Before the

MAHARASHTRA ELECTRICITY REGULATORY COMMISSION

World Trade Centre, Centre No.1, 13th Floor, Cuffe Parade, Mumbai 400005 Tel. No. 022-2216394/65/69 Fax No. 022-22163976

Email: mercindia@mercindia.org.in
Website: www.mercindia.org.in

Case No. 113 of 2008

IN THE MATTER OF

The Tata Power Company Limited – Distribution Business' (TPC-D) Petition for Truing Up for FY 2007-08, Annual Performance Review for FY 2008-09 and Tariff Determination for FY 2009-10

Shri V. P. Raja, Chairman Shri A. Velayutham, Member Shri S. B. Kulkarni, Member

ORDER

Dated: June 15, 2009

In accordance with MERC Tariff Regulations and upon directions from the Maharashtra Electricity Regulatory Commission (hereinafter referred as MERC or the Commission), The Tata Power Company Limited's Distribution Business (TPC-D), submitted its application on affidavit for approval of truing up of ARR for FY 2007-08, Annual Performance Review for FY 2008-09 and Aggregate Revenue Requirement (ARR) and Tariff for FY 2009-10. The Commission, in exercise of the powers vested in it under Section 61 and Section 62 of the Electricity Act, 2003 (EA 2003) and all other powers enabling it in this behalf, and after taking into consideration all the submissions made by TPC-D, all the suggestions and objections of the public, responses of TPC-D, issues raised during the Public Hearing, and all other relevant material, and after review of Annual Performance for FY 2008-09 determines the ARR and Tariff for TPC-D for FY 2009-10 as under.





Table of Contents

1	BAC	CKGROUND AND BRIEF HISTORY	_8
	1.1	MERC Tariff Regulations	_ 8
	1.2	MERC Order on ARR And Tariff Petition for FY 2005-06 and FY 2006-07	_ 8
	1.3	Review Petition on Tariff Order for FY 2006-07	_ 8
	1.4	MERC Order on MYT Petition for TPC-D for FY 2007-08 to FY 2009-10 _	_9
	1.5	MERC Order on APR Petition for TPC-D for FY 2007-08 and Tariff Determination for FY 2008-09	_ 9
	1.6	Review Petition on Order on APR for FY 2007-08 and Tariff determination for FY 2008-09	
	1.7	Petition for Annual Performance Review for FY 2008-09 and Tariff Determination for FY 2009-10	10
	1.8	Admission of Petitions and Public Process	11
	1.9	Organisation of the Order	12
2	OB.	IECTIONS RECEIVED, TPC's RESPONSE AND COMMISSION'S	
	RUI	LING	13
	2.1	Procedural Issues	13
	2.2	Interest Rate	14
	2.3	Income Tax	15
	2.4	Return on Equity	16
	2.5	Advertisement Expenses	17
	2.6	Sharing of gain/losses	18
	2.7	Sharing of gains on account of O&M expenditure in FY 2007-08	18
	2.8	Knowledge of TPC's Right to Distribute Power	19
	2.9	Distribution Loss	20
	2.10	Efficiency Gains	21
	2.11	Distribution Network Roll out Plan and Release of New Connections	22
	2.12	Alternate Source of Power	26
		Page 2 of .	185



	2.13	Standby Charges	_ 26
	2.14	Expenses for FY 2008-09 and FY 2009-10	_ 27
	2.15	Operation and Maintenance Expenses	_ 28
	2.16	Under-recovered Fuel Adjustment Cost (FAC) of previous year	_ 30
	2.17	Past Recoveries	_ 30
	2.18	Fuel Adjustment Charges	_ 31
	2.19	Electricity Duty and Tax on Sale of Electricity	_ 32
	2.20	Determination of Tariff for Distribution Licensee	_ 33
	2.21	Power Purchase Agreement	_ 33
	2.22	External Purchase	_ 34
	2.23	Tariff linked to Cost of Supply	_ 35
	2.24	Consumer Categorisation and Proposed Tariff	_ 37
	2.25	Expensive Power Charges	_ 40
	2.26	Proposed Tariff hike	_ 40
	2.27	Cross Subsidy	_ 41
	2.28	Tariff Increase	_ 42
	2.29	Uniform Tariff across all Licensees and comparison of Tariff with other Utilities	_ 42
	2.30	Compliance with MERC (Electricity Supply Code and Other Conditions o	f
		Supply) Regulations, 2005	_ 44
	2.31	Non Compliance with Regulations	_ 44
3		UING UP OF AGGREGATE REVENUE REQUIREMENT FOR	
	FY	2007-08	_46
	3.1	Sales	_ 46
	3.2	Distribution Losses and Energy Input Requirement	_ 46
	3.3	Power Purchase Expenses for FY 2007-08	_ 48
	3.4	O&M Expenses	_ 55
	3.5	Capital Expenditure and Capitalisation	_ 59
	3.6	Depreciation	_ 59
		Page 3 o	f 185



	3.7	Interest Expenses	_ 60
	3.8	Provision for Bad Debts	_ 64
	3.9	Income Tax	_ 65
	3.10	Return on Equity (RoE)	_ 66
	3.11	Contribution to Contingency Reserves	_ 67
	3.12	Unrecovered FAC for the period from April 2006 to September 2007	_ 68
	3.13	Non Tariff Income	_ 68
	3.14	Income from sale of surplus power outside Licence Area	_ 69
	3.15	Revenue from sale of electricity for FY 2007-08	_ 69
	3.16	Sharing of Gains and Losses for FY 2007-08	_ 69
	3.17	Net Revenue Gap for FY 2007-08	_ 76
4	PEI	RFORMANCE REVIEW OF FY 2008-09 AND DETERMINATION OF	7
	AGC	GREGATE REVENUE REQUIREMENT FOR FY 2009-10	_78
	4.1	Performance Parameters	_ 78
	4.2	Provisional Truing-up for FY 2008-09	_ 79
	4.3	Sales	_ 80
	4.4	Distribution Losses and Energy Input	_ 84
	4.5	Energy Availability and Power Purchase cost during FY 2008-09 and FY 2009-10	
	4.6	O&M Expenses for FY 2008-09 and FY 2009-10	_ 96
	4.7	Capital Expenditure and Capitalisation for FY 2008-09 and FY 2009-10_	104
	4.8	Depreciation and Advance against depreciation	113
	4.9	Interest Expenses	114
	4.10	Interest on Working Capital and Consumers' Security Deposit for FY 200 and FY 2008-09	
	4.11	Provisioning for Bad and Doubtful Debts	121
	4.12	Income Tax for FY 2008-09 and FY 2009-10	
	4.13	Contribution to Contingency Reserves for FY 2008-09 and FY 2009-10	124
	4.14	Return on Equity (RoE) for FY 2008-09 and FY 2009-10	126
		Page 4 o	f 185



	4.15	Non Tariff Income for FY 2008-09 and FY 2009-10	_ 128
	4.16	Impact of Ruling in Case No 29 of 2008	_ 128
	4.17	Impact of Ruling in Case No 43 of 2008	_ 129
	4.18	Impact of Ruling in Case No 46 of 2008	_ 129
	4.19	Allocation of Load Control Centre cost	_ 130
	4.20	Demand Side Management (DSM) expenses for FY 2008-09 and FY 2009-10	
	4.21	Impact of ATE Judgment on TPC-D	_ 134
	4.22	Revenue from Sale of Electricity in FY 2008-09 and FY 2009-10 from Existing Tariffs	
	4.23	Aggregate Revenue Requirement and Revenue Gap for FY 2008-09 and FY 2009-10	
5	TAI	RIFF PHILOSOPHY AND CATEGORY-WISE TARIFFS FOR	
	FY.	2009-10	_139
	5.1	Applicability of Revised Tariffs	_ 139
	5.2	Revenue Gap for FY 2008-09 and FY 2009-10	_ 139
	5.3	Tariffs Proposed by TPC-D	_ 140
	5.4	Commission's Tariff Philosophy	_ 142
	5.5	Revised Tariffs with effect from June 1, 2009	_ 151
	5.6	Wheeling Charges and Loss Compensation	_ 153
	5.7	Cross-subsidy Surcharge	_ 155
	5.8	Incentives and Disincentives	_ 155
	5.9	Applicability of Order	157



List of Abbreviations

ATE	Appellate Tribunal for Electricity
A&G	Administrative and General
APR	Annual Performance Review
ARR	Aggregate Revenue Requirement
AS -15 (R)	Accounting Standard – 15 (Revised)
BEST	Brihanmumbai Electric Supply & Transport Undertaking
Capex	Capital Expenditure
CAGR	Compounded Annual Growth Rate
CGS	Central Generating Sector
CoS	Cost of Supply
DPR	Detailed Project Report
EA 2003	Electricity Act, 2003
FAC	Fuel Adjustment Cost
FY	Financial Year
GFA	Gross Fixed Assets
GOM	Government of Maharashtra
HPCL	Hindustan Petroleum Corporation Limited
IDC	Interest During Construction
IOC	Indian Oil Corporation
IPP	Independent Power Producers
kVA	kilo-Volt Ampere
kW	kilo Watt
kWh	kilowatt hour
MCGM	Municipal Corporation of Greater Mumbai
MERC	Maharashtra Electricity Regulatory Commission
MERC Tariff Regulations	MERC (Terms and Conditions of Tariff) Regulations, 2005
MMRDA	Mumbai Metropolitan Regional Development Authority
MSPGCL	Maharashtra State Power Generation Company Limited
MSETCL	Maharashtra State Electricity Transmission Company Limited
MT	Metric Tonnes
MU	Million Units
MW	MegaWatt
MYT	Multi Year Tariff

Page 6 of 185



O&M	Operations and Maintenance
ONGC	Oil and Natural Gas Corporation Limited
PLF	Plant Load Factor
PPA	Power Purchase Agreement
RInfra	Reliance Infrastructure Limited
R&M	Repair and Maintenance
SBI PLR	State Bank of India Prime Lending Rate
SoP	Standards of Performance
TPC	The Tata Power Company Limited
TVS	Technical Validation Session
WDV	Written Down Value



1 BACKGROUND AND BRIEF HISTORY

The Tata Power Company Limited (TPC) is a company established in 1919. On April 1, 2000, the Tata Hydro-Electric Power Supply Company Limited (established in 1910) and The Andhra Valley Power Supply Company Limited (established in 1916), were merged into TPC to form one unified entity.

1.1 MERC TARIFF REGULATIONS

The Commission, in exercise of the powers conferred by the EA 2003, notified the Maharashtra Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2005, (hereinafter referred as the MERC Tariff Regulations) on August 26, 2005. These Regulations superseded the MERC (Terms and Conditions of Tariff) Regulations, 2004.

1.2 MERC ORDER ON ARR AND TARIFF PETITION FOR FY 2005-06 AND FY 2006-07

TPC submitted its ARR and Tariff Petition for FY 2006-07 for its vertically integrated operations comprising Generation, Transmission and Distribution Businesses (Case No. 12 of 2005 and 56 of 2005) on February 9, 2006. After two Technical Validation Sessions (TVS), the Commission directed TPC vide its letter dated May 4, 2006 to submit its revised ARR and Tariff Petition for FY 2006-07 including a separate section on truing up of ARR for FY 2005-06. TPC submitted its revised ARR and Tariff Petition for FY 2006-07 on May 16, 2006. The Commission admitted the ARR Petition of TPC for FY 2005-06 (Case No. 12 of 2005) and ARR and Tariff Petition of TPC for FY 2006-07 (Case No. 56 of 2005) on May 18, 2006. The Commission issued the Order on the ARR Petition of TPC for FY 2005-06 and ARR and Tariff Petition of TPC for FY 2006-07 on October 3, 2006.

1.3 REVIEW PETITION ON TARIFF ORDER FOR FY 2006-07

TPC filed a Review Petition (numbered as Case No. 47 of 2006) against the Commission's Order dated October 3, 2006, in the matter of TPC's ARR and Tariff Petition for FY 2005-06 and FY 2006-07 before the Commission. The Commission disposed of the Review Petition by issuing an Order dated March 22, 2007. TPC

Page 8 of 185



appealed (Appeal No. 60 of 2007) against the Commission's Order on the Review Petition filed by TPC, before the Hon'ble Appellate Tribunal for Electricity (ATE). The Appellate Tribunal issued its Judgment on TPC's Appeal on May 12, 2008. The Appellate Tribunal remanded the matter back to the Commission and the Commission under its APR Order dated May 26, 2008 in Case No. 67 of 2007 observed that the ARR be revised in the light of the ATE's directions and that the impact shall be taken into account during the next truing-up exercise. Accordingly, the Commission directed TPC to submit the impact of the ATE's Judgment on the ARR of each business separately, viz., TPC-G, TPC-T and TPC-D, and also to propose the method of recovery of the impact through revision in tariffs, along with its Petition for Annual Performance Review for FY 2008-09. TPC-D has estimated the impact of the aforesaid Judgment delivered by the ATE on TPC-D, which has been discussed separately in this Order.

1.4 MERC ORDER ON MYT PETITION FOR TPC-D FOR FY 2007-08 TO FY 2009-10

TPC-D submitted its ARR and Multi Year Tariff (MYT) Petition for the first Control period from FY 2007-08 to FY 2009-10 for its Distribution Business on January 15, 2007 numbered as Case No. 70 of 2006. The Commission issued the MYT Order for TPC-D for the first Control Period, i.e., FY 2007-08 to FY 2009-10, on April 24, 2007, which came into effect from May 1, 2007, and the tariffs were valid upto March 31, 2008, which was later extended till the revised revenue requirement was determined for FY 2008-09, vide the Commission's Order dated April 1, 2008, in Case No. 102 of 2007.

1.5 MERC ORDER ON APR PETITION FOR TPC-D FOR FY 2007-08 AND TARIFF DETERMINATION FOR FY 2008-09

TPC-D submitted its Petition for Annual Performance Review (APR) for FY 2007-08 and Tariff Determination for FY 2008-09 for its Distribution Business on November 30, 2007 numbered as Case No. 69 of 2007. The Commission issued the APR Order for TPC-D on June 4, 2008, which came into effect from June 1, 2008, and the tariffs were initially valid upto March 31, 2009, which was later extended till the revised revenue requirement is determined for FY 2009-10, vide the Commission's Order dated April 15, 2009 in Case No. 152, 153 and 154 of 2008. TPC-D has appealed against the Commission's Order on the APR for FY 2007-08 and determination of *Page 9 of 185*



tariff for FY 2008-09 before the ATE. The ATE's decision on TPC-D's Appeal is awaited.

1.6 REVIEW PETITION ON ORDER ON APR FOR FY 2007-08 AND TARIFF DETERMINATION FOR FY 2008-09

TPC-D filed a Review Petition against the Commission's Order on APR for FY 2007-08 and Tariff Determination for FY 2008-09. The Commission vide Order dated February 2, 2009 (Case No. 46 of 2008) upheld most of the contentions raised in TPC-D's Review Petition and clarified that any impact of the same shall be taken into account by the Commission in its Order on TPC-D's Petition for APR for FY 2008-09 and tariff determination for FY 2009-10.

1.7 PETITION FOR ANNUAL PERFORMANCE REVIEW FOR FY 2008-09 AND TARIFF DETERMINATION FOR FY 2009-10

In accordance with Regulation 9.1 of the MERC Tariff Regulations, an Application for the determination of tariff is required to be made to the Commission not less than 120 days before the date from when the tariff is intended to be made effective. Further, the first proviso to Regulation 9.1 of the MERC Tariff Regulations provides that the "date of receipt of application for the purpose of this Regulation shall be the date of intimation about receipt of a complete application in accordance with Regulation 8.4 above." The Commission had directed TPC-D to submit the Petition for APR latest by 30th November of each year in accordance with Regulation 9.1 of the MERC Tariff Regulations.

TPC-D submitted its Petition for truing up for FY 2007-08, APR for FY 2008-09 and tariff determination for FY 2009-10 for its Distribution Business on December 4, 2008, based on actual audited expenditure for FY 2007-08, actual expenditure for first half of FY 2008-09, i.e., from April to September 2008, and revised estimated expenses for October 2008 to March 2009, and projections for FY 2009-10. TPC-D, in its Petition, requested the Commission to:

 Accept the Annual Performance Review and Tariff Petition for TPC-D in accordance with the guidelines outlined in the Commission's Orders passed in various matters relating to TPC-D and the principles contained in MERC Tariff Regulations;

Page 10 of 185



- Include the impact of the Order, on the Review Petition filed by TPC-G in May 2008 on the Tariff Order dated April 2, 2008.
- Include the impact of the Order, on the Review Petition filed by TPC-D in July 2008 on the Tariff Order dated June 4, 2008.

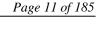
The Commission, vide its letter dated December 26, 2008, forwarded the preliminary data gaps and information required from TPC-D. TPC-D submitted its replies to preliminary data gaps and information requirement on January 9, 2009.

The Commission scheduled a Technical Validation Session (TVS) on TPC-D's Petition for approval of APR for FY 2008-09 and Tariff for FY 2009-10, on January 13, 2009 in the presence of Consumer Representatives authorised on a standing basis under Section 94(3) of the EA 2003 to represent the interest of consumers in the proceedings before the Commission. The list of individuals, who participated in the TVS, is provided at **Appendix-1**. During the TVS, the Commission directed TPC-D to provide additional information and clarifications on the issues raised during the TVS. The Commission also directed TPC-D to submit the draft Public Notice in English and Marathi in the format prescribed by the Commission.

1.8 ADMISSION OF PETITIONS AND PUBLIC PROCESS

TPC-D submitted its responses to the queries raised during the TVS, on February 18, 2009, and the Commission admitted the APR Petition of TPC-D on February 20, 2009.

In accordance with Section 64 of the EA 2003, the Commission directed TPC-D to publish its APR Petition in the prescribed abridged form and manner, to ensure public participation. The Commission also directed TPC-D to reply expeditiously to all the suggestions and objections received from stakeholders on its Petition. TPC-D issued the Public Notice in newspapers inviting suggestions and objections from stakeholders on its APR Petition. The Public Notice was published in The Times of India (English), Indian Express (English), Loksatta (Marathi) and Samana (Marathi) newspapers on February 24, 2009. The copies of TPC-D's Petitions and its summary were made available for inspection/purchase to members of the public at TPC's offices and on TPC's website (www.tatapower.com). The copy of Public Notice and Executive Summary of the Petition was also available on the website of the Commission (www.mercindia.org.in) in downloadable format. The Public Notice



specified that the suggestions and objections, either in English or Marathi, may be filed in the form of affidavit along with proof of service on TPC.

The Commission received written suggestions and objections on various issues. The Public Hearing was held in Mumbai on March 24, 2009 at 11:00 hours at Vista Hall, 30th Floor, Centre 1, World Trade Centre, Cuffe Parade, Mumbai-400 005. The list of objectors, who participated in the Public Hearing, is provided in Appendix- 2.

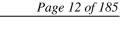
The Commission has ensured that the due process as contemplated under law to ensure transparency and public participation was followed at every stage meticulously and adequate opportunity was given to all the persons concerned to file their say in the matter.

Though a common Public Hearing was held for processing the APR Petitions for FY 2008-09 and determination ARR and tariff for FY 2009-10 filed by TPC-G (numbered as Case No. 111 of 2008), TPC-T (numbered as Case No. 112 of 2008) and TPC-D (numbered as Case No. 113 of 2008), the Commission is issuing separate Orders on the three Petitions filed by TPC. This Order deals with the truing up for FY 2007-08, Annual Performance Review of FY 2008-09 and tariff determination of TPC-Distribution Business for FY 2009-10. Various suggestions and objections that were raised on TPC-D's Petition after issuance of the Public Notice both in writing as well as during the Public Hearing, along with TPC's response and the Commission's rulings have been detailed in Section 2 of this Order.

1.9 ORGANISATION OF THE ORDER

This Order is organised in the following six Sections:

- **Section 1** of the Order provides a brief history of the quasi-judicial regulatory process undertaken by the Commission. For the sake of convenience, a list of abbreviations with their expanded forms has been included.
- Section 2 of the Order lists out the various suggestions and objections raised by the objectors in writing as well as during the Public Hearing before the Commission. The various suggestions and objections have been summarized, followed by the response of TPC and the rulings of the Commission on each of the issues.



- Section 3 of the Order details the truing up of expenses and revenue of TPC-D for FY 2007-08, including sharing of efficiency gains/losses due to controllable factors.
- Section 4 of the Order comprises the Review of Performance for FY 2008-09, covering both physical performance and expenditure heads. This Section also comprises the Commission's analysis on various components of aggregate revenue requirement of TPC-D for FY 2009-10.
- **Section 5** of the Order comprises the Tariff Philosophy adopted by the Commission and the category-wise tariffs applicable for FY 2009-10.

2 OBJECTIONS RECEIVED, TPC's RESPONSE AND COMMISSION'S RULING

There were some objections that were common to TPC's different Business, and some objections and comments raised specifically in the context of the APR Petition filed by TPC-D, which have been summarised issue-wise in this Section.

2.1 PROCEDURAL ISSUES

Electrical Contractors' Association of Maharashtra (ECAM) submitted that that the Commission should follow the principle laid down under Para 5.0 (h) (3) of the Tariff Policy (TP) notified on January 1, 2006 for determination of tariff. ECAM submitted that as per TP, under Multi Year Tariff (MYT) regime, the tariff should be revised only at the end of the Control Period.

TPC-D's Response

TPC has not responded to this objection.

Commission's Ruling

As regards determination of tariff on annual basis, the Commission in its MYT Order for TPC-D dated April 2, 2007 in Case No. 71 of 2006, has approved the Aggregate

Page 13 of 185



Revenue Requirement for TPC-D for the Control Period from FY 2007-08 to FY 2009-10. Regulation 20.1 of the MERC (Terms and Conditions of Tariff) Regulations, 2005, specifies that tariff will be determined on an annual basis. Accordingly, the Commission had approved the pooled transmission tariff for the State of Maharashtra, by combining the Revenue Requirement of TPC-D, RInfra-T and MSETCL for FY 2008-09, through its Order dated May 31, 2008 in Case No. 104 of 2007. Hence, the Commission in this Order is approving the revenue requirement of TPC-D stations for FY 2009-10.

As regards Para 5.0 (h) (3) of the Tariff Policy (TP), it stipulates as under:

"Once the revenue requirements are established at the beginning of the control period, the Regulatory Commission should focus on regulation of outputs and not the input cost elements. At the end of the control period, a comprehensive review of performance may be undertaken."

Hence, the Commission is of the view that the provisions of the Tariff Policy referred to by ECAM does not stipulate that the tariff cannot be determined on an annual basis.

2.2 INTEREST RATE

Millowner's Association (MA) submitted that TPC has raised a loan from IDBI at an interest rate of Bank Prime Lending Rate (BPLR) minus 2.76%, and from IDFC at an interest rate of benchmark rate plus 1.45%, subject to a minimum of 8.9%. MA submitted that the average interest rate was around 11.53% and 13% for IDBI and IDFC, respectively. MA suggested that TPC should borrow funds for capital expenditure from Financial Institutions, which would offer most favourable rates of interest.

Association of Hotels and Restaurants (AHAR) submitted that there should be no need to raise any loan from IDBI, IDFC or any other Financial Institution, when TPC has shown significant Reserves and Surplus in its Books of Accounts and also Rs. 2039 Crore has been lent as loans and advances. AHAR also submitted that seeking payment of interest on long-term funds and working capital funded by internal funds is illegal, as these are neither expenses recognised under the Income Tax Act, 1961 nor ethical as per Accounting Norms and are also against the public interest.



Page 14 of 185

TPC-D's Response

TPC submitted that it has always endeavoured to contract for loans at the most optimum cost and has also passed on the benefit of such costs to the consumers.

TPC submitted that the need for raising any loan arises when there is a requirement of funds for capital expenditure. The actual reserves and surplus and the dividend payment in the past has no direct bearing on the loan that is required to be raised. TPC further submitted that if internal funds are used, it would amount to higher costs being passed on to the consumers, since the Return on Equity is higher than the interest on the loan. Similarly, the Interest on Working Capital has been claimed in accordance with the norms stipulated by the Commission. TPC further submitted that therefore, the claim of the objector that these expenses are disallowed by the Income Tax Act, 1961 and not ethical as per Accounting Norms is incorrect and baseless.

Commission's Ruling

The Commission has addressed the issues related to interest rate under Section 4 of the Order, while analysing the various components of the Annual Performance Review and Aggregate Revenue Requirement for FY 2008-09 and FY 2009-10 respectively. On the issue of utilising reserves and surplus for capital investments instead of availing loans from the market, the Commission would like to clarify that as per the provisions of MERC Tariff Regulations, the equity investment is permissible upto a maximum of 30% of Capital Investment. In case the Utility funds the entire investment from internal accruals (reserves), the Commission considers the equity contribution in excess of 30% as normative debt and allows the interest on normative basis.

2.3 INCOME TAX

AHAR submitted that Income Tax is not a cost but a tax on income, and the Income Tax Act does not allow for Income Tax paid to be recovered from the public. The consumers of TPC are being made to pay Income Tax of TPC, which is an illegitimate cost and should be disallowed.

TPC-D's Response

Page 15 of 185

MERC, Mumbai

TPC submitted that the Income Tax as claimed by TPC is in accordance with the Tariff Regulations notified by the Commission and it has not deviated from the Tariff Regulations for recovery of such amount.

Commission's Ruling

In this regard, the income tax has been allowed as per the MERC Tariff Regulations, as elaborated in Sections 3.9 and 4.12 of this Order.

2.4 RETURN ON EQUITY

AHAR submitted that the total equity capital of TPC in the last 90 years of its existence is only Rs. 220 Crore, whereas in the last five years alone, the equity shareholders have been paid a dividend of more than Rs. 885 Crore. Further, the Commission has allowed recovery of Rs. 232 Crore as Return on Equity in FY 2009-10. This recovery is illegitimate, against all accounting norms and against the definition of Cost and Expense as per Income Tax Act.

TPC-D's Response

TPC submitted that AHAR has referred to the equity capital from the Balance Sheet of TPC, while completely disregarding the reserves and surplus shown there. TPC further submitted that in any case, Return on Equity is payable to TPC based on the Regulatory Equity as approved by the Commission, which in turn is determined in accordance with the various provisions of the Tariff Regulations, and therefore, the question of such recovery being illegitimate does not arise. TPC further clarified that the dividend has been paid to the shareholders not solely out of the profits generated from Licensed Area business, but also from the profits generated from the other business of TPC.

Commission's Ruling

The Return on Equity (RoE) is being considered as a part of the aggregate revenue requirement and has been computed in accordance with the MERC Tariff Regulations. As per the provisions of Tariff Regulations, Return on Equity is allowed

Page 16 of 185



on opening balance of equity invested in the Gross Fixed Assets and 50% of the equity portion of assets capitalised during the year. It is clarified that the RoE is allowed on the Regulated Equity, i.e., the equity as computed by the Commission in accordance with the MERC Tariff Regulations, and not on the actual equity or reserves available with the Company.

2.5 ADVERTISEMENT EXPENSES

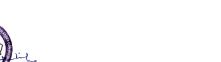
Western India Glass Manufacturers' Association submitted that the Advertisement (Public Notice) of more than 2 pages in newspapers is an avoidable expenditure and a quarter page advertisement with a note to contact TPC or visit its website for further details may also serve the purpose.

TPC-D's Response

TPC submitted that it is in agreement with the suggestion for reducing the size of the advertisement, thereby reducing the expenditure incurred on the 'Public Notice' Advertisement significantly. The MERC (Conduct of Business) Regulations, 2004, specify that the Public Notice may be printed in two English and two Marathi newspapers. However, the content can be reduced to optimize the cost while making available all the information stipulated by the Commission on TPC's website.

Commission's Ruling

The Commission does not agree with TPC-D's response; it should strive to economise on operational and other costs, which are more significant than this one time 'cost' where it has to communicate with its consumers and stakeholders. In accordance with the provisions of the MERC (Conduct of Business) Regulations 2004, the Public Notice has to be issued in a minimum two English and Marathi newspapers. The objective of issuing the Public Notice is that the affected stakeholders are put to notice that the Commission has admitted the APR Petition submitted by the Utility for its consideration, under which it has sought the Commission's approval for revision in the tariffs, and provide basic information about the Petition, to enable the stakeholders to submit their say in the matter, if desired.



Page 17 of 185

2.6 SHARING OF GAIN/LOSSES

AHAR submitted that the Company benefits as it earns more revenue due to better efficiency in generation, transmission, operation, management and reduction in T&D losses and asked TPC to submit the reasons for passing on the impact of such efficiency and inefficiency to the consumers.

TPC-D's Response

TPC submitted that the sharing of gains and loss has been considered in accordance with the MERC Tariff Regulations and clarified that TPC-D has proposed to pass on the share of the gains to the consumers, in its Petition.

Commission's Ruling

In accordance with the MERC Tariff Regulations, the sharing of gains and losses is to be carried out at the end of the year based on the actual performance for the entire year. Accordingly, in this Order, the Commission has determined the sharing of gains and losses on account of controllable factors for FY 2007-08, under the truing up exercise, as detailed in Section 3.9. This will address the concerns expressed by AHAR within the boundaries of the Regulations.

2.7 SHARING OF GAINS ON ACCOUNT OF O&M EXPENDITURE IN FY 2007-08

RInfra submitted that, as per the APR Petition of TPC-D, the primary reason for lower employee expenses for FY 2007-08 against that approved in the previous APR Order of the Commission is higher attrition of employees, which is attributable to increasing demand of professionals and skilled persons in the industry, which has further resulted in deferment of planned activity under Repair and Maintenance expenses. In view of this, RInfra submitted that the reduction in employee cost and R&M costs should not be considered as efficiency gains.

TPC-D's Response

TPC submitted that it has claimed gains on account of O&M expenditure as per provisions of the MERC Tariff Regulations and as per the treatment given for sharing of gains by the Commission. TPC added that this claim was on the basis of actual Page 18 of 185



expenditure and neither MERC Tariff Regulations nor the Commission's philosophy in other Orders preclude TPC-D from claiming such gains on the ground that such expenditure is deferred. TPC added that despite the lower O&M expenditure, the performance of the transmission system has not been compromised and thus, TPC-D is entitled to a share of the efficiency gains.

Commission's Ruling

O&M expenditure is being treated as a controllable expenditure under the multi-year tariff regime, unless any particular component can be considered as un-controllable, subject to prudence check. Thus, the sharing of such efficiency gains or losses on account of variation of such controllable parameters from the Order values will have to be treated in accordance with the MERC Tariff Regulations during annual performance review.

2.8 KNOWLEDGE OF TPC'S RIGHT TO DISTRIBUTE POWER

Shri Prasad Ayare and others submitted that the consumers were not aware of TPC's right to distribute power in Mumbai city, and hence, the consumers were not able to exercise their right to choose their electricity supplier.

TPC-D's Response

TPC-D submitted that the TPC's right to distribute power in Mumbai city has been highlighted in the media quite significantly time and again and hence, the objection cannot be held as relevant.

Commission's Ruling

TPC-D should ensure wide publicity periodically to communicate to all categories of consumers in its entire licence area that they can approach TPC-D for availing supply, detailing the procedure and contact addresses, ward-wise, etc., for going about the process of submitting applications, etc.

Page 19 of 185



2.9 DISTRIBUTION LOSS

Reliance Infrastructure Limited (RInfra) submitted that TPC-D, in its Petition, has stated that the Distribution Loss for FY 2007-08 is 0.66%, which is very low even after considering voltage-wise sales, length of network, metering points, etc., and therefore, requested the Commission to direct TPC-D to submit technical loss study report as any incorrect computation of Distribution Losses would get reflected in higher Transmission Losses and thus become part of the Intra-State Transmission System (InSTS) losses, which would be eventually allocated to all Transmission System Users (TSU), which in effect would mean transferring distribution loss of one Distribution Licensee to other Distribution Licensees at Weighted Average System Marginal Price (WASMP).

RInfra also submitted that TPC-D, in its Petition, has considered Distribution Loss of 2.93% for FY 2009-10, which is substantially higher than actual Distribution Loss of 0.66% for FY 2007-08, though TPC-D has not forecasted any substantial change in the consumer sales-mix in FY 2009-10, and suggested that the Distribution Loss should be considered at realistic levels.

TPC-D's Response

TPC-D submitted that it has submitted the computation of the distribution loss for the second half of FY 2007-08, based on metering data. As regards RInfra's request regarding technical loss study report, TPC-D submitted that there is no reason for submitting a technical loss study report; however, it awaits further direction from the Commission in this regard.

TPC-D submitted that the Distribution Loss of 0.66% for FY 2007-08 has been arrived at using the data for six months only as against the data of many years as available with BEST and RInfra-D, based on which a realistic projection of Distribution Loss could be made. TPC-D added that the impact of the enhanced distribution network, increased number of consumers and changing mix, on the Distribution Loss is quite difficult to compute. TPC-D further submitted that it would be incorrect to assume that the existing loss levels would be representative of future loss levels after having a fully developed distribution network. In view of this, TPC-D submitted that it has considered a normative Distribution Loss of 2.93% as approved by the Commission in its MYT Order for FY 2007-08 to FY 2009-10.

Page 20 of 185



Commission's Ruling

As regards the need for submitting a technical loss study report, the Commission is of the view that the technical loss study would need to be undertaken once the distribution network is expanded, as even the T< >D interface metered data has only just started being compiled. As regards the Distribution Loss to be considered for FY 2009-10, the Commission has considered Distribution Loss of 0.66% for computing the energy input requirement of TPC-D for FY 2009-10 and has deliberated on this issue in detail in Section 4.1.1 of this Order.

2.10 EFFICIENCY GAINS

As regards computation of efficiency gains on the savings in power purchase cost on account of difference in Distribution Losses between 2.93% (the Commission approved level) and 0.66% as actually claimed by TPC-D during the period October 2007 to March 2008, RInfra submitted that this difference is merely a correction in loss levels and is not on account of any loss reduction initiatives undertaken by TPC-D. RInfra requested the Commission to institute an Energy Audit of TPC's T< >D interface points through an independent agency.

TPC-D's Response

TPC-D quoted Para 5.2 of the MYT Order dated April 30, 2007 for TPC-D and submitted that the Commission had approved the Distribution Loss level of 2.93% for FY 2007-08. TPC-D added that there were no conditions attached by the Commission for considering the Distribution Loss for FY 2007-08. TPC-D submitted that in its opinion, mere discovery of the Distribution Loss being low at 0.66% cannot deprive it of the share of gains arising there from. As regards the Energy Audit, TPC-D submitted that it awaits the Commission's instructions; however, TPC-D suggested that such Energy Audit should be carried out for all the Distribution Licensees in State of Maharashtra in an open and transparent manner where other Distribution Licensees could also participate in the process.

Commission's Ruling

As regards the treatment of the actual Distribution Loss for computing the efficiency gains for FY 2007-08, the Commission has deliberated in detail on this issue in

Page 21 of 185



Section 3.16 of this Order on Sharing of Gains and Losses for FY 2007-08. As elaborated therein, the Commission has not computed any efficiency gains and losses on account of distribution losses being discovered at 0.66% for the second half of FY 2007-08.

As regards the need for undertaking an Energy Audit of TPC-D's T< >D interface points, the Commission may, if required, institute an independent third-party audit for all Distribution Licensees.

2.11 DISTRIBUTION NETWORK ROLL OUT PLAN AND RELEASE OF NEW CONNECTIONS

Shri Prasad Ayare and others submitted that TPC-D is not accepting/processing applications for new connection from low end consumers.

RInfra submitted that TPC-D's reply that the new connections have been released only where existing network of TPC-D is available indicates that TPC-D is not accepting and processing applications for new connections in areas where its distribution network is presently non existent. RInfra submitted that the MERC (Standards of Performance of Distribution Licensees, Period of Giving Supply and Determination of Compensation) Regulations, 2005 provide sufficient time for Distribution Licensees to extend distribution mains for the purpose of supply. RInfra submitted that the application for new connections coming from any area should be accepted and supply should be given to consumers in accordance with the time frame specified in the SoP Regulations, and supply extension should not be restricted to consumers in areas where the distribution network exists.

RInfra submitted that TPC-D's Network Roll-out Plan to expand its distribution network shows that all new substations have been planned to be erected only in RInfra-D's licence area, while no such extension has been planned in BEST licence area. RInfra added that in reply to the query raised by the Commission regarding the Network Roll-out Plan, TPC-D has submitted that it has initiated the Roll-out Plan from RInfra-D's licence area and would eventually cover BEST licence area as well. RInfra-D further submitted that considering the equal access to T< >D interface, selective servicing of the supply extension obligation planned by TPC-D would be in contravention to the Electricity Act, 2003 and the Regulations framed there under including General and Specific Conditions of TPC-D's Distribution Licence.

Page 22 of 185



RInfra-D further submitted that the list of 158 numbers of applicants submitted by TPC-D and the statement by TPC-D that it would expand in areas with existing network clearly reflects selective rather than universal service obligation as required under the Electricity Act, 2003 and the Specific Conditions of the Distribution Licence and SoP Regulations.

Shri N. Ponrathnam representing Vel Induction Hardenings (VIH) requested the Commission to direct TPC-D to immediately make arrangements to supply to all consumers across Mumbai (including RInfra-D and BEST licence area).

TPC-D's Response

TPC-D denied that it has refused to accept applications for new connection from low end consumers or any other consumer for that matter. TPC-D submitted that it has been accepting all the completed applications.

As regards RInfra's contentions regarding TPC-D's Network Roll-out plan, TPC-D submitted that at the outset it challenged the locus standi of RInfra to comment on the said Roll-out Plan. TPC-D submitted that the plans or steps taken by it as a Distribution Licensee to expand its distribution network is predominantly aimed at serving the interest of its consumers (both existing and prospective) under the regulatory supervision and guidance of the Commission. TPC-D further submitted that RInfra is a direct competitor in the distribution business of TPC and not a consumer. Therefore, it has no locus to comment on the proposed roll out plan of TPC-D.

TPC-D added that RInfra being a competitor having an area of supply common to that of TPC-D, has a vested commercial interest in derailing the entire Roll-out Plan of TPC-D. TPC-D submitted that the comments of RInfra clearly disclose a strategy to force TPC-D to operate in an ad-hoc and haphazard manner, and not in accordance with any long-term plan. TPC-D submitted that RInfra had earlier initiated proceedings against TPC-D before the Commission in Case No. 14 of 2002 for restraining TPC-D from carrying out supply within its area of supply for consumers with maximum demand of less than 1000 kVA. The issue was finally set at rest by the Hon'ble Supreme Court vide its Judgment dated July 8, 2008, wherein it held that TPC is entitled to supply power to consumers directly within its licenced area of supply, which includes the area of supply of RInfra also. TPC-D submitted that due to this ongoing dispute, historically, it could not expand its distribution network to cater

Page 23 of 185



to all categories of consumers in its area of Licence. Accordingly, TPC-D's Roll-out Plan submitted to the Commission is aimed at establishing a distribution network, which is both efficient as well as cost effective.

As regards RInfra's contention regarding giving supply to consumers in accordance with the timelines specified under the SoP Regulations, TPC-D submitted that it would address the applications for new connections submitted by all consumers to the satisfaction of such consumers and the Commission. There is likely to be undue cost burden in trying to reach few consumers in an ad-hoc manner, both on those specific consumers as well as the consumers of TPC-D at large. TPC-D submitted that accordingly, it has already placed before the Commission, the detailed Roll-out Plan proposed to be implemented by TPC-D for its distribution network having regard to the requirement of ensuring a co-ordinated and economical development of its network, the capital expenditure involved for setting up such network, and the consequential cost implications in terms of impact on the tariff on existing consumers or charges for providing supply to be recovered from new consumers under Section 46 of the EA 2003. TPC-D submitted that having regard to the historical background of its distribution business in Mumbai, it has designed a roll out plan, to balance these important considerations in a manner, which protects the interest of its consumers.

TPC-D denied that it is not accepting and processing applications in areas where its network does not exist and further added that such accusations seems to be emanating only from RInfra. TPC-D submitted that during the TVS it clarified that it is processing all applications and planning in accordance with its roll out plan that has been submitted to the Commission for approval.

