatory Commission (UERC or Commission) for approval of its Annual Revenue Requirement (ARR) for the financial year 20010-11 and has sought a revision of retail Tariff to be charged from consumers of electricity in the State. The summary of the ARR, Revenue Gap and the tariff proposal for the year is given below:

1. Annual Revenue Requirement and Revenue Gap:

i. Although, UPCL has not claimed truing up for 2009-10, it has submitted the revised estimates for 2009-10. The summary of the ARR and the revenue Gap for 2009-10 and for 2010-11 (as projected by UPCL) is given in the following Table:

Table: ARR Summary of UPCL (Figures Rs in Crore)

Summary of the ARR of UPCL				
S. No.	Item	FY 2009-10		FY 2010-11
		Approved	Estimated	Projected
	Expenditure			
1	Power Purchase Expenses	1373.57	1728.11	2071.95
2	Transmission Charges - PGCIL	85.94	85.94	91.14
3	Transmission Charges- PTCUL	75.81	75.81	108.73
4	O&M expenses	264.25	264.25	289.25
5	Interest charges	62.89	81.55	83.99
6	Depreciation	21.70	32.57	40.63
7	Interest on Working Capital	16.08	14.46	19.64
	Gross Expenditure	**1900.24**	**2282.69**	**2705.33**
	Other Expenses / Appropriations			
8	Provision for Bad & Doubtful Debts	28.80	57.56	68.28
9	Return on Equity	0.84	0.84	2.94
	Net Expenditure	**1929.88**	**2341.09**	**2776.55**
10	Less: Non Tariff Income	35.40	38.40	38.77
	Net Annual Revenue Requirement	**1894.48**	**2302.69**	**2737.78**
11	**Revenue Gap of 2007-08 & 2008-09**	**68.51**	**-**	**-**
	Total Revenue Requirement	**1962.99**	**2302.69**	**2737.78**
12	**Revenues at Approved/Existing Tariffs**	**1965.99**	**1972.44**	**2300.04**
	Revenue Surplus/(Gap)	**3.00**	**-330.25**	**-437.74**

ii. UPCL has submitted that the gap is primarily due to increase in its power purchase cost over a period of last one year and has been projected based on the distribution loss level of 24%. Further, it is submitted that the power purchase costs do not include the element of variable cost of Fossil fuel in the energy cost to be purchased from NTPC and the impact of MYT rates of CPSUs due for revision by CERC and hence, the gap projected was bound to increase further.

iii. Further, UPCL has submitted that the Commission had disallowed not only UPCL's capital investments but those of PTCUL also for FY 08 to FY 10 in absence of the certificates of the Electrical Inspector. If such investments are also considered the gap so estimated would increase further due to the impact of depreciation and interest causing tariff shocks to the consumers.

iv. Further, UPCL has also requested to consider the impact of the re-determination of tariff for HT industries with contracted load above 1000 kVA and load factor above 50% and subjected to additional supply surcharge for continuous supply in accordance with the ATE's Order dated 06.10.2009.

2. Summary of Tariff Proposal:

The total Revenue Gap for FY 2010-11 proposed by UPCL is Rs. 437.74 Crores which after including the revenue gap estimated for 2009-10 would be Rs. 767.99 Crores. The revenue gap for FY 2010-11 has been proposed to be bridged through an average increase of 19% in tariffs for FY 2010-11. If the gap for 2009-10 as per revised estimates submitted by UPCL is also considered, the tariff increase required would be about 33.39%.