As regards RInfra's contention that all Distribution Licensees are well connected to the supply areas through the transmission system, TPC-D submitted that a gradual roll out over a period has been planned so as to avoid any selective or preferential treatment for any particular class/category of consumers. On the other hand in cases where TPC-D network is not available, the cost of ad-hoc installation of distribution mains, sub-stations, etc., would be on such far-flung consumers.

As regards RInfra's contention that the distribution network roll out plan reflects selective rather than universal service obligations, TPC-D submitted that such roll out plan is not at all selective and it also clarified to the Commission during the TVS that it is not only planning a roll out its network in the RInfra area of supply but would

Page 24 of 185



also gradually extend its network even to the licence area of BEST. TPC-D further submitted that once its network is rolled out in a particular Ward as per the roll-out plan, all consumers categories in such ward would be able to avail the benefit of its network without any discrimination. TPC-D further submitted that the very fact that it has proposed to extend its network in the area already covered under RInfra Licence, clearly shows that TPC-D is committed to roll out its net work in areas comprising various categories of consumers including residential and low tariff category of consumers.

Commission's Ruling

Section 43 of the Electricity Act, 2003 specifies the distribution licensee's duty to supply on request, within one month of the application being received. Further, in terms of the MERC (Specific Conditions of Distribution Licence applicable to The Tata Power Company Limited) Regulations, 2008, notified by the Commission on August 20, 2008, TPC-D has to comply with all the provisions of the EA 2003 as well as the MERC (General Conditions of Distribution Licence) Regulations, 2006, notified on November 28, 2006. Accordingly, the Commission directs TPC-D not to discriminate between various consumer categories while providing connections to new consumers, and ensure that the Universal Service Obligations are met. The Commission also directs TPC-D to submit quarterly status report of category-wise applications received for new connections and new connections released by TPC-D, to the Commission. Further, TPC-D should ensure wide publicity periodically to communicate to all categories of consumers in its entire licence area that they can approach TPC-D for availing supply, detailing the procedure and contact addresses, ward-wise, etc., for going about the process of submitting applications, etc.

As stated above, TPC-D has proposed a roll-out plan covering only 9 Wards, primarily overlapping with the licence area currently being served primarily by Reliance Infrastructure Limited – Distribution Business (RInfra-D), and no roll out plan has been proposed for the Wards being served primarily by the BEST till FY 2011-12, except one Ward at Wadala. TPC-D will have to meet its licence obligations in its entire licence area, and cannot pick and choose the Wards wherein it will supply electricity. Moreover, incurring heavy capital expenditure for the network roll-out is not the only option available to TPC-D in its efforts to supply electricity to different consumers in its licence area, and the provisions of the EA 2003 relating to Open

Page 25 of 185



Access and the provisions of the MERC (General Conditions of Distribution Licence) Regulations, 2006 relating to use of the distribution network of another distribution licensee, need to be explored by TPC-D, so that the cost is optimised. The Honourable Supreme Court also, in its Judgment on the matter of TPC's distribution licence, observed that TPC could supply to consumers in its licence area, by utilising the distribution network of the other distribution licensee already present in the area. Hence, incurrence of capex cannot be a condition for meeting the Licensee's obligations to all the consumers. In fact, the capital costs should be incurred only when there is no better optimal solution.

2.12 ALTERNATE SOURCE OF POWER

Central Railways submitted that if TPC-D's tariff for Railways cannot be reduced, then the Commission should at least help Railways to make sourcing of power from alternate sources to be a feasible option.

TPC-D's Response

TPC-D submitted that it is the endeavour of TPC-D to provide power at the most economical rates. It may be appreciated that while the proposed tariff hike is mainly on account of past amounts due to TPC-D to the extent of Rs. 375 crore, TPC-D has deferred the recovery of almost Rs.143 crore to subsequent years.

Commission's Ruling

As detailed in Section 5.4 of this Order on Tariff Philosophy, the Commission has reduced the tariff applicable for most tariff categories, including Railways. Further, the wheeling charges and wheeling losses have also been further rationalised, as elaborated in Section 5.6 of this Order.

2.13 STANDBY CHARGES

Millowners Association submitted that TPC-D is paying Rs. 65 crore to the Maharashtra State Electricity Distribution Company Ltd. (MSEDCL), however, the visible impact of the payment of Standby Charges is not reflected in power tariff and requested TPC-D to explain the economics of Standby Charges and whether the consumers are adequately benefited or not. Excel Electric Industries (EEI) suggested that that Standby Charges needs to be assessed and the cost of Rs. 396 crore as

Page 26 of 185



insurance premium should be determined scientifically. Further, EEI objected to the standby charges payable by continuous process industries.

TPC-D's Response

TPC-D submitted that the standby charges are paid to MSEDCL to provide the power supply support in the event of shortage created due to outage of generation capacity in Mumbai area. This support ensures that there is availability of power even during shortages caused by such events. TPC-D submitted that this increases the reliability of power supply to the city. In case there is no standby support and if the Mumbai Distribution Licensees are unable to procure power at the time when the generating Unit is on outage, it may result in load shedding in Mumbai. TPC-D further submitted that it may be difficult to assess the benefit of Standby power as it is difficult to assign a value for the benefit of prevention of loss of power or load shedding.

As regards the suggestion regarding the computation of Standby Charges, TPC-D submitted that it agrees that such charges need to be arrived at scientifically considering the actual cost of providing such standby.

Commission's Ruling

For the purposes of this Order, the Commission has considered the Standby Charges in accordance with the philosophy adopted in the MYT Order and the APR Order, and has accordingly allocated the Standby Charges for FY 2009-10 between the three Distribution Licensees in Mumbai in proportion to the coincident peak demand for the last one year, i.e., for the period from October 2007 to September 2008. As regards the need for standby arrangement, the Commission will look into this matter separately, as there are certain matters pending before the Commission and the higher Courts in this regard.

2.14 EXPENSES FOR FY 2008-09 AND FY 2009-10

Electrical Contractor's Association of Maharashtra (ECAM) submitted that the increases in expenses viz., employee expenses, A&G expenses, interest on long-term loan, income tax, Return on Equity, and allocation of Load Control Centre (LCC) costs, are not rational when compared to increase in sales and revenue and therefore, requested the Commission to disallow the increase in expenses.

Page 27 of 185



TPC-D's Response

TPC-D submitted that it has provided appropriate reasoning for the increase in expenditure wherever relevant. TPC-D further added that there has been a change in the status of TPC-D's distribution business subsequent to the Honourable Supreme Court's Judgment on its Distribution Licence. TPC-D submitted that it needs to develop its infrastructure and manpower requirements to serve the expected increase in its consumer base. As regards the allocation of LCC expenditure, TPC-D submitted that this being only a shifting of expenditure, which was previously allocated to the Transmission Business and was being charged to the Distribution Business as a component in the Transmission Charges payable. The same has been deducted from the Revenue Requirement of the Transmission Business.

Commission's Ruling

The Commission has deliberated on each of the above elements of the ARR in the relevant sub-sections of Section 4 of this Order.

2.15 OPERATION AND MAINTENANCE EXPENSES

Electrical Contractor's Association of Maharashtra (ECAM) submitted that the actual O&M expenses during FY 2007-08 represent a phenomenal jump over approved O&M expenses during FY 2007-08 mainly because of MCGM/MMRDA reinstatement charges. ECAM further submitted that all the Distribution Licensees should take up this issue with the State Government and the Commission should support the Licensees for keeping tariff affordable to the general public. ECAM added that in case MCGM is not ready to reduce charges, the Licensee should fix separate tariff for MCGM, viz., its street lights, Pump house, etc., to compensate for reinstatement charges.

Central Railways submitted that increase in R&M expenditure of Rs. 4 crore should be disallowed as the reasons for this increase like diversion of cables on account of concretisation of roads and increased cost due to patrolling activity is part of normal O&M activity.

TPC-D's Response

Page 28 of 185



TPC-D submitted that Mumbai has been witnessing increased level of infrastructure projects, which require frequent diversion of cables. Further, in order to prevent interruption of supply to consumers and to ensure reliability, patrolling of cable routes is imperative. This patrolling also helps to prevent cable faults/accidents on account of excavation work carried out by various agencies. TPC-D submitted that it has provided all the detailed reasons for the consideration of the Commission. Further, the O&M expenditure allowed by the Commission in FY 2007-08 was based on the past trend factoring compensation only for inflation and does not factor increase in costs on account of increase in fees by statutory agencies such as Reinstatement Charges, way leave fees, etc. Any additional expenditure on account of uncontrollable factors needs to be part of the approved costs. Hence, such costs need to be looked at, in addition to approved expenditure. TPC-D submitted that apart from the submissions in its APR Petition, it has also provided its response to various queries as part of the replies to the data gaps/queries raised by the Commission before and after the TVS and the same has also been included as part of the revised submissions made available to the Public.

TPC-D submitted that it is in agreement with the concern related to the increase in the reinstatement charges being levied by MCGM/MMRDA. TPC-D submitted that this is a substantial cost to all Utilities and needs to be addressed at appropriate forums and also requested the Commission to recommend to the State Government/concerned Agencies for a need to review the same.

Commission's Ruling

The Commission has deliberated on this issue in detail in Section 4.6 of this Order. The Commission is concerned with the rise in O&M expenses projected by the Utilities. Even though the O&M expenses have been approved by the Commission for each year of the Control Period in the MYT Order, wherein, by and large, the Utility's projections have been accepted, most Utilities have projected significant further annual increase in the O&M expenses for each year in the Control Period. If this increase in O&M expenses is allowed as sought by the Utilities, then the MYT framework created by the MERC in its MYT Orders will have no sanctity. Hence, the Commission rules that for FY 2008-09 and FY 2009-10, the O&M expenses allowed by the Commission for FY 2007-08 under the final truing up for FY 2007-08, after considering the base as audited expenses for FY 2006-07, will be considered as the base and increase will be allowed strictly as per the CPI/WPI growth as applicable, *Page 29 of 185*



which incidentally, is higher than the growth rate projected by the Utilities in their respective original Petitions.

The Commission has also disallowed the charging off of deposits paid to MCGM/MMRDA to the extent of Rs.2.75 crore, as these are refundable deposits, rather than revenue expenses, and hence, cannot be charged off as expenses in the ARR.

2.16 UNDER-RECOVERED FUEL ADJUSTMENT COST (FAC) OF PREVIOUS YEAR

ECAM submitted that the payment of under-recovered FAC of Rs. 73 crore is very high and is a one time payment, therefore, the tariff should not be increased on that account. ECAM suggested that though this amount is paid in this year, it can be spread over for future period of 10 to 15 years so that impact of increase in tariff is minimised.

TPC-D's Response

TPC-D submitted that it has already incurred 'cash expenditure' in the past periods and deferment of recovery of such expenditure would amount to increase in recoveries along with their carrying costs. TPC-D submitted that it has already proposed deferred recoveries of amounts due to TPC-D to the extent of Rs. 142 crore.

Commission's Ruling

The Commission had permitted TPC-G to recover the under-recovered FAC of Rs 327 crore for the period from April 2006 to September 2007, from the three Distribution Licensees, viz., BEST, RInfra-D and TPC-D, and the share of TPC-D worked out to Rs 72.52 crore. The same has been considered by the Commission under the truing up exercise, since this is a component of the ARR already allowed at the time of tariff determination for FY 2007-08.

2.17 Past Recoveries

Western India Glass Manufacturers' Association (WIGMA) submitted that the Revenue Gap in FY 2009-10 is mostly on account of past recoveries to the tune of Rs. 375 crore out of which TPC-D has proposed to recover Rs. 233 crore in FY 2009-10. WIGMA added that even the other recoveries of past years should be spread over a

Page 30 of 185



period of three years, which would reduce the quantum of other recoveries from Rs. 189 crore to Rs. 63 crore in FY 2009-10 and moderate the tariff increase by 5%.

TPC-D's Response

TPC-D submitted that it has already considered deferred recoveries of certain amounts in the Tariff Proposal so as to shield the consumers from tariff shocks, to the extent possible. Further, certain recoveries pertaining to FY 2008-09 are not proposed to be recovered through the tariff of FY 2009-10. TPC-D submitted that while the concern of the consumers was appreciated, deferring the recovery of all the past dues over three years may not be the most optimum solution. The recovery, if delayed, has an impact on the tariffs of the later years and also entails payment of interest on the under-recovered amount.

Commission's Ruling

The computation of aggregate revenue requirement of TPC-D for FY 2007-08, FY 2008-09 and FY 2009-10, including treatment of the past recoveries, has been elaborated in detail in Sections 3 and 4 of this Order.

2.18 FUEL ADJUSTMENT CHARGES

Vel Induction Hardenings (VIH) enquired regarding for the reason for levy of FAC by TPC-D. VIH also requested the Commission to disallow the levy of FAC on costly power purchase as there is no provision in the EA 2003 to increase tariff except once in a year (except cost variation in fuel) and FAC should be levied strictly in accordance with Regulation 82 of the MERC Tariff Regulations and relevant provisions of the EA 2003.

Central Railways submitted that Fuel Adjustment Cost (FAC) charge should only be a year-end exercise as part of truing up process.

TPC-D's Response

TPC-D submitted that the FAC recovery is done on the basis of the formula approved by the Commission in the Tariff Order and MERC Tariff Regulations, and the formula was finalised after due public process. Whenever the input price to TPC-D varies over the price approved in the Tariff Order, it results in FAC, which could be positive or negative. The FAC vetting is done on a quarterly basis by the Commission

Page 31 of 185



and detailed calculations are available on the Commission's website for the reference of the general public.

Commission's Ruling

The philosophy behind the Fuel Adjustment Cost (FAC) Charge has been elaborated in several Orders by the Commission, which is in accordance with Regulation 82 of the MERC Tariff Regulations, which stipulates:

"82.3 The FAC charge shall be computed and charged on the basis of actual variation in fuel costs relating to power generated from own generation stations and power procured during any month subsequent to such costs being incurred, in accordance with these Regulations, and shall not be computed on the basis of estimated or expected variations in fuel costs.

The Commission also approves the purchase from external/bilateral sources. Accordingly, the same is being considered for the computation of FAC charges. Since the power purchase costs are based on the prevailing fuel costs, the prevailing FAC is effectively equated to zero at the time of issue of the Tariff Order, and will come into effect in case there is a variation in the fuel prices (positive or negative) and the generators ask TPC-D to pay for the difference in fuel costs, which is a pass-through expense. The FAC is allowed to be recovered on a monthly basis, in accordance with the Formula stipulated in the MERC Tariff Regulations, and the FAC is vetted on a post-facto basis for each quarter. The detailed vetting reports are available on the Commission's website.

2.19 ELECTRICITY DUTY AND TAX ON SALE OF ELECTRICITY

WIGMA submitted that considering the slowdown in the economy, the Government of India has reduced Excise Duty and Service Tax at considerable loss of revenue and requested TPC-D to convey the request to Government of Maharashtra for reduction in Electricity Duty and Tax on Sale of Electricity (TOSE).

VIH submitted that there should not be differentiation in levy of TOSE or in Duty for different consumer categories and both may be included in energy charges and this Government's levy should be collected at source. The usage of electricity need not be taxed as the higher use of electricity would ultimately increase the growth of GDP.

Page 32 of 185



TPC-D's Response

TPC-D submitted that on the matter of reduction of such taxes and duties, it would not be able to opine on the same. Nevertheless, TPC-D assured that it will render all the help to the consumer that is required in this regard.

TPC submitted that the taxes and duties are being levied under various statutes passed by the Government of Maharashtra and the APR Petition submitted does not include such taxes and duties.

Commission's Ruling

The taxes and duties are not within the purview of the Commission, and the objectors may approach the appropriate forum for the necessary relief.

2.20 DETERMINATION OF TARIFF FOR DISTRIBUTION LICENSEE

VIH requested the Commission to determine the tariff of the Distribution Licensee only after determining the tariff for the Generation Company and Transmission Company.

TPC's Response

TPC has not submitted any reply to this.

Commission's Ruling

The ARR and tariff for the Distribution Licensees have been determined after considering the ARR and tariff determined for the Generation Companies and Transmission Licensees, since these form the input costs for the Distribution Licensees.

2.21 POWER PURCHASE AGREEMENT

Shri Rakshpal Abrol and others submitted that TPC-D should follow the MERC Tariff Regulations and should have entered into long-term Power Purchase Agreement with the approval of the Commission in the interest of competition and reliability of continuous supply of electricity to the consumers with less interruption.

Page 33 of 185



TPC's Response

TPC has not submitted any reply to this.

Commission's Ruling

The Commission has approved the Power Purchase Arrangement between TPC-G and TPC-D for 477 MW of TPC-G's generation capacity, vide its Combined Order in Case No. 86 of 2006, Case No. 87 of 2006 and Case No. 30 of 2007 dated November 6, 2007.

2.22 EXTERNAL PURCHASE

Association of Hotels and Restaurant (AHAR) and others submitted that TPC-D has purchased 194 MU of power at a cost of Rs. 167 crore. The external purchases was necessitated due to shutdown of Unit 7 and Unit 4 of TPC-G in H1 of FY 2008-09 but in H2 of FY 2008-09, the aforesaid Units are fully operational, there is additional power available from Unit-8 and there is lower offtake by BEST due to fall in demand. Hence, there would be no need to buy electricity from external sources for the ensuing year.

TPC-D's Response

TPC-D submitted that TPC-D is required to purchase the power of Rs 167 crore in FY 2008-09 due to the settlement mechanism prevailing in the State in which the power is purchased first and the excess (if any) from the quantum purchased is passed on the pool at the highest cost. If the power purchase quantum (given as 194 MU) is brought down, the pool sale would reduce correspondingly.

Commission's Ruling

The Commission has deliberated on this issue in detail in Section 4.5 of this Order. For FY 2009-10, after considering the power available from existing and new generating stations of TPC-G and RPS, the total power purchase quantum available to TPC-D works out to be higher than the energy input requirement, resulting in surplus energy of 547.31 MU and for estimating the power purchase cost for FY 2009-10 in this Order, the Commission has considered the average rate of Rs. 7.00/kWh for sale of this surplus power.

Page 34 of 185



2.23 TARIFF LINKED TO COST OF SUPPLY

Central Railways submitted that TPC-D's tariff should reflect the Cost to Serve. Central Railways added that Section 61 of the EA 2003 and Clause 8.3 of the Tariff Policy clearly specify that the tariff should reflect the Cost of Supply. Regulation 4.1 of MERC Tariff Regulations clearly specifies that determination of tariff shall be guided by the principles contained in Section 61 of the EA 2003.

Central Railways added that TPC should provide the details of the Cost to Serve different consumer categories including Railways and the manner in which the tariff of Railways is linked to the CoS incurred by TPC to supply electricity to the Railways. Central Railways submitted that the proposed demand charge at Rs. 180/kVA/month and the energy charge are unreasonable and high as compared to the charges being levied on Railways in other States. Central Railways submitted that tariffs to be charged to it should be determined considering the national interest served by it. Further, Central Railways requested that the Commission should fix a reasonable traction tariff based on the cost of power purchase from Central Generating Stations and proposed a tariff of Rs. 1.82/kWh.

Central Railways requested the Commission to continue the prompt payment incentive and power factor incentive, and suggested that load factor incentive should be provided for maintaining load factor higher than 50%. Central Railways further submitted that additional prompt payment discount of 0.50% for Electronic Clearing Services (ECS) being provided to residential consumers should also be extended to Central Railways.

Excel Electric Industries (EEI) submitted that load factor incentive should be applicable for 65% and above and 75% is an unreasonable figure. EEI added that this was already available for LT consumers in the past, which TPC-D has proposed to withdraw.

Millowners Association and others submitted that when inflation has come down to 2% and fuel prices have suffered a drastic reduction, then the reason behind the increase in tariff needs to be clarified.

VIH submitted that the Commission should comply with Section 62(3) of the EA 2003 and consider the Cost to Serve as the cost of electricity.

Page 35 of 185



TPC-D's Response

TPC-D submitted that in the previous Orders, the Commission and all the Utilities have been computing the extent of cross-subsidy with reference to the average Cost of Supply (CoS) for all the Distribution Licensees. The tariff proposed for Railways is Rs. 4.99 per kWh, compared with the average cost of supply of Rs. 6.12 per kWh. Thus, the tariff of Railways is 82% of average CoS. TPC-D further submitted that it has proposed a lower than average hike for Central Railways in the proposed tariff.

TPC submitted that the cost to serve each category of consumers has not been determined. At present, the Commission in its Tariff Order has considered the average cost for all the consumers and the tariff comparison has been made on the basis of such average cost. The previous Tariff Order indicates that there is a decrease in tariff with respect to average cost of supply.

As regards providing information on Cost to Serve, TPC-D submitted that it has submitted all the information to the Commission in the prescribed Formats and also submitted its replies to all the data gaps raised by the Commission. TPC-D submitted that the information on Cost to Serve for each category was not a part of the submissions and none of the other Utilities in Maharashtra have submitted this information along with the APR Petition.

TPC submitted that comparison and linking tariff to the cost of supply in incorrect on account of following:

- The tariff payable by the consumers does not comprise demand charge alone but includes various other charges such as a) Energy Charge, b) PF discount, c) ToD charges, etc. Therefore, for meaningful comparison, all the charges need to be considered.
- 2. The charges should be compared with the average tariff in that State/distribution area. In case the general tariff is low, the tariff to a particular category would be low.
- 3. Supply reliability requirement in Mumbai is much higher as Railway service is the lifeline of this city. The high reliability of service requirement also adds to the cost.

TPC-D further added that it does not agree to the contention that the Railways' tariff should be at par with the cost of power purchase by State Electricity Boards

Page 36 of 185



SEBs/Discoms from the Central Generating Sector (CGS) Stations. The tariff for each Utility is determined by the Commission in accordance with the provisions of the MERC Tariff Regulations and may vary on account of various factors such as the type of fuel used, location, additional power purchase requirements, etc. Hence, it would be grossly inappropriate to compare the tariffs of Mumbai based Utilities with that of CGS, who have significantly lower fuel costs on account of access to cheaper fuel, proximity to fuel sources amongst other advantages.

As regards the suggestion on the load factor incentive and incentive on ECS, TPC-D submitted that Commission may take view on Load Factor Incentive and ECS while keeping TPC-D revenue neutral.

Commission's Ruling

The Commission has retained the prompt payment incentive and power factor incentive at the existing levels. The ECS payment facility should be extended to all consumer categories, including Railways.

As regards the modification to the applicability of load factor incentive, the Commission does not find any merit in the suggestion. The objective behind this incentive is not to ensure that some consumer gets the incentive, rather, the objective is to ensure that the load factor of the system is maintained at higher levels, to maximize the utilization of the load, and hence, there will be no benefit in offering load factor incentive for load factor above 50% or 60%.

The computation of the category-wise cost to serve is a very elaborate exercise, and involves several assumptions. The Commission has been determining tariff on the basis of the average cost of supply, and has determined the tariff for FY 2009-10 on the same basis. The Tariff Policy also refers to the average cost of supply, rather than the cost to serve. The Commission's tariff philosophy and the reduction in cross-subsidy have been elaborated in Section 5.4 of this Order.

2.24 CONSUMER CATEGORISATION AND PROPOSED TARIFF

Mumbai International Airport Private Ltd. (MIAL) submitted that it is a prospective consumer of TPC-D, and keeping in view MIAL and its consumption pattern and load profile, MIAL should be provided a preferential tariff on no-loss/no-profit basis.

Page 37 of 185



MIAL further submitted that considering the nature of important public service provided by it as a part of the infrastructure sector of the State, it will be appropriate to include MIAL in HT-III (HT Public and Government category). MIAL further submitted that RInfra-D has also proposed to place MIAL under the category of HT-Public and Government proposed to be created by it.

MIAL further submitted that in the alternative, the Commission may also consider the formation of a specific category for airports, keeping in mind the nature and purpose of the consumption, importance in the infrastructure sector, load factor and continuous requirement of power at airports for carrying out efficient and safe operation, with preferential tariff having regard to the essential services provided by Mumbai Airport.

EEI and MIDC Marol Industries Association requested TPC-D to propose lower tariff for continuous process category (already existing in MSEDCL licence area), in a manner similar to that proposed for 'Crematorium and Burial ground'.

VIH requested the Commission to not permit any category as suggested by TPC-D for (1) HT Public and Government, and (2) Railways as there is no provision in the EA 2003 for any categories prevailing now. It was further requested that the Commission should remove the differentiation between tariff categories, which will remove the problem of consumer mix as highlighted by TPC-D.

TPC-D's Response

TPC-D has not submitted any reply to the suggestion made by MIAL. As regards the requests of EEI and MIDC Marol Industries Association for new category, TPC-D submitted that the Commission may decide on the introduction of category of continuous process industries, however, TPC-D may be kept revenue neutral for such changes. TPC-D further submitted that classification of any consumer as a continuous process industry will have to be done based on the definition of continuous process industry issued by the appropriate authority.

Commission's Ruling

While undertaking the differentiation between the tariff categories and rationalisation of, the same, the Commission has borne in mind the provisions of Section 62(3) of the Electricity Act, 2003, which stipulates as under:

Page 38 of 185



"The Appropriate Commission shall not, while determining the tariff under this Act, show undue preference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required."

In this context, it is clarified that the 'commercial' category actually refers to all 'non-residential, non-industrial' purpose, or which has not been classified under any other specific category. For instance, all office establishments (whether Government or private), hospitals, educational institutions, airports, bus-stands, multiplexes, shopping malls, small and big stores, automobile showrooms, etc., are all covered under this categorisation. Clearly, they cannot be termed as residential or industrial. In order to bring clarity in this regard, the Commission has renamed this category as 'non-residential or commercial' in this Order.

Further, 'HT III: Public and Government' category has been done away with, since Section 62(3) does not permit differentiation between consumer categories on the basis of ownership, i.e., public or private, as elaborated above. The consumers earlier classified under this category would now be classified under either HT I: Industry or HT II: Commercial, as the case may be, depending on their purpose of supply. This would apply to MIAL also.

Moreover, even if MIAL were operating on a no-loss, no-profit basis, it would not provide a basis for determining preferential tariffs for MIAL, since Section 62(3) of the EA 2003 does not provide for differentiation between consumers on the basis of whether the consumer is profit making, loss making or operating on no-loss, no profit basis.

As regards the request to create a separate categorisation for continuous process industry, the Commission is of the view that Section 62(3) of the EA 2003 permits differentiation on account of difference in the nature of supply, rather than nature of consumption, i.e. continuous or otherwise. Further, the reference to MSEDCL's tariff schedule in this regard is incorrect, since in MSEDCL licence area, the classification

Page 39 of 185



is based on continuous power supply through express feeders, and not for continuous process industries, per se.

2.25 EXPENSIVE POWER CHARGES

EEI objected to the charging for expensive power throughout the day for continuous process industries.

TPC-D's Response

TPC-D submitted that it has not proposed any separate charge for 'Expensive Power Charges' in its tariff proposal.

Commission's Ruling

In the MYT Order and the APR Order for FY 2007-08, the Commission had separately indicated the component of standby charges and expensive power charges chargeable to specific consumer categories, as a part of the energy charges, with the intention of sensitising the consumers about the consequences of the rapid increase in consumption and the ever-increasing demand-supply gap. The Commission is of the view that the desired objective has been achieved to some extent, since there have been several representations regarding these charges, which indicate that the desired awareness has been created. In this Tariff Order, the Commission has discontinued the practice of indicating the standby charges and expensive power charges separately (also called as reliability charges), and has specified a unified energy charge applicable for the energy consumed.

2.26 PROPOSED TARIFF HIKE

Western India Glass Manufacturers Association's (WIGMA) submitted that power accounts for 10-15 % of the cost of production in many medium and large Industries, and in the prevailing situation, not many Industrial Units will be able to sustain a 20% increase in power bill.

TPC-D's Response

TPC-D submitted that actual increase in the total charges applicable on account of the proposed tariff as compared to the total charges paid currently by the consumers

Page 40 of 185



would only be about 4%. TPC-D added that at present, the total tariff paid by the consumer on an average works out to Rs. 5.86 per kWh, while the proposed average tariff is Rs. 6.12 per kWh. Hence, the net hike proposed by TPC-D over the total present tariff is Rs 0.26 per kWh (a hike of 4.5%).

Commission's Ruling

The category-wise tariff determined by the Commission is elaborated in Section 5.4 of this Order. The total revenue from the existing tariffs comes to Rs. 1348 Crore visà-vis the revenue requirement of Rs. 1162.25 Crore for FY 2009-10 as determined by the Commission, which has enabled the Commission to reduce the average tariffs for FY 2009-10, by around 14%, while at the same time, reducing the cross-subsidy.

2.27 CROSS SUBSIDY

WIGMA submitted that Railways is a rich commercial organization and with the size of cash surplus they have been generating year after year, Railways no longer requires cross-subsidy at the cost of industries, which are somehow struggling for survival in the city and other power consumers. Accordingly, WIGMA requested the Commission that tariff for Central Railways should be same as being charged to industries (HT-I category).

TPC-D's Response

TPC-D submitted that the tariff philosophy adopted has attempted to optimize the impact of the tariff hike so that the common man is not unduly impacted. Hence, the proposed hike for the residential segments has been kept as low as possible. Further, since, Railways as a consumer category caters to the masses, a lower than average hike has been proposed for Railways. However, the Commission is more appropriately placed to decide on the quantum of tariff hike for individual consumer categories.

Commission's Ruling

The Tariff for newly numbered 'HT V: Railways' has been rationalised as elaborated in Section 5.4 of this Order, since Railways was a subsidised category in the earlier approved tariffs. The tariff differential between HT Industry and HT Railways has been eliminated, with the objective of eventually bringing them under a single category.

Page 41 of 185



2.28 TARIFF INCREASE

M/s Hardcastle Restaurants (Hardcastle) submitted that the LT-II (C) category is being subjected to exorbitant tariff increase and reasons thereof remain arbitrary and vague. The proposed increase is not justified when seen in comparison to the increase in the input costs of TPC-D.

TPC-D's Response

TPC-D submitted that TPC-D has detailed the reasons for the proposed tariff increase adequately in its Petition. The ARR sought by TPC has been in accordance with the MERC Tariff Regulations. Moreover, TPC has provided the necessary explanations for the expenditure it has sought through the APR. Further, TPC has complied with all the requirements of the Commission, provided the data in the necessary data formats, submitted the necessary information sought under data gaps and also given the replies to the queries raised during the TVS. TPC-D submitted that it has provided adequate justification supported by necessary calculations and therefore, denied that the tariff proposal is arbitrary and vague. As regards the increase to LT-II (C) category, the increase sought for LT II (C) category is 19%, which is in accordance with the average increase of 20%, proposed by TPC-D.

Commission's Ruling

The category-wise tariff determined by the Commission is elaborated in Section 5.4 of this Order. The total revenue from the existing tariffs comes to Rs. 1348 Crore visà-vis the revenue requirement of Rs. 1162.25 Crore for FY 2009-10 as determined by the Commission, which has enabled the Commission to reduce the average tariffs for FY 2009-10, by around 14%, while at the same time, reducing the cross-subsidy.

2.29 UNIFORM TARIFF ACROSS ALL LICENSEES AND COMPARISON OF TARIFF WITH OTHER UTILITIES

VIH submitted that average cost of supply of TPC-D for FY 2009-10 is Rs. 6.65 per kWh, RInfra is Rs. 7.43 per kWh and BEST is Rs. 9.38/kWh. VIH requested the Commission to stop the violation of Section 62 (3) of the Electricity Act, 2003 and the violation of Article 14 of the Indian Constitution by enforcing same tariff for similar type of consumers.

Page 42 of 185



Vel Induction Hardenings further suggested that a detailed comparison should be made with the tariffs of TPC with other Utilities.

TPC-D's Response

TPC-D submitted that the tariff is determined on the basis of the MERC Tariff Regulations. The tariff charged by the Distribution Licensees to consumers is fixed to enable recovery of the expenditure pertaining to their expenses, viz., power purchase, fixed expenditure such as O&M, Depreciation, Interest, and Income Tax, and also earn a certain fixed percentage of RoE. As all these are different for the different licensees, the tariff cannot be uniform. Hence, it may not be possible to have a uniform tariff for all the licensees.

Commission's Ruling

As enunciated by the Commission in the previous APR Order, the Commission is of the view that it is not feasible to have uniform tariffs across different licensees, due to inherent differences, such as revenue requirement, consumer mix, consumption mix, LT:HT ratio, etc. It is also, not appropriate to compare category-wise tariffs across different licensees for the same reasons. However, in the APR Order for FY 2007-08, the Commission had initiated the move to gradually rationalise and make uniform the tariff categorisation and applicability of tariffs for licensees in the State, and these efforts have been continued in this Order also. The differences exist because of historical reasons and differences in management policies and approach across licensees.

At the same time, the Commission has attempted to ensure that the changes due to rationalisation are such that the impact on consumer categories is minimised, to the extent possible, and also, that the modifications are undertaken in small incremental steps, rather than making wholesale changes to the tariff structure. Hence, the categorisation has by and large, been retained in accordance with the prevailing consumer categories, save for any rationalisation required on account of differences prevailing in different licence areas, and in case the licensee has specifically asked for any category, the same has also been considered in accordance with the provisions of Section 62(3) of the EA 2003.

Page 43 of 185



While undertaking the rationalisation of tariff categories, the Commission has borne in mind the provisions of Section 62(3) of the Electricity Act, 2003, which stipulates as under:

"The Appropriate Commission shall not, while determining the tariff under this Act, show undue preference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required."

It should be noted that it is not possible to apply all the above specified criteria at the same time, for designing the tariff categories; else, with many permutations and combinations, there will be too many categories. Perhaps, that is also not the intention behind the provision, which merely enables the Regulators to work within the criteria.

2.30 COMPLIANCE WITH MERC (ELECTRICITY SUPPLY CODE AND OTHER CONDITIONS OF SUPPLY) REGULATIONS, 2005

Vel Induction Hardenings requested the Commission to direct TPC-D to enter into formal agreements for space required for distribution transformers complying with Section 5.5 of the MERC (Electricity Supply Code and Other Conditions of Supply) Regulations, 2005.

TPC's Response

TPC has not submitted any reply to this.

Commission's Ruling

This aspect is not within the scope of the present exercise, which is being undertaken to determine the truing up requirement for FY 2007-08, provisional truing up for FY 2008-09, and determination of ARR and tariff for FY 2009-10.

2.31 NON COMPLIANCE WITH REGULATIONS

Bharatiya Udhami Avam Upbhokta Sangh, VIH and Lata Enterprises submitted that Low Tension (LT) consumers have been defined based on sanctioned load and High Page 44 of 185

(<u>0</u>)

Tension (HT) consumers have been defined based on contract demand to be charged based on demand recorded as provided under the MERC (Standard of Performance of Distribution Licensees, Period of Giving Supply and Determination of Compensation) Regulations 2005, MERC (Terms & Conditions of Tariff) Regulations, 2005, and MERC (Electricity Supply Code & other Conditions of Supply) Regulations, 2005. It was submitted that TPC-D has been providing electric supply connections to consumers on the basis of connected load and further it is not following the stipulations of the aforesaid Regulations to supply consumers under Municipal Corporation areas on the basis of sanctioned load or contract demand limits applicable to such consumers. They further requested the Commission that since LT consumers have been defined on the basis of Sanctioned Load, they should not be levied Contract Demand charges. They further added that it should be ensured that the various provisions as mentioned in the above said Regulations should be followed by TPC-D.

TPC-D's Response

TPC-D has not submitted any reply to this objection

Commission's Ruling

This aspect of billing related grievance is not within the scope of the present exercise, which is being undertaken to determine the truing up requirement for FY 2007-08, provisional truing up for FY 2008-09, and determination of ARR and tariff for FY 2009-10. The objectors may approach the appropriate forum under the appropriate provisions of law to seek the desired relief, if necessary. As regards levy of Demand Charges, the same is applicable only for the consumers who have entered into a Contract Demand with the distribution licensee, irrespective of whether the connections have been released on the basis of Sanctioned Load or Contract Demand.



3 TRUING UP OF AGGREGATE REVENUE REQUIREMENT FOR FY 2007-08

TPC, in its Petition, has sought approval for the final truing up of expenditure and revenue for FY 2007-08 based on actual expenditure and revenue as per audited accounts. TPC provided the comparison of actual expenditure against each head with the expenditure approved by the Commission along with the reasons for deviations and also proposed the sharing of the efficiency gain/loss for each head of expenditure/revenue, as applicable.

Accordingly, the Commission in this Section has analysed all the elements of actual expenditure and revenue for TPC-D for FY 2007-08, and has undertaken the truing up of expenses and revenue after prudence check. Further, for FY 2007-08, the Commission has approved the sharing of gains and losses on account of controllable between TPC-D and the consumers, in accordance with Regulation 19 of the MERC Tariff Regulations, in this Section.

3.1 SALES

TPC-D submitted the month-wise actual category-wise sales in the Formats annexed to the APR Petition. The summary of the sales considered by the Commission in the APR Order and actual sales is given in the Table below:

Table: TPC-D's Actual Sales in FY 2007-08 (MU)

Sl.	Particulars	APR Order	Actuals
1	Sales	2563	2506

TPC submitted that the actual sales are slightly lower than the sales considered in the APR Order, by 57 MU. The Commission has considered the actual sales under the truing up process.

3.2 DISTRIBUTION LOSSES AND ENERGY INPUT REQUIREMENT

TPC-D submitted that the actual energy requirement of TPC-D could be established only after the commissioning of the meters at the T< >D interface points of TPC-D from October 2007 onwards. After commissioning of the Energy Meters at the T< >D

Page 46 of 185



interface, TPC–D validated the data for the six month period from October 2007 to March 2008. During this period, TPC–D's input requirement was computed by grossing up the sales by normative distribution loss of 2.93%. TPC-D submitted that the actual distribution losses for the period from October 2007 to March 2008 were lower than the normative loss levels, at 0.66%, as shown in the Table below:

Table 4-3: Actual Distribution Loss (Oct 07 to Mar 08) (MU)

Particulars	Quantum
Input to TPC-D	1216
Energy Sales (including 15 day	
adjustment)	1208
Distribution Losses	0.66%

TPC-D submitted that for FY 2007-08, pending determination of distribution losses at T< >D interface, the losses approved by the Commission were considered for energy requirement at T< >D Interface, and the requirement at G< >T Interface was determined on the basis of the transmission loss computed by the Maharashtra State Load Despatch Centre (MSLDC) as a part of the Interim Balancing Settlement Mechanism (IBSM). The actual and approved energy balance for FY 2007-08, as submitted by TPC-D is provided in the Table below:

Table: Energy Balance for FY 2007-08 (MU)

Particulars	APR Order	Actuals
TPC-D Sales	2563	2506
Distribution Losses	2.93%	2.21%
Energy Requirement at T< >D Interface	2640	2563
Transmission loss	4.85%	4.62%
Net Energy Requirement	2775	2687
Banking Return	0	39
Sale Outside Licence Area	0	37
Total Energy Requirement at G< >T		
Interface	2775	2763

TPC submitted that about 39 MU have been returned under the Banking Arrangement for FY 2007-08, and explained that under this arrangement, the power that is purchased is returned in kind at a later date by all licensees instead of making cash payment. This provides a facility to the Mumbai consumers to procure power when needed and return the same when it is available with the licensees. The effective distribution loss for FY 2007-08 works out to 2.21%, by considering 2.93% losses on

Page 47 of 185



energy input into TPC-D for H1 of FY 2007-08 and considering 0.66% losses on energy input into TPC-D for H2 of FY 2007-08.

The Commission has considered the distribution losses and energy balance for FY 2007-08 as submitted by TPC-D.

3.3 POWER PURCHASE EXPENSES FOR FY 2007-08

The Commission, in its APR Order dated June 4, 2008 in Case No. 69 of 2007 approved the total quantum of power purchase of 2775 MU from The Tata Power Company-Generation Business (TPC-G), Renewable Energy (RE) sources and other sources including short-term power purchase from external sources and imbalance pool. However, the actual quantum of power purchased by TPC-D from various sources during FY 2007-08, as submitted in TPC-D's APR Petition, is lower at 2687 MU.

TPC-D submitted that in FY 2007-08, the total quantum of power purchase was 2763 MU, of which, TPC-D sold 37 MU outside License Area of Mumbai and banked 39 MU with the Licensees. Hence, the net power purchase quantum for TPC-D works out to 2687 MU.

The Commission, in its above-said APR Order dated June 4, 2008 had allowed total power purchase expenses of Rs. 1173.69 crore, excluding transmission charges, Maharashtra State Load Despatch Centre (MSLDC) charges and Standby Charges, while the actual power purchase expense for FY 2007-08 as submitted by TPC-D in its APR Petition is Rs. 1133.32 crore, excluding transmission charges, MSLDC charges and Standby Charges.

3.3.1 Power Purchase from TPC-G

TPC-D submitted that it had purchased a higher quantum of power from TPC-G during FY 2007-08 at a lower cost than that approved by the Commission. Further, the power purchase expense includes the incentive payable to TPC-G for higher PLF/Capacity Index and also includes the rebate paid by TPC-G for its hydel generating stations.

The Commission validated the actual expense on power purchase from TPC-G by the three Distribution Licensees in Mumbai, i.e., TPC-D, Brihan-Mumbai Electric Supply

Page 48 of 185



& Transport Undertaking (BEST) and RInfra-D, as submitted in their respective APR Petitions, with the details of revenue submitted by TPC-G in its APR Petition and observed that TPC-G has shown a different value as revenue from Distribution Licensees during FY 2007-08. In order to reconcile the power purchase quantum and expense amongst the Mumbai Distribution Licensees for FY 2007-08, the Commission's staff convened a common meeting between representatives of the three Distribution Licensees of Mumbai and Maharashtra State Load Despatch Centre, on April 6, 2009.

Subsequently, TPC-D submitted the reconciled statement for power purchase quantum and cost for FY 2007-08 from various sources including TPC-G, considering MSLDC's final energy balance statement for FY 2007-08 and submitted the revised power purchase details in the Format F2, which has been considered by the Commission.

The summary of power purchase by TPC-D from TPC-G is given in the following Table:

Source	TPC-D		Approved after truing up	
	Quantum (MU)	Total Cost (Rs Crore)	Quantum (MU)	Total Cost (Rs Crore)
TPC-G	2245.90	838.84	2245.90	838.84

3.3.2 Power Purchase from other Sources

TPC-D submitted that the actual power purchased from external sources on short-term basis and imbalance pool was 392 MU against the approved quantum of 443 MU. TPC-D further submitted that the rate approved by the Commission for such short-term power purchase and imbalance pool was Rs. 5.52/kWh; whereas the actual average rate was approximately Rs. 6.34/kWh. TPC-D submitted that this higher rate of power purchase was primarily on account of the higher Weighted Average System Marginal Price (WASMP) of Rs. 7.94/kWh. TPC-D also submitted that the higher prevailing rate for power available in the short-term during FY 2007-08 has also contributed to the variation in the average rate.

During the public regulatory process on the APR Petitions filed by the Distribution Licensees, many objectors voiced their concerns over the increase in power purchase cost due to costly power purchase from external sources. Some objectors also suggested that such expenditure should be treated as controllable expenditure, and

Page 49 of 185



certain portion of the cost of purchase from other sources on short-term basis should be borne by the Distribution Licensee, rather than being entirely passed through to the consumers, in a manner similar to that adopted for other controllable expenses such as Operation & Maintenance (O&M) expenses, etc. The Commission is of the view that there is merit in the suggestions of the objectors, given that the Commission has given repeated directives to all the distribution licensees to enter into long-term contracts for their power purchase requirement, at reasonable rates, rather than relying on costly short-term sources. However, the Commission has to consider the power purchase expenses in accordance with the provisions of the MERC Tariff Regulations, which categorise the power purchase expenses under uncontrollable factors and any variation in the power purchase cost is to be allowed as pass through in the ARR. Therefore, at this stage, under the first Control Period under the MYT framework, the Commission has not considered any sharing of the increase in cost on account of purchase from other sources on short-term basis. However, the Commission has noted the point made by the objectors in this regard and would consider this suggestion of treating power purchase expenses as a controllable expense, and sharing of increase in power purchase expenses between the Distribution Licensee and the consumers under the second Control Period of the MYT framework, after making suitable modifications to the MERC Tariff Regulations.

Accordingly, based on revised details submitted by TPC-G and after validating the figures with MSLDC's energy settlement for FY 2007-08, the Commission has considered the revised power purchase costs for purchase of energy from other sources during FY 2007-08 for truing up purposes. The summary of power purchase by TPC-D from other sources is given in the following Table:

Table: Summary of Power Purchase Expenses from Other sources

Source	TPC-D		Approved after truing up	
	Quantum (MU)	Total Cost (Rs Crore)	Quantum (MU)	Total Cost (Rs Crore)
Short Term	220.32	112.11	220.32	112.11
Pool Purchase/(Sales)	173.45	137.58	173.45	137.58

3.3.3 RPS Obligation

As regards the purchase from Renewable energy sources for FY 2007-08, TPC-D submitted that the power purchase quantum and cost is almost same as that approved

Page 50 of 185



by the Commission. TPC-D further submitted that it has met the Renewable Purchase Specification (RPS) target through purchase from its own wind farms located at Ahmednagar and Dhule districts in the State of Maharashtra.

Considering energy input for FY 2007-08 as 2688.68 MU, 4% RPS target as stipulated in the Commission's Order dated August 16, 2006 in Case No. 6 of 2006, works out to 107.55 MU, as against TPC-D's actual purchase of RE of 125.08 MU. Thus, TPC-D has met the RPS target corresponding to FY 2007-08. For truing up purposes, the Commission has considered purchase of 125.08 MU from renewable sources at power purchase cost of Rs 44.17 crore.

3.3.4 Reduction in Costly Power Purchase through Demand Side Management (DSM)

The Commission, in its MYT Order, had ruled that 2% of the costly power purchase requirement will have to be reduced by implementation of DSM as an initial step. This translated to reduction in power purchase cost by Rs. 10.42 crore for TPC-D for FY 2007-08. However, TPC-D did not consider any reduction in costly power purchase on this account under its truing up requirement, hence, the Commission asked TPC-D to submit the justification for the same.

TPC-D submitted that for FY 2007-08 it had not exceeded the power purchase quantum as approved by the Commission as the gross purchases had been 2763 MU. TPC-D further submitted that in short, there was a reduction in demand as desired.

TPC-D submitted that the Commission had considered power purchase quantum of 2775 MU at a cost of Rs. 1289.82 crore at the time of provisional truing up vide its APR Order dated June 4, 2008. The above expenditure was arrived at after considering a reduction of Rs. 10.42 Crore on account of DSM initiatives. TPC-D submitted that for FY 2007-08, it has not exceeded the power purchase quantum as approved by the Commission.

TPC-D further submitted that in FY 2007-08, DSM was a relatively new concept in the country and there was a general lack of awareness as regards to the importance, its impact on consumers and potential benefits that can be derived through such initiatives. TPC-D had taken up an energy conservation awareness drive across Mumbai, through the "I Will, Mumbai Will" and "SPICE" – School Programme in

Page 51 of 185



Conserving Energy. TPC-D submitted that although these awareness drives may have yielded reduction in power consumption, the results were not measurable, unlike a specific DSM programme as the main intention initially was to create awareness first and then launch specific DSM programmes. Since awareness creation was the first step in this direction, it does not have measured data as regards the benefit that may have accrued as a result of the above initiatives.

The Commission does not agree with TPC-D's submission that it has not exceeded the power purchase quantum as approved by the Commission and therefore, there was a reduction in demand as desired. The reduction in power purchase quantum has been effected on account of the significant reduction in the energy sales as compared to the sales approved by the Commission for FY 2007-08, rather than DSM measures undertaken by TPC-D.

Further, as regards reduction in power purchase cost on account of benefit achieved through DSM activities, TPC-D has not provided the details of the same to establish or validate the claim. Therefore, the Commission has considered the reduction in power purchase cost by Rs. 10.44 crore for FY 2007-08 as approved in the APR Order for FY 2007-08 while undertaking the final truing up for FY 2007-08.

3.3.5 MSLDC and Transmission Charges

As regards transmission charges and MSLDC charges during FY 2007-08, TPC-D submitted that it has considered an amount of Rs. 53.69 crore and Rs. 0.44 crore, respectively, for FY 2007-08, in accordance with the approved figures, which has been considered by the Commission under the truing up exercise.

3.3.6 Standby Charges

As regards Standby Charges being paid to the Maharashtra State Electricity Distribution Company limited (MSEDCL), TPC-D submitted that it has considered an amount of Rs. 62 crore as approved by the Commission in its APR Order dated June 4, 2008 in Case No. 69 of 2007, which has been considered by the Commission under the truing up exercise.

3.3.7 Other Charges (MSEDCL and Other Adjustments)

TPC-D submitted that the expenditure under this head includes additional expenditure on account of settlement with MSEDCL of various issues pending since FY 1998-99 onwards. The difference in amounts provided in those years and the amounts settled

Page 52 of 185



has been included in this APR Petition. Accordingly, TPC-D considered an amount of Rs. 26.03 crore towards such other charges for FY 2007-08.

TPC-D submitted that the expenditure under this head includes additional expenditure on account of settlement with MSEDCL of various issues pending since FY 1998-99 onwards. The difference in amounts provided in those years and the amounts settled has been included in this APR Petition. Accordingly, TPC-D considered an amount of Rs. 26.03 crore towards such other charges for FY 2007-08.

Subsequently, the Commission asked TPC-D to submit the details regarding such adjustments. TPC-D, in its reply, submitted that prior to the operationalisation of the IBSM, the transactions for power purchase and power sale between TPC and erstwhile Maharashtra State Electricity Board (MSEB) were accounted for through mutual transactions. During this period, there was a difference in interpretation (in rates, adjustments, accounting, etc.) between MSEB and TPC on some of the transactions.

Such differences resulted in difference in accounting of the amounts payable (by TPC to MSEB) as reflected in the bills of MSEB and as accounted by TPC in the Audited Accounts. TPC submitted that on some of the issues, TPC accounted for a lower amount as payable to MSEB, as compared to the amount that was presented in the arrears statement of MSEB. TPC-D further submitted that some of these issues related to the period as early as FY 1998-99 and provided the list of the issues involved as under:



Sr No	Issue Heading	Period to which the issue pertained
1	Daily Vs Monthly Netting	Mar 99 to Mar 01
	Rate of Sale to MSEB	
2	Adjustment of amount on account of Sale	Nov -04 to April 05
	from Unit 4	
3	Wheeling Charges payable on MPSEB	Nov-03 to April 05
	transaction	
4	Transmission loss on MPSEB transaction	Nov -03 to April 05
5	Billing of Excess Energy	Nov -03 to Oct -05
6	Supa Sales for FY 2002-03 and FY 2003-04	April -02 to March 04
7	Supa Sales for FY 2005-06 and from April	April -05 to Sep 06
	06 upto Sep -2006	
8	Adjustment on account of Jindal Purchase	Sep 05 to Dec-05
9	Adjustment on account of MPSEB	Jan -04 to Nov 04
	transaction	
10	Contracted Power Purchase from Tata	Dec -05 to Feb-06
	Power	
11	Marginal Cost Billing by MSEDCL	Jan-06 to Feb -06
12	FAC refund by MSEB on their sales	FY 2005-06

TPC-D submitted that several rounds of discussions took place with erstwhile MSEB and later MSEDCL, regarding these issues and finally a settlement was arrived at in May 2007. MSEB revised the arrear statement of TPC. TPC-D submitted that it had earlier accounted for the amounts based on its interpretation and subsequent to the settlement, has accounted for the difference in FY 2007-08, which works out to about Rs. 26 crore as claimed in the APR of FY 2008-09.

TPC-D further submitted that as the actual power purchase expenses subsequent to settlement have now been revised (in FY 2007-08), it is entitled to recover this difference of Rs. 26 crore in the truing up of FY 2007-08.

Considering the details provided by TPC-D in this regard, the Commission has considered the amount of Rs. 26 crore towards the settlement of pending issues with MSEDCL (erstwhile MSEB) for truing up purposes, as prior period expenses.

3.3.8 Summary of Power Purchase Costs

The summary of power purchase quantum and costs, including Standby Charges and transmission tariff for FY 2007-08 as approved by the Commission is given in the following Table:

Table: Summary of Approved Power Purchase Quantum and Costs for FY 2007-08

	S.No	Source	TPC-D	Approved after truing up
--	------	--------	-------	--------------------------

Page 54 of 185



		Quantum	Cost	Quantum	Cost
		MU	Rs Crore	MU	Rs crore
1	TPC-G: Existing	2245.90	838.84	2245.90	838.84
2	Short Term sources	218.65	112.11	220.32	112.11
3	RPS	125.08	44.17	125.08	44.17
4	Pool Purchase/(Sales)	173.25	137.58	173.45	137.58
5	Standby Charges		62.00		62.00
6	Transmission Charges		53.69		53.69
7	MSLDC Charges		0.44		0.44
8	Reduction due to DSM				(10.44)
9	Outside Licence Area sale and Banking Return	(76.05)	(25.41)	(76.07)	(24.94)
10	MSEDCL – Adj. of Past Dues		26.03		26.03
	Total	2686.83	1249.45	2688.68	1239.49

3.4 O&M EXPENSES

Operation and Maintenance (O&M) expenditure comprises employee related costs, Administrative and General (A&G) Expenses, and Repair and Maintenance (R&M) expenditure. TPC-D's submissions on each of these expenditure heads, and the Commission's ruling on the truing up of the O&M expenditure heads are detailed below.

The actual O&M Expenditure for FY 2007-08 is Rs. 36 Crore as compared to Rs. 32 Crore approved in the APR Order. The various components of O&M Expenses are elaborated below:

3.4.1 Employee Expenses

TPC-D submitted that the total actual employee related expenses for FY 2007-08 was Rs 14.07 Crore against Rs 14.91 Crore approved by the Commission, i.e., lower by Rs. 0.84 crore. After considering capitalisation, the net employee expenses were Rs. 13.65 crore, as against Rs. 13.81 crore approved by the Commission in the APR Order.

Further, TPC-D has considered an amount of Rs. 0.33 Crore under Fringe Benefit Tax (FBT) under Income Tax head. However, the FBT amounting to Rs. 0.33 Crore, being an employee related tax, has been treated as an element of Employee Expenses and has been considered for truing up under this head.



The Commission has allowed the actual employee expenses for FY 2007-08 under the truing up exercise as shown in the Table below:

Table: Employee Expenses

(T)	\sim	
(Rs	Cro	re)

Particular	APR Order	Actuals	Allowed after truing up
Net Employee Expenses	13.81	13.65	13.98*

^{*} Includes FBT of Rs. 0.33 Crore

The difference between the approved employee expenses and the employee expenses allowed after truing up for FY 2007-08 has been considered as a controllable gain and has been shared between TPC-D and the consumers in accordance with Regulation 19 of the MERC Tariff Regulations, as explained later in this Section.

3.4.2 A & G Expenses

TPC submitted that the A&G expenses for FY 2007-08 were Rs. 12.45 Crore against Rs 13.06 Crore approved by the Commission. TPC submitted that the A&G expenses are almost equal to that approved by the Commission after excluding the disallowed expenditure for Brand Equity. As regards expenditure on Brand Equity, TPC-D submitted that it has appealed before the ATE against the Commission's decision to disallow expenditure on Brand Equity, and hence, reserves the right to claim the same in the event of delivery of a favourable Judgment from the ATE.

TPC-D, in response to queries raised by the Commission, submitted the sub-head wise expenditure under A&G expenses for first half and second half of FY 2007-08. TPC was asked about the exact nature of Contributions and Donations as claimed under A&G expenses and was asked to justify the recovery of any donations through the Aggregate Revenue Requirement (ARR). In reply, TPC-D submitted the details of donations paid to various organisations/trusts such as Tata Medical Centre trust, Manipal University, Smt Sitadevi Kathod foundation, National Association for Blind, etc. and submitted that such donations would help the Firm to earn the society's trust, which would facilitate better operation of the Company and which, ultimately would benefit the consumers. The Commission is of the view that the donations as made above are not statutorily required to be so made, neither has TPC submitted that such donations are to be made as required by law. These donations are incurred to





voluntarily under take social welfare measures. If the Company or the shareholders of the Company wish to contribute/donate towards charitable causes, the same should be contributed from the return earned out of the business, and not by passing on such costs to the Utility's consumers. Hence, for truing up purposes for FY 2007-08, the Commission has not considered the expense of Rs 0.10 Crore towards donations as claimed by TPC-D.

Not withstanding TPC-D's submission on allowance of expenses on Brand Equity, the Commission in accordance with the philosophy adopted in the APR Order dated May 26, 2008 in Case No. 67 of 2007 in respect of disallowance of Tata Brand Equity, which states:

"The Commission is of the opinion that this expense of Rs 3.18 Crore towards Tata Brand Equity is a sort of internal arrangement between the Group Companies and this amount is paid to the promoter of the Company, viz., Tata Sons. The kind of support provided by Tata Sons to TPC, as stated by TPC in above paragraphs is normal and usually in business, the promoter provides such support to its Group Companies as it also earns returns from its Group Companies. TPC itself is a 100 year old business and a brand name in its own right and with assured returns in a regulated business, has all the financial and other goodwill to conduct its business optimally. Therefore, the Commission is of the view that the amount paid by TPC to Tata Sons under Tata Brand Equity should not be separately allowed, as it would amount to provide the promoters additional return on equity. As per the MERC Tariff Regulations, a Transmission Licensee can only be provided a regulated Return on Equity of 14% on the regulatory equity as estimated by the Commission and if any expense towards the Tata Brand Equity is allowed, then it would tantamount to allowing a higher Return on Equity."

The Commission has not considered the expense of Rs 1.74 Crore towards the payment to Tata Brand Equity.

The summary of A&G expenses approved in the Order, actual A&G expenses and A&G expenses approved after truing up for FY 2007-08 has been shown in the following Table:

Page 57 of 185



Table: A & G Expenses

(Rs Crore)

Particular	APR Order	Actuals	Allowed after truing up
Net A&G Expenses		14.19	14.09
Less: Brand Equity		1.74	1.74
Net A&G Expense after deducting Brand Equity	13.06	12.45	12.35

The Commission has considered the difference between the allowed A&G expenses and actual A&G expenses under the sharing of gains and losses due to controllable factors (without giving effect to the disallowed expenses, since these cannot be allowed under the mechanism of sharing of controllable gains/losses), since A&G is a controllable expense.

3.4.3 <u>R&M Expenses</u>

TPC-D submitted that the actual R&M expense for FY 2007-08 was Rs. 9.05 Crore as against Rs. 5.12 Crore approved by the Commission in the APR Order. TPC-D submitted the following reasons for increase in the R&M expenses:

- § Expenditure on diversion of cables due to road widening activity being undertaken by MCGM/MMRDA, to the extent of Rs. 1.32 crore
- § MBPT arrears of Rs. 0.30 crore
- § Increase in Reinstatement Charges, by Rs. 0.30 crore
- § Charging off outstanding deposits paid to MCGM/MMRDA to the extent of Rs. 2.75 crore

The Commission has considered the reasons submitted by TPC-D for the increase in R&M expenses, except the charging off of deposits paid to MCGM/MMRDA to the extent of Rs.2.75 crore. These are refundable deposits, rather than revenue expenses, and hence, cannot be charged off as expenses in the ARR. The summary of R&M expenses approved in the Order, actual R&M expenses and R&M expenses approved after truing up for FY 2007-08 has been shown in the following Table:

Table: R&M Expenses

(Rs Crore)

Particular	APR Order	Actuals	Allowed after truing up
Net R&M Expenses	5.12	9.05	6.30





3.5 CAPITAL EXPENDITURE AND CAPITALISATION

The Commission has examined the depreciation and actual capitalisation claimed by TPC-D in detail as against the various capex schemes approved by the Commission. As against capital expenditure of Rs. 33.34 Crore and corresponding capitalisation of Rs. 47.32 Crore considered under the Commission's APR Order dated June 4, 2008, actual capitalisation by TPC-D during FY 2007-08 amounted to Rs. 41.90 Crore. The Commission observes that out of the total capitalisation of Rs. 41.90 Crore for FY 2007-08, capitalisation of DPR schemes amounts to Rs. 23.72 Crore and the balance pertain to Non-DPR schemes. The Commission has verified the actual capitalisation claimed by TPC-D as against the capex schemes already approved by the Commission. Accordingly, for truing up for FY 2007-08, the Commission has considered the capitalisation of Rs. 41.90 Crore, which is lower than the approved capitalisation for FY 2007-08 under APR Order.

As regards whether projected benefits have actually accrued to the consumers, the Commission directs TPC-D to submit the detailed report with established benefits visà-vis the benefits projected, within one month from the issuance of this Order.

3.6 DEPRECIATION

The Commission, in its earlier Order dated June 4, 2008, had permitted depreciation to the extent of Rs 13.28 Crore for FY 2007-08, which amounts to 3.36% of Opening level of Gross Fixed Assets (GFA) of TPC-D for FY 2007-08, which was stated at Rs 395 Crore. The depreciation rates were considered as prescribed under MERC Tariff Regulations. TPC, in its APR Petition, submitted that the actual depreciation expenditure incurred in FY 2007-08 was Rs 14.04 Crore.

Further, TPC-D in its additional submissions, confirmed that depreciation has not been claimed beyond 90% of the asset value in line with the MERC Tariff Regulations. The depreciation expenditure approved by the Commission for FY 2007-08 has been summarised in the following Table:

(Rs Crore)

Table: Depreciation

Particulars	Tariff Order	Actuals	Allowed after truing up
Depreciation	13.28	14.04	14.04
Opening GFA	395	395	395

Page 59 of 185

MERC, Mumbai



Depn as % of Op. GFA	3.36%	3.55%	3.55%
Depii as % of Op. GFA			

3.7 INTEREST EXPENSES

TPC has estimated the interest expenses under the following three heads:

- Interest on debt
- Interest on working Capital
- Interest and Finance Charges

3.7.1 <u>Interest on Debt</u>

The Commission, under its APR Order dated June 4, 2008, had approved interest expenditure of Rs 8.39 Crore, after considering the interest expenditure on normative debt and actual loan from IDFC Ltd. corresponding to capitalised assets only. The Commission had considered the normative interest rate of 10% p.a. for the assets put to use during FY 2004-05 and FY 2005-06, interest rate of 8.9% p.a. for assets put to use during FY 2006-07, and the interest rate of 8.9% p.a. for assets put to use during FY 2007-08 towards the IDFC loan, and accordingly considered the weighted average rate of interest as 9.5%.

TPC-D submitted that interest on debt for FY 2007-08 has been computed based on interest on normative loans for previous years and actual loan for 70% of the expenditure capitalised in FY 2007-08. TPC has raised a loan of Rs. 450 Crore from IDFC to fund its capital expenditure with the following terms:

- Tenor: 12 years with 3 year moratorium and 9 years repayment
- Interest Rate: 5 year G-Sec rate +1.45% p.a. subject to minimum of 8.90%.

TPC-D submitted that the interest on long-term debt for FY 2007-08 is estimated at Rs. 8.29 Crore as against Rs. 8.39 Crore approved by the Commission. TPC-D submitted that the variation in the interest expenditure is on account of lower capitalisation as compared to the approved capitalisation for the year.

The Commission has considered the interest expenditure on the normative debt corresponding to capitalised assets only and has considered the interest rate of 10% p.a. for the assets put to use during FY 2004-05 and FY 2005-06. As regards assets put to use during FY 2006-07 and FY 2007-08, the Commission has considered loan terms for the actual loan availed by TPC-D from IDFC. The Commission has verified

Page 60 of 185



yield-to-maturity (YTM) rate for 5 year G-Sec, which was around 7.45% to 7.55%. Thus, for the purpose of interest expense computation for FY 2006-07 and FY 2007-08 (on the loan portion of the approved capitalisation), the Commission has considered interest rate at minimum of 8.90% p.a. as submitted by TPC-D under its APR Petition. Accordingly, the weighted average rate of interest amounts to 9.30% p.a. for FY 2007-08. The summary of the interest expenses as approved in the APR Order, revised estimate by TPC-D and approved by the Commission after truing up is shown in the Table below:

Table: Interest Expenses (Rs Crore)

Particulars	Tariff Order	Actuals	Allowed after truing up
Opening balance of loan	75.69	75.77	75.51
Additions	31.72	29.33	26.58
Repayment	(6.12)	(6.12)	(6.12)
Closing balance of loan	101.28	98.97	95.97
Interest expenditure	8.39	8.29	8.14
Wt. avg. Interest cost (%)	9.5%	9.5%	9.5%

3.7.2 Other Finance Charges

TPC submitted that the other finance charges for FY 2007-08 was Rs. 1.81 Crore as against Rs. 1.26 Crore estimated at the time of the APR Petition, which was approved by the Commission in the APR Order. The Commission has allowed the actual expenditure under this head, under the truing up exercise.

3.7.3 <u>Interest on Working capital and Consumers' Security Deposit</u>

TPC-D submitted that it has estimated the normative Interest on Working Capital (IWC) considering average interest rate @ 11.50% on the components of Working Capital specified in the MERC Tariff Regulations, with the revised Interest on Working Capital estimated at Rs 10.73 Crore as against Rs 13.78 Crore approved by the Commission in the APR Order. TPC-D submitted that the interest on consumers' security deposits works out to Rs. 1.56 crore, as against Rs. 1.42 crore approved by the Commission in the APR Order.



Page 61 of 185

As regards the actual working capital requirements, TPC-D submitted that such requirement is funded through a mix of actual borrowings and through funds provided by the Corporate through internal accruals. TPC-D submitted that the total interest paid by TPC for such short-term loan works out to Rs. 26 Crore for FY 2007-08. TPC allocated such actual interest paid for working capital to its Generation, Transmission and Distribution business on the basis of the normative working capital share in total normative working capital in TPC's Mumbai Operations and allocation to TPC-D works out to Rs. 3 Crore. However, as elaborated subsequently in this sub-section, TPC-D has explained that the actual working capital requirement for TPC-D was negative.

TPC-D submitted that the component of financing through Corporate funds (Internal accruals) is also entitled to interest as the Corporate incurs a carrying cost for such 'internal cash' or funds, as usage of this cash denies an opportunity to earn income through interest on deposits in the money markets. Accordingly, TPC-D submitted that it has effectively incurred a cost by blocking its money (cash) in such Working Capital. TPC-D submitted that it is well known that any ongoing Company requires working capital to run its operations, which may either be borrowed or funded from own funds. If the working capital is borrowed, the cost of such borrowed funds is the interest paid to the lender on this borrowed amount. However, if no loans are taken, the same would have to be provided by the Company from the funds it has accrued. Such internal funds are in effect provided by the shareholders, who expect some return on the funds. TPC-D submitted that hence, it would be legitimate to expect that there is a cost for such internally accrued funds that are used to finance the working capital, and the cost of such internally accrued funds which reflect the expectation of returns by the shareholders is generally higher than the cost of borrowing.

TPC-D added that even if no amount was actually borrowed, it would be incorrect to treat the entire normative interest on working capital as efficiency gain, which needs to be shared with the consumers. TPC-D submitted that the MERC Tariff Regulations stipulates the computation of Interest on working capital on "Normative Basis" and does not prescribe or stipulate any pre-condition for funding the working capital through actual loans. Further, the treatment given for normative loans for financing capital expenditure may be extended to the financing of Working Capital.

Accordingly, TPC-D submitted that the interest on actual working capital requirement at normative interest rates (SBI PLR) should be considered as part of interest

Page 62 of 185



expenses for the computation of gains and losses on account of interest on working capital. TPC-D requested the Commission to reconsider its stand adopted in its APR Order dated May 26, 2008 and approve the above methodology for computing gains and losses on account of working capital. As regards the sharing of gains and losses on account of actual and normative interest on working capital, TPC-G submitted that the Commission has considered the difference between actual working capital and that approved on normative basis as gains and hence, passed one-third of the gain to the Distribution Licensees. TPC-G submitted that it has appealed against the Commission's methodology in the ATE and reserves the right to seek appropriate adjustments for FY 2007-08 based on the decision of the ATE.

During the TVS, TPC reiterated its submission under its Petition regarding interest on working capital and submitted that TPC has computed the Interest on Normative working Capital in lieu of Actual Interest on Working Capital so as to correctly reflect the cost of Working Capital, while computing the sharing of gains and losses due to controllable factors. TPC further submitted that in FY 2007-08, the funds of Tata Group Company, viz., M/s Indian Hotels were utilised for working capital through the corporate Company, M/s Tata Sons. The Commission asked TPC to submit the details and documentary evidence of relevant inter-Company transactions.

TPC, in its reply, submitted that the reference during the TVS to utilisation of funds for working capital from corporate funds within the same Company was with reference to utilisation of Corporate funds belonging to 'The Tata Power Company' for funding the working capital of a particular business like Generation, Transmission, Distribution, or any other business that the Company may have. TPC submitted that during the TVS it wanted to convey that the MERC Tariff Regulations also provide that any capital expenditure would be funded through a Debt (Loan) to Equity structure of 70:30 notwithstanding the actual quantum of loan in such financing. In effect, the debt quantum for financing the Capital Expenditure is considered on normative basis. The actual quantum of loan taken by the Company has no bearing on the tariff that is determined as it is only the normative loan that is considered. If the actual loan interest is less than the normative interest, it is not construed as savings. TPC further submitted that the reference to another Tata Group Company such as M/s Indian Hotels was inadvertent and unintentional and hence, there was no need to produce documentary evidence to support the claim.



TPC-D further added that in case of TPC-D, the actual working capital is negative on an average for FY 2007-08, largely on account of the time gap between the month of settlement of the imbalance pool accounts and the month for which the settlement is done by MSLDC. TPC-D submitted that such time difference has led to accumulation of Sundry Creditors for FY 2007-08; hence, TPC-D has not considered any interest on Actual Working Capital for FY 2007-08.

The Commission has estimated the normative working capital requirement and interest thereof for FY 2007-08 based on the revised expenses approved in this Order after truing up. However, the Commission considers this to be a controllable parameter and has therefore, computed the sharing of gains/losses on the basis of normative working capital interest and the actual working capital interest incurred. Further, the MERC Tariff Regulations stipulate that the rate of interest on working capital shall be considered on normative basis and shall be equal to the short-term Prime Lending Rate of State Bank of India as on the date on which the application for determination of tariff is made. As the short-term Prime Lending Rate of State Bank of India at the time when TPC-D filed the Petition for tariff determination for FY 2007-08 was 11.50%, the Commission has considered the interest rate of 11.50% for estimating the normative interest on working capital, which works out to Rs 10.75 Crore. As TPC-D has confirmed that the actual working capital interest for TPC-D for FY 2007-08 is negative on an average and that no cost has been incurred on account of working capital interest, the Commission has considered the entire Interest on Working Capital as a controllable gain, and has shared the same with the consumers in accordance with the MERC Tariff Regulations, as elaborated subsequently in this Section.

The Commission has allowed the actual expenditure on interest on consumers' security deposits, under the truing up exercise.

3.8 PROVISION FOR BAD DEBTS

TPC submitted that for FY 2007-08, the actual bad debts and provision for bad and doubtful debts is Rs 1.83 Crore as against the provisioning for bad debts of Rs. 4 crore approved by the Commission for FY 2007-08 in the APR Order.

The Commission enquired of TPC-D regarding whether the expenditure claimed by TPC-D was actual bad debts written off or was provisioning for bad and doubtful

Page 64 of 185



debts. TPC-D was also asked to submit the accumulated provisioning for bad and doubtful debts till FY 2007-08. In response to the Commission's query, TPC-D clarified that during FY 2007-08, as per TPC's Policy, an amount of Rs. 2.91 crore was provided in respect of debts, which had become doubtful (not realized for more than 6 months). Further, an amount of Rs. 1.08 crore was written back, as doubtful debts provided for in earlier years were recovered. Hence, there is a net provision for doubtful debts of Rs. 1.83 crore in FY 2007-08 shown under the head "Provision for Bad and Doubtful debts".

The Commission has accepted the actual provisioning for bad debts as stated by TPC-D, under the truing up process.

3.9 INCOME TAX

TPC-D submitted that for FY 2007-08, the income tax is estimated at Rs 0.33 Crore as against the earlier estimate of Rs 7.6 Crore, which was approved by the Commission for FY 2007-08 in the APR Order. TPC-D clarified that the amount was towards payment of Fringe Benefit Tax (FBT), and the taxable loss for the year would be carried forward and set off from the profits for the future years before computing the Income Tax.

TPC-D submitted that it has incorporated the Commission's ruling in Case No. 64, 65 and 66 of 2007, wherein, the Commission ruled that normative interest on loan and normative interest on working capital are not actual expenses and hence, will not be eligible as deductible expenses while computing the income tax.

It should be noted that the total income tax as per TPC-D, paid by TPC as a whole for FY 2007-08 is Rs. 116.44 Crore.

Since the actual income tax liability of TPC-D for FY 2007-08 has been computed as nil by TPC, the Commission has not considered any income tax payment for FY 2007-08. The FBT of Rs. 0.33 crore has been considered under the employee expenses, as explained under the above paragraphs on employee expense.



3.10 RETURN ON EQUITY (ROE)

TPC submitted that based on the capital expenditure and capitalisation and debt:equity norm of 70:30, the return on equity on the equity portion has been considered at 14%. Further, TPC has computed RoE on the opening equity as well as on 50% of the equity portion of the capitalisation during the year.

In response to the Commission's query, TPC-D provided the information regarding consumer contribution/grants/capital subsidy, which has been utilised for funding the schemes that have been capitalised during FY 2006-07, FY 2007-08 and FY 2008-09 as 0.25 Crore, 3.92 Crore and 0.94 Crore respectively.

In this context, the Commission observes that while allowing RoE of Rs 19.71 Crore for FY 2006-07 in the APR Order dated June 4, 2008, the regulatory equity addition was not adjusted to the extent of capitalised assets funded through consumer contribution and grants by TPC-D for FY 2006-07. However, in accordance with the MERC Tariff Regulations, the RoE has to be computed based on actual or normative equity contribution, after deducting the funding through consumer contribution and grants, as reproduced below.

"63.1.1 The Distribution Licensee shall be allowed a return at the rate of 16 per cent per annum, in Indian Rupee terms, on the amount of approved equity capital:

Explanation I – for the purpose of this Regulation, equity capital shall be the sum total of paid-up equity capital, preference share capital, fully / compulsorily convertible debentures (or other financial instruments with equivalent characteristics), foreign currency convertible bonds, share premium account and any reserves, available for distribution as dividend or for capitalization by way of issue of bonus shares, which have been invested in the Distribution Business. The amount of any grant, revaluation reserve, development reserve, contingency reserve and contributions from users shall not be included in the equity capital. The amount reflected in the books of account as deferred tax liability or deferred tax asset of the Distribution Business shall be added or deducted, as the case may be, from the amount of equity capital." (emphasis added)

Page 66 of 185



Thus, TPC-D is not entitled to RoE on the amount of assets capitalised that have been funded through consumer contribution and grants, and the licensee cannot be allowed to retain something to which it is not entitled to. Hence, in the truing up exercise for FY 2007-08, the Commission has disallowed the corresponding amount towards excess RoE component to the extent of Rs 0.01 Crore allowed during FY 2006-07, and has deducted the same from the RoE computations for FY 2007-08.

The Commission has computed the RoE for FY 2007-08 at 16% on the opening balance of equity as well as on 50% of the equity portion of capitalisation during the year, in accordance with the MERC Tariff Regulations as applicable for the distribution business.

The RoE as projected by TPC-D and approved by the Commission for FY 2007-08 is summarised in the following Table:

Table: Return on Equity

(Rs Crore)

Tubic. Retain on Equity	(ALS CIOIC)				
Particulars	FY 2007-08				
	APR Order	Revised Estimate by TPC-D	Allowed after truing up		
Regulatory Equity at the beginning of the year	128.75	128.75	128.67		
Equity portion of assets capitalised during year	13.59	12.57	11.39		
Regulatory Equity at the end of the year	142.34	141.32	140.07		
Return on Regulatory Equity at the beginning of the year	20.60	20.60	20.59		
Return on Equity portion of capitalised asset value during year	1.09	1.01	0.91		
Total Return on Regulatory Equity	21.69	21.61	21.50		
Less: Excess Return on Equity Allowed for FY 2006-07			(0.01)		
Net Return on Regulatory Equity	21.69	21.61	21.49		

3.11 CONTRIBUTION TO CONTINGENCY RESERVES

TPC submitted that the contribution to contingency reserve for FY 2007-08 has been Rs. 1.76 Crore which is lower than the Rs. 1.97 Crore (0.5% of GFA) as approved in the APR for FY 2007-08. In this context, Regulation 50.7.1 of MERC (Terms and

Page 67 of 185



Conditions of Tariff) Regulations, 2005 specifies that the appropriation towards contingency reserve shall not be less than 0.25% and shall not be greater than 0.5% of original cost of fixed assets, and when contingency reserve exceeds 5% of the original cost of fixed assets, no further provisioning towards contingency reserves is necessary. As highlighted under MYT Order and APR Order for FY 2007-08, the Commission has considered contribution to contingency reserve at 0.5% of Opening GFA for FY 2007-08. Accordingly, no change been made from approved philosophy under truing up exercise for FY 2007-08. Accordingly, the Commission has allowed provisioning towards contingency reserve for FY 2007-08 at Rs 1.97 Crore (i.e. 0.5% of Opening GFA), under the truing up exercise, in accordance with MERC Tariff Regulations and the Commission's philosophy outlined under earlier Orders.

3.12 UNRECOVERED FAC FOR THE PERIOD FROM APRIL 2006 TO SEPTEMBER 2007

TPC-D submitted that the Commission had permitted TPC to recover the unrecovered FAC of Rs 327 Crore for the period from April 2006 to September 2007, from the three distribution licensees, viz., BEST, RInfra-D and TPC-D, and the share of TPC-D worked out to Rs 72.5 Crore. The same has been considered by the Commission under the truing up exercise, since this is a component of the ARR allowed for FY 2007-08.

3.13 NON TARIFF INCOME

TPC-D submitted that the non-tariff income in FY 2007-08 was higher at Rs. 9.28 crore, as against Rs. 3.16 crore considered by the Commission in the APR Order. TPC-D submitted that the non-tariff income largely comprises recurring income of around Rs. 7 crore, and non-recurring income of around Rs. 2 crore. The analysis of the components of non-tariff income considered by TPC-D indicates that the interest on contingency reserve investments have been considered as nil by TPC-D. The Commission has considered the interest on contingency reserve investments at the rate of around 7%, and included the same under the non-tariff income. The non-tariff income considered by the Commission under the truing up exercise is shown in the Table below:

Table: Non-tariff income for FY 2007-08 (Rs Crore)

Page 68 of 185

Particulars	APR Order	Actuals	Allowed after truing up
Non-tariff Income	3.16	9.28	10.65

3.14 INCOME FROM SALE OF SURPLUS POWER OUTSIDE LICENCE AREA

TPC-D submitted that 37 MU had been sold outside the Licence Area, resulting in revenue of Rs. 25.41 crore. The Commission has considered the revenue from sale of surplus energy by TPC-D outside the Licence Area in FY 2007-08 as Rs. 24.94 crore, based on the Interim Balancing and Settlement Mechanism (IBSM) prepared by the MSLDC.

3.15 REVENUE FROM SALE OF ELECTRICITY FOR FY 2007-08

TPC-D in its Petition submitted that the revenue from sale of electricity for FY 2007-08 was Rs. 1256 crore. TPC-D also submitted the details of category-wise revenue from sale of electricity for FY 2007-08, under Form F13 along with its APR Petition. Accordingly, the total revenue from sale of electricity for FY 2007-08 has been considered as Rs. 1256 crore.