The following table shows the summary of the existing and the proposed Tariffs:

Table: Summary of Existing and Proposed Tariff Schedule and Effective Tariff

	Fixed/Demand Charges		Energy Charges		Minimum	
RTS-1: DOMESTIC						
1.1 For consumers getting un-metered supply in Rural Areas						
1.1.1 Hilly areas	Rs. 120/ connection/month	Rs. 120/ kW/month				
1.1.2 Other Areas	Rs. 200/ connection/month	Rs. 200/ kW/month				
1.2 Domestic Metered						
1.2.1 Life line consumers						
Below Poverty Line and Kutir Jyoti having load upto 1kW and consumption upto 30 units per month	Nil	Nil	Rs 1.50/ kWh	Rs 1.50/kWh		
1.3 Other domestic consumers	Upto 4 kW : Rs. 20/connection/ month more than 4 kW : 40/connection / month	Rs. 24/kW/month	Rs 2.20/kWh	Rs 2.64/kWh		
1.4 Single Point Bulk Supply	Rs. 20/kW/month	Rs. 24/kW/month	Rs 2.10/kWh	Rs 2.52/kWh		
RTS-1A: SNOWBOUND						
1) Domestic	Nil	Nil	Rs 1.50/kWh	Rs 1.50/kWh		
2) Non-domestic upto 1 kW	Nil	Nil				
2) Non-domestic more than 1 & upto 4 kW	Nil	Nil	Rs 2.00/kWh	Rs 2.00/kWh		
2) Non-domestic more than 4 kW	Nil	Nil	Rs 3.00/kWh	Rs 3.00/kWh		
RTS-2: NON-DOMESTIC						
1. (i) Government/Municipal Hospitals (ii) Government / Government aided Educational Institutions (iii) Charitable Institutions registered under the Income Tax Act, 1961 and whose income is exempted from tax under this Act						
(a) Upto 25 kW	Rs. 20/kW/month	Rs. 24/kW/month	Rs 3.20/kWh	Rs 3.84/kWh		
(b) Above 25 kW	Rs. 20/kW/month	Rs. 24/kW/month	Rs 2.90/kVAh	Rs 3.48/kVAh	75 kVAh/kW/month & 900/ kVAh/ kW/ annum	75 kVAh/kW/month & 900/ kVAh/ kW/annum
2. Other Non-Domestic/Commercial Users						
2.1 Upto 25 kW	Rs. 20/kW/month	Rs. 24/kW/month	Rs 3.90/kWh	Rs 4.68/kWh		
2.2 Above 25 kW	Rs. 20/kW/month	Rs. 24/kW/month	Rs 3.90/kVAh	Rs 4.68/kVAh	75 kVAh/kW/month & 900/kVAh/ kW/annum	75 kVAh/kW/month & 900/kVAh/ kW/annum
RTS-3: PUBLIC LAMPS - In addition to Tariff, Maintenance charge of Rs 10/- per light point per month was prevailing which has been proposed to be revised to Rs. 12/- per light point per month						
1. Metered	Rs. 15/kW	Rs. 18/kW	Rs 3.20/kWh	Rs 3.84/kWh		
2. Unmetered Rural	Rs. 115/100 watt lamp (Rs. 60 additional for every 50 watt increase over 100 watts)	Rs. 138/100 watt lamp (Rs. 72 additional for every 50 watt increase over 100 watts)	Nil	Nil		