3.16 SHARING OF GAINS AND LOSSES FOR FY 2007-08

TPC-D categorised the various heads of expenditure as controllable and uncontrollable and computed the gains and losses for the controllable expenditure and shared the same with the distribution licensees in accordance with the MERC Tariff Regulations. The relevant provisions under the MERC Tariff Regulations stipulating sharing of gains/losses due to controllable factors are reproduced below:

- "17.6.2 Some illustrative variations or expected variations in the performance of the applicant which may be attributed by the Commission to controllable factors include, but are not limited to, the following:
- (a) Variations in capital expenditure on account of time and/ or cost overruns/efficiencies in the implementation of a capital expenditure project not attributable to an approved change in scope of such project, change in statutory levies or force majeure events;
- (b) Variations in technical and commercial losses, including bad debts;



Page 69 of 185

- (c) Variations in the number or mix of consumers or quantities of electricity supplied to consumers as specified in the first and second proviso to clause (b) of Regulation 17.6.1;
- (d) Variations in working capital requirements;
- (e) Failure to meet the standards specified in the Standards of Performance Regulations, except where exempted in accordance with those Regulations;
- (f) Variations in labour productivity;
- (g) Variations in any variable other than those stipulated by the Commission under Regulation 15.6 above, except where reviewed by the Commission under the second proviso to this Regulation 17.6.

...

- 19.1 The approved aggregate gain to the Generating Company or Licensee on account of controllable factors shall be dealt with in the following manner:
- (a) One-third of the amount of such gain shall be passed on as a rebate in tariffs over such period as may be specified in the Order of the Commission under Regulation 17.10;
- (b) In case of a Licensee, one-third of the amount of such gain shall be retained in a special reserve for the purpose of absorbing the impact of any future losses on account of controllable factors under clause (b) of Regulation 19.2; and
- (c) The balance amount of gain may be utilized at the discretion of the Generating Company or Licensee.
- 19.2 The approved aggregate loss to the Generating Company or Licensee on account of controllable factors shall be dealt with in the following manner:
- (a) One-third of the amount of such loss may be passed on as an additional charge in tariffs over such period as may be specified in the Order of the Commission under Regulation 17.10; and
- (b) The balance amount of loss shall be absorbed by the Generating Company or Licensee."

The treatment (controllable or uncontrollable) proposed by TPC for variation in various heads of expenditure is given in the Table below:

Table Controllable and Uncontrollable factors proposed by TPC

Page 70 of 185



Sr.	D	G i	
No.	Particulars	Category	Remarks
1	Power Purchase Expenditure	Uncontrollable	Controllable to the extent they arise due to number or mix of consumers or in the quantities of electricity supplied to consumers within the area served by two or more such Distribution Licensees.
2	O&M expenditure	Controllable	Uncontrollable to the extent they arise due to factors
			such as increase in statutory levies, taxes, changes due to requirements of other utilities and other bodies such as municipal authorities, MbPT, etc
3	Interest on Normative Loans	Uncontrollable	Controllable to the extent they arise due to delay in completion of the project thereby leading to increase in the completed project cost and such increase is not approved by the Commission.
4	Interest on Working Capital	Uncontrollable	Uncontrollable as worked out on normative basis at target availability. However, now considered as controllable in view of the Commission's APR Order dated June 4, 2008.
5	Other Finance Charges	Controllable	
6	Provision for Bad & Doubtful Debts	Controllable	Uncontrollable to the extent of legal outcomes or to the extent they arise when the consumer is not traceable and hence the recovery is not possible.
7	Depreciation & Advance against Depreciation	Uncontrollable	Controllable to the extent they arise due to delay in completion of the project thereby leading to increase in the completed project cost and such increase is not approved by the Commission.
8	Income Tax	Uncontrollable	Controllable to the extent they arise due to controllable costs.
9	Return on Equity	Uncontrollable	Computed based on principles outlined by the Commission in the Tariff regulations.
10	Non-Tariff income	Uncontrollable	Controllable to the extent of the recurring portion of such non-tariff income.

However, the Commission has considered the various expenses for computing the sharing of gains/losses in accordance with the MERC Tariff Regulations, as elaborated below:

O&M Expenditure

TPC-D submitted that certain increases in O&M expenditure were on account of reasons beyond the control of TPC-D, and hence, such expenses have been added to the approved expenditure to determine the gains and losses due to controllable factors. TPC-D has added the uncontrollable expenditure of Rs. 2 crore to the approved O&M expenditure of Rs. 32 crore, as compared to the actual O&M expenditure of Rs. 36 Page 71 of 185

MERC, Mumbai

Crore. TPC-D has considered a net loss of around Rs 2 Crore in O&M expenses and has proposed to share 1/3rd of the same with the consumers, as shown in the Table below:

Table: Gain and loss due to variation in O&M expenses as estimated by TPC (Rs Crore)

S No.	Particulars	Amount
1	Approved O&M Expenditure for FY08	32
2	Actual O&M Expenditure for FY08	36
3	Uncontrollable expenditure out of actual expenses	2
4	Actual controllable expenditure (2-3)	34
5	Losses/(Gains) (4-1)	2
	Sharing of Gain / (Loss)	
6	Amount passed on to the Consumers (1/3rd of Gain/Loss) (1/3rd * 5)	1
7	Net Entitlement	35

The actual O&M expense for FY 2007-08 as approved by the Commission after final true-up is Rs 33.34 Crore as against earlier approved expense of Rs 31.99 Crore and the actual expenditure of Rs. 35.86 crore as submitted by TPC-D.

In accordance with the philosophy adopted by the Commission in this regard, the disallowed expenses, viz., Tata brand equity, donations, and write-off of MCGM/MMRDA deposits, have not been considered for computing sharing of gains/losses, since expenses that have been specifically disallowed cannot be allowed even partly, under the sharing mechanism.

The Commission does not agree with TPC-D's approach of adding the purportedly uncontrollable components of O&M expenses to the approved expenses, for computing the gains and losses, since, as per Regulations, variation in expenses due to uncontrollable factors is to be allowed as pass though, however, the value of estimated uncontrollable expenditure cannot be added to the approved expenditure for determining gains/losses. Since the Commission has accepted the reasons submitted by TPC-D for the increase in O&M expenses to the level of Rs. 33.34 crore as against the approved expense of Rs. 31.99 crore, there is no gain or loss on account of O&M expenses, and hence, there is no need for sharing of gains and losses on this account.

Other Finance Charges and Provision for Doubtful Debts



Page 72 of 185

TPC-D submitted the sharing of gains and losses on account of Other Finance Charges and Provisions for Doubtful Debts as given in the Table below:

Table: Gains and loss due to variation in Finance Charges & Bad debts
(Rs Crore)

Sr. No	Particulars	TPC-D
110		
	Other Finance Charges	
1	Approved Finance Charges for FY 2007-08	1.26
2	Actual Finance charges	1.81
3	Uncontrollable Finance Charges	0.00
4	Actual controllable Finance charges (2 -3)	1.81
5	Losses/ (Gains) -(4-1)	0.55
6	Passed on to consumers (1/3rd)	0.18
7	Net Entitlement $(1+3+6)$	1.44
	Bad debts	
1	Approved Provisioning for Bad debts for FY 2007-08	4.00
2	Actual Provisioning for Bad debts	1.83
3	Losses/ (Gains) -(2-1)	(2.17)
4	Passed on to consumers (1/3rd)	-0.72
5	Share of Tata Power-D incl Transferred to reserves (2/3)	(1.45)
6	Net Entitlement (1 + 4)	3.28
7	Net Entitlement Finance Charges & Bad debts	4.72

The Commission has accepted TPC-D's computations in this regard.

Interest on Working Capital

TPC-D submitted that the actual interest on working capital incurred by TPC-D during FY 2007-08 is nil and the normative interest on working capital works out to Rs. 10.73 crore, and proposed to share the entire difference as a controllable gain. The normative interest on working capital as considered by the Commission is Rs. 10.75 crore, as explained in earlier sub-section. The Commission has considered the difference between normative interest on working capital and actual interest on working capital as an efficiency gain and has considered sharing of 1/3rd of the same with the consumers, 1/3rd has been passed on to a special reserve to be created to offset future losses due to controllable factors, if any, and 1/3rd has been allowed to be



Page 73 of 185

retained by TPC-D, in accordance with the MERC (Terms and Conditions of Tariff) Regulations, 2005.

Efficiency Gain due to Reduction in Distribution Losses

TPC-D submitted that the reduction in the distribution loss for the period from October 2007 to March 2008 from the normative level of 2.93% to actual level of 0.66% has resulted in savings in power purchase cost to the extent of Rs. 13 Crore. TPC-D proposed to share one-third of this saving on account of reduction in distribution loss with its consumers, i.e., Rs.4.19 crore, and an equal amount was proposed to be transferred to the special reserves. TPC-D has computed the net entitlement in this regard as Rs. 8.39 crore.

In this context, the Commission's observations in this regard in the APR Order for FY 2007-08 are relevant, and are reproduced below:

"4.1.1. Distribution Loss

The Commission had considered the distribution losses of 2.93% for the Control Period, in accordance with the loss level approved for FY 2006-07, and the actual distribution losses reported by TPC.

In the APR Petition, TPC-D submitted that the consumers of TPC-D are connected to the system at various voltages, and about 80% of TPC-D's sales are to HT consumers, who are connected at voltage level of 22 kV and above. The distribution losses in TPC-D are therefore expected to be minimal. TPC added that it has recently (from 1st October 2007) provided meters for metering the actual consumption of TPC-D at T<> D interface and the determination of the Distribution loss is in progress. TPC submitted that pending such determination, the distribution loss as approved by the Commission for FY 2007-08 has been considered for determining the Energy Requirement at T<> D interface of TPC-D.

The Commission fails to understand as to why it is taking so much time to determine the distribution losses in TPC-D's distribution system, based on the energy drawn at T<>D interface. It is only a question of taking the meter reading and validating the same with the metered sales to the consumers. In the absence of the necessary data from TPC-D, the Commission is constrained

Page 74 of 185



to consider the distribution loss as 2.93% for FY 2007-08 and FY 2008-09.

TPC-D is directed to submit the T<>D metered data and the computation of distribution losses for the six-month period from October 1, 2007 to March 31, 2008, within two weeks of issue of this Order, giving the monthly breakup." (emphasis added)

...

"4.5 Distribution Losses and Energy Input

As discussed earlier, TPC-D submitted that it had considered the distribution losses for FY 2007-08 and FY 2008-09 as 2.93%, for computing the energy input requirement, which has been accepted by the Commission in the absence of any data on the same..." (emphasis added)

As seen from the above extracts of the APR Order, the Commission had considered the distribution loss of 2.93% for FY 2007-08, only on account of the absence of data submitted by TPC-D in this regard. Hence, the Commission is of the view that it will not be appropriate to consider the normative losses as 2.93% and compute the efficiency gain based on the difference between the above stated normative losses and the actual distribution losses, which are far lower at around 0.66% for the period from October 2007 to March 2008, for which the metered data is available.

Hence, the Commission has considered the distribution losses of 2.21% for the purposes of truing up for FY 2007-08, and entire benefit has been passed on to the consumers.

Total Amount of Efficiency Gains

Accordingly, the total addition to the ARR for FY 2007-08 due to sharing of efficiency gains and losses as projected by TPC-D is Rs. 5.56 crore, while as per the Commission's computations; there is a reduction of Rs. 4.64 crore in the ARR due to sharing of efficiency gains and losses.



3.17 NET REVENUE GAP FOR FY 2007-08

The net revenue entitlement for TPC-D for FY 2007-08 works out to Rs. 1427.24 Crore, as compared to the revenue requirement of Rs. 1467.7 Crore allowed to TPC-D in the APR Order dated May 26, 2008.

Further, total revenue after final true-up for FY 2007-08 amounts to Rs 1291.09 Crore comprising income from retail tariff of Rs 1255.50 Crore and Non-tariff income of Rs 10.65 Crore. Accordingly, there is a revenue gap of Rs 135.43 Crore for FY 2007-08 after final true-up for FY 2007-08, as shown in the Table below, which has been included in the ARR of FY 2009-10, while determining the tariffs for FY 2009-10.

<u>Table: Summary of Truing up for FY 2007-08 including sharing of efficiency gains</u> (Rs Crore)

Sr. No.	Particulars	APR Order	TPC-D	Approved after Truing
140.				up
1	Power Purchase Expenses	1,173.69	1,154.55	1,148.74
2	Operation & Maintenance Expenses	31.98	36.89	34.37
2.1	Employee Expenses	13.81	13.65	13.98
2.2	Administration & General Expenses	13.06	14.19	14.09
	Less: brand Equity (as disallowed by the commission)	-	(1.74)	(1.74)
2.3	Repair & Maintenance Expenses	5.12	9.05	6.30
3	Depreciation, including advance against depreciation	13.28	14.04	14.04
4	Interest on Long-term Loan Capital	8.39	8.29	8.14
5	Interest on Working Capital and on consumer security deposits	15.20	12.29	12.31
6	Other Finance Charges	1.26	1.81	1.81
7	Bad Debts Written off	4.00	1.83	1.83
8	Income Tax	7.56	0.33	-
9	Transmission Charges paid to Transmission Licensee	54.13	53.69	53.69
10	Standby Charges	62.00	62.34	62.00

Page 76 of 185



Sr. No.	Particulars	APR Order	TPC-D	Approved after Truing up
11	Contribution to contingency reserves	1.97	1.76	1.97
12	Sharing of gains & losses		5.56	(4.64)
	Total Expenditure	1,373.45	1,352.36	1,332.52
В	Return on Equity	21.69	21.61	21.49
С	Add: Unrecovered FAC as per Order	72.52	72.52	72.52
	dt. 30.4.07			
D	Aggregate Revenue Requirement	1,467.68	1,446.48	1,426.53
E	Revenue	1,290.16	1,290.19	1,291.09
1	Revenue from sale of electricity	1,287.00	1,255.50	1,255.50
2	Other Income	3.16	9.28	10.65
3	Income from sale of surplus power OLA		25.41	24.94
D	Revenue Gap = (D) - (E)	177.52	156.29	135.43



4 PERFORMANCE REVIEW OF FY 2008-09 AND DETERMINATION OF AGGREGATE REVENUE REQUIREMENT FOR FY 2009-10

4.1 PERFORMANCE PARAMETERS

Regulation 16.1 of the MERC (Terms and Conditions of Tariff) Regulations, 2005, stipulates,

"The Commission may stipulate a trajectory, which may cover one or more control periods, for certain variables having regard to the reorganization, restructuring and development of the electricity industry in the State.

Provided that the variables for which a trajectory may be stipulated include, but are not limited to, generating station availability, station heat rate, transmission losses, distribution losses and collection efficiency."

4.1.1 Distribution Loss

The Commission had considered the distribution losses of 2.93% for the Control Period, in the absence of any metered data submitted by TPC-D in this regard.

In its APR Petition for FY 2007-08, TPC-D had submitted that the consumers of TPC-D are connected to the system at various voltages, and about 80% of TPC-D's sales are to HT consumers, who are connected at voltage level of 22 kV and above, and hence, the distribution losses in TPC-D are expected to be minimal. In the current APR Petition, TPC-D has submitted that post the issue of the Judgment of the Honourable Supreme Court regarding TPC-D's distribution license, TPC-D is increasing its distribution business operations and a significant increase in consumers is expected predominantly in the LT segment. Hence, it is expected that the current distribution loss levels may not be relevant due to change in consumer mix. However for the purpose of projection of energy requirement for H2 of FY 2008-09, distribution loss of 0.66 % (considered same as the loss for the period from October 2007 to March 2008) has been considered, in addition to the actual metered distribution loss of 0.32% in H1 of FY 2008-09. The effective distribution loss for FY 2008-09, as estimated by TPC-D, works out to 0.49%.





TPC-D submitted that the current distribution loss levels are not indicative of stabilised distribution business operations and in case of variation, the Commission may allow higher distribution losses, subject to maximum of 2.93%, which is the prevailing target.

As discussed earlier, the normative distribution loss of 2.93% specified by the Commission in TPC-D's MYT Order was based on past submissions of TPC-D in this regard, and were not based on any metered data. Once the meters have been installed at the T< >D interface metering points, the distribution losses have been discovered to be much lower, and have been assessed as 0.66% for H2 of FY 2007-08, 0.32% for H1 of FY 2008-09. The Commission obtained the actual data for H2 of FY 2008-09, which indicates distribution losses of 0.93%. Thus, the indicative distribution loss for complete FY 2008-09 works out to 0.61%.

Given the prevailing low level of distribution losses in TPC-D system, the Commission is of the view that TPC-D's request for allowance of distribution loss of 2.93% for FY 2009-10, is not justified. If the distribution loss is considered as 2.93%, then the energy input requirement works out to be significantly higher than actually required, and will unnecessarily add to the power purchase cost and hence, the tariff applicable to different consumer categories.

The Commission has considered the distribution loss of 0.66% for computing the energy input requirement of TPC-D for FY 2009-10, which is slightly higher than the actual losses reported by TPC-D for FY 2008-09. In case the actual distribution losses for FY 2009-10 are higher than the approved level of 0.66%, then the same will be considered at the time of truing up, subject to prudence check, and will not necessarily be considered as a controllable loss, since TPC-D has to meet its Universal Service Obligations, by giving supply to all consumers on request in its entire licence area.

4.2 PROVISIONAL TRUING-UP FOR FY 2008-09

TPC-D, in its APR Petition for FY 2008-09 and ARR Petition for FY 2009-10, submitted the performance for FY 2008-09 based on actual performance for the first half of the year, i.e., April to September 2008, and estimated performance for the

Page 79 of 185



second half of the year, i.e., October 2008 to March 2009. TPC-D submitted the comparison of each element of expenditure and revenue with that approved by the Commission in its Order dated June 4, 2008 on TPC's Annual Performance Review for FY 2007-08 and Tariff Determination for FY 2008-09.

TPC-D, in its Petition, along with the revised estimates of expenditure also provided the details of adjustments on account of sharing of gains and losses. The Commission will undertake the final truing up of the revenue requirement and Revenue for FY 2008-09 once the audited accounts of TPC for FY 2008-09 are available, i.e., during Annual Performance Review for the third year of the Control Period, viz., FY 2009-10. However, the Commission in this Order on APR for FY 2008-09 and determination of ARR for FY 2009-10 has considered provisional truing up of certain elements of the revenue requirement and revenue, in cases where the impact is very high, or there is a change in principles/methodology, and due to revision in capital expenditure/capitalisation figures. The revised estimate of performance of TPC-D during FY 2008-09 and FY 2009-10 as compared to the Commission's MYT/APR Order for TPC-D is discussed in the following paragraphs.

The Commission clarifies that the final truing up and the computation of sharing of gains and losses due to uncontrollable factors will be undertaken only after the audited expenses and revenue are available. Further, for computing sharing of efficiency gains/losses for FY 2008-09, the revised expenses approved for FY 2008-09 in this Order under the provisional truing up exercise will be considered as base expenses.

4.3 SALES

TPC-D submitted that the sales for FY 2008-09 have been estimated on the basis of the actual sales in H1 of FY 2008-09 and projections for H2 of FY 2008-09. TPC-D submitted that the revised estimated sales for FY 2008-09 at 2512 MU are about 429 MU lower than the sales of 2941 MU approved by the Commission in the APR Order for FY 2007-08. TPC-D submitted that one of the key reasons for variation between the quantum projected and revised estimates for FY 2008-09 is the drastic fall in consumption by Textiles Industries to about 36 MU, as compared to 98 MU in FY 2007-08 and 85 MU considered by the Commission in the APR Order. TPC-D further

Page 80 of 185



submitted that it has not considered any significant growth in sales to other categories as TPC-D was constrained from giving supply to new consumers since the matter of TPC-D's distribution licence was sub-judice before the Honourable Supreme Court for most part of FY 2008-09.

For FY 2009-10, TPC-D submitted that it has considered the sales to different consumer categories based on the 4-year Compounded Annual Growth Rate (CAGR) of sales, except for certain customer categories which indicate an abnormal increase if projected on the basis of 4-year CAGR. For such categories, TPC-D has considered a growth rate of 5%. Further, TPC-D has considered the growth rate of 0%, for projecting the sales to categories, which have shown a negative growth.

TPC-D, in its APR Petition, submitted that "The above sales projections also include the growth in sales due to addition of new consumer mainly expected in the HT-Commercial, LT-Commercial and Residential category. Out of the total growth projected from new consumers, 80% is expected in Commercial category and balance in the Residential category. Further it is estimated that out of 80% sales to commercial, 60% will be to HT and 40% will be to LT commercial consumers. It is also assumed that all the existing consumers of Tata Power - D would continue to procure entire power requirement from Tata Power - D".

For FY 2008-09, the Commission obtained the details of actual category-wise sales for the 12-month period from April 2008 to March 2009. As shown in the Table below, the actual sales in FY 2008-09 have been lower than that considered by the Commission in the APR Order, as a result of which, the power purchase has also reduced correspondingly, after considering the impact of the distribution losses.

For FY 2009-10, the Commission has verified the sales projections made by TPC-D on the basis of 4-year CAGR and keeping in view the recent trend. Since there was no significant difference between the sales projected by TPC-D and that projected by the Commission, the Commission has accepted the sales projected by TPC-D for FY 2009-10.

In this context, the Commission observes that TPC-D has projected higher addition of new consumer in commercial category and very nominal growth in residential category. Section 43 of the Electricity Act, 2003 stipulates as under:

"Duty to supply on request



43.(1)Every distribution licensee, shall, on an application by the owner or occupier of any premises, give supply of electricity to such premises, within one month after receipt of the application requiring such supply:

Provided that where such supply requires extension of distribution mains, or commissioning of new sub-stations, the distribution licensee shall supply the electricity to such premises immediately after such extension or commissioning or within such period as may be specified by commissioning or within such period as may be specified by the Appropriate Commission.

Provided further that in case of a village or hamlet or area wherein no provision for supply of electricity exists, the Appropriate Commission may extend the said period as it may consider necessary for electrification of such village or hamlet or area.

(2)It shall be the duty of every distribution licensee to provide, if required, electric plant or electric line for giving electric supply to the premises specified in sub-section (1):

Provided that no person shall be entitled to demand, or to continue to receive, from a licensee a supply of electricity for any premises having a separate supply unless he has agreed with the licensee to pay to him such price as determined by the Appropriate Commission."

Further, in terms of the MERC (Specific Conditions of Distribution Licence applicable to The Tata Power Company Limited) Regulations, 2008, notified by the Commission on August 20, 2008, TPC-D has to comply with all the provisions of the EA 2003 as well as the MERC (General Conditions of Distribution Licence) Regulations, 2006, notified on November 28, 2006. Accordingly, the Commission directs TPC-D not to discriminate between various consumer categories while providing connections to new consumers, and ensure that the Universal Service Obligations are net. The Commission also directs TPC-D to submit quarterly status report of category-wise applications received for new connections and new connections released by TPC-D, to the Commission. Further, TPC-D should ensure wide publicity periodically to communicate to all categories of consumers in its entire licence area that they can approach TPC-D for availing supply, detailing the



procedure and contact addresses, ward-wise, etc., for going about the process of submitting applications, etc.

The category-wise sales projected by TPC-D and approved by the Commission in this Order are given in the Table below:

Table: Approved sales for FY 2008-09 and FY 2009-10 (MU)

	FY 2007-		FY	FY 2009-10					
Categories	08	APR Order	TPC-D	Actual till March'09	Approved	TPC-D	Approved		
LT 1 – Residential	74	82	75.0	79	79	84	84		
- S1 (0-100 units)	2	24	1.2	1	1	3	3		
- S2 (100-300 units)	22	26	20.8	22	22	24	24		
- S3 (above 300									
units)	15	9	15.7	16	16	17	17		
- S4 (> 500 Units)	36	23	37.3	39	39	40	40		
LT II - LT Commercial	332	472	265	260	260	294	294		
> 0-20 KW	26	36	19.2	17	17	19	19		
> 20kW and <= 50 kW	305	436	12.0	12	12	13	13		
> 50 kW			234.0	231	231	262	262		
LT III - LT Industries below 20 kW Load	15	15	17.0	17	17	17	17		
LT IV - LT Industries above 20 kW Load	104	149	168.3	162	162	177	177		
LT -V - Shopping Malls HT 2 Part Mall	25		4.4	4	4	0	0		
(HT)	23		4.0	4	4	0	0		

Page 83 of 185



	FY 2007-		FY	FY 2009-10			
Categories	08	APR Order TPC-D Actual till March'09 Appro		Approved	TPC-D	Approved	
LT 2 Part Mall (LT)	2		0.3	0	0	0	0
HT I - Industries & CPP	558	706	548	536	536	567	567
Industries	460	621	514.7	500	500	534	534
Textiles	98	85	33.6	36	36	34	34
СРР							
HT II - Commercial	244	338	307.5	297	297	353	353
HT III - Public & Govt.	337	337	291.5	288	288	297	297
22 kV	169	70	86.2	82	82	90	90
100 kV	168	267	205.4	206	206	206	206
HT IV - Railways	818	842	835.1	824	824	849	849
22/33 kV	541	546	562.6	555	555	575	575
100kV	277	296	272.5	269	269	275	275
Total	2506	2941	2512	2468	2468	2638	2638

Note: \$ - This category has been merged with the LT II Commercial category with effect from June 2008

Thus, the total sales estimated by the Commission for FY 2008-09 and FY 2009-10 is 2468 MU and 2638 MU, as compared to TPC-D's estimate of 2512 MU and 2638 MU, respectively.

4.4 DISTRIBUTION LOSSES AND ENERGY INPUT

As discussed earlier, TPC-D has considered the distribution losses as 0.32% for H1 of FY 2008-09 and 0.66% for H2 of FY 2008-09, for computing the energy input requirement for FY 2008-09. Subsequently, TPC-D submitted the actual data of sales and energy input in H2 of FY 2008-09, and the actual distribution losses for FY 2008-09 has been submitted as 0.61%. For the purpose of this Order, the Commission has considered the distribution losses for FY 2008-09, as projected by TPC-D in its APR

Page 84 of 185



Petition for FY 2008-09. The actual distribution losses will be determined at the time of final truing up for FY 2008-09, based on the Balancing and Settlement data provided by MSLDC.

For FY 2009-10, the Commission has considered the distribution loss level as 0.66%, as discussed in Section 4.1.1 of this Order. The intra-State transmission losses have been considered as 4.85% for FY 2008-09 and FY 2009-10, in accordance with the Commission's ruling in this regard in its Order dated May 28, 2009, in Case No. 114 of 2008.

The approved Energy Balance for FY 2009-10 is given in the Table below:

Table: Energy Balance for FY 2008-09 and FY 2009-10 (MU)

Particulars	FY 2009-10				
	TPC-D APR Petition	Approved			
Sales	2,638	2,638			
Distribution Loss	2.93%	0.66%			
Energy Requirement at T<>D interface	2,718	2,656			
Transmission Loss	4.85%	4.85%			
Total Energy Requirement at T<>D Interface	2,856	2,791			

4.5 ENERGY AVAILABILITY AND POWER PURCHASE COST DURING FY 2008-09 AND FY 2009-10

4.5.1 Power Purchase from TPC-G

As regards purchase from TPC-G for FY 2008-09 and FY 2009-10, TPC-D submitted that the Commission, in its Combined Order dated November 6, 2007 in Case No. 87 of 2006, Case No. 88 of 2006 and Case No. 30 of 2007 approved the Power Purchase Arrangement (PPA) between TPC-G and TPC-D with percentage allocation from various Units of TPC-G to TPC-D. TPC-D submitted that the Commission considered the PPA between TPC-G and TPC-D for estimation of power purchase expenses for FY 2008-09. Accordingly, TPC-D considered the power purchase for FY 2008-09

Page 85 of 185



from generating stations of TPC-G based on the allocation of generation from the various Units as per the approved PPA and in accordance with the estimated sale to TPC-D from TPC-G during FY 2008-09 as considered by TPC-G in its APR Petition in Case No. 111 of 2008. The summary of power purchase quantum and costs as considered by TPC-D for FY 2008-09 is shown in the Table below:

Table: Summary of Power Purchase from TPC-G for FY 2008-09

Particulars	Quantum (MU)	Cost (Rs crore)		
TPC-G: Existing	2814.69	1349.19		

For FY 2009-10, TPC-D submitted that it has considered the allocation of generation from the various Units as per the approved PPA for the purpose of the estimation of power purchase from the existing generating stations and Unit-8 of TPC-G. The summary of the allocation as considered by TPC-D for projection purposes is shown in the Table below:

Table: Summary of the Allocation from TPC-G Units for FY 2009-10

Units	Capacity (MW)	Share of TPC-D (MW)	% of Capacity
Hydro	447	120	26.84%
Unit 4	150	40	26.84%
Unit 5	500	134	26.84%
Unit 6	500	134	26.84%
Unit 7	180	48	26.84%
Total	1777	477	26.84%
Unit 8	250	50	20.00%

Accordingly, TPC-G projected power purchase of 3157 MU from TPC-G at a projected cost of Rs. 1238 crore for FY 2009-10 considering the projected generation from TPC-G generating stations and estimated fixed and energy charges for FY 2009-10 as projected by TPC-G in its APR Petition in Case No. 111 of 2008.

For provisional truing up for FY 2008-09, the Commission has considered the power purchase quantum and cost from TPC-G as estimated by TPC-D and hence, approves power purchase of 2814.69 MU at an estimated cost of Rs. 1349.19 crore. The Commission will undertake the final truing up of power purchase from TPC-G for FY 2008-09 based on actual data for the entire year during the APR process for FY 2009-10.

Page 86 of 185



For estimating the quantum and cost of power purchase from TPC-G during FY 2009-10, the Commission has considered the net generation and tariff approved by the Commission in its Order dated May 28, 2009 in Case No. 111 of 2008 on TPC-G's APR Petition for FY 2008-09. Considering the fact that the tariff for FY 2009-10 for generating stations of TPC-G is applicable from June 1, 2009, the Commission has considered the fixed and energy charges for 10 months on the basis of charges approved in the Order dated May 28, 2009 in Case No. 111 of 2008, and considered the fixed and energy charges for 2 months on the basis of charges approved for FY 2008-09 in the Order dated April 2, 2008 in Case No. 68 of 2007, which was subsequently extended till such time as the APR Order for FY 2008-09 was issued by the Commission in Case No. 111 of 2008.

The summary of the approved power purchase quantum and cost of power purchase by TPC-D from TPC-G for FY 2009-10 is given in the following Table:

Table: Quantum and Variable Cost for Purchase of Power from TPC-G in FY 2009-10

Particulars	Quantum	Variable Cost		
	MU	Rs Crore		
Unit-5, 6 & 7	2,386.79	806.83		
Unit- 4	19.36	10.52		
Hydel	400.50	73.09		
Unit-8	362.78	38.09		
Total	3,169.42	928.52		

Table: Other Costs for Purchase of Power from TPC-G in FY 2009-10

Particulars	Rs Crore
Fixed Charges-Thermal	144.19
Unit-8	41.64
Incentive at Projected Generation	6.38
Less Rebate-Hydel Excess Recovery	(24.04)
Total	168.16



4.5.2 Renewable Purchase Specification

For FY 2008-09, TPC-D in its Petition, projected a total quantum of 156.34 MU at an estimated cost of Rs. 57.20 crore as against approved quantum and cost of 159.25 MU and Rs. 55.74 crore, respectively. For FY 2009-10, TPC-D submitted that as per the (RPS Order of the Commission dated August 16, 2007 in Case No. 6 of 2006, TPC-D is obliged to purchase 6% of its energy requirement from renewable energy sources. Accordingly, TPC-D has projected the power purchase of 171.38 MU (i.e., 6% of 2856.29 MU) for FY 2009-10.

TPC-D further submitted that it will procure such renewable energy from its Wind projects set up at Supa (Group II), Khandke (Group III) and Brahmanvel (Group III). TPC-D has considered a weighted average rate of Rs 3.80/kWh on the basis of the Order dated November 24, 2003 for Wind Projects in Case No. 17(3), 3, 4 & 5 of 2002. Accordingly, TPC-D has projected the power purchase cost of Rs. 65.12 crore towards meeting RPS obligation.

For FY 2008-09, the Commission has considered power purchase quantum and cost from renewable sources as estimated by TPC-D and has accordingly considered 156.34 MU at an estimated cost of Rs. 57.20 crore for provisional truing up purposes.

For FY 2009-10, the Commission has considered the power purchase from Renewable Energy Sources as per RPS obligation, i.e., 6% of the total energy input. Based on the total energy input approved by the Commission, the RPS obligation of TPC-D for FY 2009-10 works out to 167.37 MU and corresponding cost works out to Rs. 63.60 crore, assuming an average rate of Rs 3.80/kWh. Though the Commission has considered the purchase rate of Rs. 3.80/kWh from renewable sources as projected by TPC-D, the Commission clarifies that it would consider the actual power purchase cost considering the actual purchase and effective purchase rate in accordance with the tariff approved for Group-II and Group-II wind projects from where TPC-D has purchased RE, while undertaking the truing up for FY 2009-10.

4.5.3 <u>Short Term Power Purchase, Imbalance Pool Purchase and Sale to</u> Outside License Area

TPC-D submitted that the power purchase from outside sources for FY 2008-09 has been undertaken through a Power Management Group (PMG) comprising the three Mumbai Distribution Licensees, viz., BEST, RInfra-D and TPC-D for jointly procuring the power for the Mumbai region. Also, apart from entering into contracts

Page 88 of 185



for purchase of power from various sources, PMG has also entered into the arrangement of banking of power under which, the power that is purchased is returned in kind at a later date from TPC-G generation instead of making cash payment. TPC-D has also considered the sale to Outside License Area while considering the power purchase during FY 2008-09. For FY 2008-09, TPC-D projected the power purchase of 194.35 MU from external sources at an estimated cost of Rs. 166.77 crore. TPC-D also projected sale of 19.82 MU outside Licence Area and Banking, giving estimated revenue of Rs. 8.94 crore.

TPC-D submitted that for FY 2008-09, the surplus energy will be absorbed by the participants of the pool and settlement of the same will be done based on the imbalance pool settlement undertaken by MSLDC and accordingly, projected a total quantum of 494.10 MU with an estimated revenue of Rs. 420.18 crore at an average rate of Rs. 8.58/kWh during FY 2008-09.

The Commission has accepted TPC-D's projections towards imbalance pool for FY 2008-09 and considered sale of power of 494.10 MU at an estimated revenue of Rs 420.18 Crore during FY 2008-09. The Commission will undertake the truing up based on actual imbalance pool settlement for the entire year during APR process for FY 2009-10.

For FY 2009-10, in its Petition, TPC-D submitted that based on the merit order output and the energy balance, TPC-D has estimated that no power would be required to be purchased from external power purchase source/imbalance pool. However, in case of forced outages of TPC-G and other unprecedented conditions, TPC-D may have to purchase power from external sources (contracted power). TPC-D further submitted that in the past, it has experienced such situations and has had to purchase power from contracted sources as well as from the surplus available in the pool. Accordingly, TPC-D requested the Commission to approve the power purchase cost from external sources at a weighted average price of Rs. 9.00/kWh, considering the short-term power purchase rates, which are in the range of Rs.10.00-13.00/kWh. TPC-D further submitted that the Availability Based Tariff (ABT) implementation would require 15-minute scheduling and in some of the months during the outage of TPC-G Units, there may be some additional requirement for power purchase from external sources. Accordingly, TPC-D requested the Commission to approve power purchase of about 2% from external sources in the ARR at an average rate of Rs 9/kWh. Further,





considering the energy input requirement and estimated energy available during FY 2009-10 has estimated sale of 471.79 MU and corresponding revenue of Rs. 237.64 crore at an average rate of Rs. 5.04 crore.

For FY 2008-09, the Commission has considered the quantum and cost of power purchase from bilateral sources based on the total energy input requirement as approved in this Order and has accordingly estimated power purchase of 194.35 MU at an estimated cost of Rs. 166.77 crore. However, the Commission will undertake the final truing up of power purchase from bilateral sources for FY 2008-09 based on actual data and prudence check, during the APR of FY 2009-10. As regards the sale to Outside Licence Area and banking, the Commission has considered the same as 19.82 MU at estimated revenue of Rs. 8.94 crore as submitted by TPC-D.

For FY 2009-10, after considering the power available from existing and new generating stations of TPC-G and RPS, the total power purchase quantum available to TPC-D works out to be higher than the energy input requirement, resulting in surplus energy of 545.99 MU. The Commission observed that while considering the power purchase cost from external sources TPC-D has considered an average rate of Rs. 9/kWh, however, while considering the average rate for sale of surplus energy, TPC-D has considered a rate of Rs. 5.04/kWh. For estimating the power purchase cost for FY 2009-10 in this Order, the Commission has considered the average rate of Rs. 7.00/kWh for sale of this surplus power, considering the fact that the Central Electricity Regulatory Commission (CERC) has notified the CERC (Unscheduled Interchange charges and related matter) Regulations, 2009, wherein it has revised the ceiling of Unscheduled Interchange (UI) charge to Rs. 7.35/kWh as against the earlier ceiling of Rs 10/kWh. Therefore, it is expected that the cost of power available on short-term basis would reduce and accordingly, the Commission has assumed the rate of Rs. 7.00/kWh. However, the Commission clarifies that it would consider such purchase/sale based on actuals subject to prudence check during the truing up for FY 2009-10.

As regards TPC-D's submission that power purchase equivalent to about 2% of the energy requirement at an rate of Rs. 9/kWh should be included in the ARR, the Commission is of the view that it not possible to predict at what point of time the purchase from external sources would be required. Moreover, the Commission determines the energy requirement on annual basis, which is allocated to different months, based on past trends. Therefore, the Commission has not accepted TPC-D's

Page 90 of 185



request in this regard, however, the Commission will consider the power purchase/sale from bilateral sources/imbalance pool on actuals subject to prudence check.

The summary of power purchase/sale from bilateral sources/imbalance pool as projected by TPC-D and as approved by the Commission for FY 2008-09 and FY 2009-10 is given in the Table below:

Table: Purchase of Power from bilateral sources in FY 2008-09 and FY 2009-10

Particulars	Unit		FY 2008	FY 2009-10		
		APR Order	Revised Estimate	Approved after Provisional truing up	APR Petition	Approved
Additional PP/Sale	MU	(19.24)	(494.10)	(494.10)	(471.79)	(545.99)
	Rs Crore	(10.58)	(420.18)	(420.18)	(237.64)	(382.19)
Short term external	MU	-	194.35	194.35		
power purchase	Rs Crore	-	166.77	166.77		
Outside License	MU	-	(19.82)	(19.82)	-	-
Area Sale	Rs Crore	-	(8.94)	(8.94)	-	-

4.5.4 Month-wise Power Purchase Quantum for FY 2009-10

The summary of month wise power purchase quantum approved by the Commission based on trends of month-wise energy input requirement in previous is given in Table below:

Table: Month-wise Power Purchase Quantum (MU) for FY 2009-10

TPC-D	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Total
Power Purchase (MU)	231.95	236.06	256.35	243.03	236.98	231.74	235.57	232.26	225.07	223.08	209.51	219.27	2780.88

4.5.5 <u>Demand Side Management (DSM) Mechanism</u>

The Commission, in the MYT Order, had deliberated on the need for DSM and opined that the distribution licensees need to take steps toward meeting their energy requirement by Supply Side measures as well as Demand Side Management (DSM). Traditionally, the distribution licensees have been looking at the supply side alone. Since, there has been no significant capacity addition in the State for last several years, the licensees in the State of Maharashtra have had to resort to purchase of





power from other sources at a very high rate and this has resulted in a higher retail tariff for the consumers.

TPC-D submitted that it has adopted formal methodical approaches for implementing DSM initiatives with specific directions and considerable support from the Commission. The various steps taken by TPC-D towards DSM during FY 2008-09 as submitted are listed below:

- 1. Formation of DSM cell:
- 2. Initiation of load research:
- 3. Market survey of consumer base;
- 4. Appointment of external consultant for program design;
- 5. Submission of DSM strategy document;
- 6. Submission of Load Research methodology;
- 7. Submission of DSM programmes for TPC-D consumers.

TPC-D submitted that two DSM programmes have been submitted to the Commission for approval. In accordance with the specific guidelines from the Commission, the programmes can be implemented only after due approval by the Commission for each programme. Further programmes for creating awareness and knowledge sharing for TPC-D consumers are being taken up, which include holding energy conservation seminars, campaign at consumer doorstep, creation of web site, circulation of energy efficiency booklets and programmes for school children. Also, an exhibition of energy efficient technology and products was organized for the benefit of consumers.

TPC-D submitted that since, these initiatives involve various stages from creating awareness amongst various categories of consumers to actually identifying potential opportunities and implementation, ascertaining the benefits from such measures would require specific measurement systems to be installed. Once these measurement systems are installed, the quantum of power purchase reduction achieved can be ascertained with reliable data.

The Commission, in its MYT Order, ruled that 2% of the costly power purchase requirement will have to be reduced by implementation of DSM as an initial step. Accordingly, the Commission in the APR Order for FY 2007-08 reduced 2% of the costly power purchase, to be saved through DSM measures, which translated to 0.15% of the total power purchase quantum and reduction in power purchase cost by Rs. 2 crore. Therefore, the Commission has considered the reduction in power

Page 92 of 185



purchase cost of Rs. 2 crore as approved in the APR Order for FY 2007-08 for the purpose of provisional truing up for FY 2008-09.

4.5.6 Standby Charges

TPC-D, in its Petition, submitted that it has estimated the Standby Charges payable to MSEDCL at Rs. 63.58 crore for FY 2008-09 and FY 2009-10 based on the Standby Charges approved by the Commission in its APR Order in Case No. 69 of 2007 for TPC-D for FY 2008-09.

For FY 2008-09, the Commission has considered the Standby Charges approved in the APR Order for FY 2007-08, i.e., Rs. 64.82 crore. For FY 2009-10, in accordance with the philosophy adopted in the MYT Order and the APR Order, the Commission has allocated the Standby Charges between the three Distribution Licensees in Mumbai in proportion to the coincident peak demand for the last one year, i.e., for the period from October 2007 to September 2008 and the standby charges allocated to TPC-D works out to Rs. 59.37 crore. TPC-D will hence, pay standby charges of Rs. 59.37 crore to MSEDCL during FY 2009-10.

4.5.7 Transmission Charges and MSLDC Charges

TPC-D, in its Petition, submitted that the Commission in its Order dated May 31, 2008 in the matter of Determination of Transmission Tariff for Intra-State Transmission System (InSTS), determined the manner in which the transmission charges are to be paid by the Transmission System Users (TSUs) for FY 2008-09. Accordingly, TPC-D has considered the approved transmission charges payable by TPC-D for FY 2008-09. TPC-D submitted that the transmission charges paid towards the InSTS for the period from April 2008 to September 2008 are Rs. 30 crore. Accordingly, the transmission and SLDC charges payable for the period from October 2008 to March 2009 have been assumed by TPC-D at Rs. 33 crore. The total charges on account of transmission and MSLDC charges for FY 2008-09 as projected by TPC-D are Rs. 63 crore.

For FY 2009-10, TPC-D submitted that it has considered the transmission charges and MSLDC charges as Rs. 65 crore as approved by the Commission for FY 2008-09 in the APR Order for FY 2007-08.

Page 93 of 185



As regards the MSLDC charges for FY 2008-09, the Commission has considered the approved share of TPC-D of the MSLDC charges, i.e., Rs 0.44 Crore for FY 2008-09 as approved in the MSLDC Budget for FY 2008-09 vide Order dated May 30, 2008 in Case No. 88 of 2007.

As regards the MSLDC charges for FY 2009-10, the Commission, in its Order dated April 29, 2009 in Case No. 117 of 2008, in the matter of approval of MSLDC Budget for FY 2009-10, has determined the mechanism for the recovery of MSLDC Fees and Charges for FY 2009-10. The Commission has considered TPC-D's share of the approved MSLDC Budget for FY 2009-10 in accordance with the above-said Order, however, the Commission has considered the MSLDC Operating charges for 11 months based on the Order dated April 29, 2009 and for 1 month, the Commission has considered MSLDC Operating Charges as approved in the Order dated May 30, 2008 in Case No. 88 of 2007. The total MSLDC Fees and Operating Charges payable by TPC-D during FY 2009-10 works out to Rs. 0.29 crore.

As regards the transmission charges for FY 2008-09, the Commission has considered the transmission charges of Rs. 62.78 crore as projected by TPC-D for FY 2008-09, since the same is in accordance with the Commission's Order dated May 31, 2008 in Case No. 104 of 2007.

For FY 2009-10, the Commission vide its Order dated May 28, 2009 in Case No. 155 of 2008 on determination of Transmission Tariff for the Intra-State Transmission System, has approved the revised Transmission Charges for FY 2009-10 with effect from June 1, 2009. Accordingly, the Commission has considered the approved monthly transmission charges for FY 2009-10 payable by TPC-D as approved in the Order dated May 28, 2009 in Case No. 155 of 2008 for 10 months and has considered the approved monthly transmission charges for 2 months as approved in the Order in Case No. 104 of 2007. Accordingly, the total transmission charges payable by TPC-D for FY 2009-10 as approved by the Commission works out to Rs. 49.58 crore.



4.5.8 Summary of Power Purchase Related Cost

The summary of the total power purchase cost as approved in APR Order for FY 2007-08, as estimated by TPC-D in its APR Petition and as approved by the Commission based on provisional truing up for FY 2008-09, is shown in the Table below:

Table: Approved Power Purchase cost for FY 2008-09

Source	APR (APR Order TPC-D APR Pe		PR Petition		ed after l truing up
	Quantum Cost		Quantum Cost		Quantum	Cost
	MU	Rs crore	MU	Rs Crore	MU	Rs crore
TPC-G: Thermal excl.						
Unit 4	2356.55	939.66				
TPC-G: Unit 4	141.46	100.66				
TPC-G: Unit 8	179.77	52.28				
TPC-G Hydel	367.21	40.27	2814.69	1349.19	2814.69	1349.19
RPS	159.25	55.74	156.34	57.20	156.34	57.20
Additional PP/Sale Short term external power	-19.24	-10.58	(494.10) 194.35	(420.18)	(494.10) 194.35	(420.18)
purchase Standby Charges		64.82	194.55	63.58	194.33	166.77 64.82
Outside Licence Area sale and Banking Return		04.82	(19.82)	(8.94)	(19.82)	(8.94)
Sub-total (Power			,	,		, ,
Purchase)	3185.00	1242.85	2651.47	1207.62	2651.47	1208.86
Transmission Charges		65.32				62.78
SLDC Charges		0.44		63.22		0.44
Reduction of Cost (DSM)		(2.00)		(2.00)		(2.00)
Total	3185.00	1306.62	2651.47	1268.84	2651.47	1270.08

The summary of the total power purchase cost considered by the Commission during FY 2009-10 is shown in the Table below:

Table: Approved Power Purchase cost for FY 2009-10

Source	APR Petition Approved			Approved
	Quantum Total Cost		Quantum	Total Cost
	MU	Rs Crore	MU	Rs Crore
TPC-G: Thermal excl Unit 4	3,156.71	1,237.78	2,386.79	957.39
TPC-G: Unit 4			19.36	10.52
TPC-G Hydel			400.50	73.09
TPC-G: Unit 8			362.78	79.73
RPS	171.38	65.12	167.37	63.60
Additional PP/Sale	(471.79)	(237.64)	(545.99)	(382.19)





Source	APR Pe	etition		Approved
	Quantum	Total Cost	Quantum	Total Cost
	MU	Rs Crore	MU	Rs Crore
Standby Charges		64.82		59.37
Less Hydel Rebate				(24.04)
Sub-total (Power Purchase)	2,856.29	1,130.08	2,790.88	837.50
Transmission Charges				49.58
SLDC Charges		65.04		0.29
Total	2,856.29	1,259.94	2,790.88	887.36
Impact of the ATE Judgment ^{\$}				20.00
Total	2,856.29	1,259.94	2,790.88	907.36

Note: \$ - TPC-D has asked for the impact of the ATE Judgment to be passed on separately, while the Commission has considered it under power purchase expenses. The detailed explanation is given in the TPC-G Order in Case No. 111 of 2008 and referred to in Section 4.21 of this Order

4.6 O&M EXPENSES FOR FY 2008-09 AND FY 2009-10

The O&M expenditure comprises employee expenditure, A&G expenditure and R&M expenditure, as discussed below.

Relevance of Multi-Year Tariff

In this context, the Commission observes that during the public regulatory process on the APR Petitions, several consumers have expressed their opinion that revising tariff on an annual basis is against the principles of MYT. While this is not incorrect if one goes by the pure concept of MYT, in Maharashtra, parameters like sales and power purchase have not been stipulated in the MYT Orders, due to the uncertainty on account of the prevailing supply shortages in the State and the respective licence area. Consequently, the tariff has been specified for only one year, rather than the Control Period, which is also in accordance with the MERC Tariff Regulations, which specifies that tariff will be determined annually.

Consequently, in the MYT Orders, the Commission has primarily stipulated the following parameters separately for each year of the Control Period, viz.,

(a) <u>Performance trajectory</u>

- i. Station Heat Rate (SHR), auxiliary consumption, transit losses and secondary oil consumption for Generating Companies;
- ii. Availability for Transmission Licensees; and

Page 96 of 185



iii. Distribution loss for Distribution Licensees

(b) Cost elements

- i. Operation & Maintenance (O&M) expenses have been approved as a whole for Generating Companies, and for individual elements, viz., employee expenses, A&G expenses, and R&M expenses, for Transmission Licensees and Distribution Licensees
- ii. Interest on Working capital

However, even though the O&M expenses have been approved by the Commission for each year of the Control Period, wherein, by and large, the Utility's projections have been accepted, most Utilities have projected significant further annual increase in the O&M expenses for each year in the Control Period. If this increase in O&M expenses is allowed as sought by the Utilities, then the MYT framework created by the MERC in its MYT Orders will have no sanctity. Hence, the Commission rules that for FY 2008-09 and FY 2009-10, the O&M expenses allowed by the Commission for FY 2007-08 under the final truing up for FY 2007-08, after considering the base as audited expenses for FY 2006-07, will be considered as the base and increase will be allowed strictly as per the CPI/WPI growth as applicable, which incidentally, is higher than the growth rate projected by the Utilities in their respective original Petitions. The variation between allowed expenses and actual expenses will be considered as a controllable gain/loss, and will be shared between the Utilities and the respective consumers, in accordance with Regulation 19 of the MERC (Terms and Conditions of Tariff) Regulations, 2005.

4.6.1 Employee Expenses

TPC-D submitted that the revised Employee Expenditure for FY 2008-09 is estimated at Rs 18.28 Crore as compared to Rs 12.79 Crore approved in the APR Order, based on the actual employee expenses for first half of FY 2008-09 and estimated employee expenses for the remaining half of the year. TPC-D submitted that the employee expenses have increased in FY 2008-09 mainly on account of increase in the expenditure related to terminal benefits to the tune of Rs. 3.05 crore as against actual expenses of Rs. 1.43 crore in FY 2007-08 against this sub-head.

TPC-D submitted that it has been grappling with the issue of increasing attrition due to huge demand for power sector professionals within the country and overseas. This

Page 97 of 185



has led to the need for correcting the compensation to employees in Order to retain skilled personnel and maintain smooth operations, which has resulted in an increase in employee expenditure.

TPC-D submitted that subsequent to the Supreme Court's Judgment on TPC-D's Distribution Licence, TPC-D is gearing up to meet the operational requirement of servicing additional new consumers, which will require recruitment of additional manpower for supporting full-fledged distribution business operations. Manpower resources are being beefed up for meeting increasing demands on account of activities like handling customer power supply applications and huge customer queries, designing of network strengthening/planning activities, ISCU applications for billing, increased cable maintenance requirement, energy audit applications, bill recovery follow up, etc. This is over and above vacancies being filled up.

TPC-D added that while TPC-D has estimated an increase in employee expenses of about Rs. 5 crore in FY 2008-09, it expects a similar increase on this front in future till it achieves the expected expansion of its distribution business. TPC-D proposed that this expense may be considered as uncontrollable at this stage. Further, the net employee expenses approved at Rs.12.79 Crore for FY 2008-09 is lower than the net approved expenses for FY 2007-08, i.e., Rs.13.81 Crore, and requested the Commission to consider an increase in the employee expenses and approve the estimated amount on account of the reasons stated above. For FY 2009-10, TPC-D projected employee expenses of Rs. 23.38 crore, with recruitment of additional employees contributing to an increase of Rs. 5.11 crore, and the balance rise is on account of inflation, which has been considered as 6%.

The Commission considers employee costs as controllable and does not accept TPC-D's contention that the employee costs should be considered as uncontrollable. Therefore for FY 2008-09, for each sub-head of employee expenditure, the Commission has considered an increase of around 7.31% p.a. on account of inflation factor corresponding to increase in Consumer Price Index (CPI) over the revised level of employee expenses as approved for FY 2007-08 under the truing up exercise in this Order. The Commission has considered the point to point inflation over CPI numbers for Industrial Workers (as per Labour Bureau, Government of India) for a period of 3 years, i.e., FY 2006-07 to FY 2008-09 (upto December 2008), to smoothen the

Page 98 of 185



inflation curve. The Commission will undertake the final truing up of employee expenses for FY 2008-09 based on actual employee expenses for the entire year and prudence check, during the APR process for FY 2009-10.

Similarly, for FY 2009-10, for each sub-head of employee expenditure, the Commission has considered an increase of around 7.31% p.a. on account of inflation over the revised level of employee expenses as approved for FY 2008-09 under the provisional truing up exercise in this Order, based on the increase in Consumer Price Index (CPI). Accordingly, the approved employee expenses for FY 2008-09 and FY 2009-10 is summarised in the following Table:

Particular	rs		FY 2008-09	9 FY 2009-10			.0			
		APR	APR Revised Approved		MYT	Revised	Approved			
		Order	Estimate	After	Order	Estimate				
			by TPC	provisional		by TPC				
				truing up						
Net 6	employee	12.79	18.28	14.65	11.66	23.38	15.72			
expenses		12.19	10.20	14.03	11.00	43.30	13.72			

Table: Employee Expenses for FY 2008-09 and FY 2009-10 (Rs. Crore)

4.6.2 A&G Expenses

TPC submitted that the revised A&G Expenditure for FY 2008-09 is estimated at Rs 14.46 Crore as compared to Rs 12.77 Crore approved in the APR Order, based on the actual A&G expenses for first half of FY 2008-09 and estimated A&G expenses for the remaining half of the year. TPC-D submitted that the deviation from the amount approved for FY 2008-09 in the APR Order are on account of various controllable/uncontrollable factors as under:

- On account of higher expenditure expected due to requirements of servicing enhanced consumer base, improvements planned in respect of meter reading, billing, revenue collection, etc.
- TPC-D had raised an insurance claim for the material damaged during the deluge in 2005, however, the insurance claim paid out was lower than the cost incurred to reinstate/purchase the material that was damaged, as the prices had risen in the interim Rs. 0.4 Crore (Uncontrollable)

Page 99 of 185



• Upward revision in premium paid to MIDC for reservoir plot at Marol – Rs. 0.2 crore (Uncontrollable)

For FY 2009-10, TPC-D submitted that A&G expenses are likely to rise due to additional administrative expenses likely to be incurred on revenue collection centres, provision of various bill collection options, improvement in connection and disconnection processes, services associated with increase in number of customers, SOP monitoring, miscellaneous, energy auditing, customer information on energy conservation and tariff, etc., enhancement in storage services, etc. Further, there has also been an inflationary rise in the A&G expenses.

For FY 2008-09, the Commission has considered an increase of around 6.04% p.a. on account of inflation factor corresponding to increase in Wholesale Price Index (WPI) and Consumer Price Index (CPI) over the revised level of A&G expenses as approved for FY 2007-08 in this Order. The Commission has considered the point to point inflation over WPI numbers (as per Office of Economic Advisor of Govt. of India) and CPI numbers for Industrial Workers (as per Labour Bureau, Government of India) for a period of 3 years, i.e., FY 2006-07 to FY 2008-09 (upto December 2008), to smoothen the inflation curve. The Commission has considered a weight of 60% to WPI and 40% to CPI, based on the expected relationship with the cost drivers. This also considers the deduction made by the Commission on account of disallowance of the expenditure towards Tata Brand Equity. Further, the Commission has not considered expenses towards contributions/donations incurred in FY 2008-09 in line with the philosophy adopted while truing up A&G expenses for FY 2007-08, which has been elaborated in this Order. The Commission will undertake the final truing up of A&G expenses for FY 2008-09 based on actual A&G expenses for the entire year and prudence check, during the APR process for FY 2009-10.

Further, as regards appointment of consultants, the Commission directs TPC that in future, any appointment of consultants where the estimated cost for the engagement of the Consultants is more than Rs. 1 crore, it should ensure that the selection is made through a competitive bidding process, proper Terms of Reference are prepared, cost benefit analysis is stated upfront and the deliverables of the consultancy assignment are properly defined. TPC-D should submit the following details for all consultancy assignments of more than Rs 1 Crore in its APR and Tariff Petition:

Page 100 of 185



- Process followed for appointment of Consultant including number of bids received along with bid documents
- Stated Cost-Benefit analysis and assessment of cost benefit analysis after completion of the assignment
- List of Deliverables submitted by Consultant

For FY 2009-10, for each sub-head of A&G expenditure, the Commission has considered an increase of around 6.04% p.a. on account of inflation over the revised level of A&G expenses as approved for FY 2008-09 under the provisional truing up exercise in this Order, based on the increase in Wholesale Price Index (WPI) and Consumer Price Index (CPI). Accordingly, the approved A&G expenses for FY 2008-09 and FY 2009-10 are summarised in the following Table:

Table: A&G Expenses for FY 2008-09 and FY 2009-10 (Rs. Crore)

Particulars		FY 2008-09			FY 2009-1	.0
	APR Order	Revised Estimate by TPC	Approved After provisional truing up	MYT Order	Revised Estimate by TPC	Approved
Net A&G expenses		16.03	14.94		20.75	15.84
Less Brand Equity	12.77	(1.57)	(1.57)	10.73	(1.81)	(1.81)
Net A&G expenses (excluding Brand Equity)	12.,,	14.46	13.37	10.70	18.94	14.03

4.6.3 <u>R&M expenses</u>

TPC submitted that based on the actual R&M expenses for first half of FY 2008-09 and estimated R&M expenses for the remaining half of the year, the revised R&M expenditure for FY 2008-09 is estimated at Rs 9.54 Crore, which is higher than the R&M expenditure of Rs 5.35 Crore approved in the APR Order. TPC-D submitted the

Page 101 of 185



reasons for the increase in the R&M expenses as compared to the approved expenses, as under:

- § Increased monitoring activities and protection of cable during road widening/improvement projects by MMRDA/ MCGM Rs.0.30 Crore (Uncontrollable)
- § Increase in essential expenses on account of network maintenance, metering services, customer services as these are required to maintain reliable power supply to customers. Rs. 1.50 Crore (Uncontrollable)
- § Replacement of cable terminations (25 nos.) for preventing failure due to ageing- Rs. 0.25 Crore (Uncontrollable)
- § Increase in Reinstatement charges by MCGM/ MMRDA Rs. 0.30 Crore (Uncontrollable)
- § Upward revision in premium paid to MIDC for reservoir plot at Marol Rs.0.18 Crore
- § Dilapidated building needing repairs Rs.0.10 Crore
- § Increase in repairs and maintenance of cables (faults and termination) Rs.0.40 Crore

TPC-D therefore, estimated that an amount of Rs. 1.20 Crore would be incurred to meet the expenses related to uncontrollable elements as mentioned above, and requested the Commission to approve the same. For FY 2009-10, TPC submitted that it had estimated the R&M expenses to be of the order of Rs. 14.26 crore, as against Rs. 3.39 crore approved by the Commission in the MYT Order.

In response to the Commission's query, TPC-D clarified that the reason of "upward revision in premium paid to MIDC for reservoir plot at Marol", had been inadvertently reproduced under the justification for higher R&M expenses, however, there was no revision to the R&M expenses on this account. The Commission is of the view that all the activities mentioned by TPC-D for justifying the increase in the R&M expenses are normal R&M expenses, which need to be undertaken by any distribution licensee, and cannot be treated as 'additional' costs over R&M expenses approved by the Commission, and the expenses have to be considered as controllable. For FY 2008-09, the Commission has considered an increase of around 5.19% p.a. on account of inflation factor corresponding to increase in Wholesale Price Index (WPI) over the revised level of R&M expenses as approved for FY 2007-08 under the truing up exercise in this Order. The Commission has considered the point to point inflation





over WPI numbers (as per Office of Economic Advisor of Govt. of India) for a period of 3 years, i.e., FY 2006-07 to FY 2008-09 (upto December 2008), to smoothen the inflation curve. The Commission will undertake the final truing up of R&M expenses for FY 2008-09 based on actual R&M expenses for the entire year and prudence check, during the APR process for FY 2009-10.

For FY 2009-10, for each sub-head of R&M expenditure, the Commission has considered an increase of around 5.19% p.a. on account of inflation over the revised level of R&M expenses as approved for FY 2008-09 under the provisional truing up exercise in this Order, based on the increase in Wholesale Price Index (WPI), as detailed above. Accordingly, the approved R&M expenses for FY 2008-09 and FY 2009-10 is summarised in the following Table:

- 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1											
Particulars	3	FY 2008-09)	FY 2009-10							
	APR	Revised	Approved	MYT	Revised	Approved					
	Order	Estimate	After	Order	Estimate						
		by TPC	provisional		by TPC						
			truing up								
Net R&M	5.35	9.54	6.63	3.39	14.26	6.97					
expenses	3.33	7.54	0.03	3.37	17.20	0.77					

Table: R&M Expenses for FY 2008-09 and FY 2009-10 (Rs. Crore)

4.6.4 O&M expenses

The total O&M expenses approved by the Commission for FY 2008-09 and FY 2009-10 is summarised in the following Table:

Table: O&M Expenses for FY 2008-09 & FY 2009-10 (Rs. Crore)

Particulars		FY 2008-0	09	FY 2009-10			
	1 1		Approved After	MYT Order	Revised Estimate	Approved	
	Oluci	by TPC	provisional	Oluei	by TPC		
			truing up				
Net employee expenses	12.79	18.28	14.65	11.66	23.38	15.72	
Net A&G expenses	12.77	14.46	13.37	10.73	18.94	14.03	

Page 103 of 185



Particulars	FY 2008-09			FY 2009-10			
	APR Revised Approved			MYT	Revised	Approved	
	Order	Estimate	After	Order	Estimate		
		by TPC	provisional		by TPC		
			truing up				
Net R&M expenses	5.35	9.54	6.63	3.39	14.26	6.97	
Total O&M expenses	30.91	42.28	34.64	25.78	56.58	36.72	

4.7 CAPITAL EXPENDITURE AND CAPITALISATION FOR FY 2008-09 AND FY 2009-10

Capital expenditure and capitalisation are two important variables that influence computation of various critical parameters such as depreciation, interest on long term debt and return on equity. Accordingly, variation between the approved values and actual performance during the Control Period needs to be evaluated carefully during Annual Performance Review. The capitalisation considered by the Commission in the APR Order, MYT Order, and the revised estimates submitted by TPC are given in the Table below:

Table: Capitalisation projected by TPC-D for FY 2008-09 & FY 2009-10

(Rs. Crore)

Particulars	FY 2008-09			FY	2009-10
	MYT	APR Revised		MYT	Revised
	Order	Order Estimate		Order	Estimate by
			by TPC		TPC
Capitalisation	20.45	73.27	87.12	10.52	323.84

TPC-D submitted that the capital expenditure in FY 2008-09 is expected to be Rs. 79.35 Crore as against the capital expenditure of Rs. 39.08 Crore estimated in TPC-D's APR Petition for FY 2007-08, and Rs. 68.15 Crore approved by the Commission. Further for FY 2009-10, capital expenditure proposed by TPC-D is Rs. 441 Crore as against Rs. 6 Crore approved in the MYT Order. As regards capitalisation, TPC-D submitted the revised estimate for FY 2008-09 as Rs. 87.12 crore, as against Rs. 73.27

Page 104 of 185



crore approved by the Commission in the APR Order, and projected capitalisation of Rs. 323.84 crore for FY 2009-10, as against Rs. 10.52 crore approved in the MYT Order.

According to TPC-D, the increase in the capital expenditure during the period is primarily on account of TPC-D undertaking the strengthening of its distribution network for catering to new consumers subsequent to the Judgment of Hon'ble Supreme Court dated July 8, 2008 regarding TPC's Distribution Licence. The expansion of TPC-D's distribution network is planned on the basis of the load growth in various areas. By the end of FY 2011-12, TPC-D proposes to strengthen its distribution network in at least 9 Wards and by FY 2013-14, it is planned to strengthen the distribution network in all the 24 wards. The broad scope of work in the network rollout plan involves setting up of Distribution Substation (DSS), Consumer Substation (CSS), laying of cables (33 kV and 11 kV), and erection of Switchgears and Ring Main Unit (RMU). TPC-D has planned capital expenditure of Rs. 300 Crore in FY 2009-10 towards the proposed network rollout plan.

The major Detailed Project Report (DPR) schemes estimated to be capitalised in FY 2008-09 by TPC-D are:

- Ø Power supply to Railways from Borivli
- Ø 110 kV Single Phase Supply to Railways
- Ø 2 x 20 MVA Substation at Nirlon, Goregaon
- Ø Power supply to new consumers
- Ø Augmentation of distribution substations.

The major DPR schemes estimated to be capitalised in FY 2009-10 by TPC-D are:

- Ø Single Phase Power Supply to Central Railway's Thane Traction Substation
- Ø Single Phase Power Supply to Central Railway's Wadala Traction Substation
- Ø Distribution system strengthening related works
- Ø HT Cable and LT Cable related works.

As regards, Non-DPR schemes, TPC has proposed capitalisation of Rs 18.13 Crore during FY 2008-09 and Rs 10.39 Crore during FY 2009-10 as against Rs 38.10 Crore for FY 2008-09 approved under APR Order and Rs 10.52 Crore for FY 2009-10 as approved under MYT Order, by the Commission.

Page 105 of 185



The revision in ARR/tariff sought by different Utilities as a part of the Annual Performance Review (APR) process for FY 2008-09 can be attributed primarily to increase in power purchase cost of distribution licensees and the steep increase in capital expenditure and capitalisation being undertaken by the Utilities in recent years. The issue of increase in power purchase expenses is being dealt with in the Orders of the respective distribution licensees, since the reasons for the increase are different for different distribution licensees. However, the issue of steep increase in capital expenditure and capitalisation is a generic issue and relevant for all the Utilities.

The Commission appreciates that the investment on capex schemes is an ongoing process for any Utility/Licensee. Capital expenditure is required for healthy system development with tangible and intangible benefits. The scope, objective and benefits are identified while formulating DPRs. However, after implementation of the scheme, before capitalisation, the benefits are to be demonstrated by the Utility before the scheme can be considered for passing on the costs to the consumers. The Utility is required to execute the capex schemes in a phased manner so as to minimise tariff shock attributable to capex implementation. The Commission can permit capex in the ARR only after the above-mentioned prudence check as there is an impact on tariff.

To understand the significance of the capitalisation claimed by TPC-D, the actual capitalisation over the last four to five years vis-à-vis the opening GFA prevailing around 5 years ago have been compiled as under:

	FY 2004- 05	FY 2005-06	FY 2006-07	FY 2007- 08	FY 2008- 09	FY 2009- 10
Particulars	Actuals	Actuals	Actuals	Actuals- TPC submission	Revised Estimate	Projected
Opening GFA						
TPC-G	2452.00	2595.43	2679.88	2714.15	2738.62	3086.40
TPC-T	970.22	966.29	1032.97	1045.67	1088.51	1262.46
TPC-D	282.53	282.37	359.25	395.07	436.31	523.30
Total TPC	3704.74	3844.09	4072.10	4154.90	4263.43	4872.15
Asset addition during the year						
TPC-G	150.52	86.54	41.26	54.45	349.70	220.18
TPC-T	0.00	7.34	21.63	51.43	174.73	344.86
TPC-D	0.77	6.84	37.03	41.59	87.12	323.84
Total TPC	151.29	100.72	99.91	147.46	611.54	888.89
Asset write off/retirement during						

Page 106 of 185



MERC, Mumbai

	FY 2004- 05	FY 2005-06	FY 2006-07	FY 2007- 08	FY 2008- 09	FY 2009- 10
Particulars	Actuals	Actuals	Actuals	Actuals- TPC submission	Revised Estimate	Projected
the year						
TPC-G	(7.09)	(3.51)	(6.99)	(29.98)	(1.92)	0.00
TPC-T	(3.92)	(0.19)	(8.93)	(8.60)	(0.78)	0.00
TPC-D	(0.93)	(0.61)	(1.32)	(0.35)	(0.13)	0.00
Total TPC	(11.94)	(4.31)	(17.24)	(38.93)	(2.82)	0.00
Closing GFA						
TPC-G	2595.43	2678.46	2714.15	2738.62	3086.40	3306.58
TPC-T	966.29	973.44	1045.67	1088.51	1262.46	1607.32
TPC-D	282.37	288.61	394.96	436.31	523.30	847.14
Total TPC	3844.09	3940.51	4154.77	4263.43	4872.15	5761.04

The above compilation has been done for TPC as a whole, to give a better picture of the overall increase in asset addition over the last five years, since TPC was earlier being regulated as an integrated Utility.

It is clear from the above Table that the Gross Fixed Assets have increased by around 35%, 66%, and 200% for the Generation, Transmission, and Distribution Business, respectively, over the last five years. The pace of asset addition has increased by leaps and bounds over the last five years. TPC-D has projected to almost treble its asset base (as in FY 2004-05) by the end of FY 2009-10, while TPC-G and TPC-T have also proposed to increase their asset base (as in FY 2004-05) to around 1.3 to 1.7 times. Further, when TPC was operating in an integrated manner during the period from FY 2004-05 to FY 2006-07, the total asset addition every year was only around Rs. 100 to 150 Crore, whereas in FY 2008-09 and FY 2009-10, each of the Businesses are individually adding assets of more than this amount every year on an average. The addition to the asset base is clearly not commensurate either with the increase in sales or increase in demand in MW served. Since, the Utilities were able to serve the existing consumer base well enough with the existing assets, the rationale for this steep increase in the asset base needs to be examined further. The favourite argument of the Utilities that in the past, there was a backlog on this account and that they want to rake it up is also unconvincing to justify the 100% increase in the asset base in such a short period.

In the case of TPC-D, the DPRs submitted by TPC-D for approval of the proposed network roll out plan, as a consequence of the Judgment of the Honourable Supreme

Page 107 of 185



Court and notification of the MERC (Specific Conditions of Distribution Licence applicable to The Tata Power Company Limited) Regulations, 2008 in the context of TPC-D's distribution licence have been touted as the reason for the steep increase in the capital expenditure and capitalisation for FY 2009-10. Since the DPRs for the network rollout plan are yet to be approved by the Commission, the same have not been considered by the Commission at this stage, while approving the capital expenditure and capitalisation of TPC-D for FY 2009-10. In this regard, the Commission has already directed TPC-D has to comply with all the provisions of the EA 2003 as well as the MERC (General Conditions of Distribution Licence) Regulations, 2006, notified on November 27, 2006, and the MERC (Specific Conditions of Distribution Licence applicable to The Tata Power Company Limited) Regulations, 2008.

It is observed that TPC-D has proposed a roll-out plan covering only 9 Wards, primarily overlapping with the licence area currently being served primarily by Reliance Infrastructure Limited – Distribution Business (RInfra-D), and no roll out plan has been proposed for the Wards being served primarily by the BEST till FY 2011-12, except one Ward at Wadala. TPC-D will have to meet its licence obligations in its entire licence area, and cannot pick and choose the Wards wherein it will supply electricity. Moreover, incurring heavy capital expenditure for the network roll-out is not the only option available to TPC-D in its efforts to supply electricity to different consumers in its licence area, and the provisions of the EA 2003 relating to Open Access and the provisions of the MERC (General Conditions of Distribution Licence) Regulations, 2006 relating to use of the distribution network of another distribution licensee, need to be explored by TPC-D, so that the cost is optimised. The Honourable Supreme Court also, in its Judgment on the matter of TPC's distribution licence, observed that TPC could supply to consumers in its licence area, by utilising the distribution network of the other distribution licensee already present in the area. Hence, incurrence of capex cannot be a condition for meeting the Licensee's obligations to all the consumers. In fact, the capital costs should be incurred only when there is no better optimal solution.

Section 42 of the EA 2003 and the MERC (Distribution Open Access) Regulations, 2006, specify the framework for supplying to certain consumers through the Open Access route. Also, the MERC (General Conditions of Distribution Licence) Regulations, 2006, specify as under:

Page 108 of 185



"8.3.5 The Distribution Licensee shall provide "Non discriminatory Open Access" to the Distribution System (for wheeling of electricity) for use by any Licensee, Generating Companies including Captive Generating Plants or Consumers in accordance with the Regulations made by the Commission for the purpose.

8.3.6 The Distribution Licensee shall provide to other licensees the intervening distribution facilities to the extent of surplus capacity available, in his Distribution System in accordance with the Regulations made by the Commission for the purpose or as directed by the Commission and in the event of any dispute as to the availability of the surplus capacity the same shall be determined by the Commission. The charges, terms and conditions for the use of the intervening facilities may be mutually agreed between the Licensees subject to any order made by the Commission for the purpose."

In the regulated business, the returns to the investors are linked to the equity invested in the business, which in turn is directly linked to the existing asset base and assets added every year. The steep increase in the asset base every year has been suggested by the consumers to be an attempt by the Utilities to increase the returns from the regulated business, as has been suggested by the consumers during the Public Hearing conducted by the Commission on the APR Petitions filed by the Utilities.

The Commission has conducted a Public Hearing on the Petitions filed by different Utilities to ascertain the views of the consumers and other stakeholders on the Petition and the tariff increase sought by the Utility. During the Public Hearings, there was a huge resistance to the proposed tariff increase and one of the common objections put forth by the consumers and the public have been that the increase in ARR/tariff being sought by the Utilities is exorbitant and the capital expenditure should not be allowed to the extent sought by the Utilities, since there has not been any noticeable increase in the sales quantum or any significant improvement in some cases deterioration in the service quality over the period.

Further, as regards capital expenditure, the Commission has instituted a process of giving in-principle approval for the capital expenditure schemes costing above Rs. 10 Crore (together known as DPR Schemes), wherein the Utility has to submit Detailed Project Report (DPR) as well as the expected cost-benefit analysis, pay back period, *Page 109 of 185*



etc., as per well laid out guidelines. Schemes costing less than Rs. 10 Crore are considered as non-DPR schemes and the Utilities are not required to submit any DPR for the approval of the same. It is often observed that at the time of obtaining inprinciple approval of the Commission for the DPR schemes, the Utilities indicate several quantifiable benefits and a short payback period. However, the Utilities are not able to substantiate the benefits once the capital investment is actually undertaken and the assets are added to the Gross Fixed Assets (GFA). As a result, the costs and hence, the tariffs are increased, but the expected benefits to the system do not accrue.

In this regard, the in-principle approval given by the Commission to the DPR Schemes has certain standard covenants. One such in-principle approval given to a scheme submitted by MSETCL is reproduced below, for reference:

"..

- 2. Please note that this in-principle clearance should not be construed as final approval for ARR purpose and the scheme will be open for scrutiny during the tariff determination process/ARR review, particularly in the context of actual cost incurred, scope and objective achieved etc. ex post after implementation of the scheme. MSETCL will be required to submit the status of implementation of the scheme with cost incurred till date, likely completion date etc. along with their ARR petition or during the tariff determination process at the appropriate time.
- 3. MSETCL should submit half yearly report giving the status of implementation of the scheme in terms of expenditure incurred and item wise physical progress achieved during the implementation of the scheme.
- 4. Assets created after execution of the scheme should be maintained separately in the Asset register.
- 5. Immediately after completion / commissioning of the respective scheme, MSETCL should communicate to the Commission the date of completion of the scheme, actual cost incurred, escalation in cost, if any with reasons, the scope and objectives of the scheme and to what extent they have been achieved, etc. so as to facilitate a comparison between the in-principle clearance and the actual." (emphasis added)

Page 110 of 185



However, the Utilities have not been able to submit any evidence that the scope and objective of the scheme have been achieved.

In this context, the recent Report by Forum of Regulators on Multi-Year Framework has also emphasized that the capital expenditure plans of Utilities should clearly bring out cost benefit analysis and targeted reduction in technical losses.

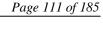
Also, the quantum of capital expenditure under non-DPR schemes should not be very high, as compared to the DPR schemes, as this defeats the very purpose of classifying schemes costing above Rs. 10 Crore as DPR schemes and requiring regulatory scrutiny of the schemes.

In this regard, the Commission in its APR Order for Maharashtra State Electricity Transmission Company Limited (MSETCL) for FY 2007-08 as well as the MYT Orders for Utilities had observed as under:

"However, the Commission would like to reiterate that in-principle approval of the scheme does not absolve the senior management of MSETCL of their responsibility to prioritise various schemes and undertake cost benefit analysis and financial analysis to validate the commercial prudence of each scheme. MSETCL should ensure that the projected benefits actually accrue for the benefit of the stakeholders. It would be essential to monitor progress of each scheme as well as track expenditure and benefits accrued as per the scheme."

. . .

"The increase in quantum of Non-DPR schemes indicates an unhealthy trend, as the Commission feels that there is a tendency to split distribution scheme so that capital outlay of the scheme is below Rs. 10 Crore, to escape regulatory scrutiny. The Commission will take a review of the schemes being classified under Non-DPR category, and in case it is found that these schemes should have ideally been classified under DPR category, then that capex and the related capital charges will be disallowed till the DPR is submitted and the scheme is approved by the Commission."



In view of the above, as a general rule, the Commission has decided that the total capital expenditure and capitalisation on non-DPR schemes in any year should not exceed 20% of that for DPR schemes during that year. To achieve the purpose, the purported non-DPR schemes should be packaged into larger schemes by combining similar or related non-DPR schemes together and converted to DPR schemes, so that the in-principle approval of the Commission can be sought in accordance with the guidelines specified by the Commission.

Further, in the absence of documentary evidence that the stated purpose and objective of the capex schemes have been achieved, MERC is restricting the capitalisation considered for the purposes of determination of ARR and tariff. Once the Utilities submit the necessary justification to prove that the scope and objective of the capex scheme has been achieved as projected in the DPR, the same may be considered in future Orders. TPC is directed to prioritise the capex schemes based on importance and the schemes may be implemented in a phased manner to minimise the impact on distribution cost.

For the purpose of APR exercise for FY 2008-09 and determination of Revenue Requirement for FY 2009-10, the Commission has provisionally considered the capitalisation for the respective years only corresponding to approved DPR schemes and Non-DPR schemes as already approved under MYT Order and APR Orders. The capitalisation of new schemes proposed to be initiated during FY 2008-09 or FY 2009-10 have not been considered at this stage. However, the same shall be considered at the time of annual performance review, subject to prudence check. Accordingly, revised estimate for capitalisation for FY 2008-09 and approved capitalisation for FY 2009-10 is summarised in the following Table:

Table: Approved Capitalisation for FY 2008-09 and FY 2009-10

(Rs. Crore)

Particulars	FY 2008-09				FY 2009-10			
	MYT Order	APR Order	Revised Estimate	Approved after	MYT Order	Revised Estimate	Approved	
	Oluci	Oluci	by TPC	provisional	Oruei	by TPC		
				truing up				
Capitalisation	20.45	73.27	87.12	46.55	10.52	323.84	10.68	

Page 112 of 185



4.8 DEPRECIATION AND ADVANCE AGAINST DEPRECIATION

The Commission, in its APR Order, had considered depreciation expenditure of Rs 16.78 Crore for FY 2008-09 and in its MYT Order had considered depreciation of Rs 17.16 Crore for FY 2009-10, which amounts to 3.80% and 3.54% of Opening level of Gross Fixed Assets (GFA) of TPC-D for FY 2008-09 and FY 2009-10, respectively. The opening GFA was considered as Rs 442.16 Crore and Rs 485.43 Crore for FY 2008-09 and FY 2009-10, respectively, and the depreciation rates were considered as prescribed under MERC Tariff Regulations.

TPC, under its APR Petition, submitted the revised estimate of depreciation expenditure for FY 2008-09 and FY 2009-10 as Rs 16.01 Crore and Rs 18.79 Crore, respectively. TPC-D in its Petition submitted that depreciation for FY 2008-09 does not include the depreciation on account of assets capitalised during the year. However, TPC-D has filed an appeal in the ATE in the matter and would seek appropriate adjustments in the approved cost in case a favourable Judgment is delivered by the ATE in the matter.