RTS-4: PRIVATE TUBE WELLS/PUMPING SETS						
1 Unmetered	Rs. 130/BHP/month*	Rs. 150/BHP/month*	Nil	Nil		
2 Metered	Nil	Nil	Rs 0.80/kWh	Rs 0.96/kWh		
RTS-5: GOVERNMENT IRRIGATION SYSTEMS						
Upto 75 kW	Rs. 15/kW	Rs. 18/kW	Rs. 3.20/kWh	Rs. 3.84/kWh		
More than 75 kW	Rs. 15/kVA	Rs. 18/kVA	Rs. 2.90/kVAh	Rs. 3.48/kVAh		
RTS-6: PUBLIC WATER WORKS	Rs 15/kW	Rs 18/kW	Rs 2.90/kVAh	Rs 3.48/kVAh	Nil	Nil
RTS-7: LT & HT INDUSTRIES #						
1. LT Industry having contracted load upto 100 BHP/75kW						
1.1 Connected load up to 25 kW	Rs. 80/kW of connected load	Rs. 96/kW of connected load	Rs. 3.15/kWh	Rs. 3.78/kWh	75 kWh/kW/month & 900/kWh/ kW/annum	75 kWh/kW/month & 900/kWh/ kW/annum
1.2 Connected load more than 25 kW			Rs. 2.85/kVAh	Rs. 3.42/kVAh	75 kVAh/kW/month & 900/kVAh/ kW/annum	75 kVAh/kW/month & 900/kVAh/ kW/annum
2. HT Industry having contracted load above 100 BHP/75kW/88kVA						
2.1 Connected load upto 1000 kVA						
2.1.1 Upto 33%	Rs. 160/kVA of billable demand	Rs. 192/ kVA of billable demand	Rs. 2.50/kVAh	Rs. 3.00/kVAh	110 kVAh/kVA/month & 1320/kVAh/kVA/annum	110 kVAh/kVA/month & 1320/kVAh/kVA/annum
2.1.2 Above 33% and upto 50%			Rs. 2.75/kVAh	Rs. 3.30/kVAh		
2.1.3 Above 50%			Rs. 3.00/kVAh	Rs. 3.60/kVAh		
2.2 Connected load more than 1000 kVA						
2.2.1 Upto 33%	Rs. 200/ kVA of billable demand	Rs. 264/ kVA of billable demand	Rs. 2.50/kVAh	Rs. 3.00/kVAh	110 kVAh/kVA/month & 1320/kVAh/kVA/annum	110 kVAh/kVA/month & 1320/kVAh/kVA/annum
2.2.2 Above 33% and upto 50%			Rs. 2.75/kVAh	Rs. 3.30/kVAh		
2.2.3 Above 50%			Rs. 3.00/kVAh	Rs. 3.60/kVAh		
RTS-8: MIXED LOADS	Rs. 20/kW	Rs. 24/kW	Rs. 3.00/kWh	Rs. 3.60/kWh		
RTS-9: RAILWAY TRACTION	Rs. 160/kVA/month	Rs. 192/kVA/month	Rs. 3.00/kVAh	Rs. 3.60/kVAh		
RTS-10: TEMPORARY SUPPLY						
(1) For Illumination / public address/ ceremonies for load up to 15 kW	Rs. 750 per day	Rs. 1000 per day				
(2) Temporary shops set up during festivals / melas and having load upto 2 kW	Rs. 40 per day	Rs. 45 per day				
(3) Other Temporary Shops/Jhuggis /Jhopris for load upto 1 kW						
3.1) Rural	Rs. 75/month/ connection	Rs. 85/month/connection				
3.2) Urban	Rs. 150/month/connection	Rs. 170/month /connection				