Table: Depreciation expenditure projected by TPC for FY 2008-09 & FY 2009-10 (Rs. Crore)

Particulars	I	FY 2008-09	FY 2009-10		
	APR Revised Estimate		MYT	Revised Estimate	
	Order	by TPC	Order	by TPC	
Depreciation	16.78	16.01	17.16	18.79	
Opening GFA	442.16	436.31	485.43	523.30	

Essentially, the revision in depreciation is on account of lower capitalisation actually achieved during FY 2007-08 resulting in lower level of opening GFA for FY 2008-09 as compared to that projected at the time of the APR Order.

TPC-D, in its additional submissions, confirmed that depreciation has not been claimed beyond 90% of the asset value, in line with the MERC Tariff Regulations. The Commission has considered the depreciation on the opening GFA only and not on the assets added during the year in accordance with the MERC Tariff Regulations. In view of revised value of capitalisation as approved under previous paragraphs, the

Page 113 of 185



approved depreciation expenditure for FY 2008-09 and FY 2009-10 is summarised in the following Table:

Table: Approved Depreciation expenditure for FY 2008-09 & FY 2009-10

(Rs. Crore)

Particulars		FY 2008-09		FY 2009-10			
	APR	Revised	Approved	MYT	Revised	Approved	
	Order	Estimate by		Order	Estimate by		
		TPC			TPC		
Depreciation	16.78	16.01	16.02	17.16	18.79	17.29	
Opening GFA	442.16	436.31	436.62	485.43	523.30	483.04	

The Commission will undertake the truing up of Depreciation based on actual capitalisation during the entire year, subject to prudence check, during Performance Review for the third year of the Control Period, i.e., FY 2009-10.

4.9 INTEREST EXPENSES

The Commission, in its APR Order, had allowed interest expenses of Rs 10.37 Crore for FY 2008-09 and in its MYT Order, allowed interest expenses of Rs 11.65 Crore FY 2009-10, with a weighted average interest rate of around 9.3% p.a. and 9.2% p.a., respectively.

TPC-D, in its APR Petition, submitted the revised estimate of interest expenses for FY 2008-09 and FY 2009-10 as Rs 13.63 Crore and Rs 30.70 Crore, respectively, at a weighted average interest rate of 10.8% and 11.6% for FY 2008-09 and FY 2009-10, respectively.

Table: Interest expenditure projected by TPC for FY 2008-09 and FY 2009-10

(Rs. Crore)

Particulars	F	FY 2008-09	FY 2009-10		
	APR Revised Estimate		MYT	MYT Revised Estimate	
	Order	by TPC	Order	by TPC	
Op. balance of loan	101.28	98.97	126.55	153.83	

Page 114 of 185



Particulars	I	FY 2008-09	FY 2009-10		
	APR	Revised Estimate	MYT	Revised Estimate	
	Order	by TPC	Order	by TPC	
Loan Addition	26.67	60.98	7.36	226.68	
Loan Repayment	(6.12)	(6.12)	(7.24)	(6.78)	
Closing Balance of loan	121.83	153.83	126.68	373.74	
Interest expenses	10.37	13.63	11.65	30.70	
Effective Interest rate	9.3%	10.8%	9.2%	11.6%	

TPC submitted that the interest on long-term debt for FY 2008-09 has been computed based on interest on normative loans for previous years, actual loans for FY 2006-07 and FY 2007-08 and interest on 70% of the expenditure to be capitalised in FY 2008-09. TPC has raised a loan of Rs. 450 Crore from IDFC to fund its current capital expenditure as per following terms:

- Tenor: 12 years with 3 year moratorium and 9 years repayment
- Interest Rate: 5 year G-Sec rate +1.45% p.a. subject to minimum of 8.90% (if the Company is not able to maintain a rating of AAA six (6) months prior to the interest rate reset date, then IDFC will have the right to revise the spread).

TPC submitted that based on the above mentioned terms, the interest rate is liable to vary over a period of time. TPC further submitted that IDFC, through its letter dated September 29, 2008, sought to reset the interest rate to 13% from September 29, 2008 for a period of one year and submitted the copy of the letter. Accordingly, TPC considered an average rate of 10.95% (i.e., average of 8.9% and 13%) for FY 2008-09.

TPC further submitted that it has also raised a loan of Rs. 400 Crore from IDBI to fund its current capital expenditure as per following terms:

- Tenor: 13 years with 3 year moratorium and 10 years repayment
- Repayment: 5% of the loan amount to be repaid every year for the first nine years and balance in 10th year
- Interest Rate: BPLR (-) 1.45% p.a. payable monthly. The interest rate to be fixed on each date of disbursement.

TPC submitted the details of disbursement in FY 2008-09 towards IDBI loan as shown in the Table below:

Page 115 of 185



(Rs. Crore)

Month of Disbursement	Quantum of Disbursement	Net Interest Rate
End Mar-08	200	10.49%
8-Aug	92	11.39%
8-Oct	84	14.00%
Total	376	11.53%

Accordingly, TPC submitted that it has considered an average rate of 11.53% for working out the interest liability on assets capitalized in FY 2008-09. TPC also submitted a copy of the letter from IDBI regarding change in the interest rate.

TPC submitted that the IDBI loan is being utilised for all the three functions, viz., Generation, Transmission and Distribution. Based on the capitalisation considered for the three functions, the quantum of Rs. 400 Crore of IDBI loan may not be sufficient. TPC-D submitted that it may have to borrow additionally (including other sources) to finance its Capital Expenditure in FY 2008–09. Pending finalisation of additional loans, for the purpose of estimation of interest for the year, TPC-D assumed that the additional loans would be available at the terms considered above. TPC-D further submitted that the impact of actual loans on the interest cost would be included during the truing up of FY 2008-09 and Annual Performance Review of FY 2009-10.

Further, in response to query, TPC-D confirmed that it has accepted the proposal of IDFC of resetting the interest rate. TPC-D further submitted that in accordance with the clauses of the Loan Agreement, the interest rate to be made applicable is determined by the following:

- Ø Benchmark rate
- Ø Credit Rating of TPC at the time of (6 months prior to) Reset Interest Date.

The rating of TPC was changed from 'AAA' to 'AA' from July 2007. Accordingly the premium of 1.45 % (the Spread) over the Benchmark rate was revisited at the time of Interest Reset Date. IDFC applied the interest rate of 13% to TPC from September 28, 2008. TPC considered the same appropriate as the cost of borrowing by TPC from other sources at the time of Interest Reset Date was around 13 %.

Further, in response to the Commission's query with respect to IDBI loan, TPC-D confirmed that it has accepted the proposal of IDBI of 14% interest rate on the disbursal of Rs. 86 Crore as during that period, the funds in the market had dried up and the interest rate had risen substantially. TPC-D further submitted that the interest

Page 116 of 185



rate on loans available to TPC at that point of time (around October 2008) was in the range of about 14%. TPC-G submitted that the same is evidenced by the rate of interest payable by TPC for a short-term loan of Rs. 500 Crore availed around October 2008, which worked out to 14.4%.

TPC has contemplated that loan from IDFC and IDBI is to be used to fund capital expenditure for new generating station of 250 MW Unit-8 of Trombay Station apart from existing projects of TPC. In response to a query, TPC has submitted the allocation of IDBI and IDFC loans for Generation, Transmission and Distribution businesses as shown in the Table below:

Rs Crore

Year	Source	TPC-G	TPC-G	TPC-T	TPC-D	Total
		Unit 4to 7	Unit-8			
FY 2006-07	IDFC	28.86	1	15.14	26	70.01
FY 2007-08	IDFC	38.11	276.55	36	29.33	379.99
Sub-Total (IDFC)		66.98	276.55	51.15	55.33	450
FY 2008-09	IDBI	244.79	519.17	122.31	60.98	947.25
FY 2009-10	IDBI	154.13	13.74	241.4	226.68	635.95
Sub-Total (IDBI)		398.92	532.91	363.71	287.67	1,583.20
Total		465.89	809.46	414.86	342.99	2,033.20

As observed from the above submissions of TPC, against the sanctioned amount of loan of Rs. 400 Crore from IDBI, TPC-G has considered a loan drawal of Rs. 519.17 Crore for Unit-8 alone. Effectively, the other schemes have been funded by normative loan, since only Rs. 400 Crore has been sanctioned by IDBI till date. Further, as highlighted earlier, as per Regulation 63.1.1 of MERC Tariff Regulations, the funding by way of consumer contribution out of total capitalisation should be accounted for before determining addition of normative loan and regulated equity. As per TPC-D's submission, the capex schemes for supply to Railways are entirely funded by way of consumer contribution, whereas, capex scheme for supply to HPCL has been funded upto Rs 2 crore by way of consumer contribution. Accordingly, for working out the interest rate towards the loan portion of the approved capitalisation for the remaining schemes, the Commission has considered the normative debt:equity ratio, i.e., considered loan as 70% of capitalisation after adjustment on account of consumer

Page 117 of 185



contribution as approved in this Order. As the actual interest rate for IDFC loans during part of the last year was 8.9%, and considering the normative interest rates allowed by the Commission in the previous Order with respect to interest rates prevailing at that time, the Commission has considered a normative interest rate of 9% for working out the interest expenses for FY 2008-09. Further, as against the proposed capital expenditure for FY 2009-10, TPC-D is yet to tie up the loans, therefore, the Commission is of the view that the proposed capital expenditure may be funded from internal accruals and in accordance with the provisions of the MERC Tariff Regulations, the Commission has considered the normative debt: equity ratio of 70:30 for the approved capitalisation for FY 2009-10. Since, TPC-D is yet to tie up for loan for the capital expenditure in FY 2009-10, the Commission has considered the interest rate of 9% on the normative loan on the capitalised amount as approved in this Order for FY 2009-10.

As regards the resetting of the interest rate from IDFC on account of change in rating of TPC from 'AAA' to 'AA', the Commission is of the view that the said change may have been on account of performance of other businesses of TPC, as the regulated business of electricity ensures a guaranteed return, which it earns every year. As regards the regulated business of electricity for Mumbai region, the Commission does not observe any critical or significant factor that might have affected its business. On the one hand TPC-D has claimed payment of Tata Brand Equity, while credit rating of TPC as a whole has slipped due to other businesses and not TPC-D. Accordingly, the Commission does not agree to pass on the impact on interest rate on account of change in credit rating to TPC-D's consumers. Further, as regards the resetting of the interest rate, the letter from IDFC clearly mentions that the proposed reset in interest rate is for one year only. The Commission is of the view that TPC should have made adequate efforts to negotiate the interest rate. Even though the interest expense is a pass through in the tariff charged to the consumers, it does not bar TPC from making adequate and sincere efforts in this regard. The Commission, while estimating the interest expense for FY 2008-09 has considered the average interest rate of 10.95% towards IDFC loan as submitted by TPC, however, for FY 2009-10, the Commission has considered the interest rate of 8.9% on the basis of earlier terms of the loan agreement.

The Commission, in its earlier Tariff Order dated October 3, 2006 (Case No. 12 and 56 of 2005) as well as under MYT Order in Case No. 70 of 2006 and APR Order in *Page 118 of 185*



MERC, Mumbai

Case No. 69 of 2007, has considered interest expenditure on loans corresponding to capitalised assets at interest rate of 10% p.a. for assets put to use during FY 2004-05 and FY 2005-06 and loan repayment period of 10 years in respect of such loans. Further, for assets capitalised during FY 2006-07, the Commission had considered the interest rate in accordance with the loan terms.

Accordingly, the Commission has considered loan repayment and interest for existing loans (i.e., loans corresponding to assets put to use during FY 2004-05 and FY 2005-06) as per earlier terms.

The estimated interest expenditure for FY 2008-09 and approved interest expenditure for FY 2009-10 is summarised in the following Table:

Table: Approved Interest expenditure for FY 2008-09 and FY 2009-10

(Rs. Crore)

Particulars	FY 2008-09			FY 2009-10			
	APR Order	Revised Estimate by TPC	Approved After provisional truing up	MYT Order	Revised Estimate by TPC	Approved	
Op. balance of loan	101.28	98.97	95.97	126.55	153.83	102.54	
Loan Addition	26.67	60.98	12.69	7.36	226.68	7.27	
Loan Repayment	(6.12)	(6.12)	(6.12)	(7.24)	(6.78)	(6.77)	
Cl. Balance of loan	121.83	153.83	102.54	126.68	373.74	103.04	
Interest expenses	10.37	13.63	10.36	11.65	30.70	9.54	
Effective Interest rate	9.3%	10.8%	10.4%	9.2%	11.6%	9.3%	

Page 119 of 185



4.10 INTEREST ON WORKING CAPITAL AND CONSUMERS' SECURITY DEPOSIT FOR FY 2007-08 AND FY 2008-09

As regards Interest on Working Capital, TPC submitted that the interest rate specified under the MERCRC Tariff Regulations for Working Capital, i.e., Short Term PLR of SBI, has been varying through the year. For FY 2008-09, TPC estimated the Interest on Working Capital (IWC) considering interest rate @ 12.75% as per the components considered in the MERC Tariff Regulations, with the revised Interest on Working Capital estimated at Rs 14.25 Crore as against Rs 14.40 Crore approved by the Commission for FY 2008-09. TPC-D estimated the interest on Consumers' Security Deposit as Rs. 1.56 crore, as against Rs. 1.42 crore approved by the Commission in the APR Order.

For FY 2009-10, TPC estimated the Interest on Working Capital (IWC) considering interest rate @ 13.00% as per the Tariff Regulations, with the revised Interest on Working Capital estimated at Rs 11 Crore as against Rs 11 Crore approved by the Commission for FY 2009-10 in the MYT Order. For FY 2009-10, TPC-D estimated the interest on Consumers' Security Deposit as Rs. 3.60 crore, as against Rs. 3 crore approved by the Commission in the MYT Order.

The Commission has estimated the working capital requirement for TPC-D for FY 2008-09 and FY 2009-10, considering the provisional truing up of various elements of costs. The MERC Tariff Regulations stipulate that rate of interest on working capital shall be on normative basis and shall be equal to the short-term Prime Lending Rate of State Bank of India as on the date on which the application for determination of tariff is made. As the application for determination of revenue requirement for FY 2008-09 was made on November 30, 2007, the Commission has considered the short-term Prime Lending Rate of State Bank of India of 12.75% prevalent at that time, for estimating the interest on working capital, which works out to Rs. 13.40 crore. For FY 2009-10, since the APR Petition was filed on December 4, 2008, the interest rate of 13.00% has been considered for estimating the working capital interest, which works out to Rs. 13.53 crore.

Page 120 of 185



The Commission has considered a 10% increase in the Consumers' Security Deposit in FY 2008-09, over FY 2007-08 levels, and the interest on the same has been estimated as Rs. 1.70 crore. For FY 2009-10, the Commission has accepted TPC-D's projection of Consumers' Security Deposit, in view of the projected increase in consumer base, and the interest on the Consumers' Security Deposit has been estimated as Rs. 3.45 crore. The Commission has accepted TPC-D's projections of Other Finance Charges at Rs. 0.53 crore and Rs. 0.50 crore for FY 2008-09 and FY 2009-10, respectively.

The approved interest on working capital and other interest and finance charges for TPC-D for FY 2008-09 and FY 2009-10 is given in the following Table:

Table: Interest on Working Capital for FY 2008-09 and FY 2009-10 (Rs Crore)

Particulars	FY 2008-09		FY 2009-10			
	APR	Revised	Approved	MYT	Revised	Approved
	Order	Estimate	After	Order	Estimate	
		by TPC	provisional		by TPC	
			truing up			
Total Interest on working						
capital, Consumers'	18.11	16.20	15.10	14.52	15.10	16.98
Security Deposit, &	10.11	10.20	15.10	14.52	15.10	10.98
Other financing charges						

4.11 PROVISIONING FOR BAD AND DOUBTFUL DEBTS

In the APR Petition, TPC-D has considered a provision of Rs. 2 Crore and Rs. 4 crore towards Bad and Doubtful debts against the approved amount of Rs. 4 Crore each for FY 2008-09 and FY 2009-10, respectively.

For FY 2008-09 and FY 2009-10, the Commission has considered the provisioning of bad debts as Rs. 1.83 crore, which is the approved and actual level of bad debts in FY Page 121 of 185

()

MERC, Mumbai

2007-08 after final truing up, since no rationale has been submitted for the increase in provisioning for bad debts.

4.12 INCOME TAX FOR FY 2008-09 AND FY 2009-10

TPC-D submitted that for FY 2008-09, the income tax is estimated at Rs 22.15 Crore as against Rs 14.42 Crore approved by the Commission for FY 2008-09 in the APR Order. TPC-D clarified that the above computation of income tax was without setting off the loss of FY 2007-08, and suggested that the set off may be incorporated at the time of final truing up for FY 2008-09. For FY 2009-10, TPC estimated the income tax as Rs. 14.55 Crore as against Rs 10.34 Crore approved by the Commission for FY 2009-10 in the MYT Order.

TPC-D submitted that it has incorporated the Commission's ruling in Case No. 64, 65 and 66 of 2007, wherein, the Commission ruled that normative interest on loan and normative interest on working capital are not actual expenses and hence, will not be eligible as deductible expenses while computing the income tax. The Commission agrees with TPC-D's submission that normative interest on loan and normative interest on working capital are not actual expenses and hence, will not be eligible as deductible expenses while computing the income tax. However, while normative interest on long-term loans has been added to the RoE while computing the Income Tax for FY 2008-09, the normative interest on working capital loan has not been added to the RoE, since it is not possible to project the exact actual interest expense that will be incurred by TPC-D. Depending on the actual interest on working capital incurred by TPC-D, only the difference between the normative interest and actual interest, and that too, only if the actual interest is lower than the normative interest on working capital, will have to be added to the RoE, for computing the Income Tax. Hence, this can be considered at the time of final truing up. Moreover, the issue of book depreciation and tax depreciation is relevant in case of TPC-D and accordingly, the Commission has considered the same while working out the income tax as well as other allowable expenditure and disallowance under various Sections of Income Tax as submitted by TPC-D.

TPC has estimated the income tax liability considering the Tax Written Down Value (WDV) of assets and other provisions of the Income Tax Act, 1961. The Commission has modified the tax computations submitted by TPC to account for the changes in

Page 122 of 185



RoE and regulatory depreciation, and found that there was a significant change in the income tax liability vis-à-vis the income tax considered in the MYT Order. For the purpose of income tax computations, the Commission has considered the RoE as the regulatory profit before tax. Further, the Commission has not grossed up such RoE component for income tax, since the income tax is allowed as part of the ARR as an expense head, in accordance with the MERC Tariff Regulations. The Commission has accepted TPC-D's suggestion that the loss of FY 2007-08 be set off against the tax liability of FY 2008-09 at the time of final truing up for FY 2008-09. TPC-D should ensure that the impact of the carried forward loss is incorporated in the income tax computations of FY 2008-09, at the time of final truing up.

The summary of income tax approved by the Commission in this APR Order for FY 2008-09 and FY 2009-10 is shown in the Table below:

Table: Income tax approved for FY 2008-09 and FY 2009-10

Particulars	(Rs. 0	Crore)
	FY 2008-09	FY 2009-10
Return on Equity	22.85	23.53
Add: Normative Interest on Working Capital	0.00	0.00
Less: Actual Interest on working capital	0.00	0.00
Interest on loan approved by the Commission	10.36	9.54
Less: Actual Interest on Long Term loan	0.00	0.00
Add: Regulatory Depreciation	16.02	17.29
Less: Tax depreciation	-22.44	-48.23
Add: Other Disallowances for computing Income Tax	3.33	3.55
Less: Other Expenses allowed for computing income tax	-2.47	-2.05
Less: Deductions under S. 80-G, 80 IA	0.00	0.00
Total	27.65	3.63
Corporate Tax Rate	33.99%	33.99%
Income Tax	9.40	1.23

Accordingly, the approved income tax liability for FY 2008-09 and FY 2009-10 along with the revised estimates by TPC-D is given in the following Table. The Commission will however, true up the income tax, based on final truing up of revenue and expenditure of TPC-D for FY 2008-09 and FY 2009-10.

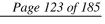




Table: Income Tax for FY 2008-09 and FY 2009-10

(Rs	Crore
1	Citic

Particulars		FY 2008-0	19	FY 2009-10			
	APR Revised Approved			MYT	Revised	Approved	
	Order	Estimate	after	Order	Estimate		
	'	by TPC	provisional		by TPC		
			truing up				
Income Tax	14.42	22.15	9.40	10.34	14.55	1.23	

4.13 CONTRIBUTION TO CONTINGENCY RESERVES FOR FY 2008-09 AND FY 2009-10

TPC projected the contribution to contingency reserves for FY 2008-09 and FY 2009-10 at 0.25% of opening GFA, as Rs. 1.09 Crore and Rs. 1.31 Crore, respectively, in accordance with the MERC Tariff Regulations, as against the contribution to contingency reserves of Rs. 1.11 crore and Rs. 2.00 crore approved by the Commission for FY 2008-09 and FY 2009-10, respectively.

In this regard, the MERC (Terms and Conditions of Tariff) Regulations, 2005 stipulates,

"63.7.1 Where the Distribution Licensee has made an appropriation to Contingencies Reserve, a sum not less than 0.25 per cent and not more than 0.5 per cent of the original cost of fixed assets shall be allowed towards such appropriation in the calculation of wheeling charges:

Provided that where the amount of such Contingencies Reserves exceeds five (5) per cent of the original cost of fixed assets, no appropriation shall be made which would have the effect of increasing the reserve beyond the said maximum:

Provided further that the amount so appropriated shall be invested in securities authorized under the Indian T rusts Act, 1882 within a period of six months of the close of the financial year."





Considering that the overall tariff increase at the retail level has been very steep, in view of various developments discussed in detail in the respective Tariff Orders, in the APR Orders for FY 2007-08, the Commission had provided for contingency reserves for FY 2008-09 for all transmission licensees and distribution licensees at the minimum rate of 0.25% of opening GFA, as permitted under the Commission's Tariff Regulations, rather than 0.5% of opening GFA as claimed by the licensees. The Regulation also stipulates that no such appropriation shall be allowed if the amount of such Contingencies Reserves exceeds five (5) per cent of the original cost of fixed assets. As elaborated in detail in the Commission's Order on the APR Petition filed by TPC-G in Case No. 111 of 2008, based on the treatment of the contingency reserves and the ATE Judgment in this regard, the contingency reserves with TPC-D have reached 5% of the opening GFA, as at the end of FY 2007-08. Thus, for FY 2008-09 and FY 2009-10, the Commission has considered the contribution to contingency reserves at 0.25% of only the incremental addition to GFA during the respective years. For this computation, the Commission has considered the actual capitalisation and revised estimate of capitalisation for these years, as discussed in earlier paragraphs.

The approved contribution to contingency reserves for TPC-D for FY 2008-09 and FY 2009-10 is given in the following Table:

Table: Contribution to Contingency Reserves for FY 2008-09 and FY 2009-10
(Rs Crore)

Particulars		FY 2008-09	9	FY 2009-10		
	APR Order	Revised Estimate by TPC	Approved After provisional truing up	MYT Order	Revised Estimate by TPC	Approved
Contribution to Contingency Reserves	1.11	1.09	0.11	2.00	1.31	0.22

ing.

4.14 RETURN ON EQUITY (ROE) FOR FY 2008-09 AND FY 2009-10

The Commission, in its APR Order, had permitted return on equity to the extent of Rs 23.69 Crore for FY 2008-09 and Rs 27.78 Crore for FY 2009-10 in its MYT Order, at a rate of return of 16% in accordance with Regulation 63.1 of MERC (Terms and Conditions of Tariff) Regulations, 2005.

TPC-D, in its APR Petition, submitted revised estimate for return on equity for FY 2008-09 and FY 2009-10 as Rs 24.70 Crore and Rs 34.56 Crore, respectively.

Table: RoE projected by TPC for FY 2008-09 and FY 2009-10

(Rs. Crore)

Particulars	FY	2008-09	FY 2	2009-10
	APR Revised		MYT	Revised
	Order	Estimate by	Order	Estimate by
		TPC		TPC
Regulatory Equity at the	142.34	141.32	172.03	167.45
beginning of the year				
Equity portion of assets	11.43	26.14	(3.15)	97.15
capitalised	11.43	20.14	(3.13)	71.13
Regulatory Equity at the	153.77	167.45	175.18	264.61
end of the year	133.77	107.13	173.10	201.01
Return on Regulatory				
Equity at the beginning	22.77	22.61	27.52	26.79
of the year				
Return on Equity	0.91	2.09	0.25	7.77
portion of Capitalisation	0.71	2.07	0.23	7.77
Total Return on	23.69	24.70	27.78	34.56
Regulatory Equity	23.07	24.70	21.10	34.30

TPC submitted that based on the capital expenditure and capitalisation and debt:equity norm of 70:30, the return on equity on the equity portion has been considered at 16%. Further, TPC has computed RoE on the opening equity as well as on the 50% of the equity portion of the capitalisation during the year.

In response to the Commission's query, TPC-D provided the information regarding consumer contribution/grants/capital subsidy, which has been utilised for funding the

Page 126 of 185



schemes that have been capitalised during FY 2006-07, FY 2007-08 and FY 2008-09 as Rs. 0.25 Crore, Rs. 3.92 Crore and Rs. 0.94 Crore respectively.

The Commission has computed the RoE for FY 2008-09 and FY 2009-10 on the opening balance of equity as well as 50% of the equity component of the assets capitalised during the year in accordance with the MERC Tariff Regulations as applicable for the distribution business. Further, based on the data on funding of capitalisation in FY 2008-09 through consumer contribution and grants, the Commission has reduced the equity portion on that account, as highlighted under earlier paragraph. Accordingly, approved Return on Equity for FY 2008-09 and FY 2009-10 is summarised in the following Table:

Table: Approved RoE for FY 2008-09 and FY 2009-10

(Rs. Crore)

Particulars		FY 2008-	09		FY 2009-10	
	APR Order	Revised Estimate by TPC	Approved After provisional truing up	MYT Order	Revised Estimate by TPC	Approved
Regulatory Equity at the beginning of the year	142.34	141.32	140.07	172.03	167.45	145.50
Equity portion of assets capitalised	11.43	26.14	5.44	(3.15)	97.15	3.12
Regulatory Equity at the end of the year	153.77	167.45	145.50	175.18	264.61	148.62
Return on Regulatory Equity at the beginning of the year	22.77	22.61	22.41	27.52	26.79	23.28
Return on Equity portion of capitalisation	0.91	2.09	0.44	0.25	7.77	0.25
Total Return on Regulatory Equity	23.69	24.70	22.85	27.78	34.56	23.53



4.15 NON TARIFF INCOME FOR FY 2008-09 AND FY 2009-10

TPC submitted that the Non-Tariff Income for FY 2008-09 was estimated at Rs. 5.49 crore, as against Rs. 3.16 crore approved by the Commission in the APR Order, and comprises recurring income of around Rs. 3.5 crore and non-recurring income of around Rs. 1 crore. For FY 2009-10, TPC projected the non-tariff income as Rs. (0.67) Crore, as compared to Rs. 1 Crore considered by the Commission in the MYT Order. TPC-D submitted that the income from services rendered is negative on account of consultancy/service rendering charges payable to TPC-D for FY 2009-10, which has been considered as income for TPC-D.

The non-tariff income for FY 2007-08, as considered by the Commission in this Order after final truing up is Rs. 10.65 crore. The Commission is of the view that there is no reason for the non-tariff income to reduce in FY 2008-09 and FY 2009-10, and has hence, considered a 10% yearly increase in non-tariff income over the approved levels for FY 2007-08. The non-tariff income for FY 2008-09 and FY 2009-10 is given in the following Table:

Table: Non-tariff Income for FY 2008-09 and FY 2009-10

(Rs Crore)

Particulars	FY 2008-09			FY 2009-10		
	APR Revised Approved		MYT	Revised	Approved	
	Order Estimate After		Order	Estimate		
	by TPC provisiona		provisional		by TPC	
			truing up			
Non-Tariff Income	3.16	5.49	11.72	1.00	(0.67)	12.89

4.16 IMPACT OF RULING IN CASE NO 29 OF 2008

TPC-G filed a Review Petition on the APR Order of TPC-G in Case No. 68 of 2007 on the issue of allocation of the Annual Fixed Charges (AFC) between thermal and hydro stations of TPC-G. The Commission, vide Order dated December 1, 2008 in Case No 29 of 2008, ruled that this was only a matter of allocation between thermal Page 128 of 185

(<u>0</u>)

MERC, Mumbai

and hydro stations and it does not affect the total Annual Fixed Charges of TPC-G, and the Commission may consider the same at the time of truing up. Accordingly, the Commission will consider the marginal impact, if any, on account of the allocation between thermal and hydro stations at the time of undertaking the final truing up for FY 2008-09 along with the APR for FY 2009-10.

4.17 IMPACT OF RULING IN CASE NO 43 OF 2008

TPC-T filed a Review Petition on the APR Order in Case No. 67 of 2007 on erroneous representation of sharing of efficiency gains on account of R&M expenditure in the Order. The Commission, vide Order dated January 21, 2009 in Case No 43 of 2008 upheld TPC-T's Review Petition and has clarified that any impact of the same shall be taken into account by the Commission in its Order on TPC-T's Petition for APR for FY 2008-09 and determination of ARR for FY 2009-10. However, since the final truing up for FY 2006-07 was done on a consolidated basis in TPC-D's APR Order, the impact of the Review Order in Case No. 43 of 2008 has already been considered by the Commission while issuing the Order on the Review Petition filed by TPC-D, as discussed in the next sub-section.

4.18 IMPACT OF RULING IN CASE NO 46 OF 2008

TPC-G filed a Review Petition seeking review/clarification of the Commission's Order dated June 4, 2008 passed in Case No. 69 of 2007. In its Order in Case No. 46 of 2008, the Commission modified the revenue gap/surplus and efficiency gain and losses for FY 2006-07 for TPC as a whole, i.e., TPC-G, TPC-T and TPC-D. The Commission also modified the relevant portions of Para 3.13.1 on 'Revenue Gap/surplus for FY 2006-07 and Efficiency Gain/Losses' and Para 3.13.2 on 'Sharing of Surplus' of its Order dated June 4, 2008. Accordingly, the summary of the net impact of the said Order is shown in the Table below:

Table: Impact of Review Order in Case No. 46 of 2008 (Rs Crore)

Particulars	Refund allowed as per Order in Case No. 69 of 2007	Refund due as per Order in Case 46 of 2008	Net Impact – Amount to be recovered from each licensee
DECE	20.76	20.00	7.06
BEST	38.76	30.90	7.86

Page 129 of 185



TPC-D	36.02	28.71	7.31
Total	116.67	93.00	23.67

Accordingly, all Distribution Licensees have received a higher amount of refund from TPC-G, and therefore, TPC-G is entitled for a refund of the same. The Commission directs that the net impact as shown in the above Table should be recovered from the three Distribution Licensees, and should be adjusted from TPC-G monthly bill to be raised to BEST, RInfra-D, and TPC-D in 10 equal monthly instalments in the remaining months of FY 2009-10.

Accordingly, an amount of Rs. 7.31 crore has been added to the revenue requirement of TPC-D for FY 2009-10.

4.19 ALLOCATION OF LOAD CONTROL CENTRE COST

TPC-T in its APR Petition filed in Case No. 112 of 2008, submitted as under:

- a) The Tata Power Company, through its generating plants in Trombay, Khopoli, Bhira, and Bhivpuri (TPC-G) supplies power to the Distribution Licensees in Mumbai namely BEST, RInfra-D and Tata Power's Distribution business (TPC-D). Further, it also operates transmission assets (TPC-T) to transmit the energy generated as well as power purchased from various parts of the country. TPC-T network is interconnected with MSETCL and RInfra-T system at various points. TPC's Load Control Centre (LCC) is responsible for carrying out various activities for TPC-G, TPC-T and TPC-D.
- b) Also, TPC's LCC acts as a single point contact for coordination between SLDC and other Utilities. TPC LCC is fully equipped with the required infrastructure. Currently, the expenditure incurred on account of LCC operation is part of TPC-T's ARR. TPC has outlined the methodology for allocation of the expenditure incurred for maintaining the LCC and its infrastructure amongst TPC-G, TPC-T and TPC-D.
- c) In the APR Petition for FY 2007-08, it was submitted that about Rs 66 Lakh (a portion of the employee costs) was allocable for carrying out the SLDC function. As the SLDC is setting up the Sub-Load Despatch Centre for monitoring the operations of Mumbai, TPC has assumed that such portion of the employee cost and efforts would now be apportioned to the three functions of TPC, i.e., TPC-G, TPC-T and TPC-D.

Page 130 of 185



TPC further submitted that, TPC's LCC has its own direct expenses such as:

- a. Employee expenses
- b. R&M expenses
- c. A&G Expenses
- d. Depreciation
- e. Interest on Normative Loans
- f. Return on Equity
- g. Interest on Working Capital

Based on the nature of expenses above, TPC considered it appropriate:

- § To allocate the Employee Expenses to TPC-G, TPC-T and TPC-D on the basis of the time spent by the TPC-LCC personnel,
- § To allocate the expense on account of related to 'Infrastructure Expense' on the basis of the data points monitored by the LDC for the three businesses.

Thus, the percentage allocation of LCC's expenses to TPC-G, TPC-T and TPC-D as proposed by TPC for FY 2008-09 and FY 2009-10 is summarised in the Table below:

Table: Percentage allocation of LCC's expenses to TPC-G, TPC-T and TPC-D

Expense Type	Allocation to TPC-G	Allocation to TPC-T	Allocation to TPC-D
Employee Expenses	30.63%	30.83%	38.53%
Infrastructure	27%	68%	5%

Based on the percentage allocation, the cost allocation of LCC's expenses to TPC-G, TPC-T and TPC-D as proposed by TPC is summarised in the Table below:

Table: Cost allocation of LCC to TPC-G, TPC-T and TPC-D for FY 2008-09 and FY 2009-10 each

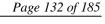
LCC Expenditure item	Total Amount	TPC-G Allocation	TPC-T Allocation	TPC-D Allocation
Total O&M	4.66			
Employee Expenses	3.73	1.14	1.15	1.44
A&G	0.32	0.09	0.22	0.02

Page 131 of 185



LCC Expenditure item	Total	TPC-G	TPC-T	TPC-D
LCC Expenditure item	Amount	Allocation	Allocation	Allocation
R&M	0.61	0.17	0.42	0.03
Interest on Normative Loans	0.37	0.10	0.25	0.02
Interest on Working Loans	0.14	0.04	0.10	0.01
Depreciation	0.78	0.21	0.53	0.04
Return on equity	0.64	0.17	0.43	0.03
Income Tax	0.41	0.11	0.28	0.02
Total	7.00	2.03	3.37	1.60

TPC was earlier undertaking the load despatch function for the Mumbai license area and had built up very costly infrastructure for the same. However, now the Mumbai area sub-LDC is to be operated by the MSLDC, hence, there is no need for TPC to be operating such an LDC. The Commission is of the view that the expense levels indicated by TPC on these heads as shown in the Table above, are very high, and reflect historical expenses, and which cannot be allowed to be recovered from the consumers, for a service that is no longer to be provided by TPC, since the same is being provided by MSLDC. It should be noted that the annual MSLDC Budget, which is approved separately by the Commission, ranges around Rs. 13 to 15 crore, as compared to TPC's LCC expense of Rs. 7 Crore. Given that the MSLDC is charged with the load despatch functions for the State as a whole and is the statutory authority for the same, it does not appear to be reasonable to allow TPC LCC expense, which is around 50% of the MSLDC Budget, even though the functions expected to be performed by the LCC are not statutory and far lesser as compared to the scope of activities of the MSLDC. If this amount is also allowed, it would amount to expenses being allowed twice for the same activity to a certain extent, since the MSLDC has the mandate to manage the load across the State and across all licence areas, including the Mumbai licence area, which was earlier managed by the TPC – LDC, which has not been converted to the LCC. MSLDC has to give despatch instructions to the generating stations as well as regulate the demand imposed on the system by giving load withdrawal instructions in case of a situation of demand-supply gap, over and above the planned demand-supply gap. As regards the Distribution Control Centre (TPC-D) share indicated as Rs. 1.60 Crore, the Commission is of the view that this is also very high, given TPC's very low retail consumer base, of only around 27,000 consumers.





The Commission is of the view that unless basis for accounting for LCC expenditure and the need for this expenditure is established, allowing LCC expenditure of Rs 7.00 Crore or any amount for FY 2008-09 and FY 2009-10 will not be appropriate. The Commission shall duly consider and allow LCC expenditure, as soon as such basis for incurring of LCC expenditure and the benefit/need for this level of expenditure is established by TPC.

The State load despatching functions are to be undertaken by SLDC. Through SLDC budget, the Commission approves the cost associated with MSLDC functions. The approved cost for the relevant period includes the cost associated with Mumbai load despatching activities also. In view of the above, TPC's claim of Rs. 7 Crore for the purpose of Load Control Centre functions can not be granted, which may amount to duplication of function and associated expenditure. There is no justification for loading this avoidable cost on consumers. The Commission has also made this observation to TPC in the previous ARR Orders.

Pending ascertainment of LCC related expenditure and its revised apportionment thereof by TPC, the Commission has not considered LCC related expenditure of Rs 7.00 Crore as claimed by TPC, as part of ARR approval for FY2008-09 and FY 2009-10, under TPC-G, TPC-T or TPC-D.

4.20 DEMAND SIDE MANAGEMENT (DSM) EXPENSES FOR FY 2008-09 AND FY 2009-10

TPC-D submitted that the revised estimate of expenses on Demand Side Management (DSM) activities in FY 2008-09 was Rs. 1.91 crore, i.e., half the original estimate of Rs. 3.82 crore, which was approved by the Commission in the APR Order for FY 2008-09. For FY 2009-10, TPC-D submitted that it has formed a DSM cell and initiated various activities towards DSM, and projected an expenditure of Rs. 7.10 crore against different heads, which has been included in the ARR by TPC-D.

The Commission has accepted TPC-D's revised estimates of expenses on DSM activities, for the purpose of determining the ARR for FY 2008-09 and FY 2009-10. However, this should not be construed as approval given by the Commission for the DSM schemes, for which, TPC-D will have to obtain the Commission's approval through a separate process.

Page 133 of 185



4.21 IMPACT OF ATE JUDGMENT ON TPC-D

TPC-D has submitted the details of the impact of the Judgment given by the ATE on May 12, 2008 on the Appeal filed by TPC against the Commission's Order on truing up for FY 2004-05 and FY 2005-06, and computed the impact of the same on TPC-D as Rs. 130 crore. The Commission has elaborated in detail on all the issues impacted by the ATE Judgment in the APR Order for TPC-G dated May 28, 2009, in Case 111 of 2008, and the additional expense to be passed on to TPC-D in this regard is Rs. 20 crore, which has already been included under the power purchase expenses for TPC-D and hence, the same is not being considered separately.

4.22 REVENUE FROM SALE OF ELECTRICITY IN FY 2008-09 AND FY 2009-10 FROM EXISTING TARIFFS

In its APR Petition, TPC-D estimated the revenue from sale of electricity for FY 2008-09 as Rs. 1362 crore, and submitted the computations of the same for H1 and H2 of FY 2008-09 as a part of the Formats submitted along with the APR Petition. For FY 2009-10, TPC-D estimated the revenue from sale of electricity as Rs. 1348 crore, based on the existing tariffs and the category-wise sales and demand.

For FY 2008-09, the Commission obtained the details of actual revenue earned by TPC-D from sale of electricity during the year, which was submitted by TPC-D as Rs. 1356.02 crore. The same has been accepted by the Commission under the provisional truing up exercise, for computing the revenue gap/(surplus) for FY 2008-09 as discussed in the next sub-section. Based on audited results submitted at the time of APR of FY 2009-10, the Commission will true up the actual expenses and revenue for FY 2008-09, subject to prudence check.

For FY 2009-10, the Commission has verified the computation of the category-wise revenue based on the existing tariffs and the category-wise sales and demand as submitted by TPC-D, and has accepted the same, since the category-wise sales for FY 2009-10 have been accepted as projected by TPC-D.