* Plus Rs. 20/connection/month for lighting load of not more than two lamps.

3. Responses/suggestions, if any, are sought from consumers and other stakeholders on the Petition. Responses may be sent to the Secretary, Uttarakhand Electricity Regulatory Commission, either in person, or by post at Uttarakhand Electricity Regulatory Commission, Ist Floor of Institution of Engineers (I), near I.S.B.T., Majra, Dehradun or through e-mail to **uttaranchalerc@rediffmail.com** by 31.12.2009.

4. Detailed Petition can be seen free of cost on any working day at the Commission's office or at the offices of General Manager (Regulatory Management) at Urja Bhawan, Kanwali Road, Dehradun/General Manager (Distribution), Garhwal Zone, UPCL, 120-Haridwar Road, Dehradun/General Manager (Distribution), Kumaon Zone, UPCL, 132-KV Substation, Kathgodam, Haldwani. Relevant extracts can also be obtained from the above mentioned offices of the Petitioner.

5. The Petition is also available at the website of the Commission (www.uerc.in) and at the Petitioner's website (www.upcl.org).

No. 194/DGM(HQ&CP) A-2 Dt. 10/12/09

Managing Director

10.4 Annexure 4: List of Respondents of UPCL's Proposal

Sl. No.	Name	Designation	Organization	Address
1.	Smt. Geeta Bisht	Mahanagar Mukhya Mahila Sangathak	Mahanagar Congress Sewa Dal, Dehradun	21-Rajpur Road, Dehradun
2.	Shri Manmohan Kansal	Chairman	Dakpathar Vyapar Mandal	Ramkuti, Nehru Market, Dakpathar
3.	Shri G.S. Manchanda	Proprietor	Hotel India	Library, Mussoorie – 248179
4.		Manager	Doon Valley Distillers, Alcohol Division	Kuanwala, P.O. Harrawala, Dehradun
5.	Shri Om Prakash Ahuja	Pradesh Adhyaksha	State Licensee Electrical Contractors Association, Uttarakhand	5-B, Industrial Estate, Rudrapur, Udhamsingh Nagar
6.	Shri Ram Kumar	Vice President	Mussoorie Hotel Association	Hotel Vishnu Palace, Gandhi Chowk, Mussoorie
7.	Shri B.P. Verma	Chief Electrical Distribution Engineer	Northern Railway	Hd. Qrs. Office, Baroda House, New Delhi – 110001
8.	Shri J.B. Agarwal	Director	Kashi Vishwanath Steels Ltd.	Narain Nagar Industrial Estate, Nainital Road, Kashipur- 244713
9.	Ms. Veena Rani Goyal			Atta Chakki Owner, 37, DAV College Road, Dehradun
10.		Representatives	Small Scale Industries	Chaukhutia, Distt.- Almora
11.	Sh. P.S. Tomar	Director	Galwalia Ispat Udyog, Ltd.	Narain Nagar Industrial Estate, Nainital Road, Kashipur – 244713
12.	Shri Pankaj Gupta	President	Industries Association of Uttarakhand	Mohabewala Industrial Area, Dehradun – 248110
13.	Ms. Swaraj Vidwan	President	Bhartiya Janta Party	Gram & Post- Brahmakhal- Genwla, R/o- Kaleshwar Marg, Joshiyara, Uttarakashi
14.	Shri Lakhi Ram Sajwan	Jila Mahamantri	Jila Udyog Sangh, Uttarkashi	Birpur Dunda, Post – Dunda, Distt.- Uttarkashi
15.	Shri Gopal Singh Rawat	Hon'ble MLA	Gangotri	Court Road, Uttarkashi-249193
16.	Shri K. G. Behl, Brig. (Retd.)	President	All India Consumers Council (AICC) Uttaranchal	8-A, Nemi Road, Dehradun – 248001
17.	Shri Sudhir Naithani	President	Vyapar Sangh, Srinagar Garhwal	Srinagar, Distt.- Pauri Garhwal
18.	Shri P.C. Kumain		Star Diagnostics Pvt. Ltd.	Khasra No. 140-144, Chandrabani Khalsa, Mohabewala, Industrial Area, Dehradun-248002
19.	Shri Ashok Shukla	Member	Bhagwanpur Industries Association	C/o V.N. Plastics Pvt. Ltd., Plot No. 200, Sikandarpur, Lakeshwari Road, P.O. Sikandarpur Bhainswal, Bhagwanpur-247661, Tehsil Roorkee, Distt.- Haridwar

Sl. No.	Name	Designation	Organization	Address
20.	Shri V.V. Joshi		Tata Motors Ltd.	Plot No. 1, Sector 11, IIE Sidcul, Pantnagar – 263153
21.	Shri Pukhraj Kushwaha		M/s. Khatima Fibres Ltd.	UPSIDC Industrial Area, Khatima-262308
22.	Shri S.K. Singh	Managing Director	Shivalik Rasayan Ltd.	Vill.- Kolhupani, P.O. Chandanwari, Via Prem Nagar, Dehradun – 248007
23.	Shri Rajeev Ghai	President,	KGCCI	Chamber House, Industrial Estate, Bazpur Road, Kashipur, Distt.- U.S. Nagar
24.	Shri Anil Marwah	State General Secretary	Prantiya Industries Association	222/5, Gandhi Gram, Dehradun – 248001
25.	Shri Naval Duseja	AGM (Finance & Accounts)	Flex Foods Limited	Lal Tappar Industrial Area, P.O. Resham Majri, Haridwar Road, Dehradun 248140
26.	Shri R.N. Mathur	President	Mussoorie Hotel Association	Prince Hotel, Library, Mussoorie
27.	Shri Ajay Bhargava	Secretary	Mussoorie Hotel Association	Hotel Surya Kiran, Mall Road, Mussoorie
28.	Shri S. Kumar	Vice President-Works	La Opala RG Ltd.	Sitarganj
29.			M/s. Vidyut Shakti, Upbhokta Sangh (Pachhavadoon)	Vikasnagar, Dehradun
30.	Shri Santosh Kumar Sharma	Vice-President	M/s. Vidyut Shakti, Upbhokta Sangh (Pachhavadoon)	Vikasnagar, Gram & Post- Pashchimiwala, Vikasnagar, Dehradun
31.	Shri Narendra Pal Singh	President	Consumer Care Consultancy	17, Ganga Nagar, Rishikesh
32.	Shri Amar S. Dhunta	General Secretary	RTI Club Uttarakhand	827/1, Sirmaur Marg, Rajendra Nagar, Dehradun
33.		Secretary	Lok Sewa Samiti	Damuadhoonga (Panchakki), P.O. kathgodam- 263126, Distt. Nainital
34.			M/s. Syncom Healthcare Limited	D-42, UPSIDC, Industrial Area, Selaqui, Dehradun – 248197
35.	Shri Arun Kumar	President	Residents Welfare Association	Lane No. 13, 14, Mohit Nagar,Dehradun
36.	Shri Narendra Singh Kandari			Kandari Bhawan, Gram – Auring, P.O. Bhiri, Rudraprayag
37.	Shri Shubham Maheshwari	Director	Shashwat Cables (P) Ltd.	Industrial Area, Langha Road, Charba, Dehradun – 248197
38.	Shri Virendra Singh Kandari	Member	Jila Panchayat	42- Bhaitan, Gram & Post- Agrakhal, Narendra Nagar, Tehri Garhwal

10.5 Annexure 5: List of Participants in Public Hearings

List of Participants in Hearing at Uttarkashi on 11.01.2010

SL. No.	Name	Designation	Organization	Address
1.	Shri Madan Singh Rana			Vill.- Bansga, Post- Sald, Uttarkashi
2.	Dr. B.S. Rana			Dr. Rana Bhawan, Tiloth, Uttarkashi
3.	Shri Lakhi Ram Singh Sajwan			Gram Virpur, Dunda, Uttarkashi
4.	Shri Harish Semwal	Member	Jila Panchayat, Baragadi	Uttarkashi
5.	Shri Bachan Singh	Member	Jila Panchayat, Dang, Baragadi	Uttarkashi
6.	Shri Surat Singh Rawat		Amar Ujala	Uttarkashi
7.	Shri Suresh Chauhan		Ex. Pramukh, Bhatwari	Uttarkashi
8.	Shri Kamal Singh Rawat		Jila Panchayat, Bada	Uttarkashi
9.	Shri Dinesh Semwal			Barahat Semwal Bhawan, Near Parshuram Mandir, Uttarkashi
10.	Shri Rajendra Panwar			Hotel Vijayraj, Gangotri Highway, Uttarkashi
11.	Shri Vijay Bahadur Singh			Hotel Gautam Park, Joshiyara, Uttarkashi
12.	Shri Balbir Singh Makhloga			Village- Gangari, Nougari, Uttarkashi
13.	Shri Sukesh Nautiyal			Village- Bheteyena, P.O. Dhauntry, Uttarkashi
14.	Shri Jitendra Rawat		Zee News	Uttarkashi
15.	Shri Ramesh Semwal			Badahat, Uttarkashi
16.	Shri Gopal Rawat	Hon'ble MLA Gangotri		Purani Kutchery Road, Uttarkashi
17.	Ms. Swaraj Vidwan	President	BJP (District Level)	Kaleshwar Marg, Joshiyara, Uttarkashi