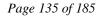


4.23 AGGREGATE REVENUE REQUIREMENT AND REVENUE GAP FOR FY 2008-09 AND FY 2009-10

Based on analysis of each element discussed above, the Aggregate Revenue Requirement and Revenue Gap of TPC-D for FY 2008-09 and FY 2009-10 as approved by the Commission in its APR Order, MYT Order, as estimated by TPC in the APR Petition and as approved by the Commission in this Order is given in the following Tables:

Table: Aggregate Revenue Requirement for FY 2008-09 (Rs Crore)

Sr.	_		FY 2008-09			
No.	Particulars	TPC Petition	APR Order	Commission		
1	Power Purchase Expenses (TPC - G)	1,349.19	1,131.53	1,349.19		
2	Power Purchase Expenses (RPO)	57.20	55.74	57.20		
3	Power Purchase Expenses (Contracted Power, MSEDCL, UI & Other Sources)	(253.42)	(12.59)	(255.42)		
4	Standby Charges Payable	63.58	64.82	64.82		
5	Transmission & SLDC Charges Payable	63.22	65.04	63.22		
6	Operation & Maintenance Expenses	42.27	30.91	34.64		
6.1	Employee Expenses	18.28	12.79	14.65		
6.2	Administration & General Expenses	16.03	12.77	13.37		
	Less: brand Equity (as disallowed by the commission)	(1.57)				
6.3	Repair & Maintenance Expenses	9.54	5.35	6.63		
7	Depreciation, including advance against depreciation	16.01	16.78	16.02		
8	Interest and Other Financial Charges	29.83	28.48	25.99		
8.1	Interest on Long-term Loan Capital	13.63	10.37	10.36		
8.2	Interest on Working Capital and on consumer security deposits	15.66	15.82	15.10		
8.3	Other Finance Charges	0.53	2.29	0.53		
9	Provision for Bad Debts	2.26	4.00	1.83		
10	Income Tax	22.15	14.42	9.40		
11	Contribution to contingency reserves	1.09	1.11	0.11		
12	Other Expenses (DSM Budget)	1.91	3.82	1.91		
13	Total Revenue Expenditure	1,395.30	1,404.06	1,368.92		
14	Return on Equity Capital	24.70	23.69	22.85		
15	Aggregate Revenue Requirement	1,420.00	1,427.75	1,391.77		
16	Less: Non Tariff Income	5.49	3.16	11.72		
17	Less: Income from Sale of Surplus Power	8.94		8.94		
18	Add: Allocation of Load Control Centre Charges	1.60		-		
19	Less: Surplus Determined as per Tariff Order dtd. 4th June 2008 (Pg. 48)	36.02		36.02		





Sr.		FY 2008-09			
No.	Particulars Particulars	TPC Petition	APR Order	Commission	
20	Aggregate Revenue Requirement from Retail Tariff	1,371.15	1,424.59	1,335.10	
21	Revenue from sale of electricity	1361.95		1356.02	
22	Revenue Gap/(Surplus) for FY 2008-09 after provisional Truing up	9.20		(20.92)	

Based on provisional truing up of various elements for FY 2008-09 as discussed in above paragraphs, the Aggregate Revenue Requirement for FY 2008-09 works out to Rs 1335.10 Crore, after considering the surplus of Rs. 36 crore considered earlier based on the Order dated June 4, 2008, as against the amount of Rs 1424.59 Crore approved in the APR Order for FY 2007-08. After considering the revenue from sale of electricity in FY 2008-09, the Commission has estimated that TPC-D will earn a revenue surplus of Rs. 21 crore, as compared to a revenue gap of Rs. 9 crore estimated by TPC-D. The primary reasons for the reduction in revenue requirement are the reduction in O&M expenses on account of allowance on normative basis, reduction of income tax liability due to non-consideration of normative interest on working capital (since the different between the actual interest on working capital can be known only at the end of the year, depending on whether actual working capital loans have been utilised).

The revenue surplus of Rs 21 Crore during FY 2008-09 after provisional truing up has been considered along with the revenue gap for FY 2007-08 after final truing up, for determination of ARR for FY 2009-10, as shown below:

Table: Aggregate Revenue Requirement for FY 2009-10 (Rs Crore)

Sr.			FY 2009-10	
No.	Particulars	Revised Estimate	MYT Order	Commission
1	Power Purchase Expenses (TPC - G)	1,237.78		1,116.69
2	Power Purchase Expenses (RPO)	65.12		63.63
3	Power Purchase Expenses (Contracted Power, MSEDCL, UI & Other Sources)	(237.64)		(382.19)
4	Standby Charges Payable	64.82		59.37
5	Transmission & SLDC Charges Payable	65.04		49.87
6	Operation & Maintenance Expenses	56.59	25.78	36.72
6.1	Employee Expenses	23.38	11.66	15.72

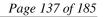
Page 136 of 185



C	Particulars	FY 2009-10		
Sr. No.		Revised Estimate	MYT Order	Commission
6.2	Administration & General Expenses	20.75	10.73	14.03
	Less: brand Equity (as disallowed by the commission)	(1.81)		
6.3	Repair & Maintenance Expenses	14.26	3.39	6.97
7	Depreciation, including advance against depreciation	18.79	17.16	17.29
8	Interest and Other Financial Charges	45.78	26.22	27.02
8.1	Interest on Long-term Loan Capital	erest on Long-term Loan Capital 30.70 11.65		9.54
8.2	Interest on Working Capital and on consumer security deposits	14.59	14.00	16.98
8.3	Other Finance Charges	0.50	0.57	0.50
9	Provision for Bad Debts	3.50	4.00	1.83
10	Income Tax	14.55	10.34	1.23
11	Contribution to contingency reserves	1.31	2.00	0.22
12	Other Expenses (DSM Budget)	7.10		7.10
13	Total Revenue Expenditure	1,342.74	85.50	998.78
14	Return on Equity Capital	34.56	27.78	23.53
15	Aggregate Revenue Requirement	1,377.30	113.28	1,022.31
16	Less: Non Tariff Income	(0.67)	1.00	12.89
17	Add: Allocation of Load Control Centre Charges	1.60		-
18	Aggregate Revenue Requirement from Retail Tariff	1,379.57	112.28	1,009.42
19	Sharing of gains & losses for FY 2006-07	11.00		11.00
20	Impact of ATE Judgment for FY 2004-05 & FY 2005-06	130		20
21	Revenue Gap/(Surplus) for FY 2007-08 after final Truing up	155.79		135.43
22	Revenue Gap/(Surplus) for FY 2008-09 after provisional Truing up	9.20		(20.92)
23	Sharing of gains & losses for FY 2008-09 & Un-recovered FAC	25.00		0.00
24	Carrying cost on revenue gap for FY 2007-08 & FY 2008-09	32.00		0.00
25	Impact of Review Order in Case No. 46 of 2008			7.31
26	Total Revenue Requirement for FY 2009-10	1,742.56		1,162.25

The Aggregate Revenue Requirement for FY 2009-10 is significantly lower than that projected by TPC-D primarily due to the following reasons:

§ Reduction in power purchase expenses due to consideration of revenue from sale of surplus power in imbalance pool, as well as reduction in cost of power purchase from TPC-G, due to the revision in the tariff applicable for TPC-G, as determined in a separate Order for TPC-G in Case No. 111 of 2008. Hence,





- this does not affect TPC-D.
- § Reduction in transmission tariff payable by TPC-D, due to the downward revision in the transmission tariff, as determined in a separate Order in Case No. 155 of 2008. Hence, this does not affect TPC-D.
- Reduction in proposed capitalisation and consequent reduction in interest costs and return on equity components, reduction in approved Income Tax for FY 2009-10, adjustments of revenue surplus due to final true-up of FY 2007-08 and provisional true-up of FY 2008-09. These being adjustments from other heads, notional payments of tax, etc., does not affect TPC-D.
- § Reduction in the impact on account of the ATE Judgment, in accordance with the rationale elaborated in the APR Order for TPC-G in Case No. 111 of 2008.
- § Reduction of Rs. 32 crore, due to non-inclusion of any carrying cost on account of the revenue gap for FY 2007-08 and FY 2008-09, though in this case, the Commission has projected a revenue surplus, and if carrying cost is considered, the revenue requirement will reduce further.

Accordingly, the Commission approves Aggregate Revenue Requirement for FY 2009-10 as Rs 1162.25 Crore.



5 TARIFF PHILOSOPHY AND CATEGORY-WISE TARIFFS FOR FY 2009-10

5.1 APPLICABILITY OF REVISED TARIFFS

The revised tariffs will be applicable from June 1, 2009. In cases, where there is a billing cycle difference for a consumer with respect to the date of applicability of the revised tariffs, then the revised tariff should be made applicable on a pro-rata basis for the consumption. The bills for the respective periods as per existing tariff and revised tariffs shall be calculated based on the pro-rata consumption (units consumed during respective period arrived at on the basis of average unit consumption per day multiplied by number of days in the respective period falling under the billing cycle).

The Commission has determined the tariffs and revenue from revised tariffs as if the revised tariffs are applicable for the entire year. The Commission clarifies that any shortfall/surplus in actual revenue vis-à-vis the revenue requirement approved after truing up, due to the applicability of the revised tariffs for only ten months of FY 2008-09, will be trued up at the end of the year.

The Commission will undertake the Annual Review of TPC-D's performance during the last quarter of FY 2009-10. TPC-D is directed to submit its Petition for Annual Review of its performance during the first half of FY 2009-10, as well as truing up of revenue and expenses for FY 2008-09, with detailed reasons for deviation in performance, latest by November 30, 2009.

5.2 REVENUE GAP FOR FY 2008-09 AND FY 2009-10

In the APR Petition, TPC-D submitted that the total revenue gap for FY 2008-09 is estimated at Rs. 26 crore. TPC-D submitted that considering that these values are still an estimate for H2 of FY 2008-09, TPC-D is not seeking recovery of the estimated gap in the present Petition. TPC-D, however, reserved the right to seek recovery of the gap after the determination of the actual amount for the whole year during the truing up process. For FY 2009-10, TPC-D estimated the revenue gap as Rs 406 Crore on a cumulative basis, after considering the revenue gap of previous years, based on

Page 139 of 185



the difference between the revenue requirement of Rs. 1755 crore and estimated revenue from existing tariffs of Rs. 1348 crore.

As elaborated in Section 4.23 of this Order, the Commission has recomputed the revenue gap in FY 2008-09 after considering the ARR approved by the Commission for FY 2008-09 after provisional truing up and the estimated revenue for FY 2008-09. This works out to a surplus of Rs. 20.16 crore, which has been added to the revenue requirement for FY 2009-10, in order to determine the overall revenue requirement for FY 2009-10.

The total revenue requirement for FY 2009-10 has been estimated as elaborated in Section 4.23 of this Order, by adding the revenue requirement of FY 2009-10 on a stand-alone basis, sharing of gains and losses for FY 2006-07, revenue gap for FY 2007-08 after final truing up, and revenue surplus for FY 2008-09 after provisional truing up.

The total revenue from the existing tariffs comes to Rs. 1348 crore vis-à-vis the revenue requirement of Rs. 1162.25 Crore, which has enabled the Commission to reduce the average tariffs by around 14%.

5.3 TARIFFS PROPOSED BY TPC-D

TPC-D submitted that the resultant gap to be recovered in FY 2009-10 is Rs. 406 Crore, however, a large portion of the Gap is arising due to the recoveries of the past while the "Pure Gap" for FY 2009-10 is only Rs. 31 crore. TPC-D submitted that if the gap is recovered in one year, i.e., spread over one year's sale, it would entail a tariff hike of about Rs. 1.54/kWh on an average, and the overall increase would be of the order of 30%, which is not desired by TPC-D.

TPC-D submitted that the Tariff Proposal has been formulated with an endeavour to keep the impact on the consumers to the minimum possible and at the same time not defer a large portion of recovery lest it would bring pressure on the tariff in the coming years. TPC-D submitted that it had adopted the following philosophy while proposing the tariff:

§ The revenue gap, other than estimated un-recovered FAC, arising out of performance in FY 2008-09 is not proposed to be recovered in FY 2009-10, and the same would be recovered at the time of truing of the performance for FY 2008-09.

Page 140 of 185



- § The recovery on account of the ATE Judgment is spread over three years, i.e., only 33% of the impact is being recovered in FY 2009-10 and balance in the subsequent years. This principle has been adopted to reflect the "one-time" nature of this Judgment, which is not expected to be recurring phenomenon.
- § Recovery of the entire "Pure Gap" of FY 2009-10
- § Recovery of the entire revenue gap/surplus for FY 2007-08 for both TPC-D and TPC-G businesses so as complete the true-up process for FY 2007-08 and not carry it forward.

Table: Revenue Gap to be recovered in FY 2009-10 (Rs Crore)

		Base	Recovery Proposed	Recovery
SI.	Particulars	Case	(%)	Proposed
1	ARR for FY 2009-10	1380	100%	1380
2	Add: Past Recoveries being sought	375		232
а	ATE Impact	130	33%	43
b	Sharing of losses for FY 2006-07	11	100%	11
С	Revenue Gap for FY 2007-08	149	100%	149
d	Revenue Gap for FY 2008-09	21	0%	0
е	Unrecovered FAC - FY 2007-08	36	100%	36
f	Unrecovered FAC - FY 2008-09	7	100%	7
g	Share of TPC-G Gap for FY 2007-08	-14	100%	-14
h	Share of TPC-G Gap for FY 2008-09	35	0%	0
3	Total Annual Revenue Requirement	1755		1612
4	Total Sales (MU)	2638		2638
5	Average Cost of Supply (Rs/kWh)	6.65	·	6.11

TPC-D submitted that it has attempted to minimise the tariff hike despite having large quantum of under recovery of past expenditure. TPC-D added that the tariff hike proposed for residential segment has been kept to as low as possible, and the tariff hike for Railways has also been kept to below the average hike proposed, as the Railways are catering to the masses. TPC-D added that the tariffs proposed for other consumer categories have been raised suitably to compensate this impact.

TPC-D submitted that at present, the consumer of TPC-D is levied an average tariff of Rs 5.16/kWh. In addition, the consumer also pays an FAC of Rs 0.48/kWh, as well as an additional charge of Rs 0.27/kWh for the period from November 2008 to March 2009. Hence, at present, the total tariff paid by the consumer works out to Rs.

Page 141 of 185



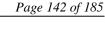
5.86/kWh on an average. Since the proposed average tariff is Rs. 6.12/kWh, the net hike proposed by TPC-D over the total present tariff is Rs 0.21/kWh, and about Rs 0.48/kWh without considering the additional charge of Rs 0.27/kWh, i.e., a hike of 9.5%.

TPC-D submitted that subsequent to the issue of the MERC (Special Conditions of Distribution Licence applicable to The Tata Power Company Limited) Regulations, 2008, it is expected that the current categories may not encompass all the purposes of supply. Hence, based on the kind of applications received in the past and at present, TPC-D proposed to increase the number of categories of consumers for TPC-D. The proposed additional categories are as follows:

Sl	Category	Applicability	Proposed Tariff
1	Temporary	Consumers requiring temporary connection as under: a) For public religious functions b) For construction works, exhibitions, circus, film shooting, marriage, etc.	Two times the approved average cost of supply
2	HT - Group Housing Society	Applicable for HT residential consumption	10% lower than average rate of realisation for the residential category (LT I)
3	Railways - to include Metro Rail and Monorail	Applicable for Metro Rail and Monorail	At par with Railways Category (HT IV)
4	Street lighting	Applicable for illuminating the Street	At par with that applicable to BEST and RInfra

5.4 COMMISSION'S TARIFF PHILOSOPHY

The Commission has been deeply concerned for the past few years, about the increasing tariffs to consumers of Maharashtra. While previously, the Commission has attempted to rationalise the categories and slabs, this year, the Commission has been able to reduce the tariffs in general, while at the same tine, reducing the cross-subsidy over that prevailing in the previous year.



As discussed in Section 5.2 of this Order, the Commission has determined the total revenue requirement for FY 2009-10 as Rs. 1162.25 Crore after considering the revenue gap of FY 2007-08 and impact of provisional truing up for FY 2008-09, which indicates that there is a need to reduce the tariffs by around 14%.

The Commission has determined the tariffs in line with the tariff philosophy adopted by it in the past, and the provisions of law. The tariffs and tariff categorisation have been determined so that the cross-subsidy is reduced without subjecting any consumer category to a tariff shock, and also to consolidate the movement towards uniform tariff categorisation throughout the State of Maharashtra.

Rationalisation of Tariff Categories

As enunciated by the Commission in the previous APR Order, the Commission is of the view that it is not feasible to have uniform tariffs across different licensees, due to inherent differences, such as revenue requirement, consumer mix, consumption mix, LT:HT ratio, etc. It is also, not appropriate to compare category-wise tariffs across different licensees for the same reasons. However, in the APR Order for FY 2007-08, the Commission had initiated the move to gradually rationalise and make uniform the tariff categorisation and applicability of tariffs for licensees in the State, and these efforts have been continued in this Order also. The differences exist because of historical reasons and differences in management policies and approach across licensees. There will of course, be some differences, on account of certain consumer categories being present only in certain licence areas, such as agricultural category, power looms, etc., which will exist only in certain licence areas.

At the same time, the Commission has attempted to ensure that the changes due to rationalisation are such that the impact on consumer categories is minimised, to the extent possible, and also, that the modifications are undertaken in small incremental steps, rather than making wholesale changes to the tariff structure. Also, the fact that the consumers may not be aware of the modifications proposed to be undertaken by the Commission has also been kept in mind, in view of certain Judgments given by the ATE in this regard, though the ATE has also ruled that the Commission has all the powers to determine the tariff categories and category-wise tariffs, irrespective of whether the distribution licensee has specifically asked for the same in its Petition, which has been published for public comments. Hence, the categorisation has by and large, been retained in accordance with the prevailing consumer categories, save for

Page 143 of 185



any rationalisation required on account of differences prevailing in different licence areas, and in case the licensee has specifically asked for any category, the same has also been considered in accordance with the provisions of Section 62(3) of the EA 2003.

While undertaking the rationalisation of tariff categories, the Commission has borne in mind the provisions of Section 62(3) of the Electricity Act, 2003, which stipulates as under:

"The Appropriate Commission shall not, while determining the tariff under this Act, show undue preference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required."

It should be noted that it is not possible to apply all the above specified criteria at the same time, for designing the tariff categories; else, with many permutations and combinations, there will be too many categories. Perhaps, that is also not the intention behind the provision, which merely enables the Regulators to work within the criteria.

Thus, it will be seen from the elucidation given below, as to how different criteria have been used to categorise different types of consumers:

- § The 'load factor' and 'power factor' criteria have been used to provide rebates and disincentives, such as load factor incentive for load factor above certain specified levels, and power factor rebates and disincentives are provided to consumers who are able to maintain their power factor above specified levels.
- § The consumer categories are broadly classified under High Tension (HT) and Low Tension (LT) categories, in accordance with the 'voltage' criteria under Section 62(3) reproduced above.
- § The 'time of supply' criteria has been used to specify time of day (ToD) tariffs, so that the consumers are incentivised to shift their consumption to off-peak periods and thus, reduce the burden on the system during peak hours.
- § The 'nature' of supply criteria has been used to specify differential tariff for continuous (non-interruptible) and non-continuous supply (interruptible)

Page 144 of 185



§ The criteria of 'purpose' of supply has been used extensively to differentiate between consumer categories, with categories such as residential, non-residential/commercial purposes, industrial purpose, agricultural purpose, street lighting purpose, etc.

In this context, quite a few consumers have been representing before the Commission during and after the Public Hearings, stating that they are not undertaking any 'commercial' activity or activities for making 'profit' within their premises, and hence, they should not be classified under the 'commercial' category. It is clarified that the 'commercial' category actually refers to all 'non-residential, non-industrial' purpose, or which has not been classified under any other specific category. For instance, all office establishments (whether Government or private), hospitals, educational institutions, airports, bus-stands, multiplexes, shopping malls, small and big stores, automobile showrooms, etc., are all covered under this categorisation. Clearly, they cannot be termed as residential or industrial. In order to bring clarity in this regard, the Commission has renamed this category as 'non-residential or commercial' in this Order.

A similar impression is conveyed as regards the 'Industry' categorisation, with the Commission receiving several representations during and after the Public Hearings, from the hotel industry, leisure and travel industry, etc., stating that they have also been classified as 'industry' for the purpose of taxation and/or other benefits being extended by the Central Government or State Government, and hence, they should also be classified as 'industry' for the purpose of tariff determination. In this regards, it is clarified that classification under Industry for tax purposes and other purposes by the Central or State Government shall apply to matters within their jurisdiction and have no bearing on the tariffs determined by the Commission under the EA 2003, and the import of the categorisation under Industry under other specific laws cannot be applied to seek relief under other statutes. Broadly, the categorisation of 'Industry' is applicable to such activities, which entail 'manufacture'.

While appreciating the anxiety of different classes of consumers to reduce their payments on account of use of electricity, the reasonable costs incurred by the Utilities have to be met, and irrespective of the number of consumer categories or the sub-classification considered in accordance with the provisions of Section 62(3) of the

Page 145 of 185



EA 2003, the cross-subsidies have to be reduced gradually and the tariff differential between categories cannot be very significant in the long-run.

As regards TPC's request for creation of new consumer categories, the Commission rules as under:

- § 'LT VI: Streetlight' category has been created
- § 'LT VII (A): Temporary Supply Religious', and 'LT VII (B): Temporary Supply Others' have been created
- § 'HT III: Group Housing Society' has been created
- § Request to include Metro Rail and Monorail under HT Railways has not been considered for the time being, since these consumers are yet to be commissioned. In the meantime, as clarified in RInfra-D's APR Order for FY 2007-08, TPC-D may provide construction power at the tariff applicable for Temporary Others (LT VII (B) or HT IV, as applicable)

In addition, the Commission has also made the following changes:

- § 'HT IV: HT Temporary Supply' has been created
- § 'HT III: Public and Government' category has been done away with, since Section 62(3) does not permit differentiation between consumer categories on the basis of ownership, i.e., public or private, as elaborated in earlier paragraphs. The consumers earlier classified under this category would now be classified under either HT I: Industry or HT II: Commercial, as the case may be, depending on their purpose of supply
- § 'HT I: Industries & CPP' has been renamed as HT I: Industry, since industrial tariff will be applicable, irrespective of whether the consumer owns a CPP or not
- § 'LT II: Commercial' has been renamed as 'LT II: Non-residential or Commercial'
- § The numbering of tariff categories as LT I, LT VIII, HT III, etc., has been modified accordingly, to accommodate the newly created consumer categories
- § The applicability for different consumer categories has been addressed in the approved Tariff Schedule, which is annexed as a part of this Order (**Annexure II**).



Page 146 of 185

Rationalisation of Tariff Components

In the MYT Order and the APR Order for FY 2007-08, the Commission had separately indicated the component of standby charges and expensive power charges chargeable to specific consumer categories, as a part of the energy charges, with the intention of sensitising the consumers about the consequences of the rapid increase in consumption and the ever-increasing demand-supply gap. The Commission is of the view that the desired objective has been achieved to some extent, since there have been several representations regarding these charges, and the need to separately show these charges, which indicate that the desired awareness has been created. In this Tariff Order, the Commission has discontinued the practice of indicating the standby charges and expensive power charges separately (also called as reliability charges), and has specified a unified energy charge applicable for the energy consumed.

The Commission has continued to determine the tariffs such that there is an in-built incentive to consumers to reduce their consumption, as the impact on the bills is designed to increase as the consumption increases, on account of the higher telescopic tariffs applicable for the higher consumption slabs, while at the same time ensuring that even the consumers falling in the higher consumption slabs are charged lower for the consumption corresponding to the lower consumption slab.

The Commission has retained the fixed charges/demand charges applicable for different consumer categories at the previous year's level.

The applicability of the BPL category tariffs has been retained same as that specified in the previous APR Order, read with any clarification thereon. The eligibility criteria has been retained at an annual limit of 360 units. The applicability of BPL category will have to be assessed at the end of each financial year. In case any BPL consumer has consumed more than 360 units in the previous financial year, then the consumer will henceforth, be considered under the LT-I residential category. Once a consumer is classified under the LT-I category, then he cannot be classified under BPL category.

The tariff for newly numbered 'HT V: Railways' has been rationalised, since Railways was a subsidised category in the earlier approved tariffs. The tariff

(O)

differential between HT Industry and HT Railways has been eliminated, with the objective of eventually bringing them under a single category.

The Commission has ensured that the HT tariffs are lower than the LT tariffs, as the cost of supply is lower than the cost of supply at lower voltages, due to the lower losses at higher voltages, and the lower network related costs since the electricity does not have to stepped down to lower voltages.

The Time of Day (ToD) tariffs will be applicable compulsorily to HT I and HT II categories, LT II (B) and (C) and LT IV category consumers having TOD meters, as well as optionally available to LT – II (A) category consumers, who have TOD meters. The TOD tariffs have been retained at the existing levels as under:

- § Five time slots, viz., (a) 2200 to 0600 hours, (b) 0600 to 0900 hours, (c) 0900 to 1200 hours, (d) 1200 to 1800 hours, and (e) 1800 to 2200 hours.
- § Additional peak hour tariff will be payable for consumption during the peak hours in the State, viz., 0900 to 1200 hours morning peak, and 1800 to 2200 hours evening peak, in the following manner:

0900 to 1200 hours : Additional 0.50 Rs/kWh
 1800 to 2200 hours : Additional 1.00 Rs/kWh

- § For consumption during night off-peak hours, viz., 2200 to 0600 hours, a rebate of 0.75 Rs/kWh will be available
- § Neither additional tariff nor rebate will be applicable for consumption during 0600 to 0900 hours and 1200 to 1800 hours

Additional demand charges of Rs 20 per kVA per month would be chargeable for the stand by component, for CPPs, only if the actual demand recorded exceeds the Contract Demand.

The Billing Demand definition has been retained at the existing levels, i.e.,

Monthly Billing Demand will be the higher of the following:

- (a) Actual Maximum Demand recorded in the month during 0600 hours to 2200 hours;
- (b) 75% of the highest billing demand/Contract Demand, whichever is lower, recorded during the preceding eleven months;

Page 148 of 185



(c) 50% of the Contract Demand.

Fuel Adjustment Charges

The existing Fuel Adjustment Cost (FAC) Charge has been brought to zero, on account of the adoption of the existing fuel costs for projection of the fuel expenses. In case of any variation in the fuel prices with respect to these levels, TPC-D will be able to pass on the corresponding increase to the consumers through the existing FAC mechanism, subject to the stipulated ceiling of 10% of average energy charges, which works out to 42.1 paise/kWh. The FAC will be charged on a monthly basis, and the details of the computation and recovery from the same will have to be submitted to the Commission for post-facto approval, on a quarterly basis.

Average Cost of Supply and Cross-Subsidy

The average cost of supply (CoS) is given below:

Table: Average Cost of Supply for FY 2009-10

Sl.	Particulars	Amount
1	Total Revenue Requirement (Rs. Crore)	1162.25
2	Total Sales (MU)	2638.13
3	Average Cost of Supply (Rs/kWh)	4.41

The prevailing cross-subsidy and the reduction in cross-subsidy considered by the Commission are given in the Table below:

		Aver	Average Billing Rate (Rs./kWh)			Ratio of Average Billing Rate to Average Cost of Supply (%)				
Category	Average Cost of Supply (Rs./unit)	Existing Tariff	Tariff Proposed by TPC- D	Revised Tariff	APR Order for FY08	Existing Tariff to current ACOS	Revised Tariff to current ACOS	Percentage increase in tariff (%)		
LT Category										
LT I - Residential		5.91	6.59	4.20	89%	134%	95%	-29%		
LT II A - Commercial										
Upto 20 kW		5.31	6.42	4.20	100%	120%	95%	-21%		
> 20 kW & <= 50 kW	4.41	7.39	8.72	5.78	123%	168%	131%	-22%		
Above 50 kW	4.41	7.69	9.13	5.18	123%	174%	118%	-33%		
LT III - Industry < 20 kW		4.23	5.15	4.22	84%	96%	96%	0%		
LT IV - Industry > 20 kW		5.26	6.30	4.75	105%	119%	108%	-10%		

Page 149 of 185



		Aver	age Billing I	Ratio Rate				
Category	Average Cost of Supply (Rs./unit)	Existing Tariff	Tariff Proposed by TPC- D	Revised Tariff	APR Order for FY08	Existing Tariff to current ACOS	Revised Tariff to current ACOS	Percentage increase in tariff (%)
HT Category								
HT I – Industry		4.92	5.91		100%	112%	0.4	-16%
HT III - Public &				4.16			94%	
Government	4.41	4.74	5.87		89%	107%		-12%
HT IV – Railways		4.19	5.00	4.16	83%	95%	94%	-1%
HT II – Commercial		6.10	7.35	4.79	116%	138%	109%	-21%

Note: Consumers classified under 'HT III: Public & Government' category in existing tariff schedule have been considered under 'HT I: Industry' for the purpose of above computation, though in reality, consumers would be re-categorised either under 'HT I: Industry' or HT II: Commercial' as applicable.

In the above Table,

- (a) 'Existing Tariff' refers to the tariff approved by the Commission in the APR Order dated June 4, 2008
- (b) 'Revised Tariff' refers to the tariff approved by the Commission in the present APR Order
- (c) Ratio of Average Billing Rate (ABR) to Average Cost of Supply (ACOS)
 - i) 'APR Order for FY08' refers to the ratio of ABR to ACOS as envisaged in the APR Order for FY 2007-08
 - ii) 'Existing Tariff to current ACOS' refers to the ratio of ABR approved in the APR Order for FY 2007-08 to the ACOS approved in the present APR Order, i.e., Rs. 4.41 per kWh
 - iii) 'Revised Tariff to current ACOS' refers to the ratio of ABR approved in this APR Order for FY 2008-09 to the ACOS approved in the present APR Order, i.e., Rs. 4.41 per kWh

The above Table clearly shows that the Commission has reduced the cross-subsidy levels for most consumer categories, while at the same reducing the tariff for most consumer categories, since the reference tariff and cross-subsidy levels have to be considered based on the APR Order for FY 2007-08. Further, except for one subcategory, the cross-subsidy levels are within the levels of \pm 20% of ACOS specified by the Tariff Policy as the target cross-subsidy levels to be achieved by the year 2010-11.

Page 150 of 185



While the tariffs have been determined such that the revenue gap considered for the year is met entirely through the revision in tariffs, it is possible that the actual revenue earned by TPC-D may be higher or lower than that considered by the Commission, on account of the re-categorisation and creation of new consumer categories. Hence, a small surplus of around Rs. 8.7 crore is envisaged at this stage. The revenue shortfall/surplus if any, will be trued up at the time of provisional truing up for FY 2008-09 and final truing up for FY 2009-10.

5.5 REVISED TARIFFS WITH EFFECT FROM JUNE 1, 2009

Sl.	Consumer category &	Tarif	fs
	Consumption Slab	Fixed/ Demand Charge	Energy Charge (Rs/kWh)
	LOW TENSION CATEGORIES		
1	LT I - Residential (BPL)	Rs. 3 per month	0.40
	LT I – Residential		
	0-100 units	Rs. 30 per month	1.30
	101-300 units	Rs. 50 per	2.70
	301 to 500 units	month ^{\$\$}	4.20
	Above 500 units (balance units)	Rs. 100 per month ^{\$\$}	4.90
2	LT II - LT Non-residential or Commercial		
(A)	0-20 kW	Rs. 150 per month	3.85
(B)	> 20 kW and < 50 kW	Rs. 150 per kVA	4.30
(C)	> 50 kW	per month	4.65
3	LT III - LT Industrial below 20 kW load	Rs. 150 per month	4.10
4	LT IV - LT Industrial above 20 kW load	Rs 150 per kVA per month	4.60
5	LT V - Advertisement & Hoardings, incl. floodlights & neon signs	Rs. 200 per month	13.55
6	LT VI – Streetlights	Rs 150 per kVA per month	4.00
7	LT VII – Temporary Supply	per monur	
	A) TSR – Temporary Supply Religious	Rs 200 per	2.00
	A) 15X - Temporary Suppry Kengious	connection per	2.00
		month	

Page 151 of 185



Sl.	Consumer category &	Tarif	fs
	Consumption Slab	Fixed/ Demand	Energy
		Charge	Charge
			(Rs/kWh)
	B) TSO – Temporary Supply Others	Rs 200 per	11.00
		connection per	
		month	
6	LT VIII – Crematoriums and Burial Grounds	Rs 200 per	2.00
		connection per	
		month	
	TOD Tariffs (in addition to above base tariffs)		
	- compulsory for LT II (B) and (C), and LT IV		
	category, and optional for LT II (A) and LT III		
	category		
	0600 hours to 0900 hours		0.00
	0900 hours to 1200 hours		0.50
	1200 hours to 1800 hours		0.00
	1800 hours to 2200 hours		1.00
	2200 hours to 0600 hours		-0.75
	HIGH TENSION CATEGORIES		
7	HT I – Industry	Rs 150 per kVA	4.10
		per month	
8	HT II – Commercial	Rs 150 per kVA	4.35
		per month	
9	HT III – Group Housing Society	Rs 150 per kVA	3.80
		per month	
10	HT IV – Temporary Supply	Rs 200 per	9.00
		connection per	
		month	
11	HT V – Railways		
	22/33 kV	Rs 150 per kVA	4.10
	100 kV	per month	4.03
	TOD Tariffs (in addition to above base tariffs)		
	for HT I and HT II categories		
	0600 hours to 0900 hours		0.00
	0900 hours to 1200 hours		0.50





Sl.	Consumer category &	Tariffs					
	Consumption Slab	Fixed/ Demand	Energy				
		Charge	Charge				
			(Rs/kWh)				
	1200 hours to 1800 hours		0.00				
	1800 hours to 2200 hours		1.00				
	2200 hours to 0600 hours		-0.75				

Notes:

- 1. Fuel Adjustment Cost (FAC) will be applicable to all consumers and will be charged over the above tariffs, on the basis of the FAC formula prescribed by the Commission, and computed on a monthly basis.
- 2. \$\$: Fixed charge of Rs. 100 per month will be levied on residential consumers availing 3 phase supply. Additional Fixed Charge of Rs. 100 per 10 kW load or part thereof above 10 kW load shall be payable.

The detailed computation of category-wise revenue with revised tariffs has been given as **Annexure I** to this Order.

The approved Tariff Schedule has been given as Annexure II to this Order

5.6 WHEELING CHARGES AND LOSS COMPENSATION

The Commission under its APR Order in Case No. 69 of 2007 approved wheeling charges for FY 2008-09 at HT level as Rs 101 per kW per month and at LT level as Rs 196 per kW per month, and wheeling loss of 2.40% equivalent to overall distribution loss of TPC-D network.

TPC-D, under its APR Petition for FY 2008-09, has sought the Commission's approval for wheeling charge of Rs 252 per kW per month and wheeling loss of 2.4% for FY 2009-10. TPC, in its APR Petition, submitted that the wheeling charges proposed have been computed by spreading the network cost over the estimated peak of the TPC-D network at consumer end. The Network costs have been worked out based on allocation of ARR components amongst network related costs and supply related costs as per certain assumptions for allocation and accordingly, TPC-D has proposed network related costs as Rs. 110 Crore per Annum. Further, TPC-D has derived the peak demand (at consumer end) based on certain assumptions and loss

Page 153 of 185



adjustments. The Commission notes that TPC-D has not proposed separate wheeling charges at HT level and LT level and voltage-wise segregation of network costs has also not been undertaken.

The Commission, under MYT Order, has observed that separate accounting of network related costs and supply related costs is essential for un-bundling of cost and tariff components and is a pre-requisite for appropriate determination of wheeling charges and affects open access transactions as mandated under the Electricity Act, 2003. Further, network costs needs to be segregated in terms of voltage level (at least at HT and LT level). The Commission had directed TPC to submit voltage-wise segregated wire cost component of ARR during annual performance review. However, TPC-D is yet to submit such voltage-wise segregated data.

In the absence of separate accounting of network and supply related costs, the Commission has considered the same basis of allocation for determination of network related costs for the purpose of determination of wheeling charge for FY 2009-10, as was adopted by the Commission for FY 2008-09. Accordingly, approved network related aggregate revenue requirement for TPC-D amounts to Rs 58.35 Crore. The Commission directs TPC to maintain the accounts for expenses incurred on wires business and supply business separately, and submit the same during annual performance review for FY 2009-10.

The total ARR of the Wires business as computed above has been apportioned to HT and LT voltages on the basis of voltage-wise Opening GFA, and the HT cost has further been apportioned to LT category, since the HT system is also being used for supply to the LT consumers. Thus, the wheeling charge applicable to consumers connected on the HT network during FY 2009-10 works out to Rs. 78 per kW per month and that for consumers connected to LT network works out to Rs 160 per kW per month.

As highlighted earlier, the distribution loss for distribution network for TPC-D has been considered as 0.66% for FY 2009-10. Accordingly, wheeling loss in kind shall be applicable for wheeling transactions entailing drawal at HT level or LT level, and shall be at the rate of **0.66%** equivalent to total distribution loss for TPC-D network,

-

Page 154 of 185



since the Commission does not have details of technical loss and commercial loss for TPC-D.

Approved Wheeling Charges and Wheeling loss at HT and LT level for FY 2009-10 is summarised in the following Table.

Item Description	Wheeling Charge (Rs/kW/month)	Wheeling Loss (%)
HT level	78	0.66%
LT level	160	0.66%

5.7 CROSS-SUBSIDY SURCHARGE

The cross-subsidy surcharge for eligible open access consumers will continue to be zero, in continuation of the Commission's decision in this regard in the previous Tariff Order.

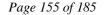
5.8 INCENTIVES AND DISINCENTIVES

<u>Power Factor Incentive</u> (Applicable for all HT categories, LT II (B), LT II (C) and LT IV categories)

Whenever the average power factor is more than 0.95, an incentive shall be given at the rate of 1% (one percent) of the amount of the monthly bill including energy charges, reliability charges, FAC, and Fixed/Demand Charges, but excluding Taxes and Duties for every 1% (one percent) improvement in the power factor (PF) above 0.95. For PF of 0.99, the effective incentive will amount to 5% (five percent) reduction in the monthly bill and for unity PF, the effective incentive will amount to 7% (seven percent) reduction in the monthly bill.

<u>Power Factor Penalty</u> (Applicable for all HT categories, LT II (B), LT II (C) and LT IV categories)

Whenever the average PF is less than 0.9, penal charges shall be levied at the rate of 2% (two percent) of the amount of the monthly bill including energy charges, reliability charges, FAC, and Fixed/Demand Charges, but excluding Taxes and Duties





for the first 1% (one percent) fall in the power factor below 0.9, beyond which the penal charges shall be levied at the rate of 1% (one percent) for each percentage point fall in the PF below 0.89.

Prompt Payment Discount

A prompt payment discount of one percent on the monthly bill (excluding Taxes and Duties) shall be available to the consumers if the bills are paid within a period of 7 working days from the date of issue of the bill.

Delayed Payment Charges (DPC)

In case the electricity bills are not paid within the due date mentioned on the bill, delayed payment charges of 2 percent on the total electricity bill (including Taxes and Duties) shall be levied on the bill amount. For the purpose of computation of time limit for payment of bills, "the day of presentation of bill" or "the date of the bill" or "the date of the bill", etc. as the case may be, will not be excluded.

Rate of Interest on Arrears

The rate of interest chargeable on arrears will be as given below for payment of arrears-

Sr. No.	Delay in Payment (months)	Interest Rate p.a. (%)
1	Payment after due date upto 3 months (0 - 3)	12%
2	Payment made after 3 months and before 6 months (3 - 6)	15%
3	Payment made after 6 months (> 6)	18%

Load Factor Incentive

Consumers having load factor over 75% upto 85% will be entitled to a rebate of 0.75% on the energy charges for every percentage point increase in load factor from 75% to 85%. Consumers having a load factor over 85 % will be entitled to rebate of 1% on the energy charges for every percentage point increase in load factor from 85%. The total rebate under this head will be subject to a ceiling of 15% of the energy charges for that consumer. This incentive is limited to HT I, HT II and HT V categories only. Further, the load factor rebate will be available only if the consumer has no arrears with TPC-D, and payment is made within seven days from the date of the bill. However, this incentive will be applicable to consumers where payment of

Page 156 of 185



arrears in instalments has been granted by TPC-D, and the same is being made as scheduled. TPC-D has to take a commercial decision on the issue of how to determine the time frame for which the payments should have been made as scheduled, in order to be eligible for the Load Factor incentive.