List of Participants in Hearing at Sitarganj on 22.01.10

SL. No.	Name	Designation	Organization	Address
1.	Shri Suresh Kumar	Vice-President (Works)	M/s. La-opala RGLN	ESIP, Sitarganj, Distt.- Udhamsingh Nagar
2.	Shri Bhola Trivedi		M/s. Narendra Plastics	Unit Plot No A-195, Phase 1, EIDCO SIDCUL Industrial Park, Jail Camp Road, Sitarganj, Udham Singh Nagar, Uttarakhand 262405
3.	Shri Pukhraj Kushwaha		M/s. Khatima Fibers	UPSIDC Industrial Area, Khatima-262308
4.	Shri Manjeet Singh		PSB Papers Ltd.	Beria Road, Bazpur - 262401, Uttarakhand
5.	Shri V.V. Joshi	Assistant General Manager	Tata Motors Ltd.	Plot No. 1, Sector 11, IIE, SIDCUL, Pant Nagar, Udhamsingh Nagar
6.	Shri R.K. Singh	Sr. Manager	M/s. Tata Motors Ltd.	Plot No. 1, Sector 11, IIE, SIDCUL, Pant Nagar, Udhamsingh Nagar

List of Participants in Hearing at Pithoragarh on 23.01.10

SL. No.	Name	Designation	Organization	Address
1.	Shri Dhan Singh Mehta		Laxmi Narayan Utthan Samiti, Gangolihat	Vill.-Bhandari Gaon, P.O.-Kothera, Gangolihat, Pithoragarh
2.	Shri Ishwar Rautela	Secretary	Uttara Gharat Vikas Samiti, Pithoragarh	Vill.- Bhandari Gaon, P.O.-Kothera, Gangolihat, Pithoragarh
3.	Smt. Manju Devi			Vill.- Lindyuda, Sinola, Pithoragh
4.	Shri D.P. Khanka			Khanka Cottage, Takana Khet, Pithoragarh
5.	Smt. Mohni Devi			Vill.- Kedar Puneri Ward, Distt.-Pithoragarh
6.	Smt. Jivanti Devi			Vill.- Kidar Puneri, Distt.-Pithoragarh
7.	Smt. Devki Devi			Vill.- Kidar Puneri, Distt.-Pithoragarh
8.	Smt. Kaushalya Devi			Vill.- Kidar Puneri, Distt.-Pithoragarh
9.	Shri Jitendra Singh Mahra	Ward Member	Siltham,	Siltham, Pithoragarh
10.	Shri Trilok Singh Mahar	Ward Member	Kumon	Kumon, Pithoragarh
11.	Shri Rajendra Singh Baseda	Ward Member	Khadkot	Khadkot, Pithoragarh
12.	Shri Jeevan Lal	Ward Member	Bajethi	Bajethi, Pithoragarh
13.	Shri Chandrashekhar Makholiya			Rai, Pithoragarh
14.	Shri K.C. Pant			New Sera, Pithoragarh
15.	Shri Jitu			Jakhni, Pithoragarh
16.	Shri Madan Mohan Bhatt			Rai, Pithoragarh
17.	Shri Nirmal Singh			Naya Bazar, Pithoragarh
18.	Shri G.S. Bhadri			Pithoragarh
19.	Shri Umesh Singh Rana			Link Road, Near Milan Tent House, Pithoragarh
20.	Shri Rizwan Ansari			C/o Mohd. Sazid, New Colony, Linthwa, Pithoragarh
21.	Shri Bhupal Singh			Ward No.- 7, Lunthyuda, Pithoragarh
22.	Shri Rajendra Singh Bisht			Maharishi Vidya Mandir, City Branch – Kumor, Pithoragarh

List of Participants in Hearing at Dehradun on 14.02.2010

SL. No.	Name	Designation	Organization	Address
1.	Shri Pankaj Gupta	President	Industries Association of Uttarakhand	C/o Satya Industries, Mohabewala Industrial Area, Dehradun
2.	Shri Rajiv Agarwal	Consumer Advocate & Sr. Vice-president,	Industries Association of Uttarakhand	32- Inder Road, Dalanwala, Derhadun
3.	Shri V.V. Joshi	Assistant General Manager	M/s. Tata Motors Ltd.	Plot No. 1, Sector 11, IIE, SIDCUL, Pant Nagar, Udhamsingh Nagar
4.	Shri R.K. Singh	Sr. Manager	M/s. Tata Motors Ltd.	Plot No. 1, Sector 11, IIE, SIDCUL, Pant Nagar, Udhamsingh Nagar
5.	Shri Ashok Goswami	Manager	Jeewani Mai Trust	Haridwar Road, Rishikesh
6.	Shri Khursheed A. Siddiqui			37- Preet Enclave, Majra, Dehradun
7.	Shri Arvind Jain			6 – Ramleela Bazar, Dehradun
8.	Shri Amar S. Dhunta	General Secretary	RTI Club Uttarakhand	827/1, Sirmaur Marg, Rajendra Nagar, Dehradun
9.	Shri Arun Kumar	President	Resident Welfare Association	Lane No. 13, 14 Mohit Nagar, 331/13- Mohit Nagar, Dehradun
10.	Shri Katar Singh	President	Bhartiya Kissan Club	Vill. Sultanpur Sabatwali, Post- Jhabrera, Distt.- Haridwar
11.	Shri Vijay Pal Singh			S/o Shri Kishan Singh, Village & Post – Sherpur Khelmau, Distt- Hardwar
12.	Shri Harindra Kumar Garg	Regional Chairman (Garhwal)	Industries Association of Uttarakhand	C/o Cello Industries, Plot No. 3, Sector No. 3, SIDCUL, Haridwar
13.	Shri Rakesh Kr. Tyagi	GM (Operation)	Creative Industries	Plot – 5/5A, Sector 3, SIDCUL, IIE, Haridwar
14.	Shri Lokesh Lohia			Sector VII, Plot No. 98, SIDCUL- Haridwar
15.	Shri Naval Duseja	AGM (Finance & Accounts)	Flex Foods Limited	Lal Tappar Industrial Area, P.O. Resham Majri, Haridwar Road, Dehradun 248140
16.	Shri Kashiram			E-29, Yamuna Colony, Dehradun
17.	Shri B.S. Bisht			21, Mohanpur, Premnagar, Dehradun

List of Participants in Hearing at Dehradun on 14.02.2010

SL. No.	Name	Designation	Organization	Address
18.	Shri R.N. Mathur	President	Mussoorie Hotel Association	Prince Hotel, Library, Mussoorie
19.	Shri Narendra Pal Singh	President	Consumer Care Consultancy	17, Ganga Nagar, Rishikesh
20.	Shri Khairati Lal Sharma			633- Ramnagar, Roorkee, Distt.- Haridwar
21.	Shri Ajay Bhargara	Secretary	Mussoorie Hotel Association	Hotel Surya Kiran, Mall Road, Mussoorie
22.	Shri Sanjay Agarwal			Hotel Mall Palace, The Mall, Opp. Ropeways, Mussoorie
23.	Shri Gulshan Rai		Shri Ganesh Roller Flour Mills	Mohabbewala Industrial Area, Dehradun
24.	Shri Ram Kumar	Vice President	Mussoorie Hotel Association	Hotel Vishnu Palace, Gandhi Chowk, Mussoorie
25.	Shri Gulshan Kakkar	Working President	Prantiya Industries Association	Mohabbewala Industrial Area, Dehradun
26.	Shri Mayank Garg		Himgiri Packers & Joint Secretary (PIA)	121- Kanwali Road, Dehradun
27.	Shri Himanshu Bahuguna		Rashtriya Sahara	Patel Nagar, Dehradun
28.	Shri Anil Marwah	State General Secretary	Prantiya Industries Association	222/5, Gandhi Gram, Dehradun – 248001
29.	Shri R.K. Sal		Prantiya Industries Association	123, Saharanpur Road, Patel Nagar, Dehradun
30.	Shri Jagdish Kuliyal			Shisham Jhari, P.O. Muni Ki Reti, Distt.- Tehri Garhwal
31.	Shri Vishnu Mitra			36, Panchsheel Park, P.O. New Forest, Dehradun 248006.
32.	Shri Shailendra Singh			Lane No. 3, House No. 4, Dashmesh Vihar, Raipur Road, Dehradun