The Load Factor has been defined below:

Load Factor = Consumption during the month in MU

Maximum Consumption Possible during the month in MU

Maximum consumption possible = Contract Demand (kVA) x Actual Power Factor x (Total no. of hrs during the month less planned load shedding hours*)

* - Interruption/non-supply to the extent of 60 hours in a 30 day month has been built in the scheme.

In case the billing demand exceeds the contract demand in any particular month, then the load factor incentive will not be payable in that month. (The billing demand definition excludes the demand recorded during the non-peak hours i.e. 22:00 hrs to 06:00 hrs and therefore, even if the maximum demand exceeds the contract demand in that duration, load factor incentives would be applicable. However, the consumer would be subjected to the penal charges for exceeding the contract demand and has to pay the applicable penal charges).

5.9 APPLICABILITY OF ORDER

This Order for the third year of the first Control Period, i.e., for FY 2009-10, shall come into force with effect from June 1, 2009. The Commission will undertake the Annual Review of TPC-D performance during the last quarter of FY 2009-10 and determine the revised revenue requirement for FY 2010-11, if required. TPC-D is directed to submit its Petition for Annual Review of its performance during the first half of FY 2009-10, as well as truing up of revenue and expenses for FY 2008-09 based on audited accounts, with detailed reasons for deviation in performance, latest by November 30, 2009.



The Commission acknowledges the efforts taken by the Consumer Representatives and other individuals and organisations for their valuable contribution to the APR process for TPC-D for FY 2008-09 and determination of revised revenue requirement for FY 2009-10.

Sd/-Sd/-Sd/-(S. B. Kulkarni)(A. Velayutham)(V.P. Raja)MemberMemberChairman

(P.B. Patil) Secretary, MERC

ANNEXURE I
REVENUE WITH REVISED TARIFFS

	Amanaga Na	Components	s of tariff	load / dem	nt sales & mand data evenue ulation		ar revenue exc ternal subsidy		Power Factor	Full year revenue		Full year	Revised
	Average No of consumers	Demand Charges (Rs./kVA or Rs/conn/mo nth)	Energy Charges (Paise/ kWh)	Load (MVA)	Energy (MU)	Demand Charges (Rs. Crore)	Energy Charges (Rs. Crore)	Total (Rs. Crore)	Rebate / Penalty (Rs. Crore)	(including subsidy) (Rs. Crore)	Revenue from ToD	revenue (including ToD)	Average Billing Rate (Rs/kWh)
HT I Industry	51			75	567	14	233	246	(12)	234	2	236	4.16
- Industries & CPP	38	150	410	65	534	12	219	231	(11)	220	2	222	4.15
Textiles	13	150	410	10	34	2	14	16	(1)	14		14	4.3
HT II - Commercial	114	150	435	108	353	20	153	173	(8)	165	4	169	4.79
HT III - Public & Government**	13			120	297	22	122	143	(7)	137	4	140	4.73
- 22kV	10	150	410	83	90	15	37	52	(3)	49		53	5.83
- 100kV	3	150	410	37	206	7	85	91	(4)	88	4	88	4.24
HT IV – Railways	3			172	849	31	346	377	(23)	354		354	4.16
- 22/33 kV	2	150	410	119	575	21	236	257	(15)	242		242	4.22
- 100kV	1	150	403	53	275	10	111	120	(9)	111		111	4.05

Page 159 of 185



		Component	s of tariff	load / den	t sales & nand data venue lation		r revenue ex ternal subsid		Power Factor	Full year revenue		Full year	Revised Average
	Average No of consumers	Demand Charges (Rs./kVA or Rs/conn/mo nth)	Energy Charges (Paise/ kWh)	Load (MVA)	Energy (MU)	Demand Charges (Rs. Crore)	Energy Charges (Rs. Crore)	Total (Rs. Crore)	Rebate / Penalty (Rs. Crore)	(including subsidy) (Rs. Crore)	Revenue from ToD	revenue (including ToD)	Billing Rate (Rs/kWh)
LT I – Residential	27,645			-	84	2	34	35		35		35	4.2
- S1 (0-100 units)	7,913	30	130	1	3	0	0	1		1		1	2.33
- S2 (100-300 units)	12,332	50	270	1	24	1	7	7		7		7	3.01
- S3 (> 300 / 300- 500 Units)	4,456	50	420	-	17	0	7	8		8		8	4.35
- S4 (> 500 Units)	2,944	100	490	-	40	0	19	20		20		20	4.99
LT II – Non- residential or Commercial	3,717			82	294	15	135	150	(2)	148	3	151	5.14
a) < 20 kW	3,717	150	385	-	19	1	7	8		8		8	4.2
b) >20kW and <= 50 Kw		150	430	8	13	2	6	7	0	7	0	7	5.78
c) > 50 kW		150	465	74	262	13	122	135	(2)	133	3	136	5.18
LT III – Industries < 20 KW	1,153	150	410	-	17	0	7	7		7		7	4.22
LT IV – Industries > 20 kW	592	150	460	26	177	5	81	86	(3)	83	1	84	4.75

Page 160 of 185



	A	Component	s of tariff	load / den for re	t sales & nand data evenue lation		r revenue ex ternal subsid		Power Factor	Full year revenue		Full year	Revised Average Billing Rate (Rs/kWh)
	Average No of consumers	Demand Charges (Rs./kVA or Rs/conn/mo nth)	Energy Charges (Paise/ kWh)	Load (MVA)	Energy (MU)	Demand Charges (Rs. Crore)	Energy Charges (Rs. Crore)	Total (Rs. Crore)	Rebate / Penalty (Rs. (Included Substitution of the Included Substitution	(including subsidy) (Rs. Crore)	Revenue from ToD	revenue (including ToD)	
Total	33,287			584	2,638	108	1,111	1,218	(56)	1,163	14	1,177	4.46
		Less: Est. P	rompt Paymer	nt Discount								(6)	
		Net R	evenue For I	FY 2009-10								1,171	

Note: ** - Public & Government category has been done away with; consumption has been merged with HT I Industry category for the purpose of revenue computation; consumers would be classified in either HT I Industry or HT II Commercial depending on purpose of use, as elaborated in Tariff Philosophy



ANNEXURE II THE TATA POWER COMPANY LIMITED

SCHEDULE OF ELECTRICITY TARIFFS

(With Effect from June 1, 2009)

The Maharashtra Electricity Regulatory Commission, in exercise of the powers vested in it under Section 61 and Section 62 of the Electricity Act, 2003 and all other powers enabling it in this behalf, has determined, by its Order dated June 15, 2009 in Case No.113 of 2008, the tariff for supply of Electricity by The Tata Power Company Limited – Distribution Business' (TPC-D) for various classes of consumers as applicable from June 1, 2009.

General

- 1. These tariffs supersede all tariffs so far in force including in the case where any agreement provides specifically for continuance of old agreemental tariff, or any modifications thereof as may have been already agreed upon.
- 2. Tariffs are subject to revision and/or surcharge that may be levied by TPC-D from time to time as per the directives of the Commission.
- 3. The tariffs are exclusive of electricity duty, Tax on Sale of Electricity (ToSE) and other charges as levied by Government or other competent authorities and the same, will be payable by the consumers in addition to the charges levied as per the tariffs hereunder.
- 4. The tariffs are applicable for supply at one point only.
- 5. TPC-D reserves the right to measure the Maximum Demand on any period shorter than 30 minutes period of maximum use, subject to conformity with the prevalent Supply Code, in cases where TPC-D considers that there are considerable load fluctuations in operation
- 6. The tariffs are subject to the provisions of the MERC (Electricity Supply Code and Other Conditions of Supply) Regulation, 2005 in force (i.e. as on June 1, 2009) and directions, if any that may be issued by the Commission from time to time.
- 7. Unless specifically stated to the contrary, the figures of Energy Charge relate to Rupees per unit (kWh) charge for energy consumed during the month.
- 8. Fuel Adjustment Costs (FAC) Charge as may be approved by the Commission from time to time shall be applicable to all categories of consumers and will be charged

Page 162 of 185



over and above the tariffs on the basis of FAC formula specified by the Commission and computed on a monthly basis. The FAC will be applicable on the expensive power purchase cost as well as the non-costly power purchased.

LOW TENSION (LT) TARIFF

LT I: LT – Residential (BPL)

Applicability

Residential consumers who have a sanctioned load of upto and less than 0.1 kW, and who have consumed less than 360 units per annum in the previous financial year. The applicability of Below Poverty Line (BPL) category will have to be assessed at the end of each financial year. In case any BPL consumer has consumed more than 360 units in the previous financial year, then the consumer will henceforth, be considered under the LT-I residential category. Once a consumer is classified under the LT-I category, then he cannot be classified under BPL category.

The categorisation of such BPL consumers will be reassessed at the end of the financial year, on a pro-rata basis. Similarly, the classification of BPL consumers who have been added during the previous year would be assessed on a pro-rata basis, i.e., 30 units per month.

All the new consumers subsequently added in any month with sanctioned load of upto and less than 0.1 kW and consumption between 1 to 30 units (on pro rata basis of 1 unit/day) in the first billing month, will be considered in BPL Category.

Rate Schedule

Consumption Slab (kWh)	Fixed /Demand Charge	Energy Charge (Rs./kWh)
BPL Category	Rs. 3 per month	0.40

LT I: LT – Residential

Applicability

Page 163 of 185



Electricity used at Low/Medium Voltage for operating various appliances used for purposes like lighting, heating, cooling, cooking, washing/cleaning, entertainment/leisure, pumping in the following places:

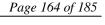
- a) Private residential premises,
- b) Premises exclusively used for worship such as temples, gurudwaras, churches, mosques, etc. Provided that Halls, Gardens or any other portion of the premises that may be let out for consideration or used for commercial activities would be charged at LT-II tariff as applicable.
- c) All Students Hostels affiliated to Educational Institutions.
- d) All Ladies Hostels, such as Students (Girls) Hostels, Working Women Hostels, etc.
- e) Other type of Hostels, like (i) Homes/Hostels for Destitute, Handicap or Mentally deranged persons (ii) Remand Homes (iii) Dharamshalas, etc., subject to verification and confirmation by TPC's concerned Zonal Chief Engineer.
- f) Telephone booth owned/operated by handicapped person subject to verification and confirmation by TPC's concerned Zonal Chief Engineer.
- g) Residential premises used by professionals like Lawyers, Doctors, Professional Engineers, Chartered Accountants, etc., in furtherance of their professional activity in their residences but shall not include Nursing Homes and any Surgical Wards or Hospitals.

Rate Schedule

Consumption Slab (kWh)	Fixed/Demand Charge	Energy (Rs./kWh)	Charge
0-100 units	Rs. 30 per month	1.30	
101 – 300 units	Rs. 50 per month ^{\$\$}	2.70	
301 – 500 units	Ks. 50 per month	4.20	
Above 500 units (balance units)	Rs. 100 per month ^{\$\$}	4.90	

Note:

a) \$\frac{\\$\\$}{}\$: Above fixed charges are for single phase connections. Fixed charge of Rs. 100 per month will be levied on residential consumers availing 3 phase





supply. Additional Fixed Charge of Rs. 100 per 10 kW load or part thereof above 10 kW load shall be payable.

LT II: Low Tension – Non-Residential or Commercial

Applicability

Electricity used at Low/Medium Voltage in all non-residential, non-industrial premises and/or commercial premises for commercial consumption meant for operating various appliances used for purposes such as lighting, heating, cooling, cooking, washing/cleaning, entertainment/leisure, pumping in following places:

- a) Non-Residential, Commercial and Business premises, including Shopping malls
- b) All Educational Institutions, Hospitals and Dispensaries
- c) Combined lighting and power services for Entertainment including film studios, cinemas and theatres, including multiplexes, Hospitality, Leisure, Meeting Halls and Recreation places.
- d) Electricity used for the external illumination of monumental/historical/heritage buildings approved by MTDC.

Rate Schedule

Consumption Slab	Fixed/ Demand Charge	Energy Charge	
(kWh)		(Rs./kWh)	
(a) 0-20 kW	Rs. 150 per month	3.85	
$(b) > 20 \text{ kW and } \leq 50$	Rs. 150 per kVA per	4.30	
kW	month		
(c) > 50 kW	montii	4.65	
TOD Tariffs (in addition to above base tariffs)			
0600 to 0900 hours		0.00	
0900 to 1200 hours		0.50	
1200 to 1800 hours		0.00	
1800 to 2200 hours		1.00	
2200 to 0600 hours		-0.75	

Page 165 of 185



Note:

a) The ToD tariff is available to LT-II (B) and (C) category, and optionally available to LT- II (A) having ToD meter installed.

LT III: LT- Industrial upto 20 kW

Applicability

Electricity used at Low/Medium Voltage in premises for purpose of manufacturing, including that used within these premises for general lighting, heating/cooling, etc., having a sanctioned load upto and including 20 kW (26.8 HP). This consumer category also includes IT industry and IT enabled services (as defined in the Government of Maharashtra Policy).

Rate Schedule

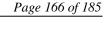
Consumption Slab	Fixed/Demand Charge	Energy Charge
(kWh)		(Rs. /kWh)
0-20 kW	Rs. 150 per month	4.10
TOD Tariffs (Optional - in addition to above base tariffs)		
0600 to 0900 hours		0.00
0900 to 1200 hours		0.50
1200 to 1800 hours		0.00
1800 to 2200 hours		1.00
2200 to 0600 hours		-0.75

Note:

a) The ToD tariff is optionally available to LT- III having ToD meter installed.

LT IV: LT- Industrial above 20 kW load

Applicability







Electricity used at Low/Medium Voltage in premises for purpose of manufacturing including that used within these premises for general lighting, heating/cooling, etc. and having sanctioned load greater than 20 kW (26.8 HP). This consumer category also includes IT industry and IT enabled services (as defined in the Government of Maharashtra Policy).

Rate Schedule

Consumption Slab (kWh)	Fixed/Demand Charge	Energy Charge (Rs./kWh)	
Above 20 kW	Rs. 150 per kVA per month	4.60	
TOD Tariffs (in addition to above base tariffs)			
0600 to 0900 hours		0.00	
0900 to 1200 hours		0.50	
1200 to 1800 hours		0.00	
1800 to 2200 hours		1.00	
2200 to 0600 hours		-0.75	

LT V: LT - Advertisements and Hoardings

Applicability

Electricity used for the purpose of advertisements, hoardings and other conspicuous consumption such as external flood light, displays, neon signs at departmental stores, malls, multiplexes, theatres, clubs, hotels and other such entertainment/leisure establishments except those specifically covered under LT-II as well as electricity used for the external illuminations of monumental, historical/heritage buildings approved by MTDC, which shall be covered under LT-II category depending upon Sanctioned Load.

Page 167 of 185



Rate Schedule

Consumption Slab (kWh)	Fixed / Demand Charge	Energy Charge (Rs./kWh)
All Units	Rs. 200 per month	13.55

<u>Note</u>

a) The electricity, that is used for the purpose of indicating/displaying the name and other details of the shops or Commercial premises, for which electric supply is rendered, shall not be under LT V tariff Category. Such usage of electricity shall be covered under the prevailing tariff of such shops or commercial premises.

LT VI: LT-Street Lights

Applicability

Electricity used at Low/Medium Voltage for purpose of public street lighting, lighting in public gardens, traffic island, bus shelters, public sanitary conveniences, police chowkies, traffic lights, public fountains, other such common public places irrespective of whether such facilities are being provided by the Government or the Municipality, or Port Trust or other private parties.

Rate Schedule

Consumption Sla (kWh)	b	Fixed/Demand Charge	Energy Charge (Rs./kWh)
All Units		Rs. 150 per kVA per month	4.00

Note

- Street Lightings having 'Automatic Timers' for switching On/Off the street lights would be levied Demand Charges on lower of the following
 - a) 50 percent of 'Contract Demand' or
 - b) Actual 'Recorded Demand'

LT VII: LT-Temporary Supply

Page 168 of 185



Applicability

LT VII (A) – Temporary Supply Religious (TSR)

Electricity supplied at Low/Medium Voltage for temporary purposes during public religious functions like Ganesh Utsav, Navaratri, Eid, Moharam, Ram Lila, Ambedkar Jayanti, Diwali, Christmas, Guru Nanak Jayanti, etc., or areas where community prayers are held.

LT VII (B) - Temporary Supply Others (TSO)

Electricity used at Low/Medium Voltage on a temporary basis for any construction work, decorative lighting for exhibitions, circus, film shooting, marriages, etc. and any activity not covered under tariff LT VII (A), and electricity used at low/medium voltage on an emergency basis for purpose of fire fighting activity by the fire department in residential/other premises.

Rate Schedule

Consumption Slab	Fixed/Demand Charge	Energy Charge
(kWh)		(Rs./kWh)
LT VII (A) – All Units	Rs. 200 per connection	2.00
	per month	
LT VII (B) – All Units	Rs. 200 per connection	11.00
	month	

Note

• In case of LT VII (B) the Additional fixed charges of Rs. 150 per 10 kW load or part thereof above 10 kW load shall be payable.

LT VIII: LT- Crematorium and Burial Grounds

<u>Applicability</u>

Electricity used at Low/Medium Voltage in Crematorium and Burial Grounds for all purposes including lighting, and will be applicable only to the portion catering to such activities, and in case part of the area is being used for other commercial purposes, then a separate meter will have to be provided for the same, and the consumption in this meter will be chargeable under LT-II Commercial rates as applicable.

Page 169 of 185



Rate Schedule

Consumption Slab	Fixed/Demand Charge	Energy Charge
(kWh)		(Rs./kWh)
All Units	Rs. 200 per connection	2.00
	per month	

HIGH TENSION (HT) - TARIFF

HT I: HT – Industry

Applicability

This category includes consumers taking 3-phase electricity supply at High Voltage for purpose of manufacturing. This Tariff shall also be applicable to IT Industry & IT enabled services (as defined in the Government of Maharashtra policy), taking 3-phase electricity supply at High Voltage.

Rate Schedule

Consumption Slab (kWh)	Fixed/ Demand Charge	Energy Charge (Rs./kWh)
All Units	Rs 150 per kVA per month	4.10
TOD Tariffs (in addition to above base tariffs)		
0600 to 0900 hours		0.00

Page 170 of 185



0900 to 1200 hours	0.50
1200 to 1800 hours	0.00
1800 to 2200 hours	1.00
2200 to 0600 hours	-0.75

HT II: HT- Commercial

Applicability

This category includes consumers of electricity such as all Educational Institutions, and Hospitals. This category also includes consumers taking electricity supply at High Voltage for commercial purposes, including Hotels, Shopping Malls, film studios, cinemas and theatres, including multiplexes.

This category is also applicable to Government Departments, Bhabha Atomic Research Centre (BARC), Brihanmumbai Municipal Corporation (BMC), Mumbai Port Trust, etc., who were earlier classified under erstwhile HT III – Public and Government.

The Consumers belonging to HT II requiring a single point supply for the purpose of downstream consumption by separately identifiable entities will have to either operate through a franchisee route or such entities will have to take individual connections under relevant category. These downstream entities will pay appropriate tariff as applicable as per TPC Tariff Schedule i.e. LT II.

Rate Schedule

Consumption Slab	Fixed/ Demand Charge	Energy Charge
(kWh)		(Rs./kWh)
All Units	Do 150 par leVA par	4.35
All Units	Rs. 150 per kVA per	4.33
	month	
TOD Tari	ffs (in addition to above ba	ase tariffs)
0600 to 0900 hours		0.00
0900 to 1200 hours		0.50
1200 to 1800 hours		0.00

Page 171 of 185



1800 to 2200 hours	1.00
2200 to 0600 hours	-0.75

HT III: HT- Group Housing Society

Applicability

This category includes Group Housing Societies taking single point electricity supply at High Voltage for consumption by individual dwellings. Such individual dwellings will pay appropriate tariff LT I: LT- Residential as per TPC-D Tariff Schedule in force.

Rate Schedule

Consumption Slab (kWh)	Fixed/ Demand Charge	Energy Charge (Rs./kWh)
All Units	Rs. 150 per kVA per month	3.80

HT IV- HT - Temporary Supply

Applicability

Electricity used at High Voltage on a temporary basis of supply for any construction work, decorative lighting for exhibitions, circus, film shooting, marriages, etc.

This category also includes electricity supplied at High Voltage for temporary purposes during public religious functions like Ganesh Utsav, Navaratri, Eid, Moharam, Ram Lila, Ambedkar Jayanti, Diwali, Christmas, Guru Nanak Jayanti, etc. or areas where community prayers are held.

Rate Schedule

Consumption Slab (kWh)	Fixed/Demand Charge	Energy Charge (Rs./kWh)
Temporary Supply -	Rs. 200 per connection	9.00
All units	per month	9.00

Page 172 of 185



HT V: HT- Railways

Applicability

Applicable to electricity supply at 100 kV/33 kV/22 kV/11 kV/6.6 kV to Railways.

Rate Schedule

Consumption Slab		Fixed/ Demand Charge	Energy Charge
(kWh)			(Rs./kWh)
33/22/11/6.6kV	All	Rs. 150 per kVA per	4.10
Units		month	
100 kV -All Units			4.03

MISCELLANEOUS AND GENERAL CHARGES

Fuel Adjustment Cost (FAC) Charges

The FAC charge will be determined based on the approved Formula and relevant directions, as may be given by the Commission from time to time and will be applicable to all consumer categories for their entire consumption. The FAC Formula takes into account any change in the cost of own generation and power purchase due to variations in the fuel cost. Fuel Price shall mean the landed cost of fuel at power station battery limits and will consist of only following components:

- a) Basic Fuel Price including statutory taxes, duties, royalty as applicable
- b) Transportation (freight) cost by rail/road/pipeline or any other means including transportation service charges for bringing fuel up to the Power Station boundary.
- c) Fuel Treatment Charges such as washing / cleaning charges, Sizing Crushing Charges, Fuel Analysis Charges etc. for making fuel up to the required grade / quality.
- d) Fuel Handling Charges, including that towards loading and unloading charges for bringing fuel to the power station boundary.

Besides above, the Commission specifies a ceiling on 'transportation service charge', at 2% of the freight charge.

The FAC charge shall be computed and levied/refunded, as the case may be, on a monthly basis. The following Formula shall be used for computing FAC:

Page 173 of 185



FAC = C + I + B where,

FAC = Total Fuel Cost and Power Purchase Cost Adjustment

C = Change in cost of own generation and power purchase due to variation in the fuel cost,

I = Interest on Working Capital,

B = Adjustment Factor for over-recovery/under-recovery.

The details for each month shall be available on TPC website www.tatapower.com.

Electricity Duty and Tax on Sale of Electricity

The electricity duty and Tax on Sale of Electricity will be charged in addition to charges levied as per the tariffs mentioned hereunder (as approved by the Commission) as per the Government guidelines from time to time. However, the rate and the reference number of the Government Resolution/ Order vide which the Electricity Duty and Tax on Sale of Electricity is made effective, shall be stated in the bill. A copy of the said resolution / Order shall be made available on the website www.tatapower.com

Power Factor Calculation

Wherever, the average power factor measurement is not possible through the installed meter, the following method for calculating the average power factor during the billing period shall be adopted-

Average Power Factor
$$= \frac{Total(kWH)}{Total(kVAh)}$$

Wherein the kVAh is
$$= \sqrt{\sum (kWh)^2 + \sum (RkVAh)^2}$$

(i.e. Square Root of the summation of the squares of kWh and RkVAh)

<u>Power Factor Incentive</u> (Applicable for all HT categories, LT II (B) and (C), and LT IV categories)

Page 174 of 185

MERC, Mumbai



Whenever the average power factor is more than 0.95, an incentive shall be given at the rate of 1% (one percent) of the amount of the monthly bill including energy charges, reliability charges, FAC, and Fixed/Demand Charges, but excluding Taxes and Duties for every 1% (one percent) improvement in the power factor (PF) above 0.95. For PF of 0.99, the effective incentive will amount to 5% (five percent) reduction in the monthly bill and for unity PF, the effective incentive will amount to 7% (seven percent) reduction in the monthly bill.

<u>Power Factor Penalty</u> (Applicable for all HT categories, LT II (B) and (C), and LT IV categories)

Whenever the average PF is less than 0.9, penal charges shall be levied at the rate of 2% (two percent) of the amount of the monthly bill including energy charges, reliability charges, FAC, and Fixed/Demand Charges, but excluding Taxes and Duties for the first 1% (one percent) fall in the power factor below 0.9, beyond which the penal charges shall be levied at the rate of 1% (one percent) for each percentage point fall in the PF below 0.89.

Prompt Payment Discount

A prompt payment discount of one percent on the monthly bill (excluding Taxes and Duties) shall be available to the consumers if the bills are paid within a period of 7 days from the date of issue of the bill.

Delayed Payment Charges (DPC)

In case the electricity bills are not paid within the due date mentioned on the bill, delayed payment charges of 2 percent on the total electricity bill (including Taxes and Duties) shall be levied on the bill amount. For the purpose of computation of time limit for payment of bills, "the day of presentation of bill" or "the date of the bill" or "the date of the bill", etc. as the case may be, will not be excluded.

Rate of Interest on Arrears

The rate of interest chargeable on arrears will be as given below for payment of arrears-

Sr.No.	Delay in Payment (months)	Interest	Rate	per	
--------	----------------------------	----------	------	-----	--

Page 175 of 185



		annum (%)
1	Payment after due date upto 3 months (0-3)	12
2	Payment made after 3 months and before 6 months (3-6)	15
3	Payment made after 6 months (>6)	18

Load Factor Incentive

There is a Load factor incentive for consumers having Load Factor above 75% based on Contract Demand. Consumers having load factor over 75% upto 85% will be entitled to a rebate of 0.75% on the energy charges for every percentage point increase in load factor from 75% to 85%. Consumers having a load factor over 85% will be entitled to rebate of 1% on the energy charges for every percentage point increase in load factor from 85%. The total rebate under this head will be subject to a ceiling of 15% of the energy charges for that consumer. This incentive is limited to HT I, HT II and HT IV categories only. Further, the load factor rebate will be available only if the consumer has no arrears with TPC-D, and payment is made within 7 days from the date of the bill. However, this incentive will be applicable to consumers where payment of arrears in instalments has been granted by TPC-D, and the same is being made as scheduled. TPC-D has to take a commercial decision on the issue of how to determine the time frame for which the payments should have been made as scheduled, in order to be eligible for the Load Factor incentive.

Load Factor means the ratio of total number of units (kWh) consumed during a given period to the total number of units (kWh) which may have been consumed had the Contract Demand/ Sanctioned Load been maintained throughout the same period, subject to availability of power supply from TPC-D and shall usually be expressed as a percentage.

The Load Factor has been defined below:

Load Factor = Consumption during the month in MU

Maximum Consumption Possible during the month in MU

Maximum consumption possible = Contract Demand (kVA) x Actual Power Factor x (Total no. of hrs during the month less planned load shedding hours*)

* - Interruption/non-supply to the extent of 60 hours in a 30 day month has been built in the scheme.

Page 176 of 185



In case the billing demand exceeds the contract demand in any particular month, then the load factor incentive will not be payable in that month. (The billing demand definition excludes the demand recorded during the non-peak hours i.e. 22:00 hrs to 06:00 hrs and therefore, even if the maximum demand exceeds the contract demand in that duration, load factor incentives would be applicable. However, the consumer would be subjected to the penal charges for exceeding the contract demand and has to pay the applicable penal charges).

Penalty for exceeding Contract Demand

In case, a consumer (availing Demand based Tariff) exceeds his Contract Demand, he will be billed at the appropriate Demand Charge rate for the Demand actually recorded and will be additionally charged at the rate of 150% of the prevailing Demand Charges (only for the excess Demand over the Contract Demand).

In case any consumer exceeds the Contract Demand on more than three occasions in a calendar year, the action taken in such cases would be governed by the Supply Code.

Additional Demand Charges for Consumers having Captive Power Plant

For customers having Captive Power Plant (CPP), the additional demand charges would be at a rate of Rs. 20/kVA/month only on extent of Stand-by demand component, and not on the entire Contract Demand. Additional Demand Charges will be levied on such consumers on the Stand-by component, only if the consumer's demand exceeds the Contract Demand.

Supply at 100 kV

a) In the event power is supplied at 100 kV, then the Consumer shall be allowed a rebate of 2% of the monthly energy charges, over the energy charges applicable for supply at 11 kV/22 kV/33 kV.

Security Deposit

1) Subject to the provisions of sub-section (5) of Section 47 of the Act, TPC-D would require any person to whom supply of electricity has been sanctioned to

Page 177 of 185



- deposit a security in accordance with the provisions of clause (a) of subsection (1) of Section 47 of the Electricity Act, 2003.
- 2) The amount of the security shall be an equivalent of the average of three months of billing or the billing cycle period, whichever is lesser. For the purpose of determining the average billing, the average of the billing to the consumer for the last twelve months, or in cases where supply has been provided for a shorter period, the average of the billing of such shorter period, shall be considered
- 3) Where TPC-D requires security from a consumer at the time of commencement of service, the amount of such security shall be estimated by the Distribution Licensee based on the tariff category and contract demand/sanctioned load, load factor, diversity factor and number of working shifts of the consumer.
- 4) TPC-D shall re-calculate the amount of security based on the actual billing of the consumer once in each financial year.
- 5) Where the amount of security deposit maintained by the consumer is higher than the security required to be maintained under this Supply Code Regulation 11, TPC-D shall refund the excess amount of such security deposit in a single payment: Provided that such refund shall be made upon request of the person who gave the security and with an intimation to the consumer, if different from such person, shall be, at the option of such person, either by way of adjustment in the next bill or by way of a separate cheque payment within a period of thirty (30) days from the receipt of such request: Provided further that such refund shall not be required where the amount of refund does not exceed the higher of ten (10) per cent of the amount of security deposit required to be maintained by the consumer or Rupees Three Hundred.
- 6) Where the amount of security re-calculated pursuant as above, is higher than the security deposit of the consumer, TPC-D shall be entitled to raise a demand for additional security on the consumer. Provided that the consumer shall be given a time period of not less than thirty days to deposit the additional security pursuant to such demand.
- 7) Upon termination of supply, TPC-D shall, after recovery of all amounts due, refund the remainder amount held by the Distribution Licensee to the person who deposited the security, with an intimation to the consumer, if different from such person.

Page 178 of 185



- 8) A consumer (i) with a consumption of electricity of not less than one lakh (1,00,000) kilo-watt hours per month; and (ii) with no undisputed sums payable to TPC-D under Section 56 of the Act may, at the option of such consumer, deposit security, by way of cash, irrevocable letter of credit or unconditional bank guarantee issued by a scheduled commercial bank.
- 9) TPC-D shall pay interest on the amount of security deposited in cash (including cheque and demand draft) by the consumer at a rate equivalent to the bank rate of the Reserve Bank of India: Provided that such interest shall be paid where the amount of security deposited in cash under this Regulation 11 of Supply Code is equal to or more than Rupees Fifty.
- 10) Interest on cash security deposit shall be payable from the date of deposit by the consumer till the date of dispatch of the refund by TPC-D.

Definitions:

Maximum Demand

Maximum Demand in Kilowatts or Kilo-Volt-Amperes, in relation to any period shall, unless otherwise provided in any general or specific Order of the Commission, means twice the largest number of kilowatt-hours or kilo-Volt-Ampere-hours supplied and taken during any consecutive thirty minute blocks in that period.

Contract Demand

Contract Demand means demand in Kilowatt (kW) / Kilo –Volt Ampere (kVA), mutually agreed between TPC-D and the consumer as entered into in the agreement or agreed through other written communication (For conversion of kW into kVA, Power Factor of 0.80 shall be considered).

Sanctioned Load

Sanctioned Load means load in Kilowatt (kW) mutually agreed between TPC-D and the consumer

Billing Demand (for LT categories):

Monthly Billing Demand will be the higher of the following:

a) 65% of the actual Maximum Demand recorded in the month during 0600 hours to 2200 hours.

Page 179 of 185



b) 40% of the Contract Demand.

Note:

- c) Demand registered during the period 0600 to 2200 Hrs. will only be considered for determination of the Billing demand.
- d) In case of change in Contract Demand, the period specified in Clause (a) above will be reckoned from the month following the month in which the change of Contract Demand takes place.

Billing Demand (for HT categories):

Monthly Billing Demand will be the higher of the following:

- a) Actual Maximum Demand recorded in the month during 0600 hours to 2200 hours.
- b) 75% of the highest billing demand recorded during preceding eleven months subject to limit of contract demand.
- c) 50% of the Contract Demand.

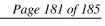
Note:

- d) Demand registered during the period 0600 to 2200 Hrs. will only be considered for determination of the Billing demand.
- e) In case of change in Contract Demand, the period specified in Clause (a) above will be reckoned from the month following the month in which the change of Contract Demand takes place.



APPENDIX 1
List of Persons who attended the Technical Validation Session held on January 13, 2009

S.No	Name
TPC Officials	
1	Shri V. H. Wagle
2	Shri T. N. Ramakrishnan
3	Shri Prashant Joshi
4	Shri Prashant K. Anvekar
5	Smt Swati Mehendale
6	Shri Ashok Sethi
7	Shri B. P. Mehta
8	Shri Rajesh L.Thakur
9	Shri Anand Dhavale
10	Shri Urmeet Kaur Anand
11	Shri M. Phentage
12	Shri Anshuh De
13	Shri Maynesh Shah
14	Shri D. Raina
15	Shri V. K. Choudhary
16	Shri C. G. H. Aranha
17	Shri V. H. Thakmai
18	Shri C. A. Narayanan
19	Shri S. Ramakrishnan
20	Shri R. Ranade
21	Shri Deepak Mahande
Consultants to	
Commission	
22	Shri Ajit Pandit
23	Shri Suresh Gehani
24	Shri Palaniappan M
25	Shri S. R. Karkhanis
26	Shri M. N. Bapat
27	Shri Anand Kulkarni
28	Shri Santosh Kumar Singh





29	Shri Krishnajith M U
30	Shri Saurabh Gupta

APPENDIX 2

List of Objectors

S.No	Name of Person / Official	Designation	Institution
1	Shri Mahesh I. K.		Excel Electric Industries
2	Shri Guruprasad Shetty		Association of Hotels & Restaurants
3	Shri R. K. Singh	Chief Electrical Distribution Engineer	Central Railway
4	Dr. Shatadru Sengupta	Director-Legal and Company Secretary	Hardcastle Restaurants Pvt. Ltd.
5	Shri Rajindar Singh	President	Western India Glass Manufacturers Association
6	Shri Vijay Y. Tamhane	Convenor	The Millowners' Association
7	Smt. Shweta A. Abrol	Chief Co-ordinator	Bharitya Udhami Avam Upbhokta Sangh
8	Shri N. Ponrathnam	Proprietor	Vel Induction Hardenings
9	Dr. Rajas A. Rane	Maharashtra State Working Committee Member	Shivsena Grahak Saurakshan Kaksh
10	Shri Rishikesh M. Kulkarni	Committee Head	Shivsena Grahak Saurakshan Kaksh
11	Shri Prasad P. Ayre	Sub-Committee Head	Shivsena Grahak Saurakshan Kaksh
12	Shri Sachin S. Nayak	Committee Head	Shivsena Grahak Saurakshan Kaksh
13	Shri Vijay B. Malwankar	Executive Committee Member	Shivsena Grahak Saurakshan Kaksh
14	Shri Mahesh Bharbhaya		Shop No. 5, Sagar Deep Darshan
15	Shri S. S. Seth	Dy. CE (SO) W.S.	Municipal Corporation of Greater Mumbai (MCGM)
16	Shri Pramod Ramesh Bhogte	Editior	Navsandesh Saptahik, Surabhi Publications
17	Shri Pankaj D. Muni	President	Electrical Contractors' Association of Maharashtra
18	Shri Kapil Sharma	Regulatory Affairs	Reliance Infrastructure Ltd.
19	Shri Ramniklal Chedda	Chairman	The Retail Grain Dealers Co.Op.

Page 182 of 185



S.No	Name of Person / Official	Designation	Institution
			Society Ltd.
20	Shri P. E. Chandran	Proprietor	S.C. Electricals
21	Representative		The Tenants of Kalyan Bldg.
			Bldg. No. 1 & 3
22	Shri Apurva Patel	Secretary	MIDC Marol Industries
			Association
23	Shri D. V. Sawale	President	Dadar Merchant's Association
24	Representative		Indian Hotel & Restaurant
			Association
25	Shri Ravinder Kumar Seth	G.M. (E&M)	Mumbai International Airport
		, ,	Pvt. Ltd.

List of Objectors who attended the Public Hearing on March 24, 2009

S.No	Name of Person / Official	Institution	
1	Shri Mahesh I. K.	Excel Electric Industries	
2	Shri R. K. Singh	Central Railway	
3	Shri G. K. Sarda	Western India Glass Mfrs. Association	
4	Shri Vijay Y. Tamhane	The Millowners' Association	
5	Shri Rakshpal Abrol	Bharitya Udhami Avam Upbhokta Sangh	
6	Shri N. Ponrathnam	Vel Induction Hardenings	
7	Shri Mahesh Bharbhaya	Shop No. 5, Sagar Deep Darshan	
8	Shri Amit S. Gajaria	Kandivali Co-Op Ind. Estate	
9	Shri Champalal Dloka	Kandivali Co-Op Ind. Estate	
10	Shri B. G. Maheshwari	Empire Ind. Ltd.	
11	Shri Karn Pallav	Reliance Infrastructure Ltd.	
12	Shri Anil V. Kale	ICRA Management Consulting Services Limited	
13	Shri Vivek Mishra	Reliance Infrastructure Ltd.	
14	Shri Ajay Kumar	JSW Energy Ltd.	
15	Shri P. S. Ganguly	Mumbai International Airport Pvt. Ltd.	
16	Shri Pravind Kumar	Mumbai International Airport Pvt. Ltd.	
17	Shri J. D. Tayade	Maharashtra State Electricity Transmission Company Ltd.	

Page 183 of 185



S.No	Name of Person / Official	Institution	
18	Shri Shatadru Sengupta	Hardcastle Restaurants Pvt. Ltd.	
19	Shri Shivprasad Bole	Hardcastle Restaurants Pvt. Ltd.	
20	Shri Guruprasad Shetty	Association of Hotels & Restaurants	
21	Shri Sunil Joglekar	Hiranandani Infrastructure and Real Estate Company (HIRCO), Powai	
22	Shri Sumesh Mangle	Reliance Infrastructure Pvt Ltd.	
23	Shri S. W. Deshmukh	Electrical Contractors' Association of Maharashtra	
24	Shri Sunil Samy	Electrical Contractors' Association of Maharashtra	
25	Shri Pavitran K.	Brihanmumbai Electric Supply and Transport Undertaking	
26	Shri B. A. Shaikh	Brihanmumbai Electric Supply and Transport Undertaking	
27	Shri S. A. Nikalje	Maharashtra State Power Generation Company Ltd.	
28	Shri A. V. Shenoy	Maharashtra State Power Generation Company Ltd.	
29	Shri N. J. Padalkar	Maharashtra State Power Generation Company Ltd.	
30	Smt Sapna Desai	Mid-Day	
31	Shri A. K. Balan	S.C. Electricals	
32	Shri V. Thanumoorthy	Mumbai Citizens Welfare Forum	
33	Shri Sachin Nayak	Shivsena Consumer Protection Cell	
34	Shri Prasad Ayare	Shivsena Consumer Protection Cell	
35	Shri P. G. Pokhmare		
36	Shri Sharad Nath		
37	Shri R. S. Verma		
38	Shri R. Mago		
39	Shri R. C. Rawat		
40	Shri R. U. Patil		
41	Shri G. P. Charmia		
42	Shri Lakshman Sawant		
43	Shri Rajan Kongaunkar		
44	Shri Rakesh Reddy		
45	Shri Dilip Chawan		
46	Shri B. P. Bhutt		
	1		

Page 184 of 185



S.No	Name of Person / Official	Institution
47	Shri V. V. Devathosh	
48	Shri Gulal Dagu	
49	Shri M. N. Kothari	
50	Shri Mahesh Patankar	

